**Table 1.** Mean topographic features for individuals at each site.

Site	1947 Fire	Type	Latitude (°)	Longitude (°)	Elevation (m)	Slope (°)	Aspect (°)	Compass
Gorham Cliffs	Yes	Cliff	44.328	-68.185	32.95	31.867	151.467	SE
South Cadillac	Yes	Ledge	44.333	-68.224	279.95	9.400	138.133	SE
St. Sauveur	No	Cliff/Ledge	44.311	-68.326	171.72	13.333	262.600	W
Wonderland	No	Flat/Hilly	44.237	-68.316	17.83	3.733	208.067	S

Table 2. Watson's Two Sample Test of Homogeneity results for aspect at each site.\*

	Gorham Cliffs	St. Sauveur	South Cadillac	
Wonderland	t = 0.259 *	t = 0.288 **	t = 0.194 *	
Gorham cliffs		t = 0.385 **	$t = 0.166 \ ns$	
St. Sauveur			t = 0.519 ***	

<sup>\*</sup>Key: t = test statistic, ns = not significant, \* = P < 0.05, \*\* = P < 0.01, \*\*\* = P < 0.001, P = P-value.

Table 3. Analysis of variance results for the linear models with soil carbon (C), nitrogen (N), and C/N, and soil water retention (SWR).\*

•	Soil		Soil	N	Soil C/N SWR					R		
	df	F	P	df	F	P	df	F	P	df	F	P
Elevation	1	4.675	0.040	1	0.190	0.667	1	3.853	0.062	1	2.503	0.122
Fire	1	2.718	0.111	1	0.260	0.615	1	1.493	0.235	1	12.400	0.001
Elevation x Fire	1	0.404	0.530	1	1.153	0.295	1	2.771	0.110	1	12.981	0.001
Residuals	27			22			22			36		

<sup>\*</sup> P-values < 0.05 are bolded. Sample size is 26 for soil nutrients and 40 for SWR. Key: df = degrees of freedom, F = F-value, P = P-value.

**Table 4.** Analysis of variance results for the linear models with soil aluminum (Al<sup>+</sup>), calcium (Ca<sup>2+</sup>), potassium (K<sup>+</sup>), magnesium (Mg<sup>2+</sup>), phosphorus (P), and zinc (Zn).\*

	•	Soil Al <sup>+</sup>			Soil Ca <sup>2+</sup> Soil k		Soil		Soil Mg <sup>2+</sup>		Soil P		
	df	F	P	F	P	F	P	F	P	F	P	F	P
Elevation	1	1.342	0.257	6.729	0.015	2.284	0.142	2.525	0.124	2.829	0.104	2.079	0.161
Fire	1	0.032	0.860	0.041	0.840	6.664	0.016	0.254	0.618	1.015	0.323	0.082	0.776
Elevation x Fire	1	7.851	0.009	0.135	0.716	0.100	0.755	0.224	0.640	0.065	0.801	2.883	0.101
Residuals	27												

<sup>\*</sup> P-values < 0.05 are bolded and < 0.1 are italicized. Sample size is 31. Key: df = degrees of freedom, F = F-value, P = P-value.

**Table 5.** Analysis of variance results for the linear models with foliar  $\delta^{13}$ C and  $\delta^{15}$ N, carbon (C), nitrogen (N), and C/N.\*

	δ <sup>13</sup> C	,		$\delta^{15}$ N	Ţ		Foli	Foliar C			Foliar N			Foliar C/N		
	df	F	P	df	F	P	df	F	P	df	F	P	df	F	P	
Elevation	1	9.786	0.003	1	0.787	0.379	1	0.148	0.702	1	0.983	0.326	1	1.639	0.206	
Fire	1	1.369	0.247	1	2.857	0.097	1	4.053	0.049	1	1.156	0.287	1	0.425	0.517	
Elevation																
x Fire	1	0.227	0.636	1	1.831	0.182	1	0.001	0.981	1	1.020	0.317	1	1.707	0.197	
Residuals	<i>51</i>			<i>51</i>			56			52			52			

<sup>\*</sup> P-values < 0.05 are bolded and < 0.1 are italicized. Sample size is 55 for foliar isotopes and 56 for foliar nutrients. Key: df = degrees of freedom, F = F-value, P = P-value.

**Table 6.** Analysis of variance results for the linear models with foliar aluminum (Al<sup>+</sup>), calcium (Ca<sup>2+</sup>), potassium (K<sup>+</sup>), magnesium (Mg<sup>2+</sup>), phosphorus (P), and zinc (Zn).\*

		Foliar A	AI <sup>+</sup>	Foliar Ca <sup>2+</sup>		Foliar k	Foliar K <sup>+</sup>		Foliar Mg <sup>2+</sup>		Foliar P		Foliar Zn	
	df	F	P	F	P	F	P	F	P	F	P	F	P	
Elevation	1	0.341	0.563	13.302	0.001	3.158	0.084	2.557	0.119	0.012	0.914	8.007	0.008	
Fire	1	0.021	0.887	0.843	0.365	4.071	0.051	0.507	0.481	8.309	0.007	0.050	0.824	
Elevation x Fire	1	0.187	0.668	0.088	0.769	4.863	0.034	0.377	0.543	0.407	0.527	1.458	0.235	
Residuals	36													

<sup>\*</sup> P-values < 0.05 are bolded and < 0.1 are italicized. Sample size is 40. Key: df = degrees of freedom, F = F-value, P = P-value.

**Table 7.** Analysis of variance results for the linear models with slope, tree height, canopy spread, diameter at breast height (DBH), and distance between neighbors.\*

	Canopy Spread			DBH	H Distance Between Neighbors				Т			
	df	F	P	df	F	P	df	F	P	df	F	P
Elevation	1	7.948	0.008	1	13.724	0.001	1	21.148	<0.001	1	3.451	0.071
Fire	1	0.012	0.914	1	1.100	0.301	1	1.418	0.248	1	0.097	0.757
Elevation x Fire	1	0.068	0.795	1	3.022	0.091	1	0.468	0.502	1	6.593	0.015
Residuals	36			36			20			36		

<sup>\*</sup> P-values < 0.05 are bolded and < 0.1 are italicized. Sample size is 40 for tree height, canopy spread, and DBH and 60 for slope and distance between neighbors. Key: df = degrees of freedom, F = F-value, P = P-value, DBH = diameter at breast height.