Five in 20: An Exploratory Study to Develop and Pilot an Observation Tool used to Assess the Five Features Critical to Effective Classroom Management

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Five in 20: An Exploratory Study to Develop and Pilot an Observation Tool used to
Assess the Five Features Critical to Effective Classroom Management

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May, 18th 2021
Abstract

The present study aimed to develop and pilot a standardized classroom observation tool intended to assess teachers’ current use of the five features critical to effective classroom management. Thirty-nine observers who regularly conducted classroom observations (e.g., school psychologists) were recruited to complete 39, 20-min observations in kindergarten through twelfth grade classrooms. Due to COVID-19, observers could either complete a live observation or think of a previously completed observation. Of the 39 observations, 13 were live and 26 were recalled. To complete the observation, observers indicated whether the teacher was observed to use each of the 21 evidence-based strategies and if endorsed, the observer rated the quality of the strategy. The frequency of teacher praise and reprimand was also collected for the 13 live observations. On average, teachers used 13 of the 21 strategies (61.9%) and the average quality rating was 4.1 (of 5). There was a positive correlation between evidence-based strategies and frequency of behavior-specific praise observed, which was statistically significant. Quality ratings for behavior-specific praise were also positively related to frequency of behavior-specific praise, which was statistically significant. Quality ratings for brief instructional corrections were significantly related to frequency of mild reprimands observed. Future research and implications of these findings are discussed.

Keywords: classroom management, direct-observation, evidence-based strategies, teachers, observation tool, teachers
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I would also like to acknowledge Kaylee Hampton for her support and assistance in the overall creation of the current observation tool used in this study. I would also like to thank Dr. Brito and Dr. Canivez for serving as members on my thesis committee. I appreciate their thorough review and feedback of my thesis.
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A CLASSROOM MANAGEMENT OBSERVATION TOOL

Five in 20: An Exploratory Study to Develop and Pilot an Observation Tool used to Assess the Five Features Critical to Effective Classroom Management

Many teachers report that managing student misbehavior is one of the most challenging parts of their job (Reinke et al., 2011) and with the passage of No Child Left Behind (No Child Left Behind [NCLB], 2002), more teachers are tasked with meeting the academic and behavioral needs of all children in the general education classroom. Many teachers report they feel unprepared to address students’ behavioral and mental health needs (Nagro et al., 2019), which is likely related to the push to meet all students’ needs in the general education setting. Teachers also report needing additional behavior management training (Kwok, 2017) and meeting this request is critical because dealing with ongoing student misbehavior is stressful (Reinke et al., 2008) and a contributing factor in why teachers leave the field of education (Dicke et al., 2014). One-way teachers receive additional behavior management training and support is through consultation services. For consultation services to be effective, it is important for consultants to assess teachers’ current practices to determine whether additional training is needed and in what areas. By assessing teachers’ current practices and comparing them to evidence-based practices, consultants can provide teachers specific feedback to guide appropriate professional development and training; but first it is important to better understand which of the critical and evidence-based strategies teachers commonly use. Therefore, the purpose of this study is to develop and pilot a standardized classroom observation tool to assess which features critical to classroom management are commonly used by teachers.
Review of Literature

Classroom Management

Definitions

A key aspect of effective teaching is classroom management (Korpershoek et al., 2016). Classroom management is defined as a skill and a culmination of strategies that educators can use to mold and uphold a learning environment that is orderly, supports students’ social emotional, and academic learning; and maintains control in the classroom (Aldrup et al., 2018; Damme et al., 2016; Korpershoek et al., 2016; Kwok, 2017).

Classroom management is divided into proactive and reactive strategies. These strategies are based upon foundations of behavioral principles. Proactive strategies are used to provide encouragement to students for appropriate behavior (Nagro et al., 2019). For example, praising students and creating classroom rules are proactive strategies (Clunies-Ross et al., 2008). However, reactive strategies are often strategies that follow a student’s inappropriate behavior and are intended to decrease misbehavior. Examples of reactive strategies include verbal reprimands and overcorrection (Ritz et al., 2014). There is evidence to suggest that teachers should use more proactive than reactive strategies because proactive strategies teach students what to do. Furthermore, proactive strategies encourage student appropriate behavior and prevent misbehavior (Ritz et al., 2014).

Despite the evidence supporting proactive strategies, many teachers rely on reactive strategies (Korpershoek et al., 2016). Educators may rely on reactive strategies because preventive strategies are discounted or they may have a lack of knowledge about them (Korpershoek et al., 2016). Allday (2011) argued that teachers use reactive strategies because they lead to a temporarily decrease in student behavior problems.
However, despite a temporary change in behavior, using reactive strategies (e.g., yelling) is more likely to create a negative pattern of behavior and place strain on the student-teacher relationship (Allday, 2011). For example, Clunies-Ross et al. (2008) found that when teachers relied on reactive strategies, student on-task behavior decreased, and they were perceived as less engaged. When teachers do not know how to implement effective classroom management skills, they are more likely to rely on short-term, ineffective strategies (Kwok, 2017).

**Universal Need for Training**

Student misbehavior is commonplace across various school settings (i.e., rural, urban, and suburban settings), therefore all teachers are likely to benefit from classroom management training (Damme et al., 2016). Survey research suggests some teachers are dissatisfied with their classroom management experience (Christofferson & Sullivan, 2015) and that classroom management was “overlooked” during their teacher education training (Christofferson & Sullivan, 2015, p. 249). In-service teachers who completed the Teacher Needs Survey also reported feeling unprepared to manage student classroom behavior (Nagro et al., 2019) and that they do not feel prepared to support and manage behavior of students with disabilities. (Coalition for Psychology in Schools and Education, 2006; Cook et al., 2000). Furthermore, few teacher-education programs require classroom management courses (Kwok, 2017). These findings suggest that many teachers are likely to benefit from training because classroom misbehavior is common and during their pre-service training, many teachers do not receive adequate training to proactively establish appropriate behavior to successfully manage student misbehavior. Teachers who are not effectively trained in classroom management may not be willing to
implement behavior plans, reinforcement strategies, reinforcement schedules, or document student progress for evaluations (Oliver & Reschly, 2010). These procedures are vital to evidence-based practice and are likely negatively impacted when teachers are not adequately trained.

When teachers are challenged by ongoing student behavior problems, they may feel ineffective in their ability to manage student behavior. They are also likely to experience stress related to student problem behaviors, which can lead to burnout (Dicke et al., 2014). Teachers that deal with ongoing student behavior problems report more negative than positive student interactions (Nagro et al., 2019) and are more likely to have a negative classroom climate (Nagro et al., 2019). For example, a classroom that includes a high rate of student aggressive or disruptive behavior along with a high rate of teacher reactive strategies creates a climate of negative student-teacher interactions (Leff et al., 2011). When teachers use ineffective classroom management strategies, learning opportunities are reduced (Clair et al., 2015). Clair and colleagues (2018) conducted a study that focused on improving a teacher’s classroom management via consultation with a school psychologist. When the teacher decreased their use of reprimands and implemented an evidence-based classroom management program, student academic engagement increased and off-task behavior decreased (Clair et al., 2018). Pas et al. (2015) distinguished between student behavior profiles and examined the relation between profiles and teachers’ classroom management techniques. Though direct observation, three different student behavior profiles were identified, along with teacher strategies. Results suggested that teachers who used more proactive strategies (e.g.,
opportunities to respond) had more students who were consistently compliant (Pas et al., 2015).

**Benefits**

When teachers use effective classroom management methods, there are student and teacher benefits. For students, effective classroom management is associated with higher student achievement. Freiberg et al. (2009) found that the use of a school-wide classroom management program increased academic achievement in a variety of subjects. The program utilized was titled Consistency Management and Cooperative Discipline (CMCD), which attempted to prevent misbehavior, improve the climate within the school, improve behaviors of students, and manage time for instruction. The Texas Assessment of Academic Skills was used to measure achievement of the students from third through eighth grade along with tenth grade. The effect size after implementation of the program was $E = 0.34$ for reading and $E = 0.42$ for math (Freiberg et al., 2009). In another study, Gage et al. (2018) examined the implementation of discrete, classroom management practices (e.g., opportunities to respond) and how these practices impacted student behavior. After observing four different classrooms, Gage et al., found a positive relation between classroom management and positive student outcomes (e.g., decreased off-task and disruptive behavior). Furthermore, student engagement was negatively associated with classroom management strategies, such as opportunities to respond. (Gage et al., 2018).

There are also benefits to teachers who implement effective classroom management strategies. For instance, many evidence-based, classroom management strategies are simple to implement and more efficient that reacting to misbehavior after it
A CLASSROOM MANAGEMENT OBSERVATION TOOL

has occurred. For example, opportunities to respond (OTR) is a strategy used to increase academic engagement. Providing all students OTR chorally is recommended over individual OTR because all students can participate simultaneously. For example, a teacher asks the question “what is 2+2” and students use pre-printed number cards (or white boards, or a hand gesture) to indicate their answer (Gage et al., 2018). Haydon and colleagues (2010) compared three different types of OTRs, choral responding, individual responding, and mixed responding. Teachers were trained to provide these OTRs and instructions to implement them at different times for five minutes. All three types of OTRs were effective in decreasing off-task behavior and disruptive behavior (Haydon et al., 2010). Different types of OTRs were more effective under certain circumstances. For example, mixed responding was more effective than choral or individual responding in situations involving disruptive behavior. Choral responding was more effective than individual responding for decreasing off-task or disruptive behavior (Haydon et al., 2010).

Teachers who use effective classroom management strategies may also be less likely to experience teacher burnout. A meta-analysis (including 16 studies) conducted on self-efficacy and classroom management revealed that teachers who reported higher self-efficacy (related to classroom management) had decreased feelings of exhaustion and depersonalization (Aloe, et al., 2014). The authors explained that feelings of exhaustion and depersonalization may lead to burnout (Schaufeli & Salanova, 2007) and feelings associated with burnout are often “preceded” by beliefs of decreased efficacy within classroom management (Emmer & Stough, 2001). Considering teachers without effective
strategies may be at-risk for burnout, it is important to know which classroom
management strategies are evidence-based.

**Classroom Management: Critical Features and Evidence-Based Strategies**

Simonsen et al. (2008) reviewed the classroom management literature and found
five features critical to effective classroom management strategies. In addition, this
review provided information on how to implement various strategies that align with the
five features and how to assess classroom management. In their systematic review,
Simonsen and colleagues (2008) established criteria to determine which strategies were
deemed evidence based. First, the practice needed to be evaluated using an experimental
design and methodology. Second, results of the studies reviewed needed to indicate that
the classroom management practice was effective. Third, at least three, empirical studies
evaluating the strategy needed to have been published in peer-reviewed journals
(Simonsen et al., 2008).

The five critical features (categories) identified included the following: (a)
maximize structure; (b) post, teach, review, monitor, and reinforce expectations; (c)
actively engage students in observable ways; (d) use a continuum of strategies for
responding to appropriate behaviors; and (e) use a continuum of strategies to respond to
inappropriate behaviors (Simonsen et al., 2008). Within the five critical features
Simonsen and colleagues described 20 classroom management strategies. Each of the
features and a description of strategies that fall within each feature are described in detail
below.
Maximizing Structure

The first critical feature is maximizing structure. Simonsen et al. (2008) indicated that when teachers maximize structure in the classroom, they actively direct teaching activities, define rules and routines for students, and ensure the arrangement of the classroom is easy to navigate and not crowded. Morrison (1979) examined classroom structure in elementary classrooms to determine whether classrooms with higher amounts of teacher control had less disruptive behavior. Teacher control was defined as how much control the teacher had over interactions that occurred in class. Disruptive behavior within the classroom was defined as students inappropriately talking amongst each other, talking to the teacher, and getting out of their seats. Thirty-two elementary classrooms were observed four times for 30 min. Results indicated that classrooms with less teacher control had more disruptive student behavior (Morrison, 1979). Simonsen et al., (2008) also recommended that classrooms be arranged so students feel less crowded and distractions are minimized. Marx et al. (1999) studied the physical arrangement of classroom seating on student behavior. Results suggested that increased student participation was associated with classroom arrangement, such as the arrangement of student desks.

Post, Teach, Review, Monitor, and Reinforce Expectations

The second critical feature is posting, teaching, reviewing, monitoring, and reinforcing expectations. This is demonstrated by teachers establishing appropriate rules that are posted where students can easily see/reference them in the classroom. In addition, students are taught the rules and the rules are reviewed often. Students are also monitored and actively supervised by teachers (i.e., students receive corrective feedback and
appropriate behaviors are reinforced; Simonsen et al., 2008). Colvin et al. (1997) examined the effects of active supervision on controlling behavior problems during transitions in and out of classrooms in elementary schools. For this study, active supervision was defined as moving around, visually scanning the area, and interacting with the students. Colvin and colleagues (1997) found that problem behaviors decreased when active supervision was in place. Simonsen et al. (2008) also recommended choosing four to five rules and stating the rules positively (e.g. “raise your hand to speak;” Gable et al., 2009). Effective classroom management often utilizes rules as a foundation (Newcomer, 2009).

**Actively Engage Students in an Observable Way**

The third critical feature is to actively engage students in an observable way. Simonsen et al. (2008) identified six strategies aligned with this feature: providing students opportunities to respond, response cards, direct instruction, computer assisted instruction, class-wide peer tutoring, and guided notes. Providing students opportunities to respond (OTR) is a strategy that is used with specific classroom activities that provide students the opportunity to give a verbal answer, gesture, or write a response (Haydon et al., 2009; Messenger et al., 2017). For example, a teacher may ask the whole class a question and have the students respond with answers on a white board. When teachers use class-wide OTR students are more likely to be engaged in the lesson. Class-wide OTR also provide students an opportunity to practice the content being taught and receive immediate feedback (Messenger et al., 2017). A single subject research design was used to examine the effects of OTR on a student’s disruptive behavior in science class. Results demonstrated that when OTR was implemented, the student’s disruptive behavior
decreased, the amount of correct responses from the student increased, and on-task behavior increased (Haydon et al., 2009). Meta-analysis research suggested that using OTR in the classroom decreases student behavior problems, while increasing student engagement, learning, and positive student-teacher relationships (Schnorr et al., 2016).

Simonsen et al. (2008) also identified response cards as an effective strategy. Response cards are pre-made cards given to students to use when answering teacher questions during a lesson (Duchaine et al., 2018). Response cards are another medium used for OTR. Duchaine et al. (2018) examined the effects of response cards on student engagement among six high school students. Results indicated that the teachers implemented the response cards easily and consistently. Furthermore, when response cards were implemented, student engagement increased. Schnorr et al., (2016) also examined the effectiveness of response cards and concluded this strategy effectively increased elementary students’ engagement in a lesson.

Direct instruction is also an effective strategy that is based on behavioral principles. Direct instruction is explicit and structured (Cadette et al., 2016). Cadette et al. (2016) examined the effects of direct instruction on teaching students with Autism Spectrum Disorder to answer “who, what, and where” questions. The authors found using direct instruction was an effective strategy and students maintained their knowledge at four-week follow-up.

Computer-assisted instruction is an effective strategy when paired with an engaged teacher (Cassady et al., 2018). Computer-assisted instruction appeared to be favorable due to the flexibility, the engagement it provides, and the opportunity for students to work independently (Kim et al., 2017). Computer-assisted technology
involves using technology for one-on-one instruction and strategies such as OTR and corrective feedback (Simonsen, et al. 2008). Cassady et al. (2018) examined the use of computer-assisted instruction with English Language Learners and concluded this strategy was beneficial for students in kindergarten and first grade. An engaged teacher is thought to be an individual that is intentional in aligning the use of computer-assisted technology with the curriculum along with student needs (Cassady et al., 2018). Kim et al. (2017) also found computer-assisted instruction to be helpful when working with students with Learning Disabilities.

Class-wide peer tutoring is an effective strategy that is used to supplement instruction in the general education classroom (Kamps et al., 2008). Peers are paired (one as a tutor and one as a tutee) and they use instruction and immediate error corrections to support each other (Simonsen, et al. 2008). Kamps et al. (2008) examined the effectiveness of class-wide peer tutoring and found it led to increases in on-task behavior and improvement in content accuracy. Class-wide peer tutoring is also effective for students at-risk for academic failure, students learning basic math, and students with ADHD (Taylor & Alber, 2003).

Students recall more information when they take notes rather than only listening to a lecture (Simonsen, et al. 2008), which may be why using guided notes is an effective strategy. Furthermore, many students struggle when they take notes independently (i.e., without structure). Guided notes help students discern the important information from a lecture (Hamilton et al., 1999). Educators can make guided notes by creating outlines of their lessons with important ideas and blanks for students to fill in (Simonsen et al. 2008).
Hamilton et al. found that when guided notes were implemented, students with Learning Disabilities (who were also incarcerated) improved their performance on quizzes.

**Use a Continuum of Strategies to Acknowledge Appropriate Behavior**

The fourth critical feature is using a continuum of strategies to acknowledge appropriate behavior (Simonsen et al., 2008). The first recommended strategy is behavior-specific praise (BSP) or contingent praise. Praise is an effective strategy for many students, especially when it is behavior-specific (Chalk & Bizo, 2004; Wehby & Copeland, 2000). An example of BSP is, “I like the way you raised your hand before speaking.” When teachers use BSP they identify the specific behavior that was approved. When teachers used BSP with students with emotional and behavioral disorders, students’ on-task behavior increased. However, when teacher praise rates declined, students’ on-task behavior decreased (Sutherland et al., 2000).

Group contingency is another strategy within this feature. Group contingencies are used to improve student behavior and do not require much effort from a teacher. Group contingencies involve setting expectations for students and providing a reinforcer if all students perform the expectation (Simonsen et al., 2008). Group contingencies use support and attention from peers to encourage appropriate behavior. The Good Behavior Game is a class-wide management system that uses group contingency. To implement, classroom rules are developed, and students are organized into teams. Traditionally, points are given to the team when a student from that team breaks a classroom rule. The team with the fewest points earns a reward (Rubow et al., 2018). In a study that examined the effects of group contingencies on middle school students’ behavior found that student behavior improved after school-based group contingencies were implemented (Hawkins
et al., 2017). This study was conducted over 13 weeks in an alternative school setting using an ABAB single subject research design. When the class-wide group contingency was implemented, student’s readiness to learn at the start of class increased (Hawkins et al., 2017).

Using a behavior contract is another effective strategy that has been used to support changes in student behavior. A behavior contract consists of behavioral expectations, reinforcement for cooperation and meeting expectations, and negative consequences for not meeting expectations (Simonsen et al., 2008). For example, a behavior contract might state that a student will submit their assignments every morning when they arrive to school. The contract would also specify what reinforcer will be earned each time they turn in their assignment. A meta-analysis included 18 studies examining the effectiveness of behavioral contracts. Results indicated that behavior contracts had a moderate effect on decreasing problem behaviors among students of various ages (Bowman-Perrott et al., 2015).

Token economy is the last strategy described by Simonson et al. (2008) that aligns with the fourth critical feature. When a token economy is implemented, students earn tokens for engaging in appropriate behaviors and then exchange tokens from a menu of reinforcers. Token economies are flexible in that they can be adapted to fit a variety of populations and settings and can address a variety of problem behaviors (Maggin et al., 2011). A meta-analysis which included 24 studies, revealed that token economies are effective for both individual and class-wide use (Maggin et al., 2011).
Use a Continuum of Strategies to Respond to Inappropriate Behavior

The fifth critical feature is using a continuum of strategies to respond to inappropriate behavior. Simonsen et al., (2008) identified six reactive strategies (used with the intention of decreasing the future occurrence of inappropriate behavior) within this critical feature. For example, error corrections or “explicit reprimands,” are given concisely and briefly after an inappropriate behavior occurs. When praise or ignoring disruptive behavior is not effective, then explicit reprimands may be suggested. O’Learly et al. (1970) analyzed the differences between loud reprimands and soft reprimands and their effect on disruptive behavior. Two students who displayed disruptive behavior were observed during this time and disruptive behavior decreased during soft reprimand conditions and increased during loud reprimand conditions (O’Learly et al., 1970).

Performance feedback is another effective strategy that provides students data on a specific target behavior. When performance feedback is implemented, a set criterion is established for a target behavior. When the criterion is met a reinforcer is delivered (Simonsen et al., 2008). Performance feedback is an effective tool that differs from other strategies by providing feedback, often in the form of a visual stimulus that allows an individual to see their progress (Codding & Smyth, 2008). A study using a multiple baseline research design examined the effectiveness of performance feedback on improving student transition time. The goal was to decrease transition time by 30% and each morning the previous day’s transition time was compared to the goal and graphed. Results indicated that performance feedback effectively decreased transition time (Codding & Smyth, 2008).
Differential reinforcement is another effective strategy where reinforcement is delivered contingent on appropriate behavior with the intention of increasing appropriate behavior and decreasing maladaptive behavior (Simonsen et al., 2008). Differential reinforcement involves identifying a maladaptive behavior to reduce and an appropriate behavior to increase (e.g., reduce out-of-seat behavior, increase in-seat behavior). When the appropriate behavior is strengthened (reinforced), the maladaptive behavior is likely to decrease (Wheately et al., 2009). Wheately et al., (2009) utilized a multiple baseline design to examine whether elementary school students’ inappropriate behaviors (e.g., running and inappropriate sitting) decreased when differential reinforcement was implemented. Staff members were told to ignore specific inappropriate target behaviors and given examples of appropriate behaviors they should identify and reinforce. When differential reinforcement was used, inappropriate behaviors decreased (Wheately et al., 2009).

Planned ignoring is a simple, but effective strategy that is often used in combination with differential reinforcement. Planned ignoring is when a teacher intentionally ignores inappropriate student behavior (Simonsen et al., 2008). Planned ignoring is often used to eliminate student disruptive behavior via extinction. When a specific student behavior is ignored, the student learns the behavior will not lead to the typical desired outcome (e.g., teacher attention; Gable et al., 2009). Madsen et al. (1968) examined planned ignoring by having teachers ignore student inappropriate behavior that interfered with instruction. Teachers taught students classroom expectations, but ignored student disruptive behavior (i.e., withheld attention for disruptive behavior). Results
indicated that when planned ignoring was implemented, student disruptive behavior was reduced.

Response cost is another strategy that occurs when a desirable stimulus is removed, contingent upon student (inappropriate) behavior (Simonsen et al., 2008). For example, a teacher may give each student five tokens and remove tokens contingent on a student breaking a classroom rule (DeJager et al., 2019). One study examined response cost within a rural elementary school setting, where the teacher provided each student with five tokens and told students that one token would be taken away if the student engaged in inappropriate behavior. Once a token was removed, the student could not earn the token back. Response cost was effective in decreasing disruptive behavior in the classroom (DeJager et al., 2019).

The last strategy that aligns with the fifth critical feature is time-out from reinforcement. Time-out is when a student is removed from a situation or event that is reinforcing and moved to a situation or event that is not reinforcing for a brief amount of time (Simonsen et al., 2008). A clever example of time-out, the time-out ribbon, was studied by Foxx and Shapiro (1978). In this study each student wore a ribbon. If the student engaged in a behavior that was not appropriate for the classroom, the ribbon was removed and the student lost direct access to reinforcement (e.g., teacher attention) and activities until the teacher gave them the ribbon back. Foxx and Shapiro (1978) conducted a study in a special education classroom that revealed a decrease in students’ disruptive behavior when the time-out ribbon was implemented. The next section provides information on the role of school psychologists and existing classroom measures.
What Role Do School Psychologists Play in Classroom Management?

School-based consultation is an indirect service that includes an expert and a teacher that collaborate to improve student functioning (Klose et al., 2012). School psychologists’ role in schools is becoming more expansive. Previously, school psychologists focused on assessment and special education eligibility, but now school psychologists are also skilled in behavioral and academic consultation (Shernoff et al., 2016). The school psychologist can help a teacher define problems, introduce interventions that are evidence-based and appropriate, ensure that interventions are implemented with fidelity, and evaluate intervention outcomes (Klose et al., 2012). As stated previously, it is not uncommon for teachers to feel overwhelmed when faced with managing student disruptive behavior. Furthermore, many teachers report that they would benefit from additional classroom management training. School psychologists are trained to provide consultation to teachers and educational staff and can specifically provide guidance and assistance on implementing effective classroom management strategies (Briere et al., 2015).

A study that exemplifies the school psychologist’s role in consultation was carried out by Shernoff and colleagues (2016) who targeted early career teachers in increasing their knowledge of evidence-based strategies and supporting their professional development in this area. Providing support to early career teachers decreases the likelihood that these teachers will rely on referring students for evaluations when they are faced with student behavior challenges (Shernoff et al., 2016). Furthermore, early career teachers report that managing student behavior is one of the most stressful teacher-related experiences and likely contributes to high rates of teacher turnover (Shernoff et al.,
In this study, school psychologists provided consultation to prevent teacher turnover related to classroom management. Shernoff et al. (2016) found that almost two-thirds of early career teachers improved their classroom management practices after receiving consultation services (Shernoff et al., 2016).

**Classroom Management Measures**

There are few tools that are available to observe classroom management and guide intervention. In fact, many measures exist that measure reprimands and/or praise, but no tool measures all the evidence-based strategies found within the five critical features identified by Simonsen et al. (2008). The Brief Classroom Interaction Observation – Revised is a tool used by Reinke et al. (2015). This tool was created to support, monitor, and evaluate the following classroom management strategies: behavior-specific praise (BSP), general praise (GP), explicit reprimands, harsh reprimands, opportunities to respond, and pre-corrective statements. This measure also assesses student disruptive and aggressive behavior. This tool measures both teacher strategies and student behavior but does not measure all the strategies within the five critical features identified by Simonsen et al., (2008).

Sanetti et al. (2018) conducted a study that used an observation for classroom management. The purpose of this study was to observe classroom management and not to create a measure (Sanetti et al., 2018). The ongoing goal of this line of research is to create a measure that assesses the five critical features and evidence-based strategies. However, this thesis piloted an observation tool by obtaining a preliminary estimate of which features, and strategies teachers commonly use. After continued examination of
the tool, professionals may be able to use the tool to conduct observations and gather a more thorough picture of the classroom management practices being used.

**Summary**

Many teachers struggle with the management of student behavior, which can impact a teacher’s decision to exit the field of education (Dicke et al., 2014). The current study attempted to advance applied scientific research in the field of school psychology by creating a tool to assess which features critical to classroom management are commonly used by teachers (Simonsen et al., 2008). The purpose of creating this observation tool was to ultimately guide consultation and professional development recommendations; however, the first step is to create and pilot the measure.

Therefore, the aim of this study was to develop and pilot a standardized classroom observation tool to determine which critical features of effective classroom management are commonly used by teachers. Using the observation tool, created by the primary investigator and her thesis chair, the following research questions were posed: (a) What is the reliability between observers (inter-rater agreement) who use the observation tool? (b) Which evidence-based classroom management practices do teachers commonly use? (c) Do teachers who use more praise also use more evidence-based practices?

**Method**

**Setting and Participants**

Thirty-nine total observations were completed by observer participants from Illinois, Indiana, Nevada, and Wisconsin. Of the 39 observations, 13 were completed live (directly in the classroom) and 26 were recalled based on a previously conducted observation. Of the 39 observations, 36 (92%) were conducted in general education classrooms and four (8%) were conducted in special education classrooms. Most were
conducted in an elementary school setting (n = 33, 82%), rather than a middle or high school setting (n = 4, 10%). Approximately 20.5% (n = 8) of the observations were completed with two observer participants so inter-observer agreement (IOA) could be calculated.

To participate in the current study, observers were required to be a practicing school psychologist or other educational professional whose job responsibilities included teacher consultation (i.e., conducting observations and consultation with teachers regarding classroom management was an expectation of their job). Most participants were female (82%), Caucasian (100%), and school psychologists (92.3%). On average school psychologists had 8 to 14 years of experience. Most school psychologists reported to have training in direct observation (87.2%) and consultation (80.7%). See Table 1 for additional demographic information.
### Observer Participant Demographics

<table>
<thead>
<tr>
<th>Characteristics</th>
<th>N = 39</th>
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<td>85</td>
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<tr>
<td>Secondary (6-12)</td>
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<td>5</td>
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<td>2.5</td>
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<td>10</td>
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<tr>
<td>Wisconsin</td>
<td>1</td>
<td>3</td>
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</table>

There were eight reliability partners (i.e., colleagues of observer participants) who were recruited by observer participants. Of the eight reliability observers, three participated in recalled observations and five participated in live observations. Most reliability partners were female (62.5%) and Caucasian (100%). Only two of the
reliability partners were school psychologists (25.0%). The remaining reliability partners held the following job titles: assistant principal, social worker, evaluation services specialist, and teaching assistant.

Teachers were also recruited by observer participants. Unfortunately, due to the COVID-19 adaptations, teacher demographic data was only collected from 16 teacher participants (five recalled observations and 11 live observations). Of the teachers who completed demographics information, all were female and Caucasian. Observers, teachers, and reliability observers each received $15 gift cards after materials were received.

Measures

The current study included two measures: a) a demographics questionnaire and b) the Five in 20 Observation. These measures were created by the primary researcher and her thesis advisor. Observation items were based on the five critical features and 20 evidence-based strategies for classroom management identified by Simonsen et al. (2008). Although Simonsen et al. (2008) identified 20 strategies for classroom management, strategies within critical feature one (maximizing structure) were further broken down to enhance clarity of the strategies in this feature. Therefore, 21 evidence-based strategies were included in the observation tool. Each measure is described below.

Demographics Questionnaire

The demographics questionnaire (Appendix A) consisted of 11 questions. Observers, teachers, and reliability partners were asked to provide their sex, age, race, ethnicity, job title, experience, state of employment (e.g., Illinois), description of the community (e.g., rural, urban, suburban), and whether they took a (pre-service) behavior
management course. Observers and reliability observers were also asked whether they took a graduate consultation course, whether they took a graduate course that included training in direct observation, and how many observations they typically conduct a month.

**Five in 20 Observation**

The five in 20 observation tool was created by the author and her thesis advisor (Appendix B). The observation tool listed and operationally defined 21 strategies that fall within the five critical features identified by Simonsen et al. (2008). Participants were provided a phone call to answer questions and review how to use the observation tool. The observation tool is administered while a teacher leads class-wide instruction for at least 20 minutes. During the observation, the observer looks for evidence (e.g., teacher demonstrates or physical evidence) of each strategy. If evidence is observed, the observer marks “yes.” If no evidence is observed, the observer marks “no.” Next to each strategy there is a quality rating. If the observer indicated “yes,” they also rate the quality of that strategy (1 = inconsistent with strategy description to 5 = consistent with strategy description). The observer may mark whether the strategy was observed and the quality of the strategy at any time during the observation, but this rating is a single rating that is intended to summarize the use of the strategy during the 20-minute observation. In addition to the strategy ratings, the observer tallies the frequency of teacher praises and reprimands observed during the 20-minute observation. Tallying praises and reprimands was possible for live observations, but not recalled observations. The Total Strategy Score is obtained by summing the number of “yes” strategy endorsements. The total possible score was 21. The Total Quality Score is obtained by summing the 1-5 strategy
ratings. The total possible Quality Score was 105. Praise and reprimand rates were also calculated for live observations.

**Procedures**

This project was approved by Eastern Illinois University’s Institutional Review Board before recruitment took place. Recruitment included the following: (a) advertising (see Appendix C) on the Illinois School Psychology Association listserv, (b) advertising on the EIU School Psychology Facebook page, (c) emailing EIU School Psychology alumni, and (d) encouraging EIU School Psychology alumni to advertise to other school psychologists who may be interested in participating.

Researchers emailed informed consent to the observer who collected and returned consent for themselves and the participating teacher. Participants were able to schedule follow-up phone calls to ask any clarifying questions prior to data collection. Materials were emailed to observers (e.g., informed consent, Five in 20 form, BIRS) and emailed back when completed. All forms had Identification Numbers (no identifying information). Researchers completed the same procedures with observers whether they completed a live or recalled observation.

Due to the COVID-19 pandemic (and consequent remote schooling), interested participants were provided a choice of completing a live observation or a “recalled” observation (i.e., reporting on an observation previously completed in the last six months). Live observers recruited a teacher, whom they worked with, to participate with them. Observers arranged a time to observe the teacher using the Five in 20 Observation form. Of the 13 live observations, five (38%) had a reliability observer. Observers who completed recalled observations were asked to think about an observation close in
memory (i.e., previous spring semester when in-person school was last in session), and complete the form thinking of that observation. Of the 26 recalled observations, three (12%) had a reliability observer.

Analytic Plan

The first question, what is the reliability between observers who use the observation tool was analyzed by calculating Cohen’s (1960) kappa coefficient. Kappa was used to calculate IOA between each observer and observer, reliability partner’s Total Strategy Score and Total Quality Score. Inter-observer agreement for praise and reprimand frequencies were calculated using percent agreement for live observations.

To answer the second research question, which of the five critical features of effective classroom management do teachers use, the Five in 20 observation form was individually scored and entered into an Excel file. Scores were analyzed descriptively by examining the “total strategy score” for each observation. The total strategy score and the total quality score were entered for both live and recalled observations. The frequencies of BSP, GP, total praise, and total reprimand were entered for the 13 live observations.

To answer the last research question, do teachers who use more praise also use more evidence-based practices, Pearson Product-Moment correlations were used to calculate the relationship. Total Strategy Scores were used to calculate the relationship between the frequencies of BSP observed during live observations.

Results

The primary researcher and four research assistants recruited 39 observer participants who conducted 39, 20-min observations (13 live and 26 recalled) across primary or elementary (grades K-5) and secondary (grades 6-12) classrooms to determine
which evidence-based classroom management strategies teachers commonly used. On average, teachers used 13 of the 21 evidence-based strategies (i.e., Total Strategy Score). The average Total Quality Score was 3.8 of 5 (5 meaning the strategy was consistent with the operational description of the strategy). Frequencies of teacher praise type (i.e., GP or BSP) and reprimand type (mild, medium, harsh, or gesture) during teacher-led class-wide instruction were recorded during 13 live observations. A total of 170 incidents of praise and reprimand were recorded. Across the 13 teachers, there were 92 incidents of GP ($M = 7.0$ per teacher) and 78 incidents of BSP ($M = 6.0$ per teacher). There were 41 incidents of mild reprimand ($M = 3.1$ per teacher), 2 incidents of medium reprimand, 0 incidents of harsh reprimand, and 5 incidents of gesture reprimand ($M = 0.38$ per teacher).

**Inter-observer Agreement**

The first research question (What is the reliability between observers who use the observation tool was analyzed?) was answered using Cohen’s (1960) kappa coefficient by calculating the reliability between each observer and reliability-observer’s strategy endorsement (i.e., was the strategy observed, yes or no) and the reliability between each observer and reliability-observer’s strategy quality rating. For the 39 observations, eight observations included reliability partners. Three reliability partners for reported observations and five for live observations.

**Strategies Used and Quality Ratings**

When calculating Cohen’s Kappa, 0.41 to 0.60 is considered moderate agreement; 0.61 to 0.80 is considered substantial agreement (Landis et al., 1977). Across all eight observer and observer-reliability pairs, there was moderate inter-observer agreement for strategies used, $k = 0.580$ (range 0.532-0.645). For the three recalled, reliability pairs
there was moderate agreement, $k = .555$ (range 0.539-0.565) and for the five live
reliability pairs there was moderate agreement, $k = .595$ (range 0.532-0.645).

Across all eight observer and observer-reliability pairs, there was substantial
agreement for quality ratings, $k = 0.676$ (range 0.534-0.879). For the three recalled,
reliability pairs there was moderate agreement, $k = 0.605$ (range 0.534-0.667) and for the
five live, reliability pairs there was substantial agreement, $k = 0.721$ (range 0.615-0.879).

**Percent Agreement for BSP, GP, and Reprimand Scores**

Percent agreement was calculated to determine inter-observer agreement for the
frequency of BSP, GP, and reprimand used within the 20-min observation. Percent
agreement was only calculated for live observations, because observers did not report
frequency of BSP, GP, and reprimand for recalled observations (i.e. unlikely to be
accurately recalled). Across the five observer and observer-reliability partners, IOA for
BSP = 63.02% (range 0-100%), GP = 59.02% (range 0-100%), mild reprimands = 77%
(range 50-100%), medium reprimands = 100%, harsh reprimands = 100%, and gesture =
93.34 (range 66.7 – 100%). Total praise (BSP and GP) was also calculated (70.4%, range
29-88%) to determine whether IOA for total praise was more acceptable than BSP and
GP separately.

**Critical Features and Strategies Observed**

To answer the second research question (Which of the five critical features of
effective classroom management do teachers use?), each observation was scored to obtain
the Total Strategy Score and Total Quality Score. Within this sample, on average (across
live and recalled observations) teachers used 13 of the 21 evidence-based strategies
(range 7-21). These results were similar for both live ($M= 12$; range 7-19) and recalled
(M = 13; range 8-21) observations. On average, teachers at the primary (K-5; n = 33) used 13 of the 21 evidence-based strategies and teachers at the secondary level (6-12; n = 4) used 12 of the 21 evidence-based strategies. A total of thirty-seven observations were included in the elementary and secondary school samples as two participants did not report grade level setting. In addition, each observation was individually analyzed to report descriptive statistics relative to each evidence-based strategy and critical feature.

**Critical Feature One**

Critical feature one (maximizing structure and predictability) included four strategies and on average teachers were observed to use 86.5% of these strategies (see Table 2). Of the strategies, Easy Traffic Flow was used most frequently (100.00%), followed by Classroom Structure (95.0%), Schedule Posted (76.9%), and Rules Posted (74.4%). On average, strategies within critical feature one had a Quality Rating of 4.4 of 5 (range 4.2 - 4.6), suggesting these observed strategies were on average 88% aligned with the strategy definitions. Easy Traffic Flow received the highest Quality Rating (4.6), followed by Classroom Structure (4.5), Schedule Posted (4.4), and Rules Posted (4.2).

On average, Elementary school teachers were observed to use 88.6% of these strategies, while secondary level teachers were observed to use 75% of strategies within critical feature one (see Table 2). Average quality ratings between primary and secondary level teachers were similar (i.e., 4.4 and 4.5, respectively).

**Critical Feature Two**

Critical feature two (identifying, teaching, and strengthening student expectations) included two strategies and on average teachers were observed to use 87.1% of these strategies. Of these strategies, Active supervision was used more frequently (94.8%) than
Post, Teach, and Review (79.5%). On average, strategies within critical feature two had a Quality Rating of 3.9 of 4 (range 3.7 - 4.2), suggesting these observed strategies were 78% aligned with the strategy definitions. Active Supervision received a higher Quality Rating (4.2) than Post, Teach, and Review (3.7).

Elementary and secondary level teachers were observed to use strategies within critical feature two similarly (Table 2). Elementary school teachers were observed to use 86.3% of these strategies, while secondary level teachers were observed to use 87.5% of these strategies. On average, Quality Ratings were also similar between elementary and secondary classrooms (i.e., 4.0 and 4.2, respectively).

**Critical Feature Three**

Critical feature three (engaging students) included five strategies and on average teachers were observed to use 59.1% of these strategies (see Table 2). Of the strategies, Direct Instruction was used most frequently (97.4%), followed by Opportunities to Respond (84.6%), Computer-Assisted Instruction (44.0%), Class-Wide Peer Tutoring (44.0%), and Guided Notes (25.6%). On average, strategies within critical feature three had a Quality Rating of 4.1 of 5 (range 3.8 - 4.3), suggesting these observed strategies were 82% aligned with the strategy definitions. Direct Instruction and Computer-Assisted Instruction received the highest Quality Rating (4.3), followed by Opportunities to Respond (4.0), Guided Notes (4.0), and Class-Wide Peer Tutoring (3.8).

On average, Elementary school teachers were observed to use 60.5% of these strategies, while secondary level teachers were observed to use 50% of the strategies within critical feature three (see Table 2). On average, Quality Ratings were similar between elementary and secondary (i.e., 4.1 and 3.3, respectively).
**Critical Feature Four**

Critical feature four (using a range of strategies to respond to appropriate behavior) included four strategies and on average teachers were observed to use 51.9% of these strategies (see Table 2). Of the strategies, Behavior Specific Praise was used most frequently (97.4%) across teachers, followed by Token Economies (56.4%), Group Contingencies (28.2%), and Behavior Contracts (25.6%). On average, strategies within critical feature four had a Quality Rating of 4.2 of 5 (range 3.8 – 4.1), suggesting these observed strategies were 84% aligned with the strategy definitions. Behavior Contracts and Group Contingencies received the highest Quality Ratings (4.1), followed by Behavior Specific Praise (3.9) and Token Economies (3.8).

On average, Elementary school teachers were observed to use 52.9% of these strategies, while secondary level teachers were observed to use 43.7% of the strategies within critical feature four (Table 2). Quality Ratings were consistent among elementary and secondary classrooms (i.e., 4.1 and 4.1, respectively).

**Critical Feature Five**

Critical feature five (using a range of strategies to respond to inappropriate behavior) included six strategies and on average teachers were observed to use 51.7% of these strategies (see Table 2). Of the strategies, Planned Ignoring and Error Corrections were used most frequently (76.9%), followed by Differential Reinforcement (69.2%), Performance Feedback (35.8%), Time Out from Reinforcement (30.7%), and Response Cost (21.0%). On average, strategies within critical feature five had a Quality Rating of 4.0 of 5 (range 3.7 - 4.5), suggesting these observed strategies were 80% aligned with the strategy definitions. Response Cost received the highest Quality Rating (4.5), followed by
Differential Reinforcement (4.3), Error Corrections (4.0), Planned Ignoring (3.9), Performance Feedback (3.7), and Time Out from Reinforcement (3.7).

On average, Elementary school teachers were observed to use 52.9% of these strategies, while secondary level teachers were observed to use 54.1% of the strategies within critical feature five (Table 2). Quality Ratings were similar for elementary and secondary classrooms (i.e., 4.0 and 3.9, respectively).
### Table 2

**Total vs Elementary (K-5) and Secondary (6-12) Observation Data**

<table>
<thead>
<tr>
<th>Critical Features</th>
<th>Evidence-based Strategy</th>
<th>Total (N = 39)</th>
<th>Elementary (N = 33)</th>
<th>Secondary (N = 4)</th>
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<tbody>
<tr>
<td></td>
<td></td>
<td>N</td>
<td>%</td>
<td>QR</td>
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<tr>
<td><strong>Feature 1: Maximizing Structure and Predictability</strong></td>
<td>Easy Traffic Flow</td>
<td>39</td>
<td>100.0</td>
<td>4.6</td>
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<tr>
<td></td>
<td>Classroom Structure</td>
<td>37</td>
<td>95.0</td>
<td>4.5</td>
</tr>
<tr>
<td></td>
<td>Schedule Posted</td>
<td>30</td>
<td>76.9</td>
<td>4.4</td>
</tr>
<tr>
<td></td>
<td>Rules Posted</td>
<td>29</td>
<td>74.4</td>
<td>4.2</td>
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<td></td>
<td>Overall Average</td>
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<td>86.5</td>
<td>4.4</td>
</tr>
<tr>
<td><strong>Feature 2: Identifying, Teaching, and Strengthening Student Expectations</strong></td>
<td>Active Supervision</td>
<td>37</td>
<td>94.8</td>
<td>4.2</td>
</tr>
<tr>
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<td>Rules: Taught &amp; Reviewed</td>
<td>31</td>
<td>79.5</td>
<td>3.7</td>
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<td></td>
<td>Overall Average</td>
<td></td>
<td>87.1</td>
<td>3.9</td>
</tr>
<tr>
<td><strong>Feature 3: Actively Engaging Students</strong></td>
<td>Direct Instruction</td>
<td>38</td>
<td>97.4</td>
<td>4.3</td>
</tr>
<tr>
<td></td>
<td>OTR</td>
<td>33</td>
<td>84.6</td>
<td>4.0</td>
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<td>Computer Assisted Instruction</td>
<td>17</td>
<td>44.0</td>
<td>4.3</td>
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<td></td>
<td>Class-Wide Tutoring</td>
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<td>Guided Notes</td>
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<td>25.6</td>
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<td>Overall Average</td>
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<td>4.1</td>
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<td><strong>Feature 4: Using a Range of Strategies to Respond to Appropriate Behavior</strong></td>
<td>BSP</td>
<td>38</td>
<td>97.4</td>
<td>3.9</td>
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<td>Token Economies</td>
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<td>Class-Wide Group</td>
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<td>Contingencies</td>
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<td>Behavior Contracts</td>
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<td>25.6</td>
<td>4.1</td>
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<td>Overall Average</td>
<td></td>
<td>51.9</td>
<td>4.2</td>
</tr>
<tr>
<td><strong>Feature 5: Using a Range of Strategies to Respond to Inappropriate Behavior</strong></td>
<td>Planned Ignoring</td>
<td>30</td>
<td>76.9</td>
<td>3.9</td>
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<td></td>
<td>BI Corrections</td>
<td>30</td>
<td>76.9</td>
<td>4.0</td>
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<td>DR</td>
<td>27</td>
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<td>Feedback</td>
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<td>Time Out</td>
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<td>Response Cost</td>
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<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td>51.7</td>
<td>4.0</td>
</tr>
</tbody>
</table>

*Note.* Quality Ratings (QR); Opportunities to Respond (OTR); Behavior-Specific Praise (BSP); Brief Instructional Corrections for Inappropriate Behavior (BI Corrections); Differential Reinforcement (DR)
Recalled and Live Observation Comparison

Due to COVID-19 school related closures, data from recalled and live observations were compared to determine whether data were similar across collected modalities (see Table 3). Thirteen live and 26 recalled observations were conducted. On average (across recalled observations) teachers used 13 of the 21 evidence-based strategies (range 8-21); which was similar for live observations ($M=12$; range 7-19).

On average, teacher’s use of strategies within critical feature one was consistent between live and recalled observations (86.5 for both). Quality Ratings for strategies within critical feature one appeared to be slightly higher on average for live observations (4.67) than for recalled (4.3). On average, teachers were observed to use more strategies within critical feature two across recalled observations (88.4) than live observations (84.6). However, average quality ratings for strategies within critical feature two were similar for both live (4.0) and recalled (4.0) observations. Teacher’s use of strategies within critical feature three were similar between live (57.6) and recalled (59.9) observations. On average, quality ratings for strategies within critical feature three appeared to be higher for live (4.5) than recalled (3.9). On average, teachers were observed to use more strategies within critical feature four across recalled observations (54.7) than live observations (46.1). Average quality ratings for strategies within critical feature four were higher across live observations (4.5) than recalled observations (4.0). On average, teachers were observed to use more strategies within critical feature five across recalled observations (55.7) than live observations (44.8). Average quality ratings for strategies within critical feature five were higher across live observations (4.4) than recalled observations (3.9).
### Table 3

*Live and Recalled Observation Data*

<table>
<thead>
<tr>
<th>Five Critical Features</th>
<th>Strategy</th>
<th>Live (N=13)</th>
<th>QR</th>
<th>Recalled (N=26)</th>
<th>QR</th>
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<tbody>
<tr>
<td><strong>Feature 1: Maximizing Structure and Predictability</strong></td>
<td>Easy Traffic Flow</td>
<td>13</td>
<td>100</td>
<td>4.8</td>
<td>26</td>
</tr>
<tr>
<td></td>
<td>Classroom Structure</td>
<td>13</td>
<td>100</td>
<td>4.6</td>
<td>24</td>
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<tr>
<td></td>
<td>Schedule Posted</td>
<td>10</td>
<td>76.9</td>
<td>4.8</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Rules Posted</td>
<td>9</td>
<td>69.2</td>
<td>4.5</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td></td>
<td>86.5</td>
<td>4.7</td>
</tr>
<tr>
<td><strong>Feature 2: Identifying, Teaching, and Strengthening Student Expectations</strong></td>
<td>Active Supervision</td>
<td>13</td>
<td>100</td>
<td>4.4</td>
<td>24</td>
</tr>
<tr>
<td></td>
<td>Rules: Taught &amp; Reviewed</td>
<td>9</td>
<td>69.3</td>
<td>3.5</td>
<td>22</td>
</tr>
<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td></td>
<td>84.6</td>
<td>4.0</td>
</tr>
<tr>
<td><strong>Feature 3: Actively Engaging Students</strong></td>
<td>Direct Instruction</td>
<td>13</td>
<td>100</td>
<td>4.6</td>
<td>25</td>
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<tr>
<td></td>
<td>OTR</td>
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<td>Class-Wide Tutoring</td>
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<td></td>
<td>Computer Assisted Instruction</td>
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<td>46.1</td>
<td>4.8</td>
<td>11</td>
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<tr>
<td></td>
<td>Guided Notes</td>
<td>2</td>
<td>15.3</td>
<td>5.0</td>
<td>8</td>
</tr>
<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td></td>
<td>57.6</td>
<td>4.5</td>
</tr>
<tr>
<td><strong>Feature 4: Using a Range of Strategies to Respond to Appropriate Behavior</strong></td>
<td>BSP</td>
<td>12</td>
<td>92.3</td>
<td>4.1</td>
<td>26</td>
</tr>
<tr>
<td></td>
<td>Token Economies</td>
<td>8</td>
<td>61.5</td>
<td>4.2</td>
<td>14</td>
</tr>
<tr>
<td></td>
<td>Behavior Contract</td>
<td>1</td>
<td>7.6</td>
<td>5.0</td>
<td>9</td>
</tr>
<tr>
<td></td>
<td>Class-Wide Group Contingencies</td>
<td>3</td>
<td>23.0</td>
<td>4.6</td>
<td>8</td>
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<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td></td>
<td>46.1</td>
<td>4.5</td>
</tr>
<tr>
<td><strong>Feature 5: Using a Range of Strategies to Respond to Inappropriate Behavior</strong></td>
<td>Planned Ignoring</td>
<td>8</td>
<td>61.5</td>
<td>4.2</td>
<td>22</td>
</tr>
<tr>
<td></td>
<td>BI Corrections</td>
<td>10</td>
<td>76.9</td>
<td>4.4</td>
<td>20</td>
</tr>
<tr>
<td></td>
<td>DR</td>
<td>9</td>
<td>69.2</td>
<td>4.7</td>
<td>18</td>
</tr>
<tr>
<td></td>
<td>Time Out</td>
<td>1</td>
<td>7.6</td>
<td>5.0</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>Performance Feedback</td>
<td>5</td>
<td>38.4</td>
<td>4.0</td>
<td>9</td>
</tr>
<tr>
<td></td>
<td>Response Cost</td>
<td>2</td>
<td>15.3</td>
<td>4.5</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>Overall Average</td>
<td></td>
<td></td>
<td>44.8</td>
<td>4.4</td>
</tr>
</tbody>
</table>

Note. Quality Ratings (QR); Opportunities to Respond (OTR); Behavior-Specific Praise (BSP); Brief Instructional Corrections for Inappropriate Behavior (BI Corrections); Differential Reinforcement (DR)
Evidence-Based Strategies, Praise, and Brief Instructional Corrections

To answer the third research question (Do teachers who use more praise also use more evidence-based practices?) Pearson Product-Moment correlations were used to determine the relation between teacher’s Total Strategy Scores and the frequency of teacher’s use of BSP during live observations. It was predicted that teachers that used more evidence-based classroom management strategies (i.e., higher Total Strategy Score) would use more BSP (i.e., as measured via frequency count).

Using the 13 live observations, there was a significant relation between the amount of strategies endorsed (Total Strategy Score) and the teacher’s use of BSP (BSP frequency), *r*(13) = 0.567, *p* < 0.022 (one-tailed). Additionally, the relation between observer’s frequency of BSP and quality ratings of BSP were analyzed. There was a significant relation between the frequency of BSP and the quality rating for BSP, *r*(13) = 0.656, *p* < 0.007 (one-tailed).

The relationship between quality ratings of Brief Instructional Corrections for Inappropriate Behavior and the frequency of Mild Reprimands were also analyzed. There was a significant relation between the quality ratings of Brief Instructional Corrections for Inappropriate Behavior and frequency of mild reprimands, *r*(13) = 0.668, *p* < 0.006 (one-tailed).

The relationship between frequency of total praise (BSP and GP) and the frequency of mild reprimands were also analyzed. There was not a significant relation between the frequency of total praise and mild reprimands, *r*(13) = -0.219, *p* > 0.236 (one-tailed).
Discussion

The current study examined 39 teachers’ use of 21 evidence-based classroom management strategies identified by Simonsen et al. (2008), as measured by 39 observers during a live or previously conducted (and recalled) 20-min observation. Observations were completed during teacher direct instruction in elementary or secondary classrooms in Illinois, Wisconsin, Nevada, and Indiana. Most observations were conducted in elementary, general education classrooms. Observers were mostly school psychologists and most reported to have training in direct observation and consultation. Some observers reported to find the observation tool “very useful,” and “especially easy to use in a structured classroom.” However, other observer participants reported challenges with the suggested observation time of twenty minutes being too short and difficulties with rating the quality of strategies.

Across live and recalled reliability pairs, there was moderate inter-rater agreement for the number of strategies teachers used and moderate to substantial inter-rater agreement for quality ratings. On average (across live and recalled observations) teachers used 13 of the 21 evidence-based strategies (range 7-21). The number of strategies teachers used at the elementary level (grades K-5) was consistent with the number of strategies teachers used at the secondary level (grades 6-12; 13 and 12, respectively). The average Total Quality Score was 3.8 of 5. The average Quality Rating for elementary was 4.1 while the average Quality Rating for secondary was 4.0.

Inter-observer agreement for BSP (63.02%) and GP (59.02%) praise and mild reprimand (77.0%) were poor. When BSP and GP praise categories were collapsed (i.e., Total Praise), IOA increased to 70.4%, however, this still falls below the minimal level of
acceptable agreement (i.e., 80%). Therefore, frequency of teachers use of praise and reprimand should be interpreted with caution, as reliability of these data were poor. Considering this there was a significant relation between the Total Strategy Score and frequency of BSP. This suggests that teachers who used more evidence-based strategies were observed to use more BSP. A significant positive relation between Quality Ratings and BSP was also observed. A significant relation was found between Quality Ratings for Brief Instructional Corrections and mild reprimands. Lastly, there was not a significant relation between frequency of mild reprimands and total praise. Again, due to the poor reliability of praise and reprimand frequency data, these results should be interpreted with caution.

**Critical Features and Strategies Observed**

On average, teachers used 13 of the 21 (i.e., 62%) evidence-based strategies and this was consistent across elementary (13 strategies) and secondary (12 strategies) teachers. Although 62% of the evidence-based strategies identified by Simonsen et al. (2008) may seem low, it is unclear what percentage is necessary to impact student appropriate behavior class-wide. While it may be hypothesized that using a larger percentage of the 21 evidence-based strategies is ideal, other factors may ultimately impact student behavior (e.g., whether strategies are used consistently, the quality of strategies used, or certain strategies may have a larger impact on student behavior than others). Depending on the activity or class size, it is possible a teacher may only need to use 13 of the 21 evidence-based strategies so long as they are used with fidelity. Future research should examine teachers’ use of strategies in relation to student class-wide
behavior to examine whether an ideal number of strategies can be identified or whether certain strategies have a larger impact than others on student appropriate behavior.

Of the 39 teachers observed, 97.4% were observed to use BSP. It is important to note that although almost all the teachers used BSP, this does not indicate the extent (i.e., frequency) to which they used BSP. The operational definition of BSP provided stated “verbal praise clearly identifying student behaviors that earn teacher approval, e.g., ‘Great job lining up quickly and quietly!’” This definition does not specify how often BSP should be used or that BSP should target at-risk students (both of which have been identified as important to the effective use of this strategy; Downs et al., 2019; Jenkins et al., 2015). Future research might improve upon this definition by including specifics about rate and delivery. Teachers within the live observations were observed to use 78 incidents of BSP, or an average rate of 3.9 per 20-min observation (or 11.7 per hour). This falls within the recommended rate of 3-5 BSP in 10 min (or 18-30 BSP per hour; Floress & Jenkins, 2015; Floress et al., 2020). Future research should examine whether teachers with high rates of BSP is more impactful on student behavior compared to teachers who use all four proactive strategies (but low rates of BSP) within critical feature four (using a range of strategies to respond to appropriate behavior).

Elementary teachers consistently used a larger percentage of certain strategies compared to secondary teachers. For example, elementary teachers used the following strategies more often than secondary teachers: Schedule Posted, Opportunities to Respond, Token Economies, and Providing Performance Feedback. There are likely various reasons for these findings. According to Freeman et al. (2014), high school teacher training programs do not typically provide consistent instruction about research-
based classroom management strategies. Pre-service, secondary teachers also receive different training than pre-service primary teachers. Developmental differences between elementary and high school students and elementary and secondary school characteristics may impact the effectiveness of certain evidence-based strategies (Freeman et al., 2018) and whether secondary teachers use certain strategies. Lastly, more research has focused on using evidence-based behavior management strategies at the primary level, compared to the secondary level, as evidenced by Positive Behavior Intervention Supports (a multi-tiered system of behavioral support) receiving more attention at the elementary level (Freeman et al., 2018).

In addition to receiving less training, secondary teachers may use certain classroom management strategies less than primary teachers because they may not see the need to use certain strategies with older students. Elementary teachers used 88.6% of the strategies in critical feature 1 (maximizing classroom structure), whereas secondary teachers used 75%. Within this feature, 84.8% of elementary teachers had schedules posted in their classrooms; whereas only 25% of secondary teachers had schedules posted. Students in the secondary setting may rely less on a visual schedule to stay on task during class, whereas having a visual schedule may be helpful in the elementary setting (especially for early elementary grades).

On the other hand, there were discrepancies between primary and secondary teachers’ use of certain strategies that are likely to be detrimental to student achievement (i.e., certain strategies are vital in both settings). For example, within critical feature three (actively engaging students), 84.8% of elementary teachers used opportunities to respond, whereas only 75% of secondary teachers used this strategy. Considering the research
support for opportunities to respond across primary (MacSuga-Gage, et al., 2015) and secondary (Adamson, et al., 2017) settings it is important for both primary and secondary teachers to use this strategy. There is also strong research support for token economies (a strategy within critical feature four – using a range of strategies to respond to appropriate behavior) at both the elementary (Coupland et al., 1981) and secondary level (Crawford et al., 1982). However, 60.6% of elementary teachers used token economies and 25% of secondary teachers used this strategy. Providing performance feedback (a strategy within critical feature five – using a range of strategies to respond to inappropriate behavior) also has support at both the primary and secondary level (Codd & Smyth, 2008). Only 50% of elementary and 36.3% of secondary teachers used this strategy.

Other strategies, like class-wide tutoring, were used less often in both the primary (27.2%) and secondary setting (25%), which may be related to observations taking place during teacher instruction. It is less likely class-wide tutoring would be observed during teacher led instruction, because this strategy is likely incompatible when the teacher is actively teaching. Behavior Contracts (27.2%; 25%) and Class-wide Group Contingencies (27.2%; 25%) were also used less in both the primary and secondary settings.

Evidence-Based Strategies, Praise, and Corrections

Teachers who used more evidence-based strategies were observed to use more BSP. It was predicted that teachers that used more evidence-based classroom management strategies would also use more BSP because BSP has been reported to increase academic performance and on-task behavior (Simonsen et al., 2008). Teachers who used more BSP also were rated as having higher Quality Ratings of BSP. Gable et
al., (2009) suggested that when BSP positively impacts student behavior, teachers are less focused on negative student behavior and come to view their students in a more positive way. This could explain why teachers with high frequency BSP also used more evidence-based strategies. Behavior-specific praise may be especially effective when used in combination with other evidence-based strategies. For example, when teachers established classroom rules in combination with BSP and planned ignoring was related to an increase in student appropriate behavior (Yawkey, 1971). This is consistent with research suggesting that teachers who use one evidence-based strategy (e.g., BSP) are likely to also use other evidence-based strategies. Therefore, research such as Yawkey (2971), does support teacher’s use of multiple classroom management strategies (Simonsen et al., 2008).

The quality of Brief Instructional Corrections for Inappropriate Behavior observed were significantly related with frequency of mild reprimands. Teachers may use a higher frequency of mild reprimands, or reactive strategies, when they have limited knowledge of preventative strategies (e.g., BSP or OTR) and their instinct to use a reactive strategy rather than a preventative strategy (Korpershoek, et al., 2016). There was a negative correlation between teacher’s use of total praise and mild reprimands. Although this correlation as not statistically significant, there was a large effect. It is possible that with a large sample, a significant, negative correlation might be found. This finding would provide support to the idea that teachers who praised infrequently may more readily rely on reprimands to manage student behavior.

**Inter-observer Agreement**
Of the 39 observations, eight (21%) had a reliability observer so inter-rater or inter-observer agreement could be calculated. For strategies used, there was moderate agreement between observers and for Quality Ratings there was moderate to substantial agreement between observers. Recalled observations had lower levels of agreement between observers compared to live observations. This is likely due to recalled observations being recalled from memory, rather than in real-time.

On average, reliability observers agreed approximately 63.06% when recording teacher’s use of BSP. In comparison, reliability observers agreed approximately 59.02% when recording teacher’s use of GP. On average, reliability observers agreed approximately 77% of the time when recording teacher’s use of mild reprimands. A minimally acceptable level of agreement is 80% (Hartmann, 1977). Inter-observer agreement for Total Praise increased to 70.4% when GP and BSP categories were collapsed; however, this percentage is still unsatisfactory (Hartmann, 1977). It is likely that additional training is necessary to collect this type of observational data (i.e., frequency of praise and reprimand) accurately. For example, some observers wrote down the verbatim praise statements, which were then coded in the incorrect category. One observer wrote the verbatim praise statement “great job, (insert student name) in the BSP category, when “great job” is GP and should be tallied in the GP space on the form.

**Limitations**

There are limitations to this study that are important to note. First, inter-observer agreement for live observations measuring the frequency of praise and reprimand was poor. Praise and reprimand frequency could only be collected from live observations (13 participants). Of those 13 participants, there were only five reliability pairs and reliability
for frequency data was poor. Because reliability between observers was poor, it is
difficult to trust the accuracy of this data. On the other hand, reliability between observer
pairs related to whether certain strategies were observed (yes or no) and strategy quality
ranged from moderate to substantial, suggesting adequate agreement and more
confidence in these findings. This finding suggests that observers may need minimal
training to indicate whether the 21 evidence-based strategies were observed and the
quality of those strategies.

A second limitation is determining observer’s accuracy in collecting observation
data using the observation tool. The primary researcher attempted to overcome this
limitation by reviewing the observation tool with observer participants and answering any
questions related to data collection via phone calls. In the future, researchers might assess
observers’ coding accuracy by having them code a “master coded video” to determine
whether observers code the video consistently with the primary researcher.

The lack of live observations, overall small sample, and lack of secondary teacher
participation are other limitations. Due to COVID-19 school closures, many observers
were unable to participate in a live observation. It is possible that recalled observations
may be less accurate because observers need to recall a prior observation. It is also
possible that pre-existing beliefs about a teacher’s behavior management skills may have
influenced an observer’s ratings of that teacher. In other words, an observer may have
rated a teachers’ use of evidence-based strategies based on their existing knowledge of
that teacher, rather than what was directly observed. Last, there were only four
participants who observed teachers in a secondary (grades 6-12) setting. Therefore,
comparisons between elementary and secondary level observations were limited.
It is unclear whether using all the strategies within a critical feature is more effective (than most strategies) in decreasing student inappropriate behavior or whether there are key evidence-based strategies that are more potent than others within each feature. For example, it is possible teachers may only need to use one evidence-based strategy (e.g., BSP) well within a critical feature. Future research should attempt to assess which of the 21 strategies teachers use while simultaneously collecting class-wide student behavior to determine whether there is a relation between frequency of strategies (or certain strategies) and student behavior.

**Future Research**

Considering this was a preliminary investigation examining teachers’ use of the 21 evidence-based classroom management strategies identified by Simonsen et al. (2008), future research should obtain more information about observer reliability to determine the reliability of information gathered from the Five in 20 Observation Tool. Additionally, further data collection should allow for more live observations, as this was the original intent of this study. It may be beneficial for future research to look at both teacher instruction and small group work to see if there are differences in strategies based on instructional activities. Future research might also conduct multiple observations with the same teachers to determine whether teachers are consistent in their use of strategies.

Future research should also attempt to observe student behavior to better understand which strategies might correlate with increased appropriate student behavior. Considering the lack of empirical research on classroom management at the secondary level, it is important for future classroom management research to take place in this setting. Finding ways to better support secondary schools in implementing systems level positive
behavior intervention supports and the evidence-based strategies that are used within this framework is important to better understanding how certain strategies might be adapted to be most effective in the primary and secondary settings. Future research should also be conducted on the psychometric properties of the observation tool in order to assess reliability of the tool.

**Conclusion**

In conclusion, this study examined teachers’ use of 21 evidence-based classroom management strategies identified by Simonsen et al. (2008). Classroom management is an area many teachers struggle, which may be related to limited pre-service training. This may be especially true at the secondary level, where there is less emphasis on systems of behavioral support, like positive behavior intervention supports. Results from this study suggest teachers were reported to use approximately 13 of the 21 evidence-based strategy at an average quality rating of 3.8 of 5. Therefore, teachers are likely to benefit from continued support in their knowledge and implementation of these strategies, as their use is related to teacher retention and positive behavioral and academic outcomes for students.
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Appendix A: Demographic Information

1. Please indicate your sex (circle): Male       Female       Non-binary       Prefer not to answer

2. Please indicate your race
   - American Indian or Alaska Native
   - Asian
   - Black or African American
   - Native Hawaiian or Other Pacific Islander
   - White
   - Two or more races (please specify) ________________________________
   - I prefer not to answer

3. Please indicate your age. ________________

4. Please list your job title? ________________________________

5. In what state do you work? ______________________________

6. How would you describe the community in which you work? (circle): Rural       Urban       Suburban

7. How many years of experience do you have ________________ years.

8. Have you taken an undergraduate or graduate course that focuses on managing student behavior?
   - Yes, please provide the name of the course (if possible) ________________________________
   - No
   - Other ________________________________
### Appendix B: Five in 20 Observation Tool

<table>
<thead>
<tr>
<th>Critical Feature</th>
<th>Classroom Strategy Description</th>
<th>Observed Yes or No</th>
<th>Quality</th>
<th>Comments/Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td><strong>Maximizing Structure &amp; Predictability</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Easy Traffic Flow (physical arrangement of the room; e.g., desks can only be moved in the aisle) &amp; class formation, instructional activities conducted in the middle of the room)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Structured teacher-imposed organization; instruction is clear, students are aware of class objectives, task, and rules and consequences for misbehavior</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Rules Posted (classroom rules are visible, positively stated, linked with task completion, linked with teacher expectations)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Schedule Posted (e.g., daily schedule or written schedule, “Students, this is what we will do today”)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td><strong>Establishing and Teaching Expectations</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Rules: Taught &amp; Reviewed (expectations are taught and reviewed, and posted frequently, used to prevent misbehavior and define acceptable behavior)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Active Supervision (e.g., close presence to students, moving frequently, not engaged in activities, available attending to student behavior, little repositioning)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td><strong>Engaging Students in Observable Ways</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Opportunities to Respond (OTR) (e.g., two or three questions, true/false, short responses with a focus on participation)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Direct Instruction (skill, teaching skills, and feedback for instruction)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Class-Size Expectations (e.g., academic expectations for individual students, task completion expectations, note-taking expectations)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Class-Wide Tutoring (teachers are helped to enhance learning, use of teamwork, task orientation)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Computer-Assisted Instruction (con or not con)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Guided Notes (teacher or student notes/setting meeting main ideas when student can follow along, involvement in additional class, discrepancies for grade)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td><strong>Recognizing and Appropriate Behavior Using Various Strategies</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Using Behavior-Specific Praise (praise is specific and positive)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Token Economies (checkpoints or coupons for classroom privileges)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Class-Size Contingencies (e.g., academic expectations for individual students, task completion expectations, note-taking expectations)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Behavior Contracts (e.g., behavior contracts, individual contracts, peer contracts, academic contracts)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td><strong>Responding to Inappropriate Behavior Using Various Strategies</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Brief Instructional Corrections for Inappropriate Behavior (behavior change is clear, behavior is consistently identified, and consequences are applied when misbehavior occurs)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Performance Feedback (e.g., academic feedback, behavioral feedback, self-monitoring of expectations)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Planned Ignoring (e.g., social interaction in group and individual interaction, negative interactions, or interactions that do not engage the student)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Differential Reinforcement (e.g., student behavior identified, appropriate for student, with clear expectations, response to any behavior that triggers attention)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Response Cost (e.g., student behavior is removed or reduced)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Time Out From Reinforcement (e.g., exclusions from games, e.g., physical challenges, rest, social interaction, activity, for a set time, e.g., 10 seconds)</td>
<td>☐ ☐ ☐ ☐ ☐</td>
<td>1 2 3 4 5</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Praise Frequency</th>
<th>Behavior Specific</th>
<th>General</th>
<th>Reinforcement Frequency</th>
<th>Mild</th>
<th>Medium</th>
<th>Harsh</th>
<th>Gesture</th>
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<tr>
<td></td>
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<td></td>
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</table>
### Praise Definitions:

<table>
<thead>
<tr>
<th>Behavior Specific</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any specific verbalization or gesture | *Thank you for sitting criss cross*  
| *Good job cleaning up*  
| *Nice work helping*  
| *That is a pretty picture!*  
| *I like how you raised your hand* |

<table>
<thead>
<tr>
<th>General</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any nonspecific verbalization or gesture | *Great!*  
| *Nice Work*  
| *Hi-five or Thumbs up (gesture w/ no verbalization)*  
| *Gives token (no verbalization)*  
| *Thank you*  
| *Perfect* |

### Reprimand Definitions:

<table>
<thead>
<tr>
<th>Mild Reprimand</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any verbal comment (using a normal speaking tone) indicating disapproval of a student(s) behavior. | *No thank you*  
| *Not now*  
| *No, come sit down (child at desk, while other children are on carpet)*  
| *That is not how we treat our friends* |

<table>
<thead>
<tr>
<th>Medium (Sarcastic) Reprimand</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any verbal comment (using a sarcastic or critical tone) that indicates disapproval of a student(s) behavior. | *I don’t remember telling you to write about mumsins!*  
| *No, it’s not cold in here* (critical disagreement)  
| *Is that your best work? (critical) (child misspelled word, sarcasm)* |

<table>
<thead>
<tr>
<th>Harsh Reprimand</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any verbal comment (using a louder than typical tone for the setting) that indicates disapproval of a student(s) behavior. | *One more outburst and no recess (threat)*  
| *I won’t tell you again*  
| *Excuse me! (loud)*  
| *How many times do I need to say ______* |

<table>
<thead>
<tr>
<th>Gesture Reprimand</th>
<th>Example</th>
</tr>
</thead>
</table>
| Any gesture (without speaking) that indicates disapproval of a student behavior (e.g., hands on hips). | *Hands on hips (disapproving look)*  
| *Teacher physically guides child to correct location*  
| *Shakes head when student interrupts* |

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Epstein et al., 2008; Office of Special Education Programs, 2016; Simonsen et al., 2008
Appendix C: Recruitment Flyer

Participants needed
All school psychologists are invited to participate who work in a K-12th grade setting.

Observer
- Approach teacher and ask if they would like to participate as well
- Approach another observer to collect reliability data
- Complete a 5 in 20 observation
- Information gathered is anonymous

Research tasks

Teacher
- Allow observer to complete 5 in 20 observation during a whole-class lesson
- Information gathered is anonymous

Reliability partner
- Complete a 5 in 20 observation
- Complete social validity scale
- Information gathered is anonymous

If interested please contact
Alexandria Cardot
School Psychology Graduate Student
akcardot@eiu.edu

Dr. Margaret Floress, Thesis Chair
Thesis Chair
mfloress@eiu.edu

Help support student research on classroom management!

This study is being reviewed by Eastern Illinois Institutional Review Board (IRB).
Appendix D: Consent to Participant in Research Primary Observer Form

CONSENT TO PARTICIPATE IN RESEARCH – Primary Observer Form

Assessing Teachers’ Classroom Management Practices

You are invited to participate in a research study conducted by Kari Meyer, SSP and Margaret Floress, PhD. Your participation in the study is entirely voluntary. Please ask questions about anything you do not understand.

Purpose of the Study
We are interested in piloting an observation tool which may prove useful to school psychologists who consult with teachers regarding effective classroom management practices.

Procedures
Observer participants will approach a teacher and ask if they would like to participate in the study with you. If they agree, you will observe the teacher for a single 20-min observation, while they provide a whole-class lesson, using the pilot tool intended to measure classroom management practices. After the observation, you will complete a demographics and observation acceptability survey (approx. 8 min). ***You may also recruit a second observer to collect observation data with the same observation tool simultaneously (so that reliability can be assessed). You will receive a $15 gift card for your participation.

Potential Risks and Discomforts
This study has been approved by the Eastern Illinois University Institutional Review Board. (#). There are no foreseeable risks associated with participating in this study.

Confidentiality
All participant forms will be coded (e.g., A-1) to keep participant data confidential. Your name (or other personal information) will not be paired with your demographic, observation, or acceptability data. Collected data will be emailed to Dr. Floress’ and downloaded onto a password-protected computer in her locked office. All participant data will be stored for at least 3-years. Dr. Floress, Ms. Meyer, Ms. Allie Cardot and Kaylee Hampton (two school graduate psychology, research assistants) will be the only persons with access to data.

Anticipated results are expected to provide insight into teachers’ classroom management practices and the acceptability of the observation tool. We hope that the results from this study will help develop an efficient observation tool that school psychologists can use to guide meaningful consultation recommendations.

If you have questions or concerns about this research, please contact: Margaret Floress, Ph.D., at 217.581.2127 or mfloress@eiu.edu. If you have any questions or concerns about the treatment of human participants in this study, you may call or write:

Institutional Review Board
Eastern Illinois University
600 Lincoln Ave.
Charleston, IL 61920
Telephone: (217) 581-8576
E-mail: eirb@eiu.edu

I voluntarily agree to participate in this study. I understand that I am free to withdraw my consent and discontinue my participation at any time without consequences of any kind or loss of benefits or services. I have been given a copy of this form.

Participant’s Signature __________________________ Date ______________________

Investigator’s Signature __________________________ Date ______________________
Appendix E: Consent to Participant in Research Teacher Form

CONSENT TO PARTICIPATE IN RESEARCH – Teacher Form
Assembling Teachers’ Classroom Management Practices

You are invited to participate in a research study conducted by Kari Meyer, SSP and Margaret Floress, PhD. Your participation in the study is entirely voluntary. Please ask questions about anything you do not understand.

Purpose of the Study
We are interested in piloting an observation tool which may prove useful to school psychologists who consult with teachers regarding effective classroom management practices.

Procedures
Teacher participants will be observed for a single 20-min observation while providing a whole-class lesson. A school psychologist (or other consultant) in your district will conduct the observation using the pilot tool intended to measure classroom management practices. Teacher participants will also complete a brief demographic survey and a 10-question, multiple choice measure related to praise. You will receive a $15 gift card for your participation.

Potential Risks and Discomforts
This study has been approved by the Eastern Illinois University Institutional Review Board. (19-102). There are no foreseeable risks associated with participating in this study.

Confidentiality
All participant forms will be coded (e.g., A-1) to keep participant data confidential. Your name (or other personal information) will not be paired with your demographic or observation data. Collected data will be emailed to Dr. Floress’ and downloaded onto a password protected computer in her locked office. All participant data will be stored for at least 3 years. Dr. Floress, Ms. Meyer, Ms. Allie Cardot and Kaylee Hampton (two school graduate psychology, research assistants) will be the only persons with access to data.

Anticipated results are expected to provide insight into teachers’ classroom management practices and the acceptability of the observation tool. We hope that the results from this study will help develop an efficient observation tool that school psychologists can use to guide meaningful consultation recommendations.

If you have questions or concerns about this research, please contact: Margaret Floress, Ph.D., at 217.581.2127 or mfloress@eiu.edu. If you have any questions or concerns about the treatment of human participants in this study, you may call or write:
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Charleston, IL 61920
Telephone: (217) 581-8576
E-mail: eiuirb@www.eiu.edu

I voluntarily agree to participate in this study. I understand that I am free to withdraw my consent and discontinue my participation at any time without consequences of any kind or loss of benefits or services. I have been given a copy of this form.

Participant’s Signature Date

Investigator’s Signature Date
CONSENT TO PARTICIPATE IN RESEARCH – Reliability Observer Form

Assessing Teachers' Classroom Management Practices

You are invited to participate in a research study conducted by Kari Meyer, SSP and Margaret Floress, PhD. Your participation in the study is entirely voluntary. Please ask questions about anything you do not understand.

Purpose of the Study
We are interested in piloting an observation tool which may prove useful to school psychologists who consult with teachers regarding effective classroom management practices.

Procedures
Reliability observer participants will observe a teacher for a single 20-min observation, while they provide a whole-class lesson, using the pilot tool intended to measure classroom management practices. This observation will take place simultaneously with the observation conducted by the primary observer. After the observation, you will complete a demographics and observation acceptability survey (approx. 8 min). You will receive a $15 gift card for your participation.

Potential Risks and Discomforts
This study has been approved by the Eastern Illinois University Institutional Review Board. (# ). There are no foreseeable risks associated with participating in this study.

Confidentiality
All participant forms will be coded (e.g., A-1) to keep participant data confidential. Your name (or other personal information) will not be paired with your demographic, observation, or acceptability data. Collected data will be emailed to Dr. Floress’ and downloaded onto a password protected computer in her locked office. All participant data will be stored for at least 3-years. Dr. Floress, Ms. Meyer, Ms. Allie Cardot and Kaylee Hampton (two school graduate psychology, research assistants) will be the only persons with access to data.

Anticipated results are expected to provide insight into teachers’ classroom management practices and the acceptability of the observation tool. We hope that the results from this study will help develop an efficient observation tool that school psychologists can use to guide meaningful consultation recommendations.

If you have questions or concerns about this research, please contact: Margaret Floress, Ph.D., at 217.581.2127 or mflloress@eiu.edu. If you have any questions or concerns about the treatment of human participants in this study, you may call or write:

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I voluntarily agree to participate in this study. I understand that I am free to withdraw my consent and discontinue my participation at any time without consequences of any kind or loss of benefits or services. I have been given a copy of this form.

Participant's Signature Date

Investigator's Signature Date