I. INTRODUCTION
A. Research on effects of sex on public attitudes toward stuttering are mixed
   1. Some studies show better public attitudes toward one sex (e.g., females) over the other (e.g., Burley & Rinaldi, 1986; Langevin, Kleitman, Packman, & Onslow, 2009; Patterson & Pring, 1991); Some do not (e.g., Evans, Healey, Kawai, & Rowland, 2008)
   2. With sex of a hypothetical person who stutters unspecified, St. Louis (2012a) showed that the sex of respondents had no effect on ratings on the Public Opinion Survey of Human Attributes—Stuttering (POSHA–S)
      a. POSHA–S developed as a standard measure of public attitudes in wide variant settings, groups, languages & geographic areas (e.g., St. Louis, 2011, 2012b)
      b. The study randomly selected one male and one female respondent from 50 different worldwide samples

II. PURPOSE
A. To determine any differences in attitudes toward males vs females who stutter
B. To determine any differences in attitudes toward males vs females who stuttering in two widely different cultures
C. To determine any differences between attitudes toward male or females who stutter depending on the sex of respondents

III. METHOD
A. Two versions of POSHA–S created, translated to Farsi & handed out alternatively
   1. 1-Relating to a hypothetical male who stutters (RE:MALE)
   2. 2-Relating to a hypothetical female who stutters (RE:FEMALE)
B. 2nd & 3rd authors recruited convenience samples of friends, acquaintances, family members & others (no SLP students or practitioners) near their universities & homes
C. RE:MALE & RE:FEMALE samples further subdivided into male and female respondent groups (except 1 in each sample who did not identify his/her sex)
D. Respondents (see Table 1)
   1. USA (in English)
      a. 117 respondents (84% return rate)
         1) RE:MALE—55 (47%) respondents: 15 males & 40 females
         2) RE:FEMALE—62 (53%) respondents: 20 males, 41 females & 1 NR
   2. Iran (in Farsi)
      a. 101 respondents (92% return rate)
         1) RE:MALE—50 (49%) respondents: 31 males & 19 females
         2) RE:FEMALE—51 (51%) respondents: 12 males, 38 females & 1 NR
E. POSHA–S ratings converted to mean ratings from -100 to +100 scale (0 = neutral): Higher scores more positive
   1. 60 standard comparisons (St. Louis, 2011)
      a. Individual items
      b. Components (clusters of items)
      c. Subscores (clusters of components for Beliefs About People Who Stutter [BEL], Self Reactions To People Who Stutter [SR] & Obesity / Mental Illness [OMI])
      d. Overall Stuttering Score (OSS) (mean of the two stuttering subscores)
   2. Ran t tests for independent samples for all pair-wise comparisons
      a. Bonferroni correction (p ≤ .00417 [.05/12])
      b. Cohen’s (1988) d effect sizes for statistically significant differences
   3. Database comparisons with median sample mean ratings (167 different samples 7197 respondents; 26 countries; 18 languages [circa April, 2013])
IV. RESULTS

A. RE: MALES vs RE: FEMALES in USA & Iran (Table 2 & Figures 1 & 2)

1. None (0%) of 60 standard POSHA–S comparisons reached significance for either USA or Iran
   a. USA attitudes slightly more positive toward females
   b. Iranian attitudes slightly more positive toward males

B. Comparison to POSHA–S database for USA & Iran

1. Stuttering attitudes: USA—more positive; Iran—less positive

C. Subdivided male respondents vs female respondents for RE: MALE & R: FEMALE (Table 3)

1. USA
   a. Males: 1/60 (2%) rating significantly different (Cohen’s d = 1.24 [“very large”])
      1) Males more likely to fill in a male’s words while stuttering than a female’s words
   b. Females: 1/60 (2% rating significantly different (d = .75 [“large”])
      1) Females know more about obesity than males

2. Iran
   a. Males: 1/60 (2%) rating significantly different (d = 1.17 [“very large”])
      1) Females should hide stuttering more than males should
   b. Females: no significant differences

D. USA vs Iran

1. USA attitudes more positive than Iranian attitudes: 33/60 (55%) comparisons significant for all respondents (mean d = .83 [“large”])
   a. RE: MALES: 20/60 (33%) significant (mean d = 1.02 [“very large”])
   b. RE: FEMALES: 27/60 (45%) significant (mean d = 1.00 [“very large”])

V. IMPLICATIONS

A. Sex of the person who stutters is not an important predictor of attitudes on POSHA–S for USA or Iranian adults

1. Conclusion robust in two widely different cultures & languages

B. American attitudes better than Iranian attitudes overall

1. Except for source of knowledge about stuttering
2. USA above database median; Iran below

C. Trends suggest that...

1. American males may have slightly better attitudes toward females than males & vice versa
2. Iranian males may have somewhat better attitudes toward stuttering males & females than females
   a. Little difference regarding sex of the stuttering person

D. Caution: potential influence of small sample sizes for male respondents in male vs female respondent comparisons

REFERENCES


Table 1. Demographic Means
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<tr>
<td>Number</td>
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<td>62</td>
<td>50</td>
<td>51</td>
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<tr>
<td>Age (yr)</td>
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<td>39.9</td>
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<td>Education (yr)</td>
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<td>33 / 67</td>
<td>62 / 38</td>
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<td>Student / Working (%)</td>
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<td>35 / 58</td>
<td>36 / 56</td>
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<td>Married / Parent (%)</td>
<td>64 / 56</td>
<td>60 / 53</td>
<td>48 / 40</td>
<td>47 / 35</td>
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<td>Race (Cauc / IranianAryanFars / Other NR) (%)</td>
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<td>96 / 0 / 4</td>
<td>4 / 58 / 38</td>
<td>0 / 59 / 41</td>
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<td>Religion (Christian / Muslim / Other NR) (%)</td>
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<td>72 / 2 / 26</td>
<td>0 / 72 / 28</td>
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<td>Self Identification (%)</td>
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<tr>
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<tr>
<td>Obese</td>
<td>3</td>
<td>0</td>
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<td>35</td>
<td>24</td>
<td>24</td>
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<tr>
<td>Stuttering</td>
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<td>48</td>
<td>28</td>
<td>18</td>
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Table 2. Samples with both male & female respondents

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<tr>
<th>(Sub)Score</th>
<th>USA OMI</th>
<th>Iran OMI</th>
<th>USA BEL</th>
<th>Iran BEL</th>
<th>USA SR</th>
<th>Iran SR</th>
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<tr>
<td>Males &amp; Females RE:MALES</td>
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<td>-46</td>
<td>43</td>
<td>16</td>
<td>-3</td>
<td>7</td>
<td>20</td>
<td>11</td>
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<tr>
<td>Males &amp; Females RE:FEMALES</td>
<td>-34</td>
<td>-51</td>
<td>43</td>
<td>18</td>
<td>1</td>
<td>5</td>
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<td>12</td>
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<tr>
<td>Database Median</td>
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<td>-3</td>
<td>15</td>
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Table 3. Samples with either male or female respondents

<table>
<thead>
<tr>
<th>Number &amp; (Sub)Score</th>
<th>USA OMI</th>
<th>Iran OMI</th>
<th>USA BEL</th>
<th>Iran BEL</th>
<th>USA SR</th>
<th>Iran SR</th>
<th>USA OSS</th>
<th>Iran OSS</th>
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<tr>
<td>Males RE:MALES</td>
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<td>18</td>
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<td>9</td>
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<td>14</td>
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<tr>
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<td>12</td>
<td>-2</td>
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<td>Females RE:FEMALES</td>
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<td>-53</td>
<td>40</td>
<td>17</td>
<td>1</td>
<td>3</td>
<td>20</td>
<td>10</td>
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Figure 1. Summary graph of American respondents’ ratings of RE:MALES vs RE:FEMALES

Figure 2. Summary graph of Iranian respondents’ ratings of RE:MALES vs RE:FEMALES