Scaling Up an Intervention with Social Validity in Mind: The Iterative Process of Manualizing a Program in the Pursuit of Meaningful Effects

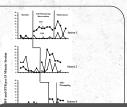
Introduction

Effective interventions only hold meaning to the extent to which they are used in practice (Cook et al., 2010). To provide practical significance and meaningful effects in the long run, practitioners must be willing and able to engage in the intervention. To address this, Strain et al. (2012) encourage researchers to view social validly as a "steering wheel" rather than a "luxury item" (p. 197). The current endeavor prioritizes social validity during the iterative process of developing, expanding, and assessing a collaborative intervention designed to support teachers in their use of evidence-based practices.

Intervention Components

Structured Self-Monitoring: regularly observing and measuring a specific behavior, recording the results, and using the data to improve outcomes in the future

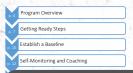
Coaching & Support from a Mentor/Supervisor: observing the instructor teach, providing performance feedback, facilitating goal setting, and potentially adding in modeling and action planning when appropriate



Original Study

- •SCRD: Multiple-baseline across participants
- •General education & preservice teacher Dyads
- •WWC (2017) Standards Met
- Functional Relation Established





Manual Development

Study procedures and resources were written into a comprehensive program manual. Social validity data from original study informed program edits and procedural changes.



Stakeholder Feedback & Manual Edits

To assess the feasibility, usability, and acceptability of the program manual, we solicited stakeholder feedback. Edits were made based on feedback.



EASE Pilot Study

- •SCRD: Multiple-baseline across participants
- •Special education teacher and paraprofessional dyads
- Designed with WWC (2020) Standards in mind
- •In Progress



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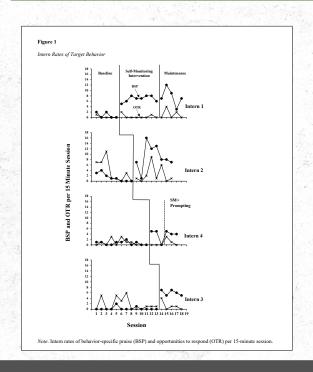
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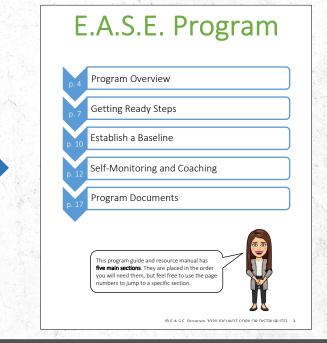
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Original Study and Manual Development





Sallese & Vannest, (in press)

A multiple-baseline across participants single-case research design examined the effects of a multi-component self-monitoring intervention on the use of a classroom management practice with pre-service general education teachers. WWC (2017) standards informed the research protocol and manuscript. The intervention resulted in increased use of behavior specific praise across participants and demonstrated good social validity. A functional relation was established with consistent effects across three of the four participants.

Omnibus Tau-U value of 1 (Cl of .83 < > 1)

Empowering and Supporting Educators (EASE) Program Guide and Resource Manual Version 1.0

Study procedures, data collection sheets, and resources were developed into a comprehensive program manual. Social validity data from the anonymous surveys and individual semi-structured interviews in the original study informed program edits and small procedural changes. The intended goal was a stand alone manual which could be implemented without researcher training and minimal support.



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Phase 1: Stakeholder Feedback and Manual Edits (COMPLETE)

Purpose

To assess the social validity (i. e. feasibility, usability, and acceptability) of the manualized version of the program

Participants

The current program expands the original intervention population to include a variety of mentor/mentee relationships. A total of ten_participants (categories listed below) were chosen to represent those within and immediately supporting the new population of interest in the feedback process.

Gen Ed Teachers from Original Study

Gen Ed & SPED Pre-Service Teachers

University Field Experience Coordinator

Special Education Teachers

Paraprofessionals

University Faculty & Doctoral Students

Method

The research team solicited relevant stakeholder feedback to assess the social validity of the program and seek recommendations for improvement.

- Ten participants were given the program manual to review and then asked to provide oral or written feedback (survey, semi-structured interview, or focus group).
- The questions remained constant and were given prior to the formal feedback process.
- Feedback was analyzed to identify themes and determine the necessary edits.

Sample Feedback Questions

The procedures are written clearly and easy to understand (Likert Scale). Are there specific sections that were unclear or confusing? Explain here or on the pages themselves (Open Ended). The program procedures are appropriate and

feasible for teachers and instructional personnel in the field. (Likert Scale). If not, please explain. Do you have suggestions to increase feasibility? Feasibility means the likelihood that a teacher could and would use this. (Open Ended)

Edits Made Based on Participant Feedback

- Wording clarity & terminology
- Creating additional graphics
- Further description on specific procedures
- Additional labels & headings
- More examples & nonexamples
- Created a program overview & summary for the beginning of the manual
- Procedural changes made to increase the feasibility of the program steps
- Included "what if" scenarios
- Reformatted data collection forms for usability
- Added "tips and tricks" throughout

Results

Strong social validity scores across questions and participant categories.





Phase 2: Empowering and Supporting Educators Pilot Study (IN PROGRESS)

Purpose

The purpose of the study is to examine the effects of the manualized intervention on the rate of behavior specific praise. The study will include measures to assess the social validity of the goals, procedures, and outcomes prior to, during, and after the intervention.

Participants & Setting

- Four Dyads:
 - Paraprofessionals (Primary) &
 - SPED Teachers (Coach)
- Resource Room Setting
- 3rd, 4th, & 5th
- Rural Public School District in Midwest (~50% Free & Reduced Lunch)

Design

- Single Case Research Design: Multiple Baseline Across Participants
- Research design & protocol informed by WWC Standards Version 4.1 (2020)

Social Validity

- Anonymous Surveys & Semi-Structured Interviews (Qs from Phase 1 included)
- Analysis of Questions and Supports Provided During Study (Feasibility)

Method

Pre-Intervention (January 8th-17th): The sped teacher had a 15 min. on-site check-in where the first author provided the materials, a brief explanation of what was provided, and described next steps in the process. After reading the materials, the sped teacher met with the researcher via phone for additional questions (Range: 7 to 19 minutes long). As the primary participant, the paraprofessionals initially received modified materials as to not affect baseline scores.



Baseline (Jan 22-Feb 12): Four days a week the paraprofessional taught during a consistent and predetermined 10-minute time period while the sped teacher recorded the frequency of the target behavior (behavior specific praise). All participants have at least five baseline data points prior to intervention. After baseline data collection period was complete, sped teacher and paraprofessional met for a *Planning Meeting* to prepare for the intervention phase.



Intervention (Feb 3-March 6): Four days a week for three weeks the paraprofessional will teach during a 10-minute time period while monitoring the frequency of the behavior with a handheld counter. During this time, the sped teacher will also record the rates of the behavior. After the self-monitoring session each day, the sped teacher and paraprofessional will meet for a coaching session focused on the target behavior with the teacher providing performance feedback, goal setting and the option to include modeling and action planning.

Materials

- EASE Program Guide & Resource Manual
- Copies of Data Collection & Program Checklist Sheets
- Handheld Counter
- Audio Recorder (IOA)





Primary DV

- Behavior Specific Praise: verbal praise that acknowledges a specific positive social or academic behavior
- Measured by Systematic Direct
 Observation (10-Minute time period of teacher-directed instruction)

Results

The analysis procedures will include visual analysis, masked visual analysis (Byun et al., 2017), and statistical analysis specific to data and sampling characteristics (Parker et al., 2011; Pustejovsky, 2018; Vannest et al, 2018). Up-to-date graphs and results will be available at poster presentation.



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References

- Byun, T. M., Hitchcock, E. R., & Ferron, J. (2017). Masked visual analysis: Minimizing type I error in visually guided single-case design for communication disorders. Journal of Speech, Language, and Hearing Research, 60(6), 1455-1466. http://dx.doi.org/10.1044/2017 JSLHR-S-16-0344
- Cook, B. G., Tankersley, M., & Harjusola-Webb, S. (2008). Evidence-based special education and professional wisdom: Putting it all together. Intervention in School and Clinic, 44(2), 105-111. http://dx.doi.org/10.1177/1053451208321566
- Parker, R. I., Vannest, K. J., Davis, J. L., & Sauber, S. B. (2011). Combining nonoverlap and trend for single-case research: Tau-u. Behavior Therapy, 42(2), 284-299. http://dx.doi.org/10.1016/j.beth.2010.08.006
- Pustejovsky, J. E. (2018). Procedural sensitivities of effect sizes for single-case designs with directly observed behavioral outcome measures. Psychological Methods, 24 (2), 217-235. http://dx.doi.org/10.1037/met0000179
- Sallese, M. R., & Vannest, K. J. (in press). The effects of a multi-component self-monitoring intervention on the rates of preservice teacher behavior-specific praise in a masked single case experimental design. Journal of Positive Behavior Interventions.
- Strain, P. S., Barton, E. E., & Dunlap, G. (2012). Lessons learned about the utility of social validity. Education and Treatment of Children, 35(2), 183-200. http://dx.doi.org/10.1353/etc.2012.0007
- Vannest, K. J., Peltier, C., & Haas, A. (2018). Results reporting in single case experiments and single case meta-analysis. Research in Developmental Disabilities, 79, 10-18. http://dx.doi.org/10.1016/j.ridd.2018.04.029
- What Works Clearinghouse. (2017). What Works Clearinghouse: Standards handbook (Version 4.0). Institute of Education Sciences, U.S. Department of Education. https://ies.ed.gov/ncee/wwc/Handbooks
- What Works Clearinghouse. (2020). What Works Clearinghouse: Standards handbook (Version 4.1). Institute of Education Sciences, U.S. Department of Education. https://ies.ed.gov/ncee/wwc/Docs/referenceresources/WWC-Standards-Handbook-v4-1-508.pdf



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