Willow For New Construction

willow
know your world

Better manage your data.
Better manage your construction outcomes.

VAV-11-S.4

Currently the majority of information that is produced through the construction process is under-utilised. It's locked away in proprietary systems, stuck within different disciplines or siloed between project stages. By better understanding and managing this information, we can deliver a host of benefits – not only in the efficiency and quality of construction but drive long term operational value for end owners. The solution to this problem goes beyond Building Information Models and smart asset registers, the complexity of the process requires a comprehensive and data driven solution built around the needs of contractors.

willow
know your world

The Willow Solution:
The Digital Twin for New Construction

Willow is a technology company that creates Digital Twins of real assets, either buildings or infrastructure. From the beginning of design, through to construction, handover and operations, Willow collects, validates and funnels information into a virtual replica of the built form, called a WillowTwin®. With this powerful tool, Willow enables assets to be more connected, sustainable and intuitive, and enables users to better understand their investments, optimize operations and enhance the user experience.

Through the construction phase of a project, this approach enables General Contractors and End Owners to have total transparency and control when it comes to the management of their digital information. By better understanding your digital information, we can drive more efficient construction methodologies, smoother handover, faster commissioning and set the foundation for a smart building or infrastructure project in operations.

Willow's capability is founded upon deep expertise in construction, architecture, Building Information Modelling (BIM)and Asset Management. The company has a long history in delivering complex construction projects and has leveraged this expertise as we deploy Digital Twins for the built world.

Why implement a digital twin?

The digital twin answers a number of key challenges for the industry.

Owners and occupants are demanding more value control of their data.

There is no single interaction accross multiple buildings or technology.

Fragmentation accross data sets, platforms and protocols.

Our solution
is a hybrid of
professional services
and software, built
around the precise
needs of contractors
and end owners in
new build process.

WillowDigital:
Digtial Engineering and Architecture Services

WillowDigital is the services arm of Willow. This team of industry leading professionals deliver Digital Engineering and Architecture services to customers. The WillowDigital team understands the processes required to harness the technology of today, innovation of tomorrow and unlock the power of data within the portfolios of both buildings and infrastructure networks.

Benefits
- Foundation for smart buildings & infrastructure networks
- Reduced risk of rework
- Day one ready
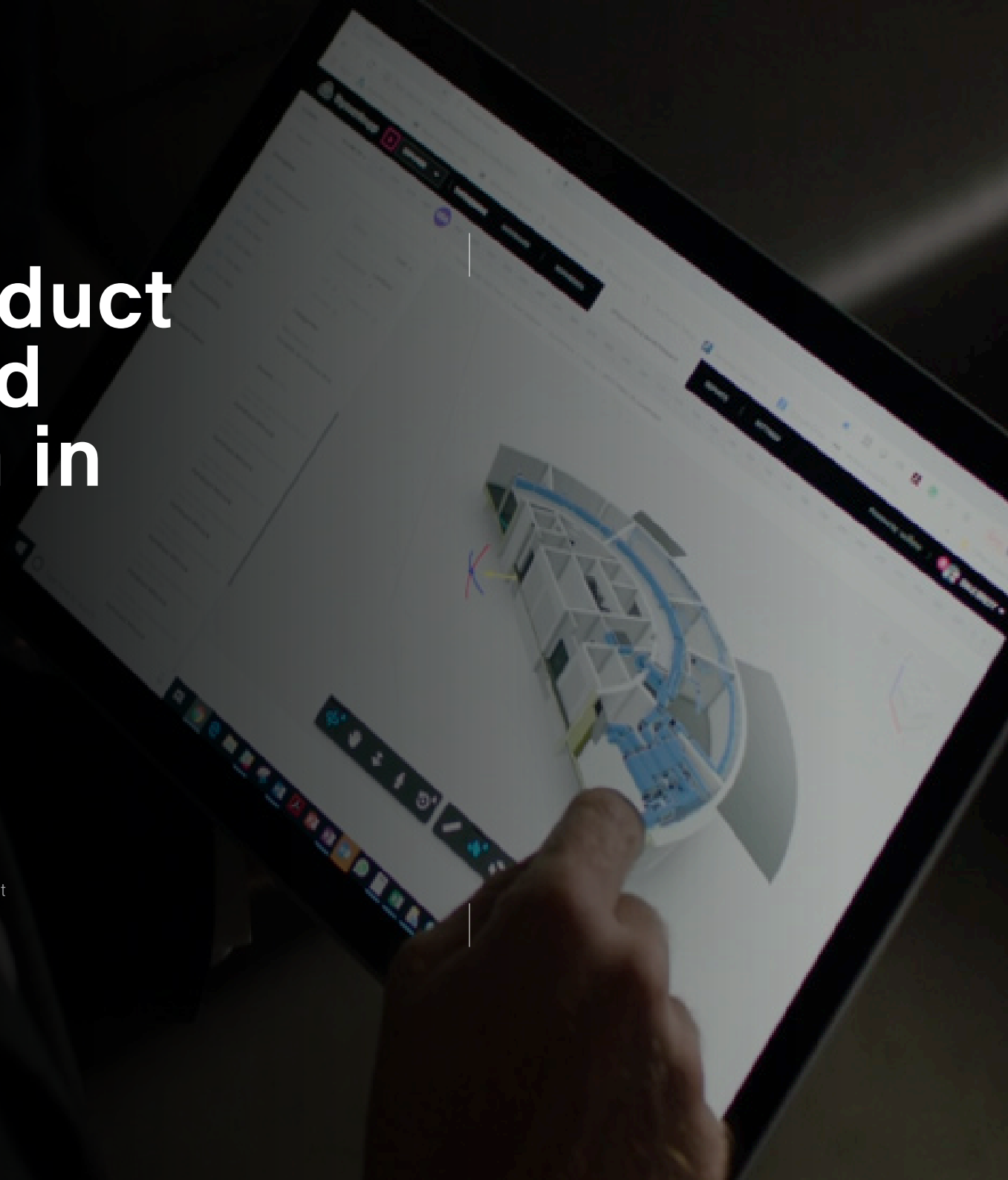- Compliance and governance

Twin Creator:
A software product for tracking and managing data in construction

Twin Creator provides insights into digital twin creation. By tracking spatial data, asset data and live data inputs, it allows users to validate the progress of the twin visually and intuitively. Through the Twin Creator, head contractors and owners can better manage their stakeholders and supply chain deliverables, reducing defects and data loss.

Twin Creator achieves this by allowing a user to create a custom database that validates data inputs and provides feedback via a dashboard on completeness and compliance of information. Used during the Design and Construction phases of a project, the Twin Creator develops a simple way for information to be managed, so that everyone understand what needs to be completed, by who and when.

Benefits
- Single source of truth for all asset information
- Track, validate and manage data during construction
- Handover day one
- Set up your building for smart operations

BIM
DIGITAL WORLD

DIGITAL TWIN
DIGITAL WORLD + PHYSICAL WORLD

BIM diagram icons: 3D · DATA · DOCS

Digital Twin diagram labels: MACHINE LEARNING · PREDICTIVE MAINTENANCE · WHAT IF ANALYTICS · REAL-TIME OPERATIONAL DATA · ASSET INTO MODEL · ANALYTICS · KNOWLEDGE BASE

DESIGN ▶▶▶ CONSTRUCTION ▶▶▶ HANDOVER ▶▶▶ OPERATION & MAINTENANCE ▶▶▶ EXPERIENCE ▶▶▶
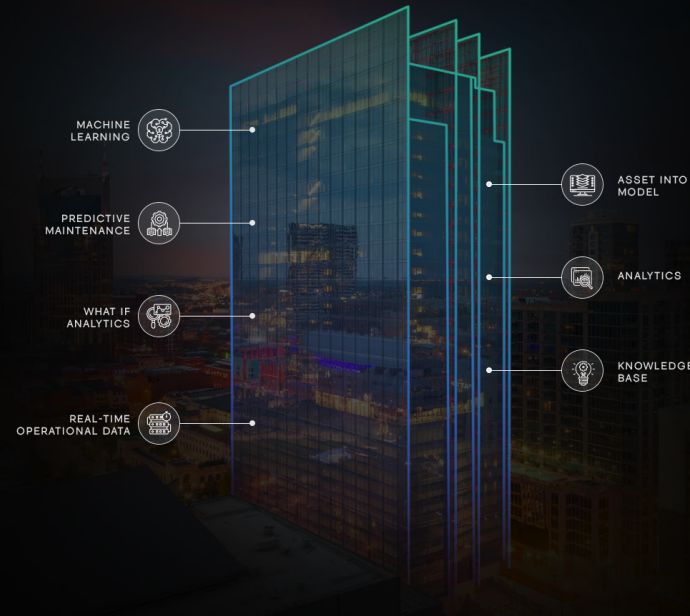
Getting From BIM to Twin

Through the construction process our digital architects, engineers and project managers enrich the model with both static data such as asset registers and operation manuals, and live data such as the stream of information coming from the Building Management System and sub-systems such as energy use sensors, lighting sensors and the vertical transportation.

Willow sees that 2021 is the year where Digital Twins become commonplace and are widely accepted as a fundamental technology solution for Smart Buildings.
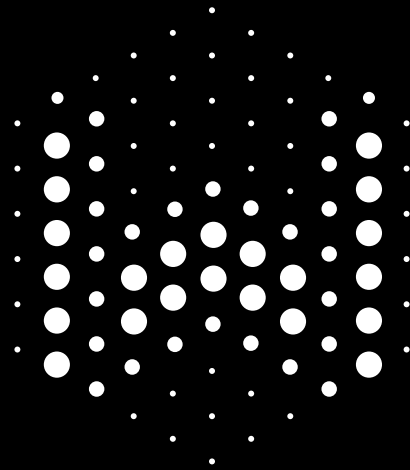
As the virtual world and the physical world increasingly align, we are excited by the possibilities Digital Twin approaches offer. Like any innovation, it is a journey where the horizons are as limitless as technology itself. For buildings and infrastructure, the benefits are already clear - increases operational efficiency, driving resource optimisation, improving asset management, delivering cost savings, improving productivity and boosting stakeholder engagement.

Want to find our more about how a Digital Twin can help your assets? Find out more by contacting us or visit our website.

www.willowinc.com

willow

know your world