Tree Care Industry

August 1993

Volume 4

Number 8

Profits from Firewood

Cleveland Beckons

Recycling Wood Waste
(2) 1991 GMC Top Kick; CAT Diesel; 6 Spd. With RO 2863 Cranes; 14 Ton With Jib; 96' Hook Height; (1) w/8,000 Miles; & (1) w/13,000 Miles $61,000 Ea.

1989 Mack DM690S; 300 H.P.; 6 Spd.; w/R.O. 175-73 Crane; 16 Ton Cap.; 85'-37' Jib = 122' Hook Height $98,500

(3) 1987 GMC 7000; V8; 5x2; w/Lift All 51' Bucket $29,500 Ea.

1985 Ford F600; 8.2 Diesel; Auto.; 28,000 Miles; 22 G.V.W. $9,500

(2) 1996 Int'l S1600; 6.9 Diesel; Auto.; 23 G.V.W.; 15,500 Miles $9,500 Ea.

(5) 1990 Ford F400; V8; 4 Spd.; w/Versalift 28' Bucket; 9' Utility Body; Onan 2 Cyl. Generator $7,900 Ea.

(4) 1986-87 GMC; Diesel w/Altec or Terex Digger Derricks; 7 Ton Cap $23,000 to $29,000

22 TON KNUCKLEBOOM

1992 Ford; V8; 6 Spd.; w/Tesco Saturn 50' Bucket & Chip Box $27,900

(15) HIAB IMTGO; National, Etc. Knucklebooms Unmounted Or Mounted $4,500 And Up

1988 Mack DM688S; 350 H.P.; 8LL Trans.; 20 Frt.; 44 Rears; Air Tag; 22 Bed; w/Cormach 22 Ton at 7' Knuckleboom Crane; 5,500# At 42' $64,500

(3) 1980 Ford or Chrs.; V8; 4 Spd.; w/Onan Generator; Heated Air; Comp. & Utility Bodies $5,900 Ea.

(1) Royer Woodmen Brush Cleaning Attachments; Diesel Powered $8,500 Ea.

(20) 1979 To 1986 One Ton Bucket Vans; Utilities; Versalift; Telsta's, Etc. $4,500 & Up

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COVER PHOTO:
Asplundh Tree Expert Company crews must dispose of up to 5000 tons of wood waste every day. Find out how they meet this challenge on Page 4. Photo courtesy of Kristin Wild.
OUTLOOK

What is the outlook? It’s excellent!

Tree service companies from North to South and East to West report stronger sales and better profits than they have experienced in the last several years. The equipment manufacturers are also seeing an upturn. I’ve asked company owners what they attribute these improvements to and I get all kinds of answers. Some credit the new administration in Washington for the upswing in the economy. Others say it has happened in spite of what is taking place in our nation’s capital.

Politics notwithstanding, the bottom line is clear. Consumers have confidence. There is disposable income in the marketplace and the value of the landscape is increasingly and more widely appreciated. This industry has to take whatever steps are necessary to keep that focus.

As we approach the 21st century, the demographics of the marketplace are changing. You have to stay right in step. A larger segment of the market is older and retired, with considerable time to devote to worthwhile causes. Many of these folks are interested in the preservation of the environment and understand the value of the landscape.

The younger generation is also interested in environmental issues, but many have little appreciation of the landscape in their heritage. They were born in environments or with ethnic backgrounds in which the landscape is not a part of everyday life. Such is the case in the inner city. The same can also be said of certain cultures of Southeast Asia as well as other places where recent immigrants have come from.

The middle generation represents a large portion of the decision makers. It controls much of the disposable income. People in this age group are environmentally oriented. Their disposable income is more closely guarded. They bear the majority of the tax burden. They are faced with the staggering cost of educating their children. They are also highly mobile. Their current job won’t be their last job, and their current home won’t be their final residence.

We need to appeal to the older group to maintain our position in their marketplace. We continually need to educate the middle group about the value of the landscape in their real estate investment. We need to cultivate the younger group to insure a marketplace in the future.

This needs to be a collective effort. You have a role. Your state organizations have a role. The National Arborist Association is planning a major effort in public education, as is the International Society of Arboriculture. Get on the team and let’s make this goal a reality.

Tree Care Industry is already on the team. In case you haven’t noticed, the magazine has been printed since June on recycled paper using soy ink. We are very proud of that change!

Robert Felix, Publisher
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Out Of The Landfill

One Company’s Waste Wood Recycling Efforts

Leaves, branches, grass clippings and wood - an estimated 30 million tons per year - now take up between 15 and 25% of landfill space. Some people call this “wood waste.” That’s an accurate name in more ways than one.

While the Asplundh Tree Expert Company has always recycled most of the wood chips from its line clearance operation, the company in recent years has established innovative recycling programs to further reduce the amount of waste brought to landfills.

Asplundh is a large company, with operations as diverse as the territories it covers. Because of customers’ varying needs, operational control is largely centered in approximately 50 divisions, employing over 14,000 people across the United States, Canada, New Zealand, Australia, Ireland, England and France. The problem of wood disposal varies enormously from one area to the next.

Defining the problem

Wood waste from the tree care industry is estimated at 80 million tons per year and the entire line clearance industry’s wood chip production is estimated to be around 13 million tons per year. These figures were reached at an Urban Tree Residue Meeting, hosted last November by the U.S. Department of Agriculture (USDA) Forest Service’s Forest Products Laboratory in Madison, Wisconsin. Coordinated by the International Society of Arboriculture’s (ISA) Research Trust, the meeting was attended by practitioners and scientists from utility companies, utility contractors (including Asplundh Manager Tom Gunning), private tree companies, municipalities and consulting firms.

What has the tree care industry as a whole been doing with this wood waste? In a 1991 study of its member companies, the National Arborist Association found that 13% of the wood residue was taken to a landfill, 17% was recycled, 27% was left at the worksite and 43% was sold or given away. Each of these percentages represents an average, so there could be a good deal of variation among the study participants.

While the percentage of wood waste taken to landfills is low, it represents millions of tons of material at a time when many parts of the country are experiencing a serious shortage of landfill space. As a result, dumping or tipping fees have soared, so coming up with “how” to recycle wood chips has become more of an issue in recent years.

Meanwhile, most states have enacted legislation restricting disposal of green waste (leaves, grass clippings, wood) in landfills, and many have banned such material. On the other hand, new legislation encourages recycling, especially the “green waste” because it is relatively easy and safe to recycle with current technology. The big question is: “How can we do it cost-effectively?”

As for Asplundh, a study conducted in 1991 by Asplundh Technical Services showed that the company produces more than 5000 tons of wood debris per day. With the approval of its customers, Asplundh has given away wood chips and logs to property owners whenever possible. Most of the time, this system seems to work out well. In densely populated areas, however, supply often exceeds...
demand and the cost of transporting loads of material to distant users is prohibitive.

So today, in conjunction with utility or municipal customers, Asplundh's wood chips are often composted to make a humus-like soil amendment or they are ground up, sometimes with logs, to create landscaping mulch or fuel for power plants.

**Composting**

Composting is a natural process that breaks down organic material into humus, a valuable soil amendment. While all organic material eventually breaks down in this way, the process can be accelerated in a controlled environment to the point where it is commercially viable. Composting facilities are being built to process materials as varied as chicken carcasses, wood chips and sewage sludge. Thus, composting accomplishes two goals: reducing the volume of waste and producing a resource.

Composting techniques vary, as does the quality of the end product. Processing equipment is expensive to purchase and maintain, so competing with landfills can be difficult. Composting is becoming a workable alternative, however, as landfills become less available to green waste producers.

As more composting facilities are opened, demand for clean, carbon-rich, odor absorbing wood chips is certain to increase, further reducing the need for landfills.

For almost three years, Memphis Light, Gas & Water (MLG&W) in Tennessee has operated its own composting plant. Twenty-seven Asplundh crews and 30 other contracted tree trimming crews dump all their chips and logs there.

"We separate the chips to make mulch and sell the logs for firewood," says Jasper Salmon of the MLG&W Forestry Department. "Then we run the chips through a hammermill and pile them into windrows or static piles. To help the composting process, we mix in some ammonia nitrate and in the warmer months, we water the piles, too."

Within six to eight months, the composting process is finished and the former chips are sold wholesale as a high-quality soil conditioner or mulch to local nurseries or landscaping companies. Employees of MLG&W and the City of Memphis are allowed to buy the composted mulch for their own yards.

MLG&W's relatively low-tech approach keeps costs down, allowing the plant to break even and actually save money in tipping fees. The long-run advantage is the reduction of green waste in the city's dump.

For more than a year Asplundh also has been contributing chips to a composting process in Maryland. The coarse wood chips that Asplundh chippers produce are an ideal amendment in composting sludge from a waste water treatment plant in Aberdeen.

Asplundh's chips are excellent for the plant's 21-day composting process, according to Ken Benner, plant superintendent. The chips provide porosity to the static piles, allowing air to circulate so the decomposing wood and sludge don't produce an objectionable odor. The chips are also an excellent carbon source for the nitrogen-rich sludge. After curing, the finished compost is screened and sold as a soil amendment. The coarse wood chips that have not fully broken down can be used again in the process.

As another alternative to landfill dumping, several Asplundh crews in Ohio dump their wood chips at two landscaping companies whenever they can't give them away to homeowners. The landscapers grind the chips, add manure and let the pile compost. The resulting rich soil amendment is sold wholesale to other landscapers.

According to general foreman Mike Shelton, the landscaping companies are conveniently located for his nine crews who work on the property of Dayton Power & Light Company. At the same time, they save a considerable amount of money by avoiding the dumping fees charged at the landfill.

**Paper companies and fuel**

In Georgia where paper and pulp mills abound, Asplundh crews who work on the property of Savannah Electric deposit their loads of wood chips into a large container at Coastal Fiber, a pilot company started by Savannah Electric. There the chips are re-ground and the resulting material is sold to local paper manufacturers who use it as a fuel for their boilers.

This operation saves thousands of dollars in dumping fees, guarantees a disposal site for Savannah Electric and reduces the waste going into Georgia landfills. In the near future, the utility will begin processing the wood fiber into a fuel that will be used with coal in its own power plants' boilers.
In the western panhandle of Florida, a Gulf Power Company wood chip recycling program that has been in effect for two years has given rise to an interesting incentive program for Asplundh crews.

Gulf Power sells the chips to Stone Container, which uses the chips as a fuel source for its plant. The revenues from the sale of the chips go towards rewarding highly productive Asplundh line clearance crews.

Currently, according to Gulf Power's Earl Mirus, the wood chips must be free of any rocks, glass, dirt or metal in order to be accepted by Stone Container. For the transportation of chips to be cost-effective, the crew must be working within 15 miles of the plant. In the future, the plant may accept round wood up to 12 inches in diameter, but right now only chips are accepted.

Asplundh also participates in Detroit Edison's wood chip management program. In order to reduce non-productive time spent disposing of waste, Detroit Edison set up several collection sites on its property. The sites are designed to be easily moved as operations shift, and to serve as secure parking facilities for its line clearance contractors. When the line clearance crews come in with full loads at the end of the day, they park the trucks and go home. After hours, a special employee dumps the chips in collection areas and re-fuels the trucks. When the crews come in the next morning, their vehicles are ready for work.

Edison contracts with several local haulers who remove the chips periodically from the collection sites. The haulers find their own outlets for the material, usually as landscape material or fuel.

Edison has determined that the relatively small cost of running the program is more than offset by the increased productivitiy of the crews, who effectively spend no time disposing of chips.

Another fuel operation that is assisted by Asplundh is located in southern California on the property of Imperial Irrigation District. General foreman Bob Jeffrey sends his crews to two privately owned power plants that the utility has lined up to buy all types of wood waste, including logs. The only waste the power plants can't use are palm fronds and wood. These are apparently too stringy and produce a residue in the boilers. Imperial Irrigation buys back power generated by the plants for its own transmission and distribution system.

The program has been in effect for about a year. California's landfills will be closed to "green waste" within the next few years.

Recycling in the future

Today's wood recycling programs are just the beginning. It will be interesting to see how utilities, municipalities and service contractors like Asplundh take advantage of the opportunities to develop new business with new technologies to cope with the waste disposal problem in the future.

At least two other important disposal alternatives should be mentioned here, although Asplundh does not currently recycle wood chips in these ways.

The first involves using wood and other agricultural products to produce ethanol, a fuel that can be used in cars and trucks. Right now the costs are still too high to compete with gasoline. But with a possible increase in energy taxes and better refining methods, the future is promising.

Another potential disposal alternative is using wood residue, paper, agricultural products and plastics to produce a variety of composite materials for construction.

The U.S. Department of Agriculture (USDA) Forest Service's Forest Products Laboratory in Madison, Wisconsin, has been researching these and other fascinating wood disposal alternatives.

Economics

Recycling every last ton of wood waste would be the ideal, but is currently not economically feasible throughout the country. In most areas, the cost of transporting tree trimming residue and processing it into landscape mulch, composted soil or fiber fuel can be more expensive than paying the tipping fee at the local landfill.

Like it or not, recycling wood chips and logs will not be done on a widespread basis until it becomes cheaper than landfilling, or landfilling becomes illegal. If business can significantly reduce tipping expenses and make a profit on tree trimming by-products, recycling will no doubt be the chosen option.

Articles in this and other publications have spotlighted entrepreneurs who have recognized the business opportunity presented by recycling this natural resource. The most successful have researched their markets, secured a steady supply of wood and end-users, and then invested in specialized equipment to provide a cost-effective service, as well as product.

It's important to note that local regulations and markets vary significantly. What works in one town, county or state may not be permissible or would be too expensive to coordinate in another. Not enough is really known about the regional markets for compost, landscape mulch or
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fiber fuels - or whether continued landfilling of some urban tree residue might be the most cost-effective solution even though it's not the most environmentally sound.

Research to the rescue!

Hundreds of organizations and individuals have been studying the green waste recycling issue for years. There are still plenty of questions to be answered, but there also is a tremendous amount of information that needs to be organized and digested into a more useful form for tree care businesses and utilities trying to make decisions about wood waste disposal.

That need is currently being addressed in a coordinated effort by the Allegheny Power System, the ISA Research Trust, the National Arborist Foundation and the USDA Forest Service. These organizations have committed themselves to funding a research project they call the Urban Tree Residue Project. The cooperating agencies recently announced a request for proposals for phase one of the project. The research will determine the volume of tree residue generated in the U.S., where the residue is taken, what happens to it, and what the costs or value of the residue is to the generator. The information should be available next year.

“As a company directly involved in this issue, Asplundh will be carefully watching what happens with this research,” says Geoff Kempter, director of Technical Services. “We’re eager to see what a joint effort of this sort can do for our industry and we will support it in any way that we can.

“In the meantime, I am continuing to search for alternative disposal methods...Changing chipper blades more frequently, even employing different chipper designs, as well as changing employee work habits are all areas where we may be able to create a more marketable product. I have been contacting compost facility operators, co-generation facilities, and other entities with a need for this resource, to ascertain what exactly they need, and whether it is economically feasible for us to supply. We intend to help our customers with the wood chip disposal problem by finding more uses for this clean, organic material.”

For more information on the recycling of tree trimming residue, you may want to contact one or more of these resources:

- Solid Waste Composting Council
  601 Pennsylvania Ave., Suite 900
  Washington, DC 20004

- USDA Forest Service
  Forest Products Laboratory
  One Gifford Pinchot Drive
  Madison, WI 53719

- Solid Waste Association of North America (SWANA)
  P.O. Box 7219
  Silver Spring, MD 20910-7219

Editor’s note: Much of this article was excerpted from a two-part story, authored by Kristin Wild, writer/editor at Asplundh, that appeared in Asplundh’s Trees newsletter.

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Troubled Employees
You May Want To Help, But Watch Out For Costly Mistakes

By Phillip M. Perry

So you want to help that employee who is addicted to drugs or alcohol. Beware! Make a wrong move and your well-intentioned effort will backfire, and you'll be hit with a costly lawsuit.

When information about an employee's drug or alcohol problem is unintentionally publicized, the worker can sue your company for defamation of character. That goes double if the employee is wrongly accused of being an addict.

And what happens if you give advice that turns out to be wrong? A court case for negligence, that's what.

Lawsuits like these are on the increase, says Peter A. Susser, an employment law specialist with the Washington, D.C. law firm of Keller and Heckman. "This is partly because employers are taking a greater role in accommodating the personal needs of workers in the counseling area."

No mystery why. Employers realize there are more troubled workers than ever before.

A troubled employee's productivity can be cut in half. His inattention can lead to accidents and workers compensation claims. His behavior can reduce morale in subordinates. The company image can suffer when he behaves improperly in public. In the worst case, the addict or alcoholic can turn violent, causing injury or death which sparks a lawsuit for negligent supervision.

You have a vested interest in helping a valued employee overcome an addiction that is impairing performance. After all, you've invested lots of time and effort in the person. Still, you don't want to land in court.

So what are the most common mistakes employers are making when they counsel troubled employees? Here's the answer from attorneys and consultants who offer advice on how to avoid committing the same errors:

1. Trying to wear a counselor's hat. Don't try to play the role of a social worker or psychologist with your troubled employee. You do not have the professional training required to do so, and mistakes can lead to a lawsuit for negligence.

If an employee indicates that he has a problem, the best course is to recommend professional counseling. "I suggest that the supervisor provide phone numbers of counselors the employee can call," says Don Schackne, president of Personnel Management and Administration, Delaware, Ohio. The supervisor might also volunteer to call and make an appointment for the employee. "If you are a first or second line supervisor, this is as far as I suggest you go because you can get over your head very quickly."

2. Suggesting that the employee has a drug or alcohol problem without adequate inquiry. It's important to avoid jumping to broad assumptions as to what might be causing a problem. Says Carl E. Johnson, president of Princeton Employee Relations Consultants, Princeton, New Jersey: "The supervisor is, for the most part, not capable of discerning whether or not a person is a substance abuser. It's too easy to be mistaken. Sometimes prescribed medication may cause a person to act differently than they normally do. A person who falls asleep on the job may be helping down another job."

A little knowledge can be dangerous. "Some supervisors might be tempted to become amateur psychologists because they have had one or two hours worth of substance abuse training," says attorney Susser.

Unfortunately, supervisors often go to the opposite extreme. "Most supervisors will tend to ignore a change in an employee's behavior," says Schackne. Then, when a tragedy occurs they suddenly remember they did see a change in behavior six months ago. This is another way of saying that they just didn't want to recognize it."

Don't let fear of becoming involved keep you from dealing with a problem that can get worse with time.

3. Failing to keep the inquiry job-related. After erratic behavior is first observed, the supervisor needs to lay the groundwork for interviewing the employee on an informal basis. That means taking detailed notes that describe the problem exclusively from the standpoint of job performance.

Compare your notes on the employee's performance with previous performance records and company standards. Comparisons may involve productivity, absenteeism, missed deadlines, poor workmanship, accidents, or anything else that focuses on critical skills necessary for success in the job.

Once the documentation is collected, schedule a private meeting with the employee.

Many employees do want to talk about their problem, and when they finally ad-
mit that there is something bothering them, this is the time to refer them to the right professional.

4. Being unaware of community resources. You can get help from any number of community service programs which specialize in drug addiction, alcoholism or family and marital problems.

You should have some numbers handy so that you can refer the employee to the correct organization. The best way to find these is to call your local branch of the United Way. Tip: It's easier to find the United Way number by looking in the white pages of your phone book. Headings differ by community in the yellow pages.

Since you have emphasized work-related performance in your discussions with your employee, you are entitled to insist that he seek professional assistance.

5. Not knowing state law on firing and drug testing. Are you allowed to fire an employee because he is an alcoholic? Or because he tests positive for drugs? And can you conduct random drug tests in your workplace?

State laws vary. You should discuss with your attorney what you are allowed to do so that you don’t end up in court for “wrongful discharge” or for conducting illegal drug tests.

Some states offer protections for alcoholics and drug abusers who are engaged in legitimate recovery efforts. “That’s where things get difficult,” says Susser.

A handful of states have prohibited the use of random drug tests. Find out if your state is one of them.

6. Failing to keep information confidential. Whatever information you gather about an employee must be kept confidential or you are subject to a lawsuit for invasion of privacy or defamation. Remember that a supervisor must only know what is relevant to the job duties of an employee.

Most lawsuits have arisen over this issue of privacy, so it is imperative that you adopt company policies that reflect a sensitivity for maintaining the integrity of information.

Phillip M. Perry is a syndicated columnist based in New York City.
New Look For Data Sheets

By Brian Barnard

There is good news for pesticide applicators and others who handle hazardous materials. Safety data sheets (MSDS) will soon change to a uniform, 16-section format. The American National Standards Institute (ANSI) approved Z400.1 in June to improve MSDS sheets. As a result, chemical manufacturers will have uniform guidelines for publishing MSDS’s and users of MSDS’s will be able to look up information on a chemical more easily.

The American National Standards Institute is a private standards coordinating center with no regulatory or enforcement authority. The New York-based Standards Institute coordinates and publishes consensus guidelines for a wide variety of industries. A 60-person work group from the Chemical Manufacturers Association comprise the committee responsible for drafting the standard. The development of Z400.1 took four years.

Manufacturers are required to provide MSDS sheets to users. The Occupational Safety and Health Administration’s Hazard Communication Standard requires employers to maintain MSDS sheets for every hazardous chemical in the workplace. They inform employees of a substance’s contents and possible adverse effects on human health and other hazards. Previously, lack of uniform standards created the potential for misunderstandings in critical situations.

Changing to the new MSDS format will not be immediate for some products, as the ANSI standard is not mandatory. Some manufacturers may decide to wait until there is a need to change the content of a product’s MSDS information before going with the new format.
Wood To Gold

Firewood Can Be A Lucrative Profit Center

By Shaw James Hazen

"Ash wood wet, ash wood dry,
A king will warm his slippers by.
Elmwood burns like church yard mold,
Even the flames are cold, so cold."

While poetic, this depiction of these two woods is inaccurate. While ash is a good burning wood, it is not a good idea to burn any wood green. Green wood (greater than 20 to 25% moisture content) burns only half as hot and adds considerable creosote to the firebox and flue. Green wood also smokes heavily and pollutes the air more than seasoned wood.

While church yard mold is probably the low end of the Btu scale, elm is actually no laggard, delivering 17 to 20 million Btu per cord. Although elm makes respectable firewood, it is not prudent to store, sell or use it due to the Dutch elm disease problem. The elm leaf beetle that carries the disease can lay its eggs in elm firewood. People have suggested debarking the wood, or storing it indoors or under tarps to stymie the beetle. Although these methods may be effective, it is not advisable due to the extra labor and liability involved.

Many misconceptions arise with firewood use and sales. One arborist may view this profit center as a gold mine while another may claim hauling and cutting are his biggest expense or biggest nightmare. While firewood profits may not be desirable or feasible for many organizations, they may deserve a second look. Profits notwithstanding, losses from hauling wood can be reduced by efficient management and effective marketing.

There are two key issues to examine when turning wood to gold: product availability and marketing. While most areas around the country have unlimited supplies of wood at their disposal, some metro areas such as Denver, Tucson, and Phoenix are realizing shortages of burning wood. Wood sellers in these and many other areas throughout the country are obliged to sell a sub-standard product or bear exorbitant cartage costs from outlying orchards or forested areas. People interested in wood sales in these wood-poor areas would do well to investigate outside sources.

Product sources

With cartage costs being what they are, accessibility to quality wood is a key issue. Look at other tree services as an occasional or even consistent source of product. Many larger companies view firewood more as an albatross than a profit center and newer companies may jump at the chance to get a load of logs from one of the big boys to fill some wood orders. These symbiotic relationships can and do exist within competitive jurisdictions. Contact your competitors to find out their profit and loss centers and let them know about yours.

Dumps can be an excellent source of high-quality wood. Companies that don't have the time, equipment or disposition to deal with firewood often pay to dump. Talk to landfill operators to glean information about who is dumping good wood and when. Often, dump wood can be had for free to save processing costs and dump space. Services that use dumps regularly and pay handsome fees for the privilege may do well to ferret out those in need of wood products. Schools, churches, hospitals or the Boy Scouts are often willing recipients of wood donations. Although donations don't add to one's profits, they can mitigate hauling and dumping fees.
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HEAT VALUES FOR AIR-DRY WOODS

<table>
<thead>
<tr>
<th>LOW, 12-15 MILLION BTU’S/CORD</th>
<th>MEDIUM, 16-23 MILLION BTU’S/CORD</th>
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locust, bl. | madrone | manzanita | oak, wh. |
| olive | peach | pear | plum |
and provide some well placed marketing via good will. Additionally, many tax advantages can be obtained through charitable contributions.

Stumpage (standing timber) can be another source of firewood, if it is within reasonable hauling distance and the price is right. Landowners may even pay to have slash and snags removed, as well as high-quality standing cordwood. Orchardists are obliged to remove and replant their trees every few years to establish younger, high-yielding stock. Many orchardists will charge stumpage per tree, per cord, or barter for chipping or trimming, etc. Prices of $25 per tree are not uncommon for large, high-quality trees such as almond, which is easy to split and burns better than oak. The idea of an arborist paying for wood may sound ludicrous, but at $200 per cord retail, there is a good margin of profit.

Although orchard trees may be expensive, purchasing them can hold many advantages. The overall high quality of most orchard woods surpasses almost anything that can be found in a North American forest. The Btu ratings are high for most fruit and nut woods. In general, these woods burn slow and even. They coal well, smoke little and contain little pitch or resin that can cake fireplace flues with creosote. Additionally, wood from orchards is relatively pest free due to intensive management throughout the life of the tree. Cutting and selecting are easy in the orchard as the ground is normally flat and the trees are relatively small and easily cut. Many trees of this ilk also require little or no splitting. This can pay for stumpage fees in labor savings alone.

Marketing
Wholesale firewood can be bought or sold for $50 to $80 per cord or more. This may make sense for people on either side of the coin. Woodcutters in heavily forested areas will have a harder time milking per tree, per cord, or barter for chipping or trimming, etc. Prices of $25 per tree are not uncommon for large, high-quality trees such as almond, which is easy to split and burns better than oak. The idea of an arborist paying for wood may sound ludicrous, but at $200 per cord retail, there is a good margin of profit.

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black ink from their efforts. Local competition will be stiff and the market small. They may do well to research markets 100 miles away where they could substantially increase their profits for a little leg work.

City arborists may be short of wood but inundated with orders. Therefore, they may find it profitable to buy firewood ready for sale and roll it over for profit without the sweat. Firewood processing can be expensive and labor-intensive but can be farmed out in a variety of ways. To save time and trouble, other operators can be involved in any or all facets of the processing, from cutting to hauling to final stacking. Some operators may consider the retail targets to be their battlefield. Sales to nurseries, groceries or hardware stores can gross $70 to $100 per cord, or more.

Selling directly to the consumer can be lucrative as well. Cord prices start at $80 and can stretch to over $300, depending on the increments and quality of the wood. Wood packaging machines can bundle small increments of wood to be sold at markets and convenience stores to casual fire builders. The cord price can top $500, but is worth it to the consumer who is looking for convenience.

Customer education

Another important segment of marketing and sales is customer education. Many would-be purchasers can be turned off by the negative aspects of heating with wood.

A frequent complaint associated with wood heat is the inconvenience of stacking wood and building fires. While it is certainly easier to turn on the gas furnace or flip on the electric heater, there are many attributes of wood heat that warm more than just the room. The aspects of aesthetics and self-reliance have converted many folks to the wood world. People who use wood sporadically seem to complain the most. Like most endeavors, success in burning wood depends on attitude and organization. Show these folks how to organize their wood heat systems and sell the romantic notions of self-reliance and tradition. Wood fires have warmed people’s cabins, tepees and caves for thousands of years. The tradition is still alive and growing and more efficient than ever.

Other complaints center on firebox and flue cleaning. While flue cleaning is an ugly task, it need not be performed more than once a year under most heavy burning conditions.

With a minimum investment in brushes and a vacuum, the task should require no more than an hour a year, or a professional can be hired for about $50 to $75.

Ash cleaning can be done weekly or monthly, depending on the type of wood or the firebox used. Burning fully seasoned wood (20% moisture content or less) will dramatically reduce the amount of ash and creosote left in the system. Proper flue damping and venting can also lessen the accumulation of ash and creosote in the chamber while providing more heat. The newer stoves on the market are dramatically more efficient than the old models and require far less cleaning of ash and creosote.

Nevertheless, ash will accumulate and has to be disposed of. It is important to be mindful of what is burned because it
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HOW IN THE TREE CARE INDUSTRY.
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will eventually end up as ash in one way or another. Many substances are suspected carcinogens even in ash form. Be advised to stay away from burning any paper with colored ink, plastics, laminated or pressure treated woods, rubber, and wood coated with paint, varnish, stain or preservatives. Advising your customers of these simple rules will erase some of the mystique involving stove cleaning.

One distinct advantage of ash cleaning is recycling for soil amendments. Ash contains phosphorus and potash and can decrease soil acidity - a winning combination for those with gardens and a sales point for a hesitant buyer.

Another common complaint among wood burners is that heat can escape through a fireplace or inefficient woodstove. This is a fact. A deep fireplace with a low mantle is the worst culprit. Although it may warm the immediate area (6 to 10 feet), it will suck in cold air from the rest of the house. This is acceptable if one uses the fireplace not for heat but for ambience.

The most efficient fireplace is of the Rumford design. It is quite shallow, sometimes only one foot deep, with a high mantle that can reach to the ceiling. The design uses the heat reflectance from the entire exposed wall as well as the residual heat held in the stone or brick mass. This design is rare in modern homes but can be seen in older homes and in castles throughout Europe where it has been used for hundreds of years. The effect of this style is dramatic, with the fire seemingly in the room with the occupants. While it is the best for efficient fireplace warmth, the Rumford design is “Flintstonian” compared to today’s high-efficiency stoves.

Efficiency and cleanliness of these new log burners notwithstanding, the pollution caused by the older models is said to be overrated. Experts believe that wood heat contributes less to serious air pollution than other types of heat. While sooty, the wood smoke is believed to decompose naturally, like debris of the forest floor. With the new EPA standards intact, wood heat is going toe to toe with other forms of heat in the realms of pollution, efficiency and cost.

Potential customers should be sold on wood in the face of rising utility costs as well as wood’s competitive pollution and efficiency ratings with gas and electric heat. Assuming efficient stove use, wood is cheaper than electricity and more efficient. Natural gas is still slightly cheaper for most, but there is no guarantee against rising prices or delivery problems.

There may be myriad reasons for not buying firewood. Turn them into positive information for the buyer. Make him feel politically and emotionally “correct” for buying and using your wood.

**Splitting technology**

Wood size, handling and burnability...
“Why did we join the National Arborist Association?”

To learn to run my business better!
Randy Owen, R.J. Owen Tree Service, Lum, Michigan

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Mark Tobin, President, Greymont Tree Specialists, Inc., Needham, MA

For the wealth of information that NAA provided!

Because of all the benefits that I couldn’t buy for 10 times the dues.
Paul Wolfe II, Integrated Plant Care, Rockville, MD

To get their cost-effective training programs.
Bill Kucharski, Trees Are Us Professional Tree Service, Milford, NH

To learn from other industry professionals.
Tom Golon, Wonderland Tree Care, Inc., Oyster Bay, NY

To make my company more efficient.
Chuck Edmondson, President, Alfred’s Superior Tree Service, Wichita, Kansas

There are many other benefits of membership that are also invaluable; the ability to network with other members, the free management guidelines and all of the other training programs that are available at substantial discounts to NAA members. In addition there are insurance programs, the annual management conference, marketing support and the NAA staff. You can call the NAA HOTLINE (1-800-733-2622) and ask any question about the tree care industry that you want. If the staff doesn’t have the answer, they know where to find it for you.

If your firm is not an NAA member, why not JOIN TODAY—and start enjoying all of the benefits of membership.

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Phone 1(800)733-2622 Fax (603)672-2613

Membership starts when you submit certificates of insurance.
Membership is available to commercial tree service firms only.
also can be sources of customer anxiety. Try to make your wood as user-friendly as possible. Find out what length and diameter works best for him and try to fill his needs without going overboard. Cut wood no smaller than need be to avoid inflated handling costs.

Once the optimal length is determined, the wood may have to be split to fit the customer's criteria. Split wood dries faster and is safer and easier to stack. Generally, logs less than six inches in diameter can be sold whole unless the customer requests otherwise. Split wood should always be stacked with the bark up to act as an umbrella during inclement weather and to make for a sturdy stack. This seemingly trivial point can gain a customer's trust when making a sale.

If you move mountains of wood, get the biggest, fastest splitter you can afford. Labor will be your biggest expense so maximize your handling efficiency.

Wedges and sledges are a losing proposition for realizing profits. They are too slow and should be used only as a backup to other equipment for projects that need immediate attention. Splitting mauls or "go devils" can be efficient in easy-to-split wood and can match or beat power splitters for speed. They are also cheap and require little storage and maintenance. Every operation should have an array of weights on hand (8 to 20 pounds) for different situations.

Power splitters come in a variety of shapes, styles and sizes. The two major types are mechanical and hydraulic, which can be vertical or horizontal. The vertical sort is more desirable for large wood because it allows rounds to be rolled onto the splitting platform with no lifting. Thus, labor costs and the risk of injury are lower. The horizontal type is usually a little less expensive and designed for lighter duty. While this type of splitter generally works well, the log has to be lifted to the splitting station.

While hydraulic splitters are similar in construction, mechanical types are of many different designs. A threaded cone device called the Stickler (TM) is bolted on a car or truck wheel which is set on a jack stand. Logs are placed against the sharp tip of the device which augers into the wood and rents it in two. One disadvantage is that it ties up the vehicle being
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ROOTSinc. has a promotional flier to increase your sales of deep root feeding for shrubs and trees. The flier, pictured below, is a four color, two sided, glossy piece that will fit, unfolded, into a #10 envelope. Available at cost or as a co-op allowance with your distributor.

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Shaw James Hazen is the owner of Shaw Hazen Landscape & Tree Care in Orinda, California.

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Adrian, Mich.
Contact: 517-482-5530

September 16-17
“Whole Tree Systems” & “Beyond Basics”
Featuring Dr. Alex Shigo
Santa Rosa, Calif.
Contact: John Phillips, 707-459-3015

September 20-25
National Urban Forestry School, I
Nebraska City, Neb.
Contact: Arbor Day Institute, 402-474-5655

September 26 - October 1
National Urban Forestry School, II
Nebraska City, Neb.
Contact: National Arbor Day Foundation, 402-474-5655

October 4-6
ISA, Mid-Atlantic Chapter Meeting
University of Maryland
College Park, Md.
Contact: Matthew C. Anacker, 301-486-4561

October 22-24
New Jersey Shade Tree Federation
Featuring Dr. Al Shigo
Cherry Hill, N.J.
Contact: 908-246-321

November 18-20
TCI EXPO '93
Cleveland Convention Center and Marriott Society Center Hotel
Cleveland, Ohio
Exhibitor information, contact: Chris Brown, 800-733-2622

December 1-2
Turfgrass and Ornamental Pest Control Workshop
Plymouth, Mich.
Contact: Jeff Lefton, 317-846-7020
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It's Thursday, November 18. You're in Cleveland attending TCI Expo '93. You've spent a long but fruitful day attending seminars and walking through Expo's vast trade show. Now, feeling a little tired but exhilarated by the prospect of the next two days, you meet with old friends for a social evening.

You find a table along a glass wall in Shooters on the Water, a restaurant/bar on the west bank of the Flats. The setting sun reflects off the water, and what you see contradicts your every expectation. You unwind from a full day of trade show and meetings only yards from the mouth of the Cuyahoga River, which bisects the Flats and the city. Across the water, blazing neon lights the riverfront decks of the east-bank nightclubs.

A few feet away, one of Cleveland's 30,000 luxurious private boats maneuvers up to the pier, its occupants hopping onto the boardwalk. Over your shoulder is the Main Avenue Bridge, which connects the East and West sides of town. Lake Erie is a stone's throw away.

At the river's mouth, the old iron bridge rises to allow an enormous tanker through. Even though the Flats is now known as a dining and entertainment district, it also supports a $300 million river-dependent industrial economy. The Flats, in fact, has been industrial for more than a century: Henry Sherwin and Edward Williams teamed up to make a paint-producing fortune here, and oil baron John D. Rockefeller's first refinery was in this district. New York Yankees owner George Steinbrenner made money building ships here. Even legendary photographer Margaret Bourke White found beauty in these smokestacks and steel mills.

Today, industry and entertainment are neighbors on the banks of the Cuyahoga.

Shooters, at the northern tip of the west bank, attracts a diverse clientele: afterwork businesspeople, yachters, the young, and the not-so-young. Dress is casual and the atmosphere is boisterous and lively. Glass-walled to give every table a river view, it's terrific for resting tired feet while you sip a beverage and watch the sunset. The ambience makes Shooters a perennial favorite of Clevelanders. The decor and spirit of the restaurant are unique to the region, making even locals feel as though they're on vacation.

The jewel of the west bank is the Powerhouse, which only a few years ago was a brick shell of a building that once supplied power to the city's cable cars. Now it's an elegant dining and retail complex. Its clubs and restaurants make the Powerhouse a fascinating spot to explore.

The Improv Comedy Club regularly attracts top comedy acts such as Emo Philips and Dennis Miller. Fans follow their favorite teams at the Grand Slam Bar & Grille, an always-crowded sports bar with 15 television screens and Sports Illustrated covers for decor. Friends gather for sing-along sessions at Howl at the Moon, where two baby grand pianos and lighthearted companions urge you to join in the fun.

Arrive early and browse through Art at the Powerhouse, a gallery of contemporary sculpture, paintings and one-of-a-kind jewelry.

Cap off your evening with a stop at the Rocky Mountain Chocolate Factory for some hand dipped truffles. Then amble down the boardwalk and chalk up your cue sticks to shoot a few rounds of pool at Jillian's Billiard Club and Cafe, a classy refuge with 29 tables.

While the west bank is more sophisticated and upscale, some of the city's most acclaimed restaurants sit on the east bank. For romantic dinners and sophisticated business meals, the ultimate epicurean experience, most connoisseurs agree, is at Sammy's, selected Cleveland's best restaurant several times by local publications. The "raw bar" is famous, and the soft jazz played nightly, coupled with a great view of the Cuyahoga River, creates an ambience that's equally conducive to courtship or to closing deals.

Several other riverfront restaurants have made their names by catering to business clientele. They serve sumptuous food in a setting that's classy enough for solo diners to feel comfortable. The Watermark, probably the most formal of these restaurants, is noted for its seafood.

Fagan's Seafood Restaurant offers a more airy, contemporary ambience, and is one of the oldest establishments in the Flats. The Flat Iron Cafe, at the swing bridge, is newly renovated and gentrified. Fagan's has a healthy menu featuring seafood and fresh salads. Fagan's and the Flat Iron are popular lunchtime destinations.

On the east bank, Peabody's
DownUnder is a smoky, small-venue concert bar that hosts carefully chosen acts such as the Fairport Convention and Bo Diddley. If you prefer musical entertainment that departs from the commercial mainstream, then head east to Peabody’s. An endless variety of sights, sounds, and smells comes at you through dozens of doorways throughout the Flats. Drop by the Splash Nite Club for the best live reggae music in Ohio, or spend some quarters at Power Play in the Powerhouse, a high-tech game room for adults.

The Cleveland once known as “The Mistake on the Lake” offers numerous social and cultural opportunities. The Flats is but one site you’ll want to visit while at Expo. Cleveland will be humming with energy. Plan to come to Cleveland for TCI Expo ’93 this November 18-20. Look for your registration materials in September’s TCI magazine, or call 1-800-733-2622 for further details.

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ILC Dover, Inc., introduces the Inflatable DrumRoll, the fastest, most effective way to stop hazardous and expensive 55-gallon drum leaks. Simply wrap DrumRoll around the drum and pull the inflation cord. DrumRoll has an easily activated cartridge that immediately inflates a Teflon-coated bladder that seals leaks instantly. DrumRoll fits steel, plastic and fiberboard drums. For more information, contact ILC Dover, P.O. Box 266, Frederica, DE 19946.

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Carlton introduces more power to self-propelled stump grinders. With the added power and torque of the cast iron Kohler K582S, Carlton Model 2300 is able to deliver big cutting power in tight places. Carlton Model 2300-4's hydraulic steering and 4-wheel stance combine unmatched stability and maneuverability. Model 2300-4 incorporates many of the features found in larger Carlton models for a long and profitable life. For more information, contact Carlton, 121 John Dodd Road, Spartanburg, SC 29303.

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TREE CARE INDUSTRY - AUGUST 1993
HELP WANTED

Arborists/field representatives: Ira Wickes Arborists, one of the oldest and most respected companies in the business, is looking for high quality people to help us continue to grow. Excellent compensation, benefits, incentives. Please send resume or contact us at Ira Wickes Arborists, 11 McNamara Road, Spring Valley, NY 10977. Phone: 914-354-3400.

Gossett Tree Service, Inc., est. 1928, seeks well qualified field operations manager. Strong background in safety regulations, sales, equipment and customer relations. Must be able to climb in emergency situations. Resume/salary history/career goals to Mr. Sam Hand Jr., president, Gossett Tree Service, Inc., P.O. Box 777, Tallahassee, FL 32303. Due Sept. 1.

SavATree, one of the fastest growing companies in the tree care industry, seeks ambitious, detail-oriented arborists to join an expanding salesforce in our New York and New Jersey offices. We offer an outstanding compensation package plus a wide range of benefits. Experienced individuals should send or fax a resume with salary requirements to: Human Resources. SavATree, 360 Adams Street, Bedford Hills, NY 10507. FAX: 914-666-9128.

Sales opportunity. Large tree maintenance company, selling large jobs, paying large commissions. Salary, car & full benefits. Past field experience a plus. All tree, nursery, and landscape sales background considered. Send resumes to TCI, Box A, P.O. Box 1094, Amherst, NH 03031.

Sales: Green industry tree care - Bartlett Tree Experts has been caring for America's trees since 1907. We are looking for well organized, self-motivated sales reps, foreman & IPM monitors. Sales profits are compensated at a commission rate commensurate with their profitability. A small business challenge, in a corporate environment. Horticultural/business degree pref. Health and life insurance. Openings in Westchester counties, Long Island, NJ & CT. Resumes to Bartlett Tree Experts, 345 Union Ave., Westbury, NY 11590 or call 516-334-0648.

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Permanent 3/4-time educator. Horticulture-Cornell Cooperative Extension, rockland County, Thiells, NY. Commercial hort-related environ., educ. programs, MS 3 yrs. exp. Send letter of intent, resume and transcripts by September 1 to: Box 26, Kennedy Hall, Cornell University, Ithaca, NY 14853. EOE.

Branch managers/arborists. Seeking qualified managers to run profit centers in Southeast and Western states. Great salary & bonus structure. Full benefits, year-round work on large jobs. Fantastic career opportunity. Send resumes to TCI, Box A, P.O. Box 1094, Amherst, NH 03031.

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Plant health care technician and sales - Person experienced in performing IPM inspections, applications, and developing new clientele. Rapidly growing department for a mid-size tree and lawn care company. Must be willing to relocate to western Maryland and have relevant experience in the plant health care field. Company benefits include health insurance, profit-sharing, vacation, personal days and holidays. Send complete resume including education, experience and references to: Antietam Tree & Turf, 405 N. Burhans Blvd., Hagerstown, MD 21740. Phone: 301-797-5176.


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90 F150 Ford 4x4 auto, 37,000 mi.; 67 F350 Ford auto dump, 88,000 mi.; 93 Rayco stump grinder, 68-hp diesel; 93 Rayco stump grinder 1620 Jr.; 88 Morbark 12” 4-blade disc gas chipper. Call any time, best after 5 p.m., southern Illinois. Phone: 618-377-5176.


Looking for a used chipper? Call the Midwest's chipper supermarket. We have Morbark, Bandit, Asplundh, Wayne & Mitts chippers. Some in great shape & some not. Alexander Equipment, 708-268-0100 or FAX: 708-268-0114.

Hardware and software, by an arborist for the arborist. For more information about the industry's best selling package, call or write Arbor Computer Systems, 117 Weston Road, Westport, CT 06880. Phone: 203-226-4335.

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Aerial bucket trucks. Hi-Ranger, Asplundh, Skyworker - most major brands - 40’ to 95’. Also, brush chippers, stump grinders, tree spades, log loaders and Rayco stump cutters. Parts of aerial buckets. Allied Utility Equipment, Inc., W. 204 North 11509 Goldendale Road,
Please circle 32 on the Reader Service Card.
Carlton Model 6800 combines power and cutting dimensions that no other grinder can match. Model 6800 utilizes a two stage V belt and PolyChain GT drive system which offers many advantages over other types of drive systems:

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**ENGINE COMPATIBLE** - No extra heat, causing engine overheating and premature failure.

**HARD WORKING** - Doesn't lose power after cutting a few stumps or refuse to work on a cold morning.

**1 YEAR WARRANTY** - At Carlton we believe in what we sell and so will you.

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* Circle this number on Reader Service Card for more information on this advertiser.
By Ken Schnaubelt

Sometimes life's lessons are very expensive. Most of the time, we don't have the luxury of choosing a payment method.

In 1979 I was the landscape superintendent for a developer in the Washington metropolitan area. After three years of unsuccessfully protecting expensive grounds maintenance equipment, I took the plunge and went into business.

I only bid on jobs that could easily be handled by one person: areas around new pools, decks or patios, rock gardens, ornamental ponds, etc. Occasionally I was asked to do a little tree work; as those jobs became more difficult, I found that I enjoyed the hard physical work and the mental challenge of tree removal.

Excited about learning a new profession, I took the exam from the Maryland Forest Service and got my Tree Expert License. Now I was a "specialist."

Customers were amazed by my prowess. The larger the tree, the better I liked it. I'd swagger up to the base of that day's opponent and begin setting equipment in strategic locations, hooking on lines and warming up chain saws. I'd throw a couple of ropes up and disappear into the foliage with five or six lines trailing from my belt.

Life was good and "humble" was not in my vocabulary.

In the spring of 1983 I bid the removal of a red oak that was 70 feet high with a fairly narrow crown. The trunk was almost four feet in diameter. It was along the driveway, only 12 to 15 feet from the house and 40 feet from the neighboring house. A 220-volt service line passed nearby.

I began laying out my equipment. I kept looking up at that monster and talking to myself. On occasion, even I needed a little reassuring. Anyone who has ever done tree work has had that sinking feeling that maybe this is the one that should be left to a bigger outfit.

It was early April and the temperature dropped from late morning all through the afternoon, as a front passed through the area. Flurries dotted the ground.

I wasn't feeling very good when I had left the office and now I began to feel worse. Everything seemed to be in slow motion. The wind picked up. I was cold and my strength was fading. So was my confidence.

I had it limbed to about 45 feet when I decided I couldn't go any higher. The tree was swaying in the wind. I got careless on the last branch and my "Super 2" caught the back of my hand when a gust of wind swung it around on the rope. My glove saved me from a serious wound but my hand was throbbing in the cold air.

Back on the ground, I surveyed the tree. I knew I should go home and come back another day. I decided to drop the whole tree between the two houses.

It took all my strength to climb back up and attach three of my heaviest ropes. Once they were all secured, to stable objects, I began notching the tree. I was getting light-headed and almost fell down once or twice.

By now the homeowners, their neighbors and several others from across the street were watching. I started my backcut. The wind picked up as I ran to the pull rope. Not quite ready. Back to the tree, another inch or two with the saw and then back to the rope. Not yet. Back and forth. Just as complete exhaustion was setting in, a loud crack boomed out from the trunk and my huge "sail" started going in the opposite direction, putting a strain on the other two ropes. Another boom split the air as it twisted and slid closer to the garage and power line.

I was literally climbing the pull rope and dangling five feet off the ground when I glimpsed a man sprinting in my direction. He was wearing a coat and tie and carrying a briefcase, all of which he discarded as he passed the driveway.

Grabbing the rope behind me, he shouted, "One, two, three, pull; one, two, three, pull." The tree let out another tremendous "crack" and shuddered back to its original position. "One, two, three, pull; one, two, three, pull." It stood defiant in the wind for what seemed like an eternity. With one last effort, we pulled it toward us, pieces splintering and spraying in every direction as it smashed into the ground between the two houses. Then it was still. Our little "gallery" applauded and came over for a closer look. The only damage was a loosened landscape timber along the edge of the driveway.

My helper and I shook hands and as he picked up his belongings, he explained how he had a one-man tree business several years ago. He was now selling door-to-door and could see I was in trouble from across the street. I must have thanked him a hundred times, babbling deliriously as he disappeared down the street and around the corner.

I was finished and home by dark. My temperature was 102.5 and I spent the next three days in bed. I had learned a very expensive lesson without having to pay the price, a rare gift in the tree business.

Ken Schnaubelt owns Land Crafters Landscape Design/Consulting in Gainesville, Virginia.

Do you have a story for From the Field? TCI will pay $100 for published articles. Submissions become the property of TCI and are subject to editing for grammar, style and length. Entries must include the name of a company and a contact person or they will not be considered for publication. Articles and photos must be received by the first day of the month for the following month's issue.
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For those as serious about what they do as we are...

A welcome and much needed addition to the options available to arborists today, the Port-a-Wrap is not intended to replace descenders or the Bollard Friction Brake, but will definitely fill the 'missing link' between the two.

Any questions about the Port-a-Wrap should be directed to the expert staff at American Arborist Supplies, who will be the Master Distributor. Please note that the Port-a-Wrap has a patent pending.

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Practical Rigging

An American Arborist Supplies sponsored article

By: Ron Danise

DESCENDERS & ALTERNATIVE FRICTION DEVICES

In previous articles, we have discussed the benefits of descending and lowering devices including figure eights, the Bollard Friction Brake, and other options on the market. These tools provide a great field advantage by turning difficult tasks into easy ones, thus saving time, which usually equals money.

Unfortunately, most of the descenders on the market today are only equipped to handle a rope with a maximum diameter of 9/16". A 5/8" rope can be used, but it creates such a tight bend that it defeats the purpose of using stronger ropes.

As advantageous as the descenders are for rigging, there are times when there are drawbacks: if the descender is too small for the rope being used, if the base area of the tree is not adequate for the Bollard device, or if the tree is only being trimmed and the Bollard cannot be used because it could cause damage to the bark.

The 'missing link' in rigging equipment for tree work has been apparent for some time. Recently, Scott Prophett told me about a device that he and Norm Hall have been developing for use when a figure eight is not adequate. After testing the 'Port-a-Wrap Rigger', I was impressed with its versatility and adaptability. It takes less than one minute to attach, and is free-floating and self-aligning. This new device has almost unlimited application in heavy pruning and light removal operations.

The greatest advantage the Port-a-Wrap has over other descenders on the market is its diameter. The areas over which the rope runs have a greater diameter, allowing much smoother bends, thereby increasing rope efficiency.

Working in trees where running rigging is essential, such as Shag Bark Hickories or smooth-barked Sycamores, the use of mechanical aids, such as The Port-a-Wrap and the Bollard Friction Brake, takes the guess work out of the number of wraps needed to control the load.

Not only will foremen find that these devices simplify training ground crew to safely and efficiently handle the lines for running rigging, they will find that the safety factor increases for both the climber and the ground crew. Also, ropes will no longer be damaged by rough bark or burned from too much friction as they run over smooth limbs.
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Because if you're running a business, shouldn't you be running the strongest business tools as well? 4.5 cubic-inch 757 to the compact 300S, every Shindaiwa is built for maximum cutting efficiency, minimum cost of ownership. It's the result of flawless construction. Small displacement, high output engines. And engineering tolerances normally reserved for Formula One race cars. For added protection, you're backed by a national network of independent servicing dealers. So visit one soon.

Because if you're running a business, shouldn't you be running the strongest business tools as well?

You want a stronger business. Have you considered a stronger saw?

To the average citizen, a chain saw is a cutting tool. No more, no less. But if you depend on it for your livelihood, a saw is more than just a cutting tool. It's a business tool. Which is why you should take a good, hard look at Shindaiwa. We manufacture high-performance chain saws for professionals. People who demand the rock-like reliability, low weight, easy starting, and smooth power few saws deliver. Ours do. From the all-new,