


April 2015

Identification of Sluggish Cognitive Tempo by Teachers

Rachel Meisinger
University of Northern Iowa

Copyright © 2015 Rachel Meisinger

Follow this and additional works at: <https://scholarworks.uni.edu/agss>

 Part of the [Psychology Commons](#), and the [Teacher Education and Professional Development Commons](#)

Let us know how access to this document benefits you

Meisinger, Rachel, "Identification of Sluggish Cognitive Tempo by Teachers" (2015). *Annual Graduate Student Symposium*. 11.
<https://scholarworks.uni.edu/agss/2015/all/11>

This Open Access Oral Presentation is brought to you for free and open access by the Graduate College at UNI ScholarWorks. It has been accepted for inclusion in Annual Graduate Student Symposium by an authorized administrator of UNI ScholarWorks. For more information, please contact scholarworks@uni.edu.

Identification of Sluggish Cognitive Tempo by Pre-Service Teachers

Rachel E. Meisinger

University of Northern Iowa

April 1, 2015

Overview

- Importance of early intervention
- Identification of childhood psychopathology
 - Role of teachers
 - Sluggish Cognitive Tempo (SCT)

Anderson et al., 2012; Bekle, 2004; Conduct Problems Prevention Research Group, 1992; King & Glascoe, 2003; Halfon et al., 2004; Herbert et al., 2004; Kos et al., 2004; Loe & Feldman, 2007; Norman & Malla, 2001; Piling, 2000; Sciotto et al., 2000; Snider et al., 2003; Young et al., 2001; Wang et al., 2002

Sluggish Cognitive Tempo

- Symptoms
 - Gets lost in own thoughts
 - Daydreams
 - Slow or delayed in completing tasks
 - Appears to sluggish and lethargic
 - Underactive
 - Lacks energy
- Related to:
 - Higher levels of internalizing behaviors
 - Withdrawal, anxiety, depression
 - Lower levels of externalizing behaviors
 - Defiant, disruptive, and aggressive behavior
 - Social impairment
 - Social withdrawal, passivity
 - Academic impairment
 - Lower competence in math, writing, and and reading

Barkley, 2013, 2014; Bauermeister et al., 2012; Becker & Langerberg, 2013; Carlson & Mann, 2002; Jacobson et al., 2012; Langberg et al., 2014; Lee et al., 2014; Marshall et al., 2014; Mikami et al., 2007; Shirbekk et al., 2011; Watabe et al., 2014

Relation Between ADHD & SCT

- ***Subtype of ADHD*** versus ***separate and distinct disorder***
- SCT is associated with unique:
 - Etiology
 - Demographic correlates
 - Developmental course
 - Types of impairment
 - Comorbidities

Barkley 2012, 2013, 2014; Beker, Fite, et al., 2014; Becker & Langberg, 2013; Becker, Luebbe, et al., 2014; Burns et al., 2013; Garner et al., 2010; Jacobson et al., 2009; Langberg et al., 2014; Lee et al., 2014; Marshall et al., 2014; McBurnett, 2010; McBurnett et al., 2014; Moruzzi et al., 2014; Penny et al., 2009; Reeves et al., 2007; Watabe et al., 2014; Willcutt et al., 2014

Identification of Mental Health Concerns by Teachers

- Teachers are in an excellent position to identify children with emotional and behavioral problems
 - Frequent interactions with children
 - Children complete less preferred and more effortful tasks at school
- Obstacles
 - High student-to-teacher ratios
 - Work approximately 52 hours per week
- Lack of training in childhood psychopathology
 - Most concerned about disruptive and externalizing behaviors
 - Perceive externalizing behaviors as having a worse prognosis

Anderson et al., 2012; Barkley, 1998; Beidel et al., 1999; Bekle, 2004; DeStefano et al., 1977; Goldring et al., 2013; Hartung et al., 2010; Herbert et al., 2004; Jacobson et al., 2012; Jerome et al., 1994; Kauffman et al., 1989; Kos et al., 2004; Loe & Feldman, 2007; Piling, 2000; Snider et al., 2003

Current Study

- Purpose: To examine pre-service teachers' knowledge and perceptions of SCT compared to two more well-known childhood disorders, ADHD and Social Phobia (SP)
- Hypotheses:
 - One
 - Problematic behaviors: ADHD > SP & SCT
 - Degree of concern: ADHD > SP > SCT
 - Unfavorable attitudes: ADHD > SP & SCT
 - Two
 - Refer to school psychologist or counselor : ADHD > SP = SCT
 - Benefit from an IEP or 504 Plan: ADHD > SP > SCT
 - Three
 - Knowledge of disorders: ADHD > SP > SCT

Method

- Participants
 - 161 Elementary Education Majors from UNI
 - Mean Age: 19.73 years
 - Mean semesters of classroom experience: 2.65 semesters
 - Mean number of childhood psychopathology classes: 2.55 classes
- \$10 Amazon gift card for participation

	Total	Percentage
Gender		
Female	148	91.9%
Male	13	8.1%
Education Level		
Freshman	52	32%
Sophomore	40	25%
Junior	26	16%
Senior	42	26%

Method

▣ Materials

▣ Vignettes: 3 vignettes were created for this study

- ▣ Describe three fourth-grade boys presenting with 1) SCT symptoms, 2) ADHD symptoms, or 3) SP symptoms in a classroom setting

SCT Vignette

*“Ben is a student who seems to be **off in his own world**. He is generally well behaved at school but he does not have many friends. During class you frequently catch him staring off into space and **daydreaming**. He has **fallen asleep in class** on several occasions. Most times when you call on him in class, you have to repeat the question and it seems to take him an **extra second to process** what you are asking. He is always **one of the last students to complete assignments and tests**. His grades are below average, but he is not failing. At recess, he **does not run and play** with the other children in the class.”*

Method

▣ Materials

- ▣ Vignettes: 3 vignettes were created for this study
 - ▣ Describe three fourth-grade boys presenting with 1) SCT symptoms, 2) ADHD symptoms, or 3) SP symptoms in a classroom setting

ADHD Vignette

*“Alex is a student who is usually eager to please his teacher. However, other students often get frustrated with Alex because he is **always on the go** and never seems to take a break.*

*He **quickly loses interest** in activities and games during free time and recess, and is constantly darting from one activity to the next. He has a **hard time sitting still** during class and he is always **squirming and fidgeting** in his seat. In addition, he **talks out of turn** a lot and often **yells out the answers** before other students have a chance to raise their hands.*

He has below average grades.”

Method

- ▣ Materials
 - ▣ Vignettes: 3 vignettes were created for this study
 - ▣ Describe three fourth-grade boys presenting with 1) SCT symptoms, 2) ADHD symptoms, or 3) SP symptoms in a classroom setting

SP Vignette

*“Jake follows directions in the classroom, but he does not have many friends at school. He **avoids social situations**, such as talking and playing with his peers and participating in after school activities. He gets **extremely nervous** when he has to socialize with others, and **often does not contribute to the conversation**. His grades are below average, and he tries to **avoid the required class presentations**. In addition, **he never raises his hand in class to answer a question and he freezes up whenever he is called on** to read in front of the class. His mother reports that he is **afraid of being embarrassed, judged, and rejected by others.**”*

Method

▣ Materials

▣ Vignette Questionnaire: 7 items

- ▣ How would you feel about having this child in your classroom?
- ▣ In your opinion, to what degree do you see these behaviors as being problematic?
- ▣ How concerned are you about these behaviors?
- ▣ How likely would you be to discuss this child's behavior with his parents?
- ▣ How likely is it that this child would benefit from intensive supplemental services (i.e., Individualized Education Program or 504 Plan)?
- ▣ How likely would you be to refer this child to the school psychologist or school counselor?
- ▣ What would you say is the diagnosis, if any, of this child?

▣ Final question: "Which child are you most concerned about?"

▣ Demographics: 7 items

- ▣ Age, gender
- ▣ Experience and training in childhood disorder
- ▣ Knowledge of each disorder

Statistical Preparation

- One-way repeated measures ANOVAs
 - Paired samples *t*-tests
 - Bonferroni corrected *p*-value ($.05/4$ hypotheses = $.0125$)

Results: Hypothesis 1

It was hypothesized that undergraduate education majors would be most concerned about the child with ADHD, followed by the child with SP, and least concerned about the child with SCT. It was also expected that participants would view ADHD behaviors as more problematic than SCT and SP behaviors. In addition, participants would have more unfavorable attitudes toward working with the child with ADHD than with the children with SP and SCT.

	Means (SD)	F value	P value	Partial Eta squared
Concern		1.94	.145	.01
ADHD	4.33 (1.02) ^a			
SCT	4.43 (0.87) ^a			
SP	4.27 (1.06) ^a			
Problematic		17.24	< .001	.10
ADHD	4.39 (0.95) ^a			
SCT	4.07 (1.02) ^b			
SP	3.81 (1.17) ^c			
Unfavorability		29.35	< .001	.17
ADHD	3.22 (0.88) ^a			
SCT	2.92 (0.77) ^b			
SP	2.65 (0.86) ^c			

*Note: Means with similar superscripts are not statistically different from each other; means with different superscripts are significantly different from each other based on planned comparisons. Scores range from 1 to 6, with higher scores indicating a negative response.

Results: Hypothesis 2

It was hypothesized that participants would rate the child with ADHD as the most in need of a referral to a school psychologist or school counselor, and the children with SCT and SP would be rated as less in need. Further, the child with ADHD would be rated as the most likely to benefit from an IEP or 504 Plan, followed by the child with SP. The child with SCT would be rated as the least likely to benefit from an IEP or 504 Plan.

	Means (SD)	F value	P value	Partial Eta squared
Referral		16.32	< .001	.097
ADHD	3.90 (1.31) ^a			
SCT	4.07 (1.14) ^a			
SP	4.50 (1.09) ^b			
IEP/504 Plan		12.11	< .001	.07
ADHD	4.30 (1.29) ^a			
SCT	3.96 (1.24) ^b			
SP	3.70 (1.36) ^b			

*Note: Means with similar super scripts are not statistically different from each other; means with different superscripts are significantly different from each other based on planned comparisons. Scores range from 1 to 6, with higher scores indicating higher rates of referral.

Results: Hypothesis 3

It was hypothesized that undergraduate education majors would indicate that they have heard the most about ADHD, followed by SP, and the least about SCT.

	Means (SD)	F value	P value	Partial Eta squared
Knowledge	(out of 5)	314.76	< .001	.68
ADHD	3.54 (0.79) ^a			
SCT	1.42 (0.65) ^b			
SP	2.48 (1.03) ^c			

*Note: Means with similar super scripts are not statistically different from each other; means with different superscripts are significantly different from each other based on planned comparisons. Scores range from 1 to 5, with higher scores indicating more knowledge .

Exploratory Analyses

- ❑ “What would you say is the diagnosis, if any, of this child?”
 - ❑ ADHD: 76% correct
 - ❑ SP: 31% correct
 - ❑ SCT: 0% correct
- ❑ “Which child are you most concerned about?”
 - ❑ SCT: 49%
 - ❑ WHY?: inability to concentrate and focus in class; potential difficulties at home
 - ❑ SP: 27%
 - ❑ ADHD: 24%

Limitations & Future Directions

- ▣ Sample characteristics
 - ▣ Primarily female sample
 - ▣ In-service teachers
- ▣ Vignettes may not be realistic representations of the classroom
- ▣ Vignette wording

Conclusion & Implications

- Teachers are concerned about both hyperactive (i.e., ADHD) and non-hyperactive (i.e., SCT and SP) behavior problems
- Preliminary evidence that teachers are able to recognize and identify children with SCT
- Highlights the need to better educate pre-service teachers about childhood psychopathology generally, and SCT specifically
- Collaborative approach to identifying and treating childhood psychopathology