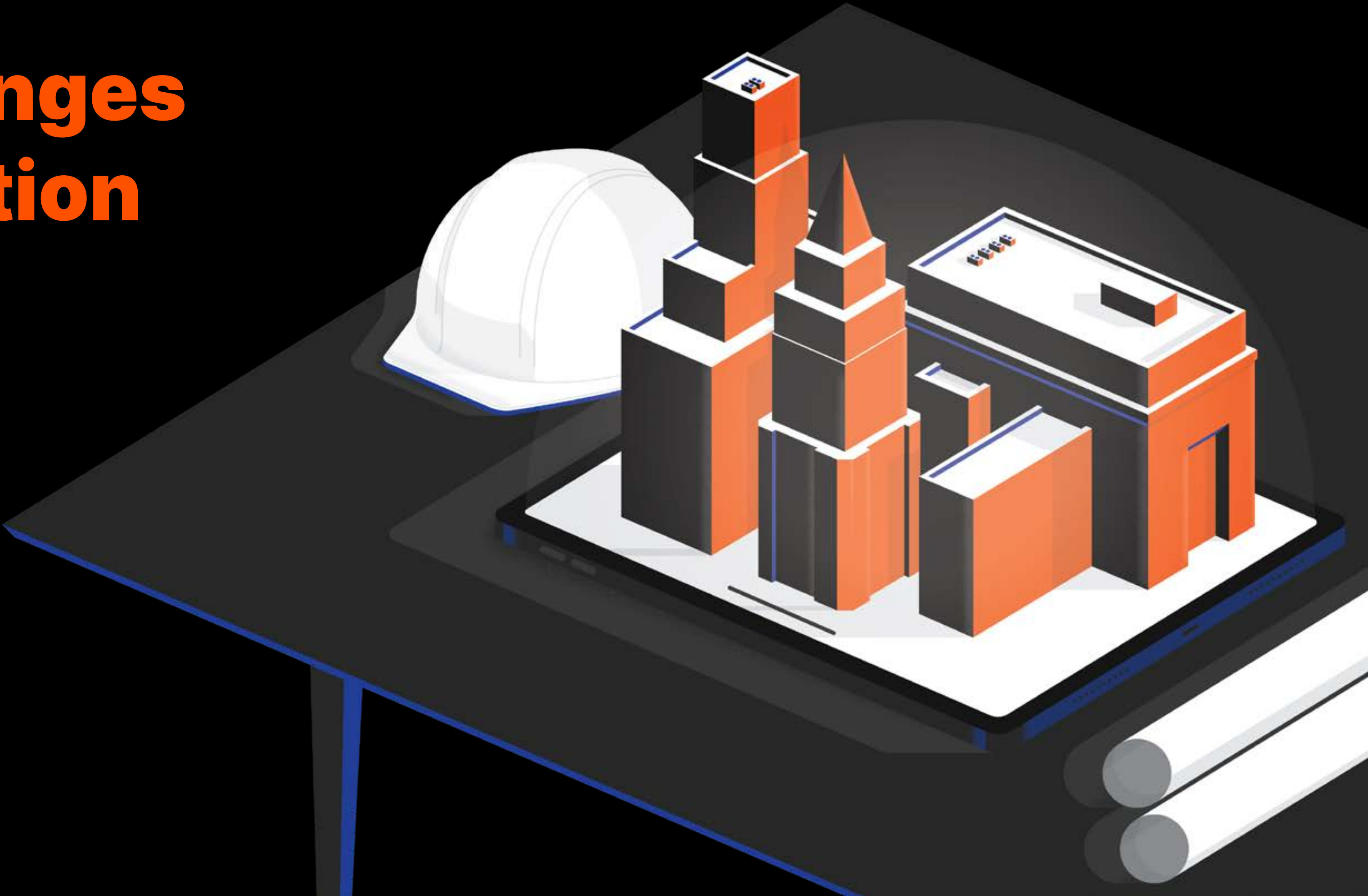THE PRECONSTRUCTION PLAYBOOK:

Solving Challenges with Construction Management Technology

PROCORE®

Contents

Preconstruction Today

Preconstruction is undergoing a dramatic evolution, shifting from the traditional linear process of design, bid, build—which largely focused on cost reduction and avoiding liabilities—to a dynamic, iterative and collaborative approach demanding significant trust and transparency. In rapidly progressing projects, the preconstruction and construction processes unfold concurrently, introducing complexities across bidding, estimating, design management and BIM coordination. This shift calls for continuous adaptability to secure new projects, effectively manage them and prime construction teams for success.

FMI's State of Global Preconstruction report reveals that fewer than one in five firms are performing above-average preconstruction, with dedicated staff and consistent practices. There is a clear need for improved support and innovative tools to enhance both profitability and predictability. Many organizations still rely on manual processes, such as email, paper, phone or isolated software during preconstruction, leading to delays and miscommunication. Common preconstruction issues include communication gaps, inaccurate estimates, disorganized documentation, inefficient handoffs and lengthy project backlogs.

This playbook will explore the challenges of preconstruction, their root causes and how construction management technology can help you navigate them with ease. Enhancing your preconstruction strategy is the key to a better project experience for all stakeholders. Dive in to discover how to master the preconstruction process and find the technology to support you.
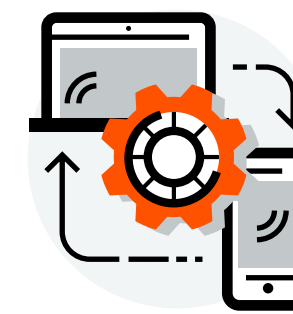
01

Navigating Preconstruction Challenges

The preconstruction phase offers a chance to utilize the expertise of preconstruction department's expertise in foreseeing and handling potential challenges. With their extensive experience, these teams excel at pinpointing obstacles that may result in later rework. By harnessing this knowledge and adopting technology, preconstruction teams can collaborate effectively and guarantee seamless handoffs.

Let's explore what can happen when manual and disconnected solutions are the norm:

Communication Hiccups

A strong foundation of transparent and consistent communication is vital to a project's success. However, multiple communication channels like email, phone, paper, fax or siloed technologies can cause vital information to fall between the cracks or get misconstrued, leading to frustration, delays or contractual disputes that damage trust.

Estimation Hesitation

Precise estimates are essential. Unfortunately, manual processes often hamper an estimator's ability to deliver precise and accurate estimates. Human error and inaccurate estimates introduce risk early on, sometimes drastically affecting project outcomes. Additionally, traditional methods can lead to missed opportunities, deadlines and bids when estimators are juggling several projects at once.
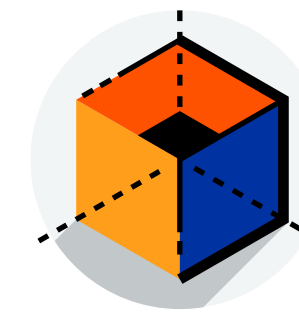
Document Dilemmas

Using manual or disconnected solutions makes maintaining and sharing up-to-date documentation a challenge. Real-time visibility is essential, but it's often unattainable as project information tends to change frequently during preconstruction. Crucial adjustments to plans are often made by architects and engineers during this phase. If specialty contractors aren't kept in the loop, things can go off-track, leading to potential legal ramifications and contractual disputes.

Inefficient Handoffs

The handoff between preconstruction and the course of construction is critical, but fragmented systems and manual processes hinder smooth data transfer, causing delays and problems between project phases. Double-data entry across isolated solutions and the absence of a single source of truth can lead to errors and inconsistencies, creating issues early in the project kickoff.

BIM and Design Coordination Challenges

The implementation of BIM and design coordination is a critical aspect of the construction process, but it can often become a bottleneck if not managed effectively. Outdated and manual methods can lead to missed nuances, errors and inconsistencies, potentially compromising the accuracy and utility of the BIM models. The absence of a centralized system can yield a fragmented BIM coordination process, making it challenging to integrate and compare different project aspects effectively.

Lengthy Project Backlogs

The preconstruction process creates extended project backlogs, which can negatively affect client satisfaction and team morale. Finalizing bids and contracts can take weeks or even months, leaving team members and clients alike eager to get started. This situation can jeopardize both client trust and employee retention.

By understanding these common preconstruction challenges and working proactively to address them, you can set the stage for a more successful construction project and foster stronger relationships with clients and team members.

02

Tackling the Root Causes of Preconstruction Challenges

Although preconstruction issues can cause expensive delays, reduced client trust and sluggish project starts, they are preventable. Many firms grapple with decentralization, insufficient automation or a lack of standardization throughout the preconstruction process. Tackling these three critical aspects can greatly improve project results and boost client confidence.
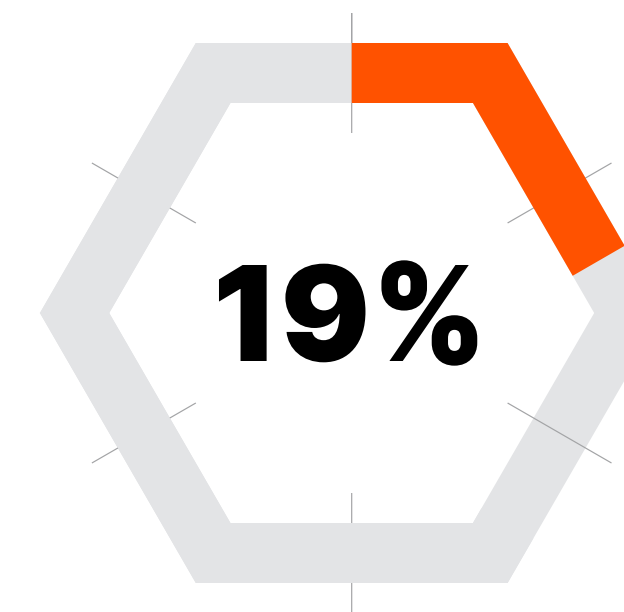
+ Centralization Deficiency

Effective preconstruction requires collaboration and coordination among stakeholders, but the iterative nature of the process poses challenges. Decentralized information can cause confusion, delays and a lack of ownership. A unified platform providing secure and accessible access to project information is essential to streamline the process and enable efficient collaboration. By leveraging a centralized system, all stakeholders can work together effectively, reducing the potential for errors, miscommunications and delays, ensuring successful project delivery in the face of constantly evolving information and requirements.

+ Automation Shortfall

Rework accounts for a staggering 19% of total project costs. Much of this rework is caused by manual data entry, which also introduces risk and inefficiencies. While using paper, email or siloed solutions may be the norm, they're far from the easiest or most efficient options. Investing in intuitive, easy-to-adopt technology that connects the whole team can alleviate rework and promote productivity.
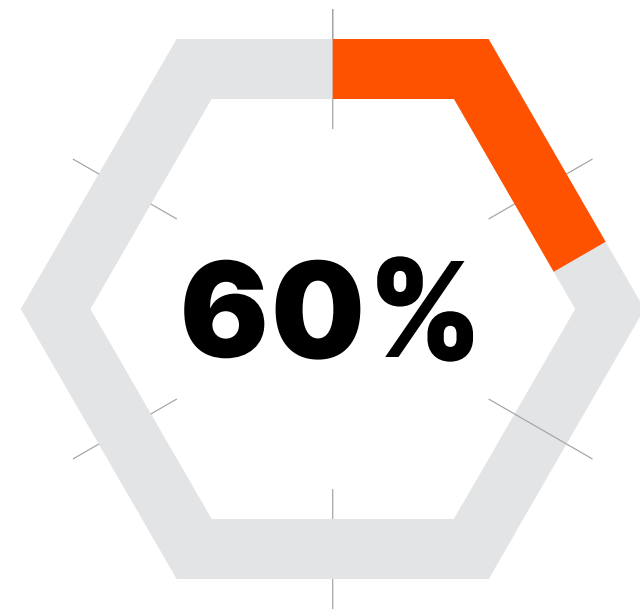
19% of total project costs is due to **rework**.
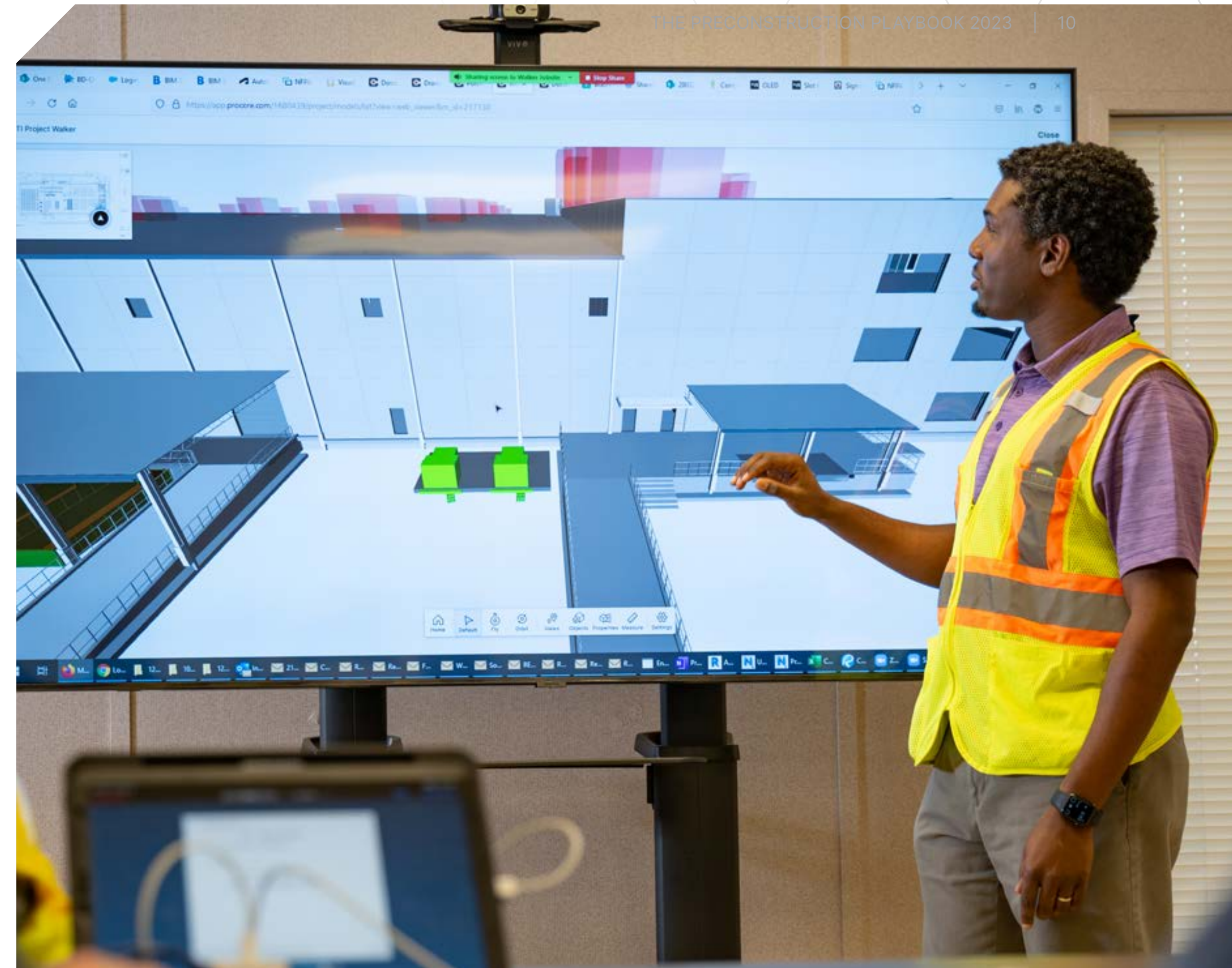
+ Lack of Standardized Processes

More than 60% of firms struggle with "reinventing the wheel" on every project due to a lack of regulated procedures, dedicated staff or knowledge retention. Without standardized processes in place, preconstruction becomes an incredibly confusing phase for employees, contractors and clients alike. To maximize productivity and ensure everyone's on the same page, organizations must implement a cohesive preconstruction process across the entire organization. This standardization requires support from a platform that can track project history, outline procedures and maintain accountability.

+ BIM and Design Coordination Discontinuity

The process of BIM implementation and design coordination can be laborious and error-prone when performed manually or through disjointed systems. This inefficiency can extend the preconstruction phase, diminishing the overall efficiency of the project. However, technology can be instrumental in tackling these issues. Modern digital tools can automate and streamline the BIM and design coordination process, significantly reducing the time required for these tasks. These tools offer a holistic view of the project's BIM model, ensuring a more precise and effective design coordination.

60% or more of firms **struggle with "reinventing the wheel"** on every project due to a lack of regulated procedures or knowledge retention

By addressing these root causes of preconstruction challenges, firms can create a smoother, more efficient and collaborative process that sets the stage for successful construction projects and fosters stronger relationships with clients and team members.

03

The Solution: Harnessing Construction Management Technology

Investing in better preconstruction drives better business outcomes, and construction management technology is the key. This technology streamlines the preconstruction process, enhances estimating and BIM, and unifies the team aligned within a single source of truth. Construction management technology can support smarter preconstruction in a variety of ways.

Construction Management Technology Supports Smarter Preconstruction

Standardized Communication

By bringing stakeholders together within a single solution, construction management technology reduces miscommunication and ensures everyone stays on the same page.

Document Management

With technology, you can track changes to plans, ensure accountability through approval workflows and provide real-time project alerts for all stakeholders.

Improved Bidding Processes

Digitally managing bids and contracts help to avoid delays, ensures accuracy and allocates resources effectively, leading to more efficient and successful projects.

Automated Estimating Processes

Reducing data entry errors and improving accuracy with technology such as Automated Area Takeoffs and 3D Takeoff benefits not just estimators, but also boosts the efficiency of the whole team.

Seamless Handoff Between Phases

Software enables the automatic transfer of data, streamlining the transition of data between preconstruction to the course of construction.

Integrated BIM and Design Coordination

Software aids in streamlining the BIM implementation and design coordination process, ensuring only comprehensive and accurate models are used for projects. It helps reduce risk, boost efficiency and foster successful project execution.

By adopting preconstruction technology, owners, general contractors and specialty contractors can address preconstruction challenges head-on and transform how firms approach their projects.

Procore Preconstruction: A Comprehensive Solution Built for the Industry

Designed specifically for the needs of the construction industry, Procore Preconstruction promotes collaboration, minimizes bottlenecks and enables data-driven decision-making for peace of mind during this crucial phase.

Unlike other technology solutions, Procore offers a comprehensive platform that integrates seamlessly with other tools and provides unlimited-user accessibility for all stakeholders. Procore's Preconstruction solution is equipped with powerful tools like Bid Management, BIM, Estimating and Prequalification.

Some of the standout benefits of Procore Preconstruction include:

☑ **Unified Planning:** Collaboratively plan and manage preconstruction activities within a single, connected solution, fostering teamwork and efficiency.

☑ **Enhanced Visibility:** Drive transparency and collaboration by creating a central hub for all preconstruction activities, giving stakeholders real-time access to crucial information.

☑ **Streamlined Bid Pipeline:** Gain insight into your bid pipeline, create bid packages, effortlessly compare bids and convert bids to subcontracts within a single workflow.

☑ **Accelerated Project Handoff:** Seamlessly transition from estimating to construction without the need to switch between multiple apps, helping reduce delays and ensuring smooth project progression.

☑ **Data-Driven Insights:** Leverage your preconstruction data to analyze performance, identify inefficiencies and optimize your bidding process for faster and more effective results.

" **Procore keeps improving communication between estimators and project teams. We used to waste time recreating budgets at the beginning of a project, but now with Procore Estimating we just hit transfer to Procore.** "

Sebastian Grimard
Executive Vice President
Grimard

05

Procore Preconstruction Champions

Some organizations are already making great strides in overcoming common preconstruction challenges with technology. Discover how these firms changed their preconstruction for the better with Procore—improving efficiency, avoiding financial surprises and streamlining processes.

CDG Builders

When this California general contractor quadrupled in size over four years, they also outgrew their preconstruction process. Procore has helped streamline new processes, save the team 14 hours a week and centralize their prequalification and bidding.

→ **Read CDG Builders' story here.**

" **Procore has saved our back a number of times, even as we move from preconstruction to construction. We can go back and say, 'Hey, you say you didn't receive the updated plans, but Procore shows us you downloaded and viewed them on this date.** "

Kristi Martin
Director of Office Operations
CDG Builders

TRUE NORTH

True North

Based in Atlanta, this general contractor wanted to polish their preconstruction process and eliminate financial surprises. Procore's cloud-based platform provided a solution for True North's needs, allowing them to integrate and automate in a single environment, saving time and money.

→ **Read True North's Story here.**

"**Being able to offer more and easier access to information is also key to procuring your subcontract team and keeping them on board. You want them to like the work environment you offer. At the end of the day for us, it's always about, 'Can I help my subs make money?' Because if they don't make money on jobs with us—well, they're not going to work with us anymore. Procore is the differentiator by providing access to information for everybody on the team.**"

Dennis Campbell
Director of Preconstruction
True North

Ananda Development

Ananda Development, a premium property developer in Thailand, champions technology led-innovation and wanted a central repository for their preconstruction process. With Procore, Ananda manages project kickoff, leverages a design gate and checklist review process, ensuring everyone has the same information and visibility into the project and helping to avoid costly delays due to missing or incomplete data.

→ **Read Ananda's story here.**

" **When we put a rough comparison between before we started using Procore and after, we can see more than 40% improvements in our efficiency.** "

Wiphak Trakanrungsi
Chief Technology Officer
Ananda Development

Conclusion

Preconstruction, like many phases of construction, has remained fairly stagnant over the years. However, with new strides in construction, organizations can improve their preconstruction process, unlocking improved communication, estimating, bid management and more.

Procore provides a comprehensive suite of products to support top-tier preconstruction that eliminates document anxiety, minimizes financial surprises and keeps stakeholders aligned for successful outcomes. With Procore, firms can break down silos and instead build, design and bid with confidence.

Ready to take preconstruction at your organization beyond the status quo?

Get a demo today and learn more about Procore Preconstruction.

If you have any questions,
give us a call at 877-268-2511

Or email us:
sales@procore.com

Talk with an Expert

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YouTube Channel

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