

International Disaster and Risk Conference

**Risk Perception of Disasters in Rural
Hospitals:
Does it Make a Difference in
Emergency Preparedness?**

Barbara Cliff, PhD

President / CEO

Cheboygan Memorial Hospital

Cheboygan, Michigan, United States

August 26, 2008

Outline

- **Introduction**
- **Methods**
- **Results**
- **Conclusions**

Introduction

Objective

**Examine disaster preparedness in
rural hospitals in the U.S.**

and

to explore

the relationship between

risk perception and preparedness

Methods

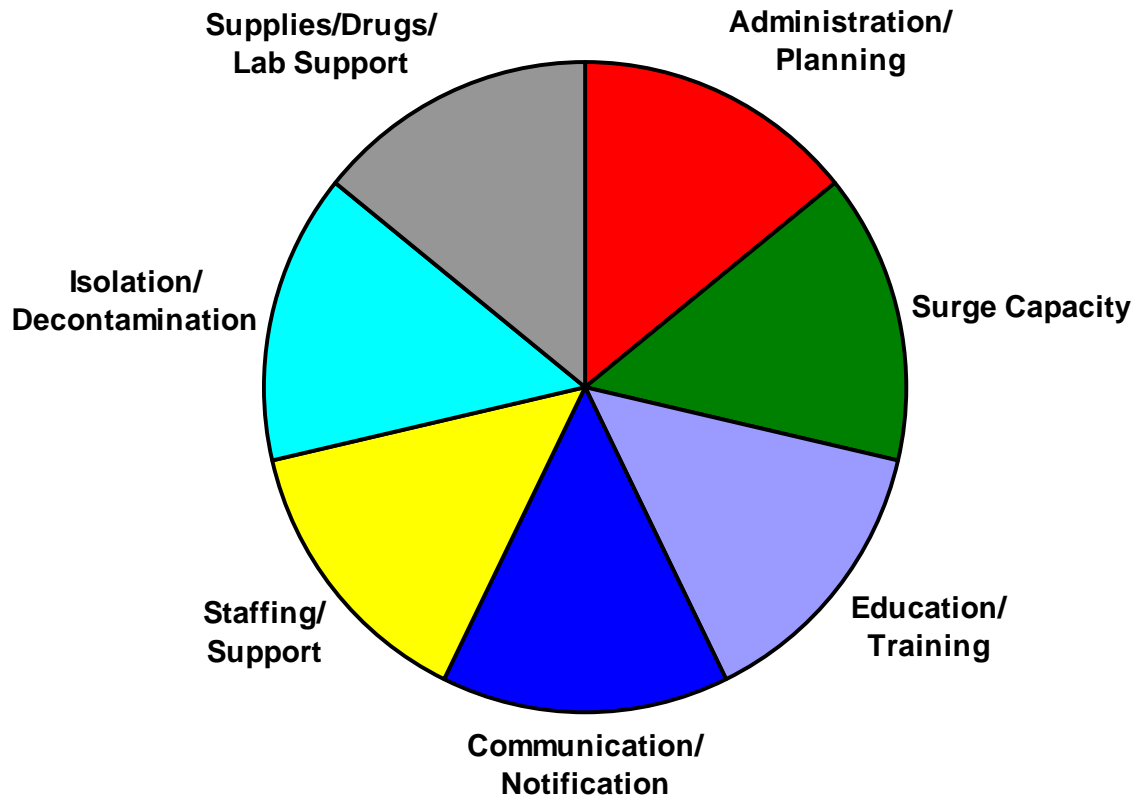
Study

- **Secondary analysis of survey data from Preparedness Module of the National Study of Rural Hospitals (2006-2007)**
- **Nonexperimental, cross-sectional research design**
- **Mail survey and follow up interviews of rural hospital CEOs**
- **134 respondents of 403 (33%)**
- **Binary logistic regression**

Independent Variable: Risk Perception

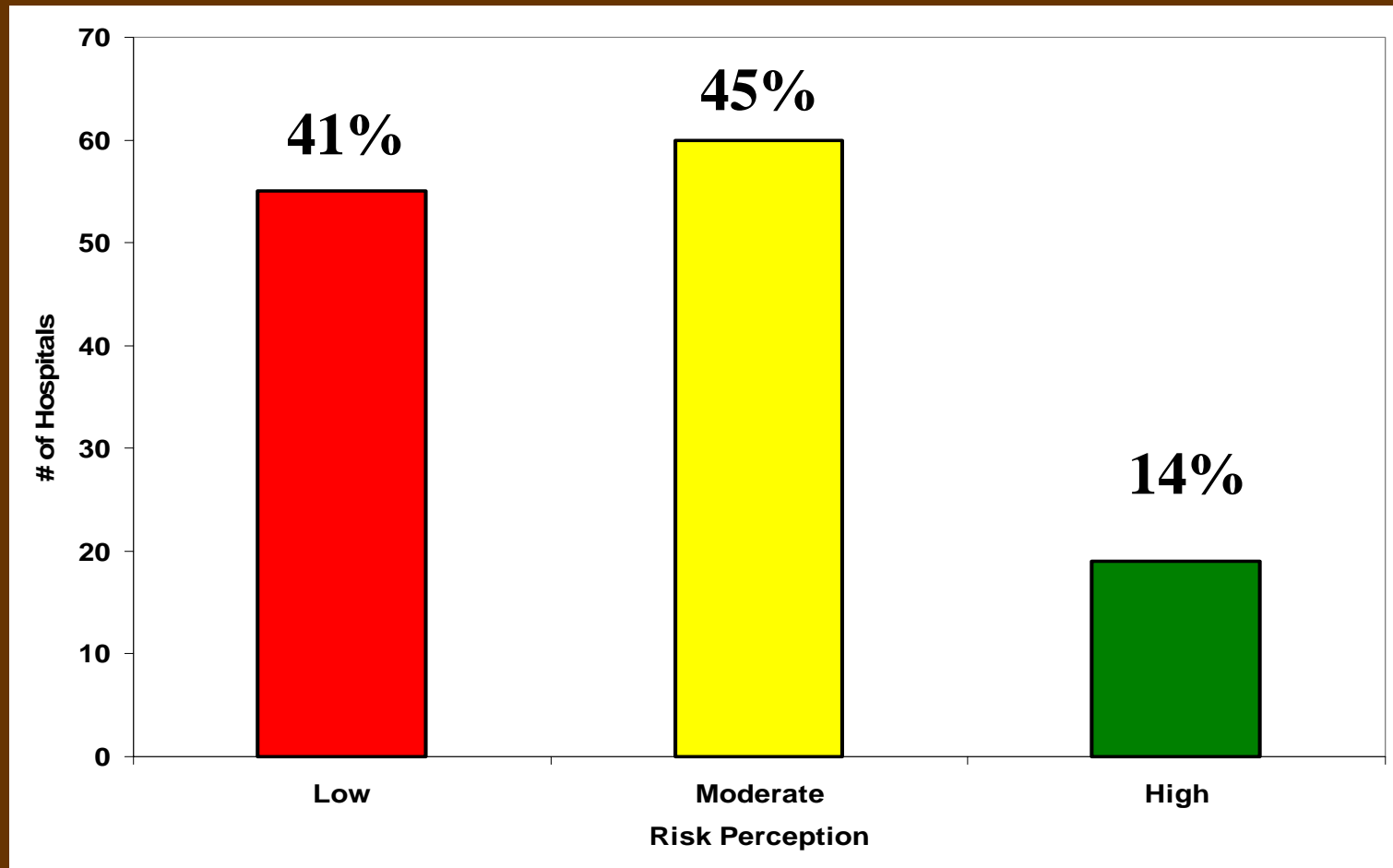
- **Preparedness may be positively impacted by risk perception**
 - **Subjective assessment of probability of a specific type of accident happening**
- **Natural disasters**
- **Mass casualty incidents**
- **Manmade disasters**

Dependent Variable: Preparedness



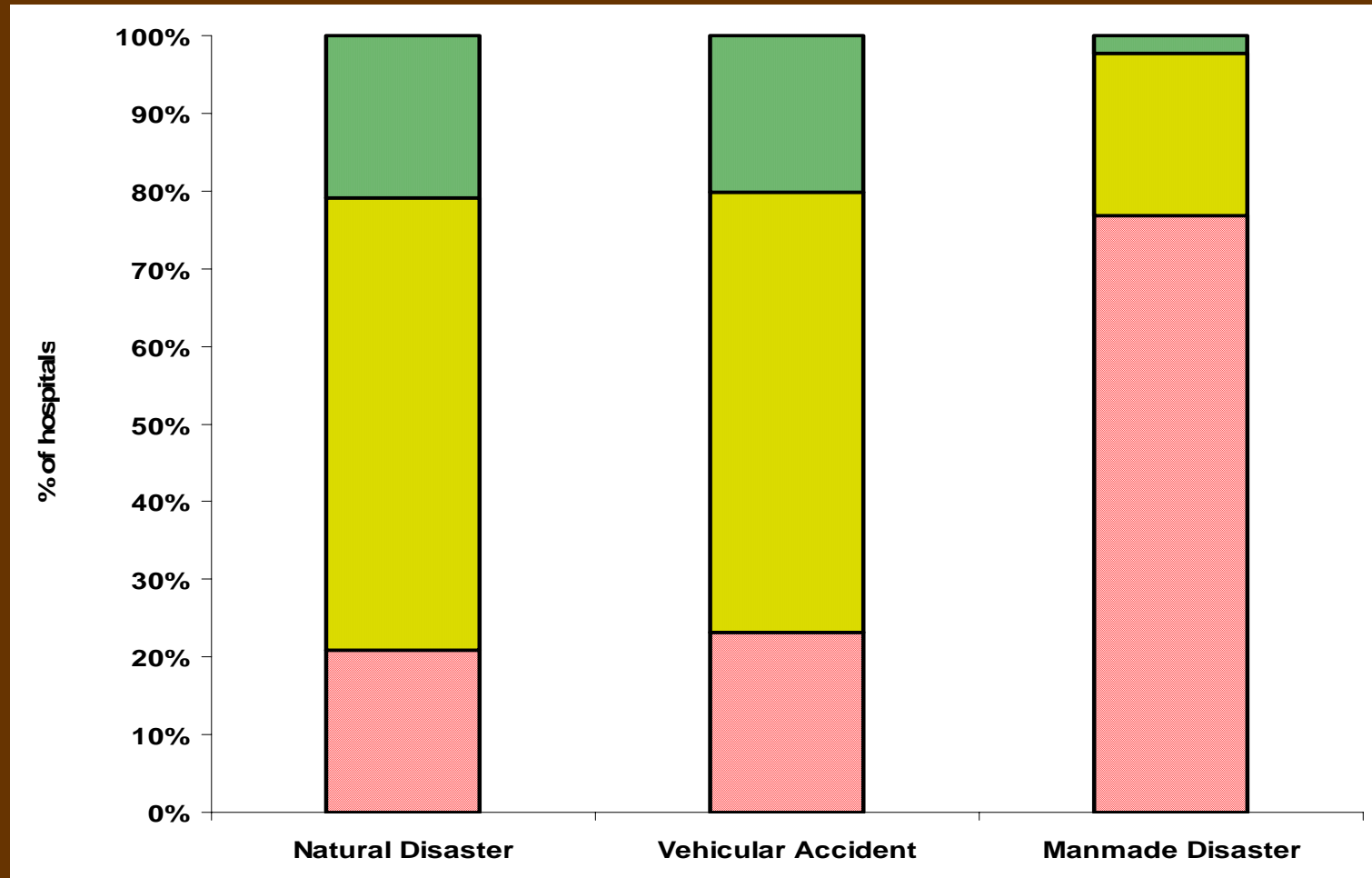
Results

Perceived Risk for All Hazard Disasters



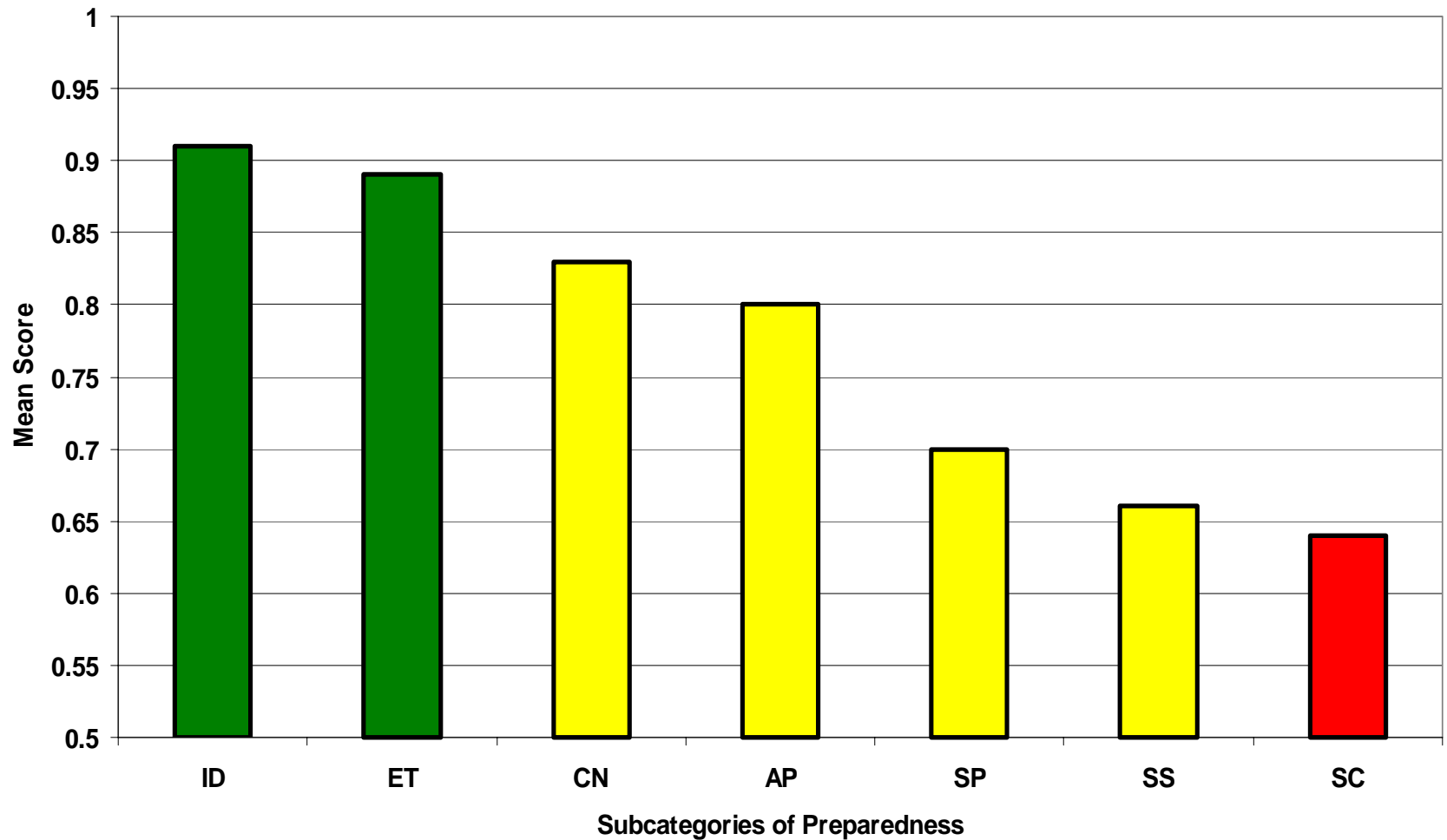
Margin of Error $\pm 9\%$

Perceived Risk by Type of Disaster

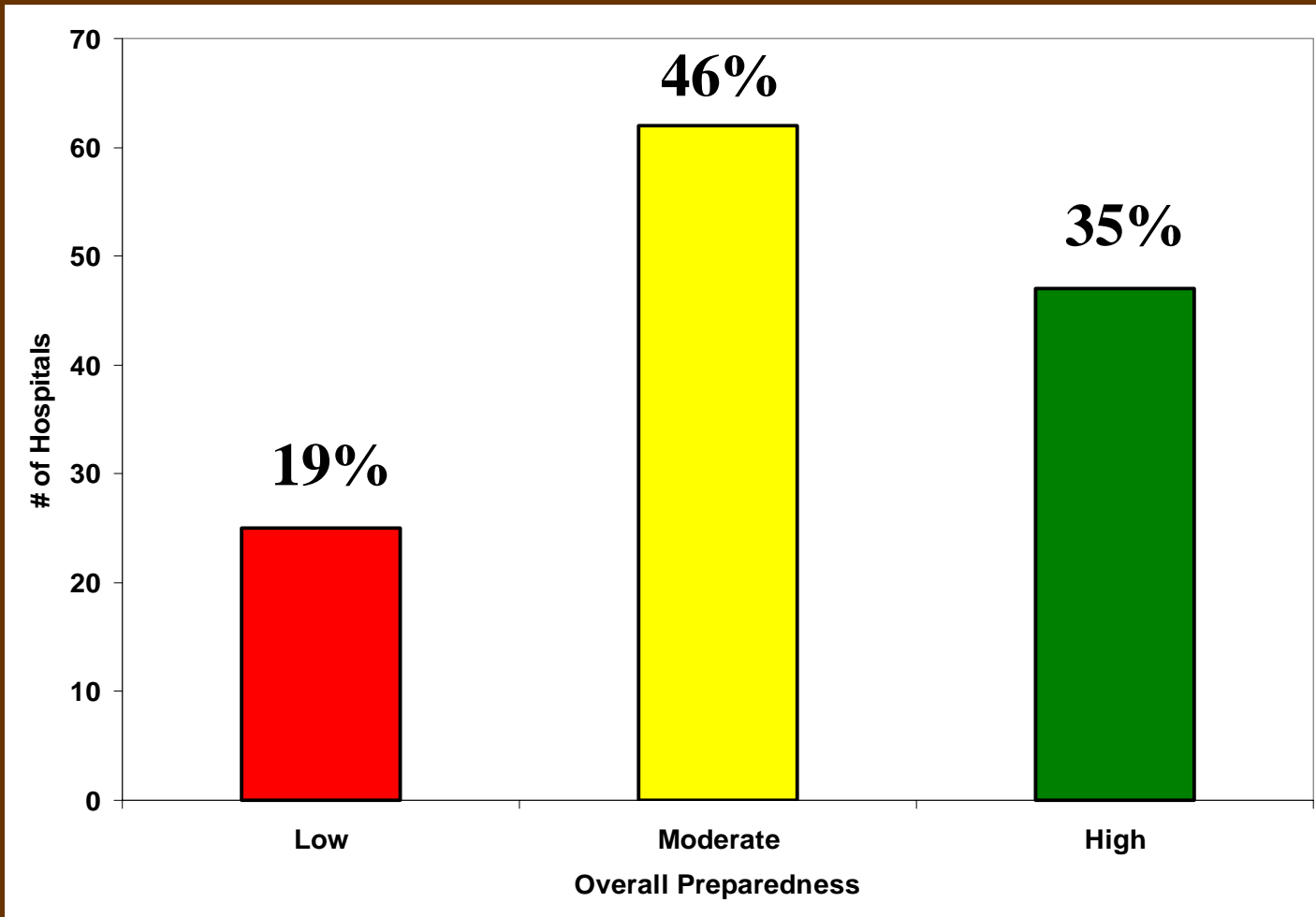


Margin of Error $\pm 9\%$

Status of Disaster Preparedness



Overall Preparedness



Association Between Overall Risk Perception and Preparedness

	<u>OR</u>	<u>95% CI</u>
Administration & Planning	1.204	.480-3.019
Surge Capacity	.849	.472-2.493
Education & Training	1.245	1.050-1.266
Communication & Notification	.350	.074-1.652
Staffing & Support	1.748	.752-4.065
Isolation & Decontamination	.699	.247-1.979
Supplies, Drugs, & Lab	.871	.372-2.041
Overall Preparedness	.612	.259-1.445

Conclusions

Summary

- 1. Moderate perception of all-hazards risk (14% high risk)**
- 2. Moderate overall preparedness (35% high preparedness)**
- 3. Overall risk perception was associated with education and training**

Discussion

**Rural hospitals are
moderately prepared
for a disaster event
but is moderate preparedness
good enough?**

Questions?

Comments?

barbara.cliff@cheboyganhospital.org