



FIELD-TO-FINISH SURVEY-CAD SOLUTION

Power Point

Complete lineup of Engineering and Survey Products



The Goal: Field-To-Finish in Three Easy Steps

- ▣ Acquire data in the field using your Total Station or GPS and FieldGenius on the Nautiz Data collector
- ▣ Transfer your jobs back/forth to the office using OfficeSync via the built in GSM modem on the Nautiz X7
- ▣ Import your project directly into MSCAD on your desktop/laptop to finalize and plot your deliverables



Introduction to FieldGenius

*What sets FieldGenius apart
from the competition?*

Start with 5 of the most Advanced Tools Available

- **Code Free Linework:** Linework is created automatically without entering codes and is instantly displayed, eliminating the need for a separate sketch. No need to connect points back at the office.
- **Advanced display with Live Graphics and intuitive interface:** FieldGenius is laid out with logical icons, customizable toolbars, smart objects and easy to use GPS and total station controls.
- **Productivity tasks:** Customize your data collector by assigning commands to your keypad keys and creating your own custom Automap library.
- **Calculating tools:** Access the built in RPN calculator from any edit field.
- **Plus:** Advanced Roding, Surfacing, Slope Staking, Smart Points, DXF & LandXML import/ export and full Robotic and GPS support. FieldGenius is the choice of organizations that value productivity



FieldGenius Top 10 Features

- ▣ **Total Station and GPS Support**
 - FieldGenius supports all popular conventional and robotic total stations, as well as most RTK GPS receivers
 - Easy to use instrument toolbar ensures that your instrument options and settings are easily accessible

- ▣ **Powerful Roding Design Package**
 - FieldGenius roading module is the most powerful and easy to use roading available
 - Manually input your alignment data including centerline, vertical and template data
 - Powerful alignment staking tools help you stake your points along your alignment with confidence.
 - After you've staked your points, generate cut sheet reports using our cut sheet generator.

Top 10

- ▣ **All the staking tools you will ever need**
 - FieldGenius includes staking commands for points, lines, arcs, alignments and 3D surfaces
 - All observations are recorded in the raw file as well as in the project coordinate database
 - A cut sheet generator helps you determine if the points you staked are where they should be
- ▣ **Free Desktop Version**
 - Included for free with FieldGenius is a desktop version to run on your desktop PC
 - The desktop version is great for learning how to use FieldGenius and it comes with all the same tools and functions that are available on the data collector version
 - Use it to manually input your alignment data prior to heading out to the field, or use it to check projects that the field crew just downloaded
 - Projects are interchangeable between the desktop version and your data collector

Top 10

▣ Painless Data Transfer

- MicroSurvey's ActiveSync support automatically connects with FieldGenius to show you all the projects on your device. Upload and download with a mouse click
- FieldGenius uses RW5 files for raw data. This allows you to transfer your raw files into any modern surveying software
- Coordinate and connectivity files are standard dbase format files that can be opened in Excel for further processing. Our database is open to you

▣ Contouring, Surfacing, and Volume Calculations

- Create accurate contours in your hand
- Single click functionality, modeling could not be easier
- Provide clients with instant results right in the field
- Automatic support for break lines

▣ Superior Data Import

- More data imports than other software. Our RW5 support allows you to take an RAW file out of the data collector and reprocess it into coordinates.
- DXF direct import including lines, arcs, polylines, points, text and 3D faces.
- LandXML direct import. Includes LandXML alignments, parcels, points and surfaces.

Top 10

▣ Custom toolbars

- Custom instrument control toolbars for GPS and total stations on the main interface minimizes the need to dig into menus for common toggles and settings.
- Everything is at your fingertips.

▣ One-Tap measure and store shot functionality

- When in SideShot mode, the large measure button makes taking a shot easy. Just tap the screen with your finger and it takes a shot. No searching for the Enter key or a small button on the screen. Our "shot" button is about the size of your thumb.
- Smart toolbars provide direct command access from data picked from the drawing.

▣ Works on more Windows hardware operating systems

- FieldGenius Works on more Windows CE hardware models than the competition: Juniper Systems Archer and Allegro Field PCs, TDS Nomad/Ranger/Recon, Trimble TSCE/TSC2, Topcon FC-100/FC-1000/FC-2000, Compaq/HP iPAQ Series, Leica RX1250 and the Leica DX10.
- Works on Windows Mobile 5 and 6 devices.
- Choose the hardware device that's right for your durability requirements and fiscal restraints, not your software.

What is OfficeSync?

- ❑ OfficeSync[®] is a wireless system that helps you sync data between your office and your field crews. We provide the hardware, the software and the training so you can become more efficient with your data and file transfers
- ❑ The OfficeSync service is designed to change the way you work with your field survey crews. OfficeSync provides the necessary tools to effectively manage the flow of information between the field and office at a cost justifiable price point
- ❑ A lot of companies have tried using cell phones, air cards, and WiFi hotspots and some of them have been successful, but most have not. We've done the hard work, let us show you how OfficeSync[®] can make your life easier



OfficeSync[®]
by OfficeSync

Using OfficeSync

- ❑ OfficeSync® is comprised of three software applications each having a separate install.
- ❑ • **Field Connect** is installed on your hand-held data collectors, or a simple PDA if you are transferring files from On-Board collection
- ❑ • **Office Manager** is installed on your project manager's or administrator's PC
- ❑ • **Job Monitor** is installed on any PC where engineers, technicians or draftspersons may need to send and receive job data to and from the field crews.
- ❑ Once installed, each of these applications communicates via the Internet to the **OfficeSync Gateway**. The gateway is a central data repository located on a secure server administered by MicroSurvey Software. The gateway serves as stopover for data as it is uploaded and downloaded between the office and field crews.



The Nautiz X7

- ▣ The Nautiz X7 is the most advanced collector on the market today
- ▣ Use it to:
 - Take Pictures
 - Record Audio and Video
 - Act as a cellular phone
 - Surf the internet (Wifi or GSM Modem) and use our OfficeSync transfer program to send/receive jobs directly in the field
 - Connect to all your equipment via cable or Bluetooth
 - Has a built in compass and altimeter





- ▣ *What sets MicroSurveyCAD apart from the competition?*

Quick Facts

- Surveyors All over the world use MicroSurvey CAD to complete their infrastructure and design projects. MicroSurvey has been building software for the surveying industry for over 20 years and with all this experience, we are able to offer the *best* surveying CAD software package available today.
- *MicroSurvey*
- We have been developing desktop software on the IntelliCAD engine for over 5 years.
- MicroSurvey CAD opens and saves AutoCAD drawing files (V2.5 through 2009) and uses DWG as its native format.
- IntelliCAD's command set, toolbar and menu structure is very similar to AutoCAD so you can install MicroSurvey CAD into existing AutoCAD environments with ease!

We value and listen to our customers and we support what we build.

- MicroSurvey's technical support has been ranked number one by industry professionals and our customer service is world class.
- MicroSurvey CAD includes over 16 hours of extensive training movies, which equates to reading thousands of pages of manuals.
- Learning while you work has never been this easy.
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MicroSurveyCAD Top 10 Features

▣ Integrated Survey, Design and CAD

- Download, Calculate, Design, Draft, Check and Print - all incorporated into a productive field-to-finish package Familiar command line interface.
- Anyone trained in AutoCAD will be instantly productive with MicroSurvey CAD
- All concepts are easy to understand - OSNAPs, coordinates, editing commands - trim, move, copy, scale, fillet, rotate all work with the same basic prompt
- AutoCAD Compatible: MicroSurvey CAD is compatible with AutoCAD R2.5-2009 DWG files. DWG is the native format for all MicroSurvey CAD drawing files. No conversions are ever necessary!
- Same basic prompts as AutoCAD
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▣ Powerful Survey Calculations

- COGO - MicroSurvey has the simplest, most productive COGO entry inside a CAD system. Record all of your COGO entries automatically with our Batch system. Edit the Batch with a spreadsheet style editor and reprocess!
- Data Collector Communication: MicroSurvey CAD is designed to work with data from all major total stations & data collectors
- Helmerts Transformation
- Multi-point averaging, cluster analysis, right of ways, areas, fixed areas, mass intersections, multiple perpendicular ties, stake computations, the list is endless
- Coordinate Transformations - Easily transform data from one system to another. (UTM, State Plane, MTM ...)

Top 10

- ▣ **Complete Traverse or Network Adjustments**
 - Angle balance.
 - Transit, Compass, Crandall`s classical methods.
 - Vertical balance.
 - Full 3D Least Squares Adjustment
 - Blunder detection
 - Instrument storage
 - Graphical ellipse display
 - Reprocessing and pre- analysis
- ▣ **Active Drawing Technology**
 - MicroSurvey`s Active Drawing Technology is a new and efficient way to work with your survey data. Enables verification, editing, printing and manipulation of data in the drawing, in the coordinate and traverse databases, and during COGO calculations.
 - Active coordinate editor
 - Active traverse editor
 - Active Batch COGO
- ▣ **Smart information**
 - Angle Balance
 - Smart Objects: lines, points, curves and text
 - Pick and edit objects automatically without initiating a command.
 - Browse the entire coordinate database by simply picking any point in your drawing.

Top 10

▣ **Powerful DTM Contouring/Modeling Volumes**

- 3D Rendering.
- Virtually unlimited point capability.
- Simple to use: Create a DTM and contour in 4 simple steps.

▣ **Complete Site Design**

- Complete site design.
- Road Design: Vertical and Horizontal Alignments.
- Cross Sectional Templates.
- Create cross sections of existing ground and design surfaces.

▣ **Learning Resources**

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- Over 16 hours of training movies.
- Complete CAD documentation with movie links.
- Context-sensitive Html Help Menu System -Extremely easy to use.

▣

Top 10

- ▣ **Customizable Interface and Commands**
 - Tool bars- Can be arranged with “drag and drop “ functionality.
 - Menus- can be organized with our graphical menu editor.
 - Screen- Items can be turned off for more graphical area.
 - Completely customizable user interface.
 - Layout-Of command window- Top or bottom

- ▣ **Quality Tools for Excellent Value.**
 - Fully featured software program at a lower price.
 - USB keys for license flexibility for home or office use.
 - Network licenses also available

Added Bonus & Flexibility

- ❑ All MSCAD2010 Premium licenses also come with a free copy of InCAD2010
- ❑ InCAD2010 is designed to run on top of any existing AutoCAD2009/2010, AutoCAD Map, Civil or Civil 3D
- ❑ This allows the user to have some flexibility and be able to port all of the MicroSurvey tools and functionality directly into an AutoCAD environment
- ❑ All copies of MSCAD are upgradeable to our PointCloudCAD . PointCloudCAD is used when you need to create/import line/surfaces/Tins/Contours directly into CAD. This is most useful when processing 3D laser scanner data. PointCloudCAD can also be used to animate your 3D scenes and scans for dramatic presentations to clients.

