

Engineering a Career in Arboriculture

"Branching out" to recruit for the future

By Jamie Magaldi

"So, what do you want to be when you grow up?" Remember those years when the answer to this question was wondrous, exciting, and had an endless array of answers? As children age into young adults, however, this question can stir up a great deal of anxiety. Teens are presented with this question in high school on a regular basis, and are almost expected by the time they reach 10th or 11th grade to have a good idea of how they want to spend their post high school years (and their parents' UFund accounts, if they're lucky). This is an extremely difficult choice to be faced with when you're 16 years old, especially for today's youth who seem to be maturing at a slower rate than past generations. Do the research, young people are settling down later in life, taking their time in moving out of their childhood homes, and even taking longer to get serious about long term careers.

The truth is, most of us are probably doing something not even remotely related to the careers we saw for ourselves when we looked into the elementary school crystal ball. There's a great line in the movie "Office Space" where a character is encouraged to imagine he has no financial motivations in choosing a career path...and the path is supposed to inherently become obvious based on simply searching his heart for what he loves to do. The line is "The exercise is [fruitless]. If everyone listened to her, there'd be no janitors, because no one would clean [expletive] up if they had a million dollars!"

I grew up in an environment rich in music and creativity, always believing that just one day I'd become the richest rock star on the planet. My parents were generally supportive of the idea, but also knew that I liked to eat and have nice things. Following in my brother's footsteps, and with a general likeness for mathematics, I decided to attend Merrimack College in North Andover which offered a well-rounded and accredited program in Civil Engineering. I'd put my time in. The plan was to get the degree, then instead of building bridges I'd be performing under them, Simon and Garfunkel style. I'd show them, I didn't need a backup plan.

Remind me to thank my parents. Fast forward 15 years, a house, a wife, and two kids later, the roots I set in college with a background in engineering have allowed me to live a modest yet secure lifestyle which still permits me to moonlight as songwriter, even getting some very limited radio airplay! All the important things are thankfully accounted for...food, shelter, transportation, picket fence, two cats in the yard, life used to be so hard...I digress.

Shortly after college, however, I realized quite quickly that something was missing. Aside from music, I loved being outdoors, had a general fondness for creativity and landscaping, and really enjoyed the peaceful serenity offered in nature and in particular, the countryside. All attributes that indirectly pointed me into the field of civil engineering in the first place. Unfortunately, I was a late bloomer when it came to "finding myself" but I was lucky enough to fall backwards into arboriculture through my position as a municipal DPW Operations Manager.

Here's the deal. Anyone that owns a tree and landscape business, runs a tree crew, or manages a park operation knows how hard it is to find great tree workers. And the pool of young, educated and enthusiastic help is shrinking. If only there was a way to recruit better talent and find an untapped

resource of young and willing professionals who inherently have a love of nature and an innate curiosity to find how structures stand, how materials are tested and broken, and what causes timber to fail.

Perhaps we have been narrow minded to believe that future tree professionals are exclusively seeded in the arboricultural education system. I can tell you from experience that many of the same concepts in tree risk management, rigging, and structural behavior of trees are being taught as part of static mechanics for young structural engineering students. Concepts like center of gravity, behavior of materials (specifically timber) under stress, moment of inertia, torsion stress, material yielding, factors of safety, load testing, load redirections through pulleys, and other concepts of structural analysis are being discussed right now in engineering classrooms around the country to students who don't have the slightest idea that they can apply these concepts to a career in arboriculture.

Furthermore, most of the engineers I know love the thrill of solving real-life puzzles. At the same time, every arborist I know can attest to how every tree rigging project is a puzzle within itself...seldom are two scenarios alike. Add to this the desire to work outside, climb trees, experiment with some of the coolest rigging and load arresting toys on the market and you have the recipe to recruit some very talented future professionals in the arboriculture field.

So the next time we feel discouraged by a seemingly dying breed of young professionals in the arboriculture field, let's remember that there are youngsters out there that simply haven't yet been informed that they can actually have a rewarding career in a field that actually combines the love of nature with the latest concepts in structural engineering. Add to that the ability to learn how to climb, solve removal puzzles through rigging techniques, understand the dynamic behaviors of timber, and earn good money while shedding a little blood, sweat, and tears (well, hopefully not blood or tears). And above all...recruiting new engineers who have a solid understanding of structural engineering makes for SAFER future tree care workers.

Please share with your local colleges and universities, career fairs, scholarship associations, and internship offices to encourage young individuals interested in post-graduate engineering to "branch out" and think outside the box of building beams and buildings. Together we may be able to open young eyes to a wonderful profession that can combine puzzle solving, nature, engineering, and tree climbing while securing a promising future work force in a field that is in constant need of well-trained arborists.

I may feel a song coming on.

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