

Re: Diameter Comparisons

by dbhguru » Wed Mar 07, 2012 5:01 pm

NTS, here is the results of the expanded test of the Macroscopes, RD1000, and TP360 in measuring diameter.

As the tests proceed, it is increasingly apparent that the Macroscope is the top performer. As a consequence, I've ordered a Vortex Monocular, per Michael Taylor's recommendation. Michael is extremely thorough and his stamp of approval means

a lot.

I'll continue to add trials, but for relatively close targets, the Macroscope continues to be the instrument of choice. According to Michael, target visibility is improved and the reticle has many more graduations. The RD 1000 is very good up to around 80 feet, but thereafter problems develop. It is clear to me that the instrument is designed for small timber and at relatively close distances. My original tests suggested that, and nothing has changed.

Robert T. Leverett

Comparison between instruments on diameter measurement														
Macroscope 25/45					Macroscope 25					Macroscope 45				
Tree ==>	WA	AB	BB	BB	WA	BB	BB	TT	HM	AB	WP	WP	AVG	
Distance	66.25	52.25	60.25	54.25	67	60.75	55	23.45	142.5	52.5	80.333	88.5		
mm	1.8	1.21	1.42	1.9	0.98	0.81	1.04	0.75	0.42	0.68	1.185	1.085		
Diam In	19.080	10.116	13.689	16.492	18.910	14.172	16.473	5.065	17.237	10.282	27.416	27.654		
Diff In	0.180	0.134	0.039	0.058	0.290	0.172	0.227	0.065	0.237	0.268	0.084	0.154		0.159
TP 360														
Tree ==>	WA	AB	BB	BB	WA	BB	BB	TT	HM	AB	WP	WP	AVG	
Distance	66.25	52.25	60.25	54.25	67	60.75	55	23.5	142.5	52.5	80.5	89		
AZL	267.3	269.9	274.3	277.7	265.8	272.6	275.3	192.5	272.7	269.3	277.1	279.8		
AZR	268.6	270.8	275.4	279.1	267.2	273.7	276.7	193.6	273.25	270.3	278.7	281.2		
Ang	1.3	0.9	1.1	1.4	1.4	1.1	1.4	1.1	0.55	1	1.6	1.4		
Diam In	18.455	10.006	14.151	16.304	20.135	14.269	16.529	5.520	16.574	11.190	27.747	26.747		
Diff	0.445	0.244	0.501	0.246	0.935	0.269	0.171	0.520	0.426	0.640	0.247	0.753		0.450
RD 1000														
Tree ==>	WA	AB	BB	BB	WA	BB	BB	TT	HM	AB	WP	WP	AVG	
Distance	66.25	52.25	60.25	54.25	67	60.75	55	23.5	142.5	52	80.5	89.25		
Diam In	18.900	10.200	13.800	16.700	19.400	14.000	17.100	5.000	16.400	10.800	27.500	27.800		
Diff	0.000	0.050	0.150	0.150	0.200	0.000	0.400	0.000	0.600	0.250	0.000	0.300		0.175
Callipers														
Tree ==>	WA	AB	BB	BB	WA	BB	BB	TT	HM	AB	WP	WP		
Distance	66.25	52.25	60.25	54.25	67	60.75	55	23.5	142.5	52	80.5	89.25		
Diam In	18.900	10.250	13.650	16.550	19.200	14.000	16.700	5.000	17.000	10.550	27.500	27.500		

[Accolades for Bob Leverett](#)

by **edfrank** » Thu Mar 08, 2012 9:16 pm

Bob, I want to acknowledge and thank you for all your efforts in exploring the various details of the accuracy of all of these instruments. Since I joined ENTS you have been an inspirational leader for the group. Will Blozan deserves credit as well as he has produced amazing finds in the Smokies and elsewhere, led the Tsuga Search Project, worked on the Sag Branch Tuliptree/Middleton Oak Project, and his recent work in California. As for you in all that time scarcely a day has passed when you did not comment on some post on the discussion list or BBS to encourage our members or welcome new members to the group. You have pursued project after project to further the aims of the group. Off list there is a constant stream of messages between you and various government agencies, technology groups, private individuals, and others in pursuit of more cooperative projects with others and with the exploration of new measurement procedures that are in development stage. You have been hot in pursuit of old growth with many chapters and books under your belt on the subject. You and Will published the first real book on measuring trees for science "Stalking the Forest Monarchs" (maybe you should republish it as a pdf?).

So even though these measurement posts do not receive a great deal of comment, I am sure everyone agrees that we all appreciate your unflagging efforts on behalf of NTS and our tree documentation mission.

Ed Frank

[Re: Accolades for Bob Leverett](#)

by **Larry Tucei** » Thu Mar 08, 2012 10:54 pm

Ed, I second your comments. Bob is the rock of NTS and always has inspired me many times. Although I don't post on all the things put for discussion I do read most of them. I make sure I read all of Bobs posts and yours to. I have never met anyone that compares to Bob when it comes to tree formulas,

writings, documentations, etc. He is and always will be the inspiration for all of us. I feel honored to have been able to associate with such a great human being.

Larry Tucei



Re: What's Been Cooking As Of Late?

by dbhguru » Fri Mar 09, 2012 9:03 am

Thanks very much for your support. I really appreciate what both of you said. It means a lot to me. Guys, sometimes I think my brain has been wired to measure and compare things and that I have little else to say about it. I get up in the morning and what races through my head are thoughts about what I'm going to measure before the sun sets. I also expect that I have a little of P.T. Barnum in me in the sense of showmanship. So, what has been cooking as of late?

I'm pleased to report that I'll be writing an article for the April edition of SAF's 'The Forestry Source'. I've communicated with Steve Wilent, the Source's editor, for a number of years. Through Steve, I'm hoping that NTS can develop a working relationship with SAF management as a behind the scenes source of information about outstanding forest sites, improved measurement methods, instrument comparison, etc. There are many SAF members who have a genuine interest in the kind of information that we collect in NTS. They simply have to have confidence that we are a legitimate source of solid information. Of course, we know that we are, but it is fair for them to ask and seek demonstrations, and we can oblige. I expect the time will arrive when American Forests, SAF, and NTS will team together on our site documentation mission. It is in the interests of those two esteemed organizations that they know what really is at the famous big tree sites, as part of forest history, if nothing else. This is the common ground we share. That's where the focus needs to be. And we have members who are, and have long been, active in SAF. Don Bragg and Don Bertollette come to mind. I'm sure there are others.

I'm also pleased to report that the Massachusetts DCR is now firmly on board with us as a co-sponsor of an October event in MTSF comparable to the Cook Forest event of April 18-19. BTW, we will get SAF promotion for the Cook Forest event in The Forestry Source. That's pretty cool. On the Mohawk event, I'll be seeking ideas from the rest of you on an

agenda. Let's make it a truly participative event. There's plenty of time to decide what activities we want to include. As with the April Cook workshop, LTI will be present, and I think American Forests plans to support the Mohawk event also. AF has committed to Cook. Sheri Shannon will be there in person.

I've long promoted the idea that we're not looking to be competitors of other organizations that have tree missions, rather as a behind the scenes arm to aid in gathering sound measurement data. And, Guys, I really do think we're getting there. 2012 may turn out to be the best year we've ever had in NTS along these lines. But it can't happen without plenty of troops in the field doing the data gathering, and we have them. I take my hat off to all members of NTS. We make things happen as a team.

Robert T. Leverett

MISSIONARY STEW

1 med. size elephant
20 bags of salt
500 kg. peppercorns
750 bushels of potatoes
125 bushels of carrots
2000 sprigs parsley
1 rabbit
1 onion, sliced

Cut elephant into bite size chunks. This will take about 6 weeks.

Chop vegetables into cubes. Another 4 weeks.

Place meat into jumbo size Missionary Pot. Pump in 5000 1/2 liters of elephant gravy and simmer for 24 days.

Shovel in salt and pepper to taste.

<http://www.cooks.com/rec/view/0,1748,148172-238200,00.html>

Massasoit, MTSE, MA

by dbhguru » Fri Mar 09, 2012 9:52 am

NTS, Massasoit was the grand chief of the Wampanoags who lived from 1590 to 1661. He was known for his friendly relations with the Pilgrims, which he maintained throughout his life. As a consequence, Massasoit is honored in many places. Massasoit is a common place name and it is the name of a white pine in (where else?) Mohawk Trail State Forest. The big double-trunk pine was climbed by Will Blozan in 2006 at an ENTS rendezvous. We all stood out in the rain and exercised our craft.



As I recall, Massasoit was 146.5 or 146.6 feet at the time. And the top was not where we initially thought it would be. Here is a look at the pine as seen across a leach field. The leaning trunk has the highest point.

The next shot points to the top of Massasoit as determined by Will on his climb. I vaguely remember him moving the top so we could see what he was measuring. Here is a look.



Will took images from the top of the tree. I may have some of them in some computer file, and if so will post a couple.

Yesterday, I went to Mohawk and re-measured Massasoit. I took a tripod and set it up at a sufficiently far spot to see the true top. I put a yellow marker at DBH height, clearly visible from my distant vantage point. With repeated shots, I settled on 150.4 feet. Massasoit becomes #120 for Mohawk. With 120 great whites reaching the 150-foot threshold, I happily reported the result to DCR and others. Nothing like a little advanced promotion for the October workshop.

On my previous re-measure of Massasoit, I tried to do it from the center of the leach field. I forgot where I had to be positioned to see the highest sprig. But the true top is not visible from the closer vantage point. From there, what appears to be the top is 148.0 feet in height. The highest point of the companion trunk is 147.7 feet. The double trunk measures 14.1 feet around.

Robert T. Leverett

[Re: Montreat Trail System, NC](#)

by **bbeduhn** » Fri Mar 09, 2012 11:04 am

Montreat is a former resort town near Black Mountain, in the Asheville area. Its watershed has been protected and contains very mature forest. Some consider it to be old growth and it certainly is at higher altitudes. It appears so at the lower altitudes as well but is conspicuously absent of any large hardwoods. Black and yellow birch are everywhere. Old, large hemlock skeletons dot all of the streams.



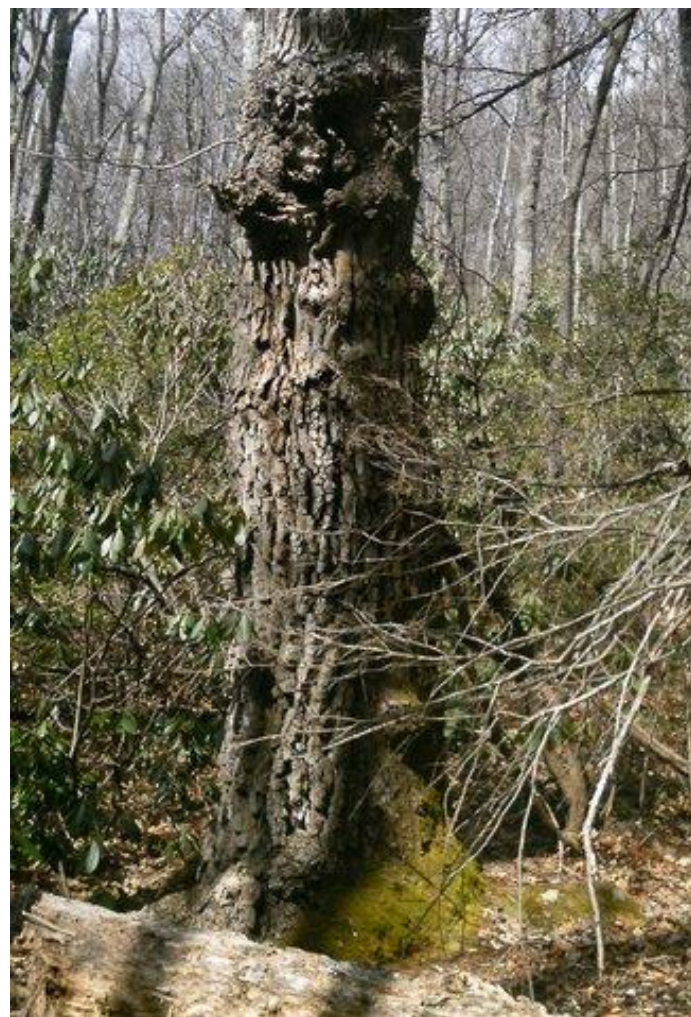
Shared yellow birch root



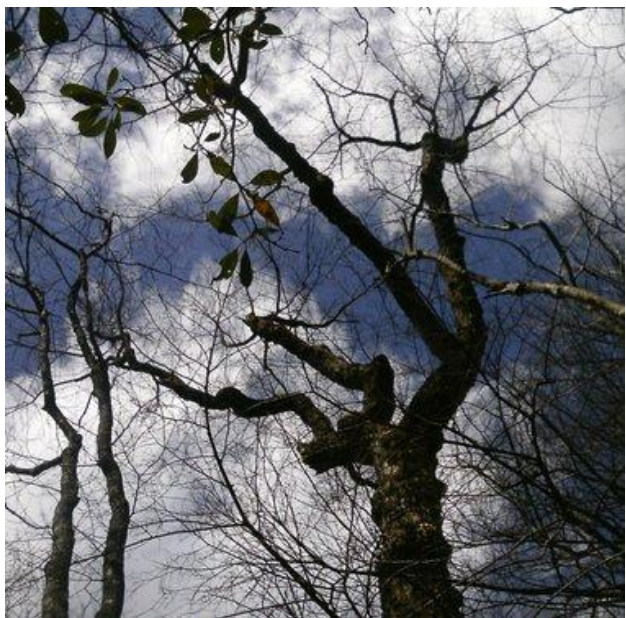
Very old yellow birch



growth rings on very old yellow birch--about 220 in less than 5"



Old chestnut oak



Old chestnut oak crown



Bulbous red maple

Brian Beduhn

[Re: Meigs Mountain, GSMNP](#)

by **bbeduhn** » Fri Mar 09, 2012 11:12 am

Feb 27, 2012 - After reading about the super forest, I decided to try out an area adjacent to it, and then check out Burnt Mtn if time permitted. I'd just done Ramsey Cascades, so after Meigs it was almost dark. Burnt Mtn. will have to wait for another trip.



The 160's and most of the 150's reside here



Red maple grown over decayed stump



Old foundation



Mystery tree crown. Tree resides on a slope about 40' above small stream, near old foundation.

Brian Beduhn



Mystery tree -- about 16" diameter 95' tall

(Butternut *Juglans cinerea*)

Cedars of God Lebanon (Re: 10 World Famous Trees)

by **Rand** » Fri Mar 09, 2012 3:53 pm

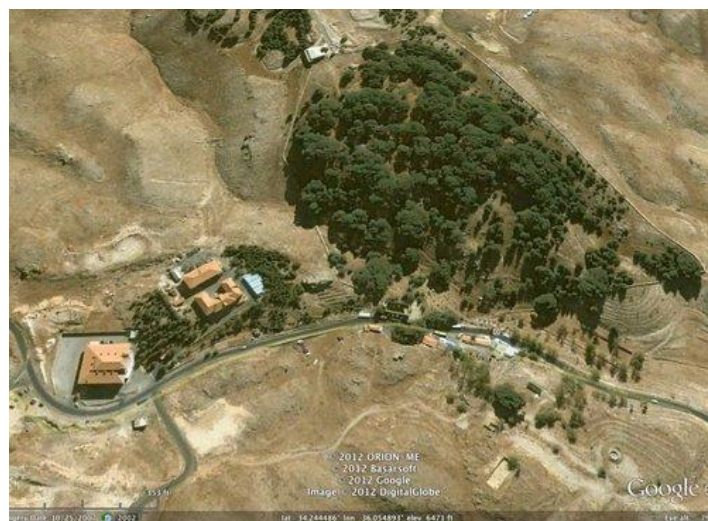
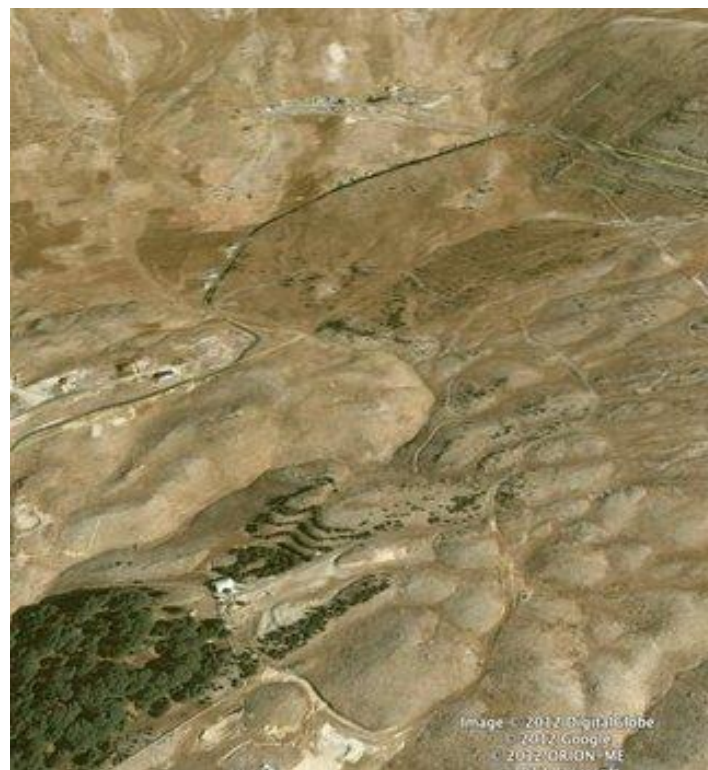
10 World Famous Trees

<http://www.care2.com/greenliving/10-world-famous-trees.html?page=1>

I don't know if anyone has looked at the Cedar's of God in Lebanon on Google Earth, but it's just...epically sad. It's a little island in a sea of bare ground:



If you zoom closer you can see what looks like efforts at reforestation, but the task is just enormous:

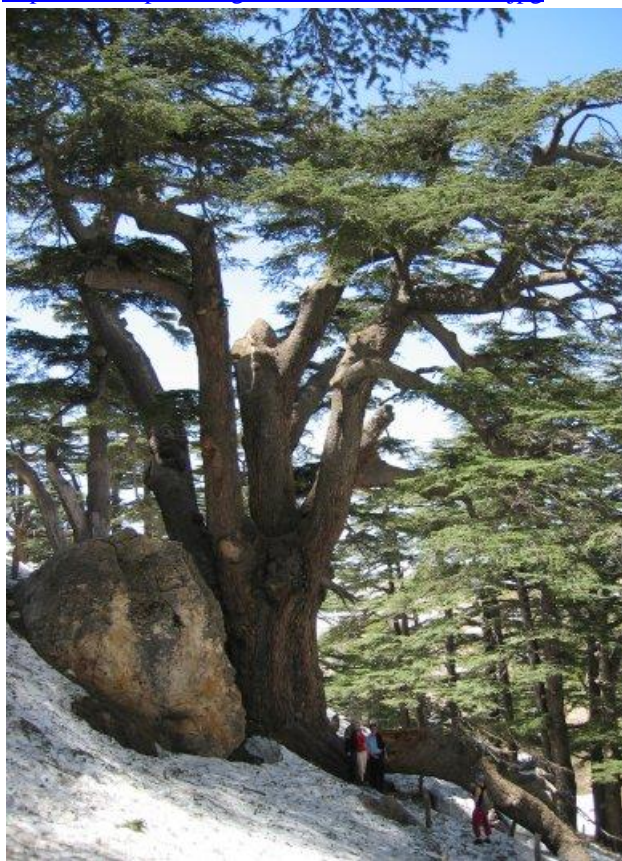


Wikipedia has a couple of nice pictures of the area too:

http://en.wikipedia.org/wiki/File:Forest_of_The_cedars_of_God.jpg



<http://en.wikipedia.org/wiki/File:Libanonzeder.jpg>



Rand Brown

[Re: 10 World Famous Trees](#)

by **edfrank** » Fri Mar 09, 2012 5:54 pm

There is a nice description of the Cedar's of Lebanon on Wikipedia:

http://en.wikipedia.org/wiki/Cedrus_libani

*In Lebanon and Turkey it occurs most abundantly at altitudes of 1,000-2,000 m (3,300–6,500 ft), where it forms pure forests or mixed forests with Cilician Fir (*Abies cilicica*), European Black Pine (*Pinus nigra*), and several juniper (*Juniperus*) species. On Cyprus, it occurs at 1,000-1,525 m (3,300–5,000 ft) (reaching the summit of Mount Paphos). In the Atlas Mountains of Morocco, it occurs at 1,370–2,200 m (4,500–7,200 ft) in pure forests or mixed with *Abies* species and *Juniperus thurifera*..*

Over the centuries, extensive deforestation has occurred, with only small remnants of the original forests surviving. Deforestation has been particularly severe in Lebanon and on Cyprus; on Cyprus, only small trees up to 25 m (82 ft) tall survive, though Pliny the Elder recorded cedars 40 m (130 ft) tall there. Extensive reforestation of cedar is carried out in the Mediterranean region, particularly Turkey, where over 50 million young cedars are being planted annually. The Lebanese populations are also now expanding through a combination of replanting and protection of natural regeneration from browsing by goats, hunting, forest fires, and woodworms.

Historically, there were various attempts at conserving the Lebanon Cedars. The first was made by the Roman Emperor Hadrian, who issued a decree protecting parts of the Cedars of Lebanon in CE 118. In the Middle Ages, the Mamluk Caliphs also made an attempt at conserving the Cedars and regulating their use, followed by the Maronite Patriarch Yusuf Hbaych, who placed them under his protection in 1832. In 1876, Britain's Queen Victoria financed a wall to protect the Cedars of God (near Bsharri) from the ravages of goat herding.

Edward Frank

Re: Capturing Natural Sounds

by **michael gatonska** » Fri Mar 09, 2012 7:00 pm

Hello ENTS:

This past January I had built a parabolic mic set-up for my *Woody Plants Soundscape Project*.

Very simple to pull off, however, it did cost me a little over \$300. This was because I decided to invest in a good mic - and today you can get a very good one for not too much money.



My Parabolic Mic

Here is a breakdown of what my final costs were:

A 5 studio mic on board for XY stereo or Surround sound recording = \$210

PVC pipe with various connectors
= \$14

Paint (direct to plastic)
= \$6

Parabolic dish - I just bought a squirrel baffle-
= \$16

MDR stereo headphones
= \$90

16 gb card; allows me approximately 11 hours of recording
= \$25

TOTAL: \$361

I will be using a simple software (WaveLab LE7) to manage, edit and engineer the audio files- this I did not need to purchase. Still, there are many other softwares available that are free and online; a simple downloading process. Whether for recording

soundscapes or for other audio projects at home, please feel free to ask me about which sites are safe to use (file switch/converters, disk label software, etc.)

In the meantime, I will be starting my blog page here on the ENTS site, to keep everyone posted as to my progress, success and failures in recording tree leaves. By the way, I painted my equipment black to not only be fashionable, but to not bring too much attention to my activities or scare any of the wildlife.

Michael Gatonska

Composer Portrait: Michael Gatonska

by **edfrank** » Fri Mar 09, 2012 9:11 pm

<http://www.youtube.com/watch?v=ShK-WY9VBOo>



Uploaded by AmCompOrch on Sep 9, 2007

Michael Gatonska discusses the creation of his Underwood Commission and World Premiere, *AFTER THE WINGS OF MIGRATORY BIRDS*. Gatonska was the winner of the 2005 Underwood New Music Readings, winning a substantial cash prize and this commission, premiered in NYC at Zankel Hall in Carnegie Hall, October 13, 2006. The performance was repeated on October 15, 2006 at the Annenberg Center for the Performing Arts in Philadelphia, PA. Filmed by Jeremy Robins. More info available at <http://americancomposers.org>

[Re: Capturing Natural Sounds](#)

by **michael gatonska** » Sun Mar 11, 2012 4:30 pm

Hi Ed, Actually I am going to use the blog page here in the ENTS site; this way everyone will have the chance to follow if they have an interest.

I just got back from my first attempts at recording, so I am currently organizing my materials for the blog- my first trip involved a day spent making recordings of an old growth hemlock grove inside Whites Nature Preserve, Litchfield, CT. I will also be including videos - in this case, footage of how a young hemlock branch reacts and moves in 3-10 mph winds.

My kit is very simple and light for long walks or hikes, so I just wanted demonstrate its portability...



Michael Gatonska

“What is essential, is invisible to the eye” –Antoine de Saint-Exupery

[Re: Capturing Natural Sounds](#)

by **edfrank** » Wed Mar 16, 2011 5:02 pm

I posted a link to some resources on recording sounds in March 2011 from the Macaulay Library earlier in this discussion thread. So this is not strictly about trees, but you cannot disagree that much of the forest experience deals with the ambient sound present at a given location.

Macaulay Library

The Macaulay Library at the Cornell Lab of Ornithology is the world's largest natural sound and video archive of animal behavior. Its mission is to collect and preserve recordings of each species behavior and natural history and to make them available for research, education, conservation, zoos and aquaria, wildlife managers, publishers, the arts, and both public and commercial media. Since 1930, recordists of all backgrounds have contributed their recordings, which now number to several hundred thousand in total. A large percentage of the recordings can be searched and played online. The Library also provides services for consultation, custom compilations, and professionally edited versions of its assets.



RavenViewer - RavenViewer is a free browser plugin developed by the Cornell Lab of Ornithology. It enables you to see and visually analyze the sound as you play it. Download RavenViewer here: <http://macaulaylibrary.org/raven-viewer>

Learn to Record: <http://macaulaylibrary.org/field-recording>

[Rockefeller Tree Surpasses 370 feet, CA ???](#)

by **M.W.Taylor** » Sat Mar 10, 2012 1:49 am

I measured Rockefeller Tree today with fellow tall tree explorer John Montague.

It Towers.

The columnar trunk of Rockefeller is visually one the most impressive trees in Humboldt Redwoods State Park with its 15' dbh, slow tapering, symmetrical and very high to the first branch, trunk. The crown of this tree is enormous.

Our figure using an Impulse200LR with remote trigger and prism/pole survey was 370.17 feet. I could have used two higher vertical readings I got for the top of the tree from an adjacent hillside with the Impulse200 (370.22 and 370.25) but I chose the most conservative reading of the three.

Michael Taylor

[Re: Rockefeller Tree Surpasses 370 feet ???](#)

by **M.W.Taylor** » Sat Mar 10, 2012 1:49 am

Update. Apparently I measured the top of a tree that looked like Rockefeller, but was not Rockefeller. I used the top of that tree AKA "False Rockefeller" for the top height determination and then did a 2000ft survey through the forest to the base of the real Rockefeller for the ground level. Unfortunately the ground level for the adjacent tree is 23 feet higher as it grows on a knoll...see attached. Since I measured two different trees, the results of the survey are meaningless. Rockefeller Tree's top may be

impossible to measure accurately from the ground due to lack of any clear view to the top.

The good news however is that two other redwoods did breach 370' in Humboldt Redwoods recently, confirmed by Steve Sillett climber deployed tape-line. Paradox is now 370.34 feet and Lauralyn 370.04 feet above average ground level.

The tall tree list for Rockefeller on my website has been updated to the last measurement by Steve Sillett.

My apologies for the tall tree report that wasn't.

Michael Taylor

[Re: Rockefeller Tree Surpasses 370 feet](#)

by **M.W.Taylor** » Sat Mar 10, 2012 6:47 pm

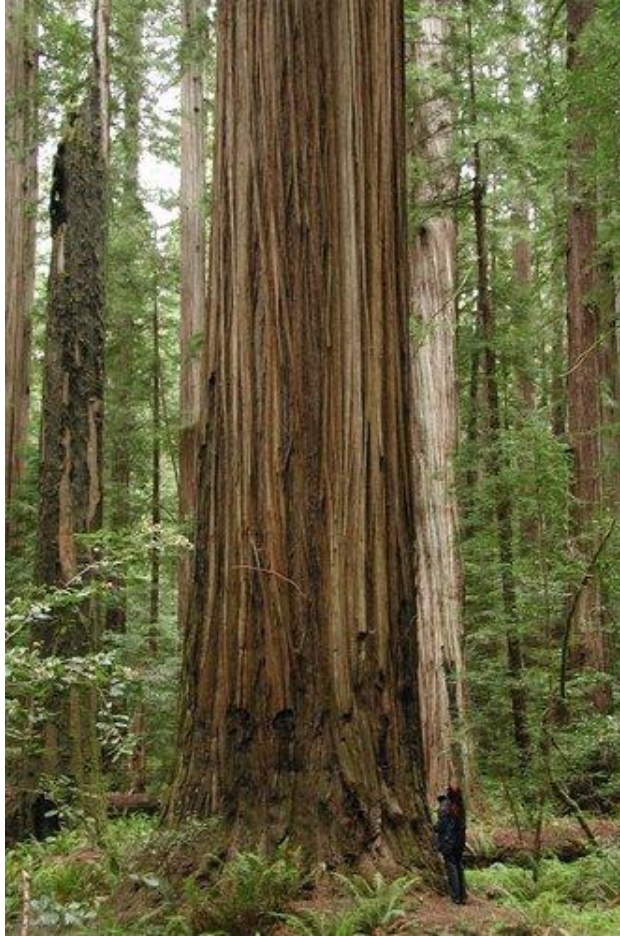
I've attached a few pictures of Rockefeller, including the top leaders. When Steve Sillett climbs this tree I will give this forum an update with the tape-drop measurement.

Here is a list of currently known redwoods over 370 feet.

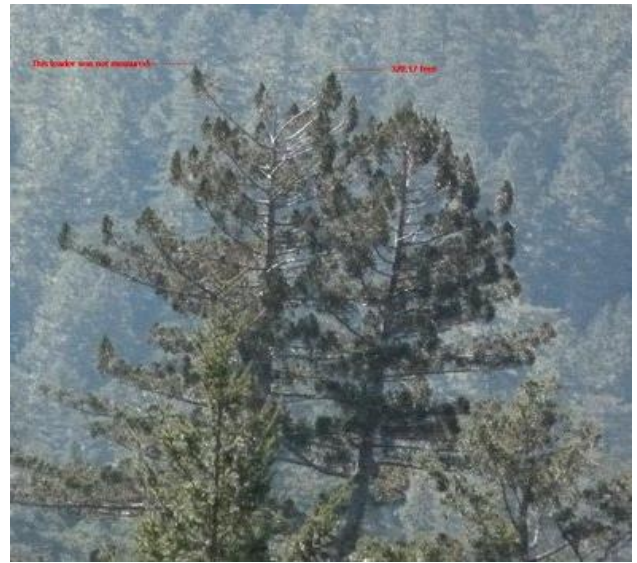
ht(m)	ht(ft)	dbh(m)	dbh(ft)	
115.66	379.46	4.84	15.2	Hyperion
114.73	376.41	4.96	16.0	Helios
113.48	372.30	5.18	17.0	Stratosphere
113.14	371.19	3.78	12.4	Icarus
113.05	370.89	4.39	14.4	Nugget
112.88	370.34	3.90	12.8	Paradox
112.83	370.17	4.84	15.2	Rockefeller
112.79	370.04	4.54	14.9	Lauralyn
112.78	370.01	4.33	13.7	Orion



columnar trunk of Rockefeller Tree



my wife Conni under the Rockefeller Tree



Top of Rockefeller Tree from 1000 feet.



Left leader was not measured. Right lead measured to 370.17 feet

[Black River Valley, WI \(Re: Massasoit, MTSE, MA\)](#)

by **Larry Tucei** » Sat Mar 10, 2012 1:51 pm

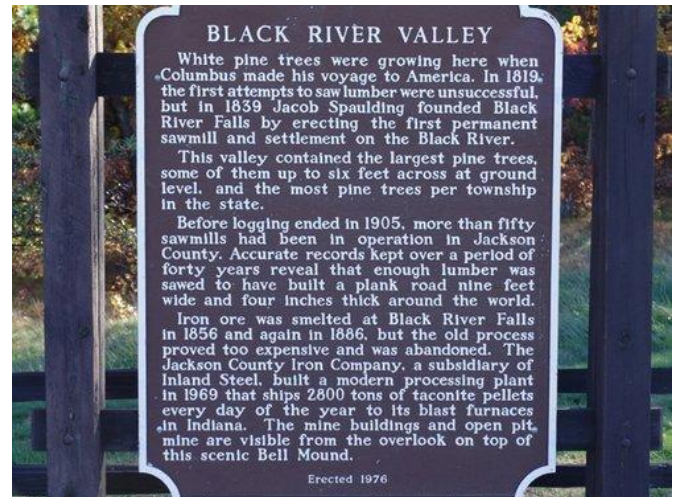
I'll never forget the first time I saw some Whites up in Wisconsin back in 2001. I was like a kid in a candy store and just enjoyed the heck out of them. I have to go and see the Cathedral Pine area. That would really be a special place, it's about 2-3 hours out of my way on the trip up but would be worth it. Paul Jost did a post on them back in 10.

viewtopic.php?f=132&t=1320

Bob, I'm positive that Wisconsin's and Michigan's great whites matched those of New England in pre-colonial times, and maybe they would have been even larger than the trees in New England. I know the Black River Valley area may have contained perhaps as many as 500 hundred thousand - a million whites before they clear cut them in the mid to late 1800's. I remember on a sign there at an observation point that stated just the White Pine lumber cut from this one valley could have built a road around the world. I took theses back in 07. I wish I knew how tall they would have been perhaps as high as 170-200 we may never know. White Pines once ruled the Northlands! Larry



Black River Valley White Pine Remnants



Sand Live Oak-*Quercus geminata* vrs Live Oak *Quercus virg.*

by **Larry Tucei** » Sat Mar 10, 2012 2:13 pm

NTS, There are many Sand Live Oaks growing in Coastal Ms. The tree that I measured today grows in Gulfport on Teagarden Rd. The photos show two Sands near each other I measured the largest of the two trees. Whats cool about this tree is that right across the road grows a Live Oak which gives you a good visual on the differences of the two species. Live Oaks all over the Coast are in the process of renewing their leaves while Sand Live Oaks are not.

Notice the full dark green leaves on the Sand verses the new growth on the Live in the one photo. This is the largest Sand Live Oak that I have measured to date. CBH- 10' 5", Height-48' and Spread less than 50'. http://en.wikipedia.org/wiki/Quercus_geminata
Larry Tucei



Quercus g. and Quercus v.



Quercus geminata



Quercus v.



Quercus g.



Quercus g. bark



Quercus g. leaves

[Maple Leaves, a song from my Soft Echoes cycle](#)

by **michael gatonska** » Thu Mar 15, 2012 4:50 pm

Hi ENTS;

I am finishing up a cycle of 8 songs for voice and piano that will be recorded this coming May 2012.

As part of the commission, I had to compose songs that echo the American sentimental song tradition, (Foster, Ives). The words of each song either celebrate or lament our natural world.

I don't know if any of the songs will make the Hit Parade, but I thought to include one here as a PDF attachment.

Anyone who feels like tickling the keys, or exercising the vocal chords may print out a copy and give it a try.

Maple Leaves for voice & piano, composed in February 2012:

 [MGatonska Songs Maple Leaves March 2012.pdf](#)

Michael Gatonska

[338 point willow oak in Efland, NC](#)

by **pdbbrandt** » Sat Mar 10, 2012 1:41 pm

Hi NTSers,

I wanted to report on a great willow oak that has quickly become one of my favorite trees. The oak marks the boundary between family-owned farmland on one side and a state highway on the other. It is unusual in that there are no trees around it anywhere near its size and grandeur, which makes me especially grateful to all those who have preserved and nurtured it over the last 150 plus years. The tree is outside the small village of Efland, NC. It is a whopping 18 feet, 8 inches in circumference, has an average crown spread of 88 feet, and is 91 feet, 10 inches tall as measured yesterday by tape drop and pole extension to the top. That gives it a big tree point value of 338. It is along a small stream lined by winged elms and briers. Here are some pictures taken over the last couple of months during a few visits to the tree including the height measurement climb yesterday just as the buds are bursting (see last picture below). My daughter, Sarah (future NTSer) is in some of the pictures.





You can see the rest of the pictures at:
<https://picasaweb.google.com/104169991047006250960/EflandWillowOak?authuser=0&authkey=Gv1sRgCIOVmMeHyq6TSA&feat=directlink>

Patrick Brandt



Frazer Forest, Atlanta, GA

by **eliahd24** » Sat Mar 10, 2012 11:33 pm

Frazer Forest is a ~30 acre mature hardwood (dare I say "old growth") forest in the Lake Claire/Druid Hills neighborhood of Atlanta, GA. It's about halfway between city of Atlanta and city of Decatur.

It lies in a ecologically rich section of the metro-area that has numerous rich, old forests within a 1.5 mile radius including Fernbank Forest, Deepdene Forest, Parkwood Park, Lullwater Nature Preserve, and numerous forest pockets at Emory University. This forest is high in the watershed (around 1000' elevation), with the southern sections of the forest lying only 1/2 mile (as the crow flies) from the eastern subcontinental divide- a natural ridge line that bisects Atlanta. There is a perennial creek that average less than 6" deep in most places, but always has flowing water. The creek runs due North, then bends Northeast. On either side of the creek are rich hilly slopes, and also flat spots of floodplain that are well protected.

Frazer Forest and the nonprofit Frazer Center (which owns the forest and grounds) has an interesting history. The grounds were formerly the sprawling estate of Cator Woolford, the founder of (what is now known as) the Equifax company in Atlanta, GA. Mr. Woolford maintained an expansive and impressive landscape known as the "Secret Gardens". In 1949, the property was sold and buildings were converted to schools and facilities serving populations with cerebral palsy. Today the Center continues to serve both adults and children with disabilities. While working at Fernbank Museum of Natural History (2005-2011), I had the opportunity to partner with the Frazer Center and lead forest walks for summer camp students. I also assisted in multiple invasive plant removal projects with high school service learning groups. But what was perhaps the most fun for me was exploring the deeper reaches of the forest and consequently discovering, identifying, measuring, and nominating numerous Atlanta Champion Trees.

Today I had the chance to visit Frazer Forest with my 2 nieces. It was 60 and sunny- perfect for exploring the woods. Also the leaves are beginning to bud out,

so my tree hunting season is coming to a quick and sudden end here in the deep south. Wildflowers are popping up everywhere and plentiful recent rains have kept the forests rich and moist.

Here's a recap of what I found today and also highlights from previous trips to Frazer Forest.

Tall/Big tree list:

LiTu 13'6" x 149.6'
 LiTu 15'5" x 127.2' (single trunk GIANT with blown out top- city co-champion)
 LiTu 14'0"
 LiTu 13'5"
 LiTu 13'2.5" (one of a pair that look like the much photographed twin tuliptrees at Joyce Kilmer)
 LiTu 12'2"
 LiTu 12'1"
 LiTu 11'3" x 142'
 LiTu 19'3" (3 distinct trunks fused near ground level)
 QuAl 8'4" x 143.2' (now dead - 170+ annual rings @ 40' above ground), was tallest in Georgia
 QuAl 8'0" x 134.4' (living tree)
 LiSt 9'5" x 134.8'
 QuRu 11'5" x 133.6'
 PiTa 8'1.5" x 130.5'
 FaGr 8' (?) x 125.7'
 FaGr 10' x 121.9'
 CaGl 6'9" x 124.6'
 PiSt 6'0.5" x 123.8' (rare forested specimen in Atlanta)
 QuFa 10'1" x 122.2' (2nd tallest in Atlanta, one of tallest measured in GA)
 TiAm 6'1.5" x 115.3'
 FrAm 6'1" x 112.8"
 CaCo 6'2" x 110.4'
 TsCa 5'3.5" x 98.1' (planted)
 JuVi 4'3" x 74.4' (two planted specimens flanking entrance- tallest in Atlanta)
 OxAr 3'4" x 65.6'
 MaTr 1'10" x 62'
 ILOp 2'8" x 54.5' (large grove of 50' tall hollies)
 CaCa 2'0" x 49.3'

Rucker 10 Index: **130.3** (129.4 with living QuAl)

Smaller species:

Rhododendron maximum- 9" cbh x 15.6' tall x 21.5'

spread (city champion)

Cercis canadensis- 3'6" cbh x 27.4' tall x 36' spread

(city champion runner-up)

Lindera benzoin- 6" x 16.9'

Amelanchier arborea- 1'3" cbh x 23.4' tall x 20.5'

spread (city champion)

... and now for the pictures...



me and the twins



white oak seedlings were EVERYWHERE!



Tulip twins



tallest white pine in Atlanta



rue anemone blooming yesterday



paw paw forest (fall color 2010)



log bridge



forest buddies



chanterelle (photo from June 2011)



HUGE northern red (?) oak leaf



150' tulip tree



My junior tree hunters

~Eli Dickerson

Howland's Island, NY

by **Jess Riddle** » Sun Mar 11, 2012 12:53 am

Ents, I had a chance about a week ago to revisit Howland Island, measure several trees I had previously seen, and explore a few new areas. Once again, the diversity of forests struck me as remarkable for the latitude. Some post-agricultural areas are dominated by white ash, but others are nearly pure stands of bitternut hickory. Other second growth upland areas are dominated by black cherry, tuliptree, or quaking aspen, and sugar maple still dominates some slopes. I had thought all of the floodplain areas were strongly dominated by freeman maple, but a swamp at the north end of the island has abundant yellow birch and green ash with scattered hemlocks. I also found that the population of the state rare shellbark hickory is much larger than I had previously realized. In total, I counted 45 native tree species and 13 exotics, several of which are native to the surrounding area.

Perhaps the most surprising sight was two small groups of pin oaks. One group grows at the end of a row of Norway spruce, but the other grows at a non-descript location in a flat, second-growth forest. The species is not reported from that part of New York, so it would be a significant find if they are native.

However, I doubt that is the case. The two stands cover less than an acre combined, and all the trees appear the same age. The stands are also not in swampy areas, but grow in association with aspen, tuliptrees, and a few sugar maples. Drainage may still be relatively poor, but is clearly better than on many parts of the island.

Species	Common name	Cbh (in)	Height (ft)
<i>Acer saccharum</i>	Maple, Sugar	86	111.7
<i>Carya cordiformis</i>	Hickory, Bitternut	92	119.6
<i>Carya cordiformis</i>	Hickory, Bitternut	85	117.8
<i>Carya ovata</i>	Hickory, Shagbark	71	114.7
<i>Carya ovata</i>	Hickory, Shagbark	66	111.1
<i>Fraxinus americana</i> var. <i>americana</i>	Ash, White	72	112.6
<i>Fraxinus americana</i> var. <i>americana</i>	Ash, White	76	111.0
<i>Fraxinus nigra</i>	Ash, Black	46	87.1
<i>Juglans cinerea</i>	Butternut	71	96.8
<i>Juglans cinerea</i>	Butternut	73	95.0
<i>Liriodendron tulipifera</i>	Tuliptree	74	126.2
<i>Liriodendron tulipifera</i>	Tuliptree	81	125.7
<i>Magnolia acuminata</i>	Magnolia, cucumbertree	41	92.3
<i>Platanus occidentalis</i>	Sycamore	96	121.1
<i>Platanus occidentalis</i>	Sycamore	111	112.4
<i>Populus deltoides</i>	Cottonwood, eastern	138	118.2
<i>Populus tremuloides</i>	Aspen, Quaking	48	96.9
<i>Prunus serotina</i>	Cherry, Black	97	113.5
<i>Prunus serotina</i>	Cherry, Black	84	110.1
<i>Quercus rubra</i>	Oak, Northern Red	84	112.2
<i>Quercus rubra</i>	Oak, Northern Red	93	109.2
<i>Tilia americana</i>	Basswood, American	93	112.5
<i>Tilia americana</i>	Basswood, American	75	107.5
<i>Ulmus americana</i>	Elm, American	100	106.1
<i>Ulmus rubra</i>	Elm, Slippery	70	100.8
<i>Ulmus rubra</i>	Elm, Slippery	63	99.4

Howland Island Measurements

Rucker Index	117.98
<i>Liriodendron tulipifera</i>	126.2
<i>Platanus occidentalis</i>	122.6
<i>Carya cordiformis</i>	120.7
<i>Populus deltoides</i>	120.3
<i>Robinia pseudoacacia</i>	118.8
<i>Acer x freemanii</i>	115.5
<i>Carya ovata</i>	114.9
<i>Pinus strobus</i>	114.3
<i>Prunus serotina</i>	113.9
<i>Fraxinus americana</i>	112.6

Howland Island Rucker = 117.98

The range of heights contributing to the Rucker Index is surprisingly small. The quaking aspen, a severely undermeasured species, may be the tallest relative to what we have previously documented.

Jess Riddle

Re: Howland's Island

by **lucager1483** » Sun Mar 11, 2012 12:47 pm

Jess, Dad gummit! I was there on the Island a week ago Thursday and Friday, I think. The trips were not planned-just a spur of the moment thing, so I didn't think to contact you beforehand. I wish I had. We might have even been there at the same time, which would have been weird. I do have a couple of observations about your post, as well.

First, I'm encouraged by your discovery of hemlock and yellow birch. I've not been to the extreme north end of the island, just to the termination of the last trail going in that direction. I've spotted two individual white birches, probably about two miles apart, but no yellow. Across the road from the western entrance, the forest (private and gated, with no trespass signs) looks to hold lots of hemlock, white pine, and some American chestnut, so I figure there might be some chestnut on the island, too, but haven't found it yet. The northern tip of the island sounds like a likely place.

Second, I thought I'd spotted some Cucumber magnolia leaves on the ground on my last visit but couldn't find the source. I'm glad you identified some. What general area were they in?

Third, I measured a cottonwood near the river on the east side to just over 120'. I haven't found any trees taller than that, but I'm pleased that you have. I also remeasured the big red oak on hickory hill to the following dimensions: 99.11' high; 20'3" cbh; 85.95' average crown spread. I had previously measured the height at just over 93' from a different vantage point, had only measured the cbh on the lower side (not mid-slope), and had not measured the crown spread. *Quercus rubra* seems to grow really well out there.

Congrats also on the tall tulips, the slippery elms, and especially the pin oaks. Thanks for sharing.

Elijah Whitcomb

The Discontinuous Range of the Atlantic White Cedar

by **samson'sseed** » Sun Mar 11, 2012 10:54 am

I was doing research for the next topic on my blog which is going to be about Beech-Magnolia Bluff forests. I came across something interesting that I hadn't noticed before.

There's a big geographical gap between the eastern and western populations of Atlantic white cedar with a few relic populations in between.

So, I've formulated a hypothesis for this ecological anomaly.

Atlantic white cedar likes to grow on acidic bogs. However, the tree can't survive prolonged flooding. Nor can it survive repeated fires which kill adults and seedlings.

During the Last Glacial Maximum and for much of the Ice Age, the climate was cooler and drier than it is today. This meant that there were fewer thunderstorms. Fewer storms led to fewer lightning-induced forest fires and no flooding. However, the cooler climate meant evapotranspiration rates were lower, and areas with poorly drained soils became bogs--the perfect habitat for white cedar. After the Ice Age ended, an increase in forest fires, flooding, and evapotranspiration rates eliminated white cedar habitat in between the eastern and western populations.

There is solid fossil evidence proving Atlantic white cedar did grow in the geographical gap. It has been excavated from Cahaba Pond in northeastern Alabama.

My blog entry about this is <http://markgelbart.wordpress.com/2012/03/11/the-discontinuous-range-of-the-atlantic-white-cedar-chamaecyparis-thyoides/> but the above synopsis covers the gist of it.

Samson's Seed

Re: California wolf trek shows importance of wilderness

by **Rand** » Sun Mar 11, 2012 3:13 pm

lucager1483 wrote: It would sure be nice if there was an easy solution to this problem-maybe wildlife bridges or tunnels or something-but it seems that civilization and nature will always be at odds with one another. My personal philosophy is to do as little harm as possible while also enjoying the nature around me, and trying to help out when I can. That might sound kind of amorphous, but it's the best I've come up with so far.

There are actually a scattering of wildlife bridges around. Here is a picture of one in the Netherlands from Wikipedia:



http://en.wikipedia.org/wiki/Wildlife_crossing

As one might guess they are quite expensive to build, but can pay for themselves if they reduce damaging collisions with vehicles:

In North America, such large-scale projects are less common; yet the most iconic works of ecological road infrastructure in the world are the six massive wildlife overpasses lining the Trans-Canada Highway in Banff National Park. The overpasses are part of a larger system of ecological infrastructure that Parks Canada began developing in the early 1980s to address concerns about increased traffic and collisions between vehicles and large mammals. The expansion of the crossing system coincides with the phased "twinning" or widening of the Trans-Canada Highway. Ongoing, year-round monitoring by the Banff Wildlife Crossings Project has proven the crossings' effectiveness at reducing wildlife

mortality, and it is also informing the implementation for future phases of the highway expansion. [3]

Unfortunately, the monumental overpasses come with an outsized price tag. Parks Canada constructed the first two overpasses at Banff in 1997 for roughly \$2.5 million USD each, but the cost for the four additional overpasses last year shot up to between \$4.5 and \$5 million USD each. The high cost has hindered widespread use. Nonetheless, cost-benefit analyses increasingly include potential financial savings from the \$8 billion in property damage that, according to the Federal Highway Administration, results annually from animal-vehicle collisions in the U.S.

<http://places.designobserver.com/feature/road-ecology-wildlife-crossings-and-highway-design/29498/>

Here's a more general article that discusses other devices besides bridges

<http://www.mto.gov.on.ca/english/transtek/roadtalk/rt16-4/index.shtml#a6>

Rand Brown

Re: Good online field guide for southern pines?

by **Don** » Mon Mar 12, 2012 3:12 am

While more inclusive maybe than you might want, Virginia Tech has a nice online field guide. If you know your species, look them up directly in the list of scientific/common names, or alternatively you could use their clickable map and select by state. Check it out at:

<http://dendro.cnre.vt.edu/dendrology/syllabus/biglist/framegymno.cfm>

I like it for it's multiple ways of identifying the tree's features, region, etc. Works very well for Alaska, enough that I use it in my Alaska Big Tree Webpage for Alaska species.

Don Bertolette

Fagus grandifolia.- canopy view by Andrew Joslin



Advanced Tree Measuring Workshop April 18-19, 2012 (Cook Forest, PA April 18-19)

by **djluthringer** » Wed Mar 14, 2012 1:00 pm

NTS, We've finalized the schedule for the Advanced Tree Measuring Workshop to be held at Cook Forest State Park on 4/18-19/12. American Forests, Laser Technology, Inc., and Dr. Joan Maloof from the Old Growth Forest Network are just some of the dignitaries that will be presenting. If you are interested in attending, please e-mail directly to register at : djluthringe@pa.gov

Accommodations in Cook Forest can be found at:

<http://www.cookforest.com/businessdirectory/lodging.cfm>

http://www.pa.reserveworld.com/SelectCampArea.aspx?PK_ID=6202

or at any of the local hotel chains in the Brookville or Clarion areas.

A park map can be downloaded at:

http://www.dcnr.state.pa.us/ucmprd1/groups/public/documents/document/dcnr_004777.pdf

The day two schedule follows:

Advanced Tree Measuring Workshop
April 18-19, 2012

Cook Forest State Park, in conjunction with the Native Tree Society (NTS), will host a two-day Advanced Tree Measuring Workshop to the public and forest resource professionals focusing on learning the latest and most accurate methods of measuring big, tall, and noteworthy trees of Cook Forest and the Eastern United States.*

Join members from NTS, American Forests, and Laser Technology, Inc. (LTI) as we learn various methods and accuracies of measuring trees using the traditional tangent based methods with tape & clinometer and similar triangles, and comparing them to sine based methods using clinometer and laser rangefinder. We will also learn the external baseline method, tripod corrections, diameter measurements, crown spread and crown area calculations with the following instruments: LTI TruPulse 200 and 360, LTI RD 1000 Relascope-Dendrometer, and Macroscope 25/45.

April 18

900am-915am - 'Opening Remarks', by Dale Luthringer (Environmental Education Specialist Cook Forest State Park-EES CFSP), meet at the Log Cabin Inn Environmental Learning Classroom.
915am-1015am - 'Dendromorphometry: The Art and Science of Measuring Trees in the Field' Part of the mission of the Native Tree Society is to develop ever

more accurate methods for measuring the dimensions of trees. This involves testing new equipment, developing mathematical models and measurement protocols, and analyzing the sources of measurement error. Join co-founder and Executive Director of NTS, Robert Leverett, at the Log Cabin Inn Environmental Learning Classroom, as he takes us through the methods developed and used by the members of NTS, and shares the successes that NTS members are enjoying.

1015am-1030am - BREAK (refreshments provided)

1030am-1230pm - 'Dendromorphometry: Methods & Materials', by Robert Leverett, Dale Luthringer, Laser Technology, Inc. (LTI), and other NTS members, meet at the Log Cabin Inn Environmental Learning Classroom. Learn the latest tree measuring methods by comparing the old ways and learning the new with hands-on training using various measuring equipment in the field.

1230pm-100pm - LUNCH (please bring a lunch)

100pm-430pm - 'Measuring the Giants', by Dale Luthringer, Robert Leverett, and other NTS members, meet at the Log Cabin Inn Environmental Learning Classroom. Join us for an interpretive hike to re-measure the Seneca Pine, largest known white pine by volume in the state at nearly 11,500 board feet, and the Longfellow Pine, tallest known tree north of the Great Smoky Mountains, last listed at 184.7ft high!

430pm-630pm - DINNER (please enjoy dinner at one of our local area restaurants)

630pm-645pm - 'Evening Lecture Series Opening Remarks' Dale Luthringer, EES CFSP, at the Sawmill Center for the Arts Classroom.

645pm-730pm - 'Noteworthy Old Growth Forests of Western Pennsylvania' Dale Luthringer, EES CFSP, at the Sawmill Center for the Arts Classroom.

730pm-745pm - BREAK (refreshments provided, review resource material tables provided by LTI, American Forests, and the Old Growth Forest Network)

745pm-830pm - 'American Forests Big Tree Program' Sheri Shannon, Education & Outreach Manager for American Forests, at the Sawmill Center for the Arts Classroom

830pm-845pm - BREAK (refreshments provided, review resource material tables provided by LTI, American Forests, and the Old Growth Forest Network)

845pm-930pm - 'The Old-Growth Forest Network: America's Next Idea' – Dr. Joan Maloof, professor emeritus Salisbury University

April 19

900am-300pm - 'Dendromorphometry: Practical Application', by Dale Luthringer, Robert Leverett, and other NTS members. Meet at the Log Cabin Inn Environmental Learning Classroom where we will likely car-pool to old growth forest & big tree hotspots in the park for a strenuous, often off-trail, interpretive hike to search for new big/tall tree records and re-measure old champions. The following noteworthy trees are on the "bucket list": Feather Duster-10.9ft CBH x 174ft high, Cook Pine-12.5ft CBH x 162.3ft high, Gyasuta Pine-11.6ft CBH x 164.3, Burl King-11.1ft CBH x 158.5ft high, Cornstalk Pine-13.8ft CBH x 136.2ft high, Seneca Hemlock-tallest known hemlock in the Northeast, at 12.1ft CBH x 147.6ft high, and the two tallest known black cherries in the Northeast at 11.6ft CBH x 138.7ft high and 8.8ft CBH x 140.7ft high. Please pack a lunch & bring plenty of water.

*Cost is free, but registration required. To register, please contact the Park Office at (814)744-8475 or e-mail directly to dluthringe@pa.gov

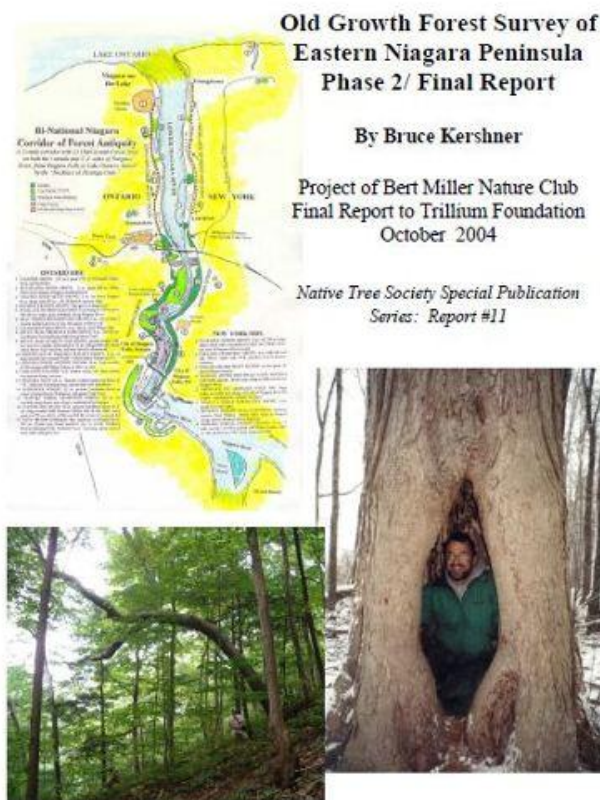
 [ATMW.pdf](#)

Old Growth Forest Survey of Eastern Niagara Peninsula

by edfrank » Mon Mar 12, 2012 5:42 pm

Old Growth Forest Survey of Eastern Niagara Peninsula, Second Phase/ Final Report, a Project of Bert Miller Nature Club and the Ontario Trillium Foundation by Bruce Kershner

NTS Special Publication #11



When the Old Growth Forest Survey of Eastern Niagara Peninsula began, discoveries of Old growth Forest sites was fully expected. After two years of extensive surveying, the findings have gone far beyond the goals. A total of 55 Old growth Forest sites were discovered, totaling 839 acres. These are distributed over 11 cities and towns within Niagara Regional Municipality, from the Niagara River west to as far as Grimsby. The largest is 210 acres (Navy Island), and 5 others are 40 acres or larger. One site, the Niagara Gorge, is filled with, or lined with, 8 different Old growth Forests totaling 195 acres

(Ontario side only).

Full Document 41 MB

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth.pdf

Seven Parts:

A-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_01.pdf

B-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_02.pdf

C-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_03.pdf

D-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_04.pdf

E-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_05.pdf

F-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_06.pdf

G-

http://www.nativetreesociety.org/specialreports/niagara/Niagara_peninsula_old_growth_07.pdf

The Phase 1 Report "**Old Growth Forest Survey of Niagara Peninsula, Phase 1**" was published in 2003. It is available for download here:

Old Growth Forest Survey of Niagara Peninsula
Project of Bert Miller Nature Club
First Phase Report to Trillium Foundation
October 2003

<http://www.bertmillernatureclub.org/assets/docs/library/OLD%20GROWTH%20FOREST%20SURVEY%20OCTOBER%202003.pdf> 42 MB

Gautier Ms. Old Place Plantation Oak

by **Larry Tucei** » Tue Mar 13, 2012 9:42 pm

NTS, The 1st annual antique fair was held at the Old Place in Gautier on Sunday March 11. The Old Place Plantation was the home of Fernando Upton Gautier who in 1867 had a thriving lumber business here.

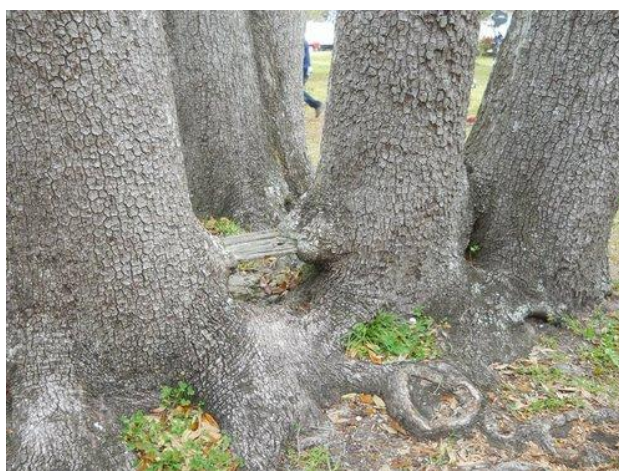
The Plantation is located on a ridge 12-15' above the West Pascagoula River approx. 800' in length. It is the only remaining Plantation in the city. The home was built in French style from that period with a wraparound porch on three sides.

The 21 acre property has approx. 100 Live Oaks in the 100-150 year old range with two trees approaching 200. One of the two had major limb damage and was but a shadow of its former self. The damaged tree had a large trunk of 20' CBH but limbs sheared off at 15' above ground level. I measured the other large tree and named it the Gautier Plantation Oak. The tree grows on the northeastern corner of the property about 100' from the river. Its measurements were CBH-20' 10", Height-57' and Spread- 110' x 105'. A smaller Live Oak on the listing but still a big tree. Lets look at the tree and the house with a nice Azalea added to. There was also a cypress bench placed between two Live Oak trunks on a clump of 4 and the trees had grown over it time. Larry



Gautier Plantation Oak





Bench in Live Oak Trunks

VORTEX SOLO R/T 8 x36

by dbhguru » Wed Mar 14, 2012 5:40 pm

NTS, I began testing my new monocular, the VORTEX SOLO R/T 8 x 36 today. I have a MACROSCOPE 25 AND 45 and have reported on their use many times in the past. I am willing to state that the VORTEX is the better buy. The stadia marks are easier to see and there are more of them. Both vertical and horizontal scales are provided, and you can focus both the target and the reticle. It is win, win. My experiment today involved 10 trials with target distances up to 98 feet. I used a set of calipers to determine the figure to compare to. The average difference between the caliper measurement and the SOLO measurement was 0.1829 inches.

I intend to expand the testing to include the RD1000, MACROSCOPE 25, MACROSCOPE 45, VORTEX SOLO, and the TruPulse 360 under a range of conditions and distances. I'll dutifully continue reporting the results.

Robert T. Leverett

The Wilderness Society Announces New President

by PAwildernessadvocate » Wed Mar 14, 2012 2:38 pm

<http://wilderness.org/content/jamie-wil...-president>

Western conservation leader Jamie Williams chosen as new Wilderness Society president

MARCH 5, 2012
BY NEIL SHADER

The Wilderness Society announced today that it has chosen western conservation leader Jamie Williams, who comes to Wilderness from The Nature Conservancy, as its new president. At The Nature Conservancy Williams served as Director of

Landscape Conservation for North America, where he led that organization's effort to protect large landscapes, primarily in the western United States.

"In our search for a new president, Jamie Williams was far and away the best candidate, with a track record of outstanding achievement and a well-earned reputation for succeeding in every endeavor," said Wilderness Society Governing Council Chair Doug Walker. "Jamie is a high-impact leader who has a deep understanding of our issues and who knows how to get exceptional results."

Williams brings a wealth of experience to The Wilderness Society. At the Nature Conservancy, Williams helped develop the large landscape focus within the Obama administration's America's Great Outdoors Initiative, and spearheaded critical efforts to secure conservation funding in Congress, among many other accomplishments.

"Jamie has been a great colleague and a great conservation leader at The Nature Conservancy," said Mark Tercek, President and CEO of The Nature Conservancy. "We will miss him but of course look forward to working closely with him in his new role at The Wilderness Society as we tackle important conservation opportunities together."

Williams has held numerous leadership positions over his 20 years at The Nature Conservancy, including Northern Rockies Initiative Director and Montana State Director. He also has been recognized for his outstanding work with awards from the Land Trust Alliance and the U.S. Fish and Wildlife Service, among many others.

"I am thrilled to be chosen to head this organization, which has been the leader in public lands conservation for more than 75 years," said Williams.

"I am a strong believer in a collaborative, community-based approach to conservation, and that's one of the many areas where The Wilderness Society has been a true innovator. This is a tremendous opportunity to protect the majestic wild places that help define us as a nation."

In addition to his work at The Nature Conservancy,

Williams is a founder of The Montana Association of Land Trusts, a founder of the Heart of the Rockies Initiative, and has served on the Board of the Colorado Coalition of Land Trusts and as Co-Chair of the Yampa River System Legacy Project.

"Jamie has been a huge help to our community's effort to conserve the Blackfoot Valley because he took the time to listen and work with us on a common vision for landscape conservation," said Jim Stone of Blackfoot Challenge in Montana. "I have full confidence that he will lead The Wilderness Society with the same kind of collaborative spirit to help local communities like ours sustain special places through strong partnerships."

Williams received a Bachelor's Degree in American Studies from Yale University and a Masters of Environmental Studies from The Yale School of Forestry and Environmental Studies. He was also a wilderness instructor for the National Outdoor Leadership School.

"Jamie Williams has an extraordinary combination of inspiring leadership and a relentless focus on protecting our nation's wild places," said Bill Meadows, who announced that he would be stepping down as president of The Wilderness Society in October 2011. "I am so pleased that Jamie will be at the helm as The Wilderness Society continues its outstanding work to protect our nation's public lands."

The Wilderness Society online:

<http://www.wilderness.org>

[Tsuga canadensis Soundscapes in Litchfield, CT](#)

by **michael gatonska** » Thu Mar 15, 2012 5:21 pm

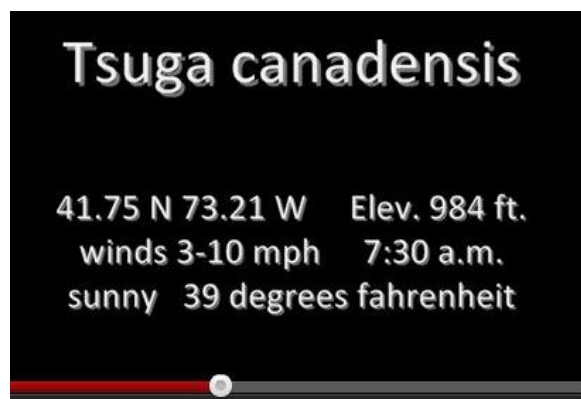
Hello ENTS:

On March 6, 2012 I left at 5:00 am to drive to Whites Nature Preserve in Litchfield, CT. I arrived around 6:00 am; according to the National Weather Bureau it was 38 degrees fahrenheit. During the course of the day, which was sunny, the temperature rose to 55 degrees. Winds were 3-10 mph. 41.75N 73.21W Elevation 984 ft.

Armed with my parabolic dish, stereo and surround sound microphone and a thermos of hot tea (no rum), I hiked out to the old-growth hemlock grove. By 6:30 am I was recording, and conditions were optimum: although it was cold in the morning, it gradually warmed up and I came across only two other hikers during the course of the day. What I was not expecting, was the almost constant drone of airplanes.

During the course of the day I made approximately 34 recordings, and after some experiments I discovered that setting up the dish horizontally at the base of a hemlock was the best way to capture the ultrasonic swishes in the upper canopy. Unfortunately, I could not climb up there with my recording rig...

<http://www.youtube.com/watch?v=N31twdJL2OE>



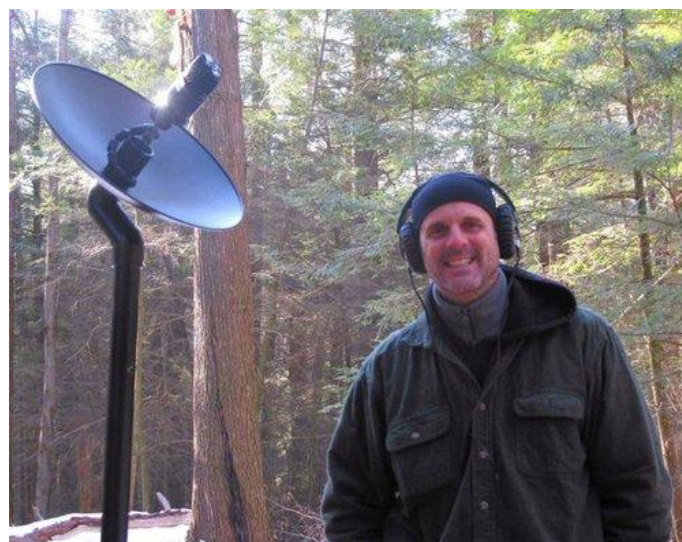
In any event, here is one of my finished recordings, *Tsuga canadensis*. As I finish each new recording, I

will be posting them on Eco Ear Soundscapes channel on YouTube. If you have a laptop, I strongly recommend using headphones.

<http://www.youtube.com/watch?v=C14xPoEjem4>



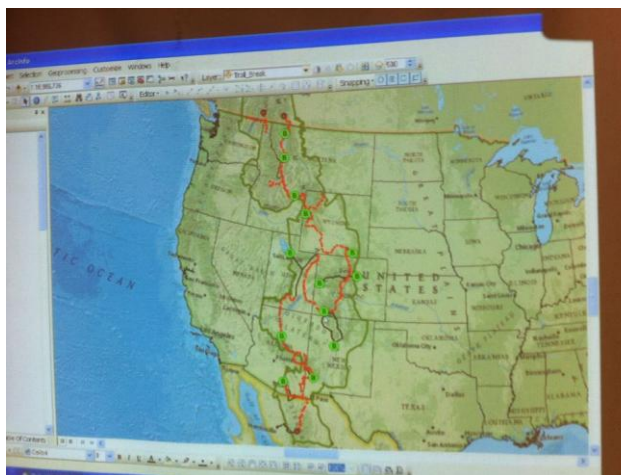
Here is a photo of me in the hemlock grove with my recording gear:



Michael Gatonska

Trek West

by **edfrank** » Fri Mar 16, 2012 11:06 am



John Davis
19 hours ago near Tucson, AZ

Western Wildway leaders are plotting a route for TrekWest in 2013. So far they have us going at least 4000 miles over & through Rocky Mountains, with dozens of conservation and recreation groups, promoting habitat connections.

CBH versus diameter?

by **pdbrandt** » Thu Mar 15, 2012 7:30 pm

NTS, being new to measurement I've often wondered why trunk size is sometimes measured as circumference/girth and at other times as diameter. It seems that the largest trees are reported as diameter.

Are there any other times when diameter or circumference are preferred?hanks,

Patrick Brandt

Re: CBH versus diameter?

by **dbhguru** » Thu Mar 15, 2012 8:05 pm

Patrick, we use both for a variety of reasons. Circumference or girth is a direct measurement from a tape. That makes it attractive to those of us who specialize in the math. By contrast, diameter may or may not be directly measured. If calipers are used, you get a trunk thickness measure at a point on the trunk. If you work your way around the tree, you may come up with different thicknesses. A diameter measurement obtained from a D-Tape is actually the circumference divided by PI. Sometimes it is expressed as average diameter. If the tree's trunk is elliptical in shape, then using the computed diameter or D-Tape result (the same) would over-estimate the cross-sectional area. The more out-of-round the trunk, the greater the area error. For a specified perimeter, the circular shape gives the maximum cross-sectional area.

Of course, lots of people relate to big trees through trunk width, spreading their arms to gauge size. Other people lock hands and encircle the tree, thinking in terms of circumference. So, when we communicate with the public, we may use either. Also, the champion tree formulas use circumference instead of diameter. So, if we're computing big tree points using the conventional formula, we use circumference. Foresters prefer diameter. They think in terms of radial growth. Hope this helps.

Robert T. Leverett

Re: CBH versus diameter?

by **dbhguru** » Fri Mar 16, 2012 1:11 pm

Patrick, D-Tapes are used by foresters. The tapes have two scales. One side is a regular linear tape and the other is a linear scale expressed in units of PI. A reading on the diameter side of 1.0 corresponds to 3.141593 linear feet. For small plantation conifers and many small plantation hardwoods, the D-Tape is very efficient. It loses its meaning on really big, out-

of-round trees, especially near the base where root flare can create forms widely departing from the circle. In these cases, much more complex modeling is needed to determine such thing as cross-sectional area.

Some trunks are more elliptical than circular. The area of an ellipse as compared to a circle of the same perimeter is smaller - the more elliptical, the greater the disparity. This can be taken into account readily, if you can get measurements of the widest and narrowest part of the ellipse. We call the radii equivalents the semi-major and semi-minor axes. In a circle, they would be the same. If a = semi-major axis, and b =semi-minor axis, the area of the ellipse is given by the simple formula $A = \pi \times a \times b$.

Some trunks on hillsides can be somewhat teardrop shaped. Calculating the cross-sectional area of this kind of shape is complicated. It can be approximated from two width measurements, but the calculations are messy. I won't show them here unless someone is interested.

Robert T. Leverett

average out to a pretty fair approximation of the trees cross-sectional area at the point where it was cut.

Not that Bob and Ed are recommending cutting trees down to measure them accurately, they are suggesting comparative ways of measuring trees. In searching for superlative trees, for the pleasure of seeing the biggest, tallest, most volume, etc., they are stopping short of consumptive appreciation that loggers also get in cutting down the biggest, tallest, etc., tree.

I'm speaking tongue in cheek of course, as both Bob and Ed have put forth very good explanations for the comparative values of measuring diameter and circumference. But put on your thinking cap when following them as they discuss measuring a trees volume. Members here have come up with some pretty amazing 'non-consumptive' means of obtaining a tree's volume!

Don Bertollette

Re: CBH versus diameter?

 by **Don** » Fri Mar 16, 2012 2:28 pm

Patrick- In the simplest analysis, as you approach a tree from afar, it presents itself to you in two-dimension, height and width (either of crown or base). Width, once the tree has been approached closely enters a third dimension, depth, and diameter in this context is a natural way to express that 'width'.

As Bob and Ed point out above, that 'width' can be deceptive as it can vary depending on the tree boles roundness, and the direction you approach it from. Measuring girth doesn't provide information about 'out-of-roundness', just indicates the length of a tape it takes to surround it. An empirical method of measuring a tree's cross-section, if that level of accuracy is necessary, involves destructive sampling...measuring across a stump with enough repetitions to capture any out of roundness would

Lower Huron Metroparks

by **DougBidlack** » Fri Mar 16, 2012 3:10 pm

eNTS, I am going to use Lower Huron Metroparks to refer to three parks in the Huron-Clinton Metroparks system. The northernmost (upstream-most) of these parks is actually named Lower Huron Metropark and it is followed by Willow Metropark and finally Oakwoods Metropark. These three parks are adjacent to one another and a 15 mile hike-bike trail interconnects them very nicely.

Last Friday I met David Gruenawald at my parent's house in Milford and we drove down to Lower Huron Metropark to meet Doug Ham and his girlfriend Ashley. Doug just jointed NTS and he was interested in seeing some nice trees and learning how to measure them. It was a chilly morning right around the freezing point and it only warmed up to 37 degrees so we didn't stand around much. We were off to the best site that I've yet seen within the three Lower Huron Metroparks. Despite being less than 10 acres in size it contains the tallest known of seven tree species (within these parks) and if I were to calculate a Rucker 10 right now five of the top ten would be located in this little area. The seven tree species are tallest at this site are tuliptree, northern red oak, black walnut, silver maple, bur oak, basswood and hackberry. Doug Ham got to use the laser rangefinder to shoot straight up here and I think he was having a good time. Instead of walking back to the cars the way we came, we decided to do a big loop by crossing the river at a couple of bridges.

This allowed us to visit another high quality forest area where we debated the identity of a large, downed tree and we measured a beautiful walnut that I had somehow missed a year earlier. The walnut measured 11.84' x 111' shooting straight up. I had previously identified the downed tree as a green ash when it was still standing last year but I openly wondered about this ID. After much discussion I think Doug Ham and I both seemed convinced that it was indeed a green ash. David seemed less convinced. Here is a picture of David in the foreground and Doug Ham in the background with this tree.



The borer damage especially convinced us that this was green ash.



I measured this tree in February 2011 when it was still standing. It was 11.43' x 109.5' straight up. This is what it looked like then.



When we returned to the cars we decided to drive down to Oakwoods Metropark where we took a walk on big tree trail. Near the end of the walk Dave said that he found some young shellbark hickories and there were several larger ones that appeared to be the same species. He was identifying them by looking at the twigs. I have to confess that I don't yet know how to distinguish this species from shagbark hickory aside from the larger nuts of shellbark. Just before we left I measured the top of the nature center using the NTS methodology and then Doug Ham did it. It looks like Doug Ham will soon be getting a laser rangefinder and a clinometer. Very cool. Dave also surprised me by saying that he would at least like to get a laser rangefinder to search for tall trees. Is that great or what?



Dave also wanted to get together on Saturday to check out trees in the Pinckney and Waterloo State Recreation Areas but he was limping by the end of the day Friday due to his problems with plantar fasciatus (sp?) so he opted out. So I ended up going to Willow Metropark to try and finish up some exploring and measuring in that park. I especially wanted to check out a large green ash to compare it to what we saw the other day. Here are a couple pictures.



I couldn't measure the girth at 4.5' because the trunk was split at this point so I measured the diameter and came up with 3' 7" (calculated girth of 11.26').

Later in the day I found a cluster of trees that I think may be blue ash. They were all dead and most were on the ground. I would love some confirmation of species identity. Here are three pictures of one of the fallen trees.



I have identified blue ash with certainty from this area based on twigs of saplings and one large, open-grown tree...so I know they occur here. I just don't feel comfortable identifying the species on the basis of bark alone at this point.

I would very much like to give a Rucker Index at this point as well as some better background information on the parks but I first feel that I need to deal with some ID problems. I hope you can bear with me while I go through each one of these. I guess this first post can be thought of as the 'ash post'. So here is one more ash question...what is the following ash tree? Or is it even an ash? Here are three pictures from last year.

