An explanatory study on the relationship of intensity and directional components of state anxiety

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Abstract
The purpose of the study was to investigate the relationship between intensity and directional components of state anxiety. 200 competitors from a variety of sports (Athletics, Kabaddi, Boxing, Hockey, Football, Judo, Volleyball, Wrestling) were selected as the subjects for the study. CSAI-2D was used as the criterion measure. Descriptive statistics and Pearson's $r$ was employed as the statistical technique. Findings revealed moderate, positive and linear relationship between the cognitive and somatic intensity components, small, positive and linear relationship between the cognitive and somatic directional components and small, moderate and negative relationship between the corresponding intensity and direction components of state anxiety.

Keywords: Explanatory, relationship, intensity, directional, components

Introduction
Purpose
To explore the association between the cognitive and somatic intensity components, between the cognitive and somatic directional components and between corresponding intensity and directional components of CSAI-2D.

Hypothesis
1. It was hypothesized that the association between the cognitive and somatic intensity components would be moderate, positive and linear.
2. It was hypothesized that the association between the cognitive and somatic directional components would be small, positive and linear.
3. It was hypothesized that the association between the corresponding intensity and direction components of CSAI-2D would be small, moderate and negative.

Delimitations of the Study
1. The study was delimited to the players of RAI Sports School and Sports Authority of India.
2. The study was further delimited to the game of athletics, Kabaddi, Boxing, Hockey, Football, Judo, Volleyball and Wrestling.
3. The study was further delimited to the players participating at least in the state level championship.

Sample
For the purpose of the study 200 competitors from a variety of sports (Athletics, Kabaddi, Boxing, Hockey, Football, Judo, Volleyball, Wrestling) The study was confined to the players of RAI sports school and Sports Authority of India (i.e. the players receiving coaching in SAI centers or under the supervision of SAI coaches).The competitors selected were those players who had participated at least in the state level championships.

Variables
Intensity and directional dimensions of state anxiety.

Criterion Measures: CSAI-2D
Statistical Technique: Pearson's $r$ was calculated between Intensity and directional components of anxiety to examine the hypothesised relationships.
Analysis and Findings of the Study

Table 1: Mean and Standard Deviation values of the components of CSAI-2-D

<table>
<thead>
<tr>
<th>S. No.</th>
<th>Variables</th>
<th>Mean</th>
<th>Std. Deviation</th>
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<tbody>
<tr>
<td>1.</td>
<td>Cog. Int.(CSAI-2)</td>
<td>23.42</td>
<td>3.84</td>
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<tr>
<td>2.</td>
<td>Som Int.(CSAI-2)</td>
<td>22.28</td>
<td>4.02</td>
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<td>4.</td>
<td>Som. Dir.(CSAI-2)</td>
<td>.75</td>
<td>8.17</td>
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</table>

Table 1 depicts the Mean, Standard Deviation and Internal Consistency of all the components of CSAI-2D. The Mean and Standard deviation for Cog. Int. are, M = 23.42 and SD = 3.84 for Som. Int. M = 22.28 and SD = 4.02 for Cog. Dir. M = -8.71 and SD = 9.13 for Som. Dir. M = .75 and SD = 8.17. The mean and standard deviation of all the components of CSAI-2D were approximately same as those reported in earlier researches (Davis & Cox, 2002; Martens et al., 1990).

Table 2: Correlation within components of CSAI-2-D

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<tbody>
<tr>
<td>1.</td>
<td>Cog. Int.(CSAI-2)</td>
<td>-.454**</td>
<td>-.487**</td>
<td>-.347**</td>
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</tr>
<tr>
<td>2.</td>
<td>Som Int.(CSAI-2)</td>
<td>-.300**</td>
<td>-.487**</td>
<td>-.269**</td>
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<tr>
<td>3.</td>
<td>Cog. Dir.(CSAI-2)</td>
<td>-.269**</td>
<td>-.397**</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>4.</td>
<td>Som. Dir.(CSAI-2)</td>
<td>-.397**</td>
<td>-</td>
<td></td>
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</table>

The table 2 indicates the association within the components of CSAI-2-D. It was hypothesized that the association between cog. and som. components of CSAI-2D would be moderate, linear and positive. Table 2 depicts, the observed association between Cog. Int. and Som. Int. of CSAI-2D was \( r = 0.454 \), which is significant at \( p<0.01 \) level and hence provides support for the hypothesis made. It was hypothesized that the association between Cog. Dir. and Som. Dir. components of CSAI-2D would be small, linear and positive. The observed association between Cog. Dir. and Som. Dir. components of CSAI-2-D was \( r = 0.397 \), which is significant at \( p<0.01 \) level and hence provides support for the hypothesis made. Finally, it was hypothesized that the association between the Cog. Int. and Cog. Dir. and between the Som. Int. and Som. Dir. components of CSAI-2-D would be small to moderate, linear and negative. The observed association was, \( r = -0.487(p<0.01) \), between the int. and dir. component of Cog. Anx. and, \( r = -0.397(p<0.01) \), between the Int. and Dir. Component of Som. Anxiety. Overall, the inter-component association of CSAI-2D provides support for the hypotheses made.

References