



WHAT ARE MY TREES WORTH?

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Understanding the factors that determine the value of your trees

- Introduction
- Species
- Volume
- Quality Factors
- Harvest Costs
- Transportation Costs
- Inventory Costs
- Milling Costs
- Markets (Veneer, Lumber, Residues)
- Other



Species

- What type of trees do I have?
 - Different species have different values

Walnut

Hard Maple

White Oak

Cherry

Red Oak

Hickory, Ash, Soft Maple

Elm, Aspen, other



Volume

- Volume is a function of length and diameter
 - Trees are scaled by measuring DBH and merchantable height
 - Logs are scaled by measuring dib on the small end and length
 - Scale deductions are taken for rot, sweep, and other defects
- Different Log Rules
 - Scribner Dec. C- used in WI, MN, UP of MI
 - Doyle- Used in IA, IL and most other hardwood regions. Most walnut is scaled in Doyle



Quality

- Factors that determine quality
 - Past land use
 - Aspect
 - Soil type
 - Stand structure



Quality

- Quality is expressed by the grade of a log
 - Grades are determined by diameter, length, and number and type of defects
 - Veneer grades typically have the most value
 - Sawlog grades are derived from lumber grades



Harvesting Costs

- Operability
 - Road Work
 - Felling
 - Skidding
 - Landing sites



Transportation Costs

- Trucking Related Costs
 - Truck Costs
 - Fuel Costs
 - Repair Costs
 - Insurance Costs
- Prehauling?



Inventory Costs

- Cash Flow Management
 - What type of log supply is needed?
 - Winter
 - Breakup
 - Summer/Fall
- Down payments
- Interest rates



Milling Costs

- Capitol Investment
 - Buildings
 - Equipment
- Labor
 - Wages
 - Taxes
 - Workers Compensation
- Employee Benefits
- Other



Markets

- Veneer
 - Rotary vs. Slicer
 - Domestic vs. Export
- Lumber
 - Grades (Lumber, Ties, Cants)
- Residues
 - Sawdust
 - Bark
 - Chips



Other

- Sale Specifics
 - Volume
 - Species mix
 - Payment terms
 - Length of contract
 - Harvest restrictions
 - Potential hazards

Volume Estimate (Board Feet-Scribner Log Rule)

Species	#Trees	Diameter							Board Feet	
		12	14	16	18	20	22	24+	Total	Ave.
ash	32	0	1828	694	1736	336	0	0	4595	144
aspen	53	578	1490	3292	1656	908	0	0	7925	150
basswood	12	0	316	702	480	286	534	620	2938	245
cherry	4	0	247	0	74	0	0	0	321	80
elm	2	0	0	185	166	0	0	0	351	176
hackberry	4	0	228	344	0	0	0	0	572	143
maple, red	45	0	1457	1315	707	157	388	2520	6544	145
oak, red	68	0	1388	1491	1854	2177	1594	7022	15526	228
oak, white	40	0	773	857	951	1879	1268	2108	7836	196
Totals	260	578	7728	8880	7624	5744	3784	12270	46608	179
*Cordwood Estimate: Mixed Hardwood 165 cords										
*Cordwood estimate is derived from cruise data and from 1 cord/1000 board foot tally										

General Harvest Description:

This 27-acre harvest is on level and moderately steep terrain on loam soils. The northern two-thirds of the area is marked as a group selection harvest to favor a future all-aged structure. The southern one-third is marked as an improvement thinning. A few small oak mortality pockets have been marked for salvage and to slow disease spread. Ash and elm have been targeted for harvest due to Emerald Ash Borer and Dutch Elm Disease concerns. Aspen has been targeted due to its mature/overmature condition. Marked pulpwood/firewood and cull trees will be felled during the harvest operation or by the landowner post-harvest. Red oak quality is average to very good with an average volume per tree of 228 board feet. White oak quality is average to good and averages 196 board feet. Harvest access is generally very good. Some trail construction may be needed.

Conditions Specific to This Sale:

1. Logging operations are permitted only when the ground is dry or frozen.
2. Timber sale contract end date will be March 31st, 2020.
3. No harvest activity is permitted April 1 to July 15 due to oak wilt restrictions.
4. Harvest activity is permitted during the deer bow and gun seasons.
5. This sale is in the Managed Forest Law.

**** HARVEST MAP AND LOCATION ON REVERSE SIDE OF THIS PAGE ****

Species	#Trees	Diameter						Board Feet	
		14	16	18	20	22	24+	Total	Ave.
aspen	4	0	135	222	227	358	0	941	235
basswood	1	44	0	0	0	0	0	44	44
cherry	6	161	184	166	94	0	0	605	101
elm	6	138	330	0	0	0	0	468	78
hickory	2	69	0	166	0	0	0	235	118
maple, red	11	161	756	375	0	338	0	1630	148
oak, black	37	626	1123	1285	968	942	585	5529	149
oak, burr	3	83	95	0	0	0	0	178	59
oak, red	16	161	501	908	484	856	0	2910	182
oak, white	39	1251	1350	443	0	0	0	3044	78
walnut	1	0	0	0	0	398	0	398	398
Totals	126	2693	4474	3564	1773	2892	585	15982	127

General Harvest Description:

This approximately 15-acre harvest is located on moderately steep terrain on silt loam soils. All stands are marked as an individual tree/patch selection harvest. Approximately 75% of the volume is oak. There is also one good quality black walnut in the northwest part of the sale area. Access to harvest area is up driveway off Helgerson Hill Rd., up driveway (Mickley Dr.) then east beyond the house and buildings and east out the ridge top. Access to entire sale area is good from the adjacent field. A potential landing is identified on map.

Conditions Specific to This Sale:

1. Logging operations are permitted when the ground is dry or frozen.
2. Timber sale contract end date will be March 31st, 2020.
3. Harvest activity is prohibited from September 1 through 21/31 annually.
4. Oak wilt restrictions apply (no harvest activity April 1 to July 15).
5. This sale is in the Managed Forest Law. MFL cutting notice has been submitted and approved.

**** HARVEST MAP AND LOCATION ON REVERSE SIDE OF THIS PAGE ****

Questions



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