

Where do Tier 1 contractors make their money?

This short paper explains the typical business model of a tier 1 contractor, alongside factors that impact project costs and profit margins.

Current state of play

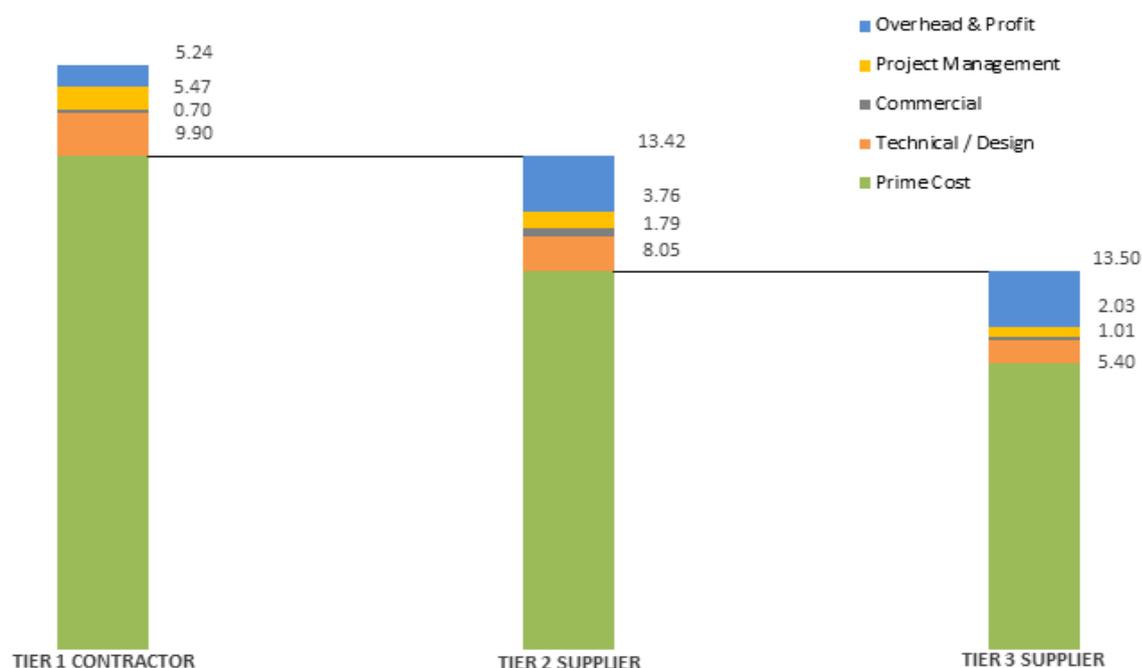
Over the last three years the pre-tax profit margins of the UK's 100 major contractors has grown steadily from 2.1% to 2.8%. However, latest figures also highlight that the average pre-tax profit margins for the ten largest tier 1 contractors sits at -0.5%.¹ Clearly this is an unhealthy indicator and not sustainable in the longer term.

Cost estimating

Tier 1 contractors use an estimating team to determine the costs of a given project or programme of works. An estimate is produced that includes the details of the expected prime costs supplemented by overhead, profit, risk and contingency. Underpinning this analysis are the assumptions that the estimating team make on labour productivity. An adjudication process is completed to approve the final costs.

Project costs can vary between construction and different infrastructure sectors. Figure 1 shows the unpublished costs of two large building projects in London.² It demonstrates that design and project management costs are consistent throughout the supply chain, but overhead and profit make-up a much smaller proportion of costs at general contractor or tier 1 level. This cascade of increasing profit margins often leads to retentions being held by tier 1 contractors from their sub-contracts in order to protect their modest profit margin.

Figure 1 Project costs through the supply chain



¹ Construction News (2017) [CN100 2017: Construction's top 100 contractors](#)

² ICE (2017) [Project 13 – From Transactions to Enterprises](#)

Risk profiles

Infrastructure

High levels of risk often translate to smaller profit margins for tier 1 contractors if there is insufficient contingency. They can be squeezed even further when projects are procured on a fixed price basis where risk is transferred to the supply chain with pressure on achieving a low cost tender return to win the contract.

This can be the case with some local authority road projects. A substantial amount of ground/design risk is taken on by the contractor and if there is agreement on a fixed price for the completion of works then any additional contingency might have to come from profit.

Construction

The level of risk for tier 1 contractors associated with large residential and commercial developments tends to be relatively low once design and procurement processes are underway. This lower risk profile has the ability to attract significantly better returns than the infrastructure market and also helps to reduce the potential for 'blowouts'.

Achieving sustainable levels of profit

The following types of projects or approaches are more likely to generate sustainable levels of profit:

- Collaborative projects that allow detailed design, risk allocation and price to be developed together at the outset. Highways England ECI schemes (Early Contractual Involvement) have effectively adopted this approach.
- Programme works that allow contractors to spread risk over a series of projects and achieve continuity over a number of years in terms of project teams. Network Rail's upgrade and electrification works on the Midlands Mainline are a good example in this context.
- Framework approaches where there is an opportunity to win separate contracts with a trusted customer over a period of time. See for example Anglian Water's framework partners approach.

Profit constraining factors

There are a range of constraining factors that can impact the ability of a tier 1 contractor to effectively control costs and increase profit margins. These include:

- Not having the most suitable team in place to deliver a specific project.
- Accepting a fixed price too early in the design and procurement process that can also lead to scope creep (particularly in infrastructure).
- Public sector procurement where there is an expectation to satisfy repeatedly different requirements of multiple government departments and client bodies.
- Failure to adequately administer contract terms.
- Agreeing speculative or onerous terms with a new a client.

Operating models

Direct employment vs sub-contracting

Tier 1 contractors use a range of different operating models to deliver large infrastructure projects and programmes, in part to be able to respond effectively to different client requirements. This includes choosing between directly employing project staff, sub-contracting work or a combination of the two.

Directly employing large numbers of project staff is more efficient if there is a large volume of work available, but can soon become a constraint on revenues if the availability of work shrinks. The opposite is true of sub-contracting. When there is a smaller volume of work available employing less project staff is more affordable, but this is a disadvantage if the need to mobilise project staff quickly arises.

In addition to aiding resource management sub-contracting also helps to ensure that the required expertise for specific projects is put in place, as well as contributing to more effective management of risk.

Core business processes

Another significant variation is whether to outsource core administration processes or centralise them. The ability to outsource HR, payroll, IT and so on to the business service sector depends on the revenue position of a contractor. High levels of revenue enable this outsourcing to take place and therefore reduce overheads and overall operating costs. However, if revenue levels drop then the cost of outsourcing these processes can quickly become a constraint on overall profit margins.

Diversification

Some tier 1 contractors focus specifically on civil engineering and infrastructure projects, while others choose to have a more diverse approach that includes the wider construction market e.g. housing. Diversified contractors are less dependent on securing work in specific sectors; maximising revenue generating opportunities and increasing resilience.

Regional vs national delivery

Tier 1 contractors will typically have regional and national businesses, plus sector specific functions. It is important that the scale and nature of different infrastructure projects is properly understood when project delivery teams are assembled. For example, a regional function of a tier 1 contractor is unlikely to be best placed to deliver a national infrastructure project and ensure value for money.

Technology

Use of new technologies can lead to major productivity improvements in the delivery of infrastructure projects and can increase operational efficiency. But affordability, organisational culture and understanding are considered as barriers to their wider adoption in tier 1 contractor operating models. Programme works and other long-term approaches to contracting can incentivise the investment of available capital in new technologies including through partnerships with technology specialists.