

The 2003 Economic Contributions of Spring Turkey Hunting

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Executive Summary

This project was conducted by Southwick Associates for the National Wild Turkey Federation. The purpose of this project was to quantify the 2003 economic benefits of spring turkey hunting to national, regional, and selected state economies. Spring turkey hunter expenditures were collected via a national telephone survey of spring turkey hunters conducted by Responsive Management, Inc. of Harrisonburg, VA in 2003. This survey also collected information on spring turkey hunters' demographics, attitudes, and behavior. Results from the survey, titled *Behavioral, Attitudinal, and Demographic Characteristics of Spring Turkey Hunters in the U.S.*, can be obtained from the National Wild Turkey Federation. To quantify the economic contributions of spring turkey hunting, economic models were developed using the Regional Input-Output modeling system produced by the U.S. Commerce Department's Bureau of Economic Analysis.

The major economic contributions from spring turkey hunting are presented in Table E-1. Nationally, 2,289,000 spring turkey hunters were estimated to have spent \$1.795 billion for the 2003 season. As these dollars switched hands from retailers to suppliers and employees, these expenditures stimulated a total of \$4.4 billion in economic activity across the U.S. This level of economic activity in turn supported 41,323 jobs, \$88.9 million in state tax sales and income tax revenues and \$198.6 million in federal income tax receipts.

Table E-1. Summary of the Economic Impacts of Spring Turkey Hunting, 2003

	<u>Midwest</u>	<u>Northeast</u>	<u>South</u>	<u>West</u>	<u>U.S.</u>
Average Per Hunter:	\$614.20	\$526.72	\$1,091.37	\$928.21	\$784.38
Total Retail Sales	\$450,766,827	\$305,367,250	\$896,522,699	\$142,482,948	\$1,795,139,724
Total Multiplier Effect	\$980,387,962	\$542,189,843	\$1,794,318,475	\$284,914,371	\$4,358,906,082
Salaries & Wages	\$255,062,171	\$142,681,255	\$443,847,648	\$75,084,670	\$1,146,559,491
Jobs (full & part time)	9,759	4,364	17,054	2,866	41,323
State Sales Taxes	\$23,608,620	\$12,520,276	\$44,355,657	\$6,943,846	\$69,412,953
State Income Taxes	\$7,104,602	\$3,726,279	\$10,557,279	\$2,302,598	\$19,443,209
Federal Income Taxes	\$42,572,559	\$26,910,277	\$73,879,525	\$12,551,440	\$198,566,760

Introduction

Spring turkey hunting is a rapidly growing segment of the hunting community. Occuring during a time of the year when other hunting opportunities are practically non-existent, spring turkey hunting provides hunters an opportunity to spend more days in the field each year. To help maximize the enjoyment and personal benefits received from spring turkey hunting, hunters spend significant amounts of money on equipment, practice and travel. This report quantifies these expenditures and the resulting economic benefits generated for national, regional and select state economies.

Unlike steel or textile industries which are easily identified by large factories, the spring turkey hunting “industry” is comprised of widely scattered retailers, manufacturers, and wholesalers and support services that, when considered together, form an important sector of the larger hunting industry. These businesses collectively spend and respend turkey hunters’ dollars on payroll, additional products and input, taxes and more to create numerous economic benefits for many. Recognizing that turkey hunter dollars are often spent in rural or lightly populated areas, their economic contributions can be especially important to the rural economic base. The results of this study can be used to help decision makers and public opinion leaders better understand the benefits spring turkey hunting provides to local, rural and national economies.

I. Summary of Data Sources & Methods

Spring turkey hunter expenditures were collected by Responsive Management, Inc. of Harrisonburg, VA through a national telephone survey of spring turkey hunters in 2003. This survey was based on a random sample of turkey hunting license holders. License records were obtained from the state wildlife agency for each state reported in this study, with the exception of California. Contact information for California turkey hunters was obtained from NWTF membership lists. This survey also collected information on spring turkey hunters' demographics, attitudes, and behavior. For detailed results and additional background information regarding this survey, titled *Behavioral, Attitudinal, and Demographic Characteristics of Spring Turkey Hunters in the U.S.*, contact the National Wild Turkey Federation. Details regarding how expenditure data were generated and analyzed are presented in Appendix B.

To generate economic impact estimates, the expenditure data were analyzed using economic models. Economic models statistically simulate how a dollar or other inputs affect the economy. In this study, economic models report how many times a dollar spent by a turkey hunter changes hands before it either leaves the region or can no longer be measured. The models also report the total wages and salaries created as a dollar changes hands. Multiplier data, the core information within any economic model, were obtained from the U.S. Department of Commerce's Regional Input-Output Modeling System (RIMS-II). A more detailed description of the methods used to generate the economic models and estimates is presented in Appendix B.

II. Expenditures

Table 1 presents the annual expenditure made by the average spring turkey hunter per region in 2003. The average spring turkey hunter in the U.S. spent \$207 for travel-related goods and services. In terms of trip expenditures, spring turkey hunters in the South region spent the most, averaging \$302 per hunter annually for expenses such as private transportation, food and beverages, and more. Spring turkey hunters in the Northeast spent the least, \$137 on average, for travel-related expenses.

In regards to equipment and non-travel related services, the average spring turkey hunter spent more for habitat improvement (\$104.66), trucks and other vehicles (\$79.87), and firearms (\$75.80) than any other item. Please note that not all hunters purchased these three items. On the contrary, only a small percentage of hunters actually reported such purchases. However, due to the higher cost of these items compared to the lower cost items typically purchased annually by most hunters (ammunition, calls, etc), these rare-event items represent the greatest average expense per hunter.

Table 1. Average Annual Expenditures Per Spring Turkey Hunter, By Region, 2003

	Region:				
	<u>Midwest</u>	<u>Northeast</u>	<u>South</u>	<u>West</u>	<u>U.S.</u>
Food, Drink & Refreshments	\$53.79	\$47.45	\$100.43	\$100.72	\$72.07
Lodging (Motels, Cabins, Campgrounds, Etc.)	\$20.90	\$10.67	\$16.56	\$18.51	\$16.59
Public Transportation (Airfare, Car Rentals, Etc.)	\$5.31	\$27.56	\$6.15	\$5.12	\$11.24
Transportation By Private Vehicle	\$46.59	\$45.45	\$92.60	\$93.38	\$65.95
Guide Fees, Pack Trip Or Package Fees	\$8.72	\$0.32	\$14.58	\$16.39	\$9.21
Public Land Use Or Access Fees	\$11.31	\$1.99	\$66.60	\$7.39	\$28.53
Other Trip Expenditures	\$3.30	\$3.06	\$4.75	\$3.07	\$3.74
Firearms	\$75.54	\$69.78	\$80.85	\$72.81	\$75.80
Archery Equipment	\$13.92	\$4.15	\$12.45	\$6.81	\$10.44
Sights, Scopes, Etc.	\$10.13	\$6.26	\$8.48	\$9.74	\$8.53
Turkey Calls	\$17.71	\$11.65	\$22.48	\$24.60	\$18.35
Ammunition	\$13.72	\$15.19	\$32.22	\$13.29	\$20.70
Handloading Equipment And Supplies	\$0.83	\$2.18	\$0.33	\$2.83	\$1.13
Decoys	\$7.75	\$5.20	\$8.30	\$10.08	\$7.46
Camping Equipment	\$3.18	\$9.15	\$24.90	\$8.48	\$12.84
Binoculars	\$11.04	\$11.43	\$7.53	\$18.41	\$10.37
Special Clothing	\$34.96	\$37.40	\$34.42	\$37.38	\$35.54
Taxidermy & Processing	\$14.30	\$3.85	\$13.60	\$18.93	\$11.71
Books & Magazines	\$6.71	\$4.70	\$7.60	\$11.67	\$6.85
Dues And Contributions To Non-Profits	\$38.05	\$7.07	\$37.36	\$112.51	\$34.95
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$5.28	\$4.63	\$5.68	\$15.92	\$5.97
Boats	\$0.46	\$0.00	\$10.28	\$0.26	\$3.85
Trucks, Campers, Travel Trailers, etc.	\$83.30	\$32.05	\$108.52	\$90.80	\$79.87
Habitat Improvement Expenditures	\$33.30	\$117.08	\$168.61	\$56.67	\$104.66
ATV & Off-road Vehicles	\$25.60	\$22.79	\$55.07	\$59.74	\$37.76
Other Special Equipment (Ice Chests, GPS, Etc.)	\$2.28	\$4.68	\$10.53	\$15.57	\$6.74
Licenses, Tags, Permits And Other Similar Fees	\$33.42	\$19.87	\$24.10	\$31.25	\$26.50
Land Owned Primarily For Spring Turkey Hunting	\$15.29	\$0.00	\$19.25	\$62.71	\$16.02
Land Leased Primarily For Spring Turkey Hunting	\$17.54	\$1.12	\$97.16	\$3.17	\$41.00
TOTALS:	\$614.20	\$526.72	\$1,091.37	\$928.21	\$784.38

Spring turkey hunters spent a total of \$1.795 billion for the Spring 2003 season (Table 2). Hunters spent the most on habitat improvement (\$239.5 million), trucks and other vehicles (\$182.8 million), and firearms (\$173.5 million). Other categories not typically associated with hunting also generate significant sales from spring turkey hunting including food and beverages (\$164.9 million), hotels and lodges (\$38.0 million), and more. Hunters also realize the value of conservation and advocacy efforts by non-profits, having given \$80 million to causes related to spring turkey hunting, both at the local and national levels.

Table 2. Annual Spring Turkey Hunting Expenditures Per Region, 2003

	Region:				
	<u>Midwest</u>	<u>Northeast</u>	<u>South</u>	<u>West</u>	<u>U.S.</u>
Food, Drink & Refreshments	\$39,475,614	\$27,510,158	\$82,498,345	\$15,461,358	\$164,945,475
Lodging (Motels, Cabins, Campgrounds, Etc.)	\$15,340,745	\$6,187,695	\$13,607,255	\$2,841,912	\$37,977,607
Public Transportation (Airfare, Car Rentals, Etc.)	\$3,896,210	\$15,980,233	\$5,051,938	\$785,706	\$25,714,087
Transportation By Private Vehicle	\$34,190,189	\$26,350,476	\$76,064,471	\$14,333,781	\$150,938,917
Guide Fees, Pack Trip Or Package Fees	\$6,396,428	\$185,817	\$11,976,213	\$2,515,726	\$21,074,184
Public Land Use Or Access Fees	\$8,304,135	\$1,152,063	\$54,707,391	\$1,134,518	\$65,298,108
Other Trip Expenditures	\$2,419,421	\$1,776,407	\$3,902,103	\$470,721	\$8,568,653
Firearms	\$55,441,459	\$40,452,288	\$66,413,532	\$11,177,179	\$173,484,458
Archery Equipment	\$10,218,014	\$2,404,468	\$10,223,216	\$1,045,799	\$23,891,496
Sights, Scopes, Etc.	\$7,435,657	\$3,630,858	\$6,965,602	\$1,494,532	\$19,526,649
Turkey Calls	\$12,995,354	\$6,752,206	\$18,464,368	\$3,775,440	\$41,987,369
Ammunition	\$10,067,193	\$8,803,901	\$26,464,900	\$2,040,688	\$47,376,682
Handloading Equipment And Supplies	\$606,090	\$1,263,564	\$271,236	\$434,021	\$2,574,911
Decoys	\$5,686,088	\$3,015,805	\$6,814,887	\$1,547,317	\$17,064,096
Camping Equipment	\$2,334,135	\$5,305,066	\$20,452,842	\$1,302,222	\$29,394,265
Binoculars	\$8,100,011	\$6,626,222	\$6,187,079	\$2,826,528	\$23,739,840
Special Clothing	\$25,658,431	\$21,680,856	\$28,271,875	\$5,737,709	\$81,348,871
Taxidermy & Processing	\$10,495,192	\$2,229,800	\$11,174,987	\$2,905,228	\$26,805,208
Books & Magazines	\$4,922,804	\$2,722,772	\$6,240,788	\$1,792,076	\$15,678,439
Dues And Contributions To Non-Profits	\$27,921,532	\$4,100,974	\$30,689,383	\$17,270,667	\$79,982,556
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$3,871,522	\$2,683,193	\$4,666,759	\$2,443,378	\$13,664,853
Boats	\$336,654	\$0	\$8,443,281	\$39,892	\$8,819,827
Trucks, Campers, Travel Trailers, etc.	\$61,136,390	\$18,581,667	\$89,146,881	\$13,938,072	\$182,803,010
Habitat Improvement Expenditures	\$24,435,479	\$67,878,420	\$138,507,551	\$8,698,291	\$239,519,740
ATV & Off-road Vehicles	\$18,785,300	\$13,211,565	\$45,239,778	\$9,170,448	\$86,407,092
Other Special Equipment (Ice Chests, GPS, Etc.)	\$1,675,528	\$2,712,923	\$8,651,717	\$2,389,987	\$15,430,156
Licenses, Tags, Permits And Other Similar Fees	\$24,528,036	\$11,517,496	\$19,795,441	\$4,797,602	\$60,638,576
Land Owned Primarily For Spring Turkey Hunting	\$11,221,804	\$0	\$15,813,661	\$9,626,173	\$36,661,639
Land Leased Primarily For Spring Turkey Hunting	\$12,871,410	\$650,358	\$79,815,218	\$485,976	\$93,822,962
TOTALS:	\$450,766,827	\$305,367,250	\$896,522,699	\$142,482,948	\$1,795,139,724

III. Economic Impacts

Expenditures made by turkey hunters generate rounds of additional spending throughout the U.S. economy, generating salaries and wages, tax revenues and other benefits. The figures in Table 3 present the total economic effect from 2003 spring turkey hunting. Appendix A provides definitions and explains the concepts behind economic impacts, while Appendix B describes the

methods used to quantify economic impacts. Tables detailing the economic contributions of spring turkey hunting in specific states are provided in Appendix C.

Table 3. Economic Impacts of Spring Turkey Hunting, Regional and National, 2003

	Retail Sales	Total Multiplier Effect	Salaries & Wages	Jobs	State Sales Taxes	State Income Taxes	Federal Income Taxes
Midwest	\$450,766,827	\$980,387,962	\$255,062,171	9,759	\$23,608,620	\$7,104,602	\$42,572,559
Northeast	\$305,367,250	\$542,189,843	\$142,681,255	4,364	\$12,520,276	\$3,726,279	\$26,910,277
South	\$896,522,699	\$1,794,318,475	\$443,847,648	17,054	\$44,355,657	\$10,557,279	\$73,879,525
West	\$142,482,948	\$284,914,371	\$75,084,670	2,866	\$6,943,846	\$2,302,598	\$12,551,440
U.S.¹	\$1,795,139,724	\$4,358,906,082	\$1,146,559,491	41,323	\$69,412,953	\$19,443,209	\$198,566,760

Total Multiplier Effect

Hunters' purchases stimulate round after round of additional spending in the economy. Retailers purchase more inventory, manufacturers buy input to produce more product, and all pay their employees who then spend their income in many different places. These rounds of spending are a major boost to local and national economies. Likewise, the reverse is true. If a particular item or industry is removed from the economy, the economic loss is greater than the original lost retail sale. Thus, if hunters were to no longer spend any dollars on spring turkey hunting, the U.S. economy could contract by \$4.359 billion. Vehicles and special clothing purchases provide the greatest economic impact for every dollar spent by spring turkey hunters, providing approximately \$3.26 and \$3.00 respectively in economic activity for every dollar spent. On average, each dollar spent by spring turkey hunters generates about \$2.40 in economic activity.

Salaries and Wages

Total household income (salaries and wages) resulting from the many rounds of spending created by spring turkey hunting dollars was estimated at \$1.147 billion.

Employment

During 2001, spring turkey hunting supported 41,323 full and part-time jobs in the U.S. These are jobs that are directly associated with spring turkey hunting, in addition to jobs in industries that indirectly support hunters.

Tax Revenues

Hunter expenditures generate sales tax revenues for states. In addition, the jobs generated by Spring turkey hunting activities create income tax revenues. Total state tax revenues generated by spring turkey hunters are estimated at \$88.9 million. State sales taxes include general sales

¹ The sum of the regional impact estimates is less than the U.S. impact estimate. As the geographic region under study expands, the economic impact of each dollar spent by hunters increases as each dollar has more opportunities to be respent before leaving the study region.

taxes as well as motor fuel (gasoline) taxes. Sales tax exemptions were made for food and other products in states where such taxes are not collected. Total federal income tax revenues generated by spring turkey hunting are estimated at \$198.6 million. See Appendix B for further details regarding tax calculations.

APPENDIX A DEFINITIONS

Economic benefits can be estimated by two types of economic measures: economic impacts and economic values. An **economic impact** addresses the business and financial activity resulting from the use of a resource. **Economic value**, on the other hand, is a non-business measure that estimates the value people receive from an activity after subtracting for their costs and expenditures. This concept is also known as consumer surplus.

There are three types of economic impact: direct, indirect and induced. A **direct impact** is defined as the economic impact of the initial purchase made by the consumer. **Indirect impacts** are the secondary effects generated from a direct impact. Indirect impacts indicate that sales in one industry affect not only that industry, but also the industries that supply the first industry. An **induced impact** results from the salaries and wages paid by the directly and indirectly impacted industries. The employees of these industries spend their income on various goods and services. These expenditures are induced impacts, which, in turn, create a continual cycle of indirect and induced effects.

The sum of the direct, indirect and induced impact effects is the **total economic impact**, or **total multiplier effect**, of the activity under study. This concept is also known by some as “output.” As the original retail purchase (direct impact) goes through round after round of indirect and induced effects, the economic impact of the original purchase is multiplied, benefiting many industries and individuals. Likewise, the reverse is true. If a particular item or industry is removed from the economy, the economic loss is greater than the original lost retail sale. Once the original retail purchase is made, each successive round of spending is smaller than the previous round. When the economic benefits are no longer measurable, the economic examination ends.

APPENDIX B METHODS

The methods used to generate the economic impact estimates of spring turkey hunting are separated into three stages:

- 1) Tabulate the average and total expenditures made by spring turkey hunters as recorded in the 2003 national telephone survey conducted by Responsive Management, Inc.
- 2) Disaggregate the expenditures into retail, wholesale, and manufacturer portions, or *margins*,
- 3) Generate the economic impact estimates by applying the multipliers from the RIMS model to the adjusted expenditures,
- 4) Calculate state sales tax, state income tax, and federal income tax revenues.

Source of Expenditure Data

Spring turkey hunter expenditures were collected by Responsive Management, Inc. of Harrisonburg, VA through a national telephone survey of spring turkey hunters in 2003. This survey was based on a random sample of turkey hunting license holders. License records were obtained from the state wildlife agency for each state reported in this study, with the exception of California. Contact information for California turkey hunters was obtained from NWTF membership lists. The states surveyed in each region are listed below, with the number of completed surveys per state listed in parenthesis:

<u>Midwest:</u>	<u>Northeast:</u>	<u>South:</u>	<u>West:</u>
Kansas (164)	New York (151)	Georgia (158)	California (151)
Ohio (154)		Mississippi (151)	Idaho (178)
		Texas (153)	Washington (150)

Expenditure data for the U.S. and for regions were developed using weighted averages.

The focus of the project was spring turkey hunting. Therefore, survey questions were designed to minimize the inclusion of fall turkey hunting and other hunting-related expenditures. For each expenditure category, each respondent was queried with a series of questions to account for related expenditures attributable only to spring turkey hunting, and to identify where the dollars were spent. An example of the questions asked is presented in Figure B-1:

Figure B-1: An Example of the Questions Used to Estimate Spring Turkey Hunting Expenditures (Source: text from the telephone questionnaire developed by Responsive Management and Southwick Associates, Inc. for use in "*Behavioral, Attitudinal, and Demographic Characteristics of Spring Turkey Hunters in the U.S.*", produced by Responsive Management Inc., 2003.)

64. Next, I'd like to ask you about your hunting equipment expenditures for spring turkey hunting last year. Please keep in mind that some of these purchases may have been dedicated to hunting multiple species, such as fall deer and spring turkey. First, I'm going to ask how much you spent in each category last year, then please tell me what percentage of that purchase is dedicated to spring turkey hunting only.

How much did you spend on all types of firearms including shotguns, rifles, black powder firearms, etc.? (ENTER ? FOR DON'T KNOW)

GUNS 12:154-161

\$|_|_|_|_|, |_|_|_|_|. |_|_|_|_|

IF (#64 = 0) GO TO #68

65. In what state(s) did you make this purchase? If you spent money in this category in more than one state, please indicate the percentage of your annual expenditure made in each state.
(ENTER 2-DIGIT STATE CODE(S); ? FOR DON'T KNOW)

GUNSST 12:162-167

|_|_|_|, |_|_|_|, |_|_|_|

66. INDICATE PERCENTAGES FOR EACH STATE HERE. ENTER 100% IN THE SPACE TO THE FAR RIGHT FOR ONLY ONE STATE.

STATES ARE: #65

GUNSPCT 12:168-176

|_|_|_|_|%, |_|_|_|_|%, |_|_|_|_|%

67. What percentage of the amount spent for firearms would you estimate is dedicated to spring turkey hunting only? (ENTER ? FOR DON'T KNOW)

PCTGUNS 12:177-179

|_|_|_|_|%

For each region presented in this study, only expenditures made within the region are included in the analysis. For example, if a resident of New York spent dollars to hunt turkey in Texas, and did not report any expenditures in New York, then these expenditures would only be added to the South region analysis, and not to the Northeast analysis.

The survey produced estimates of the *average* amount spent by turkey hunters annually for each equipment or service item. These were provided for each region and state examined in the survey. To produce estimates of the *total* dollars spent for spring turkey hunting, the average

amount spent per hunter were multiplied by the total number of spring turkey hunters. The number of hunters per state, region, and the U.S. were provided by the National Wild Turkey Federation. More details can be found in the final survey report. The total number of hunters are listed in Table B-1.

Table B-1. Number of Spring Turkey Hunters Per Region and for Selected States

Spring Turkey Hunters in the U.S.: 2,288,624					
Spring Turkey Hunters Per Region:					
Midwest:	733,906	Northeast:	579,748		
South:	821,467	West:	153,503		
Spring Turkey Hunters For Each State Examined in this Study:					
California:	24,706	Georgia:	42,181	Idaho:	17,700
Kansas:	39,373	Mississippi:	48,000	New York:	275,000
Ohio:	94,774	Texas:	73,528	Washington:	15,000

Margins

Before turkey hunting expenditures could be analyzed in the economic models, they had to be separated into manufacturing, wholesale and retail sub-categories. The economic models used in this analyses treats each segment as separate industries. The amount of each retail sale attributed to each segment is known as a margin.

A margin is the percentage, or mark-up, of a sale attributable to either the retail, wholesale or manufacturing sector. For example, 70 percent of the final retail dollar value of a spotting scope sale may be attributed to the manufacturer, five percent to the wholesaler and 25 percent to the retailer. This means that the manufacturing industry has earned 70 percent of the final retail price, the wholesaler accrued five percent of the sale, and the retailer received 25 percent. Since there are no wholesale or manufacturing activities in the service sector, service-related expenditures are not subjected to the above process.

Data used to calculate trade margins are from the U.S. Department of Commerce Census of Trade series surveys (1999). These data sources contain national sales figures for most retail and wholesale industry sectors as well as gross margins. A gross margin is the revenue remaining after the cost of the goods sold is subtracted. To derive margins, each wholesale and retail industry's gross margin was divided by its total sales. This produces the typical price mark-up for that industry. Next, two formulas are applied to estimate the value added (price mark-up) for each sector:

$R/(1+R)$ = retail margin, where R = retail mark-up.

$W/\{(1+W)(1+R)\}$ = wholesale margin, where W = wholesale mark-up.

These formulas estimate the percentage of a product's final selling price that accrues to each sector. The manufacturing margin is derived by summing the retail and wholesale margins and subtracting the total from 100 percent.

The Input-Output Model

To estimate economic impacts, the data were analyzed using models based on Regional Input-Output multipliers (RIMS-II). RIMS-II was developed by the U.S. Dept. of Commerce, Bureau of Economic Analysis for primary use by the Federal government.

Input-output models, such as RIMS-II, describe how sales in one industry impact other industries. For example, once a hunter makes a purchase, the retailer buys more merchandise from wholesalers, who buy more from manufacturers, who, in turn, purchase new inputs and supplies. In addition, the salaries and wages paid by these businesses stimulate more benefits. Simply, the first purchase creates numerous rounds of purchasing. Input-output analysis tracks how the various rounds of purchasing benefits other industries and generates economic benefits.

The larger the geographic region under study, the more times a dollar can be respent before it leaves the region. That is why the economic impact of a dollar spent in a region or state is less the economic impact of the same dollar to the entire U.S. economy.

The relationships between industries are explained through multipliers. For example, an income multiplier of .09 for industry *X* would indicate that for every dollar received by the industry under study, nine cents would be paid to industry *X* for its products or services. The RIMS-II model provides multipliers for all major industries in the U.S. The multipliers include direct, indirect and induced effects.

The RIMS-II model includes output, earnings and employment multipliers. The **output** multiplier measures the total economic effect from economic activity created by the original retail sale. The **earnings multiplier** measures the total salaries and wages generated from the economic activity created by the original retail sale. The **employment** multiplier estimates the number of jobs supported by the economic activity resulting from the original retail sale.

To apply the RIMS-II model, expenditures are each matched to the appropriate output, earnings and employment multipliers. For example, dollars attributed to gasoline refining are multiplied separately by the earnings, output and employment multipliers specific to gasoline refinement. The resulting estimates describe the salaries and wages, total economic effects, and jobs supported by the refining industry as a result of fuel purchases made during hunting activities. This same process is repeated for all reported expenditures. After all expenditures and multipliers have been applied together, the retail, wholesale and manufacturing results for each category are summed together.

Calculation of Tax Revenues

State sales tax estimates are based on state general and fuel sales tax rates. Sales tax revenues are calculated by multiplying all retail purchases, except fuel, by the 2001 state tax rate (excluding local and city taxes). Sales taxes were not calculated for excluded items (guide fees, public land access fees, memberships and dues to organizations, and food in states where such purchases are exempt). This was added to fuel tax revenues which were determined by multiplying total fuel purchases by the 2003 state fuel tax rate. For food and beverage purchases, it was assumed that hunters purchased food from both restaurants and grocery stores with one-third assigned to restaurants.

State income tax revenues were calculated by dividing the total income generated by hunters' expenditures by the total number of jobs supported by hunters' expenditures. The result was the average income per job. Next, the state standard deduction was subtracted and the remaining amount was multiplied by the appropriate 2003 state income tax rate. The results were then multiplied by the total jobs to derive the final income tax estimate.

Federal income tax revenues were calculated by dividing the total income generated by hunters' expenditures by the total number of jobs supported by hunters' expenditures. The result was the average income per job. From this, a standard deduction of \$3,980 was subtracted. The applicable tax rate was then applied according to the current IRS tax schedule for single filers to determine the average tax paid per job. Finally, the average tax paid per job was multiplied by the total number of jobs to determine total Federal income tax revenues generated by spring turkey hunters.

APPENDIX C
State-Specific Economic Impact Tables

Spring turkey hunting economic impacts are presented in this appendix for these nine states:

California
Kansas
Ohio

Georgia
Mississippi
Texas

Idaho
New York
Washington

TABLE C-1

California

Category:	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Food, Drink & Refreshments	\$3,232,772	\$6,926,164	\$1,756,620	61	\$75,431	\$75,515	\$273,595
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$571,968	\$1,418,939	\$449,338	15	\$40,038	\$19,007	\$68,864
Public Transportation (Air, Car Rental, Etc.)	\$3,042,915	\$6,956,104	\$2,026,886	56	\$213,004	\$69,625	\$252,256
Transportation By Private Vehicle	\$133,380	\$239,091	\$43,395	1	\$18,757	\$1,546	\$5,602
Guide Fees, Pack Trip Or Package Fees	\$409,022	\$836,040	\$248,276	12	-	\$15,499	\$56,154
Public Land Use Or Access Fees	\$527,223	\$945,205	\$268,304	10	-	\$12,914	\$46,789
Other Trip Expenditures	\$146,137	\$288,226	\$84,131	2	\$10,230	\$2,930	\$10,614
Firearms	\$2,557,082	\$5,111,608	\$1,527,406	49	\$178,996	\$60,729	\$220,025
Archery Equipment	\$129,020	\$274,350	\$82,022	3	\$9,031	\$3,359	\$12,168
Sights, Scopes, Etc.	\$475,728	\$1,046,883	\$326,325	9	\$33,301	\$11,314	\$40,991
Turkey Calls	\$935,881	\$1,990,070	\$594,967	20	\$65,512	\$24,362	\$88,267
Ammunition	\$414,346	\$828,377	\$247,301	8	\$29,004	\$9,808	\$35,535
Handloading Equipment And Supplies	\$73,634	\$147,211	\$43,948	1	\$5,154	\$1,743	\$6,315
Decoys	\$281,939	\$599,519	\$179,237	6	\$19,736	\$7,339	\$26,591
Camping Equipment	\$135,560	\$288,257	\$86,179	3	\$9,489	\$3,529	\$12,785
Binoculars	\$578,766	\$1,273,628	\$397,003	11	\$40,514	\$13,764	\$49,869
Special Clothing	\$1,569,517	\$3,485,848	\$986,603	34	\$109,866	\$42,676	\$154,618
Taxidermy & Processing	\$746,832	\$1,508,525	\$499,406	16	\$52,278	\$20,076	\$72,736
Books & Magazines	\$414,205	\$848,624	\$237,034	7	\$28,994	\$8,181	\$29,641
Dues And Contributions To Non-Profits	\$6,585,723	\$15,254,511	\$5,051,250	289	-	\$359,682	\$1,303,156
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$877,434	\$1,865,788	\$557,811	18	\$61,420	\$22,841	\$82,755
Boats	\$20,185	\$43,290	\$14,099	1	\$1,413	\$652	\$2,364
Trucks, Campers, Travel Trailers, etc.	\$9,029,768	\$17,730,431	\$3,621,114	104	\$632,084	\$129,125	\$467,829
Habitat Improvement Expenditures	\$2,976,023	\$4,866,819	\$2,197,148	103	\$208,322	\$127,882	\$463,327
ATV & Off-road Vehicles	\$2,339,077	\$4,186,459	\$999,795	31	\$163,735	\$38,182	\$138,338
Other Special Equipment (Ice Chests, GPS, Etc.)	\$426,865	\$860,285	\$245,871	8	\$29,881	\$9,716	\$35,202
Licenses, Tags, Permits And Other Fees	\$784,126	\$1,707,043	\$427,035	11	\$54,889	\$13,884	\$50,303
Land Owned Primarily For Spring Turkey Hunting	\$207,143	\$356,224	\$64,007	2	-	\$2,631	\$9,534
Land Leased Primarily For Spring Turkey Hunting	\$12,918,170	\$22,215,377	\$3,991,715	132	-	\$164,109	\$594,579
TOTALS:	\$52,540,442	\$104,098,895	\$27,254,223	1,021	\$2,091,078	\$1,272,621	\$4,610,801

TABLE C-2

Georgia

Category:	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Food, Drink & Refreshments	\$3,097,225	\$6,566,538	\$1,576,333	61	\$41,292	\$62,999	\$212,120
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$320,362	\$712,998	\$223,709	10	\$12,814	\$9,859	\$33,197
Public Transportation (Air, Car Rental, Etc.)	\$3,661,004	\$7,697,260	\$2,258,107	61	\$146,440	\$62,616	\$210,829
Transportation By Private Vehicle	\$293,665	\$463,585	\$85,306	3	\$17,207	\$3,005	\$10,119
Guide Fees, Pack Trip Or Package Fees	\$240,272	\$485,493	\$141,400	9	-	\$9,614	\$32,372
Public Land Use Or Access Fees	\$2,504,564	\$4,388,997	\$1,224,982	56	-	\$58,008	\$195,316
Other Trip Expenditures	\$313,688	\$602,720	\$173,344	5	\$12,548	\$5,514	\$18,566
Firearms	\$4,334,765	\$8,444,366	\$2,443,022	85	\$173,391	\$87,965	\$296,180
Archery Equipment	\$1,035,036	\$2,179,472	\$633,085	23	\$41,401	\$23,297	\$78,441
Sights, Scopes, Etc.	\$575,984	\$1,189,790	\$363,378	11	\$23,039	\$11,721	\$39,466
Turkey Calls	\$1,513,177	\$3,186,290	\$925,542	33	\$60,527	\$34,059	\$114,677
Ammunition	\$2,749,240	\$5,418,658	\$1,563,640	55	\$109,970	\$56,592	\$190,548
Handloading Equipment And Supplies	\$2,670	\$5,262	\$1,518	0	\$107	\$55	\$185
Decoys	\$575,023	\$1,210,824	\$351,716	13	\$23,001	\$12,943	\$43,578
Camping Equipment	\$1,523,054	\$3,207,090	\$931,584	33	\$60,922	\$34,281	\$115,425
Binoculars	\$289,661	\$598,342	\$182,742	6	\$11,586	\$5,895	\$19,847
Special Clothing	\$1,980,772	\$4,690,716	\$1,275,969	49	\$79,231	\$50,901	\$171,385
Taxidermy & Processing	\$1,022,489	\$2,015,325	\$652,450	26	\$40,900	\$27,031	\$91,013
Books & Magazines	\$452,765	\$959,626	\$260,336	8	\$18,111	\$8,515	\$28,669
Dues And Contributions To Non-Profits	\$2,981,636	\$6,865,813	\$2,233,842	141	-	\$145,664	\$490,459
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$314,689	\$662,639	\$192,481	7	\$12,588	\$7,083	\$23,849
Boats	\$33,371	\$70,887	\$22,616	1	\$1,335	\$1,018	\$3,429
Trucks, Campers, Travel Trailers, etc.	\$5,032,353	\$10,344,762	\$2,064,239	66	\$201,294	\$67,939	\$228,754
Habitat Improvement Expenditures	\$15,129,230	\$23,100,770	\$8,567,338	507	\$605,169	\$524,466	\$1,765,898
ATV & Off-road Vehicles	\$1,628,507	\$3,185,216	\$741,151	24	\$65,140	\$24,758	\$83,362
Other Special Equipment (Ice Chests, GPS, Etc.)	\$291,663	\$615,325	\$169,469	6	\$11,667	\$6,157	\$20,731
Licenses, Tags, Permits And Other Fees	\$1,142,627	\$2,444,537	\$607,192	19	\$45,705	\$19,234	\$64,762
Land Owned Primarily For Spring Turkey Hunting	\$814,253	\$1,398,480	\$246,230	9	-	\$9,284	\$31,261
Land Leased Primarily For Spring Turkey Hunting	\$5,741,255	\$9,860,605	\$1,736,155	63	-	\$65,463	\$220,418
TOTALS:	\$59,595,000	\$112,572,384	\$31,848,872	1,389	\$1,815,384	\$1,435,936	\$4,834,857

TABLE C-3

Idaho

Category:	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Food, Drink & Refreshments	\$1,269,287	\$2,592,918	\$625,671	31	\$63,464	\$15,930	\$55,126
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$203,452	\$378,786	\$114,319	8	\$10,173	\$3,999	\$13,838
Public Transportation (Air, Car Rental, Etc.)	\$1,203,108	\$2,001,611	\$586,395	23	\$60,155	\$12,024	\$41,610
Transportation By Private Vehicle	\$39,432	\$55,901	\$9,690	0	\$7,701	\$214	\$741
Guide Fees, Pack Trip Or Package Fees	\$20,453	\$35,376	\$10,227	1	-	\$419	\$1,452
Public Land Use Or Access Fees	\$2,458	\$3,928	\$1,081	0	-	\$22	\$77
Other Trip Expenditures	\$29,500	\$47,616	\$13,464	1	\$1,475	\$290	\$1,004
Firearms	\$1,011,653	\$1,703,497	\$491,457	24	\$50,583	\$12,408	\$42,939
Archery Equipment	\$217,317	\$385,214	\$111,538	6	\$10,866	\$2,885	\$9,983
Sights, Scopes, Etc.	\$100,546	\$177,482	\$54,803	2	\$5,027	\$1,219	\$4,218
Turkey Calls	\$290,113	\$514,252	\$148,900	7	\$14,506	\$3,851	\$13,326
Ammunition	\$194,725	\$327,491	\$94,438	4	\$9,736	\$2,122	\$7,342
Handloading Equipment And Supplies	\$56,050	\$94,266	\$27,183	1	\$2,803	\$611	\$2,113
Decoys	\$156,989	\$278,278	\$80,575	4	\$7,849	\$2,084	\$7,211
Camping Equipment	\$222,135	\$393,755	\$114,011	6	\$11,107	\$2,949	\$10,204
Binoculars	\$341,905	\$603,524	\$186,357	8	\$17,095	\$4,144	\$14,342
Special Clothing	\$394,985	\$671,567	\$187,216	10	\$19,749	\$5,063	\$17,521
Taxidermy & Processing	\$293,378	\$495,016	\$161,915	8	\$14,669	\$4,267	\$14,766
Books & Magazines	\$197,340	\$350,872	\$92,715	4	\$9,867	\$2,052	\$7,101
Dues And Contributions To Non-Profits	\$936,841	\$1,812,507	\$604,918	57	-	\$29,200	\$101,049
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$131,914	\$233,830	\$67,705	3	\$6,596	\$1,751	\$6,060
Boats	\$0	\$0	\$0	0	\$0	\$0	\$0
Trucks, Campers, Travel Trailers, etc.	\$487,733	\$792,438	\$146,092	6	\$24,387	\$3,177	\$10,993
Habitat Improvement Expenditures	\$760,117	\$1,108,065	\$493,379	25	\$38,006	\$13,043	\$45,137
ATV & Off-road Vehicles	\$1,017,750	\$1,584,693	\$349,944	15	\$50,888	\$7,520	\$26,023
Other Special Equipment (Ice Chests, GPS, Etc.)	\$309,209	\$532,707	\$145,732	7	\$15,460	\$3,397	\$11,754
Licenses, Tags, Permits And Other Fees	\$481,254	\$916,355	\$224,697	10	\$24,063	\$5,322	\$18,416
Land Owned Primarily For Spring Turkey Hunting	\$2,458,333	\$3,712,329	\$604,996	38	-	\$19,687	\$68,128
Land Leased Primarily For Spring Turkey Hunting	\$0	\$0	\$0	0	-	\$0	\$0
TOTALS:	\$12,827,977	\$21,804,277	\$5,749,417	311	\$476,224	\$159,648	\$552,477

TABLE C-4

Kansas

	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Category:							
Food, Drink & Refreshments	\$1,809,991	\$4,489,989	\$976,718	45	\$88,690	\$34,376	\$93,245
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$406,672	\$786,097	\$213,137	14	\$19,927	\$10,774	\$29,224
Public Transportation (Air, Car Rental, Etc.)	\$1,741,580	\$3,405,136	\$863,823	31	\$85,337	\$24,054	\$65,247
Transportation By Private Vehicle	\$125,410	\$243,164	\$37,712	1	\$19,595	\$1,140	\$3,092
Guide Fees, Pack Trip Or Package Fees	\$437,478	\$787,329	\$206,577	16	-	\$11,963	\$32,449
Public Land Use Or Access Fees	\$0	\$0	\$0	0	-	\$0	\$0
Other Trip Expenditures	\$165,269	\$280,974	\$70,438	3	\$8,098	\$2,127	\$5,770
Firearms	\$1,937,798	\$3,465,392	\$927,784	43	\$94,952	\$33,006	\$89,530
Archery Equipment	\$479,038	\$915,072	\$247,684	10	\$23,473	\$7,822	\$21,217
Sights, Scopes, Etc.	\$230,840	\$433,151	\$120,116	5	\$11,311	\$3,732	\$10,122
Turkey Calls	\$572,664	\$1,093,919	\$296,093	12	\$28,061	\$9,351	\$25,364
Ammunition	\$449,059	\$829,862	\$221,917	11	\$22,004	\$8,362	\$22,681
Handloading Equipment And Supplies	\$24,316	\$44,937	\$12,017	1	\$1,192	\$453	\$1,228
Decoys	\$300,766	\$574,531	\$155,509	6	\$14,738	\$4,911	\$13,321
Camping Equipment	\$97,217	\$185,707	\$50,266	2	\$4,764	\$1,587	\$4,306
Binoculars	\$380,059	\$713,147	\$197,762	8	\$18,623	\$6,144	\$16,665
Special Clothing	\$1,181,093	\$2,173,908	\$552,494	24	\$57,874	\$18,552	\$50,323
Taxidermy & Processing	\$482,745	\$887,478	\$264,351	12	\$23,654	\$9,552	\$25,910
Books & Magazines	\$207,853	\$384,679	\$95,129	4	\$10,185	\$2,808	\$7,616
Dues And Contributions To Non-Profits	\$604,145	\$1,213,243	\$367,380	31	-	\$23,833	\$64,647
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$190,910	\$364,682	\$98,709	4	\$9,355	\$3,117	\$8,455
Boats	\$0	\$0	\$0	0	\$0	\$0	\$0
Trucks, Campers, Travel Trailers, etc.	\$0	\$0	\$0	0	\$0	\$0	\$0
Habitat Improvement Expenditures	\$1,834,612	\$2,509,055	\$896,440	59	\$89,896	\$45,094	\$122,320
ATV & Off-road Vehicles	\$1,020,781	\$1,826,488	\$396,128	16	\$50,018	\$12,176	\$33,028
Other Special Equipment (Ice Chests, GPS, Etc.)	\$45,947	\$88,653	\$22,559	1	\$2,251	\$731	\$1,982
Licenses, Tags, Permits And Other Fees	\$1,399,975	\$2,952,407	\$654,348	24	\$68,599	\$18,525	\$50,250
Land Owned Primarily For Spring Turkey Hunting	\$1,215,216	\$1,901,084	\$288,492	16	-	\$12,323	\$33,426
Land Leased Primarily For Spring Turkey Hunting	\$1,081,542	\$1,691,965	\$256,758	14	-	\$10,967	\$29,749
TOTALS:	\$18,422,978	\$34,242,052	\$8,490,344	413	\$752,596	\$317,478	\$861,168

TABLE C-5

Mississippi

	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Category:							
Food, Drink & Refreshments	\$3,077,086	\$6,517,936	\$1,531,616	79	\$215,396	\$48,446	\$138,782
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$400,530	\$720,954	\$208,115	10	\$28,037	\$6,179	\$17,700
Public Transportation (Air, Car Rental, Etc.)	\$3,670,474	\$6,398,738	\$1,665,661	62	\$256,933	\$37,785	\$108,242
Transportation By Private Vehicle	\$0	\$0	\$0	0	\$0	\$0	\$0
Guide Fees, Pack Trip Or Package Fees	\$143,046	\$243,036	\$67,060	3	-	\$1,903	\$5,451
Public Land Use Or Access Fees	\$1,279,788	\$2,008,627	\$550,309	20	-	\$12,357	\$35,398
Other Trip Expenditures	\$298,808	\$482,933	\$132,730	5	\$20,917	\$3,297	\$9,445
Firearms	\$4,678,957	\$6,587,264	\$1,349,754	65	\$327,527	\$39,375	\$112,797
Archery Equipment	\$123,974	\$229,987	\$65,677	3	\$8,678	\$1,744	\$4,996
Sights, Scopes, Etc.	\$286,093	\$517,399	\$157,021	7	\$20,026	\$4,057	\$11,623
Turkey Calls	\$1,157,849	\$2,147,963	\$613,386	27	\$81,049	\$16,289	\$46,664
Ammunition	\$1,045,510	\$1,852,802	\$520,170	24	\$73,186	\$14,384	\$41,204
Handloading Equipment And Supplies	\$0	\$0	\$0	0	\$0	\$0	\$0
Decoys	\$350,781	\$650,746	\$185,831	8	\$24,555	\$4,935	\$14,137
Camping Equipment	\$133,510	\$247,679	\$70,729	3	\$9,346	\$1,878	\$5,381
Binoculars	\$130,331	\$235,704	\$71,532	3	\$9,123	\$1,848	\$5,295
Special Clothing	\$1,756,053	\$3,482,546	\$932,812	46	\$122,924	\$27,781	\$79,585
Taxidermy & Processing	\$395,762	\$689,931	\$217,748	10	\$27,703	\$5,906	\$16,919
Books & Magazines	\$334,252	\$584,966	\$149,661	6	\$23,398	\$3,767	\$10,791
Dues And Contributions To Non-Profits	\$1,735,057	\$3,292,097	\$1,056,476	72	-	\$43,728	\$125,267
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$262,061	\$486,158	\$138,830	6	\$18,344	\$3,687	\$10,562
Boats	\$1,551,258	\$2,806,071	\$900,971	49	\$108,588	\$29,919	\$85,708
Trucks, Campers, Travel Trailers, etc.	\$3,210,596	\$6,638,887	\$1,259,136	52	\$224,742	\$31,475	\$90,166
Habitat Improvement Expenditures	\$12,141,298	\$17,196,727	\$6,287,536	437	\$849,891	\$266,401	\$763,150
ATV & Off-road Vehicles	\$1,865,971	\$3,460,304	\$739,256	34	\$130,618	\$20,546	\$58,857
Other Special Equipment (Ice Chests, GPS, Etc.)	\$205,033	\$403,977	\$106,148	5	\$14,352	\$2,800	\$8,021
Licenses, Tags, Permits And Other Fees	\$877,849	\$1,790,110	\$418,383	17	\$61,449	\$10,147	\$29,068
Land Owned Primarily For Spring Turkey Hunting	\$739,073	\$1,091,832	\$171,391	11	-	\$6,989	\$20,022
Land Leased Primarily For Spring Turkey Hunting	\$2,608,466	\$3,853,487	\$604,903	40	-	\$24,667	\$70,664
	\$44,459,466	\$74,618,861	\$20,172,842	1,103	\$2,656,782	\$672,291	\$1,925,894

TABLE C-6

New York

	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Category:							
Food, Drink & Refreshments	\$5,191,779	\$9,556,074	\$2,102,843	71	\$69,223	\$61,505	\$359,026
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$1,229,195	\$2,655,060	\$770,951	24	\$49,168	\$20,649	\$120,534
Public Transportation (Air, Car Rental, Etc.)	\$4,872,815	\$8,905,557	\$2,308,740	61	\$194,913	\$53,342	\$311,371
Transportation By Private Vehicle	\$3,174,497	\$4,523,051	\$696,278	21	\$767,583	\$18,259	\$106,581
Guide Fees, Pack Trip Or Package Fees	\$36,913	\$67,189	\$18,290	1	-	\$743	\$4,335
Public Land Use Or Access Fees	\$228,859	\$361,117	\$94,290	6	-	\$4,832	\$28,206
Other Trip Expenditures	\$352,886	\$601,600	\$155,552	4	\$14,115	\$3,615	\$21,104
Firearms	\$7,371,477	\$13,117,314	\$3,610,665	110	\$294,859	\$95,867	\$559,605
Archery Equipment	\$477,651	\$889,875	\$242,848	8	\$19,106	\$7,290	\$42,552
Sights, Scopes, Etc.	\$721,275	\$1,386,011	\$404,692	12	\$28,851	\$10,086	\$58,876
Turkey Calls	\$1,297,040	\$2,416,417	\$659,442	23	\$51,882	\$19,795	\$115,548
Ammunition	\$1,728,606	\$3,090,138	\$848,517	28	\$69,144	\$24,005	\$140,123
Handloading Equipment And Supplies	\$251,009	\$448,715	\$123,212	4	\$10,040	\$3,486	\$20,347
Decoys	\$599,094	\$1,116,126	\$304,592	10	\$23,964	\$9,143	\$53,371
Camping Equipment	\$1,053,859	\$1,963,364	\$535,804	18	\$42,154	\$16,083	\$93,884
Binoculars	\$1,316,309	\$2,529,435	\$738,553	21	\$52,652	\$18,407	\$107,447
Special Clothing	\$4,288,477	\$8,490,408	\$2,134,611	69	\$171,539	\$59,780	\$348,953
Taxidermy & Processing	\$0	\$0	\$0	0	\$0	\$0	\$0
Books & Magazines	\$522,426	\$968,714	\$238,586	6	\$20,897	\$5,467	\$31,913
Dues And Contributions To Non-Profits	\$703,926	\$1,436,432	\$441,995	24	-	\$20,528	\$119,828
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$514,564	\$958,644	\$261,615	9	\$20,583	\$7,853	\$45,840
Boats	\$0	\$0	\$0	0	\$0	\$0	\$0
Trucks, Campers, Travel Trailers, etc.	\$3,691,275	\$6,786,504	\$1,227,970	36	\$147,651	\$31,738	\$185,267
Habitat Improvement Expenditures	\$13,262,670	\$18,753,192	\$6,852,638	307	\$530,507	\$267,249	\$1,560,016
ATV & Off-road Vehicles	\$2,624,497	\$4,367,799	\$958,366	32	\$104,980	\$27,458	\$160,281
Other Special Equipment (Ice Chests, GPS, Etc.)	\$502,013	\$903,762	\$236,386	8	\$20,081	\$6,593	\$38,487
Licenses, Tags, Permits And Other Fees	\$2,023,377	\$3,715,527	\$836,869	21	\$80,935	\$18,137	\$105,869
Land Owned Primarily For Spring Turkey Hunting	\$0	\$0	\$0	0	-	\$0	\$0
Land Leased Primarily For Spring Turkey Hunting	\$129,195	\$201,569	\$30,542	1	-	\$883	\$5,155
TOTALS:	\$58,165,683	\$100,209,597	\$26,834,846	933	\$2,784,827	\$812,791	\$4,744,518

* New York data revised Nov 18, 2003

TABLE C-7

Ohio

Category:	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Food, Drink & Refreshments	\$5,095,703	\$11,006,620	\$2,589,618	107	\$84,928	\$148,003	\$367,885
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$2,603,202	\$5,430,539	\$1,667,090	86	\$130,160	\$118,014	\$293,344
Public Transportation (Air, Car Rental, Etc.)	\$3,931,336	\$7,661,388	\$2,074,566	68	\$196,567	\$93,840	\$233,254
Transportation By Private Vehicle	\$246,166	\$415,141	\$72,040	3	\$42,310	\$3,532	\$8,779
Guide Fees, Pack Trip Or Package Fees	\$0	\$0	\$0	0	-	\$0	\$0
Public Land Use Or Access Fees	\$1,969,330	\$3,318,124	\$909,830	41	-	\$57,131	\$142,007
Other Trip Expenditures	\$123,083	\$226,018	\$63,154	2	\$6,154	\$2,954	\$7,341
Firearms	\$9,064,764	\$18,018,734	\$5,169,734	220	\$453,238	\$303,133	\$753,487
Archery Equipment	\$1,588,849	\$3,321,811	\$945,045	37	\$79,442	\$50,449	\$125,399
Sights, Scopes, Etc.	\$1,085,132	\$2,274,292	\$684,982	24	\$54,257	\$33,508	\$83,289
Turkey Calls	\$1,984,715	\$4,149,449	\$1,180,506	46	\$99,236	\$63,018	\$156,642
Ammunition	\$1,548,539	\$3,131,181	\$897,369	34	\$77,427	\$46,926	\$116,642
Handloading Equipment And Supplies	\$104,621	\$211,545	\$60,627	2	\$5,231	\$3,170	\$7,880
Decoys	\$702,189	\$1,468,069	\$417,661	16	\$35,109	\$22,296	\$55,420
Camping Equipment	\$393,866	\$823,457	\$234,271	9	\$19,693	\$12,506	\$31,086
Binoculars	\$1,151,012	\$2,412,369	\$726,568	26	\$57,551	\$35,542	\$88,346
Special Clothing	\$3,746,527	\$7,218,978	\$1,980,255	81	\$187,326	\$112,236	\$278,982
Taxidermy & Processing	\$1,643,160	\$3,310,638	\$1,055,073	41	\$82,158	\$56,075	\$139,383
Books & Magazines	\$618,923	\$1,286,137	\$342,569	12	\$30,946	\$16,289	\$40,488
Dues And Contributions To Non-Profits	\$5,327,960	\$11,691,676	\$3,757,810	250	-	\$344,536	\$856,401
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$455,408	\$952,122	\$270,876	10	\$22,770	\$14,460	\$35,943
Boats	\$92,312	\$188,705	\$59,532	3	\$4,616	\$3,902	\$9,700
Trucks, Campers, Travel Trailers, etc.	\$590,799	\$1,542,429	\$317,717	10	\$29,540	\$14,084	\$35,008
Habitat Improvement Expenditures	\$2,003,178	\$2,867,713	\$1,041,163	60	\$100,159	\$82,474	\$205,002
ATV & Off-road Vehicles	\$2,566,283	\$5,455,579	\$1,253,889	47	\$128,314	\$64,364	\$159,987
Other Special Equipment (Ice Chests, GPS, Etc.)	\$343,094	\$748,797	\$201,118	7	\$17,155	\$10,221	\$25,407
Licenses, Tags, Permits And Other Fees	\$2,109,398	\$4,651,013	\$1,112,708	36	\$105,470	\$50,306	\$125,043
Land Owned Primarily For Spring Turkey Hunting	\$0	\$0	\$0	0	-	\$0	\$0
Land Leased Primarily For Spring Turkey Hunting	\$415,406	\$679,770	\$114,652	6	-	\$7,814	\$19,423
TOTALS:	\$51,504,955	\$104,462,294	\$29,200,426	1,284	\$2,049,757	\$1,770,782	\$4,401,569

TABLE C-8

Texas

Category:	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Food, Drink & Refreshments	\$9,531,183	\$22,346,365	\$5,481,006	208	\$198,564	no tax	\$924,508
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$1,631,112	\$3,724,970	\$1,139,821	49	\$101,944		\$217,095
Public Transportation (Air, Car Rental, Etc.)	\$7,546,393	\$17,712,893	\$5,049,291	140	\$471,650		\$620,090
Transportation By Private Vehicle	\$323,430	\$680,588	\$121,517	4	\$50,536		\$16,311
Guide Fees, Pack Trip Or Package Fees	\$744,587	\$1,559,315	\$452,635	27	-		\$121,192
Public Land Use Or Access Fees	\$4,874,720	\$8,636,542	\$2,424,686	110	-		\$487,126
Other Trip Expenditures	\$0	\$0	\$0	0	\$0		\$0
Firearms	\$3,561,687	\$7,295,111	\$2,148,145	77	\$222,605		\$342,440
Archery Equipment	\$706,776	\$1,546,304	\$453,960	16	\$44,174		\$68,892
Sights, Scopes, Etc.	\$472,580	\$1,053,927	\$323,020	10	\$29,536		\$44,389
Turkey Calls	\$757,967	\$1,658,300	\$486,839	17	\$47,373		\$73,882
Ammunition	\$894,845	\$1,876,107	\$553,614	18	\$55,928		\$79,601
Handloading Equipment And Supplies	\$70,177	\$147,132	\$43,417	1	\$4,386		\$6,243
Decoys	\$317,264	\$694,119	\$203,778	7	\$19,829		\$30,925
Camping Equipment	\$2,792,342	\$6,109,160	\$1,793,512	61	\$174,521		\$272,180
Binoculars	\$999,562	\$2,229,177	\$683,224	21	\$62,473		\$93,887
Special Clothing	\$1,778,633	\$3,843,192	\$1,080,310	40	\$111,165		\$179,496
Taxidermy & Processing	\$570,075	\$1,187,010	\$387,594	15	\$35,630		\$65,593
Books & Magazines	\$428,068	\$878,657	\$241,885	8	\$26,754		\$35,434
Dues And Contributions To Non-Profits	\$746,798	\$1,789,925	\$578,320	33	-		\$148,574
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$355,308	\$777,352	\$228,213	8	\$22,207		\$34,633
Boats	\$0	\$0	\$0	0	\$0		\$0
Trucks, Campers, Travel Trailers, etc.	\$8,330,071	\$16,857,923	\$3,412,760	107	\$520,629		\$473,501
Habitat Improvement Expenditures	\$12,241,249	\$19,584,347	\$7,283,869	346	\$765,078		\$1,536,334
ATV & Off-road Vehicles	\$6,445,334	\$12,320,210	\$2,924,507	108	\$402,833		\$481,337
Other Special Equipment (Ice Chests, GPS, Etc.)	\$1,648,144	\$3,788,337	\$1,047,640	35	\$103,009		\$155,942
Licenses, Tags, Permits And Other Fees	\$1,456,644	\$3,489,392	\$868,451	28	\$91,040		\$123,622
Land Owned Primarily For Spring Turkey Hunting	\$465,367	\$818,767	\$147,196	5	-		\$24,346
Land Leased Primarily For Spring Turkey Hunting	\$7,855,164	\$13,820,375	\$2,484,588	92	-		\$410,949
TOTALS:	\$77,545,480	\$156,425,494	\$42,043,798	1,591	\$3,561,865		\$7,068,521

TABLE C-9

Washington

	RETAIL SALES	TOTAL MULTIPLIER EFFECT	SALARIES & WAGES	JOBS	STATE SALES TAX	STATE INCOME TAX	FEDERAL INCOME TAX
Category:							
Food, Drink & Refreshments	\$1,485,304	\$2,932,482	\$722,784	28	\$32,181	no tax	\$114,568
Lodging (Motels, Lodges, Campgrounds, Etc.)	\$313,581	\$614,305	\$188,086	9	\$20,383		\$38,340
Public Transportation (Air, Car Rental, Etc.)	\$1,361,199	\$2,812,238	\$825,976	25	\$88,478		\$103,270
Transportation By Private Vehicle	\$50,676	\$76,421	\$13,550	0	\$9,106		\$1,844
Guide Fees, Pack Trip Or Package Fees	\$440,878	\$807,425	\$237,193	14	-		\$57,950
Public Land Use Or Access Fees	\$26,858	\$42,946	\$12,035	1	-		\$2,644
Other Trip Expenditures	\$27,365	\$48,756	\$14,076	0	\$1,779		\$1,936
Firearms	\$851,351	\$1,522,580	\$448,243	17	\$55,338		\$69,150
Archery Equipment	\$26,858	\$50,752	\$15,018	1	\$1,746		\$2,323
Sights, Scopes, Etc.	\$72,416	\$138,854	\$43,094	1	\$4,707		\$5,701
Turkey Calls	\$306,512	\$579,194	\$171,393	6	\$19,923		\$26,512
Ammunition	\$147,041	\$263,042	\$77,348	3	\$9,558		\$12,051
Handloading Equipment And Supplies	\$33,851	\$60,557	\$17,807	1	\$2,200		\$2,774
Decoys	\$157,196	\$297,042	\$87,900	3	\$10,218		\$13,597
Camping Equipment	\$99,426	\$187,878	\$55,596	2	\$6,463		\$8,600
Binoculars	\$174,142	\$333,911	\$103,630	3	\$11,319		\$13,709
Special Clothing	\$414,122	\$758,254	\$214,354	9	\$26,918		\$36,153
Taxidermy & Processing	\$121,115	\$217,728	\$72,100	3	\$7,872		\$12,035
Books & Magazines	\$102,213	\$192,274	\$52,276	2	\$6,644		\$7,261
Dues And Contributions To Non-Profits	\$413,615	\$854,694	\$284,857	21	-		\$87,686
Miscellaneous Items (Knives, Gun Cases, Etc.)	\$89,189	\$168,535	\$49,872	2	\$5,797		\$7,714
Boats	\$0	\$0	\$0	0	\$0		\$0
Trucks, Campers, Travel Trailers, etc.	\$983,615	\$1,659,017	\$310,602	10	\$63,935		\$41,980
Habitat Improvement Expenditures	\$111,081	\$170,379	\$76,005	3	\$7,220		\$13,308
ATV & Off-road Vehicles	\$395,270	\$649,960	\$151,191	5	\$25,693		\$21,817
Other Special Equipment (Ice Chests, GPS, Etc.)	\$155,068	\$279,107	\$78,811	3	\$10,079		\$11,595
Licenses, Tags, Permits And Other Fees	\$493,163	\$1,007,039	\$249,097	7	\$32,056		\$30,057
Land Owned Primarily For Spring Turkey Hunting	\$516,892	\$825,631	\$139,561	6	-		\$24,643
Land Leased Primarily For Spring Turkey Hunting	\$24,324	\$38,853	\$6,568	0	-		\$1,160
TOTALS:	\$9,394,320	\$17,589,854	\$4,719,022	187	\$459,612		\$770,376

APPENDIX D

Interesting Facts

1. If spring turkey hunters lived in their own city, they would make up a city that would rank as one of the Nation's top twenty five metropolitan areas. (2,288,000 spring turkey hunters; Portland, Oregon = #23 largest MSA in the U.S. with 2,265,000 residents. U.S. Census Bureau, 2002).
2. If spring turkey hunters had their own state, they would represent the Nation's 35 largest state. (2,288,000 spring turkey hunters; Nevada = #35 with 2,173,000 residents. Source: U.S. Census Bureau, 2002).
3. Spring turkey hunters in the U.S. could fill Los Angeles's Rose Bowl Stadium nearly twenty-five times (source: ballparks.com, stadium capacity = 92,000).
4. The amount spent on spring turkey hunting in the U.S compares favorably to the total annual value of South Carolina's agricultural harvests (\$1.795 billion spent for spring turkey hunting activities nationally in 2003, \$1.979 billion for South Carolina agriculture in 2001).
5. In 2001, spring turkey hunters in the U.S. spent nearly as much money as earned by "Titanic", the international top grossing movie of all time (\$1.835 billion internationally for "Titanic", \$1.795 billion for spring turkey hunting; #2 all time international movie is "Harry Potter and the Sorcerer's Stone" with \$969 million; data source: The Internet Movie Database (www.imdb.com)).
6. Spring turkey hunters spend more nationally than all Americans spend on camping equipment (source: National Sporting Goods Association; \$1.795 billion for spring turkey hunting (including travel expenditures, equipment & services; and \$1.458 billion forecasted for 2003 for camping equipment)).
7. The federal income tax revenues generated from spring turkey hunting activities in the U.S. would pay the salaries and allowances for over 5,600 U.S. soldiers (\$198.6 million in federal income taxes, a typical E-5 grade soldier's annual pay plus subsistence and housing allowances = \$35,322).
8. The annual state tax revenues generated from spring turkey hunting activities nationally could purchase 104,000 computers, internet-ready, for public schools (\$88.5 million in state tax revenues, Dell computer price quote for schools: \$848 for complete setup).
9. The jobs supported by spring turkey hunting are nearly 50 percent larger than the number of employees of US Airways, a Fortune 500 company (41,323 jobs supported by spring turkey hunting, and 28,379 employed by US Airways; source: US Airways (www.USAirways.com)).
10. The total jobs supported by spring turkey hunting in the U.S. is enough to completely eliminate unemployment in the states of Nebraska, New Hampshire or Idaho (34,043 jobs supported by spring turkey hunters, and 30,600, 32,800 and 40,000 unemployed in the states of Nebraska, New Hampshire and Idaho, respectively (2002). Data source: U.S. Bureau of Labor Statistics).
11. The economic activity created by spring turkey hunting in the U.S. equals the annual Gross Domestic Product, or entire economic production, of Liberia or Fiji, (\$4.359 billion = total economic activity created by spring turkey hunting, \$3.6 billion = total economic production in Liberia, and \$4.3 billion in Fiji; source: www.wallstreetview.com).