

20th ANNUAL OHIO MAST SURVEY RESULTS



TABLE 1.
PERCENTAGE OF WHITE AND RED
OAK TREES WITH ACORNS ON 31
WILDLIFE AREAS DURING THE 2024
MAST SURVEY.

WILDLIFE AREA	DISTRICT	% TREES WITH ACORNS		NORTH TO SOUTH RANKING
		WHITE OAKS	RED OAKS	
LAKE LA SU AN	2	20	92	1
DORSET ¹	3			2
NEW LYME ¹	3			3
MOSQUITO CREEK ¹	3			4
OXBOW LAKE	2	56	76	5
MILAN	2	8	68	6
GRAND RIVER ¹	3			7
CAMP BELDEN	3	12	76	8
BERLIN LAKE	3	56	24	9
KILLDEER PLAINS	2	52	80	10
KILLBUCK MARSH ¹	3			11
HIGHLANDTOWN	3	40	96	12
BIG ISLAND	1	24	64	13
BEACH CITY ¹	3			14
BRUSH CREEK	3	36	64	15
KOKOSING	1	80	64	16
DELAWARE	1	24	96	17
WOODBURY	4	28	52	18
EGYPT VALLEY	4	76	56	19
SALT FORK	4	52	24	20
MONROE LAKE	4	24	36	21
WOODLAND TRAILS	5	44	68	22
ALES RUN	4	68	92	23
DEER CREEK	1	0	16	24
WOLF CREEK	4	36	76	25
TRIMBLE	4	20	96	26
PLEASANT VALLEY ¹	4			27
ROSS LAKE	4	12	24	28
WATERLOO	4	12	92	29
ACADIA CLIFFS	4	68	88	30
FALLSVILLE	5	0	68	31
FOX LAKE	4	16	92	32
WELLSTON	4	36	48	33
EAST FORK	5	40	48	34
TRANQUILITY	5	20	88	35
COOPER HOLLOW	4	20	72	36
TYCOON LAKE	4	4	68	37
CROWN CITY	4	80	100	38
TOTALS		34.3	67.9	Mean
		23.7	24.2	Stdev
		69.1	35.7	CV
		4.3	4.4	SE
		26.0	59.3	L 95
		42.7	76.4	U 95



Ohio Department of Natural Resources
DIVISION OF WILDLIFE

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TABLE 2.
PERCENTAGE OF WHITE OAK TREES
WITH ACORNS ON 38 WILDLIFE
AREAS, 2014 TO PRESENT.

WILDLIFE AREA	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
LAKE LA SU AN	28	4	32	44	84	8	8	68	12	28	20
DORSET ¹	72	56	28	40	52	20	28	36	28	36	
NEW LYME ¹	64	48	28	20	40	16	24	44	28	32	
MOSQUITO CREEK ¹	76	56	20	24	60	28	36	56	36	56	
OWBOW LAKE	24	28	40	32	56	40	28	32	36	24	56
MILAN	96	40	52	12	48	12	0	44	4	32	8
GRAND RIVER ¹	28	52	40	36	52	36	52	36	40		
CAMP BELDEN	60	28	20	0	64	0	48	28	8	16	12
BERLIN LAKE	20	44	36	24	40	8	16	24	12	48	56
KILLDEER PLAINS	96	40	64	68	88	16	56	80	68	72	52
KILLBUCK MARSH ¹	40	44	32	36	44	48	48	48			
HIGHLANDTOWN	40	16	44	36	68	4	8	28	28	56	40
BIG ISLAND	88	64	44	84	64	32	56	72	56	72	24
BEACH CITY ¹	24	36	64		84	36	20	88	48	48	
BRUSH CREEK	68	28	72	44	92	20	28	48	44	64	36
KOKOSING	44	24	68	60	72	28	76	32	96	76	80
DELAWARE	92	32	40	60	60	52	36	80	48	24	24
WOODBURY	64	24	32	0	56	0	0	20	28	8	28
EGYPT VALLEY	44	24	32	40	52	12	16	24	36	68	76
SALT FORK	60	24	40	64	56	24	36	32	40	48	52
MONROE LAKE	20	48	36	60	52	24	28	28	20	0	24
WOODLAND TRAILS	88	80	8	52	56	64	60	60	56	60	44
ALES RUN	64	16	52	24	84	12	12	64	68	36	68
DEER CREEK	16	0	0	0	12	12	8	0	8	0	0
WOLF CREEK	60	8	40	16	76	8	4	20	56	28	36
TRIMBLE	92	20	36	28	64	8	16	48	52	48	20
PLEASANT VALLEY ¹	4	8	4	0	8	4	4	4	36	32	
ROSS LAKE	36	4	44	4	24	0	16	8		44	12
WATERLOO	100	4	32	8	60	40	28	76	32	72	12
ACADIA CLIFFS	52	8	60	20	60	12	20	44	68	16	68
FALLSVILLE	16	16	24	8	16	4	8	36	28	32	0
FOX LAKE	72	24	16	4	28	12	52	16	28	64	16
WELLSTON	72	8	36	0	40	4	48	20	44	16	36
EAST FORK	48	36	24	24	36	36	40	28	28	12	40
TRANQUILITY	8	12	40	4	52	4	48	4	84	8	20
COOPER HOLLOW	56	20	40	12	20	36	0	52	12	56	20
TYCOON LAKE	32	20	16	12	4	40	0	36	16	60	4
CROWN CITY	24	68	36	60	4	68	4	40	60	40	80



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TABLE 3.
PERCENTAGE OF RED OAK TREES
WITH ACORNS ON 38 WILDLIFE
AREAS, 2014 TO PRESENT.

WILDLIFE AREA	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
LAKE LA SU AN	80	60	8	84	84	16	76	96	28	24	92
DORSET ¹	76	68	68	40	60	36	36	48	32	40	
NEW LYME ¹	72	60	40	32	48	44	48	44	40	36	
MOSQUITO CREEK ¹	88	72	40	36	64	56	56	64	60	64	
OXBOW LAKE	40	44	52	40	84	60	68	80	56	56	76
MILAN	92	28	32	8	12	56	28	12	24	40	68
GRAND RIVER ¹	44	52	24	60	60	88	76	32	40		
CAMP BELDEN	100	36	16	28	60	92	100	40	8	24	76
BERLIN LAKE	16	24	24	24	16	20	28	4	12	24	24
KILLDEER PLAINS	80	76	68	88	96	76	92	92	96	84	80
KILLBUCK MARSH ¹	60	36	48	48	32	68	68	48			
HIGHLANDTOWN	60	64	64	56	56	44	100	60	32	56	96
BIG ISLAND	84	100	56	100	100	100	92	80	100	72	64
BEACH CITY ¹	8	40	40	0	44	84	28	76	60	60	
BRUSH CREEK	52	40	80	84	44	20	88	60	36	24	64
KOKOSING	60	48	24	36	24	92	32	100	52	88	64
DELAWARE	96	56	64	64	56	92	76	88	52	56	96
WOODBURY	68	48	48	52	44	56	72	60	32	16	52
EGYPT VALLEY	56	32	44	48	44	36	60	40	48	44	56
SALT FORK	52	40	20	80	44	56	56	44	40	56	24
MONROE LAKE	16	48	52	68	40	44	60	44	40	28	36
WOODLAND TRAILS	92	92	0	56	60	64	64	60	60	68	68
ALES RUN	80	60	60	56	40	96	100	64	24	80	92
DEER CREEK	28	0	8	12	16	8	8	0	4	4	16
WOLF CREEK	96	36	36	64	60	64	88	68	28	68	76
TRIMBLE	100	48	72	80	76	80	100	84	32	72	96
PLEASANT VALLEY ¹	36	0	8	20	4	20	28	16	28	52	
ROSS LAKE	64	12	80	64	32	40	80	16		44	24
WATERLOO	100	36	56	44	64	60	84	76	20	56	92
ACADIA CLIFFS	92	28	52	52	32	96	96	56	36	88	88
FALLSVILLE	24	68	52	56	56	92	76	8	68	92	68
FOX LAKE	92	44	36	84	28	80	80	40	12	56	92
WELLSTON	68	20	52	56	24	76	56	28	24	36	48
EAST FORK	84	12	60	48	36	84	80	12	20	44	48
TRANQUILITY	56	36	36	76	52	76	84	20	40	76	88
COOPER HOLLOW	96	0	44	88	56	88	96	48	24	64	72
TYCOON LAKE	88	0	16	76	24	88	96	28	12	76	68
CROWN CITY	80	4	40	96	32	96	96	32	28	68	100



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TABLE 4.
AVERAGE OF THE PERCENT OF THE
CROWN WITH ACORNS FOR WHITE
OAK TREES ON 38 WILDLIFE AREAS,
2014 TO PRESENT.

WILDLIFE AREA	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
LAKE LA SU AN	2.0	0.2	2.0	4.4	15.6	0.4	0.4	7.6	0.6	6.8	1
DORSET ¹	7.6	8.2	4.4	5.4	10.8	3.4	7	7.8	4.28	3.4	
NEW LYME ¹	7.2	13.0	6.0	3.8	8.6	2.8	5	9.6	4.4	2.8	
MOSQUITO CREEK ¹	23.4	15.2	4.6	4.0	18.6	5.4	5.6	13	3.6	5.0	
OXBOW LAKE	1.6	1.4	2.4	2.0	3.4	3	1.6	2.8	7	2.6	10
MILAN	6.8	3.6	3.6	0.6	4.0	0.6	0	3.6	0.2	1.8	0.4
GRAND RIVER ¹	3.6	2.8	4.8	2.4	4.0	2.4	3.6	5.6	4.4		
CAMP BELDEN	29.0	14.0	10.0	0.0	36.0	0	6.6	1.6	0.4	1.7	1.2
BERLIN LAKE	2.8	3.6	5.4	1.6	9.6	0.8	0.8	2.2	1.4	4.0	4.2
KILLDEER PLAINS	42.9	5.4	13.0	22.4	29.6	2	10	23.4	8	18.6	10.8
KILLBUCK MARSH ¹	5.8	6.4	7.6	13.6	8.4	11.6	8.8	11.8			
HIGHLANDTOWN	5.6	1.6	9.2	10.2	16.4	0.4	0.8	7	4.8	19.4	4.8
BIG ISLAND	35.6	4.2	6.4	34.8	4.6	1.8	8.8	7	3.4	11.2	3.4
BEACH CITY ¹	3.4	3.2	9.2		50.0	17	10	46	24	20.0	
BRUSH CREEK	19.6	1.6	10.6	4.8	28.0	1.4	2.2	9.4	7.6	18.6	2.6
KOKOSING	4.8	1.8	7.6	7.4	19.6	2	24	2.6	25.4	9.8	18.2
DELAWARE	18.2	3.2	7.0	7.8	12.6	4.4	7.2	10	8	2.8	3.6
WOODBURY	8.0	0.4	1.5	0.0	15.4	0	0	1.6	8.4	0.4	1.6
EGYPT VALLEY	16.8	4.6	8.4	17.6	23.0	3.8	4.6	7	8.2	4.2	10.2
SALT FORK	23.8	5.6	12.6	34.6	35.2	6	7.8	11	13.8	3.8	4.6
MONROE LAKE	4.6	5.8	7.8	30.8	19.0	4.8	8.2	10	5.4	0.0	5.2
WOODLAND TRAILS	7.0	13.2	0.4	4.6	8.8	7.4	9.8	7.4	5.4	7.4	5.625
ALES RUN	13.0	1.0	11.4	2.0	52.8	0.6	2.4	26.8	7.8	2.6	20.2
DEER CREEK	1.0	0.0	0.0	0.0	0.6	0.6	0.4	0	0.4	0.0	0
WOLF CREEK	9.4	0.4	6.6	3.8	34.0	0.6	0.2	3	13	4.6	4.6
TRIMBLE	38.6	1.4	2.2	2.2	17.6	1.8	3.4	18	11	9.2	5.2
PLEASANT VALLEY ¹	0.2	0.6	0.2	0.0	0.4	0.2	0.2	1	7.2	12.0	
ROSS LAKE	15.4	0.6	15.2	2.0	13.0	0	7.44	3.6		13.8	3
WATERLOO	36.0	0.4	2.6	0.6	16.8	4	7.4	29.4	7	10.0	0.6
ACADIA CLIFFS	19.0	0.4	19.2	2.8	18.2	0.6	1.2	10.8	14.4	1.2	6.8
FALLSVILLE	1.6	0.8	4.6	0.4	2.8	0.4	0.6	12.2	8.2	6.8	0
FOX LAKE	31.8	1.2	1.2	1.2	1.8	0.6	7.8	3.8	4.6	6.0	0.8
WELLSTON	42.6	1.0	15.2	0.0	23.8	0.8	24.4	8.2	22	4.2	9.4
EAST FORK	21.8	8.2	9.4	0.2	9.2	2.6	19.6	12.2	2	50.0	8.6
TRANQUILITY	0.4	3.0	4.4	0.2	8.6	0.4	12.2	0.4	28	0.6	1.4
COOPER HOLLOW	17.8	8.8	14.6	4.2	10.8	19	0	26	2.4	25.0	4
TYCOON LAKE	7.8	6.0	2.2	4.0	0.4	12.4	0	11.4	12	15.6	0.6
CROWN CITY	5.0	33.6	12.0	33.4	3.0	35	1	16.8	43.8	7.0	12.4



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TABLE 5.
AVERAGE OF THE PERCENT OF THE
CROWN WITH ACORNS FOR RED
OAK TREES ON 38 WILDLIFE AREAS,
2014 TO PRESENT.

WILDLIFE AREA	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
LAKE LA SU AN	14	5.4	0.4	23.2	28.2	0.8	20.8	43.2	2.6	4.6	30.0
DORSET ¹	25.8	24.2	9.4	11	15.6	8.2	12.2	13.6	5.6	6.0	
NEW LYME ¹	14.2	17.4	9.2	7.44	12.8	12.6	14.6	13	5.2	2.6	
MOSQUITO CREEK ¹	42.6	28.8	18.4	10.4	21.6	18.2	18.4	20.2	11.6	7.0	
OWBOW LAKE	3.2	3.4	4.2	3	8.4	10.6	17.4	31.4	18.4	13.4	22.4
MILAN	4.6	2	2.2	0.4	0.6	4.8	2	0.8	1.2	4.6	6.2
GRAND RIVER ¹	7	3.6	2.2	10.2	9.2	33.2	16.4	8.8	10.4		
CAMP BELDEN	48	16	8	11	42	44.2	33.8	2	0.4	2.4	7.6
BERLIN LAKE	0.8	1.4	4	1.2	1	4.2	1.6	0.2	0.8	2.0	1.6
KILLDEER PLAINS	35.8	36.2	20	55.6	40.4	21.4	42	34.6	41	28.0	42.4
KILLBUCK MARSH ¹	18	8.8	12.6	17.2	5.2	16.4	13.2	12.8			
HIGHLANDTOWN	11.6	11.6	22.4	17.6	15.6	13.6	86	40	7.32	18.4	68.0
BIG ISLAND	23	49.4	16.8	45.6	44.8	27.2	25.8	18	36	14.2	16.0
BEACH CITY ¹	0.4	2.8	2.4		14	53	16	38	30	30.0	
BRUSH CREEK	17.8	24.2	32.4	29	11.6	1.6	40.8	20.8	12.8	11.0	46.6
KOKOSING	4.4	4.8	1.2	2.4	3.4	46.2	2.2	51.4	6	33.2	7.0
DELAWARE	25.8	13.2	11.8	12.2	8.2	24.2	17.6	15	13.8	9.4	37.2
WOODBURY	2.12	0.72	25	13.8	13	8.4	43.4	24.8	11.2	1.6	15.0
EGYPT VALLEY	20.8	5.2	13	22.4	11.8	10.6	26.6	12.6	12.6	3.6	13.6
SALT FORK	24.2	15	2.4	56	12.4	20.6	19.2	21	10.8	4.6	1.2
MONROE LAKE	6.6	3.6	16	32	7.6	17.4	28.2	13	9.2	2.8	7.2
WOODLAND TRAILS	20.2	12.6	0	6	10	8	10.4	8	5.4	9.2	11.0
ALES RUN	39	13.8	20.6	15.8	23	47.4	69.4	26	1.2	27.0	28.0
DEER CREEK	2	0	2.2	0.6	0.8	0.4	0.4	0	0.4	0.2	0.8
WOLF CREEK	39	9	8.4	21.2	23.8	29.8	42.2	31.2	6	18.2	33.6
TRIMBLE	44.6	3.6	7.8	35	30	39.6	60	41.8	3.6	14.8	39.4
PLEASANT VALLEY ¹	6.2	0	0.6	1	0.2	1	1.6	2	4	17.0	
ROSS LAKE	35.8	2	37	27.4	14.8	23	55	6.2		12.4	5.8
WATERLOO	41.6	10	6.4	12.4	12.6	35	51.6	25	2.8	6.6	28.4
ACADIA CLIFFS	37.6	4.6	14.8	11.4	8.8	53.4	52.4	27	8.4	32.0	37.4
FALLSVILLE	3.2	15.6	8.8	20.6	11.6	53.8	25.32	0.8	40.8	63.6	17.4
FOX LAKE	32.64	6	2.6	32.8	2.2	41.8	39.2	4	1	11.8	26.2
WELLSTON	39.8	3.8	28.2	27.2	10.6	48.6	38.4	11.6	15.8	18.0	28.0
EAST FORK	40.4	1.2	32.8	0.48	7.2	22.8	31	2.4	1.2	24.6	14.4
TRANQUILITY	7.2	3.6	2.8	36.6	10.4	36.6	33.8	4.4	7.2	36.6	34.0
COOPER HOLLOW	73.4	0	23.2	61.2	30.8	59.8	68	25.4	11	37	42.4
TYCOON LAKE	61.4	0	6	41.8	13.4	58	66	10.8	5.6	48.0	41.6
CROWN CITY	58.4	0.6	23.4	57.4	21.8	72.4	70.6	17.2	18.8	14.0	35.8



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¹No survey completed

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FIGURE 1.
AVERAGE PERCENTAGE OF OAK TREES BEARING ACORNS, 2006 TO PRESENT (A) AND AVERAGE PERCENTAGE OF CROWN WITH ACORNS, 2008 TO PRESENT (B) BASED ON MAST SURVEYS FROM 38 WILDLIFE AREAS.

