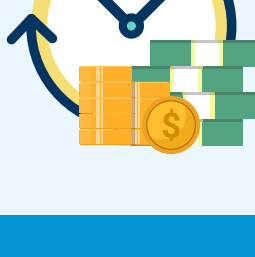


POWER TO THE (TRADES) PEOPLE

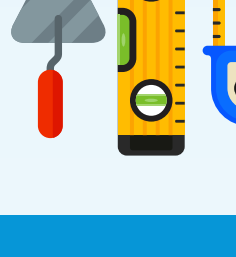
Want higher-quality, more-efficient construction projects? Empower your contractors and subs in the planning stage with lean construction, a process that involves all stakeholders—including those doing the work.



As construction projects and teams become more complex, companies need to work smarter.

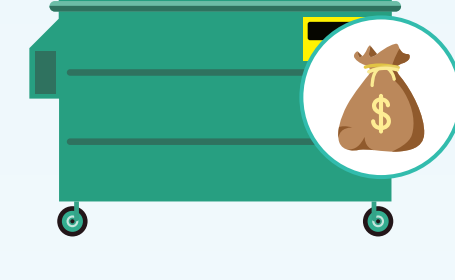


70% of projects are over budget and delivered late¹



4%–9% of total project cost is due to rework²

LEAN CONSTRUCTION MAXIMIZES VALUE AND MINIMIZES WASTE



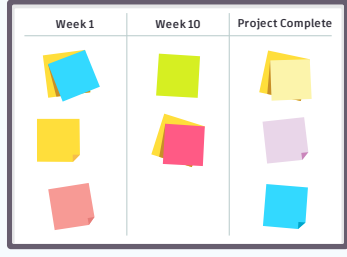
84% higher-quality construction
74% reduced project schedule
77% greater productivity
80% greater customer satisfaction³

WHAT IS LEAN CONSTRUCTION?

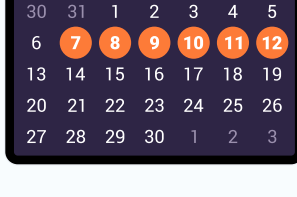
It's a collection of practices that boosts efficiency through decentralized decision-making and wider information-sharing. Some lean practices include:



Early stakeholder involvement
 Include contractors and trades in the design phase.



Pull planning
 Work backward from a single milestone to create the most efficient schedule.



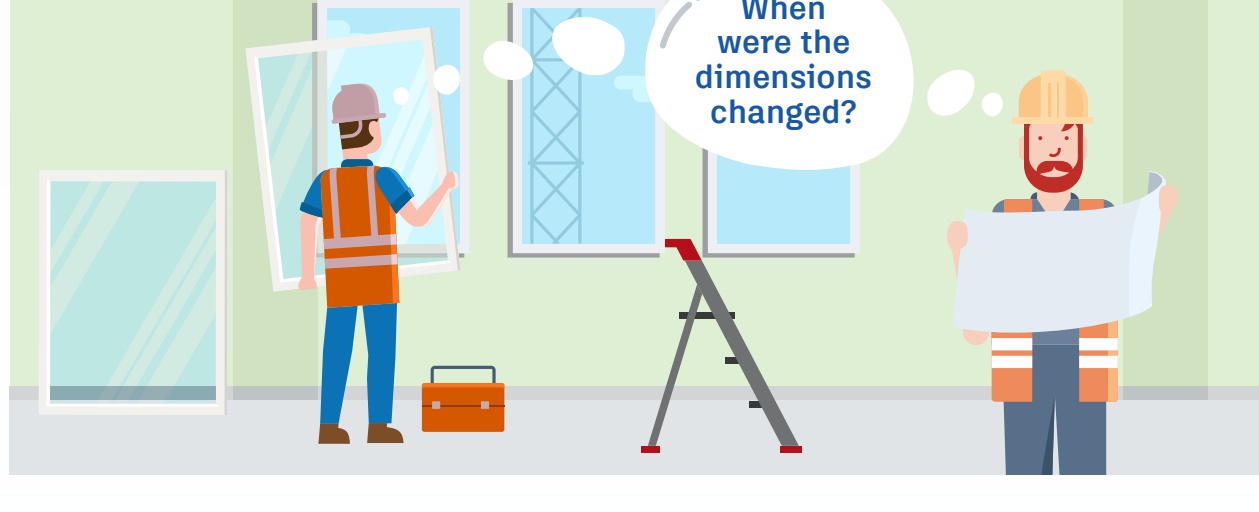
Weekly work planning
 Commit to complete all tasks for the upcoming week.

HOW DOES LEAN HELP?

Without Lean

Projects without lean practices may incur wasted time, effort, and materials.

Clash



Rework



Conflicts between tasks on-site

With Lean

By using lean practices with technology, contractors in the US, the UK, and France saw the following benefits.⁴

LEAN PRACTICE

Early stakeholder involvement

51%

Reduced clash (and eventual rework)

Pull planning

45%

Reduced conflicts between tasks on-site

Weekly work planning

52%

Reduced rework

WHO'S GETTING LEAN?

47%–66% of all contractors have at least a moderate level of experience with lean practices ...⁵

Early stakeholder involvement

Pull planning

Weekly work planning

US

54%

43%

65%

UK

70%

57%

78%

FR

56%

41%

56%

... and they're willing to invest in BIM-based solutions within the next two years to improve these practices.⁶

Early stakeholder involvement

Pull planning

Weekly work planning

US

63%

70%

71%

UK

59%

63%

69%

FR

58%

61%

65%

TOP BARRIERS TO GETTING LEANER

The biggest challenge is a lack of buy-in from various stakeholders, but there are other issues as well.⁷

Early stakeholder involvement

Pull planning

Weekly work planning

US

Lack of owner/operator buy-in

Lack of trades buy-in

Lack of trades buy-in

UK

Lack of other stakeholder buy-in

Lack of owner/operator buy-in*

Lack of trades buy-in

UK

Lack of other stakeholder buy-in

Lack of other stakeholder buy-in*

Lack of trades buy-in

FR

Insufficient BIM workforce skills*

Insufficient BIM workforce skills

Lack of trades buy-in

FR

Lack of other stakeholder buy-in*

Insufficient BIM workforce skills

Lack of trades buy-in

FR

Unclear business case*

Insufficient BIM workforce skills

Lack of trades buy-in

*Tie

CHANGE IS HARD. BUT INVESTING IN CHANGE PAYS OFF.

Projects that use a variety of lean practices are

3x

more likely to be ahead of schedule

2x

more likely to be under budget⁸

than those using fewer lean practices—and that means they can take on more work.

Sources

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