Activities and Concerns of the Bowfishing Association of America Related to Alligator Gar *Atractosteus spatula* Status and Management

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Bowfishing Association of America

- World’s largest bowfishing organization
- Established in 1990
- Members in US, Canada, and several other countries
- Tournaments are held throughout US and Canada
BAA Organization and Activities

1.) Tournaments
   - BAA sanctioned tournaments (participants qualify for points), 2 member teams or 2/3 member teams
   - Current trend – more tournaments with fewer teams
   - One official BAA tournament held per year – site rotates among local clubs

2.) Citations
   - lifetime achievement and trophy specimens
BAA Organization and Activities

3.) Other

- Kid’s Bowfishing Day

- Seminars

- Tournament Insurance

- Conservation Fund

- Education - ethical and responsible resource use
Online Survey of Bowfishers

-Survey posted (29 July - 15 Dec 2004; 150 days) on a BAA linked webpage

-Demographic data, preferred species, trip characteristics, and opinion of stocking alligator gar were recorded for all participants

-Harvest patterns, trip characteristics, and opinions of various management scenarios were recorded for participants that primarily target alligator gar
Online Survey Participant Characteristics

• Total of 94 online survey participants
• Average age approximately 34 years
  (range = 17 to 62 years)
• 93 males and 1 female
• 60 are BAA members, 34 are not
• 5 are bowfishing guides, 89 are not
• 34 primarily target alligator gar, 60 do not
  – Although, alligator gar is preferred target of 38 participants
### Preferred Target Species - % of Participants (N = 94)

<table>
<thead>
<tr>
<th>Species</th>
<th>First</th>
<th>Second</th>
<th>Third</th>
</tr>
</thead>
<tbody>
<tr>
<td>Carp</td>
<td>39</td>
<td>27</td>
<td>22</td>
</tr>
<tr>
<td>Gar</td>
<td>38</td>
<td>33</td>
<td>26</td>
</tr>
<tr>
<td>Buffalo</td>
<td>8</td>
<td>31</td>
<td>28</td>
</tr>
<tr>
<td>Catfish</td>
<td>3</td>
<td>0</td>
<td>6</td>
</tr>
<tr>
<td>Tilapia</td>
<td>2</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Bowfin</td>
<td>1</td>
<td>1</td>
<td>3</td>
</tr>
<tr>
<td>Flounder</td>
<td>1</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>

Other Targets Listed: Redfish, Shark, Freshwater drum, Goldfish, Mullet, Paddlefish, Ray, Sucker
Opinion of Stocking Alligator Gar in Historical Range (N = 94)

- **Strongly Agree**: 68
- **Agree**: 21
- **No Opinion**: 4
- **Disagree**: 1
- **Strongly Disagree**: 0
Greatest # of Alligator Gar Harvested in a Single Trip (N = 38)
# of Alligator Gar Trips (Last 12 Months; N = 40)

<table>
<thead>
<tr>
<th>Number of Trips</th>
<th>Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>1-5</td>
<td>24</td>
</tr>
<tr>
<td>6-10</td>
<td>3</td>
</tr>
<tr>
<td>11-15</td>
<td>1</td>
</tr>
<tr>
<td>16-20</td>
<td>4</td>
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<tr>
<td>21-25</td>
<td>1</td>
</tr>
<tr>
<td>26-30</td>
<td>3</td>
</tr>
<tr>
<td>&gt;30</td>
<td>1</td>
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</tbody>
</table>

Number of Alligator Gar Trips (Last 12 Months; N = 40)
# of Alligator Gar Harvested in Last 12 Months (N = 40)
# of Alligator Gar Harvested in the Last Twelve Months

Minimum Estimates

- 6
- 185
- 90
- 2
- 3

Minimum Estimates
Season of Most Alligator Gar Trips (N = 39)

Frequency

Spring: 6
Summer: 31
Fall: 2
Winter: 0
Home States of Participants – Target Alligator Gar (N = 39)
# of Trips Targeting Alligator Gar (during lifetime, home state included)

* Home state of participants that target alligator gar

2 – Mexico

* Canada
Average $ Amount per Person Spent per Trip (N = 38)

Error Bars = 95% confidence limits about the mean. Mean values are significantly different ($p = 0.004$).
3.2
2.0
0
1
2
3
4

Do Not Target Alligator Gar
Target Alligator Gar

Error Bars = 95% confidence limits about the mean. Means values are significantly different ($p = 0.001$).
Opinion of Alligator Gar Creel Limits (N=34)

<table>
<thead>
<tr>
<th>Opinion</th>
<th>Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly Agree</td>
<td>14</td>
</tr>
<tr>
<td>Agree</td>
<td>8</td>
</tr>
<tr>
<td>No Opinion</td>
<td>3</td>
</tr>
<tr>
<td>Disagree</td>
<td>4</td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>5</td>
</tr>
</tbody>
</table>
Opinion of Minimum Length Limits (N = 34)

- Strongly Agree: 7
- Agree: 5
- No Opinion: 9
- Disagree: 8
- Strongly Disagree: 5
Preferred Creel Limit Size (N = 34)

Frequency

<table>
<thead>
<tr>
<th>Size</th>
<th>Frequency</th>
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</thead>
<tbody>
<tr>
<td>1</td>
<td>7</td>
</tr>
<tr>
<td>2</td>
<td>15</td>
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<tr>
<td>3</td>
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<tr>
<td>4</td>
<td>2</td>
</tr>
<tr>
<td>5</td>
<td>1</td>
</tr>
<tr>
<td>&gt; 5</td>
<td>1</td>
</tr>
<tr>
<td>No Limit</td>
<td>8</td>
</tr>
</tbody>
</table>
Opinion of No Harvest During Spawning Season (Apr – Jun; N = 34)

Frequency

- Strongly Agree: 3
- Agree: 2
- No Opinion: 4
- Disagree: 8
- Strongly Disagree: 17
Opinion of State Issued Harvest Tag

Frequency

<table>
<thead>
<tr>
<th></th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>No Opinion</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly Agree</td>
<td>3</td>
<td>6</td>
<td>4</td>
<td>8</td>
<td>13</td>
</tr>
<tr>
<td>Agree</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>No Opinion</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Disagree</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Preferred Cost of State Issued Harvest Tag (N = 34)

- No Fee: 19
- $1-5: 5
- $6-10: 5
- $11-15: 2
- $16-30: 1
- >$30: 2
BAA Conservation Fund