# Tellico Reservoir

## Annual Report 2007

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## Tellico Reservoir - 2007

**Largemouth Bass**

| Population Parameter | Annual Rating | Measure | Gear | Value |
|---|---|---|---|---|
| Recruitment | Excellent | Substock CPUE | Electrofishing | 15.0/hr |
| Structure | Good | PSD | Electrofishing | 65 |
| Density | Fair | CPUE ≥ Stock Size (8-inches) | Electrofishing | 22.0/hr |
| | Poor | CPUE ≥ Minimum Size Limit (15-inches) | Electrofishing | 3.3/hr |
| Number Caught | Good | Angler Catch | Creel Survey | 68,592 |
| Quality | Good | Average Weight | Creel Survey | 1.9 lbs |
| Value of Fishery* | Good | Trip Expenditures | Creel Survey | $389,330 |

(*all black bass combined under intended species was used)

Fishery Forecast: The TWRA's electrofishing catch rates for largemouth remain good, but the samples indicate the number of quality-size fish in the population has declined.
Management Recommendations: The creel limit was changed from a 14-inch / 2 fish limit to a straight 15-inch minimum length limit in 2001. No changes are planed in the near future.

**Smallmouth Bass**

| Population Parameter | Annual Rating | Measure | Gear | Value |
|---|---|---|---|---|
| Recruitment | Poor | Substock CPUE | Electrofishing | 2.0/hr |
| Structure | Fair | PSD | Electrofishing | 54 |
| Density | Poor | CPUE ≥ Stock Size (7-inches) | Electrofishing | 4.3/hr |
| | Poor | CPUE ≥ Minimum Size Limit (18-inches) | Electrofishing | 0.0/hr |
| Number Caught | Fair | Angler Catch | Creel Survey | 10,325 |
| Quality | Non creeled | Average Weight | Creel Survey | |
| Value of Fishery* | Good | Trip Expenditures | Creel Survey | $389,330 |

(*all black bass combined under intended species was used)

Fishery Forecast: Although not documented via our "standardized" daytime electrofishing samples, other information suggest the 18-inch minimum length limit has helped increase the number of smallmouth and should continue to help improve the quality of the fishery.

Management Recommendations: We encourage anglers to be patient with the new limit for several years to determine its effectiveness at improving the quality of the fishery.

**Spotted Bass**

| Population Parameter | Annual Rating | Measure | Gear | Value |
|---|---|---|---|---|
| Recruitment | Good | Substock CPUE | Electrofishing | 9.0/hr |
| Structure | Poor | PSD | Electrofishing | 18 |
| Density | Poor (too high) | CPUE ≥ Stock Size (7-inches) | Electrofishing | 29.7/hr |
| | Poor (too high) | CPUE ≥ Minimum Size Limit (none) | Electrofishing | 38.7/hr |
| Number Caught | Poor | Angler Catch | Creel Survey | 27,631 |
| Quality | Non creeled | Average Weight | Creel Survey | |
| Value of Fishery | Good | Trip Expenditures | Creel Survey | $389,330 |

(*all black bass combined under intended species was used)

Fishery Forecast: Anglers are encouraged to harvest this species for the table because they compete with the more desirable and larger growing largemouth and smallmouth bass.
Management Recommendations: Continue to encourage anglers to harvest spotted bass.

**White Crappie**

| Population Parameter | Annual Rating | Measure | Gear | Value |
|---|---|---|---|---|
| Structure | Good | PSD | Electrofishing | 100 |
| Density | Fair | CPUE ≥ Stock Size (5-inches) | Electrofishing | 3.0/hr |
| | Poor | CPUE ≥ Minimum size Limit (10-inches) | Electrofishing | 2.3/hr |
| Angler Hours* | Good | Fishing Effort | Creel Survey | 63,333 hr |
| Fishing Success* | Excellent | Angler Catch Rate | Creel Survey | 1.8/hr |
| Number Caught* | Excellent | Angler Catch | Creel Survey | 105,553 |
| Quality | Fair | Average Weight | Creel Survey | 0.7 lbs |
| Value of Fishery* | Good | Trip Expenditures | Creel Survey | $182,140 |

(*all crappie combined)

Fishery Forecast: Decreased numbers of crappie were collected by electrofishing for the second consecutive year including the 2007 sample, but anglers have caught excellent numbers of crappie during the past several years as determined by our creel survey.
Management Recommendations: No changes in creel limits are planed for the future.

**Stocking and Stocking Evaluations**

| Species | Number Stocked | Mark | Evaluation | Value |
|---|---|---|---|---|
| Rainbow Trout | 11,006 | NA | NA | NA |
| Walleye | 51,794 | NA | NA | NA |

**Habitat Enhancement and Monitoring**

| | | |
|---|---|---|
| Water Quality | Temperature | July-August (Satisfactory) |
| | D.O. | July-August (Satisfactory) |

Tables

Table 1. Tellico Reservoir physical and chemical characteristics.

| | |
|---|---|
| Surface Area | 16,056 acres |
| Full Pool Elevation | 813 feet-msl |
| Mean Annual Fluctuation | 6 feet |
| Shoreline Distance | 357 miles |
| Total Developed Shoreline | 7% |
| Maximum Depth | 78 feet |
| Thermocline Depth | 10 feet (Aug 2007) |
| Trophic Status (Forebay) | Mesotrophic |
| Mean Chlorophyll (Forebay) | 6.2 mg/L |
| Trophic Index Value | 49.2 |
| Hydraulic Retention Time | 37 days |
| Reservoir Age | 28 years |

Table 2 Tellico Reservoir fish stockings 1993 - 2007.

| **Species** | **Year** | **Rate** (per acre) | **Size Group (in.)** Range | **Total Stocked** |
|---|---|---|---|---|
| Walleye | 1995 | 0.5 | 1.5 | 7,751 |
| | 1994 | 5.9 | 1.5 | 94,725 |
| | 1995 | 7.7 | 1.5 | 123,848 |
| | 1998 | 10.2 | 1.5 | 162,991 |
| | 2000 | 4.5 | 1.5 - 2.0 | 71,733 |
| | 2002 | 9.7 | 1.0 - 2.5 | 155,750 |
| | 2004 | 5.9 | 1.5 - 2.0 | 94,689 |
| | 2006 | 2.8 | 0.8 - 2.8 | 44,228 |
| | 2007 | 3.2 | 1.0 - 3.0 | 51,794 |
| Rainbow Trout | 1993 | 2.7 | Adult | 43,562 |
| | 1994 | 1.0 | Adult | 16,046 |
| | 1995 | 2.5 | Adult | 40,110 |
| | 1996 | 1.8 | Adult | 28,412 |
| | 1997 | 0.5 | Adult | 8,087 |
| | 1998 | 0.4 | Adult | 5,992 |
| | 1999 | 0.3 | Adult | 5,016 |
| | 2000 | 0.6 | Adult | 9,413 |
| | 2001 | 0.4 | Adult | 6,016 |
| | 2002 | 0.4 | Adult | 6,038 |
| | 2003 | 0.5 | Adult | 7,492 |
| | 2004 | 0.4 | Adult | 6,004 |
| | 2005 | 0.1 | Adult | 1,001 |
| | 2006 | 0.1 | Adult | 1,000 |
| | 2007 | 0.7 | Adult | 11,006 |
| Brown Trout | 1998 | 0.3 | Adult | 4,797 |
| | 1999 | 0.9 | Advanced Fingerlings | 13,960 |
| | 2003 | 0.9 | Fingerlings | 14,524 |

Table 3. Relative stock density, mean relative weight, and catch per unit effort by RSD catagory for target species collected in Tellico Reservoir 1998-2007.

| | | | # | Substock | | | RSD-stock | | | | RSD-quality | | | | RSD-preferred | | | | RSD-memorable | | | | RSD-trophy | | | | Total | | PSD |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Species** | **Year** | **Gear** | **Samp.** | No. | CPE | Pct. | No. | CPE | Pct. | Wr | No. | CPE | Pct. | Wr | No. | CPE | Pct. | Wr | No. | CPE | Pct. | Wr | No. | CPE | Pct. | Wr | No. | CPE | Pct. |
| Largemouth | 1998 | Ele | 16 | 27 | 6.8 | 14.4 | 78 | 19.5 | 41.7 | 79.9 | 66 | 16.5 | 35.3 | 82.2 | 8 | 2.0 | 4.3 | 84.9 | 8 | 2.0 | 4.3 | 93.2 | 0 | 0.0 | 0.0 | 0.0 | 187 | 46.8 | 51.0 |
| Bass | 1999 | Ele | 20 | 40 | 8.0 | 25.2 | 66 | 13.2 | 41.5 | 83.7 | 44 | 8.8 | 27.7 | 83.4 | 5 | 1.0 | 3.1 | 87.3 | 4 | 0.8 | 2.5 | 92.6 | 0 | 0.0 | 0.0 | 0.0 | 159 | 31.8 | 45.0 |
| | 2000 | Ele | 20 | 37 | 7.4 | 19.1 | 76 | 15.2 | 39.2 | 79.2 | 70 | 14.0 | 36.1 | 80.6 | 10 | 2.0 | 5.2 | 89.2 | 1 | 0.2 | 1.0 | 74.6 | 0 | 0.0 | 0.0 | 0.0 | 194 | 38.8 | 52.0 |
| | 2001 | Ele | 16 | 61 | 15.3 | 35.7 | 42 | 10.5 | 24.6 | 80.5 | 54 | 13.5 | 31.6 | 81.1 | 12 | 3.0 | 7.0 | 88.6 | 2 | 0.5 | 1.2 | 88.8 | 0 | 0.0 | 0.0 | 0.0 | 171 | 42.8 | 62.0 |
| | 2002 | Ele | 16 | 23 | 5.8 | 11.9 | 63 | 15.8 | 32.6 | 80.8 | 84 | 21.0 | 43.5 | 83.1 | 22 | 5.5 | 11.4 | 87.1 | 1 | 0.3 | 0.5 | 97.0 | 0 | 0.0 | 0.0 | 0.0 | 193 | 48.3 | 63.0 |
| | 2004 | Ele | 16 | 22 | 5.5 | 11.7 | 59 | 14.8 | 31.4 | 81.3 | 87 | 21.8 | 46.3 | 83.0 | 20 | 5.0 | 10.6 | 84.5 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 188 | 47.0 | 64.0 |
| | 2005 | Ele | 12 | 45 | 15.0 | 19.5 | 61 | 20.3 | 26.4 | 80.5 | 92 | 30.7 | 39.8 | 83.5 | 32 | 10.7 | 13.9 | 86.8 | 1 | 0.3 | 0.4 | 80.3 | 0 | 0.0 | 0.0 | 0.0 | 231 | 77.0 | 67.0 |
| | 2006 | Ele | 12 | 17 | 5.7 | 11.6 | 71 | 23.7 | 48.6 | 79.0 | 42 | 14.0 | 28.7 | 81.7 | 12 | 4.0 | 8.2 | 92.2 | 4 | 1.3 | 2.7 | 95.9 | 0 | 0.0 | 0.0 | 0.0 | 146 | 48.7 | 45.0 |
| | 2007 | Ele | 12 | 45 | 15.0 | 40.5 | 23 | 7.7 | 20.7 | 80.4 | 33 | 11.0 | 29.7 | 80.2 | 7 | 2.3 | 6.3 | 85.8 | 3 | 1.0 | 2.7 | 87.6 | 0 | 0.0 | 0.0 | 0.0 | 111 | 37.0 | 65.0 |
| Smallmouth | 1998 | Ele | 16 | 11 | 2.8 | 17.7 | 31 | 7.8 | 50.0 | 73.9 | 9 | 2.3 | 14.5 | 74.3 | 4 | 1.0 | 6.5 | 77.9 | 6 | 1.5 | 9.7 | 87.6 | 1 | 0.3 | 1.6 | 87.5 | 62 | 15.5 | 39.0 |
| Bass | 1999 | Ele | 20 | 26 | 5.2 | 44.1 | 22 | 4.4 | 37.3 | 75.9 | 10 | 2.0 | 17.0 | 79.6 | 1 | 0.2 | 1.7 | 80.2 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 59 | 11.8 | 33.0 |
| | 2000 | Ele | 20 | 3 | 0.6 | 12.0 | 12 | 2.4 | 48.0 | 77.1 | 7 | 1.4 | 28.0 | 75.5 | 2 | 0.4 | 8.0 | 81.4 | 1 | 0.2 | 4.0 | 85.8 | 0 | 0.0 | 0.0 | 0.0 | 25 | 5.0 | 45.0 |
| | 2001 | Ele | 16 | 10 | 2.5 | 30.3 | 13 | 3.3 | 39.4 | 80.1 | 7 | 1.8 | 21.2 | 77.0 | 2 | 0.5 | 6.1 | 81.1 | 1 | 0.3 | 3.0 | 75.9 | 0 | 0.0 | 0.0 | 0.0 | 33 | 8.3 | 43.0 |
| | 2002 | Ele | 16 | 10 | 2.5 | 23.8 | 16 | 4.0 | 38.1 | 86.0 | 9 | 2.3 | 21.4 | 82.5 | 4 | 1.0 | 9.5 | 81.3 | 3 | 0.8 | 7.1 | 78.3 | 0 | 0.0 | 0.0 | 0.0 | 42 | 10.5 | 50.0 |
| | 2004 | Ele | 16 | 5 | 1.3 | 10.4 | 19 | 4.8 | 39.6 | 80.7 | 18 | 4.5 | 37.5 | 79.3 | 5 | 1.3 | 10.4 | 79.8 | 1 | 0.3 | 2.1 | 71.1 | 0 | 0.0 | 0.0 | 0.0 | 48 | 12.0 | 56.0 |
| | 2005 | Ele | 12 | 3 | 1.0 | 7.1 | 21 | 7.0 | 50.0 | 83.1 | 10 | 3.3 | 23.8 | 81.6 | 5 | 1.7 | 11.9 | 78.6 | 2 | 0.7 | 4.8 | 75.6 | 1 | 0.3 | 2.4 | nr | 42 | 14.0 | 46.0 |
| | 2006 | Ele | 12 | 7 | 2.3 | 24.1 | 15 | 5.0 | 51.7 | 79.7 | 5 | 1.7 | 17.2 | 73.4 | 2 | 0.7 | 6.9 | 83.5 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 29 | 9.7 | 32.0 |
| | 2007 | Ele | 12 | 6 | 2.0 | 31.6 | 6 | 2.0 | 31.6 | 79.8 | 4 | 1.3 | 21.1 | 82.1 | 3 | 1.0 | 15.8 | 75.8 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 19 | 6.3 | 54.0 |
| Spotted | 1998 | Ele | 16 | 14 | 3.5 | 30.4 | 27 | 6.8 | 58.7 | 74.1 | 5 | 1.3 | 10.9 | 79.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 46 | 11.5 | 16.0 |
| Bass | 1999 | Ele | 20 | 51 | 10.2 | 45.1 | 59 | 11.8 | 52.2 | 73.0 | 3 | 0.6 | 2.7 | 73.6 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 113 | 22.6 | 5.0 |
| | 2000 | Ele | 20 | 32 | 6.4 | 27.6 | 75 | 15.0 | 64.7 | 85.2 | 8 | 1.6 | 6.8 | 79.6 | 1 | 0.2 | 1.0 | 85.1 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 116 | 32.5 | 11.0 |
| | 2001 | Ele | 16 | 43 | 10.8 | 29.1 | 72 | 18.0 | 48.6 | 84.7 | 33 | 8.3 | 22.2 | 84.8 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 148 | 37.0 | 31.0 |
| | 2002 | Ele | 16 | 27 | 6.8 | 15.9 | 121 | 30.3 | 71.2 | 88.9 | 21 | 5.3 | 12.4 | 85.4 | 1 | 0.3 | 0.6 | 89.4 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 170 | 42.5 | 15.0 |
| | 2004 | Ele | 16 | 24 | 6.0 | 11.5 | 143 | 35.8 | 68.4 | 84.6 | 39 | 9.8 | 18.7 | 83.3 | 3 | 0.8 | 1.4 | 90.7 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 209 | 52.3 | 23.0 |
| | 2005 | Ele | 12 | 27 | 9.0 | 19.6 | 74 | 24.7 | 53.6 | 87.6 | 35 | 11.7 | 25.4 | 83.8 | 2 | 0.7 | 1.5 | 86.9 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 138 | 46.0 | 33.0 |
| | 2006 | Ele | 12 | 24 | 8.0 | 15.6 | 101 | 33.7 | 65.6 | 83.8 | 28 | 9.3 | 18.2 | 74.7 | 1 | 0.3 | 0.6 | 65.3 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 154 | 51.3 | 22.0 |
| | 2007 | Ele | 12 | 27 | 9.0 | 23.3 | 73 | 24.3 | 63.0 | 82.5 | 15 | 5.0 | 12.9 | 76.4 | 1 | 0.3 | 0.8 | 82.8 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 116 | 38.7 | 18.0 |
| White | 1998 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 8 | 2.0 | 36.4 | 80.7 | 13 | 3.3 | 59.0 | 79.7 | 1 | 0.3 | 4.5 | 91.9 | 0 | 0.0 | 0.0 | 0.0 | 22 | 5.5 | 100.0 |
| Crappie | 1999 | Ele | 20 | 0 | 0.0 | 0.0 | 1 | 0.2 | 4.5 | 80.1 | 5 | 1.0 | 22.7 | 80.0 | 10 | 2.0 | 45.5 | 79.9 | 6 | 1.2 | 27.3 | 76.2 | 0 | 0.0 | 0.0 | 0.0 | 22 | 4.4 | 95.0 |
| | 2000 | Ele | 20 | 0 | 0.0 | 0.0 | 1 | 0.2 | 1.4 | 77.9 | 35 | 7.0 | 50.7 | 80.4 | 27 | 5.4 | 39.1 | 78.8 | 6 | 1.2 | 8.7 | 77.9 | 0 | 0.0 | 0.0 | 0.0 | 69 | 13.8 | 99.0 |
| | 2001 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 5 | 1.3 | 35.7 | 74.9 | 8 | 2.0 | 57.1 | 77.2 | 1 | 0.3 | 7.1 | 78.3 | 0 | 0.0 | 0.0 | 0.0 | 14 | 3.5 | 100.0 |
| | 2002 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 10 | 2.5 | 27.0 | 76.8 | 23 | 5.8 | 62.2 | 79.2 | 4 | 1.0 | 10.8 | 77.4 | 0 | 0.0 | 0.0 | 0.0 | 37 | 9.3 | 100.0 |
| | 2004 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 14 | 3.5 | 26.4 | 82.7 | 31 | 7.8 | 58.5 | 80.3 | 7 | 1.8 | 13.2 | 82.0 | 1 | 0.3 | 1.9 | 0.0 | 53 | 13.3 | 100.0 |
| | 2005 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 17 | 5.7 | 37.0 | 80.9 | 24 | 8.0 | 52.2 | 78.2 | 5 | 1.7 | 10.9 | 74.7 | 0 | 0.0 | 0.0 | 0.0 | 46 | 15.3 | 100.0 |
| | 2006 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 3 | 1.0 | 33.3 | 76.9 | 6 | 2.0 | 66.7 | 74.2 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 9 | 3.0 | 100.0 |
| | 2007 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.7 | 22.2 | 82.6 | 4 | 1.3 | 44.4 | 80.5 | 3 | 1.0 | 33.3 | 76.9 | 0 | 0.0 | 0.0 | 0.0 | 9 | 3.0 | 100.0 |
| Black | 1998 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 1 | 0.3 | 100.0 | 85.9 | 0 | 0.0 | 0.0 | 0.0 | 1 | 0.3 | 100.0 |
| Crappie | 1999 | Ele | 20 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 1 | 0.2 | 50.0 | 76.1 | 1 | 0.2 | 50.0 | 79.3 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.4 | 100.0 |
| | 2000 | Ele | 20 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 1 | 0.2 | 50.0 | 73.2 | 1 | 0.2 | 50.0 | 79.7 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.4 | 100.0 |
| | 2001 | Ele | 16 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.5 | 66.7 | 80.9 | 1 | 0.3 | 33.3 | 66.8 | 0 | 0.0 | 0.0 | 0.0 | 3 | 0.8 | 100.0 |
| | 2002 | Ele | 16 | 0 | 0.0 | 0.0 | 3 | 0.8 | 25.0 | 82.3 | 4 | 1.0 | 33.3 | 75.7 | 4 | 1.0 | 33.3 | 82.1 | 1 | 0.3 | 8.3 | 78.3 | 0 | 0.0 | 0.0 | 0.0 | 12 | 3.0 | 75.0 |
| | 2004 | Ele | 16 | 0 | 0.0 | 0.0 | 1 | 0.3 | 7.7 | 79.2 | 7 | 1.8 | 53.9 | 79.8 | 4 | 1.0 | 30.8 | 85.9 | 1 | 0.3 | 7.7 | 71.7 | 0 | 0.0 | 0.0 | 0.0 | 13 | 3.3 | 92.0 |
| | 2005 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.7 | 28.6 | 81.5 | 4 | 1.3 | 57.1 | 78.2 | 1 | 0.3 | 14.3 | 78.0 | 0 | 0.0 | 0.0 | 0.0 | 7 | 2.3 | 100.0 |
| | 2006 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 4 | 1.3 | 97.7 | 79.5 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 4 | 1.3 | 100.0 |
| | 2007 | Ele | 12 | 0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.7 | 100.0 | 78.9 | 0 | 0.0 | 0.0 | 0.0 | 0 | 0.0 | 0.0 | 0.0 | 2 | 0.7 | 100.0 |

Table 4. Mean relative weight and standard error values by size class for Tellico Reservoir largemouth bass collected during the 2007 electrofishing sample.

| Size Class | Mean Wr | Std. Error | N |
|---|---|---|---|
| 7 | 80.0 | 1.8 | 15 |
| 8 | 81.5 | 1.8 | 4 |
| 9 | 81.1 | 1.1 | 2 |
| 10 | 81.3 | 3.4 | 6 |
| 11 | 80.8 | 2.2 | 14 |
| 12 | 79.1 | 1.3 | 17 |
| 13 | 80.5 | 2.7 | 9 |
| 14 | 80.8 | 1.5 | 2 |
| 15 | 77.7 | | 1 |
| 16 | 90.1 | 15.1 | 2 |
| 17 | 79.9 | 2.9 | 2 |
| 18 | 83.3 | | 1 |
| 19 | 99.5 | | 1 |
| 20 | 82.2 | 11.3 | 2 |
| 21 | | | |
| 22 | 98.5 | | 1 |
| | | **Total Catch** | 79 |

Table 5. Mean relative weight and standard error values by size class for Tellico Reservoir smallmouth bass collected during the 2007 electrofishing sample.

| Size Class | Mean Wr | Std. Error | N |
|---|---|---|---|
| 8 | 81.9 | | 1 |
| 9 | 80.8 | 2.0 | 3 |
| 10 | 77.3 | 4.8 | 2 |
| 11 | 85.0 | 5.0 | 2 |
| 12 | 79.2 | 7.4 | 2 |
| 13 | | | |
| 14 | 75.8 | 3.8 | 3 |
| | | **Total Catch** | 13 |

Table 6. Mean relative weight and standard error values by size class for Tellico Reservoir spotted bass collected during the 2007 electrofishing sample.

| Size Class | Mean Wr | Std. Error | N |
|---|---|---|---|
| 6 | 86.5 | | 1 |
| 7 | 85.6 | 2.7 | 18 |
| 8 | 82.5 | 1.8 | 17 |
| 9 | 83.9 | 2.6 | 13 |
| 10 | 79.6 | 1.3 | 25 |
| 11 | 77.1 | 2.1 | 11 |
| 12 | 76.2 | 1.2 | 3 |
| 13 | 68.7 | | 1 |
| 14 | 82.8 | | 1 |
| | | **Total Catch** | 90 |

Table 7. Summary of July 2007 Tellico Reservoir water quality parameters at Little Tennessee River Mile 3.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 78.8 | 79 | 8.6 | 6.8 | LT03 | 8.2 | 700 | 7/5/2007 |
| 3 | 79.0 | 80 | 8.4 | 7.5 | | | | |
| 7 | 79.0 | 80 | 8.3 | 7.7 | | | | |
| 10 | 79.0 | 80 | 8.3 | 7.8 | | | | |
| 13 | 78.8 | 83 | 8.2 | 7.6 | | | | |
| 16 | 74.3 | 97 | 8.1 | 7.0 | | | | |
| 20 | 72.0 | 98 | 8.1 | 6.9 | | | | |
| 23 | 67.6 | 65 | 8.0 | 6.3 | | | | |
| 26 | 63.0 | 39 | 8.0 | 5.7 | | | | |
| 30 | 61.7 | 38 | 8.0 | 5.5 | | | | |
| 33 | 60.8 | 41 | 7.9 | 5.1 | | | | |
| 36 | 59.9 | 43 | 7.8 | 4.7 | | | | |
| 39 | 59.4 | 46 | 7.8 | 4.3 | | | | |
| 43 | 58.1 | 51 | 7.8 | 3.5 | | | | |
| 46 | 57.9 | 52 | 7.7 | 3.2 | | | | |
| 49 | 57.4 | 54 | 7.7 | 2.8 | | | | |
| 52 | 57.0 | 56 | 7.7 | 2.6 | | | | |
| 56 | 56.7 | 57 | 7.7 | 2.3 | | | | |
| 59 | 55.9 | 59 | 7.6 | 2.1 | | | | |
| 62 | 55.6 | 63 | 7.6 | 2.0 | | | | |
| 66 | 55.6 | 60 | 7.6 | 1.7 | | | | |
| 69 | 55.4 | 61 | 7.6 | 1.6 | | | | |
| 72 | 55.4 | 61 | 7.6 | 1.5 | | | | |
| 75 | 55.2 | 61 | 7.5 | 1.4 | | | | |

Table 8. Summary of July 2007 Tellico Reservoir water quality parameters at Little Tennessee River Mile 18.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 79.7 | 55 | 8.1 | 7.8 | LT18 | 8.2 | 800 | 7/5/2007 |
| 3 | 79.7 | 55 | 8.0 | 7.3 | | | | |
| 7 | 79.7 | 55 | 7.9 | 7.2 | | | | |
| 10 | 79.7 | 55 | 7.9 | 7.5 | | | | |
| 13 | 72.7 | 41 | 7.9 | 8.4 | | | | |
| 16 | 66.6 | 32 | 7.8 | 7.9 | | | | |
| 20 | 63.3 | 27 | 7.7 | 7.9 | | | | |
| 23 | 61.7 | 26 | 7.6 | 7.7 | | | | |
| 26 | 61.2 | 26 | 7.5 | 7.5 | | | | |
| 30 | 61.0 | 26 | 7.5 | 7.2 | | | | |
| 33 | 60.8 | 26 | 7.5 | 7.2 | | | | |
| 36 | 60.8 | 26 | 7.4 | 7.2 | | | | |
| 39 | 60.6 | 26 | 7.4 | 7.2 | | | | |
| 43 | 60.6 | 27 | 7.4 | 7.2 | | | | |
| 46 | 60.1 | 30 | 7.3 | 6.1 | | | | |
| 49 | 59.5 | 36 | 7.3 | 5.0 | | | | |

Table 9. Summary of July 2007 Tellico Reservoir water quality parameters at Tellico River Mile 4.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 81.3 | 92 | 8.2 | 7.7 | TL04 | 4.9 | 900 | 7/5/2007 |
| 3 | 81.5 | 92 | 8.1 | 7.7 | | | | |
| 7 | 81.5 | 92 | 8.1 | 7.6 | | | | |
| 10 | 81.3 | 91 | 8.1 | 7.7 | | | | |
| 13 | 69.8 | 53 | 7.8 | 6.9 | | | | |
| 16 | 65.3 | 40 | 7.7 | 5.3 | | | | |
| 20 | 62.8 | 34 | 7.6 | 5.2 | | | | |
| 23 | 62.4 | 32 | 7.4 | 5.4 | | | | |
| 26 | 61.5 | 31 | 7.4 | 5.5 | | | | |

Table 10. Summary of August 2007 Tellico Reservoir water quality parameters at Little Tennessee River Mile 3.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 83.3 | 89 | 8.4 | 7.7 | LT03 | 6.9 | 700 | 8/6/2007 |
| 3 | 83.3 | 88 | 8.2 | 7.5 | | | | |
| 7 | 83.3 | 88 | 8.1 | 7.3 | | | | |
| 10 | 83.3 | 90 | 8.1 | 7.6 | | | | |
| 13 | 79.0 | 116 | 8.0 | 7.7 | | | | |
| 16 | 76.5 | 106 | 8.0 | 7.2 | | | | |
| 20 | 70.0 | 59 | 8.0 | 6.1 | | | | |
| 23 | 67.5 | 45 | 7.8 | 5.3 | | | | |
| 26 | 64.6 | 37 | 7.7 | 4.4 | | | | |
| 30 | 62.6 | 40 | 7.6 | 3.4 | | | | |
| 33 | 62.4 | 39 | 7.4 | 3.1 | | | | |
| 36 | 62.1 | 40 | 7.4 | 2.7 | | | | |
| 39 | 61.5 | 41 | 7.3 | 2.5 | | | | |
| 43 | 60.4 | 44 | 7.3 | 2.0 | | | | |
| 46 | 60.1 | 44 | 7.2 | 1.5 | | | | |
| 49 | 59.7 | 46 | 7.2 | 1.2 | | | | |
| 52 | 59.4 | 47 | 7.1 | 1.2 | | | | |
| 56 | 59.0 | 48 | 7.1 | 1.0 | | | | |
| 59 | 58.6 | 51 | 7.1 | 0.7 | | | | |
| 62 | 58.5 | 52 | 7.0 | 0.5 | | | | |
| 66 | 58.3 | 53 | 7.0 | 0.5 | | | | |
| 69 | 57.9 | 55 | 7.0 | 0.3 | | | | |
| 72 | 57.7 | 56 | 7.0 | 0.2 | | | | |
| 75 | 57.7 | 56 | 7.0 | 0.2 | | | | |
| 79 | 57.7 | 56 | 6.9 | 0.2 | | | | |
| 82 | 57.7 | 56 | 6.9 | 0.2 | | | | |

Table 11. Summary of August 2007 Tellico Reservoir water quality parameters at Little Tennessee River Mile 18.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 83.3 | 54 | 7.8 | 7.2 | LT18 | 8.2 | 830 | 8/6/2007 |
| 3 | 83.3 | 54 | 7.7 | 7.1 | | | | |
| 7 | 83.3 | 54 | 7.8 | 7.1 | | | | |
| 10 | 78.3 | 48 | 7.7 | 8.1 | | | | |
| 13 | 74.8 | 43 | 7.6 | 8.0 | | | | |
| 16 | 70.3 | 37 | 7.5 | 7.8 | | | | |
| 20 | 66.2 | 31 | 7.4 | 6.7 | | | | |
| 23 | 64.6 | 28 | 7.3 | 6.5 | | | | |
| 26 | 63.9 | 27 | 7.2 | 6.5 | | | | |
| 30 | 63.7 | 28 | 7.1 | 6.5 | | | | |
| 33 | 63.7 | 28 | 7.1 | 6.2 | | | | |
| 36 | 63.7 | 28 | 7.1 | 6.3 | | | | |
| 39 | 63.5 | 27 | 7.0 | 6.4 | | | | |
| 43 | 63.5 | 28 | 7.0 | 6.3 | | | | |
| 46 | 63.3 | 29 | 7.0 | 6.0 | | | | |
| 49 | 63.1 | 29 | 6.9 | 5.6 | | | | |

Table 12. Summary of August 2007 Tellico Reservoir water quality parameters at Tellico River Mile 4.

| Depth (ft) | Temp F | Cond | PH | DO | Site | Secchi (ft) | Time | Date |
|---|---|---|---|---|---|---|---|---|
| 0 | 84.0 | 88 | 7.8 | 7.3 | TL04 | 6.6 | 900 | 8/6/2007 |
| 3 | 84.0 | 88 | 7.9 | 7.4 | | | | |
| 7 | 84.0 | 88 | 7.9 | 6.6 | | | | |
| 10 | 83.7 | 87 | 7.9 | 6.8 | | | | |
| 13 | 73.0 | 59 | 7.8 | 4.2 | | | | |
| 16 | 69.1 | 48 | 7.5 | 2.3 | | | | |
| 20 | 66.7 | 47 | 7.3 | 0.8 | | | | |
| 23 | 65.3 | 54 | 7.2 | 0.3 | | | | |
| 26 | 64.4 | 59 | 7.1 | 0.2 | | | | |
| 30 | 64.0 | 61 | 7.0 | 0.2 | | | | |
| 33 | 63.9 | 64 | 7.0 | 0.2 | | | | |
| 36 | 63.7 | 65 | 7.0 | 0.2 | | | | |
| 39 | 63.5 | 67 | 7.0 | 0.2 | | | | |

Table 13. Tellico Reservoir water levels for 2007. (TVA)

| ELEVATION | MONTH | DAY | ELEVATION | MONTH | DAY | ELEVATION | MONTH | DAY |
|---|---|---|---|---|---|---|---|---|
| 809.02 | JANUARY | 1 | 808.94 | FEBRUARY | 24 | 812.02 | APRIL | 19 |
| 808.94 | JANUARY | 2 | 808.95 | FEBRUARY | 25 | 812.10 | APRIL | 20 |
| 809.29 | JANUARY | 3 | 808.80 | FEBRUARY | 26 | 812.24 | APRIL | 21 |
| 809.57 | JANUARY | 4 | 808.46 | FEBRUARY | 27 | 812.33 | APRIL | 22 |
| 809.99 | JANUARY | 5 | 808.43 | FEBRUARY | 28 | 812.25 | APRIL | 23 |
| 809.67 | JANUARY | 6 | 808.72 | MARCH | 1 | 812.22 | APRIL | 24 |
| 809.40 | JANUARY | 7 | 809.01 | MARCH | 2 | 812.18 | APRIL | 25 |
| 809.42 | JANUARY | 8 | 809.22 | MARCH | 3 | 812.31 | APRIL | 26 |
| 809.53 | JANUARY | 9 | 809.32 | MARCH | 4 | 812.40 | APRIL | 27 |
| 809.16 | JANUARY | 10 | 808.89 | MARCH | 5 | 812.51 | APRIL | 28 |
| 809.20 | JANUARY | 11 | 808.53 | MARCH | 6 | 812.49 | APRIL | 29 |
| 809.66 | JANUARY | 12 | 808.51 | MARCH | 7 | 812.53 | APRIL | 30 |
| 809.87 | JANUARY | 13 | 808.66 | MARCH | 8 | 812.61 | MAY | 1 |
| 809.39 | JANUARY | 14 | 808.66 | MARCH | 9 | 812.73 | MAY | 2 |
| 808.46 | JANUARY | 15 | 808.76 | MARCH | 10 | 812.67 | MAY | 3 |
| 808.24 | JANUARY | 16 | 808.83 | MARCH | 11 | 812.71 | MAY | 4 |
| 808.52 | JANUARY | 17 | 808.74 | MARCH | 12 | 812.93 | MAY | 5 |
| 808.43 | JANUARY | 18 | 808.83 | MARCH | 13 | 812.97 | MAY | 6 |
| 809.42 | JANUARY | 19 | 808.91 | MARCH | 14 | 812.98 | MAY | 7 |
| 809.39 | JANUARY | 20 | 808.74 | MARCH | 15 | 812.99 | MAY | 8 |
| 809.40 | JANUARY | 21 | 809.14 | MARCH | 16 | 813.00 | MAY | 9 |
| 809.30 | JANUARY | 22 | 809.45 | MARCH | 17 | 813.00 | MAY | 10 |
| 809.48 | JANUARY | 23 | 809.13 | MARCH | 18 | 813.03 | MAY | 11 |
| 809.41 | JANUARY | 24 | 808.85 | MARCH | 19 | 813.06 | MAY | 12 |
| 809.31 | JANUARY | 25 | 808.81 | MARCH | 20 | 813.05 | MAY | 13 |
| 809.35 | JANUARY | 26 | 808.74 | MARCH | 21 | 813.12 | MAY | 14 |
| 809.31 | JANUARY | 27 | 808.71 | MARCH | 22 | 813.22 | MAY | 15 |
| 809.43 | JANUARY | 28 | 808.68 | MARCH | 23 | 813.35 | MAY | 16 |
| 809.40 | JANUARY | 29 | 808.74 | MARCH | 24 | 813.40 | MAY | 17 |
| 808.92 | JANUARY | 30 | 808.81 | MARCH | 25 | 813.42 | MAY | 18 |
| 809.05 | JANUARY | 31 | 808.59 | MARCH | 26 | 813.56 | MAY | 19 |
| 808.93 | FEBRUARY | 1 | 808.59 | MARCH | 27 | 813.69 | MAY | 20 |
| 809.00 | FEBRUARY | 2 | 808.72 | MARCH | 28 | 813.66 | MAY | 21 |
| 809.23 | FEBRUARY | 3 | 808.76 | MARCH | 29 | 813.66 | MAY | 22 |
| 809.23 | FEBRUARY | 4 | 808.69 | MARCH | 30 | 813.63 | MAY | 23 |
| 809.76 | FEBRUARY | 5 | 808.63 | MARCH | 31 | 813.29 | MAY | 24 |
| 809.34 | FEBRUARY | 6 | 808.64 | APRIL | 1 | 812.85 | MAY | 25 |
| 809.02 | FEBRUARY | 7 | 808.82 | APRIL | 2 | 812.60 | MAY | 26 |
| 809.21 | FEBRUARY | 8 | 809.02 | APRIL | 3 | 812.49 | MAY | 27 |
| 809.24 | FEBRUARY | 9 | 809.22 | APRIL | 4 | 812.34 | MAY | 28 |
| 809.38 | FEBRUARY | 10 | 809.34 | APRIL | 5 | 812.27 | MAY | 29 |
| 809.13 | FEBRUARY | 11 | 809.39 | APRIL | 6 | 812.29 | MAY | 30 |
| 809.03 | FEBRUARY | 12 | 809.38 | APRIL | 7 | 812.41 | MAY | 31 |
| 809.13 | FEBRUARY | 13 | 809.39 | APRIL | 8 | 812.41 | JUNE | 1 |
| 808.99 | FEBRUARY | 14 | 809.52 | APRIL | 9 | 812.67 | JUNE | 2 |
| 808.55 | FEBRUARY | 15 | 809.55 | APRIL | 10 | 812.70 | JUNE | 3 |
| 808.22 | FEBRUARY | 16 | 809.78 | APRIL | 11 | 812.64 | JUNE | 4 |
| 808.50 | FEBRUARY | 17 | 809.90 | APRIL | 12 | 812.66 | JUNE | 5 |
| 808.69 | FEBRUARY | 18 | 809.93 | APRIL | 13 | 812.69 | JUNE | 6 |
| 808.51 | FEBRUARY | 19 | 810.14 | APRIL | 14 | 812.53 | JUNE | 7 |
| 808.54 | FEBRUARY | 20 | 810.68 | APRIL | 15 | 812.40 | JUNE | 8 |
| 808.89 | FEBRUARY | 21 | 811.25 | APRIL | 16 | 812.28 | JUNE | 9 |
| 808.85 | FEBRUARY | 22 | 811.62 | APRIL | 17 | 812.34 | JUNE | 10 |
| 809.17 | FEBRUARY | 23 | 811.81 | APRIL | 18 | 812.01 | JUNE | 11 |

Table 14. Tellico Reservoir water levels for 2007. (TVA)

| ELEVATION | MONTH | DAY | ELEVATION | MONTH | DAY | ELEVATION | MONTH | DAY |
|---|---|---|---|---|---|---|---|---|
| 812.30 | JUNE | 12 | 812.19 | AUGUST | 5 | 813.12 | SEPTEMBER | 28 |
| 812.32 | JUNE | 13 | 811.98 | AUGUST | 6 | 813.21 | SEPTEMBER | 29 |
| 812.32 | JUNE | 14 | 811.72 | AUGUST | 7 | 812.93 | SEPTEMBER | 30 |
| 812.37 | JUNE | 15 | 812.06 | AUGUST | 8 | 812.62 | OCTOBER | 1 |
| 812.54 | JUNE | 16 | 812.19 | AUGUST | 9 | 812.46 | OCTOBER | 2 |
| 812.44 | JUNE | 17 | 812.44 | AUGUST | 10 | 812.43 | OCTOBER | 3 |
| 812.42 | JUNE | 18 | 812.49 | AUGUST | 11 | 812.61 | OCTOBER | 4 |
| 812.55 | JUNE | 19 | 812.29 | AUGUST | 12 | 812.57 | OCTOBER | 5 |
| 812.65 | JUNE | 20 | 812.30 | AUGUST | 13 | 812.69 | OCTOBER | 6 |
| 812.71 | JUNE | 21 | 812.65 | AUGUST | 14 | 812.38 | OCTOBER | 7 |
| 812.60 | JUNE | 22 | 812.52 | AUGUST | 15 | 811.98 | OCTOBER | 8 |
| 812.72 | JUNE | 23 | 812.39 | AUGUST | 16 | 812.08 | OCTOBER | 9 |
| 812.36 | JUNE | 24 | 812.46 | AUGUST | 17 | 811.88 | OCTOBER | 10 |
| 812.13 | JUNE | 25 | 812.44 | AUGUST | 18 | 811.96 | OCTOBER | 11 |
| 812.31 | JUNE | 26 | 812.23 | AUGUST | 19 | 812.08 | OCTOBER | 12 |
| 812.36 | JUNE | 27 | 812.07 | AUGUST | 20 | 812.17 | OCTOBER | 13 |
| 812.35 | JUNE | 28 | 812.34 | AUGUST | 21 | 812.32 | OCTOBER | 14 |
| 812.47 | JUNE | 29 | 812.39 | AUGUST | 22 | 812.16 | OCTOBER | 15 |
| 812.27 | JUNE | 30 | 812.49 | AUGUST | 23 | 812.24 | OCTOBER | 16 |
| 812.20 | JULY | 1 | 812.59 | AUGUST | 24 | 812.34 | OCTOBER | 17 |
| 811.94 | JULY | 2 | 812.58 | AUGUST | 25 | 812.32 | OCTOBER | 18 |
| 811.99 | JULY | 3 | 812.46 | AUGUST | 26 | 812.68 | OCTOBER | 19 |
| 812.01 | JULY | 4 | 812.27 | AUGUST | 27 | 812.67 | OCTOBER | 20 |
| 812.30 | JULY | 5 | 812.35 | AUGUST | 28 | 812.70 | OCTOBER | 21 |
| 812.28 | JULY | 6 | 812.37 | AUGUST | 29 | 812.68 | OCTOBER | 22 |
| 812.50 | JULY | 7 | 812.78 | AUGUST | 30 | 812.67 | OCTOBER | 23 |
| 812.44 | JULY | 8 | 812.32 | AUGUST | 31 | 812.63 | OCTOBER | 24 |
| 812.33 | JULY | 9 | 812.51 | SEPTEMBER | 1 | 812.62 | OCTOBER | 25 |
| 812.38 | JULY | 10 | 812.36 | SEPTEMBER | 2 | 812.61 | OCTOBER | 26 |
| 812.47 | JULY | 11 | 812.30 | SEPTEMBER | 3 | 812.70 | OCTOBER | 27 |
| 812.60 | JULY | 12 | 812.39 | SEPTEMBER | 4 | 812.71 | OCTOBER | 28 |
| 812.60 | JULY | 13 | 812.50 | SEPTEMBER | 5 | 812.59 | OCTOBER | 29 |
| 812.60 | JULY | 14 | 812.54 | SEPTEMBER | 6 | 812.61 | OCTOBER | 30 |
| 812.64 | JULY | 15 | 812.42 | SEPTEMBER | 7 | 812.59 | OCTOBER | 31 |
| 812.40 | JULY | 16 | 812.56 | SEPTEMBER | 8 | 812.49 | NOVEMBER | 1 |
| 812.38 | JULY | 17 | 812.44 | SEPTEMBER | 9 | 812.41 | NOVEMBER | 2 |
| 812.39 | JULY | 18 | 812.34 | SEPTEMBER | 10 | 812.44 | NOVEMBER | 3 |
| 812.47 | JULY | 19 | 812.38 | SEPTEMBER | 11 | 812.46 | NOVEMBER | 4 |
| 812.66 | JULY | 20 | 812.38 | SEPTEMBER | 12 | 812.31 | NOVEMBER | 5 |
| 812.76 | JULY | 21 | 812.38 | SEPTEMBER | 13 | 812.26 | NOVEMBER | 6 |
| 812.69 | JULY | 22 | 812.57 | SEPTEMBER | 14 | 812.16 | NOVEMBER | 7 |
| 812.53 | JULY | 23 | 812.61 | SEPTEMBER | 15 | 812.08 | NOVEMBER | 8 |
| 812.62 | JULY | 24 | 812.50 | SEPTEMBER | 16 | 811.93 | NOVEMBER | 9 |
| 812.72 | JULY | 25 | 812.41 | SEPTEMBER | 17 | 811.96 | NOVEMBER | 10 |
| 812.83 | JULY | 26 | 812.50 | SEPTEMBER | 18 | 811.90 | NOVEMBER | 11 |
| 812.81 | JULY | 27 | 812.50 | SEPTEMBER | 19 | 811.75 | NOVEMBER | 12 |
| 813.04 | JULY | 28 | 812.47 | SEPTEMBER | 20 | 811.67 | NOVEMBER | 13 |
| 813.04 | JULY | 29 | 812.53 | SEPTEMBER | 21 | 811.86 | NOVEMBER | 14 |
| 812.82 | JULY | 30 | 812.70 | SEPTEMBER | 22 | 811.94 | NOVEMBER | 15 |
| 812.65 | JULY | 31 | 812.72 | SEPTEMBER | 23 | 812.02 | NOVEMBER | 16 |
| 812.65 | AUGUST | 1 | 812.63 | SEPTEMBER | 24 | 811.98 | NOVEMBER | 17 |
| 812.60 | AUGUST | 2 | 812.61 | SEPTEMBER | 25 | 811.87 | NOVEMBER | 18 |
| 812.62 | AUGUST | 3 | 812.83 | SEPTEMBER | 26 | 811.74 | NOVEMBER | 19 |
| 812.61 | AUGUST | 4 | 812.85 | SEPTEMBER | 27 | 811.50 | NOVEMBER | 20 |

Table 15. Tellico Reservoir water levels for 2007. (TVA)

| ELEVATION | MONTH | DAY |
|---|---|---|
| 811.34 | NOVEMBER | 21 |
| 811.23 | NOVEMBER | 22 |
| 811.00 | NOVEMBER | 23 |
| 810.95 | NOVEMBER | 24 |
| 810.86 | NOVEMBER | 25 |
| 811.06 | NOVEMBER | 26 |
| 810.82 | NOVEMBER | 27 |
| 810.62 | NOVEMBER | 28 |
| 810.31 | NOVEMBER | 29 |
| 810.10 | NOVEMBER | 30 |
| 810.06 | DECEMBER | 1 |
| 810.18 | DECEMBER | 2 |
| 809.93 | DECEMBER | 3 |
| 809.70 | DECEMBER | 4 |
| 809.57 | DECEMBER | 5 |
| 809.50 | DECEMBER | 6 |
| 809.41 | DECEMBER | 7 |
| 809.39 | DECEMBER | 8 |
| 809.39 | DECEMBER | 9 |
| 809.42 | DECEMBER | 10 |
| 809.30 | DECEMBER | 11 |
| 809.16 | DECEMBER | 12 |
| 809.06 | DECEMBER | 13 |
| 808.96 | DECEMBER | 14 |
| 808.99 | DECEMBER | 15 |
| 809.05 | DECEMBER | 16 |
| 809.03 | DECEMBER | 17 |
| 808.94 | DECEMBER | 18 |
| 808.86 | DECEMBER | 19 |
| 808.78 | DECEMBER | 20 |
| 808.80 | DECEMBER | 21 |
| 808.88 | DECEMBER | 22 |
| 808.83 | DECEMBER | 23 |
| 808.81 | DECEMBER | 24 |
| 808.88 | DECEMBER | 25 |
| 808.95 | DECEMBER | 26 |
| 809.03 | DECEMBER | 27 |
| 809.34 | DECEMBER | 28 |
| 809.83 | DECEMBER | 29 |
| 810.01 | DECEMBER | 30 |
| 810.00 | DECEMBER | 31 |

Table 16. Tellico Reservoir fish habitat enhancement summary for 2007.

| | NEW SITES | | | RENOVATED SITES | | | EXPANDED SITES | | |
|---|---|---|---|---|---|---|---|---|---|
| LOCATION | NUMBER | UNITS | ACRES | NUMBER | UNITS | ACRES | NUMBER | UNITS | ACRES |
| TellicoRM 3.35 R* | | | | 1 | 40 | 0.80 | | | |
| TellicoRM 1.30 L* | | | | 1 | 40 | 0.80 | | | |
| TellicoRM 0.25 L* | | | | 1 | 120 | 2.40 | | | |
| TellicoRM 1.15 L* | | | | 1 | 120 | 2.40 | | | |
| TellicoRM 0.75 L* | | | | 1 | 40 | 0.80 | | | |
| TellicoRM 0.25 L* | | | | 1 | 80 | 1.60 | | | |
| TellicoRM 0.35 R* | | | | 1 | 40 | 0.80 | | | |
| TellicoRM 0.45 R* | | | | 1 | 40 | 0.08 | | | |
| TellicoRM 1.75 R* | | | | 1 | 40 | 0.80 | | | |
| | | | | 9 | 560 | 10.48 | | | |

*Christmas trees, pallets and block

Figures

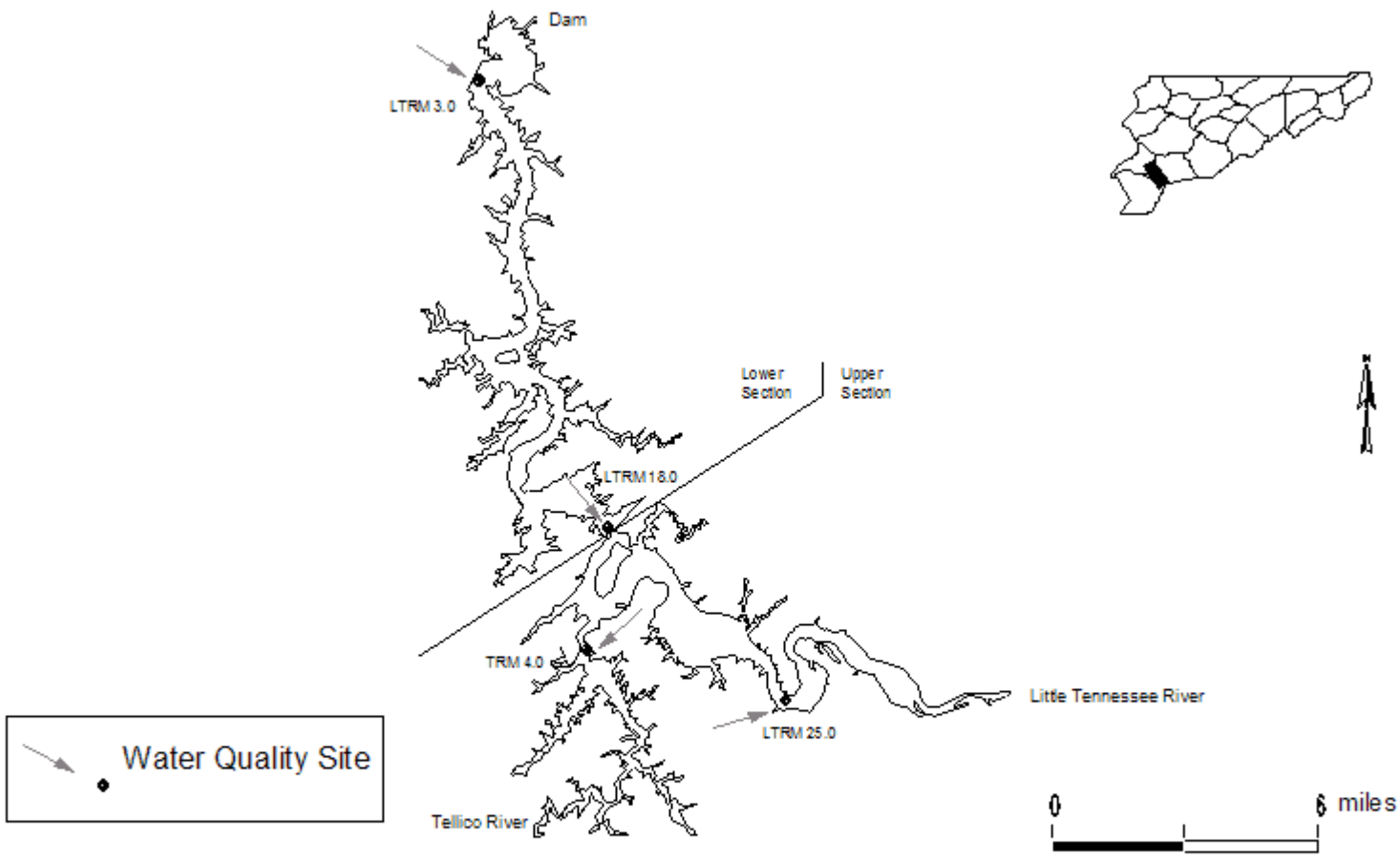



Figure 1. Water quality sites and upper and lower section boundaries of Tellico Reservoir in 2007.

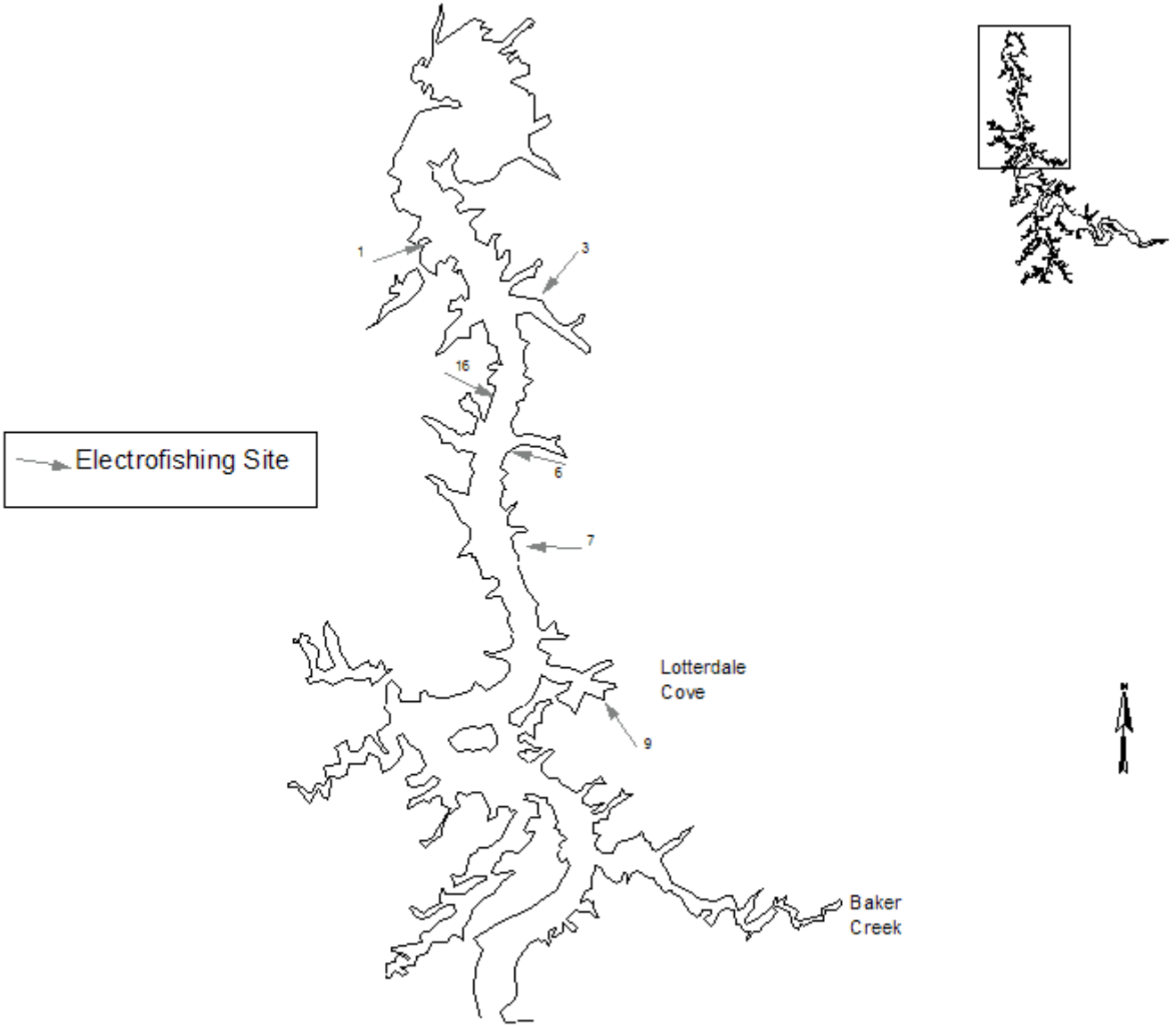



Figure 2. Electrofishing sites in the lower section of Tellico Reservoir in 2007.

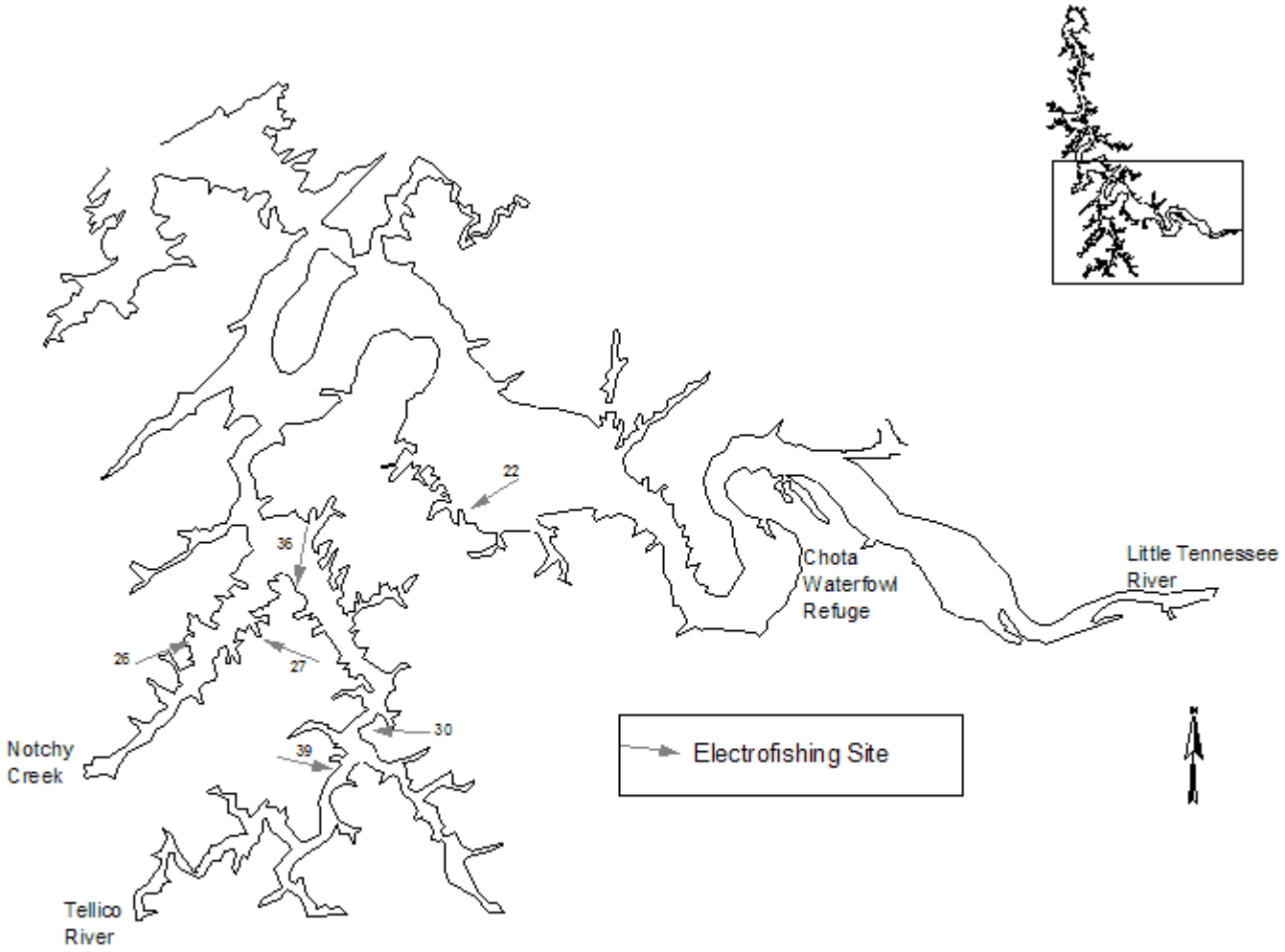



Figure 3. Electrofishing sites in the upper section of Tellico Reservoir in 2007.

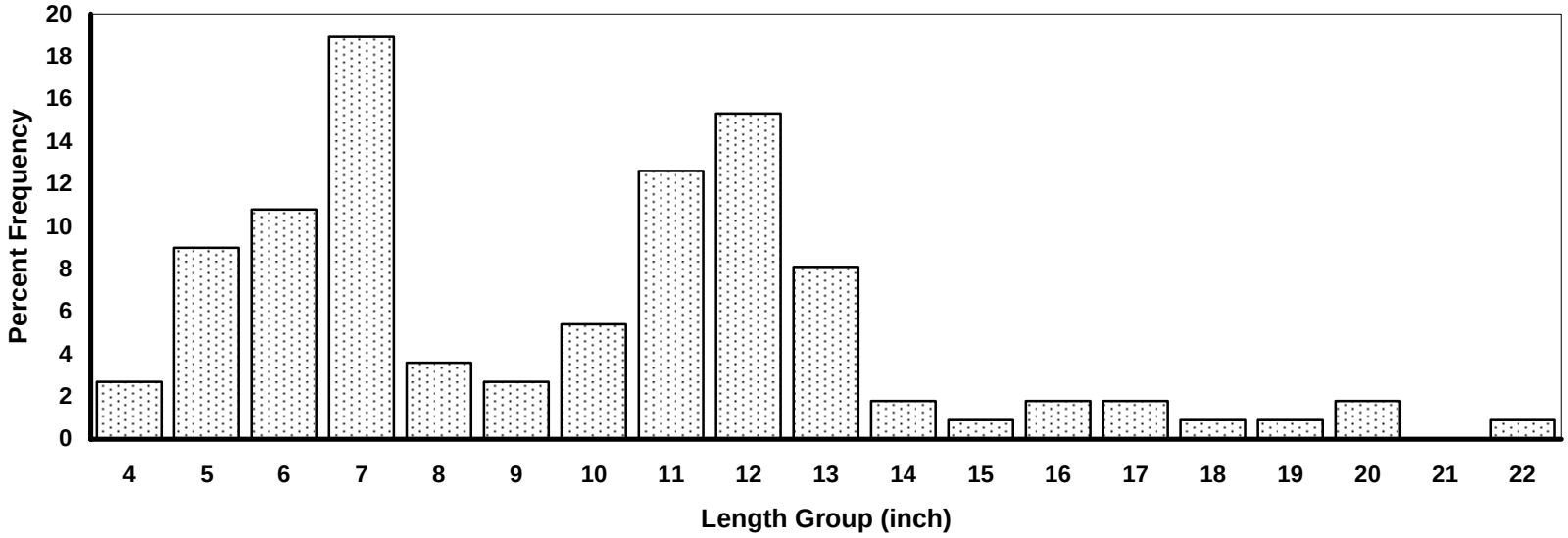



Figure 4. Tellico Reservoir largemouth bass length frequency by percent for the 2007 electrofishing sample (n=111).

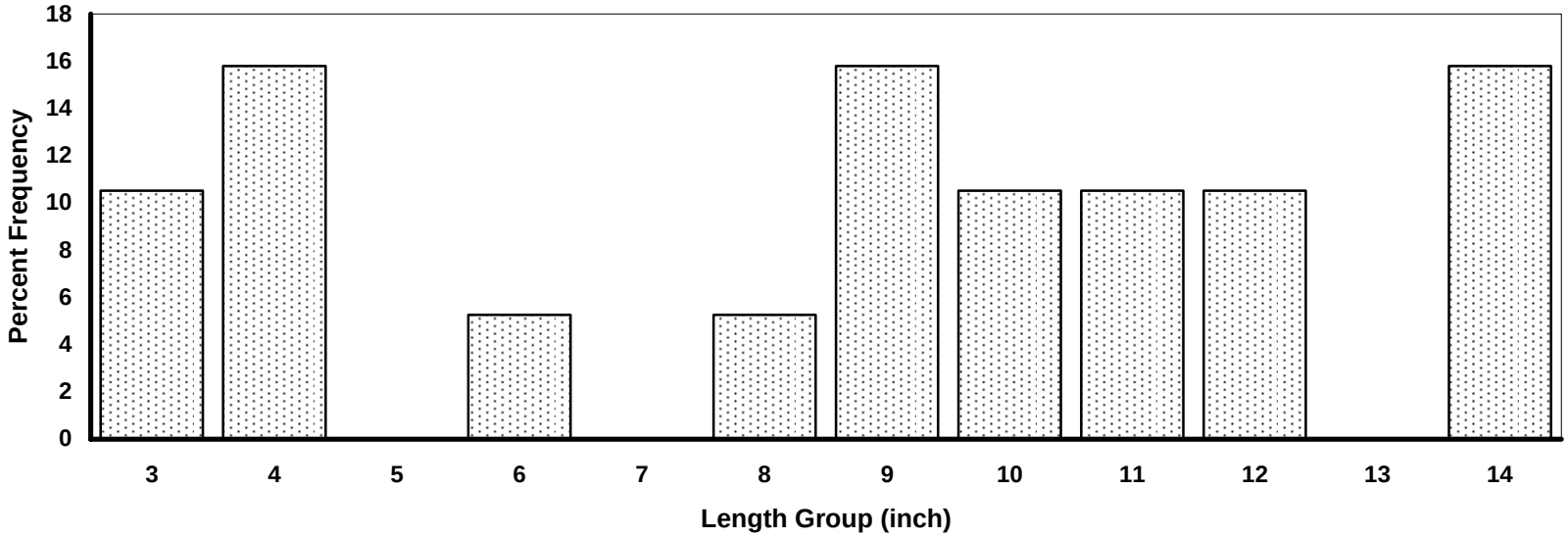



Figure 5. Tellico Reservoir smallmouth bass length frequency by percent for the 2007 electrofishing sample (n=19).

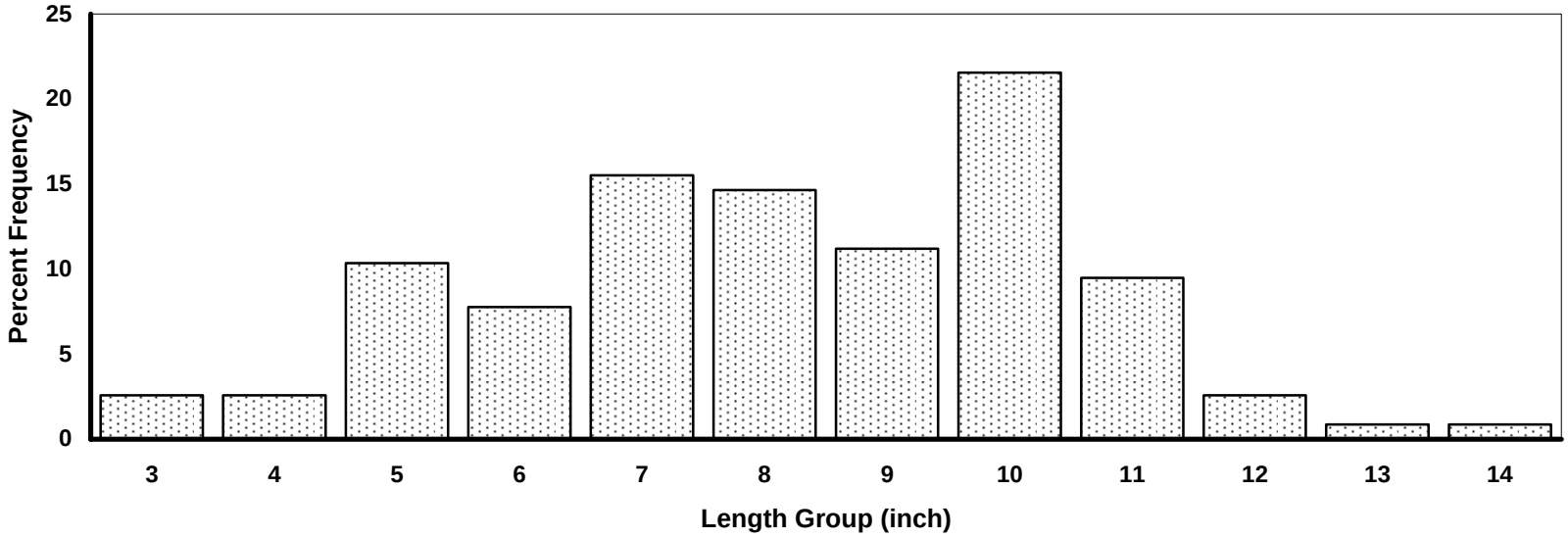



Figure 6. Tellico Reservoir spotted bass length frequency by percent for the 2007 electrofishing sample (n=116).

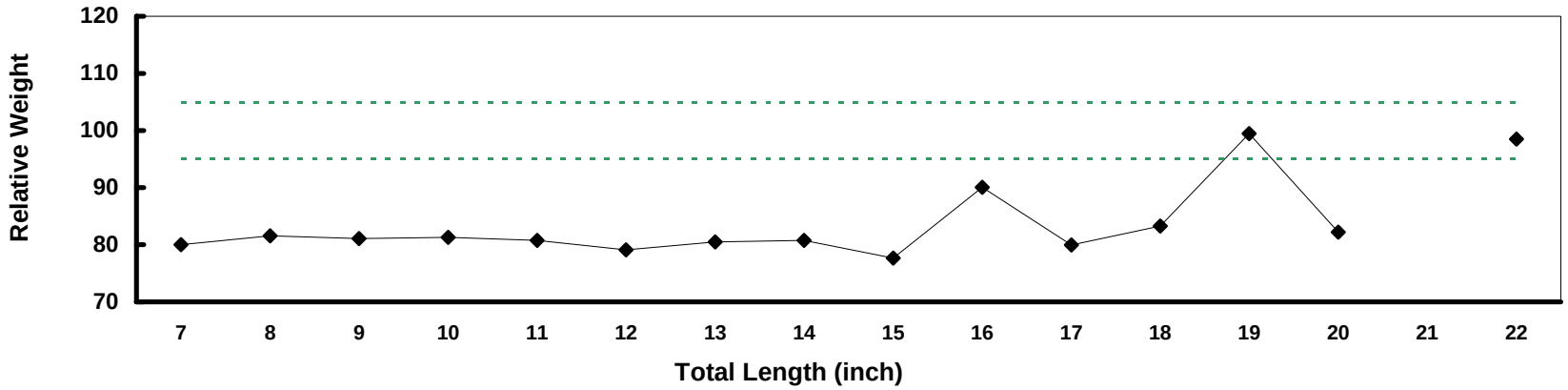



Figure 7. Tellico Reservoir largemouth bass mean relative weight values from the 2007 electrofishing sample (n=79).

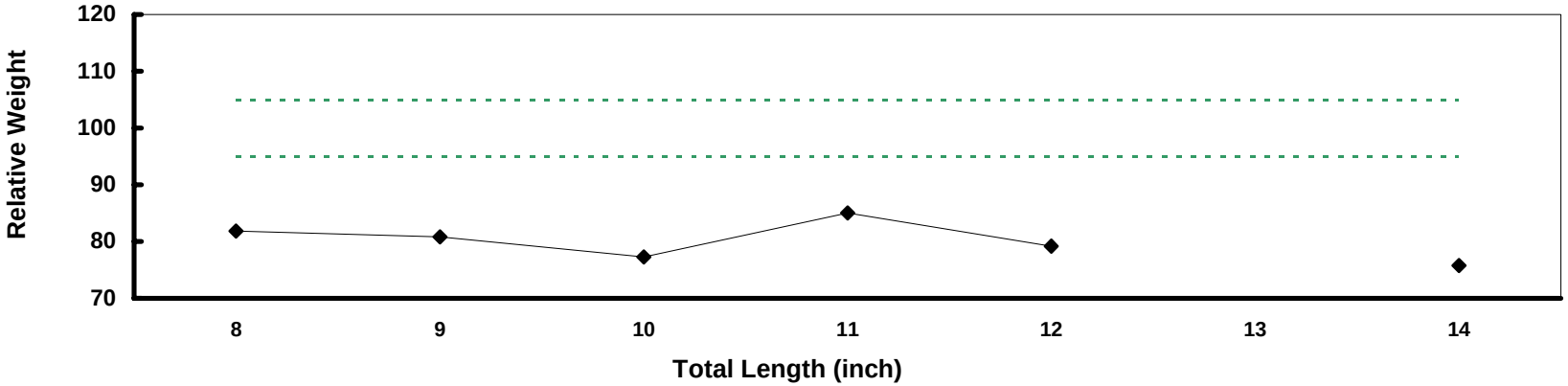



Figure 8. Tellico Reservoir smallmouth bass mean relative weight values from the 2007 electrofishing sample (n=13).

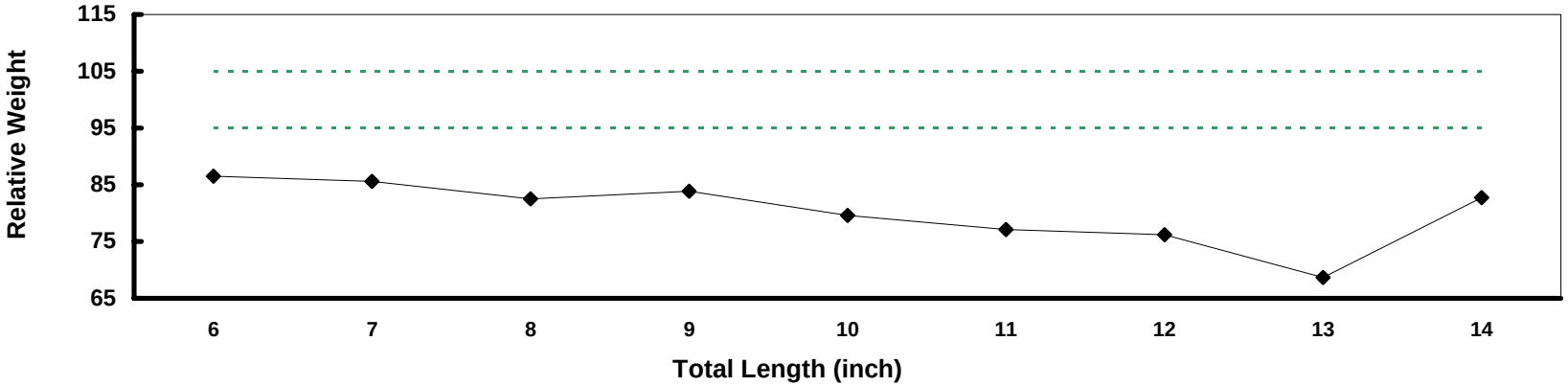



Figure 9. Tellico Reservoir spotted bass mean relative weight values from the 2007 electrofishing sample (n=90).

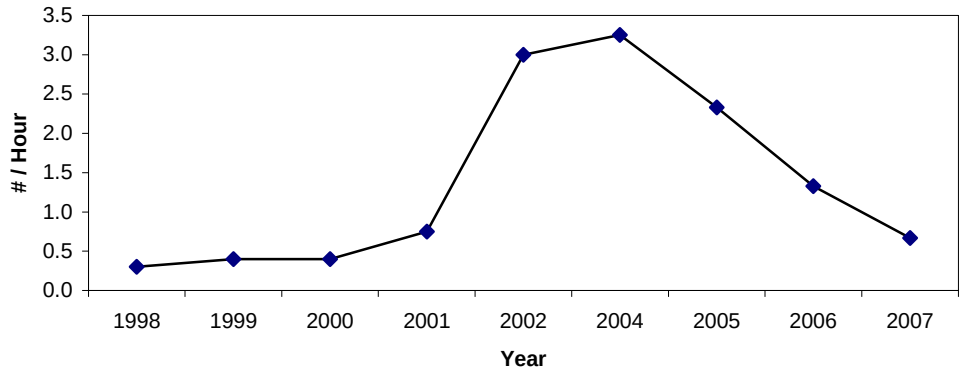



Figure 10. Tellico Reservoir black crappie electrofishing catch rates from 1998 to 2007.

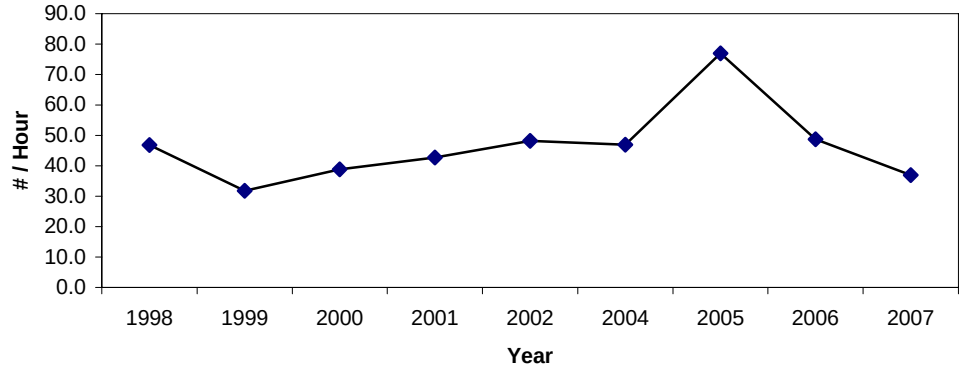



Figure 11. Tellico Reservoir largemouth bass electrofishing catch rates from 1998 to 2007.

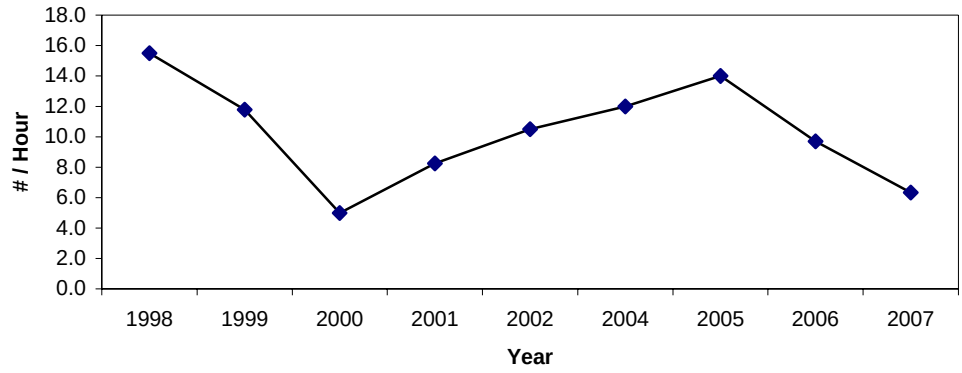



Figure 12. Tellico Reservoir smallmouth bass electrofishing catch rates from 1998 to 2007.

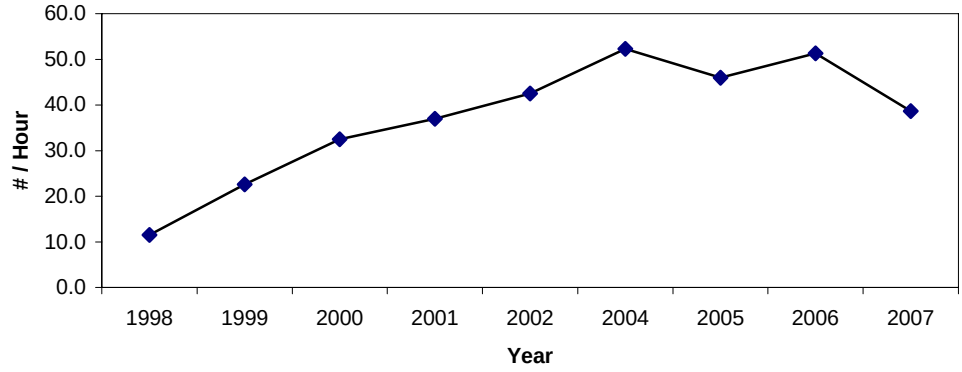



Figure 13. Tellico Reservoir spotted bass electrofishing catch rates from 1998 to 2007.

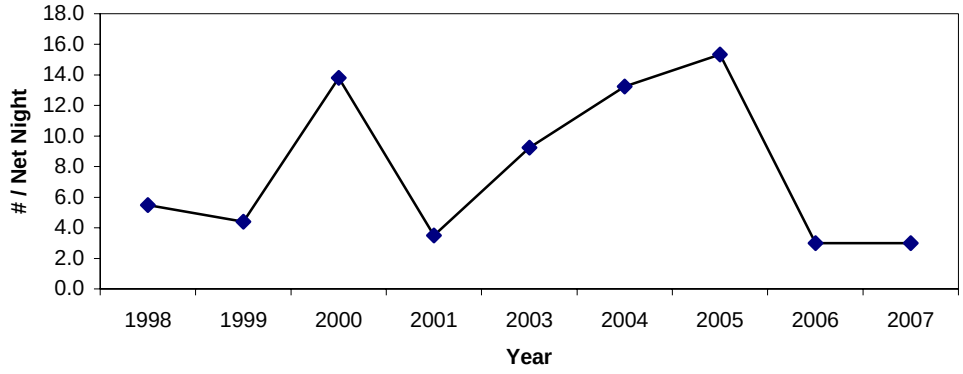



Figure 14. Tellico Reservoir white crappie electrofishing catch rates from 1998 to 2007.

**Figure 15. DO - Tellico - LT RM 03 - July 5, 2007**

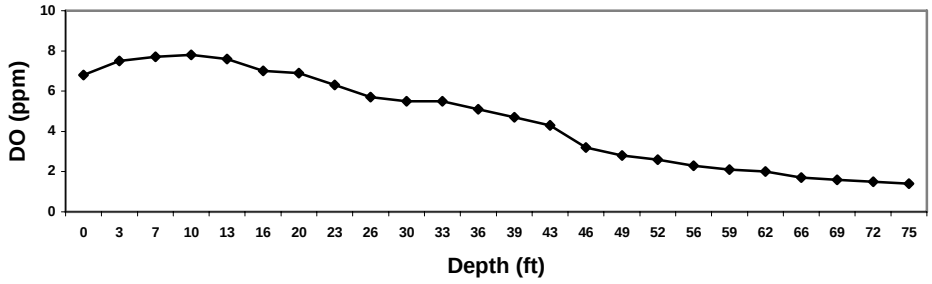



**Figure 16. Temp - Tellico - LT RM 03 - July 5, 2007**

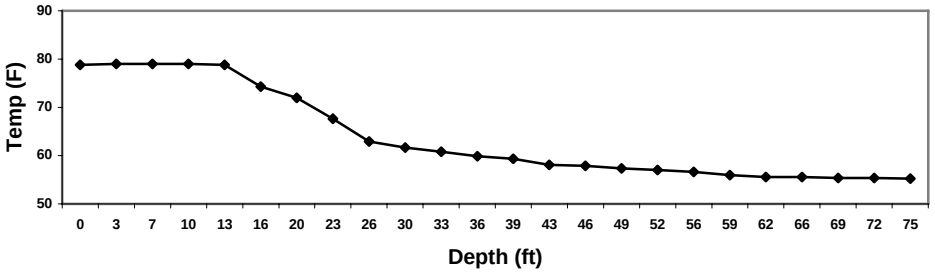



**Figure 17. DO - Tellico - LT RM 18 - July 5, 2007**

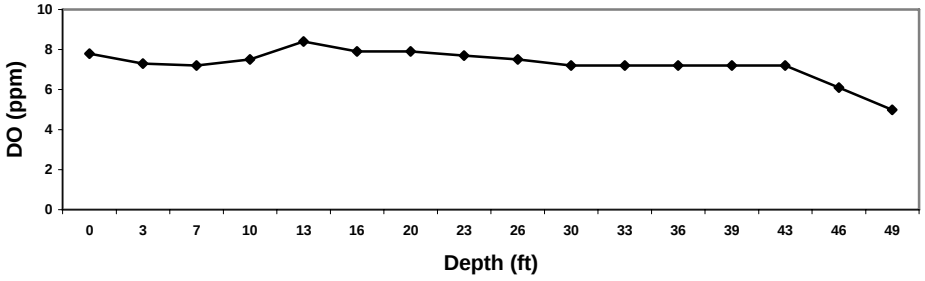



**Figure 18. Temp - Tellico - LT RM 18 - July 5, 2007**

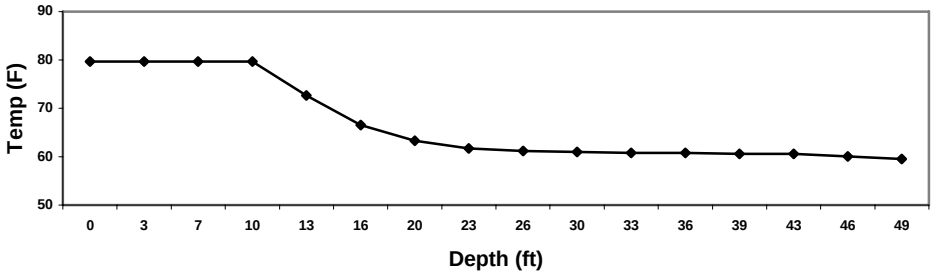


**Figure 19. DO - Tellico - Tellico RM 04 - July 5, 2007**

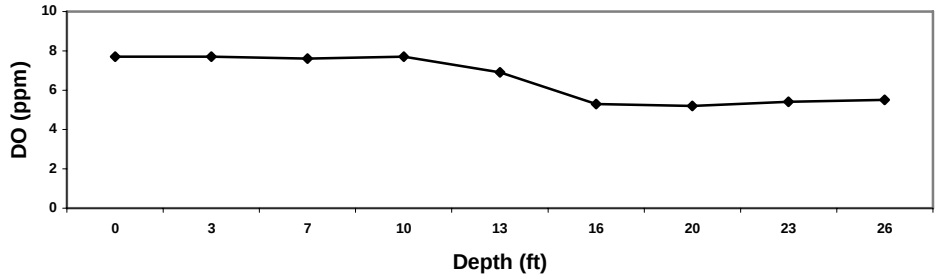



**Figure 20. Temp - Tellico - Tellico RM 04 - July 5, 2007**

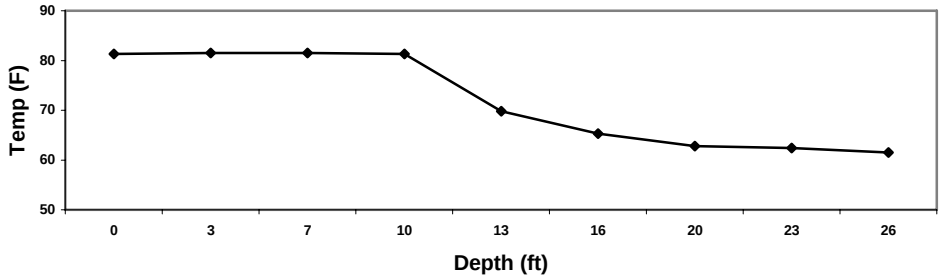



**Figure 21. DO - Tellico - LT RM 03 - August 6, 2007**

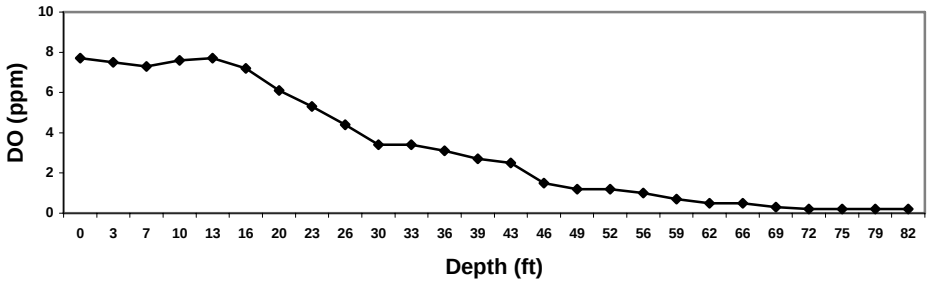



**Figure 22. Temp - Tellico - LT RM 03 - August 6, 2007**

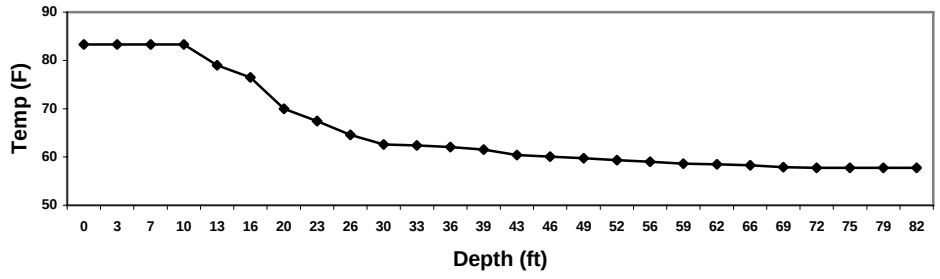


**Figure 23. DO - Tellico - LT RM 18 - August 6, 2007**

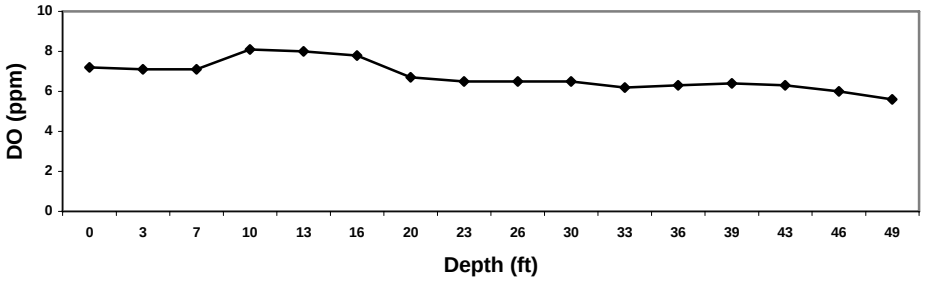



**Figure 24. Temp - Tellico - LT RM 18 - August 6, 2007**

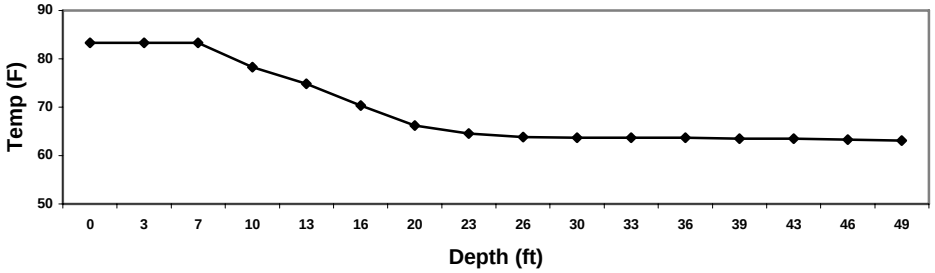



**Figure 25. DO - Tellico - Tellico RM 04 - August 6, 2007**

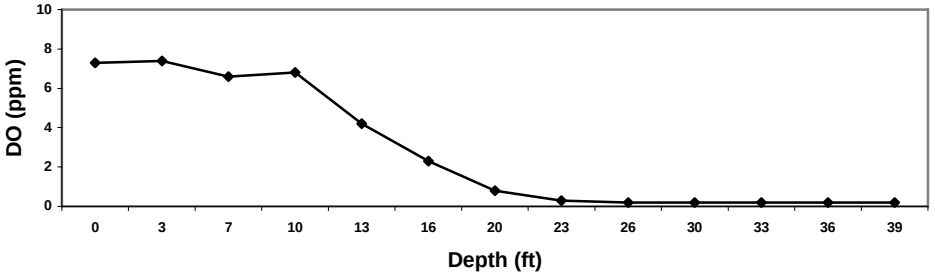
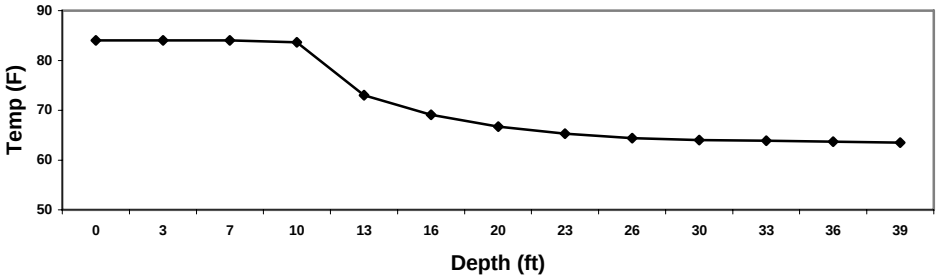



**Figure 26. Temp - Tellico - Tellico RM 04 - August 6, 2007**



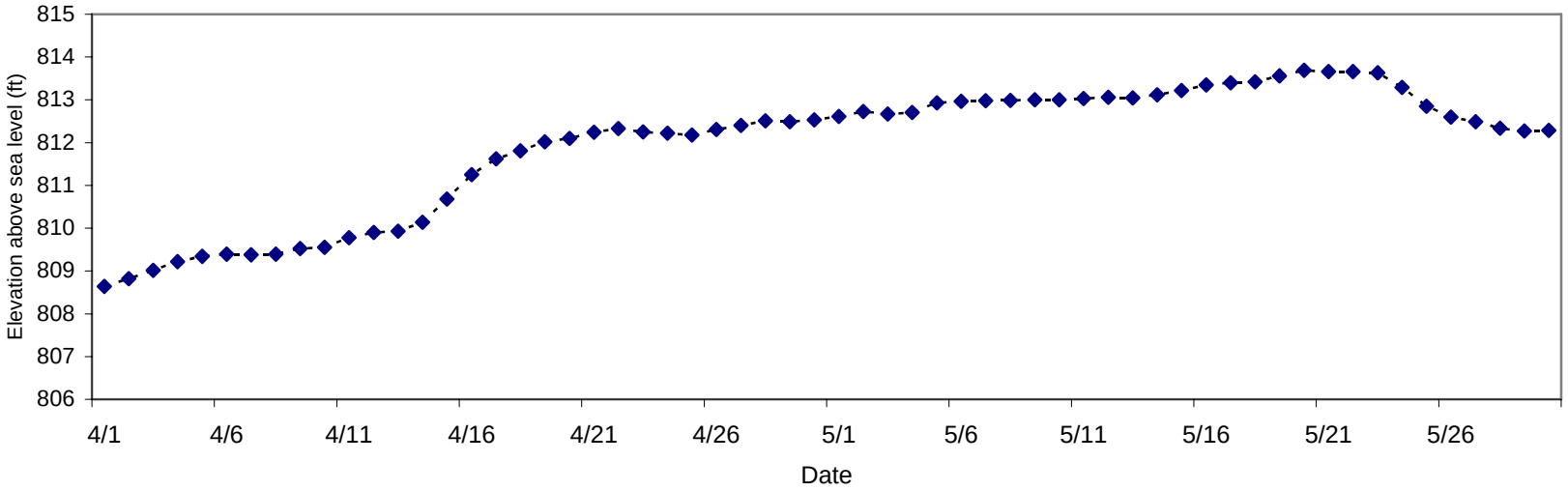



Figure 27. April and May water levels in Tellico Reservoir in 2007 (TVA data).

Appendix – Creel

## MONTHLY ANGLING EFFORT FOR ALL ANGLERS - 2007

**LAKE=TELLICO**

| MONTH | ANGLER HOURS | RELATIVE STANDARD ERROR | HOURS PER ACRE | ANGLER TRIPS | TRIPS PER ACRE | PERCENT EFFORT |
|---|---|---|---|---|---|---|
| 01 JANUARY | 2147 | 33.5 | 0.1 | 502 | 0.0 | 1.1 |
| 02 FEBRUARY | 3875 | 36.3 | 0.2 | 1049 | 0.1 | 2.0 |
| 03 MARCH | 14767 | 20.8 | 0.9 | 2690 | 0.2 | 7.8 |
| 04 APRIL | 25918 | 21.9 | 1.6 | 4940 | 0.3 | 13.6 |
| 05 MAY | 34296 | 17.8 | 2.1 | 6963 | 0.4 | 18.0 |
| 06 JUNE | 28493 | 31.0 | 1.8 | 6642 | 0.4 | 15.0 |
| 07 JULY | 26608 | 34.4 | 1.7 | 6999 | 0.4 | 14.0 |
| 08 AUGUST | 12122 | 16.3 | 0.8 | 2912 | 0.2 | 6.4 |
| 09 SEPTEMBER | 14267 | 8.3 | 0.9 | 2844 | 0.2 | 7.5 |
| 10 OCTOBER | 18667 | 20.3 | 1.2 | 4067 | 0.3 | 9.8 |
| 11 NOVEMBER | 9286 | 21.6 | 0.6 | 2501 | 0.2 | 4.9 |
| **TOTAL** | **190446** | | | **42109** | | |

## MONTHLY CATCH STATISTICS FOR ALL ANGLERS - 2007

**LAKE=TELLICO**

| MONTH | NUMBER FISH CAUGHT | RSE FOR CATCH | FISH CAUGHT PER HOUR | RSE FOR CATCH RATE | NUMBER FISH HARVESTED | RSE FOR HARVEST | FISH HARVESTED PER HOUR | RSE FOR HARVEST RATE |
|---|---|---|---|---|---|---|---|---|
| 01 JANUARY | 2469 | 49.5 | 1.15 | 34.6 | 601 | 48.6 | 0.28 | 33.0 |
| 02 FEBRUARY | 7053 | 58.0 | 1.82 | 42.6 | 1279 | 77.1 | 0.33 | 63.8 |
| 03 MARCH | 20378 | 30.3 | 1.38 | 21.5 | 5021 | 43.7 | 0.34 | 37.4 |
| 04 APRIL | 36804 | 27.2 | 1.42 | 15.8 | 7257 | 50.4 | 0.28 | 44.8 |
| 05 MAY | 48357 | 25.6 | 1.41 | 18.1 | 2401 | 47.2 | 0.07 | 44.1 |
| 06 JUNE | 29918 | 35.6 | 1.05 | 16.7 | 855 | 71.1 | 0.03 | 55.9 |
| 07 JULY | 30865 | 45.0 | 1.16 | 27.5 | 3193 | 68.0 | 0.12 | 53.3 |
| 08 AUGUST | 14668 | 42.3 | 1.21 | 38.4 | 4364 | 58.0 | 0.36 | 55.1 |
| 09 SEPTEMBER | 29390 | 20.7 | 2.06 | 18.9 | 4137 | 42.2 | 0.29 | 40.7 |
| 10 OCTOBER | 17360 | 30.8 | 0.93 | 22.8 | 1120 | 66.8 | 0.06 | 59.2 |
| 11 NOVEMBER | 14950 | 22.4 | 1.61 | 5.8 | 2786 | 51.1 | 0.30 | 45.1 |
| **TOTAL** | **252212** | | | | **33014** | | | |

## SUMMARY OF SPECIES CATCH STATISTICS - 2007

**LAKE=TELLICO**

| SPECIES | TOTAL NUMBER FISH CAUGHT | RSE FOR CATCH | SPECIES CATCH COMPOSITION (%) | INTENDED NUMBER CAUGHT | TOTAL NUMBER FISH HARVESTED | RSE FOR HARVEST | SPECIES HARVEST COMPOSITION (%) | INTENDED NUMBER HARVESTED | % OF CAUGHT FISH RELEASED | AVERAGE WEIGHT (LBS) | NUMBER FISH RECORDED |
|---|---|---|---|---|---|---|---|---|---|---|---|
| CARP | 650 | 435.6 | 0.3 | 650 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| WHITE BASS | 605 | 551.8 | 0.2 | 76 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| STRIPED BASS | 3866 | 159.0 | 1.5 | 2651 | 43 | 519.3 | 0.1 | 0 | 98.9 | 3.15 | 1 |
| ROCK BASS | 275 | 1087.9 | 0.1 | 0 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| BLUEGILL | 28924 | 33.5 | 11.5 | 24398 | 3798 | 58.7 | 11.5 | 3488 | 86.9 | 0.49 | 49 |
| SMALLMOUTH BASS | 10325 | 72.9 | 4.1 | 9864 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| SPOTTED BASS | 27631 | 31.5 | 11.0 | 25831 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| LARGEMOUTH BASS | 68592 | 16.4 | 27.2 | 65020 | 1250 | 47.5 | 3.8 | 1250 | 98.2 | 1.94 | 19 |
| WHITE CRAPPIE | 105553 | 12.8 | 41.9 | 104925 | 26804 | 19.3 | 81.2 | 26673 | 74.6 | 0.69 | 408 |
| BLACK CRAPPIE | 1164 | 177.1 | 0.5 | 1164 | 864 | 152.6 | 2.6 | 864 | 25.8 | 0.73 | 13 |
| YELLOW PERCH | 349 | 918.4 | 0.1 | 116 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |
| WALLEYE | 443 | 477.4 | 0.2 | 443 | 82 | 284.0 | 0.2 | 82 | 81.5 | 4.08 | 3 |
| FRESHWATER DRUM | 138 | 1536.2 | 0.1 | 0 | 0 | . | 0.0 | 0 | 100.0 | . | 0 |

**SUMMARY OF FISHING EFFORT AND CATCH RATES FOR INTENDED SPECIES GROUPS - 2007**

**LAKE=TELLICO**

| INTENDED SPECIES | ANGLER HOURS | RSE FOR ANGLER HOURS | ANGLER TRIPS | PERCENT EFFORT | NUMBER CAUGHT PER HOUR | RSE FOR CATCH PER HOUR | NUMBER HARVESTED PER HOUR | RSE FOR HARVEST PER HOUR | NUMBER OF INTERVIEWS |
|---|---|---|---|---|---|---|---|---|---|
| ANY CATFISH | 940 | 70.2 | 236 | 0.5 | 0.00 | | 0.00 | | 2 |
| ANY TROUT | 285 | 150.5 | 66 | 0.1 | 0.00 | | 0.00 | | 1 |
| STRIPED BASS | 983 | 77.2 | 242 | 0.5 | 0.23 | | 0.00 | | 2 |
| ANY SUNFISH | 1553 | 64.5 | 375 | 0.8 | 2.73 | | 0.63 | | 2 |
| ANY BLACK BASS | 80036 | 10.5 | 17509 | 42.0 | 1.15 | 17.1 | 0.02 | 92.4 | 243 |
| ANY CRAPPIE | 63333 | 9.5 | 13855 | 33.3 | 1.79 | 21.9 | 0.55 | 31.2 | 189 |
| WALLEYE | 2523 | 38.4 | 590 | 1.3 | 0.17 | 72.1 | 0.02 | 0.0 | 9 |
| ANY SPECIES | 40795 | 14.7 | 9239 | 21.4 | 1.20 | 24.8 | 0.16 | 107.1 | 83 |
| --- | --- | | --- | | | | | | |
| **TOTAL** | **190448** | | **42112** | | | | | | |

## SUMMARY OF RELATIVE SPECIES CATCH RATES WITHIN TARGET GROUPS - 2007

**LAKE=TELLICO**

| TARGET GROUP | SPECIES WITHIN TARGET GROUPS | RELATIVE CATCH RATE | RELATIVE HARVEST RATE |
|---|---|---|---|
| ANY CATFISH | | | |
| | ANY CATFISH | 0.00 | 0.00 |
| ANY TROUT | | | |
| ANY SUNFISH | | | |
| | BLUEGILL | 2.73 | 0.63 |
| ANY BLACK BASS | | | |
| | SMALLMOUTH BASS | 0.12 | 0.00 |
| | SPOTTED BASS | 0.32 | 0.00 |
| | LARGEMOUTH BASS | 0.81 | 0.02 |
| ANY CRAPPIE | | | |
| | WHITE CRAPPIE | 1.77 | 0.53 |
| | BLACK CRAPPIE | 0.02 | 0.02 |

**COMPARISON OF BLACK BASS CATCH RATES (# FISH/HOUR) BETWEEN TOURNAMENT AND NON-TOURNAMENT ANGLERS**
**(MONTHS ARE LISTED ONLY IF > 90% OF BLACK BASS ANGLERS RESPONDED TO THE QUESTION ON TOURNAMENT PARTICIPATION)**

**LAKE=TELLICO**

| MONTH | % BLACK BASS EFFORT BY TOURNAMENT ANGLERS | CATCH RATE FOR TOURNAMENT ANGLERS | # OF INTERVIEWS (TOURNAMENT) | CATCH RATE FOR NON-TOURNAMENT ANGLERS | # OF INTERVIEWS (NON-TOURNAMENT) |
|---|---|---|---|---|---|
| 01 JANUARY | 0 | | 0 | 0.30 | 7 |
| 02 FEBRUARY | 0 | | 0 | 0.24 | 5 |
| 03 MARCH | 19 | 1.82 | 6 | 1.48 | 22 |
| 04 APRIL | 30 | 1.38 | 7 | 1.26 | 28 |
| 05 MAY | 2 | 0.83 | 4 | 1.39 | 42 |
| 06 JUNE | 8 | 0.81 | 5 | 1.02 | 24 |
| 07 JULY | 6 | 1.05 | 3 | 1.08 | 27 |
| 08 AUGUST | 0 | | 0 | 0.92 | 11 |
| 09 SEPTEMBER | 0 | | 0 | 1.37 | 22 |
| 10 OCTOBER | 12 | 0.24 | 2 | 1.04 | 26 |
| 11 NOVEMBER | 0 | | 0 | 0.38 | 2 |

**SUMMARY OF TRIP EXPENDITURES AND CONSUMER SURPLUS**
**FOR INTENDED SPECIES - 2007**

**LAKE=TELLICO**

| INTENDED SPECIES | TOTAL TRIP EXPENDITURES | TOTAL CONSUMER SURPLUS | TOTAL VALUE BY ANGLERS | NUMBER OF INTERVIEWS |
|---|---|---|---|---|
| ANY CATFISH | 3210 | 1630 | 4840 | 2 |
| ANY TROUT | 660 | 1330 | 1990 | 1 |
| STRIPED BASS | 3890 | 3230 | 7120 | 2 |
| ANY SUNFISH | 3080 | 1870 | 4950 | 2 |
| ANY BLACK BASS | 389330 | 252340 | 641670 | 243 |
| ANY CRAPPIE | 182140 | 109950 | 292080 | 189 |
| WALLEYE | 13310 | 7790 | 21090 | 9 |
| ANY SPECIES | 84010 | 40740 | 124750 | 83 |
| **TOTAL** | **679630** | **418880** | **1098490** | **531** |

## SUMMARY OF SOCIOLOGICAL QUESTIONS - 2007

**LAKE=TELLICO**

**DISTRIBUTION OF STATES OF RESIDENCE OF INTERVIEWED ANGLERS**

| STATE | NUMBER ANGLERS INTERVIEWED | PERCENT CONTRIBUTION |
|---|---|---|
| TN | 924 | 97.7 |
| OTHERS | 22 | 2.3 |

**DISTRIBUTION OF COUNTIES OF RESIDENCE OF INTERVIEWED ANGLERS**

| COUNTY | NUMBER ANGLERS INTERVIEWED | PERCENT CONTRIBUTION |
|---|---|---|
| BLOUNT | 421 | 45.6 |
| KNOX | 71 | 7.7 |
| LOUDON | 155 | 16.8 |
| MONROE | 214 | 23.2 |
| OTHERS IN TN | 63 | 6.8 |

**DISTRIBUTION OF ONE-WAY MILEAGE OF ANGLERS INTERVIEWED**

| ONE-WAY MILES TRAVELED | NUMBER ANGLERS INTERVIEWED | PERCENT CONTRIBUTION |
|---|---|---|
| A) 0-25 | 849 | 89.7 |
| B) 26-100 | 76 | 8.0 |
| C) 101-250 | 4 | 0.4 |
| D) > 250 | 17 | 1.8 |

**DISTRIBUTION OF REASONS WHY INTERVIWED ANGLERS MADE THE TRIP**

| REASON FOR TRIP | NUMBER ANGLERS INTERVIEWED | PERCENT CONTRIBUTION |
|---|---|---|
| A) FISHING | 523 | 98.9 |
| B) VACATION | 6 | 1.1 |

**DISTRIBUTION OF NUMBER OF DAYS IN TRIPS OF INTERVIEWED ANGLERS**

| NUMBER DAYS IN TRIP | NUMBER ANGLERS INTERVIEWED | PERCENT CONTRIBUTION |
|---|---|---|
| A) 1 | 507 | 95.7 |
| B) 2-5 | 14 | 2.6 |
| C) 6-10 | 6 | 1.1 |
| D) 11-15 | 3 | 0.6 |