

PLOT 826

LOCATION: 4 m from western edge of Grid Square #: 826  
 DATE SAMPLED: 7/17/84

SITE VARIABLES:

SLOPE: 19° ASPECT: 140° POSITION: ridgetop and midslope  
 SURFACE WATER: none  
 LITTER DEPTH: 2.75 cm EXPOSED BEDROCK: no  
 SOIL SERIES (mapped):  
 SOIL pH:

VISUAL EVIDENCE OF: LOGGING: no  
 GRAZING: yes  
 STONE WALLS: yes  
 FIRE: no  
 RECENT WINDTHROW: yes  
 MOUNDS & PITS: yes

AGES OF DOMINANT TREES: 42.0 cm Pinus strobus : 54 years

CANOPY HEIGHT: 29.6 m % SKY VISIBLE: 10.0

COMMENTS:

HYDROLOGY:

This site is well drained. The creek is located nearby.

SOILS:

The soils are very well drained, stony and shallow with a MOR humus.

HISTORY:

There was a recent windthrow of oak trees. The site was once pastured.

STAND CONDITION:

There is high Tsuga canadensis mortality, otherwise the canopy is dense.  
 The oaks show signs of water stress and dieback.

ADDITIONAL COMMENTS ON THE SITE:

There is not much shrub layer except in "blowdown holes". Barbed wire runs through the plot. A stone wall and barbed wire fence keep grazers to the east of crest.

## VEGETATION STRUCTURE AND COMPOSITION:

**TREES:** Absolute density and basal area of stems > 10 cm DBH, by canopy position.

SPECIES	CANOPY		SUB-CANOPY		UNDER-STORY		ALL STEMS	
	DENS	BA	DENS	BA	DENS	BA	DENS	BA
Quercus prinus	120	6.611	20	0.503	0	0.000	140	7.115
Pinus strobus	40	3.994	0	0.000	20	0.197	60	4.191
Tsuga canadensis	0	0.000	0	0.000	0	0.000	0	0.000
Quercus velutina	0	0.000	0	0.000	0	0.000	0	0.000
Quercus rubra	60	3.976	80	1.317	40	0.603	180	5.896
Acer rubrum	0	0.000	20	0.412	0	0.000	20	0.412
Unknown	0	0.000	0	0.000	0	0.000	0	0.000
TOTALS:	DENSITY / HA							
	220		120		60		400	
	BASAL AREA (M2) / HA							
	14.5815		2.2321		0.7999		17.6134	

**TREES:** Relative density and basal area of stems > 10 cm DBH, by canopy position; and overall species importance values (mean of overall %D and %BA).

SPECIES	CANOPY		SUB-CANOPY		UNDER-STORY		ALL STEMS		IMPORTANCE
	%D	%BA	%D	%BA	%D	%BA	%D	%BA	VALUE
Quercus prinus	55	45	17	23	0	0	35	40	37.70
Pinus strobus	18	27	0	0	33	25	15	24	19.40
Tsuga canadensis	0	0	0	0	0	0	0	0	0.00
Quercus velutina	0	0	0	0	0	0	0	0	0.00
Quercus rubra	27	27	67	59	67	75	45	33	39.24
Acer rubrum	0	0	17	18	0	0	5	2	3.67
Unknown	0	0	0	0	0	0	0	0	0.00

**TREES:** Size class distribution of trees tallied in the 1/20 ha plot.

SPECIES	SIZE CLASS (cm)								
	10-15	15-20	20-25	25-30	30-35	35-40	40-45	45-50	> 50
	15	20	25	30	35	40	45	50	
Quercus prinus	0	3	0	3	0	1	0	0	
Pinus strobus	1	0	0	1	0	0	1	0	
Tsuga canadensis	0	0	0	0	0	0	0	0	
Quercus velutina	0	0	0	0	0	0	0	0	
Quercus rubra	4	3	0	0	2	0	0	0	
Acer rubrum	0	1	0	0	0	0	0	0	
Unknown	0	0	0	0	0	0	0	0	
TOTALS	5	7	0	4	2	1	1	0	0

**TREES:** Absolute density (per ha) and relative density (as % of density of live trees) of standing dead trees and trees with upper branch dieback

(NOTE: "% OF LIVE" = 999 indicates no live trees of that species in the plot).

SPECIES	STANDING DEAD		BRANCH DIEBACK	
	DENSITY	% OF LIVE	DENSITY	% OF LIVE
Quercus prinus	0.0	0.00	20.0	14.29
Pinus strobus	0.0	0.00	0.0	0.00
Tsuga canadensis	120.0	999.00	0.0	0.00
Quercus velutina	20.0	999.00	0.0	0.00
Quercus rubra	0.0	0.00	60.0	33.33
Acer rubrum	0.0	0.00	0.0	0.00
Unknown	20.0	999.00	0.0	0.00
TOTALS:	160.0	40.00	80.0	20.00

**SAPLINGS:** Densities per hectare of all stems > 1 m height and < 10 cm DBH.

SPECIES	SIZE CLASSES (cm)					TOTAL
	0 - 2	2 - 4	4 - 6	6 - 8	8 - 10	
Quercus rubra	0	40	120	80	40	280
Quercus prinus	0	40	0	0	0	40
Fraxinus americana	0	0	0	40	0	40
TOTALS:	0	80	120	120	40	360

**SEEDLINGS:** Densities (per  $m^2$ ) of stems < 1 m tall.

SPECIES	DENSITY ( $\#/m^2$ )
Acer rubrum	4.000
Prunus serotina	1.500
Ostrya virginiana	0.250
TOTAL:	5.750

SHRUBS: Percent cover of shrub species within the stand.

SPECIES	% COVER
Viburnum acerifolium	3.092
Vaccinium angustifolium	0.595
TOTAL:	3.686

HERBACEOUS SPECIES AND THE FOREST FLOOR: Percent cover (note: + means < 1 %).

	% COVER
Litter layer	60.500
Exposed soil	+
Exposed rock	20.875
Bryophytes	14.874
Lichens	4.749
Dead wood	13.375
Unknown seedlings	+
Tree boles	+
Tree root	3.375
Mitchelle repens	+
Hieracium venosum	+
Carex sp.	+
Solidago sp.	+
Gaultheria procumbens	+
Deadwood over	+
Paronychia canadensis	+