



nextracker™

**NX Horizon™**





NX Horizon™ is the world's most chosen solar tracking system, deployed and contracted on over 90 gigawatts of solar capacity as of December 2023. NX Horizon's unrivaled combination of integrated hardware and software is the gold standard for the utility-scale solar industry. It is known for its robust design, ease of installation, field-proven weather durability, and LCOE-optimized performance.

## Pioneering independent-row technology

NX Horizon's patented independent row, self-powered tracking system provides reliable performance across the widest range of site conditions. Simple, robust hardware, including self-aligning module rails and vibration-proof fasteners, enables rapid installation and long life without maintenance. Mechanically balanced rows minimize tracking power requirements and pair with a time-proven drive & control system for maximum durability and uptime. NX Horizon's decentralized architecture with intelligent communications supports layout adaptability, flexible construction and commissioning sequencing, and advanced tracker functionality with over-the-air updates.



## Proven resilience

NX Horizon is designed to withstand extreme weather, proven season after season, with hundreds of systems around the world. Nextracker's in-house project-engineering services configure and optimize NX Horizon to suit the unique combination of weather and climate for each project site. Based on the industry's most comprehensive wind analysis and field testing, NX Horizon is hardened against failures by robust structural design, the industry's best damping system, and advanced stowing functionality. In the event of hail, NX Horizon offers a 60° stow position, rapid rotation and UPS backup to maximize module survivability, even in the event of a grid outage. Additional software, hardware and support is available with NX Horizon Hail Pro™, for maximum capability and readiness in severe hail regions. NX Horizon is inherently tolerant of flooding with drive and control components 4-5' above grade. Flood-stowing functions to protect panels are available.

## Highlights

**8 years** in a row

Global Market Share Leader

**90 GW**

Delivered on 6 Continents

**Best-in Class**

Software Ecosystem and  
Global Services

**Up to 4%** more energy

Using TrueCapture yield  
optimization software



## Optimized for the lowest LCOE

Compared with conventional tracking systems, NX Horizon delivers Levelized Cost of Energy (LCOE) reductions of up to 7% by maximizing energy generation and driving the lowest possible project CAPEX and OPEX.

With pre-assembled components, no drive linkages, no AC wiring, self-aligning rails, and available XTR terrain-following upgrades, NX Horizon is fundamentally faster to install, requiring less construction labor, less grading, and less total project capital cost.

Projects with NX Horizon enjoy open-row access for efficient vegetation management and panel cleaning. Compared with linked row systems, NX Horizon cuts mowing costs by up to 55% and cleaning costs by up to 73%.

To boost energy generation and revenue, NX Horizon comes equipped with a unique design optimized for bifacial modules. In addition, TrueCapture yield optimization software is available, delivering IE-validated annual energy gains using unique algorithms for different module technologies, site terrain and diffuse light conditions.

GENERAL AND MECHANICAL		ELECTRONICS AND CONTROLS	
Architecture	Horizontal single-axis, independent row, independently balanced	Solar tracking method	Astronomical algorithm with backtracking standard. TrueCapture™ available for enhanced energy yield
Configuration	1x module in portrait	Tracker controller	Self-Powered Controller (SPC) with integrated inclinometer and UPS
Tracking range of motion	Options for ±60° or ±50°. Steeper stowing angles available with Hail Pro	Motor	Brushless DC
Row Size	Configurable per module type, string length and site layout	Power supply	SELF POWERED: Standalone smart solar power AC POWERED: Customer-provided 120-277 VAC circuit
Array Height	Rotation axis elevation, 1.3 to 1.8 m / 4'3" to 5'10"	Communications	Network control units (NCUs) at inverter pads/skids, self-powered weather stations, centralized data hub, encrypted Zigbee wireless mesh communications
Drive type	High accuracy slew gear	Defensive stowing functions	Wind, hail, hurricane, snow, flood, loss of grid power
Modules supported	All utility-scale crystalline and thin-film modules	Operator interface	NX Navigator advanced HMI available, with SCADA integration
Bifacial optimization	High-rise mounting rails, bearing & driveline gaps, round torque tube		
Structural connections	Engineered fastening system, vibration-proof		
Materials	Galvanized steel; other coatings available		
Foundations	Complete range of foundation solutions available		
Slope	Up to 15% N-S and 15% E-W		
Ground coverage ratio (GCR)	No specific limit Typical range 25-45%		
Operating temperature range	SELF POWERED: -30°C to 55°C (-22°F to 131°F) AC POWERED: -40°C to 55°C (-40°F to 131°F) Cold Pak upgrades available		
Wind speed	Configurable up to 240 kph (150 mph) 10m, 3-second gust		
Wind protection	Intelligent wind stowing with symmetric damping system		
		SERVICE, WARRANTY, AND STANDARDS	
		Tracker engineering & PE stamped design package	Standard
		Foundation engineering & PE stamped design package	Available
		Onsite construction support & commissioning service	Available
		Warranty	10-year structural, 5-year drive and controls standard; extended warranty available
		Codes and standards	UL 3703 / UL 2703 / IEC 62817 / CSA

