#### Washington University School of Medicine Digital Commons@Becker

Presentations

2005: Alcoholism and Comorbidity

2005

#### Social anxiety and alcoholism

Carrie Randall Medical University of South Carolina

Follow this and additional works at: http://digitalcommons.wustl.edu/guzepresentation2005



Part of the Medicine and Health Sciences Commons

#### Recommended Citation

Randall, Carrie, "Social anxiety and alcoholism" (2005). Presentations. Paper 4 Samuel B. Guze Symposium on Alcoholism. http://digitalcommons.wustl.edu/guzepresentation2005/4

This Presentation is brought to you for free and open access by the 2005: Alcoholism and Comorbidity at Digital Commons@Becker. It has been accepted for inclusion in Presentations by an authorized administrator of Digital Commons@Becker. For more information, please contact engeszer@wustl.edu.



#### A Complex Relationship

Carrie Randall, Ph.D.
Charleston Alcohol Research Center
Medical University of South Carolina



#### Overview

- Social anxiety disorder (aka social phobia)
- II. Comorbidity of alcoholism and social anxiety disorder
- III. Self-medication/drinking to cope
- IV. Treating the comorbidity: Empirical data
- V. Future directions



#### DSM-IV diagnostic criteria Social Anxiety Disorder

- Intense and persistent fear of scrutiny
- Extreme discomfort in social situations
- Interference with daily activities
- Recognition that the fear is excessive;
   marked distress about the condition



#### Social anxiety disorder ≠ shyness

- More intense discomfort
- More avoidance of social situations
- More impairment in functioning

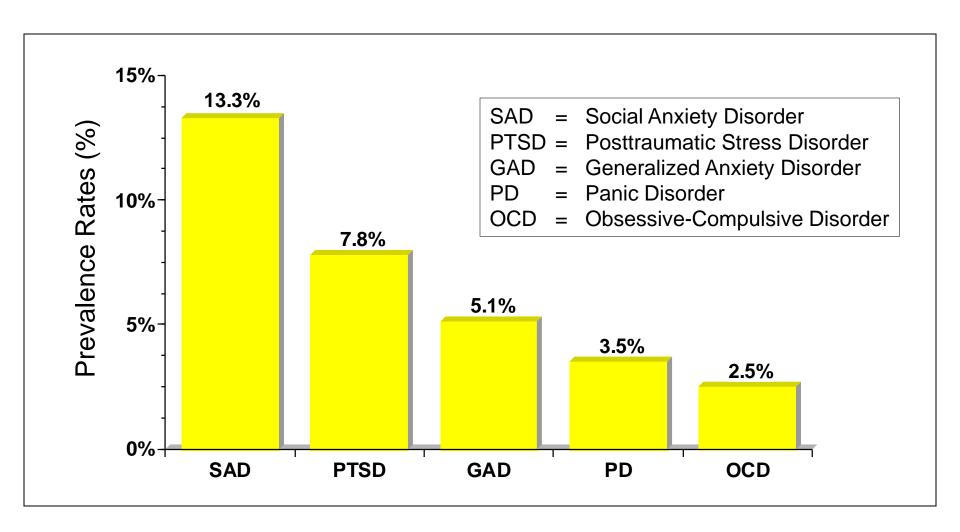
## Two types

- Non-generalized (limited)
- Generalized

Fear most social situations
Have more severe fears

Have an earlier age of onset

## Prevalence of Anxiety Disorders in Population Studies: The National Comorbidity Survey and the Epidemiological Catchment Area Study



Kjernisted & Bleau, 2004. Canadian Journal of Psychiatry 49:51S-63S.

#### Features of social anxiety disorder

- Females are 2.5 times more likely than males to be affected
- More males than females seek treatment
- Onset is in early adolescence
- Unremitting without treatment
- Negatively impacts quality of life



## Comorbidity with Alcohol Dependence

- Lifetime prevalence is ~20% in clinical samples
- Social anxiety disorder almost always appears first

# Does social anxiety disorder increase the risk of alcoholism?

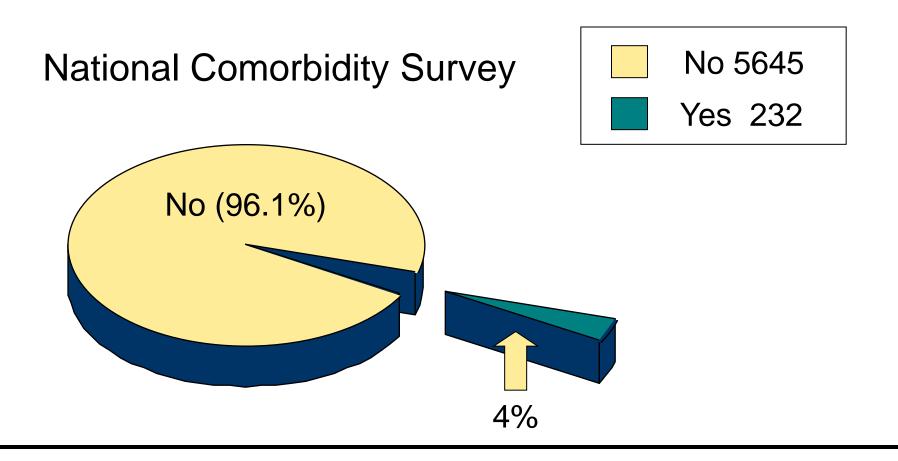
### Self-medication hypothesis

Onset
of
social
anxiety

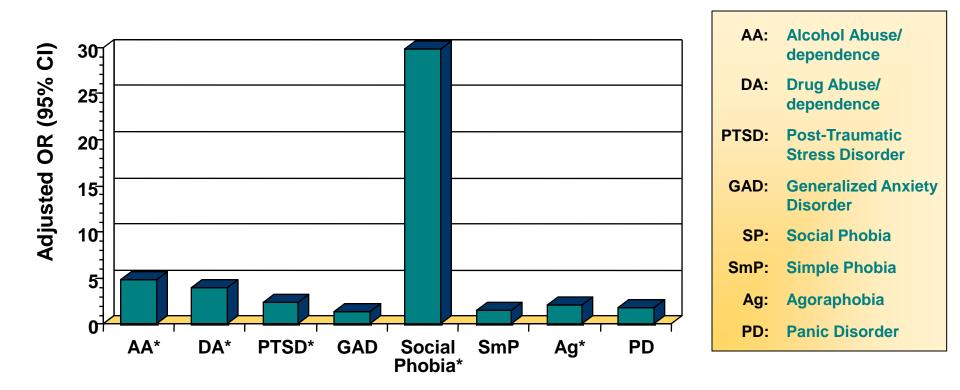
Drinking to cope

Comorbid AUD + SP

## Ever drink more than usual or use drugs not prescribed to help reduce fear or anxiety?



## Adjusted odds ratios for association of DSM-III-R disorders with self-medication



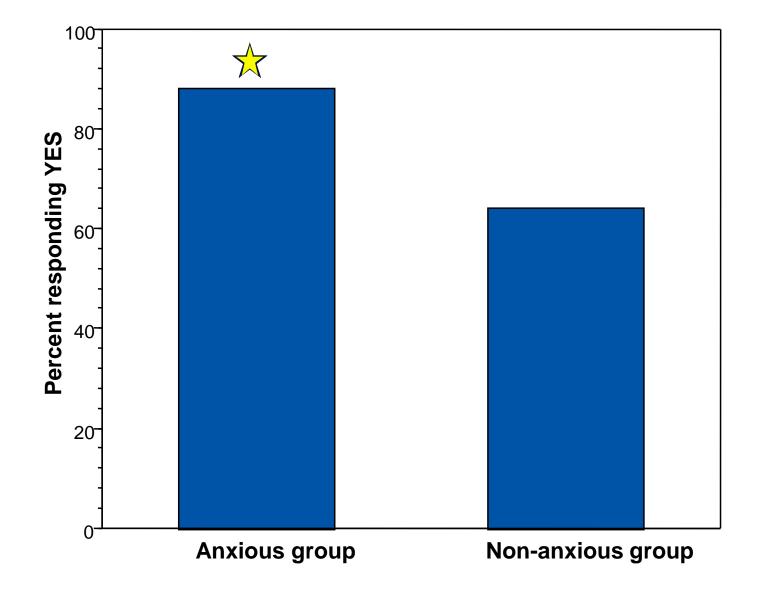
# Drinking to cope in socially anxious individuals: A controlled study



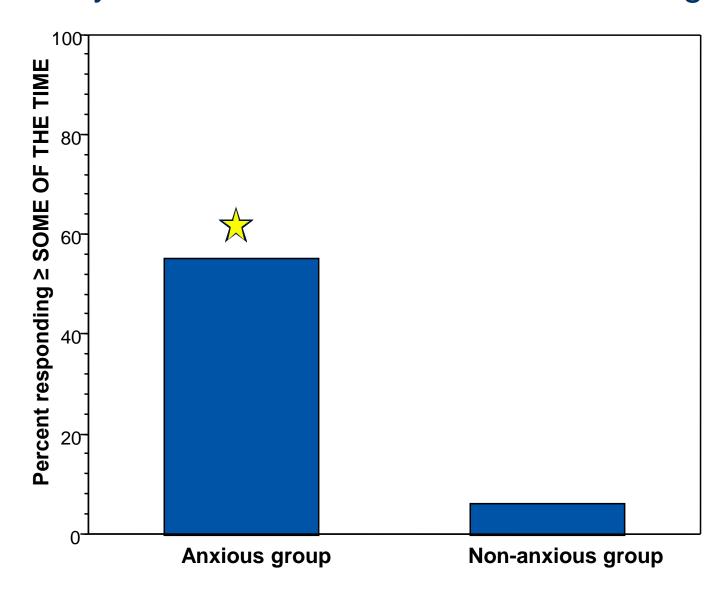
### Study description

- Participants were involved in a larger project on attentional biases in socially anxious subjects who drink to cope
- Recruitment of participants via community ads
- Individuals were excluded who were currently receiving treatment for alcoholism or anxiety problems

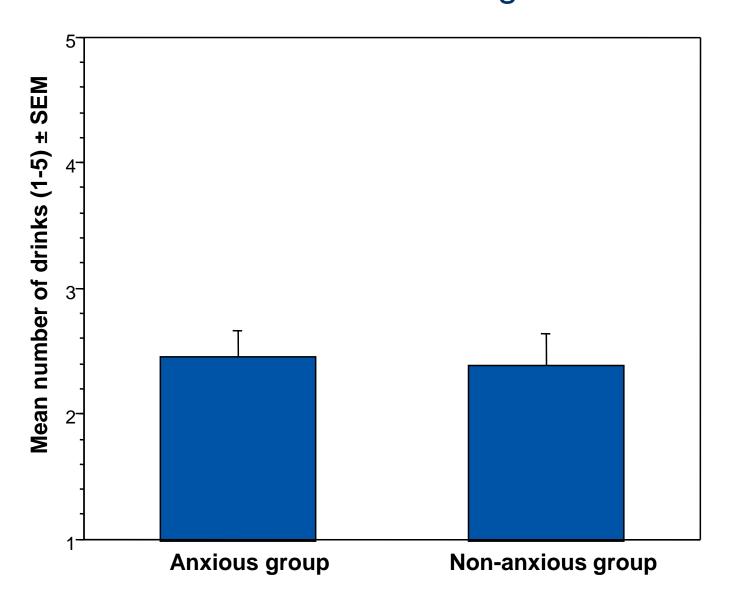
"Do you ever drink alcohol to help you feel more comfortable or less anxious during social situations?"



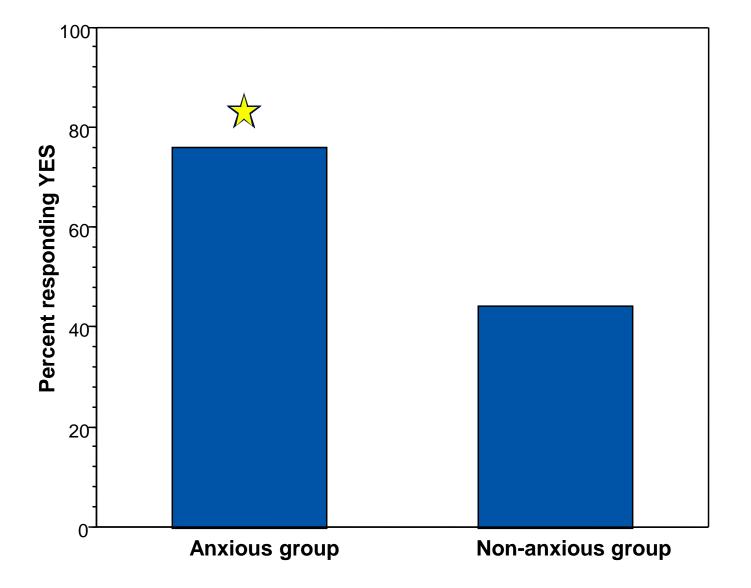
## How often would you AVOID a social situation if you knew you would not be able to drink during it?



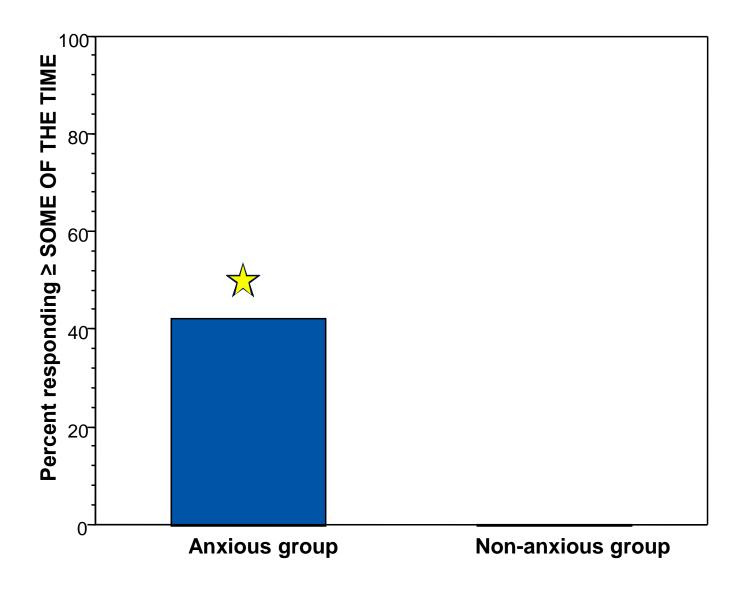
## How many drinks would you usually need to feel comfortable or less anxious during social situations?



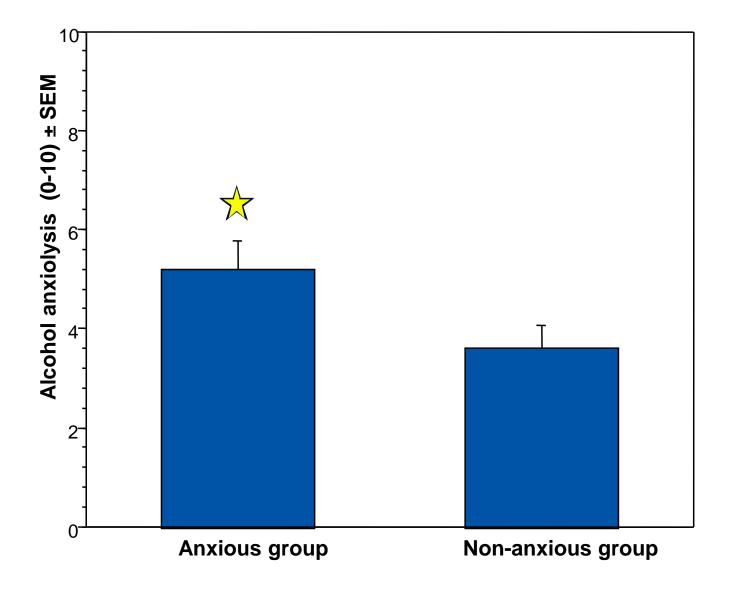
# "Do you ever drink alcohol BEFORE a social situation to help you feel comfortable?"



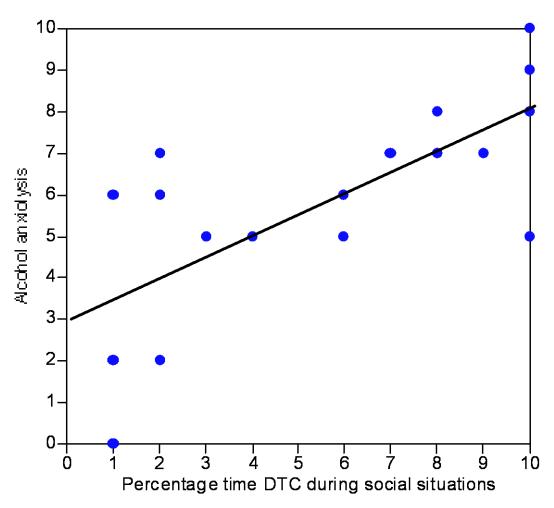
## How often would you AVOID a social situation if you knew you would not be able to drink before it?



"How much does alcohol relieve your anxiety in social situations?"



## Anxiety relief by alcohol and drinking to cope: individuals with high social anxiety



Bivariate r = .71, p < .001 $R^2 = .50$ 

#### Conclusions

- High prevalence of drinking to cope in both groups
- Socially anxious group was more likely than nonanxious group to drink both in anticipation of and during social situations
- Socially anxious individuals were more likely to "avoid"
- Alcohol appears to relieve anxiety more in the socially anxious group
- Degree of anxiety relief by alcohol is related to propensity to drink to cope

# Does social anxiety disorder complicate treatment for alcoholism?

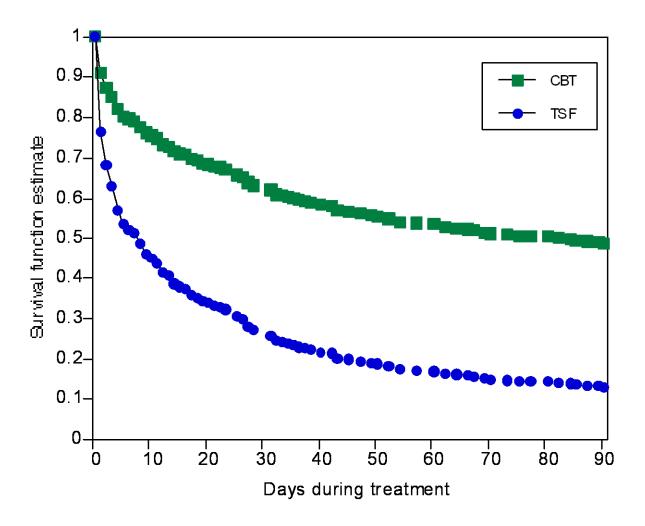


## Alcoholics with (vs. without) social anxiety disorder

- Endorse drinking to improve functioning
- Greater endorsement of suicidal ideation
- More severe alcohol dependence
- More likely to have comorbid affective disorder (especially women)

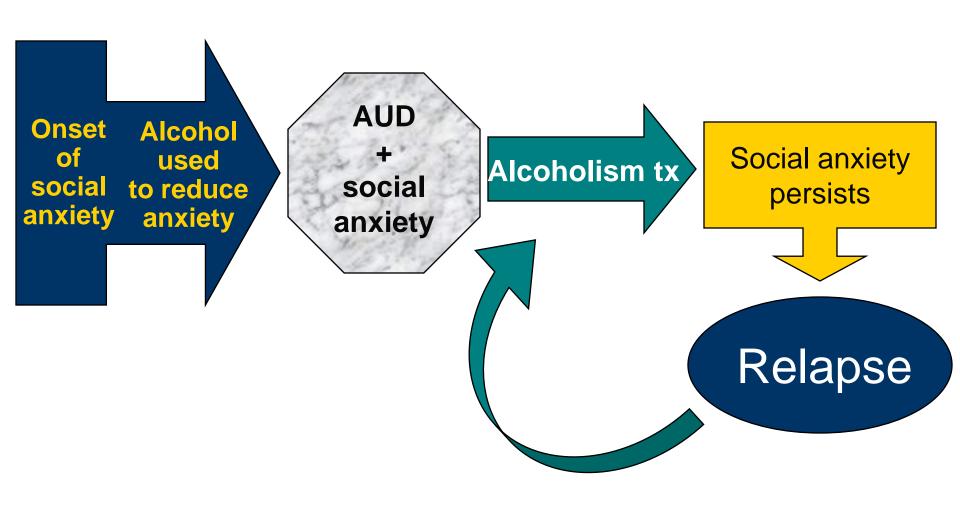
Thomas et al., 1999. JSA 60: 472-479 Randall et al., 2000. Am J Addictions 9:202-215

## Alcoholic women with social anxiety disorder: Time to first heavy drinking day



Thevos et al., 2000. Addict Behav 25:333-345.

#### Working Model



## Comorbidity of alcoholism and social anxiety disorder

Clinical trials investigating optimal treatment approaches

## Concurrent alcoholism and social anxiety disorder

A first step toward developing effective treatments

## Participants

- All clients (N=93) were seeking treatment for alcohol problems
- All clients met DSM-III-R criteria for current alcohol dependence
- All clients met DSM-III-R criteria for current social anxiety disorder

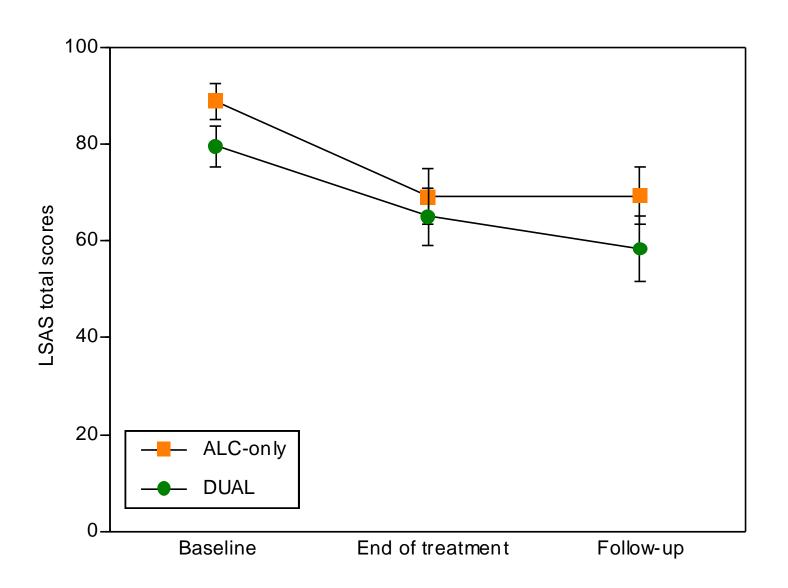
### Study design

- Two group, randomized clinical trial:
  - Alcohol Only CBT
  - Alcohol and Social Phobia CBT
- 12 sessions of individual manual-guided cognitive behavioral therapy for both disorders
- Assessment points
  - Baseline
  - End of 12-week treatment
  - Follow-up at 3, 6, & 9 months after treatment completion (3 month follow-up is presented)



- Clients who received DUAL treatment would have greater reduction in social anxiety than clients who received ALC-only treatment
- Clients who received DUAL treatment would have better drinking outcomes than clients who received ALC-only treatment

#### LSAS total scores

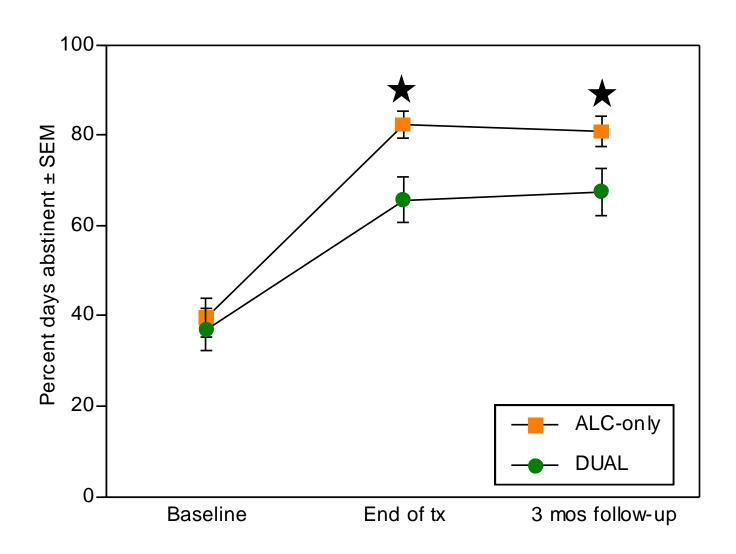




#### Social anxiety outcomes

- Both groups had improvements on social anxiety measures (on average, scores dropped 20% from baseline levels)
- No treatment group differences on any social anxiety measures

#### Percent days abstinent





#### Drinking outcomes

- Both groups decreased alcohol use from baseline
- DUAL group had worse drinking outcomes than the ALC-only group at the 3-month follow-up
- Collateral reports corroborated self-reported alcohol use



## Conclusions/Implications

- Our hypothesis regarding improved drinking outcomes in the dual group was NOT supported
- Why not?
  - -Did the two CBT therapies compete for client resources?
  - -Did requiring "exposure" result in more drinking?
  - -Should the disorders be treated in "stages"?
  - -Was the improvement in social anxiety too modest?
  - -Would pharmacotherapy for SAD work better? Quicker?



#### Pharmacotherapy Trial

# Paroxetine treatment of comorbid social anxiety disorder and alcoholism: A pilot study

#### Study design

- Eight week, randomized, double blind, placebo-controlled
- All clients met diagnostic criteria for both social anxiety disorder and AUD
- All clients received one session of MI for alcohol problem prior to receiving medication
- Flexible dosing initiated at 20 mg/day; weekly increases of 20 mg/day to maximum dose of 60 mg/day
- Clinical and research ratings were collected separately

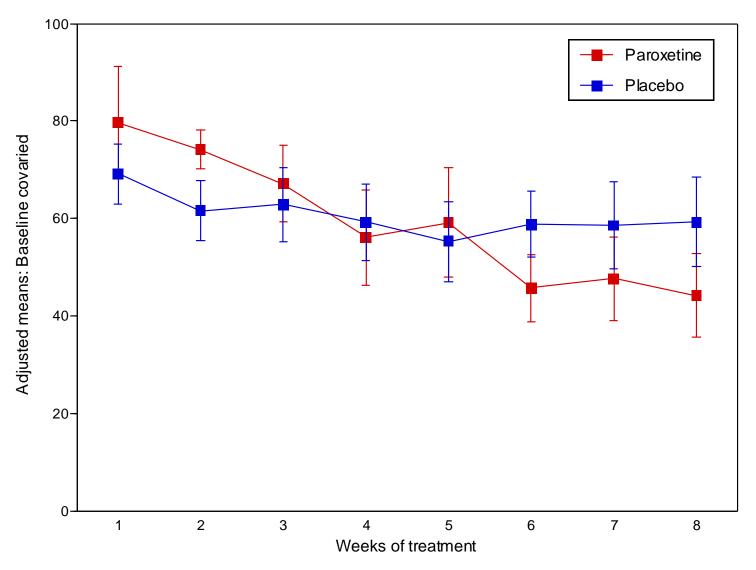


#### Pre-treatment severity

| <u>Pa</u>                                | roxetine | <u>Placebo</u> |
|--|----------|----------------|
| N  | 6        | 9              |
| Age onset social anxiety                 | 12       | 14             |
| Severity rating (1-7) for social anxiety | 4.7      | 4.3            |
| Age onset drinking problems              | 19.6     | 24.7           |
| ASI alcohol severity                     | 0.52     | 0.57           |

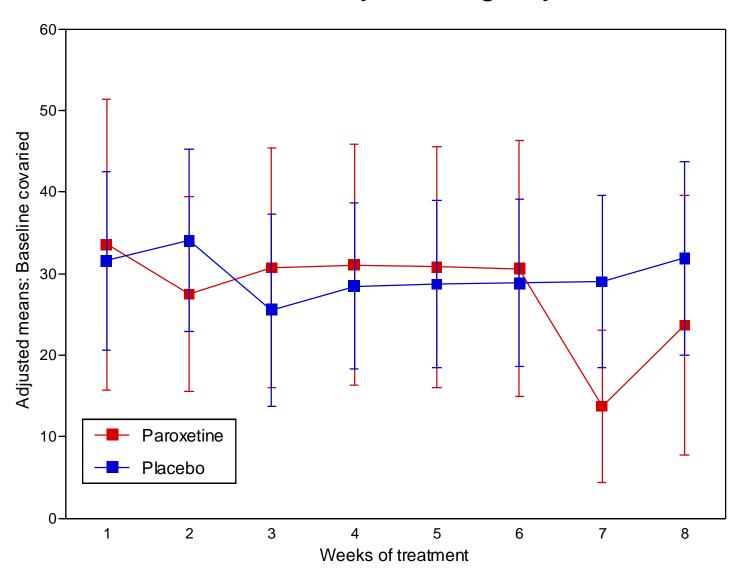
Baseline scores covaried in all outcome analyses

#### **LSAS Total Scores**



Treatment x time effect: F=16.8, p=.01

#### Percent heavy drinking days



#### Conclusions/Implications

- Paroxetine was safe in individuals with alcohol use disorders
- Promising pilot results merited a larger scale study
- Longer treatment regimen may be needed to assess positive drinking outcomes
- Paroxetine may best benefit individuals who are relatively "early" in their alcohol use disorder (non-treatment seeking for AUD)



## Study in progress

## Paroxetine for comorbid social anxiety disorder and AUD

## Study design

- 16 week, double-blind, placebo-controlled trial
- Participants are treatment-seeking for social anxiety (not alcohol problems)
- Participants report drinking to cope
- Participants meet criteria for AUD yet do not identify alcohol as a problem



#### Primary outcome measures

#### Social anxiety

- LSAS
- CGI
- Emotional Stroop

#### Alcohol use

- Q/F measures
- Q/F drinking to cope
- Emotional Stroop

## Study sample to date

| N  | 34  |
|--|-----|
| Male (%)   | 53% |
| Caucasian (%)                                    | 92% |
| Age  | 28  |
| LSAS total                                       | 91  |
| Percent days drinking (30 days, BL)              | 42% |
| Percent days drinking to cope (of drinking days) | 58% |
| Drinks per drinking day                          | 6   |

#### Lessons and Speculations

- Many people with high social anxiety and social anxiety disorder drink alcohol as a primary coping strategy
- Social anxiety may
  - initiate drinking
  - maintain drinking to decrease anxiety
  - increase the risk of relapse if left untreated in alcoholism treatment

#### Our Plans for Future Research

- Determine appropriate staging of interventions for social anxiety (e.g., sequential, integrated, etc.)
- Evaluate the "uniqueness" of the social anxiety/alcohol relationship
- Use lab-based studies to assess whether alcohol actually reduces social anxiety (and for whom)
- Investigate the role of alcohol beliefs and expectancies in drinking-to-cope in socially anxious individuals

#### Acknowledgements





#### Collaborators

Maureen Carrigan, Ph.D.
Angelica Thevos, Ph.D.
Sarah Book, MD
Shannon Anderson
Suzanne Thomas, Ph.D.
Darlene Moak, MD

## Situations in which drinking to cope is more common in socially anxious individuals

|  | Anxious | Non-anxious |
|--|---------|-------------|
| Eating at restaurants in front of strangers      | 96%     | 24%         |
| In situations where you'll be criticized         | 44%     | 12%         |
| Going to a party with strangers present          | 84%     | 52%         |
| Meeting people for the first time                | 56%     | 16%         |
| In situations where you'll likely appear nervous | 56%     | 16%         |

## Situations in which drinking to cope is not endorsed in either sample

|  | Anxious | Non-anxious |
|--|---------|-------------|
| Giving an oral report or speech to a group         | 12%     | 4%          |
| Taking a test of your ability, skill, or knowledge | 8%      | 0%          |
| Working while being observed                       | 8%      | 0%          |