

III. *Abstract of a Register of the Barometer, Thermometer, and Rain, at Lyndon, in Rutland, 1797. With some Remarks on the Recovery of injured Trees. By Thomas Barker, Esq. Communicated by Mr. Timothy Lane, F. R. S.*

Read December 13, 1798.

		Barometer.			Thermometer.						Rain.
		Highest.	Lowest.	Mean.	In the House.			Abroad.			
					High.	Low.	Mean.	High.	Low.	Mean.	
		Inches.	Inches.	Inches.	°	°	°	°	°	°	Inches.
Jan.	Morn.	29,99	29,01	29,58	0	0	0	0	0	0	1,319
	Aftern.				46	33	39	48	26	37	
Feb.	Morn.	30,07	28,84	50	47	37	42	46 $\frac{1}{2}$	25	34	0,076
	Aftern.				48	38 $\frac{1}{2}$	43 $\frac{1}{2}$	52 $\frac{1}{2}$	32	42 $\frac{1}{2}$	
Mar.	Morn.	29,90	29,03	47	46	38	41 $\frac{1}{2}$	46	29 $\frac{1}{2}$	35 $\frac{1}{2}$	0,908
	Aftern.				47	39	43	53	36 $\frac{1}{2}$	44	
Apr.	Morn.	29,70	28,63	31	51 $\frac{1}{2}$	42 $\frac{1}{2}$	46	52	36	42 $\frac{1}{2}$	2,882
	Aftern.				52 $\frac{1}{2}$	43 $\frac{1}{2}$	47	59	37	49	
May	Morn.	29,86	28,44	38	67	44	53	64	38	50 $\frac{1}{2}$	2,528
	Aftern.				69	44 $\frac{1}{2}$	54 $\frac{1}{2}$	76	41 $\frac{1}{2}$	59 $\frac{1}{2}$	
June	Morn.	29,85	28,93	41	60	52	57	63	39 $\frac{1}{2}$	52 $\frac{1}{2}$	4,221
	Aftern.				62 $\frac{1}{2}$	53 $\frac{1}{2}$	58	76	43 $\frac{1}{2}$	63	
July	Morn.	29,80	29,05	49	70 $\frac{1}{2}$	57	63	66	54	61	3,075
	Aftern.				72 $\frac{1}{2}$	59	65 $\frac{1}{2}$	83	60	72 $\frac{1}{2}$	
Aug.	Morn.	29,72	29,05	35	64	53	60 $\frac{1}{2}$	64	49	58	2,415
	Aftern.				65 $\frac{1}{2}$	59	62	76	62	68	
Sep.	Morn.	29,67	28,67	28	62	51 $\frac{1}{2}$	56	58	43	50	4,792
	Aftern.				64	54	57	70 $\frac{1}{2}$	51	60	
Oct.	Morn.	29,83	28,57	37	55 $\frac{1}{2}$	41 $\frac{1}{2}$	49 $\frac{1}{2}$	55	31 $\frac{1}{2}$	44	1,143
	Aftern.				57 $\frac{1}{2}$	42 $\frac{1}{2}$	50	63	42 $\frac{1}{2}$	52	
Nov.	Morn.	29,98	28,50	43	49	34	43 $\frac{1}{2}$	51 $\frac{1}{2}$	24 $\frac{1}{2}$	38 $\frac{1}{2}$	1,620
	Aftern.				49 $\frac{1}{2}$	34 $\frac{1}{2}$	44	53	30	44	
Dec.	Morn.	29,93	28,60	27	49	36	42	53	29	38 $\frac{1}{2}$	2,875
	Aftern.				49 $\frac{1}{2}$	36 $\frac{1}{2}$	42 $\frac{1}{2}$	53	32	42	
											27,854

After a few misty days, the beginning of the year was frosty, wintery, and severe, yet not so hard as before; with frequent but little rains. The end of January, all February, and beginning of March, there was hardly any rain at all; a calm, dry, and pleasant time, but not forwarding, for there was frequent frost, scarcely going off in the shade all day, yet the noontide sun was very warm. The greater part of March was dry, with frequent frosty mornings, and very backward, though calm; but the last ten days were showery, pleasant, and forwarding: this was the beginning of a very wet half year. It was a blasting spring; and some fruits were cut off, after they seemed set, and considerably grown; yet some orchards escaped, and the frequent wet made strawberries plentiful. The season continued cold, wet, and backward, in general, but the last week in April was warmer and more forwarding, yet still wet; then it turned cold again, but there were a few hot dry days toward the end of May. It was wet again at the end of that month; very much so, almost all June, and the beginning of July, with several unseasonable floods, and cold at times; but the rest of July was fairer for some time, and was the best and hottest part of the summer, till a very great thunder storm on the 30th. There was a great crop of hay, but bad weather for getting it up, and in the low meadows it was much flooded. The harvest was good, as to quantity, but could not be all well got, on account of the bad season, yet there was much less complaint of grown corn than might have been expected; perhaps, what was not well got, might be used, not so much for bread, as for starch, powder, and distilling; for there was a vast difference in the price of good and bad wheat, some sorts being almost twice as much as others. Most sorts of fruit were scarce; but peaches and nectarines

were more plentiful, and finer, than either apricots before, or apples after them. I think the pears and apples were more defective in size than in number, for they were remarkably small. The harvest was all showery; but in August the weather was more moderate and tolerable than in September, when there were several great rains and storms.

The autumn, beginning with a few of the last days of September, was in general fine, fair, open, and mild, with moderate winds, and when calm, perfectly so; a good wheat seed time, which came up well; but it was wetter again the end of November, and in December, which kept the ground (already much soaked by the very wet summer) from drying so much as it otherwise might have done. It continued, however, an open winter, not much frost, and that not severe.

#### *On the Recovery of injured Trees.*

ABOUT the year 1788 or 1789, a Lucombe oak was planted, the top of which might be about six feet high, but was broken off in coming down. In spring, the tree put out at the two highest buds, but much better at some lower ones. In 1791, the two highest buds again put out, yet, as before, very indifferently; however, a lower bud, about five feet high, put out a strong shoot, about fifteen inches long; but, as side branches are apt to do, it did not grow upright, but slanting. In winter, I fixed that strong shoot upright, by tying it to another shoot, which came out of the opposite side of the tree; and, in 1792, it made a very strong, straight, and upright shoot, three feet nine inches long, and as thick as a moderate finger, and has continued thriving ever since. The tree is now about eighteen

feet high, and eleven inches in girth at the bottom; it has been pretty well cleared of boughs about half way up, and may perhaps, by degrees, be cleared several feet higher.

In the winter of 1789, an ash tree was cut down, which, falling against a young oak, as thick as my leg, beat it down. I had the oak cut close to the ground, and in 1790 it put out a number of shoots, which grew that year, and 1791. In 1792, I chose out the best shoot, trained it up as straight as I could, and beat down the rest of the shoots to the ground, under the hedge, to weaken them, and encourage the best shoot, which I intend to be the tree. It has since grown strong, is pretty straight, has been pruned, and may, I believe, by degrees, be cleared to a good height, for the leading bud is strong and upright. It is now (in August, 1798) about  $14\frac{1}{2}$  feet high, and about  $6\frac{1}{2}$  inches in girth at the bottom.