The BORRTI is a widely used measure designed to evaluate individuals for personality and thought disorders. It provides information regarding the “respondent’s ability to sustain essential relationships and accurately identify internal and external reality.”

It yields scores on four object relations scales: 1) Alienation, 2) Insecure Attachment, 3) Egocentricity, and 4) Social Incompetence. The 45 Object Relations items can be administered separately (Form O). The measure also yields scores on three Reality Testing subscales: 1) Reality Distortion, 2) Uncertainty of Perception, and 3) Hallucinations and Delusions.

The measure includes several validity checks, including an inconsistent responding scale. Interpretation of scores is done by looking at the profile of scores. The manual provides interpretive guidelines for specific profiles. The computerized scoring report profiles scores, makes diagnostic suggestions and treatment recommendations, and lists specific clinical themes including: 1) Doubts About Perceptual Accuracy, 2) Substance Abuse and Disorientation, 3) Irrational Beliefs, 4) Hostility and Self-Centeredness, 5) Mistrust and Humiliation, And 6) Appeasement and Dependency.

The measure has been used with different clinical populations including schizophrenics, eating disorder populations, substance abusers, criminal psychopaths, individuals with PTSD, and individuals with borderline personality disorder. BORRTI scores

---

**Acronym:** BORRTI

**Basic Description**

**Author(s):** Bell, Morris, D., Ph.D.

**Author Contact:**

Morris D. Bell  
VA Connecticut Healthcare System  
Psychology Service, 116-B, Campbell Ave.  
West Haven, CT, 06516

**Author Email:** Morris.Bell@Yale.edu

**Citation:** Bell, M.D. (1995) Bell Object Relations and Reality Testing Inventory (BORRTI) Manual. Los Angeles: Western Psychological Services.

**To Obtain:** Western Psychological Services  
12031 Wilshire Blvd.  
Los Angeles, CA 90025-1251  
Phone: 800-648-8857  
Fax: 310-478-7838

**E-mail:** help@wpspublish.com.


**Cost per copy (in US $):** $1.93

**Copyright:** Yes

**Description:**

The BORRTI is a widely used measure designed to evaluate individuals for personality and thought disorders. It provides information regarding the “respondent’s ability to sustain essential relationships and accurately identify internal and external reality.”

It yields scores on four object relations scales: 1) Alienation, 2) Insecure Attachment, 3) Egocentricity, and 4) Social Incompetence. The 45 Object Relations items can be administered separately (Form O). The measure also yields scores on three Reality Testing subscales: 1) Reality Distortion, 2) Uncertainty of Perception, and 3) Hallucinations and Delusions.

The measure includes several validity checks, including an inconsistent responding scale. Interpretation of scores is done by looking at the profile of scores. The manual provides interpretive guidelines for specific profiles. The computerized scoring report profiles scores, makes diagnostic suggestions and treatment recommendations, and lists specific clinical themes including: 1) Doubts About Perceptual Accuracy, 2) Substance Abuse and Disorientation, 3) Irrational Beliefs, 4) Hostility and Self-Centeredness, 5) Mistrust and Humiliation, And 6) Appeasement and Dependency.

The measure has been used with different clinical populations including schizophrenics, eating disorder populations, substance abusers, criminal psychopaths, individuals with PTSD, and individuals with borderline personality disorder. BORRTI scores
have also been found to be associated with the quality of the therapeutic relationship.

Representative content from the BORRTI copyright (c) 1995 by Western Psychological Services. Reprinted for reference within the NCTSN Measure Review Database by permission of the publisher, WPS, 12031 Wilshire Boulevard, Los Angeles, CA 90025, www.wpspublish.com. All rights reserved.

**Theoretical Orientation**

**Summary:**

**Domains Assessed:**

1. Personal / interpersonal functioning (child)
2. Validity (child)
3. Trauma-related alterations of expectancies/attitude
4. Comorbid disorder(s)(child)
5. Personal/interpersonal functioning (cgiver)
6. Trauma-related alterations of expectancies/attitude

**Languages Available:** Dutch, English, French, German, Italian, Japanese, Korean, Portuguese, Slovene, Swedish

**Age Range:** 11.0 - 99.0

**# of Items:** 90

**Measure Type:** In-depth assessment

**Measure Format:** Questionnaire

**Time to Complete (min):** 15

**Reporter:** Self

**Time to Score (min):** 5

**Education Level:** 6.00

**Periodicity:** Not reported

**Response Format:** True/False

**Materials Needed:**

- Paper and pencil
- Computer
- Video equipment

**Material Notes:** Materials Needed: 1) Manual, and 2) Form

Materials offered through WPS (as of 6/05) include:

1. Kit: $115 (Includes 20 Full Form Autoscore Forms, 2 WPS Test Report Prepaid BORRTI (Full Form) Mail-In Answer Sheets, Manual.)
2. Full Form Autoscore Form (pkg/20): $38.50 (Pricing is based on the purchase of this item.)
4. WPS Test Report Computerized Components & Fax Scoring service is also available.

The manual indicates that because subscales are calculated using factor scores, scoring needs to be done using a computer or through the WPS Test Report Service. However, the test can be scored using the AutoScore Answer form.
While the items can be read aloud to those with visual impairments or inadequate reading skills, the manual cautions that respondents should be fluent in English because there are idiomatic expressions that are not well understood by foreign-born English speakers. In addition, the measure should not be used with those with severe intellectual impairment.

The manual notes that although the norms are for ages 18 and older in non-clinical settings, the measure has been administered to students in junior high school, high school, college, and graduate school, and has been used with a variety of patient populations. For this reason, in this review, we give the age range as beginning at age 11.

### Sample Items:

<table>
<thead>
<tr>
<th>Domains</th>
<th>Scale</th>
<th>Sample Items</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Object Relations</strong></td>
<td>Alienation</td>
<td>It is hard for me to get close to anyone. (T)</td>
</tr>
<tr>
<td></td>
<td>Insecure Attachment</td>
<td>I feel that I have to please everyone or else they may reject me. (T)</td>
</tr>
<tr>
<td><strong>Egocentricity</strong></td>
<td></td>
<td>People are never honest with each other. (T)</td>
</tr>
<tr>
<td>**Social Incompetence</td>
<td>Reality Testing</td>
<td>Making friends is not a problem for me. (F)</td>
</tr>
<tr>
<td><strong>Reality Distortion</strong></td>
<td></td>
<td>People are often angry with me whether they admit it or not. (T)</td>
</tr>
<tr>
<td><strong>Uncertainty of Perception</strong></td>
<td></td>
<td>I experience anxious feelings which I cannot explain. (T)</td>
</tr>
<tr>
<td><strong>Hallucinations and Delusions</strong></td>
<td></td>
<td>I can hear voices that other people cannot seem to hear. (T)</td>
</tr>
</tbody>
</table>

### Notes (additional scales and domains):

The measure also has validity checks, including an inconsistent responding scale and two validity indexes: 1) FREQ, and 2) INFREQ.

Representative content from the BORRTI copyright (c) 1995 by Western Psychological Services. Reprinted for reference within the NCTSN Measure Review Database by permission of the publisher, WPS, 12031 Wilshire Boulevard, Los Angeles, CA 90025, www.wpspublish.com. All rights reserved.

### Information Provided: (check all that apply)

- Diagnostic information DSM-III: Yes
- Diagnostic information DSM-IV: Yes
- Strengths: Yes
- Areas of concerns/risks: Yes
- Program evaluation information: Yes
- Continuous assessment: Yes
- Raw Scores: Yes
- Standard Scores: Yes
- Percentile: Yes
- Graph (e.g., of elevated scale): Yes
- Dichotomous assessment: Yes
- Clinical friendly assessment: Yes
- Written feedback: Yes
- Other: Yes

### Training

- Training to Administer:
  - None: Yes
  - Must be a psychologist: Yes
  - Via manual/video: Yes
  - Training by experienced clinician (<4 hours): Yes
  - Prior experience psych testing & interpretation: Yes
  - Training by experienced clinician (≥4 hours): Yes
Parallel or Alternate Forms

- Parallel Forms?: No
- Alternate Forms?: No
- Forms for Different Ages?: Yes
- If so, are forms comparable?: Yes

Any Altered Versions of Measure:

- Describe:
  A shortened version of the BORRTI (called Form O) that contains only the 45 object relations items can be obtained. There is also a version of Form O, specifically designed for adolescents, titled the Bell Relationship Inventory for Adolescents (BRIA), also reviewed in this database. While the BORRTI has and can be used with adolescents, the BRIA may be more appropriate.

Population Used to Develop Measure

- See Notes under “Norms.” No data regarding ethnicity or socioeconomic status of the development sample was reported.

Psychometrics

- Global Rating (scale based on Hudall Stamm, 1996):
  Psychometrically matured, used in multiple peer reviewed articles by different people

Norms:

- Yes
- For separate age groups: No
- For clinical populations: No
- Separate for men and women: No
- For other demographic groups: No

Notes:

- Norms developed with 934 individuals recruited from nonclinical settings including universities and community organizations. No specific details regarding this population's ethnic composition or socioeconomic status are provided, but, given the population, it would appear the majority were college educated.

Clinical Cutoffs:

- Yes

Specify Cutoffs:

- Inconsistent Responding: contradictory responses on > 3 item pairs.
  FREQ score should be > 8 if any subscale is 70T or greater.
  On all other scales, scores > 60T.

Used in Major Studies:

- Specify Studies:
Reliability:

<table>
<thead>
<tr>
<th>Type</th>
<th>Rating</th>
<th>Statistics</th>
<th>Min</th>
<th>Max</th>
<th>Avg</th>
</tr>
</thead>
<tbody>
<tr>
<td>Test-Retest-# days:</td>
<td>Acceptable</td>
<td>r</td>
<td>0.58</td>
<td>0.9</td>
<td>0.76</td>
</tr>
<tr>
<td>Internal Consistency:</td>
<td>Acceptable</td>
<td>alpha</td>
<td>0.78</td>
<td>0.9</td>
<td>0.83</td>
</tr>
<tr>
<td>Inter-Rater:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parallel/Alternate Forms:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Notes:

From the manual, Bell (1995)

TEST-RETEST RELIABILITY
Reported in the manual for 4-week, 13-week, and 26-week periods. The 4-week reliability data were gathered from a mixed diagnosis psychiatric sample who were undergoing treatment. Reliability scores were as follows: Alienation=.88, Insecure Attachment=.73, Egocentricity=.90, Social Incompetence=.58, Reality Distortion=.63, Uncertainty of Perception=.74, Hallucinations and Delusions=.89.

INTERNAL CONSISTENCY (alpha)
Alienation=.90, Insecure Attachment=.82, Egocentricity=.78, Social Incompetence=.79, Reality Distortion=.87, Uncertainty of Perception=.82, Hallucinations and Delusions=.85.

Internal consistency was also assessed using Spearman split-half reliability and yielded similar reliability scores as Cronbach's alpha (range .77-.90).

Content Validity:

#Error

Construct Validity: (check all that apply)

<table>
<thead>
<tr>
<th>Validity Type</th>
<th>Not known</th>
<th>Not found</th>
<th>Nonclinical Samples</th>
<th>Clinical Samples</th>
<th>Diverse Samples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Convergent/Concurrent</td>
<td></td>
<td></td>
<td>Yes</td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>Discriminant</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td>Sensitive to Change</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Intervention Effects</td>
<td></td>
<td></td>
<td></td>
<td>Yes</td>
<td></td>
</tr>
<tr>
<td>Longitudinal/Maturation Effects</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td>Sensitive to Theoretically Distinct Groups</td>
<td></td>
<td></td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Factorial Validity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Notes:

The measure discriminates among patients with borderline personality disorder, other personality disorders, psychosis, and affective disorders. Nonclinical students also scored lower than all clinical populations. In a study of criminal psychopaths, BORRTI subscale scores were related to scores on the Psychopathy Checklist Screening Version and to a history of child abuse (Brody & Rosenfeld, 2002).

In a study of undergraduate women, BORRTI scores, specifically on Alienation and Egocentricity, were related to physiological reactivity during active coping (Kelsey, Ornduff, Reiff, & Arthur, 2002). Scales have been found to be associated with clients' ability to develop a therapeutic alliance and with the quality of the therapeutic relationship (Mallinckrodt, Porter, & Kivlighan, 2005).
The BORRTI has been used with individuals with PTSD symptoms. PTSD symptomatology among emergency workers, assessed using the Impact of Events Scale, was positively correlated with scores on the alienation, insecurity, and egocentricity subscales of the BORRTI (Regehr, Goldberg, Glancy, & Knott, 2002). A history of childhood physical and childhood sexual abuse has been associated with elevations on BORRTI subscales (Ornduff, Kelsey, O’Leary, 2001). Among males who experienced child sexual abuse BORRTI scores were related to aspects of the abuse, including perpetrator’s gender and perpetrator’s relationship to the victim (Morrell, Mendel, & Fischer, 2001).

The measure was developed using factor analysis (see “Content Validity”).

Haviland, Sonne, & Woods (1995) used the BORRTI with adolescents aged 11-19 at a residential school and found that BORRTI scores were associated with scores on the Child Post-Traumatic Stress Disorder Reaction Index, the Children’s Depression Inventory, and the Revised Children’s Manifest Anxiety Scale. Alienation, Egocentricity, and Social Incompetence scores were negatively correlated with age of onset of last abusive episode they had experienced.

Regehr & Marziali (1999) administered the BORRTI to a sample of women aged 17-47 who had been raped and found that BORRTI scores were related to scores on the Posttraumatic Symptom Scale, the Beck Depression Inventory, and the Inventory of Interpersonal Problems.

A Brazilian version of the BORRTI, developed through forward and back-translation, was factor analyzed, resulting in a 4-factor solution similar to that found in the English sample. The measure also showed good internal consistency and test-retest reliability, and was able to distinguish between a Brazilian normal sample and a Brazilian schizophrenic sample (Bell & Bruscato, 2002; Bruscato & Iacoponi, 2000).

Criterion Validity: (check all that apply)

<table>
<thead>
<tr>
<th>Measures used as criterion:</th>
<th>Not known</th>
<th>Not found</th>
<th>Nonclinical Samples</th>
<th>Clinical Samples</th>
<th>Diverse Samples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Predictive Validity:</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Postdictive Validity:</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Sensitivity Rate(s): 0.85
Specificity Rate(s): 0.75
Positive Predictive Power: 0.88
Negative Predictive Power: 0.71

Notes: Bell, Billington, Cicchetti, & Gibbons (1988) examined the sensitivity and specificity of the Object Relations subscales looking at how individuals with a diagnosis of borderline personality disorder scored compared to other groups of psychiatric patients. Rates are given using alienation cut scores (>60T) and comparing patients with a borderline personality disorder diagnosis to those with affective disorder diagnosis. Good rates were also found looking at...
Insecure Attachment and comparing diagnosis of BPD with diagnosis of schizophrenia and mixed affective and psychotic features.

Limitations of Psychometrics and Other Comments Regarding Psychometrics:
While multiple aspects of the psychometric properties of the measure have been examined and established, the measure has not been widely used with measures of diverse ethnic groups including African-Americans and Latinos in the U.S. More research is needed including these and other groups.

Consumer Satisfaction
No information regarding consumer satisfaction.

Languages Other than English

<table>
<thead>
<tr>
<th>Language</th>
<th>Translation Quality (check all that apply)</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Portuguese</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Slovene</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dutch</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>French</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Japanese</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Korean</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Swedish</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>German</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Italian</td>
<td>Yes</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Use with Trauma Populations

Populations for which measure has demonstrated evidence of reliability and validity:

<table>
<thead>
<tr>
<th>Yes</th>
<th>Physical abuse</th>
<th>Natural disaster</th>
<th>Terrorism</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>Sexual abuse</td>
<td>Accidents</td>
<td>Immigration related trauma</td>
</tr>
<tr>
<td></td>
<td>Neglect</td>
<td>Imprisonment</td>
<td>Kidnapping/hostage</td>
</tr>
<tr>
<td></td>
<td>Domestic Violence</td>
<td>Witness death</td>
<td>Traumatic loss (death)</td>
</tr>
<tr>
<td></td>
<td>Community violence</td>
<td>Assault</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>Medical trauma</td>
<td>War/combat</td>
<td>Other</td>
</tr>
</tbody>
</table>
Use with Diverse Populations

USE WITH DIVERSE POPULATIONS RATING SCALE
1. Measure is known (personal communication, conference presentation) to have been used with members of this group.
2=Studies in peer-reviewed journals have included members of this group who have completed the measure.
3=Measures have been found to be reliable with this group.
4=Psychometric properties well established with this group.
5=Norms are available for this group (or norms include a significant proportion of individuals from this group)
6=Measure was developed specifically for this group.

<table>
<thead>
<tr>
<th>Population Type</th>
<th>Degree of Usage: (check all that apply)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Developmental disability</td>
<td>1 2 3 4 5 6</td>
</tr>
<tr>
<td>2. Disabilities</td>
<td></td>
</tr>
<tr>
<td>3. Lower socio-economic status</td>
<td></td>
</tr>
<tr>
<td>4. Rural populations</td>
<td></td>
</tr>
<tr>
<td>5. Methadone maintenance patients</td>
<td>Yes Yes</td>
</tr>
<tr>
<td>6. Inpatients and outpatients with borderline personality disorder</td>
<td>Yes Yes</td>
</tr>
</tbody>
</table>
3. While the measure can be used with those 11 and older, the measure was not normed for adolescents, and the BRIA may be a more appropriate measure for that age group.

4. The measure is long and does not tap domains that are traditionally assessed in trauma populations, so adding this measure (while potentially important) would constitute additional burden to participants and clinicians. However, Form O is half the length and may be useful in situations where object relations issues are of concern.
Published References:

The manual is:

A PsychInfo literature search (6/05) for “Bell Object Relations and Reality Testing Inventory” or “BORRTI” anywhere revealed that the measure has been referenced in 46 peer-reviewed journals. Below is a sampling of these references:


Other Related References


Unpublished References:
A PsychInfo literature search (6/05) for “Bell Object Relations and Reality Testing Inventory” or “BORTTI” anywhere revealed that the measure has been referenced in 0 conferences and 47 unpublished dissertations.

| Number of Published References: | 46 |
| Number of Unpublished References: | 47 |

The author provided comments on the review, which were integrated.

Citation for Review: Chandra Ghosh Ippen, Ph.D.
Editor of Review: Chandra Ghosh Ippen, Ph.D.
Last Updated: 6/2/2005
PDF Available: yes

This project was funded by the Substance Abuse and Mental Health Services Administration (SAMHSA), U.S. Department of Health and Human Services (HHS). The views, policies and opinions expressed are those of the authors and do not necessarily reflect those of SAMHSA or HHS.