
John J. Murphy, M.S.
Capella University
John@LosAngeles-Hypnosis.com
Introduction

- Research links low self-esteem (LSE) with elevated general anxiety.
- Self-esteem a stable personality trait of self-worth.
- Might global LSE also relate to particular phobias, such as a fear-of-flying?
- An inverse relationship might validate a greater cognitive focus for phobia treatment.
Origin of self-esteem (SE)

- Harmon-Jones, Simon, & Greenberg (1997) argue SE exists to manage terror/anxiety related to mortality: terror management theory.
- Perceiving self as being a valuable part of community appears to relieve this terror.
- Pyszczynski and others (2004) found boosting SE decreased anxiety associated with thoughts of mortality, electric shock.
Hypothesis 1

- There is a significant inverse relationship between level of self-esteem and level of fear-of-flying.
Gender and self-esteem (SE)

- Pyszczynski and others (2004) assert that self-esteem is dependent upon social validation, social role fulfillment.

- Women who have lower self esteem feel worse after seeing a picture of an attractive woman than women with higher self-esteem (Jones & Buckingham, 2005).

- Waters & Moore (2002) determined that unemployment has a greater negative effect upon SE for men compared to women.
Hypothesis 2

- Gender is a significant predictive variable in the relationship between self-esteem and fear-of-flying, by which male gender has higher predictive ability of the relationship between level of fear of flying and level of self-esteem.
Age and self-esteem (SE)

- Decrease in adolescence and in elderly.
- Decreases associated with loss of control (relates to social role fulfillment).
- Steady increase of SE from throughout adulthood until about age 70.
Hypothesis 3

- Age is a significant predictive variable in the relationship between self-esteem, and fear-of-flying, by which older participants demonstrate a higher predictive ability of the relationship between level of fear of flying and level of self-esteem.
Methods

- 200 participants through Greenfield Online.
- Reward: entry into cash sweepstakes.
- Online survey of Rosenberg Self-Esteem Scale (RSES), Flight Anxiety Situations Questionnaire (FAS). A demographics questionnaire.
- Three FAS subscales: general flight anxiety, pre-flight anxiety, in-flight anxiety
- All over 18 and all U.S. citizens.
Results: population sample

- 171 valid responses
- 96 male participants (56.1%) and 75 female participants (43.9%).
- Age range: 18 to 74
Results: t-tests and correlations

- No difference between genders for SE, \( t(169) = -0.394, p = 0.694 \).
- Positive correlation between age and SE, \( r(171) = 0.162, p = 0.034 \).
- Inverse correlation between SE and pre-flight anxiety scale, \( r(171) = -0.162, p = 0.03 \).
### Results: correlation table

**Intercorrelations for Given Study Variables (N = 171)**

<table>
<thead>
<tr>
<th></th>
<th>Age</th>
<th>Sex</th>
<th>RSES</th>
<th>FASG</th>
<th>FASP</th>
<th>FASI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>1.00</td>
<td>-.033</td>
<td>.162*</td>
<td>-.029</td>
<td>-.008</td>
<td>-.009</td>
</tr>
<tr>
<td>Sex</td>
<td>-.033</td>
<td>1.00</td>
<td>.030</td>
<td>-.241**</td>
<td>-.273**</td>
<td>-.269**</td>
</tr>
<tr>
<td>RSES</td>
<td>.162*</td>
<td>.030</td>
<td>1.00</td>
<td>.026</td>
<td>-.037</td>
<td>-.162*</td>
</tr>
<tr>
<td>FASG</td>
<td>-.029</td>
<td>-.241**</td>
<td>.026</td>
<td>1.00</td>
<td>.744**</td>
<td>.649**</td>
</tr>
<tr>
<td>FASP</td>
<td>-.008</td>
<td>-.273**</td>
<td>-.037</td>
<td>.744**</td>
<td>1.00</td>
<td>.891**</td>
</tr>
<tr>
<td>FASI</td>
<td>-.009</td>
<td>-.269**</td>
<td>-.162*</td>
<td>.649**</td>
<td>.891**</td>
<td>1.00</td>
</tr>
</tbody>
</table>

** Significant at the 0.01 level (2-tailed)

* Significant at the 0.05 level (2-tailed)
Results: gender differences

- Significant differences ($p < .001$) between gender for all three FAS subscales.
- Women 2x as likely to have flying anxiety.
- When gender controlled for (regression analysis), no-significant correlation between SE and in-flight anxiety for women, $r (171) = -.064$, $p > .05$
- Highly significant correlation between SE and in-flight anxiety for men, $r (171) = -.272$, $p < .01$
### Results: regression analysis

Correlations Among Self-Esteem and Fear-of-Flying Subscales Mediating for Gender

<table>
<thead>
<tr>
<th></th>
<th>FASG</th>
<th>FASP</th>
<th>FASI</th>
</tr>
</thead>
<tbody>
<tr>
<td>RSES (Males Only; N = 96)</td>
<td>-.154</td>
<td>-.156</td>
<td>-.272**</td>
</tr>
<tr>
<td>RSES (Females Only; N= 75)</td>
<td>.139</td>
<td>.075</td>
<td>-.064</td>
</tr>
</tbody>
</table>

** Significant at the 0.01 level
* Significant at the 0.05 level
Correlation graph between men and women for self-esteem and in-flight anxiety.
Gender differences in self-esteem with high and low in-flight anxiety

![Bar chart showing average Rosenberg Self-Esteem Scale scores for females and males with FASI scores under 20 and over 20.](chart.png)
Results: age differences

- Significant correlation between age and SE, $r(171) = .162$, $p = .034$
- No significant correlation between age and fear-of-flying in general ($r = -.029$), pre-flight anxiety ($r = .008$), or in-flight anxiety ($r = -.009$).
Results: hypothesis testing

- Hypothesis One receives partial support from the data. (SE x FAS)
- Hypothesis Two receives support from the data, and the null hypothesis in Hypothesis Two is rejected. (SE x FAS), gender
- Hypothesis Three does not receive support from the data and is rejected in favor of the null hypothesis. (SE x FAS), age
Discussion: summary

- Inverse relationship between global self-esteem and in-flight anxiety for men only.
- In-flight stimuli better cues for reminder of mortality?
- In-flight anxiety may represent threat of gender role violation for men.
Discussion: limitations

- Only 8 participants (4.6%) over age of 60. No one under 18.
- Over-representing 18-39 age group.
- Paid participation; online participation.
- Correlation, not causation. Direction between self-esteem and flying anxiety unknown.
Discussion: future studies and therapy

- Gender differences in response to phobia treatment for behavioral and cognitive focus?
- Self-esteem boosting for phobia treatment?
- Same effects for other phobia types that threaten gender roles?
- Cognitive focus on how flying phobia may threaten gender role for men.
For more information

For more information & references:
Contact: John J. Murphy, M.S.
John@LosAngeles-Hypnosis.com
1-310-729-4727