



Northeast Texans Attitudes Towards and Acceptance of Black Bears: Research and Application for Wildlife Managers

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The Piney Woods and Big Thicket



Black Bear in East Texas

- History

- Oil and Timber booms and busts
- Hunting for food and sport
- Loss of habitat
- Aggressive hunting



- Current

- Ongoing discussion on TPWD reintroduction
- Suitability index identifies 4 areas
- Documented sightings in Big Thicket and north East Texas – 24 since 1977

- Future

- Natural progression as the Louisiana Black Bear migrates from Arkansas, Oklahoma, and Louisiana

Purpose of the Study

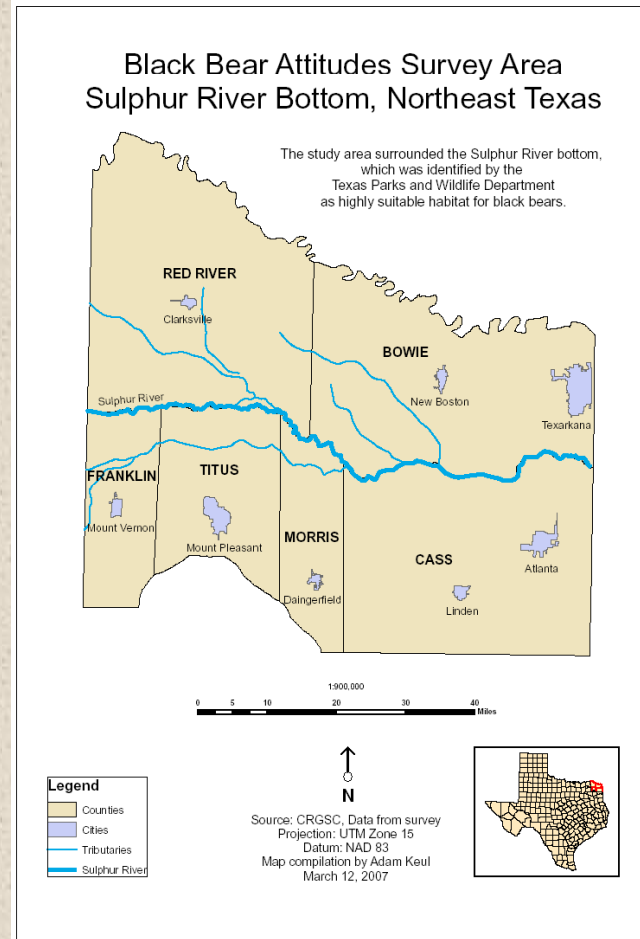
The study was designed to answer:

- How do the residents of north East Texas feel about having black bears in their area?
- Are they knowledgeable about black bears?
- Do they want bears to return?
- How do they want TPWD to manage?

Study Area

Counties

- Red River
- Franklin
- Titus
- Morris
- Bowie
- Cass



TPWD's Studies: Marzillo's Study in 2004

- 3000
- Neches River Corridor
- South East Texas
- Dillman Method
- 40% response rate
- More urban

North East Texas 2006

At the request of TPWD:

- 2000
- Sulphur River Corridor
- North East Texas - Six counties
- Survey questions followed Marzillo's
- Dillman Method
- 21% response rate (420)

Question Areas

- About Wildlife in General
- About Black Bears
- About the Respondent

Respondent Demographics

- 68% male - 32% female
- Average age = 58
- 71% were “raised rural”
- About 2/3 had *more* than a high school education
- 87% White/Caucasian
- 56% earned more than \$40,000 in 2005
- About 2/3 had family roots in East Texas for at least 3 generations
- More than 50% had lived in East Texas for 40 years or more

Knowledge and Bear Opinion Summated Rating Index

- 1. Knowledge** - the level of the respondents knowledge about black bears –
 - Designed to provide a knowledge score based on respondents answers to six questions
- 2. Bear opinions** - the level of respondents affinity towards black bears –
 - Designed to provide a score based on respondents answers to nine bear-related opinion questions

Knowledge Assessment Question

7. Prior to receiving this survey, **were you aware** that (Check one response for **each** line.):

a. Until the early 1900's East Texas contained a large population of black bears.

No

Yes

b. The number of black bear sightings in East Texas has increased during the past decade.

No

Yes

c. Black bear populations are increasing in size in Arkansas, Louisiana, and Oklahoma.

No

Yes

d. Black bears in East Texas are protected by both federal and state legislation.

No

Yes

e. Black bears exist throughout most of the United States and North America.

No

Yes

f. Black Bears are mainly vegetarians.

No

Yes

Analysis of Knowledge

- Score of 5-6 if all questions were answered correctly.
- **Average score of all respondents was 3.34.**
- Only one demographic factor influenced knowledge level - hunter.
- Geographic variety did exist within the sample.
- In general, respondents who lived in higher populated areas were more knowledgeable.

Bear Opinion Assessment Question - Likert Scale

- The presence of black bears is a sign of a healthy environment.
- Black bears in East Texas would increase my quality of life.
- Black bears near my home would increase my quality of life.
- Black bears have the right to exist wherever they may occur.
- I would feel personally at risk if black bears exist in East Texas.
- I am afraid of black bears.
- Black bears commonly harm humans.
- The black bear population in East Texas should be increased.
- The black bear population in East Texas should be increased only if steps are taken to lessen the chances of human-bear conflicts.
- The black bear population in East Texas should remain the same.
- Black bears should not exist in East Texas.

1= Strongly disagree

2= Disagree

3= Neutral

4= Agree

5= Strongly Agree



Analysis of Bear Opinions

SRI Range 12 -60 Median 45

Factors that influenced opinions

- Age - negative influence
- Income level - positive influence
- Formal education level - positive influence
- Sex - men more positive
- County - Titus and Morris showed highest levels of approval

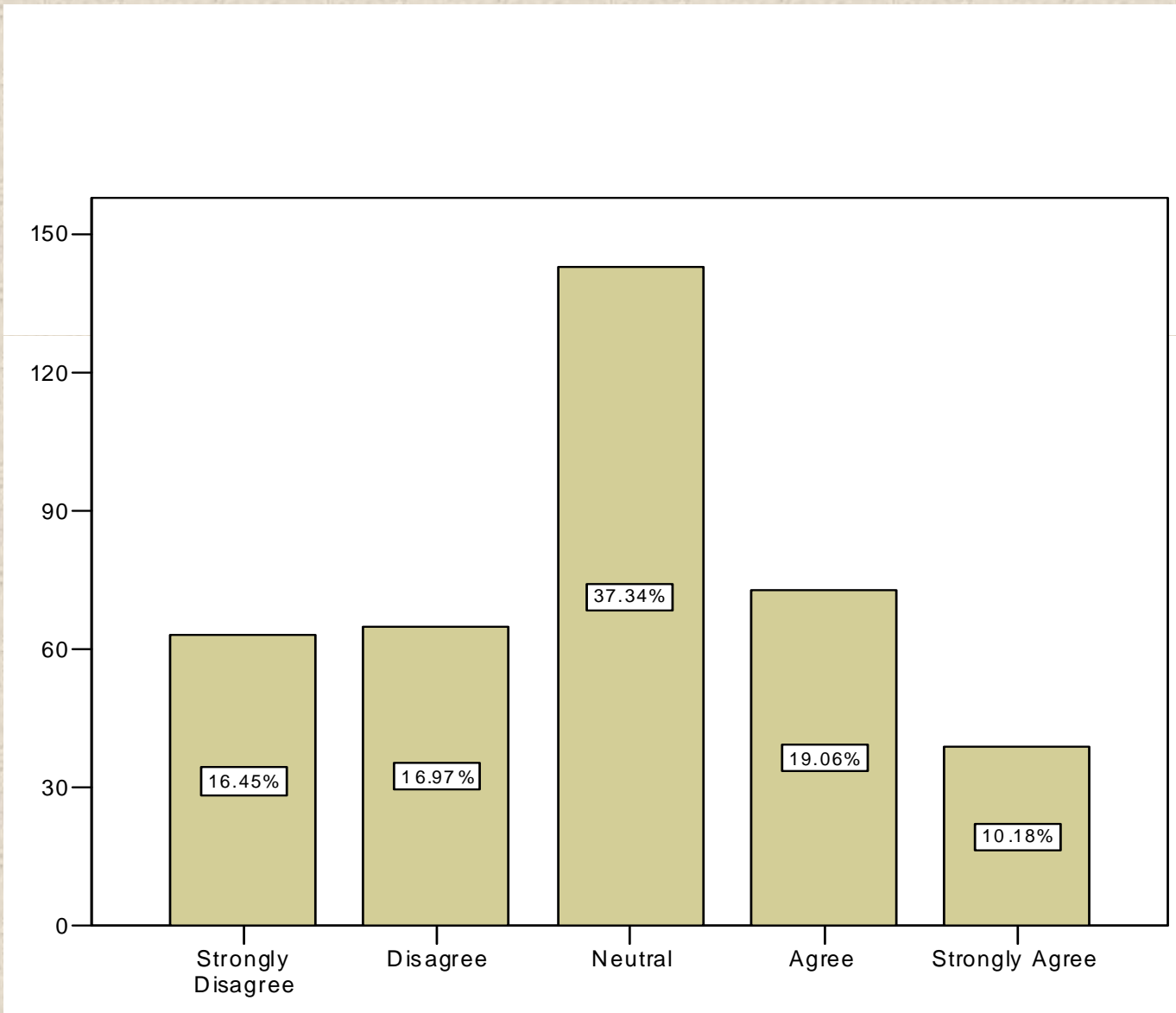
Factors that did not influence opinions

- Knowledge level
- Rural vs. Urban upbringing
- Race
- Pet ownership
- Hunting

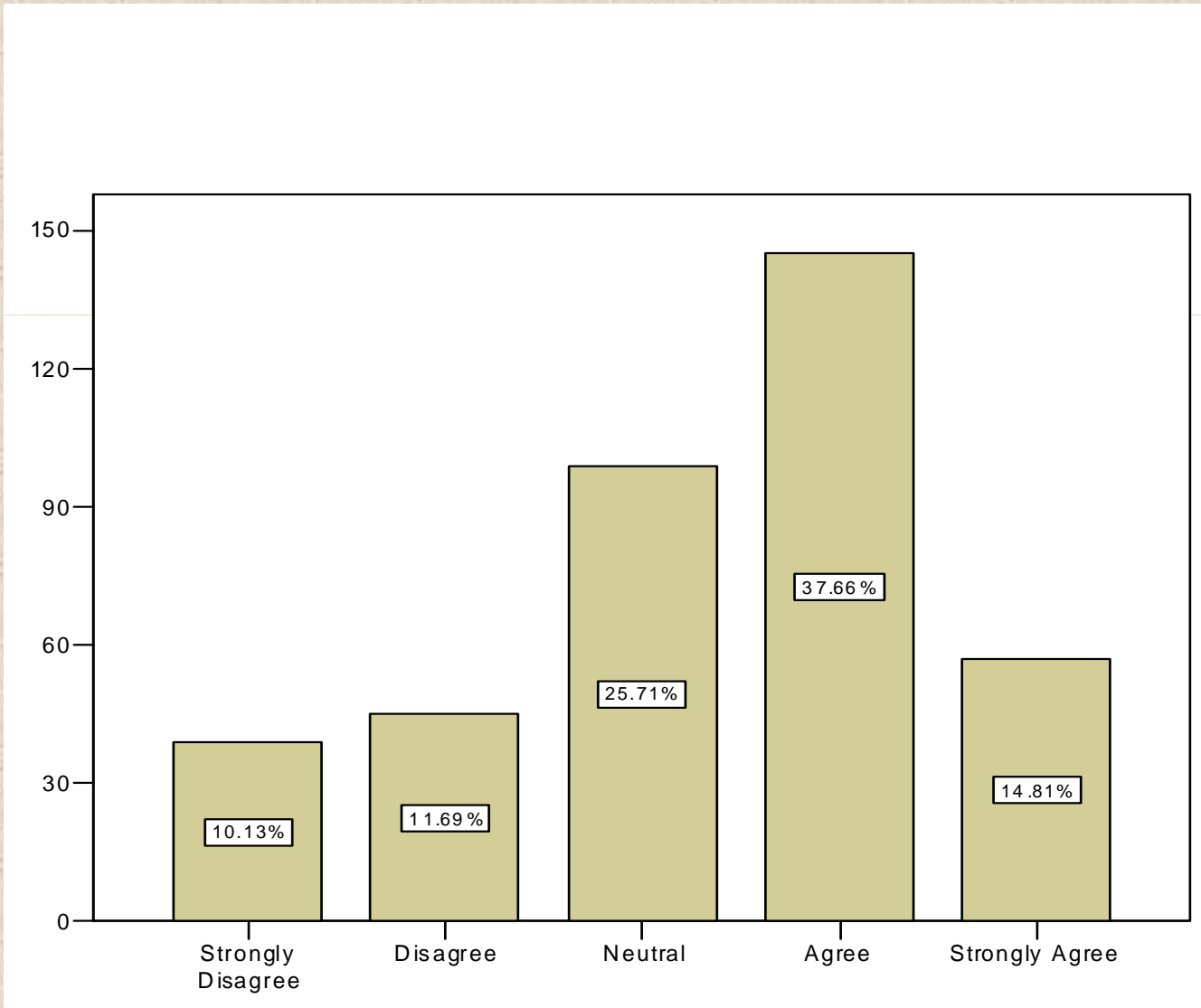
Different Opinions About Black Bears

Strongly Disagree – Strongly Agree

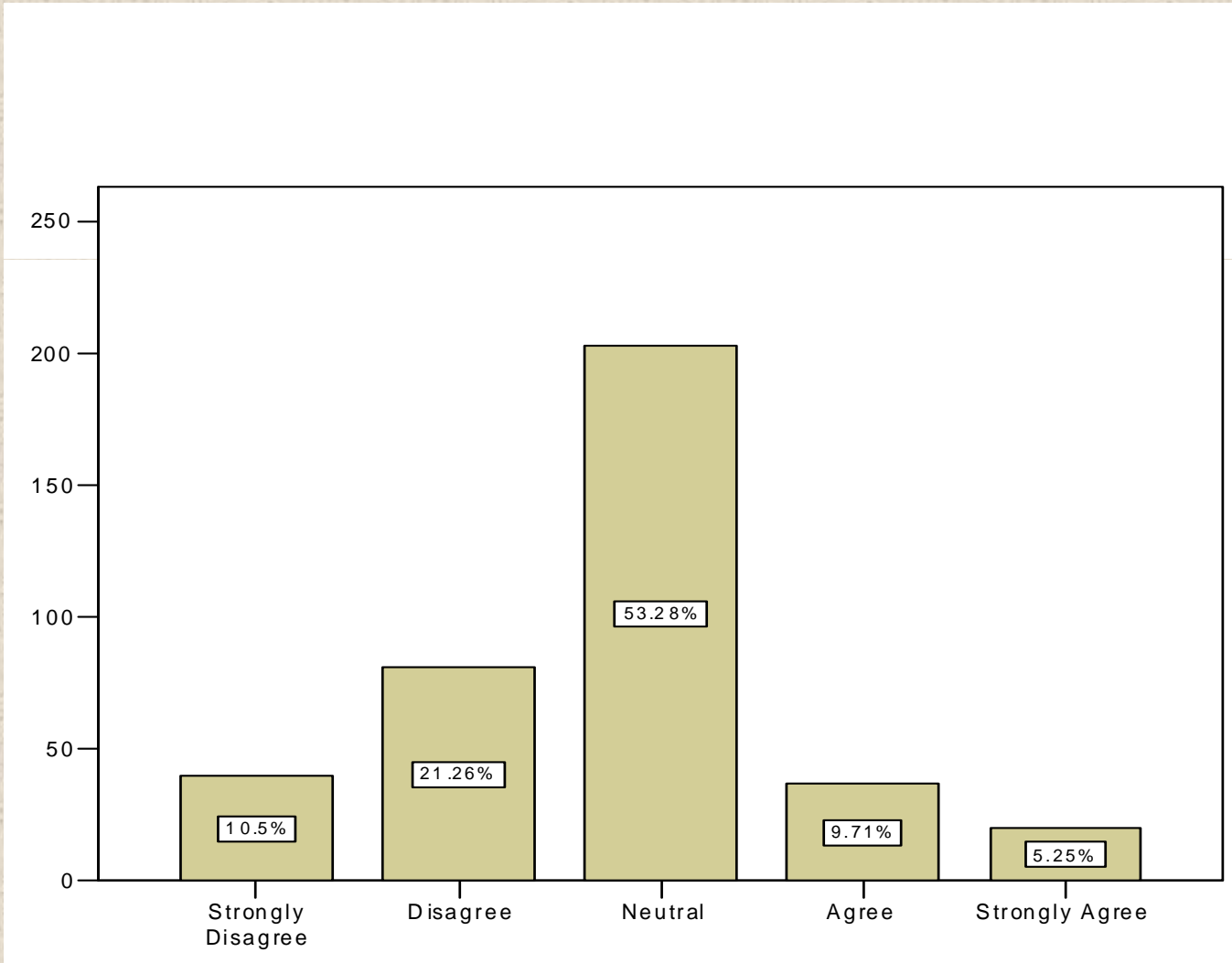
Bear Population Should be Increased



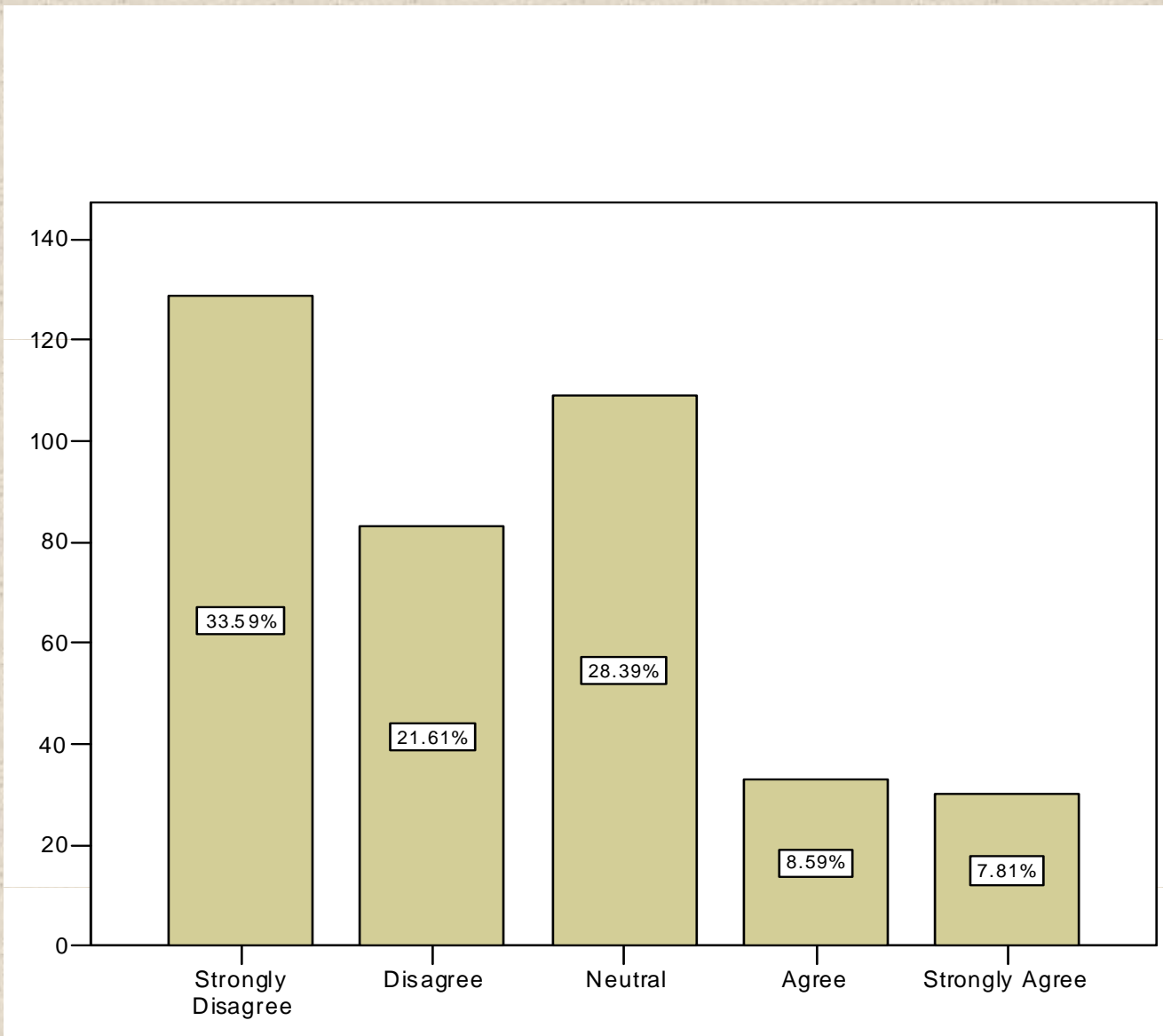
Bear Population Should be Increased Only if Steps are Taken to Lessen Chances of Conflict



The Black Bear Population Should Remain the Same



Black Bears Should Not Exist in East Texas



The REAL Questions - Pro or Con

- Over half of the respondents were pro-bear – 54%.
 - 24% would enjoy having bears around and would not worry about problems.
 - 30% would enjoy having bears but would worry.
- Less than half of the respondents did not want bear in their vicinity – 35%.
 - 4% would not enjoy them, but would not worry about problems.
 - 31% would not enjoy them and would worry.
- No particular feelings about black bears or concerns – 11%.

Do you consider black bears a danger to humans?

- No – 64%
- Yes – 36%

Do you think black bear populations in East Texas should increase naturally?

- No – 35%
- Yes – 65%

Do you think that natural resource agencies should assist in increasing the black bear population in East Texas?

- No – 65%
- Yes – 35%

Would you support the restocking of black bears into suitable habitats in North East Texas by natural resource agencies?

- No – 48.5%
- Yes – 51.5%

Handwritten Comments

Respondents were asked whether or not they believed bears were dangerous to humans.

Common **negative** response:

“They are wild and will protect their young aggressively”

Common **positive** response:

“I believe they are as frightened of us as we are of them.”

Respondents were asked whether TPWD should assist in restocking bears.

Most common response (negative):

“Let nature take its course”

Common **positive** response:

“Speed up the process, educate the public, hopefully get huntable numbers someday. “

Responses for final “comments” ...

“I am sorry but having small animals and young children- black bears would be a problem.”

“I know nothing about black bear but would not want them in my backyard.”

“I would like the opportunity to hunt for black bear.”

“I love to hunt and fish! I saw signs of bear in our peanut fields when I was young. I would love to see it again before I die. “

“We need all the attractions for East Texas to draw more tourists to help build our economy.”

Other interesting responses...

“I don’t like surveys.”

“I don’t understand how someone’s income should have anything to do with a black bear survey.”

“Just seeing a bear in my presence could cause heart failure. “

“I enjoyed this survey please feel free to send another anytime.”

Management Implications

- Understanding of the history and culture helps management relate to affected population.
- Understanding the concerns (fears?).
- I and E – information and education.
- Black Bear Task Force of East Texas
- Biding time is the best option.
- Inclusion of public opinion and involvement has softened SOME of the resistance.

Future Research

- Marketing Segmentation Analysis
- Focus Groups in identified “Hot Spots”
- Inventory of I and E in Adjacent States and Texas
- Multi-tiered/multi-state Look at the Public Living within Occupied and Potential Range
- Interviews of Those with Encounters
- I and E Plan

