

**Overview:**

This post-harvest inventory was conducted on a ±45 acre harvest conducted between 2006 and 2008 on the “Carlow Lot” located in the Savoy Mountain State Forest in the Town of Savoy. The harvest was a combination of single tree selection and group selection cutting. The overall species composition was intended to be maintained, while beginning a new age class in patches, and maintaining an uneven-age diameter distribution between patches.

A post-harvest inventory was conducted using 12 points that were located within the harvest area in a constrained random fashion. At each point overstory trees ( $\geq 1$  in. DBH) were inventoried using horizontal point sampling and a BAF 20<sub>ENGLISH</sub> angle gage; understory trees ( $< 1$  in. DBH) were sampled using circular plots with a fixed 6.8 ft. radius; and CWD was sampled using line intersect sampling with a single 10 ft. long transect at each point. Sampling was conducted during September 2019, under mostly dry summer conditions using standards set forth in the DCR: DSPR Post-management Inventory Protocol. Photographs were taken at 2 of these points.

**Overstory Observations:**

Most of the canopy has closed since the harvest ended and there is significant shade on the ground. The western edge of the sale area has much higher densities of conifers as opposed to the remainder of the sale area. Red spruce, eastern hemlock, and balsam fir are the primary softwood species that were observed. Mixed northern hardwoods are the primary broadleaf components. Yellow birch and sugar maple make up 43% of the 179 ft<sup>2</sup>/ac basal area of live overstory trees. The current growing stock is healthy and vigorous but will require another 10 +/- years before another entry will be viable. 23 snags per acre  $\geq 5$  in. DBH are present.

**Understory Observations:**

There is a significant amount of shade that has negatively impacted the density, diversity, and distribution of native ground cover. Less desirable species of regeneration are also present with striped maple and beech making up 45% of the trees  $< 1$  in. DBH. Additionally, undesirable regeneration such as striped maple and/or American beech appeared on 11 of the 12 plots. This condition is typically caused by openings that are not large enough when initially created and close prematurely between entries. Based on the amount of undesirable regeneration; competing vegetation, primarily ferns and hobblebush; and the small size of desirable regeneration (e.g., yellow birch, sugar maple, white ash, black cherry, red oak, etc.), a high-quality cohort of advanced regeneration is not anticipated prior to the next entry.

**Coarse Woody Debris Observations:**

The CWD observed within the sale area and directly associated with the project was minimal, with only a few pieces of CWD appearing to be attributable to the harvesting operation. The vast majority of woody material was in the form of blowdowns, broken tops, and normal mortality associated with a healthy, forested natural system. 497 ft<sup>3</sup>/ac of CWD is present, with 100% of that in pieces.

### Photographs:



The above photo is a 180° panorama of point 2, located in the southeast corner of the project area. The photo shows uneven-aged mixed northern hardwoods between 2 in. and 18 in. DBH. There is also a significant amount of shading, very little ground cover, and minimal desirable regeneration.



The above photo is a 180° panorama of point 10, located in the northwest corner of the project area. The photo shows the higher densities of softwoods along with significant shading. Red spruce, balsam fir, and eastern hemlock are tolerant of shade and will continue to grow under these conditions; as the harvest created ample room for growth. As in the previous photo there is an uneven-aged mix of desirable species between 2 in. and 18 in. DBH, as well as some interspersed hardwoods.

STANDING LIVE TREES;  
ALL SIZES -  
STAND TABLE

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	balsam fir		Norway spruce		red spruce		hemlock spp.		eastern hemlock	
	12 BA	12 TPA	91 BA	91 TPA	97 BA	97 TPA	260 BA	260 TPA	261 BA	261 TPA
3.0 IN ≤ HT < 4.5 FT.	0	150	0	50	0	50	0	25	0	0
4.5 FT ≤ HT < 10.0 FT.	0	0	0	0	0	25	0	0	0	0
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	25	0	0	0	25	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0
6	2	9	0	0	0	0	0	0	5	26
8	3	10	0	0	0	0	0	0	2	5
10	2	3	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	2	2
14	0	0	0	0	2	2	0	0	2	2
16	0	0	0	0	3	2	0	0	2	1
18	0	0	0	0	0	0	0	0	2	1
20	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
TOTALS	7	196	0	50	5	104	0	25	13	37

STANDING LIVE TREES;  
ALL SIZES -  
STAND TABLE

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	striped maple		red maple		sugar maple		serviceberry spp.		yellow birch	
	315 BA	315 TPA	316 BA	316 TPA	318 BA	318 TPA	356 BA	356 TPA	371 BA	371 TPA
3.0 IN ≤ HT < 4.5 FT.	0	1025	0	525	0	0	0	0	0	800
4.5 FT ≤ HT < 10.0 FT.	0	200	0	0	0	0	0	25	0	75
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	1	150	0	0	0	25	0	0	0	0
2	3	204	0	0	0	0	0	0	5	306
4	2	20	2	20	2	20	0	0	3	41
6	0	0	0	0	0	0	0	0	2	9
8	0	0	3	10	5	15	0	0	0	0
10	0	0	2	3	13	25	0	0	0	0
12	0	0	5	6	7	9	0	0	3	4
14	0	0	3	3	5	5	0	0	2	2
16	0	0	2	1	5	4	0	0	3	2
18	0	0	8	5	8	5	0	0	10	6
20	0	0	2	1	0	0	0	0	0	0
22	0	0	2	1	0	0	0	0	2	1
24	0	0	0	0	0	0	0	0	2	1
26	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
TOTALS	6	1598	28	575	45	106	0	25	32	1245

STANDING LIVE TREES;  
ALL SIZES -  
STAND TABLE

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	paper birch		American beech		white ash		black cherry		northern red oak	
	375 BA	375 TPA	531 BA	531 TPA	541 BA	541 TPA	762 BA	762 TPA	833 BA	833 TPA
3.0 IN ≤ HT < 4.5 FT.	0	0	0	325	0	175	0	75	0	100
4.5 FT ≤ HT < 10.0 FT.	0	0	0	125	0	0	0	0	0	0
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	0	0	50	0	0	0	0	0	0
2	0	0	2	102	0	0	0	0	0	0
4	0	0	2	20	0	0	0	0	0	0
6	0	0	5	26	0	0	0	0	0	0
8	0	0	3	10	0	0	0	0	0	0
10	0	0	2	3	0	0	0	0	0	0
12	0	0	2	2	2	2	0	0	0	0
14	0	0	0	0	10	9	0	0	0	0
16	2	1	0	0	5	4	0	0	0	0
18	0	0	0	0	2	1	3	2	0	0
20	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	2	1	0	0	0	0
24	0	0	0	0	2	1	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
TOTALS	2	1	15	663	22	192	3	77	0	100

STANDING LIVE TREES;  
ALL SIZES -  
STAND TABLE

COMMON NAME			
SPCD	TOTAL	TOTAL	
HT (FT) / DBH (IN) CLASS	BA	TPA	
3.0 IN ≤ HT < 4.5 FT.	0	3298	
4.5 FT ≤ HT < 10.0 FT.	0	450	
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	2	275	
2	10	611	
4	10	122	
6	13	70	
8	17	49	
10	18	34	
12	20	26	
14	23	22	
16	22	16	
18	33	19	
20	2	1	
22	5	2	
24	3	1	
26	0	0	
28	0	0	
30	0	0	
32	0	0	
34	0	0	
36	0	0	
38	0	0	
40	0	0	
42	0	0	
44	0	0	
46	0	0	
48	0	0	
≥50	0	0	
TOTALS	179	4995	

## STANDING DEAD TREES;

≥ 1 IN. DBH -

## STAND TABLE

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	balsam fir		Norway spruce		red spruce		hemlock spp.		eastern hemlock	
	12 BA	12 TPA	91 BA	91 TPA	97 BA	97 TPA	260 BA	260 TPA	261 BA	261 TPA
3.0 IN ≤ HT < 4.5 FT.	0	0	0	0	0	0	0	0	0	0
4.5 FT ≤ HT < 10.0 FT.	0	0	0	0	0	0	0	0	0	0
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0
4	3	41	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	2	2	0	0	0	0
14	0	0	0	0	0	0	0	0	2	2
16	0	0	0	0	2	1	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
TOTALS	3	41	0	0	3	3	0	0	2	2

**STANDING DEAD TREES;  
≥ 1 IN. DBH -  
STAND TABLE**

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	striped maple		red maple		sugar maple		serviceberry spp.		yellow birch	
	315 BA	315 TPA	316 BA	316 TPA	318 BA	318 TPA	356 BA	356 TPA	371 BA	371 TPA
3.0 IN ≤ HT < 4.5 FT.	0	0	0	0	0	0	0	0	0	0
4.5 FT ≤ HT < 10.0 FT.	0	0	0	0	0	0	0	0	0	0
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	0	0	0	0	0	0	0	0	0
2	2	102	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0
6	2	9	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0
10	0	0	2	3	0	0	0	0	0	0
12	0	0	2	2	0	0	0	0	0	0
14	0	0	0	0	3	3	0	0	0	0
16	0	0	0	0	2	1	0	0	0	0
18	0	0	2	1	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
<b>TOTALS</b>	<b>3</b>	<b>111</b>	<b>5</b>	<b>6</b>	<b>5</b>	<b>4</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>



**STANDING DEAD TREES;  
≥ 1 IN. DBH -  
STAND TABLE**

COMMON NAME SPCD HT (FT) / DBH (IN) CLASS	paper birch		American beech		white ash		black cherry		northern red oak	
	375 BA	375 TPA	531 BA	531 TPA	541 BA	541 TPA	762 BA	762 TPA	833 BA	833 TPA
3.0 IN ≤ HT < 4.5 FT.	0	0	0	0	0	0	0	0	0	0
4.5 FT ≤ HT < 10.0 FT.	0	0	0	0	0	0	0	0	0	0
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	2	2	0	0
14	0	0	0	0	3	3	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	2	0	0	0
28	0	0	0	0	0	0	0	0	0	0
30	0	0	0	0	0	0	0	0	0	0
32	0	0	0	0	0	0	0	0	0	0
34	0	0	0	0	0	0	0	0	0	0
36	0	0	0	0	0	0	0	0	0	0
38	0	0	0	0	0	0	0	0	0	0
40	0	0	0	0	0	0	0	0	0	0
42	0	0	0	0	0	0	0	0	0	0
44	0	0	0	0	0	0	0	0	0	0
46	0	0	0	0	0	0	0	0	0	0
48	0	0	0	0	0	0	0	0	0	0
≥50	0	0	0	0	0	0	0	0	0	0
TOTALS	0	0	0	0	3	3	3	3	0	0

**STANDING DEAD TREES;**

**≥ 1 IN. DBH -**

**STAND TABLE**

COMMON NAME			
SPCD	TOTAL	TOTAL	
HT (FT) / DBH (IN) CLASS	BA	TPA	
3.0 IN ≤ HT < 4.5 FT.	0	0	
4.5 FT ≤ HT < 10.0 FT.	0	0	
10.0 FT ≤ HT < 15.0 FT. / < 1.0 IN. DBH	0	0	
2	2	102	
4	3	41	
6	2	9	
8	0	0	
10	2	3	
12	5	6	
14	8	8	
16	3	2	
18	2	1	
20	0	0	
22	0	0	
24	0	0	
26	2	0	
28	0	0	
30	0	0	
32	0	0	
34	0	0	
36	0	0	
38	0	0	
40	0	0	
42	0	0	
44	0	0	
46	0	0	
48	0	0	
≥50	0	0	
<b>TOTALS</b>	<b>28</b>	<b>172</b>	

**COARSE WOODY DEBRIS SUMMARY (DEAD; >45° FROM VERTICAL; ≥ 3.0 IN DIA; ≥ 3.0 FT LENGTH)**

PIECES/ AC	PIECE CF/AC	PILES (DIMENSIONS)/AC	PILE CF/AC	PILE DEPTH CF/AC	TOTAL CWD CF/AC: PIECES + PILE DIMENSIONS	TOTAL CWD CF/AC: PIECES + PILE DEPTH
113.3	497.5	0.0	0.0	0.0	497.5	497.5