Bentley
Advancing Infrastructure

PRODUCT DATA SHEET

MicroStation®

Design, Model, and Manage Infrastructure

MicroStation is an instrument engineers and designers use to model, document, and manage their infrastructure projects better and faster. The application is the solution that enables you to deliver innovative designs and creative visualizations while consolidating critical project elements into a single environment. With MicroStation, you have the power, control, efficiency, and security to reliably deliver the smallest to the largest and most demanding infrastructure projects.

MicroStation enables you to develop and document improved designs in less time by better connecting you to drafting and modeling capabilities, contextual geospatial data, and teams.

INTEGRATED MODELING AND DOCUMENTATION WORKFLOWS

MicroStation provides a common environment for comprehensive project delivery and connects users, projects, and your enterprise. Reduce costly on-site changes with digital workflow processes where everything is interconnected allowing you to see and use everyone else's data within the confines of your own application. Increase productivity, eliminate lag time, and reduce project delays by minimizing survey rework and design delays.

With MicroStation, you now have a personal portal to access learning, communities, and project information. The project portal gives your project teams the ability to review project details and status, and gain visibility into project performance. Your project team may also wish to take advantage of the connection with iTwin services including Project Performance dashboards, Issues Resolution, and Scenario Services.

DEVELOP BETTER DESIGNS, FASTER

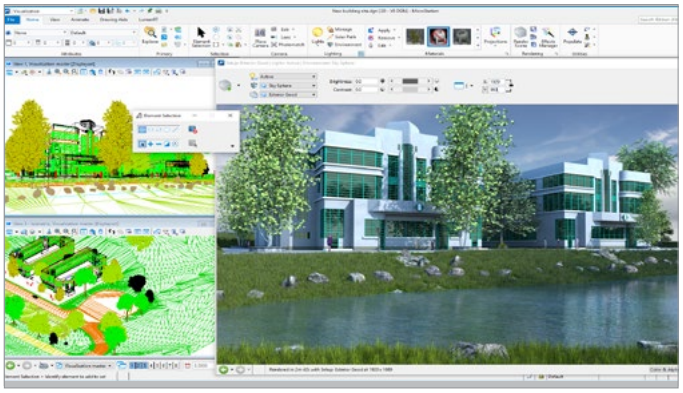
Develop better realized designs with unlimited design freedom made possible by MicroStation's robust modeling capabilities, including the ability to draft in 2D, model in 3D, develop comprehensive model documentation, analyze and visualize models, accelerate workflows, and secure your data.

BETTER INFORMED TEAMS

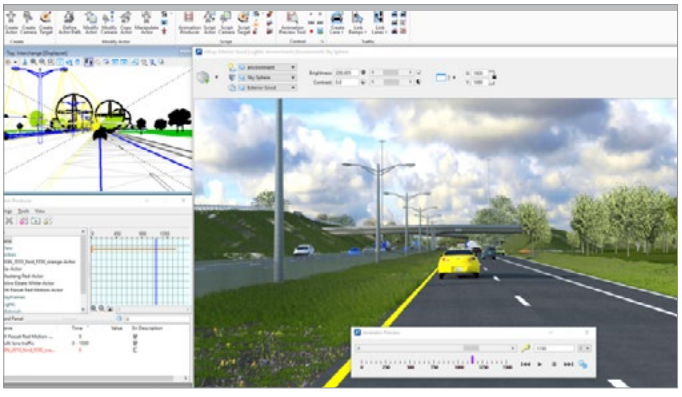
Ensure all stakeholders are better informed with clearer communication of designs with intelligent deliverables production capabilities including the ability to create animations and lifelike renderings, generate intelligent documenwtation, create your digital twin, review designs collaboratively, and maintain and enforce standards.

FREEDOM TO FOCUS ON DESIGN

Enjoy the freedom to focus on design with better integration of information and teams made possible by MicroStation's interoperable and scalable platform, including capabilities to geospatially locate projects, incorporate common design formats and referenced design content, integrate point clouds, raster imagery, and reality meshes, manage design changes, work in a personalized environment, and extend and customize workflows.



Create lifelike visualizations using the built-in VUE rendering engine.



MicroStation allows you to manage any kind of infrastructure projects data aligned with real-world context.

SYSTEM REQUIREMENTS

MINIMUM: Windows 11 or 10 (64 bit)/ Windows 11 or 10 (21H2), Windows Server 2019, Windows Server 2016 (64 bit)
Intel® or AMD® processor 1.0 GHz or greater, 4 GB memory

RECOMMENDED: 16 GB memory

MicroStation At-A-Glance

DEVELOP BETTER DESIGNS, FASTER

- Develop precise drawings using a comprehensive set of drafting tools to efficiently create 2D geometry
- Develop models in real-world context with a wide range of 3D modeling tools
- Build and edit curve, surface, mesh, feature, and solids models.
- Build functional and parametric components with predefined variations
- Develop comprehensive model documentation
- Analyze and visualize models based on their geometry or attributes
- Detect and resolve clashes
- Apply real-time display styles to visualize models based on an object's height, slope, and other embedded properties.
- Speed design tasks and related workflows with intelligent interactive snapping
- Ensure the integrity of your documents using digital signatures and control the rights to view, edit, print, and copy file contents, including a pre-defined access expiration date

BETTER INFORMED TEAMS

- Produce realistic movies and simulations from design, construction, and operational models with VUE rendering engine
- Render in near real-time with photorealistic rendering
- Incorporate libraries of physically correct materials, lighting, and rich photorealistic content (RPC)
- Use point-and-shoot to physically correct materials and llighting libraries
- Update all annotation dynamically
- Manage drawing views across an entire project
- Drag and drop plans, elevations, and sections to create documentation
- Slice and filter 3D models to improve interactive visualization
- Update drawings automatically when 3D models change
- Coordinate 3D models and 2D drawings automatically
- Synchronize existing designs with an iModel to create a digital twin. View latest revisions and changes to the project
- Issue Resolution Service for reviewing, tracking, and resolving
- Create rich, multidiscipline models for design review
- Consume and coordinate electronic design reviews
- Resolve issues across the entire project team with cloud-based issue resolution services
- Manage CAD standards with configurable checking capabilities
- Easily manage all styles for dimensions, text, lines, detail symbols, and display

FREEDOM TO FOCUS ON DESIGN

- Integrate geospatial information from thousands of supported coordinate systems
- Access data from Esri ArcGIS™ REST Feature and Map Services, and OGC Web Map Servers
- Incorporate real-time GPS data
- Incorporate Bing maps
- Create and reference geospatial PDFs
- Read, share, and consume precise data in key formats such as Autodesk RealDWG™ (share and consume), IFC (read), and Esri SHP (read)
- Aggregate and assemble multiple file formats including PDF, U3D, 3DS, Rhino 3DM, IGES, Parasolid, ACIS SAT, CGM, STEP AP203/AP214, STL, OBJ, VRMLWorld, SketchUp SKP, and Collada
- View and work with design information from others in real-time
- Live referencing of 2D/3D DGN, DWG, and large image files
- Natively reference PDF files into designs
- Attach versioned files including design history
- Navigate through file history
- View and manipulate point cloud data in 17 popular formats without translation
- Incorporate raster imagery of all types, including aerial and satellite imagery, as well as scanned documents
- Dozens of supported file formats including CALS, BMP, TIF, GeoTIFF, and JPG
- Integrate engineering-ready phototextured reality meshes created from photos
- Record all design changes for rich revision control
- Compare and plot design file changes
- Group tools and tasks and customize interface
- Employ universal database connection
- Create user-defined macros
- Create customizable cursor menus
- Personalized in-application learning and feature recommendations
- Integrate with enterprise systems using a wide range of available applications to customize the user interface
- Develop solutions using Microsoft (VBA), .NET, C++, C# as well as user-defined macros