

Psychometric Properties of the Social Competence Scale - Teacher and Parent Ratings

Table of Contents

- I. Data Files Used
- II. Scale Description
- III. Assessment Schedule
- IV. Scale Derivation
- V. Scoring Recommendations
- VI. Subscales, means, SDs, reliability, and missing data
- VII. Subscale Correlations

Appendices

- A. Output from SAS PROC UNIVARIATE
- B. Item intercorrelations
- C. Copies of the measures
- D. Missing Data
- E. SAS program to create derived variable dataset

Data files used: Analyses were conducted on the Normative and High Risk Samples of Cohort 1. Teacher ratings were collected in the Spring of the kindergarten year and parent ratings were collected in the summer following kindergarten. Data files were: xT1B1.SSD and xP1D1.SSD.

Scale Description: The Social Competence Scale includes a form for teachers and a form for parents. The Teacher scale (SCT) is a 25-item measure that was developed for this project. The scale includes items assessing prosocial behaviors/communication skills (9 items), emotion regulation skills (9 items), and academic behaviors (7 items) targeted in the intervention. Teachers rate each item on a five point Likert scale, according to how well it characterizes the behavior of each child (0 = not at all, 1 = a little, 2 = moderately well, 3 = well, and 4 = very well). The Parent version of this scale (SCP) is comprised of 12 items, assessing prosocial behaviors/communication skills (5 items) and emotion regulation skills (7 items). The items on the SCP represent a subset of the items on the SCT.

In the construction of the SCT and SCP, items were drawn from already existing measures, including 8 items from the Health Resources Inventory (HRI; Gesten, 1976), 5 items similar to those on the Teacher Rating of Social Skills - Teacher (TROSS; Clark, Gresham & Elliott, 1985) and four items from the Self Control Rating Scale (Kendall & Wilcox, 1979). In addition, some items were developed to assess specific prosocial, communication and emotion regulation skills targeted in the intervention.

Assessment schedule: In the FAST Track study, the SCT was administered in the Spring to teachers, as part of the packet of rating forms that they were asked to complete on target children.

It was administered to parents as part of the summer interview; an interviewer read each item to the primary caregiver, who responded by giving a rating.

The administration of this instrument varied by cohort. It was administered to children in the Normative sample and to children in all three cohorts of the High Risk sample in the spring of the kindergarten year (SCT) and the summer after kindergarten (SCP).

CHECK: Need to report the rest of the administration schedule.

Scale Derivation

SCP - Parent ratings:

SCT - Teacher ratings: The kindergarten teacher ratings on the SCT for children in the Normative sample were submitted to an exploratory principal component factor analysis with Varimax rotation. Eigenvalues of 17.9 and 1.27 were shown on the first two factors. Nineteen items, including all of the items designed to assess prosocial/communication skills and emotion regulation skills loaded on the first factor (2,3,6,7,8,9,11,12,13,14,15,16,18,19,21,22,23,24,25). Six items assessing task orientation and academic behavior (1,4,5,10,17,21) with a range of loadings from .71 - .83. Six of the prosocial and emotional regulation items also loaded on this second factor (as well as on the first factor).

Internal consistencies of each of these factors were high (.97 for the Prosocial/Emotion Regulation Skills factor and .96 for Task Orientation). These two factors were highly intercorrelated ($r = .83$) and between subscale correlations were not consistently lower than within subscale correlations, suggesting that the scale could be interpreted as reflecting a global dimension of social competence at school, reflection prosocial, emotional, and academic competencies. The internal consistency of the total scale was .96.

Items from the Parent version - SCP

Prosocial/Communication Skills

- 4. Resolves peer problems
- 7. Understands others
- 9. Shares
- 10. Helpful
- 11. Listens
- 12. Suggests w/o bossiness

Emotion Regulation Skills

- 1. Accepts things
- 2. Copes with failure
- 3. Thinks before acting
- 5. Can calm down
- 6. Does what told
- 8. Controls temper

Items from the Teacher version - SCT

Prosocial/Communication Skills

- 9. Resolves peer problems

Emotion Regulation Skills

- 2. Accepts things

- 13. Understands others
- 19. Shares materials
- 20. Cooperates
- 22. Helpful
- 23. Listens to others
- 24. Suggests w/o bossiness
- 25. Friendly

- 3. Copes with failure
- 6. Accepts limits
- 7. Expresses needs
- 8. Thinks before acting
- 11. Can calm down
- 12. Can wait in line
- 14. Aware of effects
- 16. Plays by rules
- 18. Controls temper

Academic Behavior Skills

- 1. Functions well w/ distractions
- 4. Is a self-starter
- 5. Works well w/o adults
- 10. Stays on task
- 15. Works well in a group
- 17. Pays attention
- 21. Follows teacher directions

Scoring Decisions and Derived Variables:

Subscales, means, SDs, and reliability

Information about scale characteristics is presented in the attached Tables.

Tables:

**N, Missing Data, Scale Means, Standard Deviations, Alpha
For**

- 1) Parent Prosocial-Communication Skills**
- 2) Parent Emotion Regulation Skills**
- 3) Parent Total**
- 4) Teacher Academic Skills**
- 5) Teacher Prosocial-Communication Skills**
- 6) Teacher Emotion Regulation Skills**
- 7) Teacher Prosocial & Emotion Regulation Skills**
- 8) Teacher Total**

Variable: **P1DSCPRO**

Prosocial/Comm. Skills - SC_P - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	618	0	15.29	4.48	0.803	155	0	14.23	4.45	0.776	155	0	13.78	4.12	0.759	387	0	16.00	4.47	0.810
DURH	164	0	14.63	5.05	0.836	39	0	13.28	4.99	0.826	39	0	13.26	4.68	0.805	100	0	15.53	5.08	0.842
NASH	146	0	14.60	4.61	0.780	41	0	14.37	4.14	0.712	40	0	13.23	4.53	0.774	100	0	14.77	4.87	0.808
PENN	164	0	15.85	3.92	0.791	40	0	14.43	3.92	0.738	40	0	14.03	3.74	0.746	98	0	17.09	3.44	0.764
WASH	144	0	16.08	4.07	0.770	35	0	14.89	4.75	0.802	36	0	14.69	3.26	0.660	89	0	16.70	3.89	0.754

Variable: **P1DSCREG**

Emotional Reg. Skills - SC_P - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	618	0	11.58	4.41	0.780	155	0	10.43	4.08	0.710	155	0	9.51	3.67	0.671	387	0	12.45	4.47	0.798
DURH	164	0	12.04	4.76	0.796	39	0	9.87	4.26	0.741	39	0	10.95	3.73	0.602	100	0	13.28	4.85	0.813
NASH	146	0	10.86	4.38	0.747	41	0	10.68	4.74	0.776	40	0	8.75	3.26	0.534	100	0	10.99	4.30	0.738
PENN	164	0	11.43	3.83	0.774	40	0	10.38	3.77	0.756	40	0	9.28	3.60	0.728	98	0	12.66	3.42	0.729
WASH	144	0	11.95	4.58	0.795	35	0	10.83	3.43	0.462	36	0	9.06	3.82	0.746	89	0	12.94	4.90	0.849

Variable: **P1DSCTOT**

Total of all Variables - SC_P - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	618	0	26.87	8.11	0.867	155	0	24.66	7.87	0.848	155	0	23.29	6.71	0.797	387	0	28.45	8.09	0.871
DURH	164	0	26.67	9.01	0.884	39	0	23.15	8.35	0.860	39	0	24.21	7.46	0.814	100	0	28.81	9.21	0.894
NASH	146	0	25.47	8.26	0.857	41	0	25.05	8.37	0.858	40	0	21.98	6.67	0.768	100	0	25.76	8.36	0.860
PENN	164	0	27.29	7.06	0.862	40	0	24.80	7.17	0.854	40	0	23.30	6.47	0.820	98	0	29.76	5.90	0.813
WASH	144	0	28.03	7.84	0.859	35	0	25.71	7.57	0.811	36	0	23.75	6.19	0.798	89	0	29.64	7.95	0.871

Variable: **T1BSCACA**

Academic Skills - SC_T - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	532	0	12.61	7.72	0.957	139	0	9.89	6.27	0.927	144	0	8.81	5.34	0.910	324	0	14.55	8.04	0.963
DURH	140	0	10.98	7.34	0.944	37	0	9.05	4.84	0.887	33	0	6.24	3.83	0.789	83	0	13.06	8.12	0.954
NASH	119	0	10.85	6.65	0.931	32	0	9.72	5.88	0.878	37	0	8.58	4.61	0.866	83	0	11.38	7.01	0.948
PENN	153	0	14.76	7.81	0.965	40	0	11.58	7.14	0.953	40	0	10.05	6.55	0.955	87	0	17.55	7.39	0.965
WASH	120	0	13.50	8.26	0.971	30	0	8.87	6.83	0.956	34	0	10.09	5.05	0.903	71	0	16.34	8.22	0.973

Variable: **T1BSCPRO**

Prosocial/Comm. Skills - SC_T - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	532	0	15.65	7.80	0.956	139	0	12.61	6.35	0.937	144	0	11.58	5.59	0.907	324	0	17.77	7.98	0.957
DURH	140	0	13.77	6.91	0.928	37	0	11.81	4.11	0.863	33	0	9.82	3.78	0.710	83	0	15.71	7.75	0.935
NASH	119	0	14.13	7.30	0.953	32	0	10.44	6.16	0.939	37	0	11.86	4.64	0.860	83	0	15.82	7.21	0.950
PENN	153	0	18.32	8.14	0.966	40	0	15.98	7.44	0.947	40	0	12.70	7.12	0.961	87	0	20.95	7.83	0.969
WASH	120	0	15.94	7.90	0.960	30	0	11.43	5.70	0.928	34	0	11.65	5.76	0.922	71	0	18.58	8.04	0.962

Variable: **T1BSCREG**

Emotional Reg. Skills - SC_T - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	532	0	18.51	10.16	0.957	139	0	14.34	7.74	0.921	144	0	12.59	6.99	0.907	324	0	21.56	10.47	0.961
DURH	140	0	16.18	9.39	0.937	37	0	13.06	5.33	0.834	33	0	9.61	5.97	0.833	83	0	19.18	10.27	0.945
NASH	119	0	16.38	9.34	0.954	32	0	12.63	7.86	0.925	37	0	13.00	6.13	0.887	83	0	18.12	9.53	0.959
PENN	153	0	21.53	10.46	0.964	40	0	18.06	8.79	0.938	40	0	13.63	8.27	0.947	87	0	25.52	10.14	0.967
WASH	120	0	19.49	10.38	0.963	30	0	12.80	7.29	0.924	34	0	13.82	6.61	0.900	71	0	23.52	10.27	0.963

Variable: **T1BSCPSR**

Prosoc + EmReg. Skills - SC_T - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	532	0	34.16	17.61	0.976	139	0	26.96	13.66	0.959	144	0	24.17	12.01	0.945	324	0	39.34	18.12	0.978
DURH	140	0	29.95	15.85	0.963	37	0	24.87	8.76	0.904	33	0	19.42	8.98	0.871	83	0	34.88	17.59	0.968
NASH	119	0	30.51	16.24	0.974	32	0	23.06	13.58	0.961	37	0	24.86	10.06	0.924	83	0	33.94	16.33	0.975
PENN	153	0	39.85	18.28	0.980	40	0	34.04	15.88	0.969	40	0	26.33	14.93	0.972	87	0	46.47	17.69	0.982
WASH	120	0	35.43	18.01	0.979	30	0	24.23	12.56	0.958	34	0	25.47	11.93	0.949	71	0	42.10	18.07	0.980

Variable: **T1BSCTOT**

Total of all Variables - SC_T - C1Y1

Site	All Groups					Intervention					Control					Norm				
	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha	N	Nmiss	Mean	Std. Dev.	Alpha
ALL	532	0	46.77	24.58	0.981	139	0	36.85	18.88	0.967	144	0	32.98	16.30	0.956	324	0	53.89	25.45	0.983
DURH	140	0	40.93	22.35	0.973	37	0	33.92	12.09	0.922	33	0	25.67	11.56	0.893	83	0	47.93	24.88	0.977
NASH	119	0	41.37	22.00	0.977	32	0	32.78	18.54	0.964	37	0	33.46	13.06	0.928	83	0	45.33	22.54	0.979
PENN	153	0	54.61	25.42	0.985	40	0	45.61	22.16	0.977	40	0	36.38	20.80	0.979	87	0	64.02	24.47	0.986
WASH	120	0	48.93	25.57	0.985	30	0	33.10	18.36	0.969	34	0	35.56	15.82	0.956	71	0	58.44	25.62	0.985