

Takeoff



Software That Works For You!

"With Carlson Takeoff, we are able to raise our production levels and cut our grade foreman time in half. We've also saved on materials as we're much better at controlling quantities."

Andy LePage, Owner/Foreman, SUR Construction, Rochester, N.H.

Carlson Takeoff is a cut/fill volumes and data prep (for layout or machine control) program that can estimate jobs using paper plan digitizing, PDFs, or electronic CAD files.

- Calculate site cut & fill and topsoil
- Differentiate strata volumes & dirt vs. rock
- Accurately determine subgrade quantities
- Estimate trench and pipe quantities
- Estimate roadways from cross-sections
- Prepare the design info for exact staking
- Create a 3D model for machine control



BREAK NEW GROUND

Save time, save money

Get the most complete and powerful site estimating and data prep software on the market with Carlson Takeoff

In addition to Digitizing paper plans, Carlson Takeoff offers critical Drawing Cleanup features and advanced 2D to 3D routines that streamline the estimating process from digital plans. It can input all data files, including .dwg, .dxf, DGN, PDF, TIFF, Lan-

dXML, and all formats of Centerline, Profiles, and Section Data.

Takeoff calculates cut/fill material volumes and has 3D simulation as well as comprehensive reporting. In addition, roadwork, trenching, drill-holes, and sub-grades capabilities are all included for one affordable price.

BETTER Reporting –

New Direct PDF output for:

- Cut/Fill Volume Reports
- 3D Surface Models
- Surface Profiles
- Site Plan Views
- Cross-Sections

MORE Power –

- User-Defined Area Breakdowns for both Material Quantities and Cut/Fill Volumes
- Cut/Fill Volumes by specified Depth Ranges
- Special Fills Areas

MORE Compatibility –

Unbelievably fast Cross-Section conversion

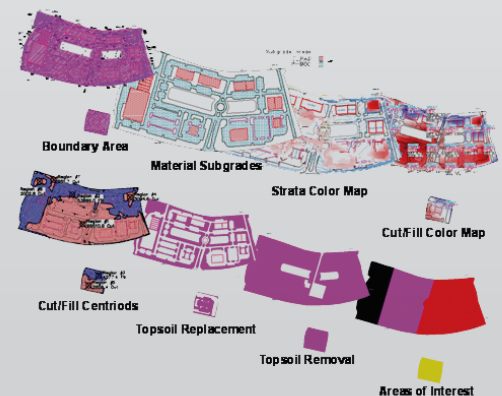
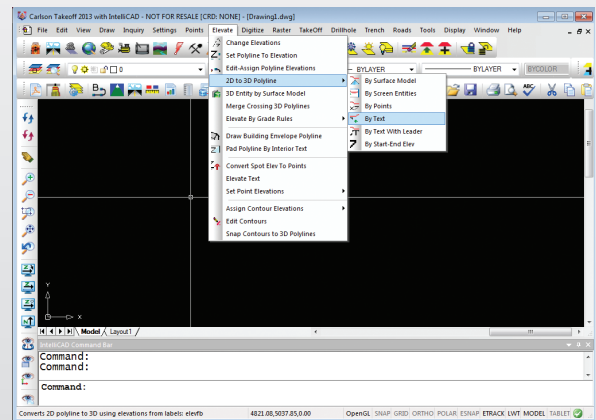
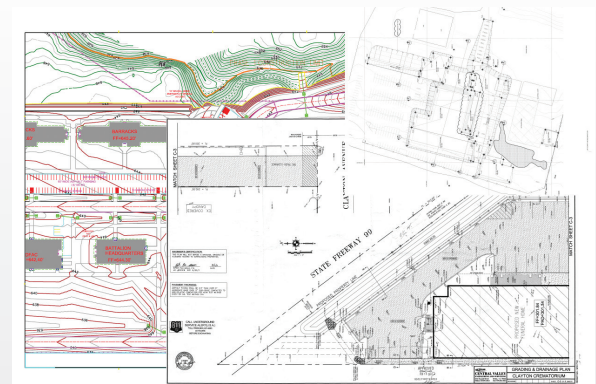
- PDF and TIF File Import
- DGN File Import

Use Takeoff for Accurate Estimates

- Calculate site cut & fill and topsoil
- Differentiate strata volumes – rock vs. dirt
- Accurately determine asphalt quantity needed in a variety of measurement units
- Get precise curb work calculations
- Estimate trenching quantities
- Estimate roadways from cross-sections

Use Takeoff Once You Get the Bid

- Analyze existing TOPO before you start
- Prepare the design info for exact staking
- Create a 3D model for machine control
- Evaluate for quantity and quality control
- Report volumes as you build



Construction



For Estimating & 3D Modeling

Take your projects into the field with Carlson Construction — integrated survey and 3D surface modeling software for site & road construction

Carlson Construction is an integrated cut/fill takeoff and 3D surface modeling software solution designed for site and road construction from CAD files. It offers powerful section and 3D viewing tools for elevating 2D designs to 3D model files.

Core Abilities:

- Cut/Fill Estimating
- Output 3D Machine Control Files (Carlson Grade, Trimble, CAT-Accugrade, Leica, and Topcon)
- Output Construction Staking files for site, roadway, and building columns and offsets
- As-Built Mapping

Carlson Construction's Material Quantities Reports give estimators the volume, area, length and/or count for items such as asphalt, gravel, curb, or any "subgrade" or "select fill" that's defined. For construction data prep, Carlson Construction creates surfaces from points and contours and can easily move lines from the "wrong" elevation and slope to the correct elevation and slope.



Carlson Construction makes the files you need for the field.

BREAK NEW GROUND

Be "project ready" and meet the demand for data prep/3D model building with Carlson Construction – the software solution that works with CAD or PDF files for:

- Construction staking
- Machine Control Data Prep
- Cut/Fill Volumes
- As-Built Mapping

Carlson Construction can do it

Need to import and/or upload data from a field survey?

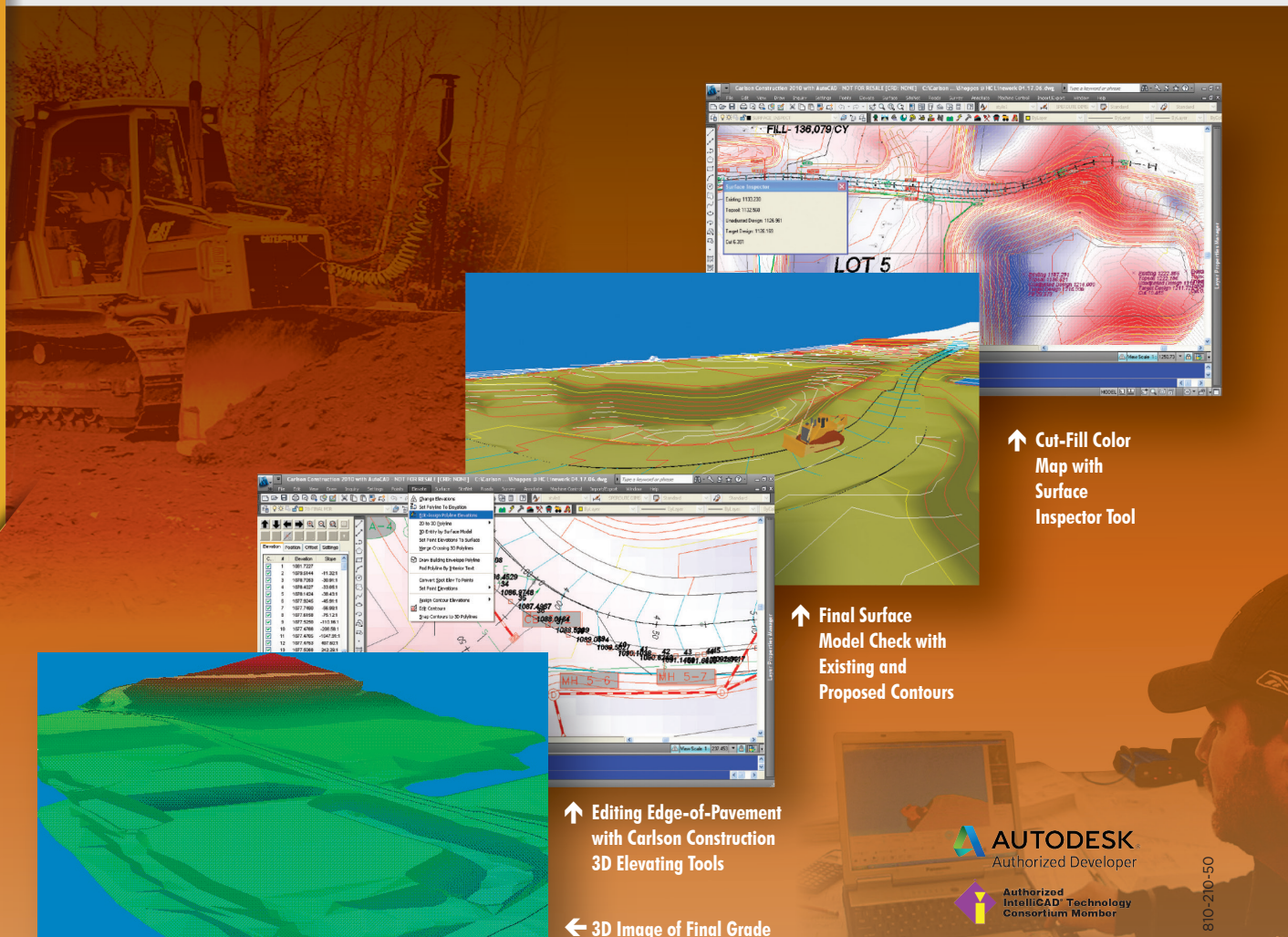
Looking to create a surface from data within a CAD drawing?

Have to move «break-lines» or «grade-lines»?

Carlson Construction can create surfaces from points and contours and can easily move lines from the «wrong» elevation and slope to the correct elevation and slope. Also, take edge-of-pavements, contours and annotation from 2D to 3D, or to re-engineer projects when necessary.

Benefits of Carlson Construction

- Works with industry standard AutoCAD®, IntelliCAD® .dwg files
- Imports PDF and Microstation-DGN files
- Drawing Cleanup — Takes your AutoCAD and Microstation files and fixes common "bad CAD" errors
- Powerful tools to edit the design
- 3D viewing tools and graphics so that you may validate your surface models
- Powerful road design functionality to handle centerlines, profiles, sections, templates and transitions
- Full support for all major 3D Machine Control formats for today's heavy equipment
- Import/Export «Native» Machine Control Files — Carlson Grade (.tin, .cl, .grd, .fit, .dwg, dxf, .pin, .ntr, .cgc, .crd, .loc); Topcon (.tn3, .ln3, .rd3); Trimble (.ttm); Leica
- Ability to import your drawing into Google Earth



↑ Cut-Fill Color Map with Surface Inspector Tool

↑ Final Surface Model Check with Existing and Proposed Contours

↑ Editing Edge-of-Pavement with Carlson Construction 3D Elevating Tools

← 3D Image of Final Grade

 **AUTODESK**
Authorized Developer
 Authorized IntelliCAD® Technology Consortium Member