



## Customer Service Inventory

### Overview

Determining which individuals possess the behavioral styles associated with effective work behaviors is critical to successful employee selection and development. Research has shown that for many types of jobs, the behavioral styles of employees are as important as cognitive ability. How do you determine whether an individual has the right behavioral style for your job?

The **Customer Service Inventory (CSI)** is a state-of-the-art tool that assesses the work styles of job applicants and employees in customer service support roles. The scales have been specifically designed for Customer Services Representatives, have been linked to O\*NET, and legitimacy verified by job analysis. Furthermore, the CSI has job relevant norms collected from customer service representatives.

In addition to the CSI's personality scales it also has sophisticated measures of response distortion to detect faking. Faking has become a concern in personality self-assessments thus; the CSI has identified three scales to detect faking: Accurate Self-Assessment, Accurate Self-Presentation, and Response Inconsistency. Accurate Self-Presentation measures the test-takers' tendency to intentionally distort their responses, usually in an effort to obtain higher scores on certain scales. Accurate Self-Presentation measures a test-taker's tendency to inflate their scores on personality measures because they truly view themselves in a highly favorable manner and are reluctant to admit to personal limitations. Response Inconsistency measures the variations in responses which can detect either faking or inattentiveness.

### Reliability

The median reliability of the CSI scales is .84 with a range from .78 to .88. Generally, most personality instruments (such as the California Personality Inventory or the Hogan Personality Inventory) tend to have median reliabilities across their scales of .75. This indicates the CSI scales have higher internal consistency than the average personality test. Table 1 in the appendix presents the analysis for the reliability from 532 cases.

### Validity

The CSI has also proven that it differentiates between high and low performers. In one extensive study spanning 2 years the Overall Work Effectiveness scale for the CSI had validities of .24 and .38 in two samples (average validity of other instruments of this nature is .2). Table 2 and 3 present the results of this analysis. Table 2 represents correlations of CSI results of customer service representatives with job performance ratings demonstrating a validity coefficient of .24 with Overall Work Effectiveness (N=105). Table 3 represents correlations of CSI data from the same table 2 sample with job performance ratings gathered two years later from the same customer service individual's demonstrating a validity coefficient of .38 with Overall Work Effectiveness (N=62).

The scales of the CSI also demonstrate convergent and discriminant Validities with other related CSI related scales. For example the Hogan Personality Inventory (HPI) correlates with CSI scales at .62-.74. The Occupational Personality Questionnaire (OPQ) correlates with the CSI scales at .53-.73. Additionally, Paulhus's Self-Deceptive Enhancement & Impression Management correlates with the CSI Self-Perception scales at -.78.

The CSI is also **legally defensible**. The CSI far exceeds the APA standard requirements to be considered reliable and valid. Its scales have been identified in customer service representative job analysis and is in alignment with the work styles identified by O\*NET. Furthermore, the CSI has no demonstrated adverse impact on federally protected groups.



**Table 1**  
**Internal Reliability**  
(N=532)

<b>CSI Scales</b>	<b>Alpha Reliability</b>	<b>Mean Score</b>	<b>Standard Deviation</b>	<b>Mean Inter-item Correlation</b>	<b>Standard Error of Measurement</b>
Sociability	.89	33.98	7.44	.44	2.47
Energy	.81	34.74	5.99	.30	2.61
Cooperation	.79	37.89	5.12	.28	2.35
Concern for Others	.85	39.35	5.59	.38	2.16
Diplomacy	.78	37.62	5.14	.27	2.41
Adaptability	.86	33.69	6.20	.38	2.32
Analytical Thinking	.87	39.06	5.97	.40	2.15
Achievement	.83	37.26	5.82	.32	2.40
Initiative	.81	37.13	5.51	.32	2.40
Attention to Detail	.88	38.23	6.40	.43	2.22
Dependability	.84	48.39	6.44	.31	2.58
Self-Control	.85	37.67	6.08	.37	2.35
Stress Tolerance	.86	33.46	6.85	.39	2.56
Accurate Self-Assessment	.83	36.61	7.75	.25	3.20
Accurate Self-Presentation	.85	28.22	7.53	.32	2.92
Response Inconsistency	.86	15.54	6.49	.19	2.43
Retention	.84	39.18	6.52	.30	2.46

**Table 2**  
**Concurrent Validity for Customer Service Reps**  
 Correlations of CSI Scales with Job Performance Ratings for Customer Service Reps, N=105

<b>CSI Scale</b>	Energy	Cooperation	Diplomacy	Attention to Detail	Stress Tolerance	Excellence	Customer Care	Leadership	Integrity	Teamwork	Sum of 8 Ratings <sup>1</sup>
1. Sociability	.09	.16	.16	.11	.03	.16	.07	.14	.08	.16	.15
2. Energy	.21*	.16	.11	.16	.02	.18	.17	.22*	.13	.13	.20*
3. Cooperation	.08	.17	.16	.08	-.02	.05	.06	.16	.13	.12	.13
4. Diplomacy	.00	.06	.07	.01	-.03	-.01	.10	.02	.08	.11	.05
5. Adaptability	.07	.16	.15	.05	.00	.05	.11	.13	.13	.18	.13
6. Analytical Thinking	.08	.14	.09	.17	-.01	.13	.14	.19	.09	.19	.16
7. Independence	.11	.10	.08	.17	.11	.19	.11	.11	.13	.25*	.16
8. Achievement Orientation	.21*	.20*	.13	.21*	.12	.21*	.12	.22*	.03	.18	.22*
9. Initiative	.19	.23*	.19	.18	.03	.15	.13	.23*	.12	.23*	.22*
10. Attention to Detail	.06	.14	.09	.22*	-.06	.11	.07	.01	.13	.11	.12
11. Stress Tolerance	.12	.06	.13	.09	.03	.08	.10	.06	.09	.09	.11
12. Self Confidence	.11	.13	.18	.08	.10	.10	.09	.05	.07	.11	.12
13. Emotional Self-Awareness	.01	.08	.19	.09	-.02	.10	.06	.11	.13	.17	.12
14. Accurate Self-Assessment	-.03	-.09	-.11	-.09	-.02	-.02	-.01	.01	-.13	-.11	-.07
15. Accurate Self Presentation	-.01	-.06	-.10	-.03	.05	.03	-.05	-.03	-.13	-.11	-.05
16. Composite Score - 6	.22*	.23*	.15	.21*	.05	.23*	.17	.29**	.08	.21*	.25**
17. Composite Score - 7	.20*	.23*	.17	.20*	.03	.21*	.16	.24	.11	.21*	.24*

\* Correlation is significant at the .05 level 1-tailed.

\*\* Correlation is significant at the .01 level 1-tailed.

**Table 3**  
**Predictive Validities for Customer Service Reps**

Correlations of CSI Scales with Job Performance Ratings two years later, N=62

CSI Scale	Job Performance Ratings by Supervisors																		
	Energy	Cooperation	Diplomacy	Attention to Detail	Stress Tolerance	Excellence	Customer Care	Leadership	Integrity	Teamwork	Attendance & Tardiness	Blue Pumpkin Schedule	Timely Follow up	Average AHT	Call Coach Monitoring	Envi-sion Monitoring	Sum 8 Ratings <sup>1</sup>	Sum 4 Ratings <sup>2</sup>	Sum 12 Ratings <sup>3</sup>
1. Sociability	.15	.14	.15	.28*	.12	.18	.10	.20	.04	.20	-.14	.19	.17	.15	.16	.11	.23	.19	.26*
2. Energy	.37**	.26*	.34**	.45**	.20	.34**	.33**	.35**	.23	.32*	.10	.19	.39**	.24	.35**	.31*	.41**	.38**	.42**
3. Cooperation	.07	.07	.16	.24	-.08	.12	.14	.14	.10	.17	-.14	.08	.23	.12	.14	.10	.15	.16	.21
4. Diplomacy	-.01	.06	.13	.12	.09	.13	.15	.00	.17	.17	-.01	.04	.24	-.09	.01	-.06	.15	.05	.12
5. Adaptability	.15	.15	.17	.26*	.12	.17	.26*	.14	.17	.23	-.10	.10	.21	.07	.14	.12	.25	.17	.26*
6. Analytical Thinking	.05	.00	.03	.22	-.04	.12	.18	.03	.05	.15	-.13	-.08	.14	-.01	.13	.04	.13	.10	.15
7. Independence	.09	.07	.04	.24	.05	.19	.24	.09	.29*	.23	.02	-.13	.19	-.16	.14	.18	.18	.09	.17
8. Achievement Orientation	.34**	.22	.24	.36**	.24	.25*	.27*	.36**	.11	.31*	-.01	.21	.37**	.28*	.27*	.13	.38**	.33**	.39**
9. Initiative	.24	.13	.24	.36**	.07	.26*	.31*	.25	.09	.26*	-.15	.11	.29*	.14	.20	.13	.30*	.23	.30*
10. Attention to Detail	.14	.14	.30*	.32*	.16	.31*	.34**	.26*	.31*	.34**	.06	.15	.34**	.09	.24	.20	.31*	.25	.30*
11. Stress Tolerance	.11	.25	.16	.21	.29*	.18	.14	.18	.19	.27*	.22	.28*	.28*	.22	.24	.21	.22	.29*	.25
12. Self Confidence	.14	.26*	.12	.29*	.24	.25	.22	.17	.26*	.26*	.09	.18	.30*	.28*	.29*	.16	.28*	.32*	.34**
13. Emotional Self-Awareness	-.05	.08	.28*	.29*	.10	.23	.21	.09	.18	.26*	-.07	-.02	.18	.06	.09	.07	.18	.12	.15
14. Accurate Self-Assessment	-.14	-.14	-.16	-.20	-.07	-.26*	-.20	-.07	-.20	-.18	-.09	-.03	-.27*	-.14	-.27*	-.17	-.22	-.25	-.27*
15. Accurate Self Presentation	-.17	-.17	-.25	-.23	-.14	-.26*	-.22	-.06	-.36**	-.30*	-.23	-.18	-.36**	-.10	-.31*	-.25*	-.23	-.28*	-.24
16. Composite Score - 6	.28*	.16	.23	.41**	.15	.23	.26*	.32*	.08	.29*	-.13	.18	.29*	.18	.23	.15	.34**	.26*	.34**
17. Composite Score - 7	.30*	.21	.29*	.43**	.20	.28*	.32*	.36**	.16	.34**	-.10	.23	.34**	.20	.25	.19	.38**	.30*	.38**

\* Correlation is significant at the .05 level 1-tailed.

\*\* Correlation is significant at the .01 level 1-tailed.