

Best Practices in Requirements Engineering

The Requirement Dilemma: Mind the Gap

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When planning to make a change in your organization, consider these three critical factors to maximize your likelihood of success.

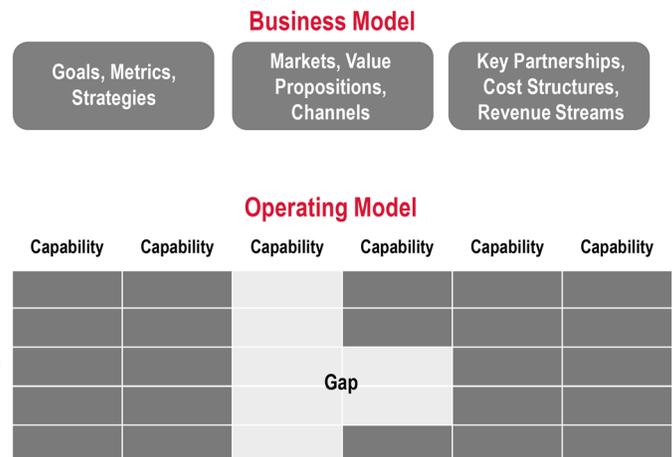
Corporations now spend large portions of their discretionary budgets to enact change through projects. Depending on the size of the organization, that number can go from \$millions to \$billions in the blink of an eye. With large sums of money at stake, along with the time and collective energy of the corporation, the relative risk in undertaking projects might seem ill-advised.

But because change is often driven through projects, I don't anticipate the project train to slow down anytime soon. A better question is how do we help maximize the chances of success? One obvious place to focus is on the formulation of the requirements – the very deliverable of the project that defines what the project should produce to be successful. Although there are several ways to measure the quality of a requirement, we will focus here on the 3 C's. The 3 C's are quality measures for the overall set of requirements: Context, Consistency and Completeness.

1. Context

In our effort to move quickly and to eliminate scope creep, we often jump into projects without really understanding the true reasoning and expectations behind them. As this model shows, a business model defines what a business is and an operating model defines how it works.

A project should enact a change in the operating model that directly supports the business model. The project scope should be defined by the gap in the current operating model that defines the response to some stimulus -- like a strategic change, a contract, a new competitive direction, etc. Context, in this case, involves defining success and not depending on the project team to figure it out for themselves.



2. Consistency

The most obvious place to look for consistency is among the requirements documents themselves -- to make sure they are written at the same level of detail and do not conflict with one another. The next level of sophistication is to examine the boundaries of the gap and to make sure that the requirements address how they work together across capabilities and across the various elements of the business architecture (i.e. people, process, information, etc.) Inconsistent requirements lead to varied experiences of the final product.

3. Completeness

A complete set of requirements simply means that the project team did not leave out any requirements. A complete set of requirements addresses the entire gap and its interactions: no more and no less. We use several methods to maximize the chances of catching all of the requirements. First, ensure there is context and consistency. Next, use an iterative, open-ended approach to requirement development. And last, approach the requirements phase using a pattern-based approach so you always know what questions to ask in every situation.

In [Part II](#) of this series, we'll discuss a pattern-based, "requirement factory" approach that covers the 3C's in a highly efficient process for building requirements.

Follow [Sandy Kleinberg on LinkedIn](#) for more insights and practical applications of business architecture. Sandy welcomes your questions and comments; contact him at skleinberg@leveragingtechnology.com or 585.454.4250 x145.

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