Planning and Analysis in Timber Harvesting

Software Tool Helps Companies Expand, Contract, and Plan for the Future

The Challenge

Small timber harvesting companies expand and contract with changing market conditions. This means they must constantly evaluate their labor and equipment needs as markets change. Often, this evaluation takes place when family timber harvesting businesses are passed from one generation to the next. Emerging markets for woody biomass also provide new opportunities and challenges for small timber harvesting companies, but also require substantial investments. Small companies need a tool that can help them determine the ideal mix of labor and equipment needed to have a successful timber harvesting business.
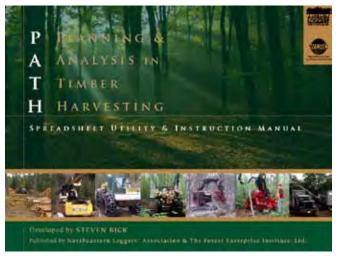
The Solution

The Northeastern Area State and Private Forestry's Wood Education and Resource Center awarded a grant to Northeast Forests, LLC, to develop Planning & Analysis in Timber Harvesting (PATH). PATH is a spreadsheet-based software program that can model logging business costs and analyze expansion and contraction of both labor and equipment. This software and its training materials can help small timber harvesting companies make informed decisions about the investments they need to make in labor and equipment to stay competitive in a global market.

PATH has 12 different worksheets. The General Input spreadsheet provides a quick way to analyze existing business operations and explore a few "what if?" scenarios. The Individual Jobs spreadsheet estimates the costs associated with individual harvesting jobs. Businesses can make price and production calculations and comparisons using the Price Analysis spreadsheet. The Equipment spreadsheet helps users determine the hourly costs of owning and operating each piece of equipment as well as the costs of a collection of equipment as a whole.

> *"The time is finally ripe for the logging community to accept computerized aids such as PATH."*
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> *—Mona Lincoln, Northeastern Loggers' Association Training and Safety Coordinator*

The PATH Spreadsheet Utility and Instruction Manual guides businesses in using this software tool.

Resulting Benefits

- The PATH software program will help small timber harvesting companies become more efficient and ultimately more profitable.

Sharing Success

- Hosted and presented PATH materials at 10 workshops.
- Targeted e-mails, promoted PATH in Smallwood News, and distributed hundreds of CDs. These efforts resulted in over 5,400 downloads of the test version of PATH from http://www.northeastforests.com/.
- Shared PATH during a featured presentation at the 2011 "Striving, Thriving or Just Surviving?" Forest Products Industry Symposium.
- Innovative Forest Operations Research, a new regionwide team headquartered at the University of Maine, has adopted PATH as one of its tools for improving logging processes.
- Download the PATH software and manual at http://spfnic.fs.fed.us/werc/finalrpts/09-DG-082_2.pdf.

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