



NATIONAL

Bridging the 50-State Survey
of Fishing, Hunting, and Wildlife-
Associated Recreation with
Previous National Survey of
Fishing, Hunting, and Wildlife-
Associated Recreation Trends

Final Methodology Overview

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OVERVIEW

In 2016, the Rockville Institute conducted the 50-State Survey of Fishing, Hunting and Wildlife-Associated Recreation (FHWAR); see more details in Rockville Institute (2018). Concurrently, the Census Bureau conducted the 2016 National Survey of FHWAR; see more details in U.S. Department of the Interior, U.S. Fish & Wildlife Service, and U.S. Department of Commerce U.S. Census Bureau (2018). The two surveys were based on samples of addresses intended to be representative of the United States population living in households, and used questionnaires as nearly identical as possible. Both surveys identified likely sports-persons and wildlife watchers within sampled households, and individual participation surveys covered all of calendar year 2016. However, differences in sample design, sample selection process and mode of data collection resulted in estimates that were substantially different between the surveys.

Estimates from the 2016 National Survey of FHWAR are directly comparable to those from previous surveys such as the 2011 National Survey of FHWAR; see U.S. Department of the Interior, U.S. Fish & Wildlife Service, and U.S. Department of Commerce U.S. Census Bureau (2014). Due to its modest sample size, it can only produce reliable estimates at the national and census division level. In contrast, the 50-State Survey of FHWAR produced state-level estimates, but these estimates are not directly comparable to those from previous surveys. The Rockville Institute therefore completed a project to create new state-level estimates that are calibrated to those of the 2016 National Survey of FHWAR. The dual purpose of these calibrated estimates is to maintain the fine level of granularity of the 50-State Survey of FHWAR but enable comparison to previous National Surveys of FHWAR.

Through this bridging project, the Rockville Institute created new state-level tables showing adjusted survey

estimates by state of residency of the participants. These tables show the estimated demographics, participation, days, trips and expenditures, for fishing, hunting and wildlife-related activities for residents of each of the 50 states and DC. The tables correspond to Tables 5, 15, 22, 28, 30, 33, 35, and 36 in the state reports released by the Rockville Institute in 2018, with the exception of Tables 28 and 33, where we report an extended set of statistics compared to those reported in the 50-State Survey of FHWAR report.

The calibration procedure used to create these tables involved a combination of data harmonization and statistical modeling of the differences between the two surveys. The procedure consisted of the following major steps. First, the estimated demographic compositions of both surveys were aligned at the census division level, using survey calibration methods. Second, a statistical model was developed to account for the differences in participation rates in hunting, fishing and wildlife-related activities between the two surveys. This “bridging model” was used to predict state-level participating rates that are consistent with those obtained using the Census Bureau methodology. By combining these predicted participation rates with the harmonized population estimates, calibrated estimates of the numbers of participants in each state were obtained. Third, the characteristics of the participants’ activities, such as the number and type of activities, days of participation and types of associated expenditures, were adjusted by means of estimated products or ratios of these characteristics between the two surveys. Finally, applying these products or ratios to the calibrated estimates of the participant numbers made it possible to produce the calibrated tables of estimates mentioned above. For more details about the bridging project, see Rockville Institute (2020).

References

- Rockville Institute. 2018. *2016 50-State Survey of Fishing, Hunting, and Wildlife-Related Recreation: National*.
- Rockville Institute. 2020. *Bridging the 50-State Surveys of Fishing, Hunting, and Wildlife-Associated Recreation with Previous National Survey of Fishing, Hunting, and Wildlife-Associated Recreation Trends. Final Methodology Report*.
- U.S. Department of the Interior, U.S. Fish and Wildlife Service, and U.S. Department of Commerce U.S. Census Bureau. 2014. *2011 National Survey of Fishing, Hunting, and Wildlife-Related Recreation*.
- U.S. Department of the Interior, U.S. Fish and Wildlife Service, and U.S. Department of Commerce U.S. Census Bureau. 2018. *2016 National Survey of Fishing, Hunting, and Wildlife-Related Recreation*.

APPENDIX A: POINT ESTIMATES

The tables in Appendix A depict the calibrated point estimates, subject to rounding error. The format of the calibrated tables in this appendix matches closely the format used in the 50-State Survey of FHWAR reports. Summary statistics reported in the calibrated tables are described below, by table.

Table 5

Fishing and hunting, participation, days, and trips

- Total fishing participation and total hunting participation: product-type statistics derived using model predictions for percent participation in the population and total population based on adjusted 50-State Survey of FHWAR weights.
- Total freshwater, freshwater except Great Lakes, Great Lakes, and saltwater fishing participation, total big game, small game, migratory birds, and other animals hunting participation: product-type statistics derived using total fishing participation, total hunting participation, percent participation of freshwater, freshwater except Great Lakes, Great Lakes, and saltwater fishing in all fishing, and percent participation of big game, small game, migratory birds, and other animals hunting in all hunting (columns denoted by %).
- Total fishing (all and subcategories) days/trips of participation and total hunting (all and subcategories) days/trips of participation: product-type statistics derived using total number of fishing (all and subcategories) participants, total number of hunting (all and subcategories) participants, and days/trips per participant (not displayed).
- Percent participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the fishing or hunting survey for the fishing and hunting sections, respectively.

Table 15

Fishing and hunting, demographics

- Total population (all and subcategories): composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final weights, using data from both the fishing and the hunting surveys.
- Total number of anglers and total number of hunters: product-type statistics derived using model predictions for percent participation in the population (columns denoted by % Pop.), and total population based on adjusted 50-State Survey of FHWAR final weights.
- Total number of sportspersons: ratio-type statistics derived using total number of anglers and percent anglers in sportspersons (not displayed).
- Total population, sportspersons, anglers, hunters, by demographics: product-type statistics, derived using total population, sportspersons, anglers, hunters participation, and percent demographic-specific participation in total participation (columns denoted by %).
- Percent demographic-specific population, sportspersons, anglers, hunters participation in total participation (columns denoted by %): composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final weights, using data from the fishing and hunting surveys.
- Percent demographic-specific anglers and hunters participation in the total demographic-specific population (columns denoted by % Pop.): ratio-type statistics, derived using total demographic-specific anglers and hunters participation and total demographic-specific population.

- Percent total and demographic-specific sportspersons participation in the total and demographic-specific population (column denoted by % Pop.): ratio-type statistics, derived using total population and sportspersons participation.

Table 22

Fishing and hunting, spenders and expenses

- Total fishing and hunting expenditure (all and subcategories) amount, total fishing expenditure (all and subcategories) amount, total hunting expenditure (all and subcategories) amount, and total unspecified expenditure amount: product-type statistics derived using expenditure amount per participant (columns denoted by Average Per Sportsperson), and total sportspersons participation (all and subcategories), total anglers participation (all and subcategories), total hunters participation (all and subcategories) and total sportspersons participation, respectively.
- Expenditure amount per participant (columns denoted by Average Per Sportsperson) and expenditure amount per spender (columns denoted by Average Per Spender):
 - > Fishing section: statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the fishing survey only.
 - > Hunting section: statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the hunting survey only.
 - > Fishing and hunting, and unspecified sections: except for some expenses and spenders noted in the table footnotes, these are composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final weights, using data from the fishing and hunting surveys.
- Total fishing and hunting (all and subcategories) number of spenders, total fishing (all and subcategories) number of spenders, total hunting (all and subcategories) number of spenders, and total unspecified number of spenders: product-type statistics derived using the percent spenders in total participation (not displayed), and total sportspersons participation (all and subcategories),

total anglers participation (all and subcategories), total hunters participation (all and subcategories) and total sportspersons participation, respectively.

Table 28

Wildlife watching, participation, days, and trips

- Total wildlife watching participation: product-type statistics derived using model predictions for percent participation in the population, and total population based on adjusted 50-State Survey of FHWAR final weights.
- Total away from home (all and subcategories) and around the home (all and subcategories) wildlife watching participation: product-type statistics derived using total wildlife watching participation, and percent participation of away from home (all and subcategories) and around the home (all and subcategories) wildlife watching in all wildlife watching (columns denoted by %).
- Total wildlife watching (all and subcategories) days/trips of participation: product-type statistics derived using total number of wildlife watching (all and subcategories) participants and days/trips per participant (not displayed).
- Percent participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey.
- Percent participation in the total population (column denoted by % Pop.): ratio-type statistics, derived using total population from Table 30 and wildlife watching participation.

Table 30

Wildlife watching, demographics

- Total population (all and subcategories): composite statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey. Note that the total population estimates in Tables 15 and 30 differ due to demographic harmonization without state targets estimated from the National Survey of FHWAR (information not available); see Rockville Institute (2020) for more details about the demographic harmonization.

- Total number of wildlife watchers: product-type statistics derived using model predictions for percent participation in the population (columns denoted by % Pop.) and total population based on adjusted 50-State Survey of FHWAR weights.
- Total number of away from home or around the home wildlife watchers: product-type statistics derived using total number of wildlife watchers, and percent away from home or around the home wildlife watchers in all wildlife watchers (columns denoted by % Pop. in Table 35; not displayed).
- Total population, wildlife watchers, away from home, around the home, by demographics: product-type statistics, derived using total population, wildlife watchers, away from home, around the home participation, and percent demographic-specific participation in total participation (columns denoted by %).
- Percent demographic-specific population, wildlife watchers, away from home, around the home participation in total participation (columns denoted by %): composite statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey.
- Percent demographic-specific wildlife watchers, participation in the total demographic-specific population (column denoted by % Pop.): ratio-type statistics, derived using total demographic-specific wildlife watchers participation and total demographic-specific population.
- Percent total and demographic-specific away from home and around the home participation in the total and demographic-specific population (columns denoted by % Pop.): ratio-type statistics, derived using total population and away from home and around the home participation, respectively.

Table 33

Wildlife watching, spenders and expenditures — three versions for all wildlife watchers, away from home wildlife watchers, and around the home wildlife watchers

- Total wildlife watching expenditure (all and subcategories) amount: product-type statistics derived using total number of wildlife watching (all and subcategories)

- participants and expenditure amount per participant (columns denoted by Average Per Wildlife Watcher).
- Expenditure amount per participant (columns denoted by Average Per Wildlife Watcher) and expenditure amount per spender (columns denoted by Average Per Spender): statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey only.
- Total wildlife watching (all and subcategories) number of spenders: product-type statistics derived using total number of wildlife watching (all and subcategories) participants and the percent spenders in total participation (columns denoted by Percent of Wildlife Watchers).
- Percent spenders in total participation (columns denoted by Percent of Wildlife Watchers): statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey only.

Table 35

Wildlife watchers participating in fishing and hunting

- Total number of wildlife watchers: product-type statistics derived using model predictions for percent participation in the population (columns denoted by % Pop. in Table 30), and total population based on adjusted 50-State Survey of FHWAR final weights (displayed in Table 30).
- Total number of away from home or around the home wildlife watchers: product-type statistics derived using total number of wildlife watchers, and percent away from home or around the home wildlife watchers in all wildlife watchers (columns not displayed).
- Total number of wildlife watchers, away from home, around the home who did not fish or hunt, fished or hunted, fished, hunted: product-type statistics, derived using total number of wildlife watchers, and percent sportsperson-specific category in the corresponding total participation (columns denoted by %).
- Percent sportsperson-specific category in the corresponding total participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final weights, using data from the wildlife watching survey.

Table 36

Sportspersons participating in wildlife watching

- Total number of sportspersons: ratio-type statistics derived using total number of anglers, percent anglers in sportspersons (not displayed).
- Total number of anglers or total number of hunters: product-type statistics derived using model predictions for percent participation in the population (columns denoted by % Pop. in Table 15), and total population based on adjusted 50-State Survey of FHWAR final weights (displayed in Table 15).
- Total number of sportspersons, anglers, or hunters who did not wildlife watch, wildlife watch, wildlife watch away from home, wildlife watch around the home: product-type statistics, derived using total number of sportspersons, anglers, or hunters, and percent wildlife watcher-specific category in the corresponding total participation (columns denoted by %).
- Percent wildlife watcher-specific category in the corresponding total participation (columns denoted by %): composite statistics constructed using 3-way composite factors to adjusted 50-State Survey of FHWAR final weights, using data from the fishing, hunting, and wildlife watching surveys.

Table 5

Anglers and Hunters, Days of Participation and Trips in the United States, by Type of Fishing and Hunting: 2016

(Population 16 years and older. Numbers in thousands)

	PARTICIPANTS		DAYS OF PARTICIPATION		TRIPS	
	#	%	#	%	#	%
ALL FISHING	34,709	100	618,381	100	393,187	100
All freshwater	29,073	84	501,856	81	306,370	78
Freshwater, except Great Lakes	28,585	82	479,860	78	296,085	75
Great Lakes	1,958	6	22,007	4	10,283	3
Saltwater	11,300	33	116,510	19	86,838	22
ALL HUNTING	10,592	100	216,601	100	165,154	100
Big game	8,397	79	142,517	66	87,317	53
Small game	4,284	40	54,294	25	40,233	24
Migratory birds	2,222	21	29,445	14	19,804	12
Other animals	2,102	20	29,528	14	17,841	11

NOTE: Detail does not add to total because of multiple responses.

Table 15 Anglers and Hunters, by Selected Characteristics: 2016
(State population 16 years and older. Numbers in thousands)

	POPULATION		SPORTSPERSONS			ANGLERS			HUNTERS		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
TOTAL	254,686	100	39,174	15	100	34,709	14	100	10,592	4	100
RESIDENCE DENSITY											
Urban	208,695	82	27,393	13	70	25,148	12	72	6,042	3	57
Rural	45,991	18	11,782	26	30	9,561	21	28	4,551	10	43
RESIDENCE SIZE											
Metropolitan Statistical Area (MSA)	235,104	92	34,307	15	88	30,723	13	89	8,664	4	82
1,000,000 or more	144,917	57	18,282	13	47	16,604	11	48	4,115	3	39
250,000 to 999,999	53,488	21	8,753	16	22	7,980	15	23	2,140	4	20
50,000 to 249,999	36,699	14	7,272	20	19	6,139	17	18	2,409	7	23
Outside MSA	19,582	8	4,867	25	12	3,987	20	11	1,929	10	18
SEX											
Male	121,775	48	24,204	20	62	21,095	17	61	7,757	6	73
Female	132,911	52	14,970	11	38	13,614	10	39	2,836	2	27
AGE											
16 to 17 years	8,541	3	1,865	22	5	1,668	20	5	321	4	3
18 to 24 years	28,351	11	4,150	15	11	3,681	13	11	1,429	5	13
25 to 34 years	43,977	17	7,597	17	19	6,897	16	20	2,154	5	20
35 to 44 years	40,455	16	7,340	18	19	6,754	17	19	1,783	4	17
45 to 54 years	42,969	17	6,626	15	17	5,630	13	16	1,780	4	17
55 to 64 years	42,022	16	6,116	15	16	5,299	13	15	1,601	4	15
65 years and older	48,372	19	5,480	11	14	4,780	10	14	1,524	3	14
65 to 74 years	28,895	11	3,671	13	9	3,211	11	9	1,022	4	10
75 and older	19,477	8	1,809	9	5	1,569	8	5	502	3	5
ETHNICITY											
Hispanic	42,603	17	4,231	10	11	4,081	10	12	1,103	3	10
Non-Hispanic	212,083	83	34,943	16	89	30,629	14	88	9,489	4	90
RACE											
White	190,982	75	32,488	17	83	28,391	15	82	9,229	5	87
African American	30,815	12	2,880	9	7	2,778	9	8	408	1	4
All Others	32,889	13	3,807	12	10	3,540	11	10	955	3	9

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Table 15 Anglers and Hunters, by Selected Characteristics: 2016 (continued)
(State population 16 years and older. Numbers in thousands)

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	POPULATION		SPORTSPERSONS			ANGLERS			HUNTERS		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
ANNUAL HOUSEHOLD INCOME											
Less than \$20,000	22,269	9	2,562	12	7	2,233	10	6	655	3	6
\$20,000 to \$29,999	17,710	7	1,734	10	4	1,489	8	4	405	2	4
\$30,000 to \$39,999	18,351	7	3,224	18	8	2,858	16	8	964	5	9
\$40,000 to \$49,999	16,174	6	2,522	16	6	2,257	14	7	686	4	6
\$50,000 to \$74,999	36,512	14	5,936	16	15	5,306	15	15	1,643	4	16
\$75,000 to \$99,999	27,409	11	4,316	16	11	3,755	14	11	1,290	5	12
\$100,000 to \$149,999	32,485	13	5,824	18	15	5,172	16	15	1,660	5	16
\$150,000 or more	30,217	12	6,523	22	17	6,010	20	17	1,543	5	15
Not reported	53,559	21	6,534	12	17	5,629	11	16	1,746	3	16
EDUCATION											
8 years or less	9,001	4	861	10	2	784	9	2	165	2	2
9 to 12 years	73,644	29	11,483	16	29	9,815	13	28	3,074	4	29
1 to 3 years of college	72,559	28	12,068	17	31	10,566	15	30	3,899	5	37
4 years or more of college	99,482	39	14,763	15	38	13,543	14	39	3,455	3	33

NOTE: Detail does not add to total because of multiple responses. Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population living in urban areas who fished, etc.). Columns labeled "% under Sportspersons, Anglers, and Hunters show the percentage of each column's participants who are described by the row heading (the percentage of anglers who lived in urban areas, etc.).

Table 22 Expenditures for Fishing and Hunting: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER SPORTSPERSON (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)
FISHING AND HUNTING	124,908,827	3,189	3,431	36,402
Food and lodging	17,809,740	455	619	28,773
Transportation	10,886,487	278	380	28,642
Other trip costs ²	15,702,666	401	583	26,941
Equipment (fishing, hunting)	21,059,139	538	804	26,203
Auxiliary equipment ³	7,334,545	187	578	12,690
Special equipment ⁴	37,941,268	969	9,346	4,060
Magazines, books, and DVDs	267,404	7	66	4,024
Membership dues/contributions	613,628	16	107	5,719
Other ⁵	13,293,989	339	532	24,982
FISHING	61,508,492	1,772	1,860	33,063
Food and lodging	14,196,660	409	524	27,094
Transportation	7,774,849	224	286	27,176
Other trip costs ²	13,457,213	388	468	28,775
Fishing equipment	9,834,707	283	400	24,577
Auxiliary equipment ³	1,998,388	58	327	6,110
Special equipment ⁴	10,299,846	297	4,765	2,161
Magazines, books, and DVDs	134,325	4	52	2,587
Membership dues/contributions	196,108	6	70	2,810
Other ⁵	3,616,397	104	181	19,953
HUNTING	33,744,329	3,186	3,193	10,567
Food and lodging	3,402,783	321	433	7,851
Transportation	2,691,428	254	352	7,653
Other trip costs ²	2,342,477	221	614	3,813
Hunting equipment	8,760,462	827	1,184	7,401
Auxiliary equipment ³	2,111,863	199	441	4,791
Special equipment ⁴	6,774,160	640	9,267	731
Magazines, books, and DVDs	81,645	8	65	1,260
Membership dues/contributions	208,498	20	132	1,578
Other ⁵	7,371,012	696	717	10,275
UNSPECIFIED⁶	21,939,113	560	4,134	5,307

1 Average expenditures are annual estimates.

2 Includes boating costs, equipment rental, guide fees, access fees, heating and cooking fuel, and ice and bait (for fishing only).

3 Includes sleeping bags, packs, duffel bags, tents, binoculars and field glasses, special fishing and hunting clothing, foul weather gear, boots and waders, maintenance and repair of equipment, processing and taxidermy costs, and electronic equipment such as a GPS device.

4 Includes big-ticket items bought primarily for hunting and fishing, including boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

5 Includes land leasing and ownership, licenses, stamps, tags, permits, and plantings (for hunting only).

6 Respondent could not specify whether expenditure was primarily for either fishing or hunting.

NOTE: Individual estimates do not add to total because of multiple responses, nonresponse, the independent bridging of fishing and hunting participation, and the bridging of sportspersons participation relative to fishing participation.

Table 28

Wildlife Watchers: 2016

(State population 16 years and older. Numbers in thousands)

	PARTICIPANTS			DAYS OF PARTICIPATION		TRIPS	
	#	%	% Pop.	#	%	#	%
WILDLIFE WATCHERS	87,990	100	35	7,237,671	100	737,441	100
Away from home	37,791	43	15	1,353,283	19	737,484	100
Observe wildlife	35,341	40	14	1,022,097	14	x	x
Photograph wildlife	23,161	26	9	597,938	8	x	x
Feed wildlife	12,453	14	5	652,160	9	x	x
Around the home	85,278	97	33	5,884,420	81	x	x
Observe wildlife	58,426	66	23	4,633,880	64	x	x
Photograph wildlife	38,046	43	15	653,665	9	x	x
Feed wildlife	58,029	66	23	x	x	x	x
Visit parks or natural areas ¹	27,598	31	11	596,888	8	x	x
Maintain plantings or natural areas	18,428	21	7	x	x	x	x

x Not applicable

¹ Includes visits only to parks or natural areas within one mile of home.

NOTE: Detail does not add to total because of multiple responses. Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population who observed wildlife away from home, etc.). Columns labeled "%" show the percentage of each column's participants who are described by the row heading (the percentage of wildlife watchers who observed wildlife away from home, etc.).

Table 30 Wildlife Watchers, by Selected Characteristics: 2016
(State population 16 years and older. Numbers in thousands)

	POPULATION		TOTAL			AWAY FROM HOME			AROUND THE HOME		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
TOTAL	254,686	100	87,990	35	100	37,791	15	100	85,278	33	100
RESIDENCE DENSITY											
Urban	208,695	82	69,858	33	79	31,570	15	84	67,330	32	79
Rural	45,991	18	18,132	39	21	6,221	14	16	17,948	39	21
RESIDENCE SIZE											
Metropolitan Statistical Area (MSA)	232,848	91	79,559	34	90	34,683	15	92	76,895	33	90
1,000,000 or more	145,049	57	47,825	33	54	21,133	15	56	45,962	32	54
250,000 to 999,999	53,233	21	19,109	36	22	8,213	15	22	18,555	35	22
50,000 to 249,999	34,566	14	12,626	37	14	5,337	15	14	12,378	36	15
Outside MSA	21,838	9	8,430	39	10	3,108	14	8	8,383	38	10
SEX											
Male	121,775	48	43,039	35	49	18,841	15	50	41,352	34	48
Female	132,911	52	44,950	34	51	18,950	14	50	43,926	33	52
AGE											
16 to 17 years	8,541	3	2,438	29	3	756	9	2	2,374	28	3
18 to 24 years	28,351	11	8,626	30	10	4,452	16	12	8,426	30	10
25 to 34 years	43,977	17	14,692	33	17	6,522	15	17	13,959	32	16
35 to 44 years	40,455	16	13,939	34	16	6,657	16	18	13,319	33	16
45 to 54 years	42,969	17	16,805	39	19	8,095	19	21	16,269	38	19
55 to 64 years	42,022	16	15,629	37	18	5,973	14	16	15,220	36	18
65 years and older	48,372	19	15,859	33	18	5,335	11	14	15,710	32	18
65 to 74 years	28,895	11	9,894	34	11	3,696	13	10	9,793	34	11
75 and older	19,477	8	5,967	31	7	1,640	8	4	5,917	30	7
ETHNICITY											
Hispanic	42,603	17	12,284	29	14	4,950	12	13	11,737	28	14
Non-Hispanic	212,083	83	75,705	36	86	32,841	15	87	73,541	35	86
RACE											
White	193,018	76	69,266	36	79	28,878	15	76	67,184	35	79
African American	31,047	12	8,509	27	10	3,747	12	10	8,095	26	9
All Others	30,621	12	10,214	33	12	5,165	17	14	10,000	33	12

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Table 30 Wildlife Watchers, by Selected Characteristics: 2016 (continued)
(State population 16 years and older. Numbers in thousands)

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	POPULATION		TOTAL			AWAY FROM HOME			AROUND THE HOME		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
ANNUAL HOUSEHOLD INCOME											
Less than \$20,000	22,269	9	8,053	36	9	3,697	17	10	7,951	36	9
\$20,000 to \$29,999	17,710	7	6,007	34	7	2,510	14	7	5,906	33	7
\$30,000 to \$39,999	18,351	7	6,568	36	7	2,790	15	7	6,361	35	7
\$40,000 to \$49,999	16,174	6	4,493	28	5	2,108	13	6	4,238	26	5
\$50,000 to \$74,999	36,512	14	12,934	35	15	5,917	16	16	12,481	34	15
\$75,000 to \$99,999	27,409	11	8,954	33	10	4,211	15	11	8,610	31	10
\$100,000 to \$149,999	32,485	13	12,029	37	14	5,183	16	14	11,528	35	14
\$150,000 or more	30,217	12	11,770	39	13	5,766	19	15	11,368	38	13
Not reported	53,559	21	17,183	32	20	5,607	10	15	16,833	31	20
EDUCATION											
8 years or less	9,643	4	2,525	26	3	893	9	2	2,526	26	3
9 to 12 years	73,021	29	23,598	32	27	8,807	12	23	22,681	31	27
1 to 3 years of college	73,827	29	25,526	35	29	11,805	16	31	24,479	33	29
4 years or more of college	98,195	39	36,340	37	41	16,285	17	43	35,592	36	42

NOTE: Detail does not add to total because of multiple responses and nonresponse. Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population living in urban areas who participated, etc.). Columns labeled "% under TOTAL, Away From Home, and Around the Home show the percentage of each column's participants who are described by the row heading (the percentage of those who lived in urban areas, etc.).

Table 33A Expenditures for All Wildlife Watching: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	133,858,542	1,521	1,949	68,680	78
TRIP-RELATED EXPENDITURES	49,537,603	563	1,477	33,531	38
Food and lodging	25,862,248	294	856	30,215	34
Food	13,716,871	156	458	29,938	34
Lodging	12,145,465	138	814	14,919	17
Transportation	16,524,354	188	530	31,159	35
Other trip costs ²	7,150,913	81	389	18,396	21
EQUIPMENT AND OTHER EXPENDITURES	84,320,939	958	1,340	62,941	72
Wildlife-watching equipment	19,552,076	222	342	57,181	65
Binoculars, spotting scopes	1,764,103	20	178	9,901	11
Film and photo processing	596,217	7	102	5,864	7
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	4,701,107	53	356	13,220	15
Day packs, carrying cases, and special clothing	3,365,337	38	207	16,286	19
Bird food	5,136,040	58	132	38,995	44
Food for other wildlife	1,726,355	20	113	15,239	17
Nest boxes, bird houses, bird feeders, and bird baths	1,958,648	22	79	24,749	28
Other equipment (including field guides)	304,268	3	41	7,346	8
Auxiliary equipment ³	4,633,619	53	335	13,816	16
Special equipment ⁴	37,126,146	422	5,405	6,869	8
Magazines, books, and DVDs	660,362	8	67	9,897	11
Membership dues and contributions	1,595,163	18	109	14,641	17
Land leasing and ownership	18,016,570	205	4,899	3,677	4
Plantings	2,737,004	31	239	11,452	13

1 Average expenditures are annual estimates.

2 Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

3 Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

4 Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

NOTE: Detail does not add to total because of multiple responses and nonresponse.

Table 33B Expenditures for Away-from-home Wildlife Watching: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	85,560,208	2,264	2,502	34,198	90
TRIP-RELATED EXPENDITURES	54,335,424	1,438	1,633	33,273	88
Food and lodging	30,558,912	809	966	31,643	84
Food	15,024,728	398	484	31,049	82
Lodging	15,534,222	411	828	18,762	50
Transportation	17,207,969	455	556	30,950	82
Other trip costs ²	6,568,543	174	402	16,324	43
EQUIPMENT AND OTHER EXPENDITURES	31,224,783	826	2,181	14,318	38
Wildlife-watching equipment	3,035,382	80	287	10,563	28
Binoculars, spotting scopes	369,933	10	201	1,840	5
Film and photo processing	93,078	2	98	946	3
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	815,333	22	293	2,780	7
Day packs, carrying cases, and special clothing	591,197	16	214	2,767	7
Bird food	468,793	12	126	3,719	10
Food for other wildlife	317,290	8	88	3,614	10
Nest boxes, bird houses, bird feeders, and bird baths	197,456	5	97	2,040	5
Other equipment (including field guides)	182,302	5	49	3,704	10
Auxiliary equipment ³	852,103	23	218	3,909	10
Special equipment ⁴	10,231,665	271	9,703	1,054	3
Magazines, books, and DVDs	253,424	7	83	3,038	8
Membership dues and contributions	503,182	13	101	4,993	13
Land leasing and ownership	16,348,988	433	9,951	1,643	4
Plantings	—	—	—	—	—

— No sample data

¹ Average expenditures are annual estimates.

² Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

³ Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

⁴ Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

NOTE: Detail does not add to total because of multiple responses and nonresponse.

Table 33C Expenditures for Around-the-home Wildlife Watching: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	39,620,804	465	734	54,011	63
TRIP-RELATED EXPENDITURES	x	x	x	x	x
Food and lodging	x	x	x	x	x
Food	x	x	x	x	x
Lodging	x	x	x	x	x
Transportation	x	x	x	x	x
Other trip costs ²	x	x	x	x	x
EQUIPMENT AND OTHER EXPENDITURES	39,620,804	465	734	54,011	63
Wildlife-watching equipment	10,046,826	118	207	48,626	57
Binoculars, spotting scopes	586,114	7	116	5,057	6
Film and photo processing	208,589	2	91	2,300	3
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	1,870,482	22	348	5,367	6
Day packs, carrying cases, and special clothing	1,098,804	13	151	7,290	9
Bird food	4,026,474	47	113	35,697	42
Food for other wildlife	861,987	10	91	9,490	11
Nest boxes, bird houses, bird feeders, and bird baths	1,328,030	16	64	20,816	24
Other equipment (including field guides)	66,431	1	33	2,012	2
Auxiliary equipment ³	1,353,784	16	234	5,778	7
Special equipment ⁴	20,033,446	235	6,068	3,302	4
Magazines, books, and DVDs	186,929	2	47	3,984	5
Membership dues and contributions	569,996	7	80	7,151	8
Land leasing and ownership	5,634,726	66	4,826	1,167	1
Plantings	1,795,096	21	264	6,808	8

— No sample data x Not applicable

¹ Average expenditures are annual estimates.

² Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

³ Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

⁴ Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

NOTE: Detail does not add to total because of multiple responses and nonresponse.

Table 35 Wildlife Watchers Participating in Fishing or Hunting: 2016
(State population 16 years and older. Numbers in thousands)

	TOTAL		AWAY FROM HOME		AROUND THE HOME	
	#	%	#	%	#	%
ALL WILDLIFE WATCHERS	87,990	100	37,791	100	85,278	100
Did not fish or hunt	59,334	67	22,495	60	57,603	68
Fished or hunted	28,656	33	15,296	40	27,674	32
Fished	25,603	29	13,583	36	25,021	29
Hunted	11,311	13	6,976	18	10,731	13

NOTE: Detail does not add to total because of multiple responses and nonresponse.

Table 36 Sportspersons Participating in Wildlife Watching: 2016
(State population 16 years and older. Numbers in thousands)

	SPORTSPERSONS		ANGLERS		HUNTERS	
	#	%	#	%	#	%
ALL SPORTSPERSONS	39,174	100	34,709	100	10,592	100
Did not watch wildlife	11,220	29	9,879	28	2,663	25
Watched wildlife	27,873	71	24,752	71	7,917	75
Away from home	16,630	42	14,785	43	5,171	49
Around the home	25,813	66	22,997	66	7,222	68

NOTE: Detail does not add to total because of multiple responses and nonresponse.

APPENDIX B: STANDARD ERRORS

The tables in Appendix B depict the standard errors, subject to rounding error, corresponding to the calibrated point estimates reported in the tables in Appendix A. Summary statistics reported in these calibrated tables are described below, by table.

Table 5

Fishing and hunting, participation, days, and trips

- Standard errors of total fishing participation and total hunting participation: product-type statistics derived using model point estimates and standard errors of percent participation in the population and survey point estimates and standard errors of total population based on adjusted 50-State Survey of FHWAR weights.
- Standard errors of total freshwater, freshwater except Great Lakes, Great Lakes, and saltwater fishing participation, total big game, small game, migratory birds, and other animals hunting participation: product-type statistics derived using point estimates and standard errors of total fishing participation, point estimates and standard errors of total hunting participation, point estimates and standard errors of percent participation of freshwater, freshwater except Great Lakes, Great Lakes, and saltwater fishing in all fishing, and point estimates and standard errors of percent participation of big game, small game, migratory birds, and other animals hunting in all hunting (columns denoted by %).
- Standard errors of total fishing (all and subcategories) days/trips of participation and total hunting (all and subcategories) days/trips of participation: product-type statistics derived using point estimates and standard errors of total number of fishing (all and subcategories) participants, point estimates and standard errors of total number of hunting (all and subcategories) participants, and point estimates and standard errors of days/trips per participant (not displayed).

- Standard errors of percent participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the fishing or hunting survey for the fishing and hunting sections, respectively.

Table 15

Fishing and hunting, demographics

- Standard errors of total population (all and subcategories): composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final and replicate weights, using data from both the fishing and the hunting surveys.
- Standard errors of total number of anglers and total number of hunters: product-type statistics derived using model point estimates and standard errors for percent participation in the population (columns denoted by % Pop.) and survey point estimates and standard errors of total population based on adjusted 50-State Survey of FHWAR final and replicate weights.
- Standard errors of total number of sportspersons: ratio-type statistics derived using point estimates and standard errors of total number of anglers and point estimates and standard errors of percent anglers in sportspersons (not displayed).
- Standard errors of total population, sportspersons, anglers, hunters, by demographics: product-type statistics, derived using point estimates and standard errors of total population, sportspersons, anglers, hunters participation, and point estimates and standard errors of percent demographic-specific participation in total participation (columns denoted by %).

- Standard errors of percent demographic-specific population, sportspersons, anglers, hunters participation in total participation (columns denoted by %): composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final and replicate weights, using data from the fishing and hunting surveys.
- Standard errors of percent demographic-specific anglers and hunters participation in the total demographic-specific population (columns denoted by % Pop.): ratio-type statistics, derived using point estimates and standard errors of total demographic-specific anglers and hunters participation and total demographic-specific population.
- Standard errors of percent total and demographic-specific sportspersons participation in the total and demographic-specific population (column denoted by % Pop.): ratio-type statistics, derived using point estimates and standard errors of total population and sportspersons participation.

Table 22

Fishing and hunting, spenders and expenses

- Standard errors of total fishing and hunting expenditure (all and subcategories) amount, total fishing expenditure (all and subcategories) amount, total hunting expenditure (all and subcategories) amount, and total unspecified expenditure amount: product-type statistics derived using point estimates and standard errors of expenditure amount per participant (columns denoted by Average Per Sportsperson), and point estimates and standard errors of total sportspersons participation (all and subcategories), point estimates and standard errors of total anglers participation (all and subcategories), point estimates and standard errors of total hunters participation (all and subcategories) and point estimates and standard errors of total sportspersons participation, respectively.
- Standard errors of expenditure amount per participant (columns denoted by Average Per Sportsperson) and expenditure amount per spender (columns denoted by Average Per Spender):
 - > Fishing section: statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the fishing survey only.

- > Hunting section: statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the hunting survey only.
- > Fishing and hunting, and unspecified sections: except for some expenses and spenders noted in the table footnotes, these are composite statistics constructed using 2-way composite factors to adjusted 50-State Survey of FHWAR final and replicate weights, using data from the fishing and hunting surveys.
- Standard errors of total fishing and hunting (all and subcategories) number of spenders, total fishing (all and subcategories) number of spenders, total hunting (all and subcategories) number of spenders, and total unspecified number of spenders: product-type statistics derived using the point estimates and standard errors of percent spenders in total participation (not displayed), and point estimates and standard errors of total sportspersons participation (all and subcategories), point estimates and standard errors of total anglers participation (all and subcategories), point estimates and standard errors of total hunters participation (all and subcategories) and point estimates and standard errors of total sportspersons participation, respectively.

Table 28

Wildlife watching, participation, days, and trips

- Standard errors of total wildlife watching participation: product-type statistics derived using model point estimates and standard errors of percent participation in the population, and survey point estimates and standard errors of total population based on adjusted 50-State Survey of FHWAR final and replicate weights.
- Standard errors of total away from home (all and subcategories) and around the home (all and subcategories) wildlife watching participation: product-type statistics derived using point estimates and standard errors of total wildlife watching participation, point estimates and standard errors of percent participation of away from home (all and subcategories) and point estimates and standard errors of around the home (all and subcategories) wildlife watching in all wildlife watching (columns denoted by %).

- Standard errors of total wildlife watching (all and sub-categories) days/trips of participation: product-type statistics derived using point estimates and standard errors of total number of wildlife watching (all and subcategories) participants and point estimates and standard errors of days/trips per participant (not displayed).
- Standard errors of percent participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey.
- Standard errors of percent participation in the total population (column denoted by % Pop.): ratio-type statistics, derived using point estimates and standard errors of total population from Table 30 and point estimates and standard errors of wildlife watching participation.

Table 30

Wildlife watching, demographics

- Standard errors of total population (all and subcategories): composite statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey. Note that the standard errors of total population estimates in Tables 15 and 30 differ due to demographic harmonization without state targets estimated from the National Survey of FHWAR (information not available); see Rockville Institute (2020) for more details about the demographic harmonization.
- Standard errors of total number of wildlife watchers: product-type statistics derived using model point estimates and standard errors of percent participation in the population (columns denoted by % Pop.) and survey standard error of total population based on adjusted 50-State Survey of FHWAR final and replicate weights.
- Standard errors of total number of away from home or around the home wildlife watchers: product-type statistics derived using point estimates and standard errors of total number of wildlife watchers and point estimates and standard errors of percent away from home or around the home wildlife watchers in all wildlife watchers (columns denoted by % Pop. in Table 35).

- Standard errors of total population, wildlife watchers, away from home, around the home, by demographics: product-type statistics, derived using point estimates and standard errors of total population, wildlife watchers, away from home, around the home participation and point estimates and standard errors of percent demographic-specific participation in total participation (columns denoted by %).
- Standard errors of percent demographic-specific population, wildlife watchers, away from home, around the home participation in total participation (columns denoted by %): composite statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey.
- Standard errors of percent demographic-specific wildlife watchers in the total demographic-specific population (column denoted by % Pop.): ratio-type statistics, derived using point estimates and standard errors of total demographic-specific wildlife watchers participation and point estimates and standard errors of total demographic-specific population.
- Standard errors of percent total and demographic-specific away from home and around the home participation in the total and demographic-specific population (columns denoted by % Pop.): ratio-type statistics, derived using point estimates and standard errors of total population and away from home and around the home participation, respectively.

Table 33

Wildlife watching, spenders and expenditures — three versions for all wildlife watchers, away from home wildlife watchers, and around the home wildlife watchers

- Standard errors of total wildlife watching expenditure (all and subcategories) amount: product-type statistics derived using point estimates and standard errors of total number of wildlife watching (all and subcategories) participants and point estimates and standard errors of expenditure amount per participant (columns denoted by Average Per Wildlife Watcher).

- Standard errors or expenditure amount per participant (columns denoted by Average Per Wildlife Watcher) and expenditure amount per spender (columns denoted by Average Per Spender): statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey only.
- Standard errors of total wildlife watching (all and subcategories) number of spenders: product-type statistics derived using point estimates and standard errors of total number of wildlife watching (all and subcategories) participants and point estimates and standard errors of the percent spenders in total participation (columns denoted by Percent of Wildlife Watchers).
- Standard errors of percent spenders in total participation (columns denoted by Percent of Wildlife Watchers): statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey only.

Table 35

Wildlife watchers participating in fishing and hunting

- Standard errors of total number of wildlife watchers: product-type statistics derived using model point estimates and standard errors of percent participation in the population (columns denoted by % Pop. in Table 30) and survey point estimates and standard errors of total population based on adjusted 50-State Survey of FHWAR final and replicate weights (displayed in Table 30).
- Standard errors of total number of away from home or around the home wildlife watchers: product-type statistics derived using point estimates and standard errors of total number of wildlife watchers and point estimates and standard errors of percent away from home or around the home wildlife watchers in all wildlife watchers (columns not displayed).
- Standard errors of total number of wildlife watchers, away from home, around the home who did not fish

or hunt, fished or hunted, fished, hunted: product-type statistics, derived using point estimates and standard errors of total number of wildlife watchers and point estimates and standard errors of percent sportsperson-specific category in the corresponding total participation (columns denoted by %).

- Standard errors or percent sportsperson-specific category in the corresponding total participation (columns denoted by %): statistics constructed using full adjusted 50-State Survey of FHWAR final and replicate weights, using data from the wildlife watching survey.

Table 36

Sportspersons participating in wildlife watching

- Standard errors of total number of sportspersons: ratio-type statistics derived using point estimates and standard errors of total number of anglers and point estimates and standard errors of percent anglers in sportspersons (not displayed).
- Standard errors of total number of anglers or total number of hunters: product-type statistics derived using model point estimates and standard errors of percent participation in the population (columns denoted by % Pop. in Table 15) and survey point estimates and standard errors of total population based on adjusted 50-State Survey of FHWAR weights (displayed in Table 15).
- Standard errors of total number of sportspersons, anglers, or hunters who did not wildlife watch, wildlife watch, wildlife watch away from home, wildlife watch around the home: product-type statistics, derived using point estimates and standard errors of total number of sportspersons, anglers, or hunters and point estimates and standard errors of percent wildlife watcher-specific category in the corresponding total participation (columns denoted by %).
- Standard errors of percent wildlife watcher-specific category in the corresponding total participation (columns denoted by %): composite statistics constructed using 3-way composite factors to adjusted 50-State Survey of FHWAR final and replicate weights, using data from the fishing, hunting, and wildlife watching surveys.

Table 5 SE Standard Errors of Anglers and Hunters, Days of Participation and Trips in the United States,
by Type of Fishing and Hunting: 2016
(Population 16 years and older. Numbers in thousands)

	PARTICIPANTS		DAYS OF PARTICIPATION		TRIPS	
	#	%	#	%	#	%
ALL FISHING	1,926.38	0.00	49,743.60	0.00	30,722.20	0.00
All freshwater	1,722.31	1.74	45,724.29	2.41	27,787.19	3.30
Freshwater, except Great Lakes	1,696.98	1.74	44,039.80	2.37	27,081.54	3.22
Great Lakes	343.75	0.94	5,108.65	0.66	2,366.70	0.45
Saltwater	1,226.96	3.04	15,356.97	2.41	12,562.51	3.30
ALL HUNTING	749.39	0.00	20,770.53	0.00	16,758.44	0.00
Big game	638.69	2.22	13,805.33	3.29	9,624.71	2.95
Small game	415.01	2.68	6,643.83	2.00	5,151.42	2.12
Migratory birds	278.27	2.17	7,598.04	3.06	3,803.55	1.80
Other animals	273.18	2.17	5,632.06	2.00	3,666.68	1.50

Table 15 SE Standard Errors of Anglers and Hunters, by Selected Characteristics: 2016
(State population 16 years and older. Numbers in thousands)

	POPULATION		SPORTSPERSONS			ANGLERS			HUNTERS		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
TOTAL	264.67	0.00	2,201.54	0.86	0.00	1,926.38	0.76	0.00	749.39	0.29	0.00
RESIDENCE DENSITY											
Urban	2,664.18	1.02	1,731.10	0.85	2.02	1,561.31	0.76	2.02	557.20	0.27	3.38
Rural	2,597.92	1.02	1,032.12	2.67	2.02	878.16	2.24	2.02	481.08	1.19	3.38
RESIDENCE SIZE											
Metropolitan Statistical Area (MSA)	1,149.10	0.43	1,958.29	0.84	0.88	1,733.78	0.74	0.91	636.53	0.27	1.63
1,000,000 or more	2,565.91	1.00	1,275.91	0.91	1.93	1,167.15	0.83	2.07	465.90	0.33	3.44
250,000 to 999,999	1,973.88	0.77	730.69	1.49	1.38	703.44	1.43	1.58	258.35	0.51	1.98
50,000 to 249,999	1,770.76	0.70	642.56	1.99	1.27	583.56	1.78	1.37	277.60	0.82	2.07
Outside MSA	1,080.07	0.43	438.69	2.63	0.88	384.08	2.26	0.91	219.33	1.24	1.63
SEX											
Male	1,074.38	0.43	1,517.09	1.26	1.72	1,342.19	1.11	1.89	607.08	0.50	2.46
Female	1,111.97	0.43	1,076.61	0.82	1.72	1,000.84	0.76	1.89	328.06	0.25	2.46
AGE											
16 to 17 years	562.44	0.22	294.51	3.74	0.70	282.65	3.55	0.77	73.09	0.89	0.66
18 to 24 years	1,093.92	0.43	597.12	2.18	1.41	579.80	2.11	1.57	318.69	1.14	2.86
25 to 34 years	1,367.49	0.54	885.49	2.08	1.98	840.74	1.97	2.16	422.61	0.97	3.73
35 to 44 years	1,724.85	0.68	700.49	1.90	1.45	660.54	1.78	1.57	227.32	0.59	1.79
45 to 54 years	1,159.18	0.45	617.71	1.50	1.26	553.30	1.34	1.32	209.44	0.50	1.58
55 to 64 years	1,253.15	0.49	526.70	1.33	1.02	470.82	1.18	1.06	187.09	0.46	1.41
65 years and older	1,367.12	0.53	506.69	1.10	1.03	456.08	0.98	1.07	191.05	0.40	1.49
65 to 74 years	1,024.10	0.40	381.33	1.39	0.82	350.51	1.28	0.87	141.26	0.50	1.15
75 and older	806.17	0.31	264.15	1.41	0.62	242.06	1.29	0.65	114.76	0.60	1.03
ETHNICITY											
Hispanic	2,111.76	0.83	782.56	1.90	1.91	780.02	1.89	2.15	416.86	0.99	3.88
Non-Hispanic	2,074.14	0.83	2,100.52	1.00	1.91	1,856.56	0.89	2.15	786.40	0.37	3.88
RACE											
White	2,793.03	1.10	1,968.31	1.06	1.88	1,732.37	0.93	2.08	764.03	0.41	3.75
African American	1,648.34	0.65	428.18	1.48	1.01	415.11	1.43	1.11	115.36	0.38	1.06
All Others	2,318.92	0.91	672.95	2.20	1.63	658.84	2.14	1.81	402.27	1.24	3.75

(continued on next page)

Table 15 SE Standard Errors of Anglers and Hunters, by Selected Characteristics: 2016 (continued)
(State population 16 years and older. Numbers in thousands)

(continued from previous page)

	POPULATION		SPORTSPERSONS			ANGLERS			HUNTERS		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
ANNUAL HOUSEHOLD INCOME											
Less than \$20,000	1,395.56	0.55	368.48	1.80	0.87	336.82	1.64	0.90	120.74	0.57	1.06
\$20,000 to \$29,999	1,097.21	0.43	286.96	1.73	0.69	242.87	1.47	0.66	114.92	0.66	1.05
\$30,000 to \$39,999	1,216.02	0.48	533.07	3.13	1.28	531.08	3.07	1.46	366.33	2.03	3.41
\$40,000 to \$49,999	1,267.44	0.50	365.67	2.57	0.86	342.20	2.38	0.92	109.48	0.75	0.93
\$50,000 to \$74,999	1,510.48	0.59	572.47	1.71	1.19	539.54	1.60	1.30	209.79	0.60	1.65
\$75,000 to \$99,999	1,401.04	0.55	477.16	1.92	1.05	446.14	1.77	1.14	166.40	0.65	1.32
\$100,000 to \$149,999	1,090.03	0.43	628.74	2.03	1.37	585.12	1.88	1.47	292.21	0.92	2.53
\$150,000 or more	1,711.41	0.67	701.07	2.62	1.53	674.01	2.50	1.69	262.90	0.92	2.26
Not reported	1,972.58	0.77	685.33	1.36	1.48	597.60	1.18	1.47	272.10	0.52	2.29
EDUCATION											
8 years or less	1,146.59	0.45	196.33	2.50	0.49	194.20	2.43	0.55	38.67	0.49	0.35
9 to 12 years	2,732.77	1.07	890.25	1.34	1.57	803.02	1.20	1.70	313.34	0.45	2.13
1 to 3 years of college	2,699.87	1.06	941.46	1.44	1.67	866.17	1.31	1.84	451.84	0.65	3.39
4 years or more of college	2,413.39	0.94	1,077.62	1.14	1.76	1,012.47	1.07	1.96	374.70	0.39	2.69

NOTE: Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population living in urban areas who fished, etc.). Columns labeled "% Pop." under Sportspeople, Anglers, and Hunters show the percentage of each column's participants who are described by the row heading (the percentage of anglers who lived in urban areas, etc.).

Table 22 SE Standard Errors of Expenditures for Fishing and Hunting: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER SPORTSPERSON (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)
FISHING AND HUNTING	10,874,719.89	212.35	220.83	2,254.57
Food and lodging	1,825,466.15	39.03	51.88	1,841.35
Transportation	1,032,640.87	21.27	27.22	1,846.23
Other trip costs ²	2,425,401.22	57.76	82.62	1,787.83
Equipment (fishing, hunting)	1,690,352.61	30.86	43.96	1,763.74
Auxiliary equipment ³	1,438,379.01	35.23	101.35	1,017.06
Special equipment ⁴	4,928,939.16	113.62	798.66	436.35
Magazines, books, and DVDs	32,109.75	0.73	5.51	434.96
Membership dues/contributions	70,812.84	1.58	9.03	663.14
Other ⁵	1,709,465.53	39.31	60.79	1,684.95
FISHING	6,304,257.72	152.93	157.92	1,865.43
Food and lodging	1,731,867.28	44.50	55.14	1,603.43
Transportation	899,801.19	22.78	28.12	1,607.32
Other trip costs ²	2,430,598.14	66.74	78.77	1,681.68
Fishing equipment	906,437.13	20.88	28.70	1,510.60
Auxiliary equipment ³	324,307.90	8.79	45.97	733.58
Special equipment ⁴	1,869,954.23	51.37	938.01	339.68
Magazines, books, and DVDs	25,001.37	0.69	5.24	353.14
Membership dues/contributions	26,074.45	0.68	6.37	408.68
Other ⁵	781,522.56	21.79	39.18	1,414.84
HUNTING	3,493,890.07	241.44	242.21	747.79
Food and lodging	383,945.65	28.31	35.51	603.96
Transportation	289,745.61	20.67	26.48	598.90
Other trip costs ²	367,210.10	31.01	77.09	369.94
Hunting equipment	918,600.81	64.17	76.42	597.18
Auxiliary equipment ³	240,144.98	17.79	28.91	427.87
Special equipment ⁴	1,520,430.25	136.57	1,610.69	119.73
Magazines, books, and DVDs	13,161.49	1.12	7.33	167.65
Membership dues/contributions	36,485.61	3.16	17.87	195.15
Other ⁵	1,053,895.71	86.68	89.14	730.69
UNSPECIFIED ⁶	3,746,174.21	90.44	629.17	609.48

1 Average expenditures are annual estimates.

2 Includes boating costs, equipment rental, guide fees, access fees, heating and cooking fuel, and ice and bait (for fishing only).

3 Includes sleeping bags, packs, duffel bags, tents, binoculars and field glasses, special fishing and hunting clothing, foul weather gear, boots and waders, maintenance and repair of equipment, processing and taxidermy costs, and electronic equipment such as a GPS device.

4 Includes big-ticket items bought primarily for hunting and fishing, including boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

5 Includes land leasing and ownership, licenses, stamps, tags, permits, and plantings (for hunting only).

6 Respondent could not specify whether expenditure was primarily for either fishing or hunting.

Table 28 SE Standard Errors of Wildlife Watchers: 2016
(State population 16 years and older. Numbers in thousands)

	PARTICIPANTS			DAYS OF PARTICIPATION		TRIPS	
	#	%	% Pop.	#	%	#	%
WILDLIFE WATCHERS	3,615.12	0.00	1.42	703,897.64	0.00	268,974.36	0.00
Away from home	2,069.90	1.56	0.81	279,175.90	2.73	266,947.14	0.00
Observe wildlife	2,001.55	1.57	0.79	220,021.75	2.29	x	x
Photograph wildlife	1,609.85	1.48	0.63	205,827.43	2.43	x	x
Feed wildlife	1,075.47	1.08	0.42	269,492.83	3.32	x	x
Around the home	3,533.52	0.52	1.39	485,252.02	2.73	x	x
Observe wildlife	2,773.41	1.58	1.09	409,719.37	3.00	x	x
Photograph wildlife	2,043.41	1.50	0.80	61,527.44	0.66	x	x
Feed wildlife	2,771.78	1.61	1.09	x	x	x	x
Visit parks or natural areas ¹	1,694.95	1.43	0.67	68,507.02	0.74	x	x
Maintain plantings or natural areas	1,427.85	1.38	0.56	x	x	x	x

x Not applicable

¹ Includes visits only to parks or natural areas within one mile of home.

NOTE: Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population who observed wildlife away from home, etc.). Columns labeled "%" show the percentage of each column's participants who are described by the row heading (the percentage of wildlife watchers who observed wildlife away from home, etc.).

Table 30 SE Standard Errors of Wildlife Watchers, by Selected Characteristics: 2016
(State population 16 years and older. Numbers in thousands)

	POPULATION		TOTAL			AWAY FROM HOME			AROUND THE HOME		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
TOTAL	264.67	0.00	3,615.12	1.42	0.00	2,069.72	0.81	0.00	3,533.55	1.39	0.00
RESIDENCE DENSITY											
Urban	2,664.18	1.02	3,070.00	1.53	1.24	1,835.31	0.90	1.63	2,987.70	1.49	1.25
Rural	2,597.93	1.02	1,319.87	3.63	1.24	703.56	1.71	1.63	1,302.28	3.59	1.25
RESIDENCE SIZE											
Metropolitan Statistical Area (MSA)	1,784.68	0.68	3,365.14	1.47	0.91	1,943.42	0.84	1.09	3,284.93	1.43	0.94
1,000,000 or more	3,225.61	1.26	2,473.53	1.86	1.71	1,467.82	1.06	2.39	2,415.55	1.81	1.74
250,000 to 999,999	2,579.88	1.01	1,467.01	3.26	1.41	896.56	1.84	2.06	1,446.20	3.20	1.44
50,000 to 249,999	1,832.56	0.72	965.47	3.40	0.93	577.06	1.86	1.32	966.12	3.38	0.96
Outside MSA	1,733.13	0.68	871.39	5.03	0.91	444.56	2.33	1.09	871.51	5.02	0.94
SEX											
Male	1,074.38	0.43	1,977.97	1.65	1.01	1,250.97	1.04	1.87	1,936.72	1.62	1.06
Female	1,111.97	0.43	2,048.47	1.57	1.01	1,255.93	0.95	1.87	2,031.67	1.55	1.06
AGE											
16 to 17 years	562.44	0.22	468.01	5.79	0.52	223.81	2.68	0.58	463.76	5.73	0.53
18 to 24 years	1,093.92	0.43	911.33	3.42	0.96	661.68	2.41	1.63	910.02	3.41	0.99
25 to 34 years	1,367.49	0.54	1,098.33	2.70	1.04	780.71	1.83	1.84	1,081.99	2.65	1.07
35 to 44 years	1,724.85	0.68	1,094.19	3.08	1.06	812.01	2.13	1.92	1,075.42	3.01	1.08
45 to 54 years	1,159.18	0.45	955.57	2.46	0.75	791.70	1.91	1.74	946.77	2.43	0.78
55 to 64 years	1,253.15	0.49	985.40	2.59	0.85	558.97	1.40	1.20	985.82	2.58	0.89
65 years and older	1,367.12	0.53	980.84	2.23	0.83	552.93	1.18	1.24	980.33	2.22	0.86
65 to 74 years	1,024.10	0.40	677.98	2.64	0.62	407.17	1.48	0.94	680.14	2.64	0.64
75 and older	806.17	0.31	518.43	2.95	0.52	248.83	1.32	0.62	515.50	2.93	0.53
ETHNICITY											
Hispanic	2,111.76	0.83	1,242.47	3.25	1.29	774.82	1.91	1.92	1,228.94	3.19	1.32
Non-Hispanic	2,074.14	0.83	3,311.15	1.60	1.29	1,939.57	0.93	1.92	3,249.52	1.57	1.32
RACE											
White	2,775.63	1.09	3,107.57	1.69	1.42	1,779.94	0.95	2.16	3,055.71	1.66	1.48
African American	1,616.20	0.63	921.50	3.29	0.97	709.97	2.37	1.80	920.76	3.26	1.01
All Others	2,336.46	0.92	1,110.59	4.43	1.17	695.62	2.61	1.68	1,110.17	4.40	1.21

(continued on next page)

Table 30 SE Standard Errors of Wildlife Watchers, by Selected Characteristics: 2016 (continued)
(State population 16 years and older. Numbers in thousands)

(continued from previous page)

	POPULATION		TOTAL			AWAY FROM HOME			AROUND THE HOME		
	Total	%	Total	% Pop.	%	Total	% Pop.	%	Total	% Pop.	%
ANNUAL HOUSEHOLD INCOME											
Less than \$20,000	1,395.56	0.55	820.62	4.33	0.85	577.40	2.79	1.43	817.59	4.30	0.88
\$20,000 to \$29,999	1,097.21	0.43	589.31	3.94	0.61	452.20	2.70	1.14	573.71	3.84	0.61
\$30,000 to \$39,999	1,216.02	0.48	718.38	4.58	0.76	488.57	2.85	1.23	715.11	4.52	0.78
\$40,000 to \$49,999	1,267.44	0.50	602.87	4.32	0.65	354.55	2.42	0.89	577.51	4.12	0.65
\$50,000 to \$74,999	1,510.48	0.59	896.08	2.86	0.82	646.75	1.89	1.48	870.70	2.77	0.82
\$75,000 to \$99,999	1,401.04	0.55	758.81	3.23	0.75	540.89	2.12	1.30	756.34	3.19	0.78
\$100,000 to \$149,999	1,090.03	0.43	823.60	2.82	0.75	559.66	1.80	1.28	809.89	2.76	0.77
\$150,000 or more	1,711.41	0.67	910.43	3.73	0.88	742.34	2.68	1.78	896.54	3.65	0.90
Not reported	1,972.58	0.77	1,298.77	2.70	1.24	834.35	1.60	2.06	1,278.40	2.65	1.26
EDUCATION											
8 years or less	1,865.32	0.73	523.20	7.42	0.58	412.10	4.63	1.08	523.83	7.43	0.60
9 to 12 years	3,210.31	1.26	1,488.31	2.48	1.28	828.93	1.25	1.79	1,465.15	2.43	1.32
1 to 3 years of college	3,263.61	1.29	1,637.73	2.69	1.43	1,096.49	1.64	2.35	1,598.10	2.61	1.45
4 years or more of college	3,326.21	1.30	2,020.05	2.41	1.55	1,254.08	1.40	2.34	1,999.92	2.38	1.59

NOTE: Percent population (% Pop.) columns show the percentage of each row's population who participated in the activity named by the column (the percentage of the population living in urban areas who participated, etc.). Columns labeled "% under TOTAL, Away From Home, and Around the Home show the percentage of each column's participants who are described by the row heading (the percentage of those who lived in urban areas, etc.).

Table 33A SE Standard Errors of Expenditures for All Wildlife Watching Both In and Out of National: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	13,482,900.36	140.02	177.42	3,025.05	1.24
TRIP-RELATED EXPENDITURES	4,845,920.16	50.02	105.61	1,871.00	1.44
Food and lodging	2,436,629.50	24.94	61.30	1,740.11	1.39
Food	1,312,902.87	13.49	33.81	1,735.72	1.39
Lodging	1,391,361.15	14.77	71.67	1,273.71	1.27
Transportation	1,775,092.70	18.66	41.14	1,810.98	1.46
Other trip costs ²	1,659,011.42	18.57	82.14	1,376.82	1.31
EQUIPMENT AND OTHER EXPENDITURES	10,226,927.13	109.45	153.52	2,849.37	1.36
Wildlife-watching equipment	1,326,653.45	12.01	17.81	2,657.95	1.41
Binoculars, spotting scopes	233,134.59	2.52	16.52	945.62	0.97
Film and photo processing	119,147.36	1.33	14.23	773.45	0.84
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	457,646.19	4.72	21.94	1,169.44	1.18
Day packs, carrying cases, and special clothing	353,882.23	3.71	13.20	1,371.68	1.36
Bird food	416,927.10	4.09	8.24	2,015.53	1.39
Food for other wildlife	241,179.45	2.62	10.79	1,346.54	1.36
Nest boxes, bird houses, bird feeders, and bird baths	171,200.81	1.72	4.69	1,477.31	1.22
Other equipment (including field guides)	42,413.12	0.46	3.94	901.30	0.97
Auxiliary equipment ³	619,200.59	6.70	34.19	1,320.38	1.36
Special equipment ⁴	4,716,704.28	50.77	577.46	839.24	0.90
Magazines, books, and DVDs	110,012.94	1.21	7.89	940.00	0.96
Membership dues and contributions	176,991.74	1.87	9.19	1,109.19	1.06
Land leasing and ownership	6,481,131.91	73.24	1,382.21	617.47	0.68
Plantings	355,288.79	3.83	23.93	1,004.12	1.01

¹ Average expenditures are annual estimates.

² Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

³ Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

⁴ Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

Table 33B SE Standard Errors of Expenditures for Away-from-home Wildlife Watching Both In and Out of National: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	18,121,742.43	463.92	507.34	2,013.85	1.96
TRIP-RELATED EXPENDITURES	5,682,898.60	128.30	143.26	2,036.09	2.41
Food and lodging	3,458,510.34	80.21	94.41	1,989.41	2.59
Food	1,917,304.26	45.89	54.62	1,968.71	2.63
Lodging	1,903,261.49	45.12	84.84	1,586.96	3.20
Transportation	1,834,119.86	41.70	48.42	1,996.78	2.80
Other trip costs ²	1,942,112.25	50.58	106.72	1,526.49	3.28
EQUIPMENT AND OTHER EXPENDITURES	14,735,985.99	387.88	994.40	1,502.02	3.40
Wildlife-watching equipment	851,490.51	22.13	66.32	1,313.79	3.13
Binoculars, spotting scopes	112,976.81	2.95	39.99	486.74	1.26
Film and photo processing	55,172.83	1.46	45.70	320.80	0.84
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	274,752.39	7.18	67.66	923.91	2.42
Day packs, carrying cases, and special clothing	177,367.76	4.62	39.14	693.33	1.79
Bird food	315,374.20	8.33	73.87	966.19	2.50
Food for other wildlife	186,421.09	4.92	43.03	965.00	2.50
Nest boxes, bird houses, bird feeders, and bird baths	100,881.85	2.66	31.87	708.08	1.85
Other equipment (including field guides)	61,432.56	1.61	11.92	788.76	2.02
Auxiliary equipment ³	243,238.77	6.33	64.09	1,063.60	2.76
Special equipment ⁴	5,983,503.12	157.87	4,516.17	324.04	0.84
Magazines, books, and DVDs	149,179.12	3.94	37.91	1,006.63	2.63
Membership dues and contributions	113,192.83	2.91	27.32	1,171.54	3.02
Land leasing and ownership	13,289,887.38	351.40	5,040.62	964.91	2.55
Plantings	—	—	—	—	—

— No sample data

¹ Average expenditures are annual estimates.

² Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

³ Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

⁴ Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

Table 33C SE Standard Errors of Expenditures for Around-the-home Wildlife Watching Both In and Out of National: 2016
(State population 16 years and older. Numbers in thousands)

	AMOUNT (thousands of \$)	AVERAGE PER WILDLIFE WATCHER (\$) ¹	AVERAGE PER SPENDER (\$) ¹	NUMBER OF SPENDERS (thousands)	PERCENT OF WILDLIFE WATCHERS
ALL EXPENDITURES	5,629,574.27	63.20	99.56	2,744.26	1.86
TRIP-RELATED EXPENDITURES	x	x	x	x	x
Food and lodging	x	x	x	x	x
Food	x	x	x	x	x
Lodging	x	x	x	x	x
Transportation	x	x	x	x	x
Other trip costs ²	x	x	x	x	x
EQUIPMENT AND OTHER EXPENDITURES	5,629,574.27	63.20	99.56	2,744.26	1.86
Wildlife-watching equipment	747,948.80	7.29	12.31	2,589.47	1.91
Binoculars, spotting scopes	99,660.40	1.13	16.31	786.74	0.89
Film and photo processing	76,136.73	0.89	27.55	361.28	0.41
Cameras, special lenses, video cameras, and other photographic equipment, including memory cards	314,006.25	3.57	40.14	806.63	0.91
Day packs, carrying cases, and special clothing	145,993.98	1.63	12.93	977.43	1.09
Bird food	354,620.76	3.67	7.85	2,228.96	1.96
Food for other wildlife	157,297.92	1.80	9.30	1,474.60	1.67
Nest boxes, bird houses, bird feeders, and bird baths	177,379.71	1.98	5.89	1,835.08	1.90
Other equipment (including field guides)	14,225.36	0.16	4.69	356.66	0.41
Auxiliary equipment ³	313,700.92	3.62	44.02	858.01	0.97
Special equipment ⁴	4,014,158.29	46.09	984.60	512.78	0.58
Magazines, books, and DVDs	34,934.24	0.40	7.35	493.64	0.55
Membership dues and contributions	68,752.06	0.76	8.74	788.04	0.86
Land leasing and ownership	2,705,096.00	31.63	2,450.81	336.64	0.39
Plantings	353,595.01	4.06	47.59	770.89	0.84

— No sample data x Not applicable

¹ Average expenditures are annual estimates.

² Includes equipment rental and fees for guides, pack trips, public land use and private land use, boat fuel, other boating costs, and heating and cooking fuel.

³ Includes tents, tarps, frame packs and other backpacking equipment, other camping equipment, and other auxiliary equipment.

⁴ Includes boats, campers, cabins, trail bikes, dune buggies, 4 x 4 vehicles, ATVs, 4-wheelers, snowmobiles, pickups, vans, travel and tent trailers, motor homes, house trailers, recreational vehicles (RVs) and other special equipment.

Table 35 SE Standard Errors of Wildlife Watchers Participating in Fishing or Hunting: 2016
(State population 16 years and older. Numbers in thousands)

	TOTAL		AWAY FROM HOME		AROUND THE HOME	
	#	%	#	%	#	%
ALL WILDLIFE WATCHERS	3,615.12	0.00	2,069.72	0.00	3,533.55	0.00
Did not fish or hunt	2,714.36	1.36	1,514.17	2.33	2,668.21	1.40
Fished or hunted	1,676.63	1.36	1,215.21	2.33	1,654.46	1.40
Fished	1,574.13	1.33	1,118.26	2.21	1,561.19	1.37
Hunted	1,054.51	1.08	827.96	1.95	1,053.58	1.12

Table 36 SE Standard Errors of Sportspersons Participating in Wildlife Watching: 2016
(State population 16 years and older. Numbers in thousands)

	SPORTSPERSONS		ANGLERS		HUNTERS	
	#	%	#	%	#	%
ALL SPORTSPERSONS	2,201.54	0.00	1,926.38	0.00	749.39	0.00
Did not watch wildlife	815.77	1.32	750.64	1.48	284.48	2.02
Watched wildlife	1,649.71	1.32	1,466.72	1.48	599.00	2.01
Away from home	1,141.33	1.68	1,038.60	1.84	455.86	2.57
Around the home	1,553.00	1.42	1,389.95	1.59	571.29	2.42

