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Effects of Mentorship on Empathy Development and Civility in an Upper School Community

An Action Research Report

By Cassella M. Slater

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Effects of Mentorship on Empathy Development and Civility in an Upper School Community

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in fulfillment of final requirements for the MAED degree

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This action research project investigated the effects of mentorship on empathy development and civility in an upper school classroom. The environment was a Montessori upper school with 21 children ages 6 through 13. It is a newer classroom; however, there is a level of incivility and indifference in their social behaviors. Data was collected using an interactions matrix, pre and post surveys, classroom behavior tally, and the Developmental Environmental Rating Scale before and after the intervention. Results showed civility and joy greatly increased over time. Individuals’ understanding of empathy showed a positive change. Overall, the classroom became more civil and showed a better awareness of appropriate social behaviors. The action plan proposed creating a study focusing more intently on mentorship implementation using prepared activities for the mentors to share. Also suggested is conducting a study of relationship building within a classroom instead of across classrooms.

*Keywords*: civility, empathy, Montessori, joy, mentorship
Normalization is Montessori specific describing a dynamic process of human beings building and exercising self-discipline, work ethic, joy, integrity, and empathy. In an elementary classroom, children are strengthening these attributes. Throughout the day they make multitudes of decisions about academic work and social dynamics; deciding what is right and wrong. They navigate their environments, building their intellect, character, and moral code. Grazzini referred to this age group as the age of rudeness. However, elementary is a prime time to address proper etiquette because of the children’s inner drive for justice and understanding of the society, in which they will participate (Travis, 1999). There are many components of civility according to the literature, one of which is empathy. How can the teacher in the Montessori classroom, often referred to as a guide, best support the development of civility to achieve normalization along with a sense of compassion, empathy, and joy in the classroom culture? What is the impact of mentorship programs on civility in the upper school classroom (elementary and adolescents, ages 6-13), focusing on the effects on normalization, compassion, empathy, and joy in the classroom culture?

Adults continuously observe in the Montessori classroom. Over time, I have noticed a pattern of rudeness and incivility in the children's behaviors and social responses within the classroom. Typically, high energy situations bring about these instances, such as on the playground. Incivility (rudeness and unacceptable social response) has been witnessed in the classroom towards certain children who annoy in order to obtain attention. These deviant behaviors spread through the environment quickly and affect the overall community atmosphere. We give lessons on various social graces focusing on civility and manners, as well as certain life skills like how to make a phone call or offer help. We also model appropriate behavior regularly; however, our upper school children struggle to practice civility.
The classroom consists of twenty-one children ranging in age from six years old to thirteen. However, all children in the school are affected by this problem because there are interactions daily between all age levels. They come from a variety of backgrounds: low-income, wealthy, middle-income; Hispanic, Caucasian, African-American, bi-racial, Indian; rural living, subdivision, large town. There is one lead guide (the teacher) and an assistant in the classroom. Students also interact with other adults throughout the school.

Children of this age are keen on defining what is right and wrong, what is acceptable or not, both personally, and also in the eyes of society. As a guide to these young humans, we must help them in this development by providing appropriate feedback and guidance as they navigate and determine their morality. Addressing this incivility is necessary for normalized development in our children and adolescents. It is our job as Montessori guides to provide an environment suited to providing the appropriate feedback to these questions.

Our ultimate goal of education is to prepare the child for life in society and to be a contributing member. Addressing these grace and courtesies when humans are forming their morality means that when they are older, what is right or wrong (as deemed by society) will already be part of them, not a new behavior that needs to be learned. Elementary children have a high capacity for the development of civility due to their drive to gain moral independence and innate desire for justice. Due to observed incivility and unawareness of appropriate social responses and the students' capacity to understand and grow their moral autonomy, I will present conversational grace and courtesy lessons and institute mentorships to observe the effects on civility and social graces in the classroom.
**Theoretical Framework**

Humans are constructors of knowledge. Through previous experiences, the environment, and active involvement in learning, humans build their unique interpretation of culture and the world around them. This theory of education, constructivism, began in the late 1800s. Dr. Maria Montessori, a contributor to constructivism, observed and scientifically studied human physical and psychological development and unveiled a unique and effective way to educate the whole child. The basis of her pedagogy is that all humans have within them the ability to build knowledge, and the environment around them significantly contributes to this construction. Humans construct themselves, and it is the job of the adult to connect them with the surrounding world. However, differing from the constructivism theory, Dr. Montessori believed strongly that the adult was only part of the environment, not the most important part of the environment. The adult guides the children to work but is not the control of error; that comes from the materials. Also, unlike constructivists, the children begin with the sensorial experiences and language acquisition, then meaning and conceptualizing. Learning comes from the child’s ability to explore the environment and materials making errors and persevering through challenges.

Dr. Maria Montessori wrote about the human being going through Four Planes of Development: birth to 6 years, 6 years to 12 years, 12 years to 18 years, and 18 years to 24 years. Each plane has unique needs and characteristics. The environment in which they learn must change based on these distinctive attributes. This research focuses on the second plane of development – 6 years to 12 years – also known as the elementary age.

Grace and courtesy is modeled constantly by the adults. Their job is to create the social dynamic in the classroom. Dr. Montessori wrote about various ways to develop a sense of responsibility in elementary children. One of these ways is called grace and courtesies. These
presentations bring to their attention that their behavior calls for a particular responsibility. By six years old, humans are constructing the individual and finding their place in society. They do not intend to hurt feelings; instead, they are exerting independence and living in their intellectual mind. The child discovers his place in society through his work. A successful member of the group knows how to be in the group: cooperation, collaboration, and communication. Second plane children are working on these skills. They focus no longer on themselves; instead, they want to be a part of the group, not the center of attention. Grace and courtesies give the skills necessary for the children to be successful in navigating the social dynamics of the group. To be a contributing member of a group, one must take responsibility for one’s actions and have an awareness of others. Second plane children are forming a conscious. Children strive to be better and do better for their self and the community.

‘How’ and ‘why’ questions engage the second plane child. We cannot limit the learning just to ‘what’. They need reasons, and it is wasting the opportunity for full development if this opportunity is not utilized. Offering grace and courtesies to the children allows them to participate in a group and to ask how and why. How do I use this in a real situation? Why would I react in this way instead of my typical response? We want our children to be inquisitive, creating, imagining, planning, exploring how and why. It is a rare occasion for the Montessori elementary children to agree all at once; they debate, argue, discuss; this is self-construction.

The second plane child is known for hero-worshiping. They even have an enormous power of admiration. The child begins to gain perspective on right and wrong through these shared heroes. These children see needs and want to serve. They want to help others. We need to provide opportunities for service – positive contributions both in and out of class. The second plane is the age of service; it comes from within. They’re developing compassion and ultimately
deciding how to contribute to society. When we offer the opportunity for children to mentor others, this compassion and contribution will be exercised and practiced. They will use the grace and courtesies previously shared; they will experiment and get live feedback.

Also, without freedom, the children cannot build themselves to their fullest potential. They must have the freedom to develop their intellect and decide how they will learn what interests them. If we recognize and provide freedom, the children will do great work beyond our imagination. They will choose work and be excited about it. Freedom allows the children to realize they are capable and to know when they have done their best work. Allowing freedom builds self-esteem, and what we say becomes meaningless. As they become capable of doing for themselves, they recognize their contributions and realize their responsibility to the class and the community.

Second plane children are trying to find a place in society, understand it, and are learning how to function in it. Our environments must prepare them to enter the broader community. For success, they must have practice. ‘Going outs’ are their practice. We must enlarge the area of exploration and learning by going beyond the classroom. There must be a prepared environment both in the school and in the community.

Maria Montessori’s second plane characteristics and grace and courtesies support the use of mentorship as an avenue to explore and amplify appropriate social interactions. Mentorship gives an opportunity for the children to practice grace and courtesy. It also allows them the time and space to go beyond the classroom and feel their impact on the world. Throughout time, humans have decided to be gregarious and communal, which leads to a development of empathy and compassion (Foster, 2019).
Literature Review

Maria Montessori scientifically investigated child development, observing the whole child from academics to social-emotional skills, and revealed a radical approach to education that would support every child socially, emotionally, academically, physically, and psychologically in their development to become a contributing member of society (Joosten, 2018). There are four planes of development from birth through age 24, each consisting of six years. Dr. Montessori found the first plane to be one of massive growth and change (Montessori, 2017). The human being goes from an infant who relies on others to survive to an independent being capable of doing for himself. A child in the second plane of development (six to twelve years old) is outwardly calmer because their intellect is more active. While many characteristics define the second plane, often people think of these children as being rude. Travis (1999) says, despite the rudeness, it is:

An incredibly wonderful time of life when the child enters into the abstract, when he is mainly interested in the how and why, the time of life when the creative faculty of the imagination comes into play, an interest in being part of a group can be observed, and justice and morality is being developed (p. 36).

Maria Montessori defined the age of adolescents (twelve to eighteen years old) as the third plane of development. The final plane before adulthood is, maturity (18 years old to 24 years old); the final plane before adulthood.

This study focuses on the second plane of development – the age of rudeness, elementary. In our Montessori classrooms, we strive to provide an environment that best supports that plane of development. Elementary children have some characteristics they hold in common: they are gregarious, social, loyal, courageous, rude, empathetic; they have a reasoning mind and a strong
sense of justice; they worship heroes and define their own morality (Awes, 2016; Montessori, 2013). One way to aid our students in their moral development is through something we call grace and courtesy lessons (Baker, 1999). These are presentations given to the children to address and provide the necessary skills for harmoniously navigating the social norms and expectations of society (Baker, 1999). According to Hicks, Dr. Montessori said we as the adults in these children's lives must provide opportunities for them to experience social life for themselves; if we do not offer these opportunities, our children will "not develop a sense of discipline and morality." (Hicks, 1999, p. 71)

Overall, we hope these students develop the skills necessary to become contributing members of society. Hicks quoted Elise Boulding, a leader in the peace education movement, saying:

The child who becomes an altruist, an activist and a nonviolent shaper of the future is then one who feels autonomous, competent, confident about her own future and the future of society, able to cope with stress, relates warmly to others and feels responsibility for them even when they are not directly dependent on her. (Hicks, 1999, p. 66)

Elementary children have a high capacity for the development of civility due to their drive to gain moral independence and innate desire for justice (Montessori, 2014). Our upper school children struggle to practice civility despite adult modeling and grace and courtesy lessons. The most challenging situations seem to be those that are high energy situations such as on the playground. Incivility has been witnessed in the classroom towards specific children in response to said child's usual reaction to obtain attention – to be annoying.
Civility

Dr. P.M. Forni, the co-founder of the Johns Hopkins Civility Project, decided that society is failing to raise human beings who are purposefully decent in everyday life. Being civil is necessary to have a functioning society. "The antonym of civility is rudeness and incivility, but the antonym for the culture of civility is barbarism. Civility is the force that made civilizations civilized." (Schaefer, 2015, p. 110)

During the elementary years, focusing on civility can be highly appropriate due to the children's propensity for justice and morality. They are interested in knowing why and how, as well as having the desire to determine what is just and what is fair (Travis, 1999). The basis of civility is in history. Schaefer (2015) wrote an eloquent article titled History and Civility where he articulates the origins of the term. The term civility has evolved throughout time. Elementary age children enjoy hearing these reasons and origin stories (Schaefer, 2015).

Unfortunately, as a society, we seem to be failing the respect-and-consideration test. Opinion surveys have been reporting for years that Americans are quite concerned about the incivility they encounter every day. They feel they have been witnessing a steady decline of standards in their lifetimes and see no realistic indication that a trend reversal is around the corner. (Forni, 2008, p. 5)

So, something must change and when we examine the characteristics observed by Dr. Montessori for the second plane child, the elementary years are the prime time to intentionally integrate civility education. The elementary child is "maturing consciously in social life, aware of duties – good manners, teamwork, and cooperation listening to others and sharing their work, speaking out in class meetings, challenging their peers to honor responsibilities, kind, and empathetic." (Schaefer, 2015, p. 107)
Empathy

Many researchers have examined how to strengthen empathy development in elementary children. Some have used storytelling or moral dilemmas (Upright, 2002), others have recommended adult language modeling (Kersey & Masterson, 2013), even others have used improv (Balonon-Rosen, 2017) or humane education (Daly & Suggs, 2010). Increasing empathy proved to be a difficult quality to measure. Gerdes, Segal, and Lietz, (2010) evaluated current issues in defining empathy through the eyes of social sciences. Decety and Moriguchi (2007) ultimately defined empathy as “the interaction of four physically observable neural networks that include 'both automatic affective experience and controlled cognitive processing...[they are] distinct but interrelated processes that may be instantiated differently in the brain (Rameson & Lieberman, 2009, p. 95).” In the evaluation by Gerdes et al. (2010), they looked at the neurological implications of empathy, determining there are four "neural networks that must be activated for a human to have a complete experience of empathy" (p. 2332) – affective sharing, self-awareness, mental flexibility and perspective taking, and emotion regulation.

Much of the current research on empathy development incorporates an element of discussion or bringing certain situations to the child's attention. Upright (2002), Masterson et al. (2013), and Balonon-Rosen (2017) utilize the adults in the environments to bring up an issue and then talk through how one may approach the dilemma using empathy as well as other social cues.

Grace and Courtesy

The second plane of development is the age of rudeness (Grazzini, 2016). However, Travis (1999) stated that it is the prime time to address the proper etiquette because of their drive for justice and understanding the society in which they will participate. These children are trying
to make the minute distinctions for themselves; portraying rudeness, such as no longer saying please or thank you, is the child's way of asking "Can I still get what I want without saying please? Is this going to be good enough or is there a higher standard to which I will be held? Why? Is this going to be good enough or not?”. (Travis, 1999, p. 31)

Grace and courtesy lessons are used in the Montessori classroom to address behaviors that are deemed appropriate or inappropriate by society. Ludick (2015) says:

The practices of grace, courtesy, and civility inform and protect the prepared environment for children and adolescents in a particularly effective way. They free them to be their best selves…They enable us to serve at a higher level of understanding and enable us to go about our learning and our lives in a balanced manner. (p. 20)

In other studies involving improv (Balonon-Rosen, 2017) or moral dilemmas (Upright, 2002) or adult language modeling (Kersey & Masterson, 2013) are all essentially using grace and courtesy lessons.

…we have wonderful opportunities to help the children in our classes develop kindness, respect, humanity, good will, altruism, mercy, charity – all synonyms of the word grace – as well as consideration, favor, dispensation, indulgence, service, privilege – synonyms of the word courtesy. (Travis, 1999, p. 33)

Mentorship

Over the years, mentorships have gained popularity, especially between community adults and adolescents (Herrera, et al., 2007). However, there is little research on mentorships between adolescents or elementary age children and those younger. In general, the effects of mentorship are positive, but the appearance of impact varies primarily because mentorships grow from relationships and those are highly personal (Keller & Price, 2012). In a mentorship, the
mentor should “provide emotional support, friendship, motivation, and encouragement, as well as serve as positive role models” (Herrera C., 2004, p. 95). The investigation done by Keller and Price (2012) focused mostly on the outcomes for the mentees, not what the mentors took away.

Rekha and Ganesh (2012) looked at the mentors. They were interested in what benefit the mentorships had on the mentors, not just the mentees. In their study, they saw that mentors also received great benefits through these relationships including interpersonal and leadership skills, and trust (Rekha & Ganesh, 2012). Mentorship can have benefits, not only for the mentees but also for the mentors. It is our job to provide an environment where children can freely meet their developmental needs.

…[T]he child must learn by his own individual activity, being given a mental freedom to take what he needs, and not to be questioned in his choice. Our teaching must only answer the mental needs of the child, never dictate them…He must have absolute freedom of choice, and then he requires nothing but repeated experiences which will become increasingly marked by interest and serious attention, during his acquisition of some desired knowledge. (Montessori, 2014, pp. 4-5)

Providing access to mentorship will allow the children to practice and investigate the social relationships and to build the skills necessary for interpersonal interactions.

**Normalization**

Maria Montessori used the term ‘normalized’ to express what she saw in the children when they found work of their own free will and became fully immersed (Montessori, 2017). Freedom and responsibility are an essential balance for achieving normalization.

In our schools, this ‘moment of healing’ is not the point of arrival as it is in the clinics for difficult children, but it is the point of departure, after which ‘freedom of action’
consolidates and develops the personality. Only ‘normalised’ children, aided by their
environment, show in their subsequent development those wonderful powers that we
describe: spontaneous discipline, continuous and happy work, social sentiments of help
and sympathy for others. Activity freely chosen becomes their regular way of living.
(Montessori, 2017, pp. 317-318)

Through purposeful developmental work, normalization will occur. Children will happily and
joyfully work (Montessori, 2017). Joy is, “great pleasure, gladness; happiness; cause of this.” (A
DK Publishing Book, 1997, p. 227) Children will also be able to express support and compassion
for others more readily (Montessori, 2017). Compassion is, "sympathy; pity.” (A DK Publishing
Book, 1997, p. 80)

When we understand the psychological characteristics of our children including their
sense of justice, socialization, reasoning mind, and imagination, they will build self-respect and
confidence that will allow them to recognize the world as one community in which we all
participate (Travis, 1999).

A person has to have a sense of self-worth first, before one is going to be able to
recognize the worth of others…But if we can help them feel grace and mercy for
themselves, to accept themselves for who they are, recognizing their strengths and
accepting their weaknesses, we will have given them a gift greater than any academic
studies they may also have mastered. (Travis, 1999, p. 36)

Normalization is a continually fluctuating state for both the individual and the classroom. The
guide must be the dynamic link between the children and the environment. One of these
connections occurs through the grace and courtesy lessons. The elementary child has the desire
to learn how society functions and by giving him the tools necessary to navigate and order these
constructs as well as the opportunities to freely choose and practice, they will become their best selves (Montessori, 2014).

Dr. Montessori believed that within each child is a vital urge for knowledge. He grows by his work. Through his work, freely chosen, he becomes transformed and shows the characteristics of normalization: poise, order, independence, self-reliance, the ability to exercise appropriate choices, self-discipline, at peace with himself, kind and desire to help others. Montessori says in The Secret of Childhood, "The normal education of a child should lead to transcendence, the mastery of himself in a transcendent environment, making use of the visible and invisible forces of nature." At the heart of Dr. Montessori's work was the recognition of the importance of the integrated person, the ordered personality. Normalization is a point of arrival not of departure. (Cobb, 1999, p. 55)

With all of this in mind, the goal of this research is to examine the adult and the prepared environment to determine how we can best support the development of civility to achieve normalization along with a sense of compassion, empathy, and joy in the classroom culture. What is the impact of mentorship programs on civility in the upper school classroom, focusing on the effects on normalization, compassion, empathy, and joy in the classroom culture?

**Methodology**

Spanning six weeks, students engaged in mentoring partnerships with the Children's House (ages three to six) classroom. Regularly, a grace and courtesy lesson was presented to the whole Upper School at the beginning of the week. Grace and courtesy lessons were a normal classroom practice; however, this intervention scheduled them to happen at regular intervals, instead of the usual spontaneity. The Upper School students had all week to find time to meet with their mentee. Mentoring was a new practice implemented specifically for this intervention.
These mentoring sessions varied in length and structure. Some mentors would read a book to their mentee lasting about ten minutes. Others ate lunch with their mentee, which lasted nearly an hour. The mentoring sessions were intended to provide an opportunity for the mentors to practice the grace and courtesy lesson of the week with someone outside of their peer group. However, this was not explicitly required. Therefore, no data was collected on the content of the mentoring sessions.

Students' empathy, civility, and grace were measured by a combination of data tools including, (1) pre and post student survey (Appendix A); (2) tally of uncivil interactions in the classroom, as well as, compassion, empathy, and joy (Appendix B); (3) matrix of children interactions observed, which looked at the basis of interaction, its civility rating, who was involved, if someone had to intervene, and the result or culmination (Appendix C); (4) debrief questions that came after a mentor session (Appendix D); (5) developmental environmental rating scale (DERS) (Appendix E). The study was conducted not by the lead guide, but by an adult in regular interaction with the students; she is the author of this study.

The Developmental Environmental Rating Scale (DERS) was used to collect baseline data before the start of the intervention, as well as, conclusion data after the intervention ceased. DERS is a tool that measures "patience and persistence in children, precision and clarity in lessons, and order in the environment" (National Center for Montessori in the Public Sector, 2019, para. 4). It evaluates aspects of the classroom that support joy, social graces, engagement, and order. All of these elements are essential in the normalization of an environment. This tool will help evaluate the growth in normalization in the classroom due to the intervention implemented through this research. For this research, the social-emotional flexibility outcome was the main focus of the DERS evaluation. DERS also collects data on initiation and
concentration, inhibitory control, working memory, and linguistic and cultural fluency. This tool assessed the classroom as a whole before and after the intervention. (See Appendix E)

Pre and post student survey questions were modified from both Davis (1980) and Gerdes et al. (2010). All the students participated in the survey before and after the intervention. The questions were read aloud to cater to the wide age range in the classroom. Students who needed more of an explanation or clarification were welcome to raise their hand and ask. The researcher also roamed the class to answer or clarify personally. The questions on the survey were classified into four categories: affective sharing, self-awareness, mental flexibility and perspective taking, emotion regulation. (see Appendix A) Decety and Moriguchi (2007) defined the four categories as follows: (AS) Affective sharing: This refers to the subjective ‘reflection' of another person's observable experience (e.g., feeling amused when someone else laughs or sad upon seeing another person cry). This is based on automatic neural mirroring and the ‘shared representations' such as facial expressions or activities associated with feeling. (SA) Self-awareness: Mirroring alone can be so powerful it effectively erases the perceived boundary between self and other. Self-awareness implies that the empathic person differentiates between his/her experience and that of the person being observed. (MF/PT) Mental flexibility and perspective taking: This refers to the cognitive ability to learn about the situations affecting others, and to effectively imagine what it would be like to experience the world from the other's position. It requires abstract thought, calculation, and applied knowledge. (ER) Emotion regulation: This refers to the empathic person's ability to ‘turn down the volume' of his/her feelings as they arise from mirroring another's experience. Inability to regulate emotion can interfere with compassionate action (e.g., by creating overwhelm and burnout for individuals in helping or caretaking social roles). Students rated their responses on a one to five scale; one is not very like me and five
being very like me. The data allowed the researcher to show if there were other perceived changes in the environment besides her own subjective opinion.

Daily, the researcher observed in the classroom using the tally of behaviors and the matrix of children interactions data tools. With the tally of classroom behaviors tool, the researcher drew a tally mark each time she observed uncivil behavior, compassion, empathy, joy, or civility. (see Appendix B) It was an ongoing tally, updated regularly throughout observations. There was also a section for comments and quotes. This was used to record any relevant observations of either the child exhibiting the behavior or of the classroom as a whole. The data allowed the researcher to view objectively what the changes were in the environment before and after the intervention. The interactions matrix was used to collect more detail on interactions involving more than one student. It had room to record a description of the interaction, the basis of the interaction (work, social, prompted, unprompted, etc.), civility rating (1 is low 5 is high), time of day and length of interaction, children involved, intervention necessary and type, result or culmination of the interaction, and notes. (see Appendix C) This data allowed for comparisons to be made and patterns to be seen in the children as well as the exhibited behaviors.

Once per week, after the children had the opportunity to mentor, debrief questions were asked of the whole class. (see Appendix D) These questions allowed for the students to reflect with the support of their peers and the researcher on how the mentoring and grace and courtesy lessons were affecting their behavior as well as the behavior in the classroom. It also acted as a support group for the mentorship program. The data collected from these sessions provided anecdotal field notes to best answer the research questions. It allowed the researcher to make any changes necessary to the guidance of these mentorships or grace and courtesy lessons, during the intervention.
After the intervention ceased, students continued to visit with their mentees, on their own. With the analysis of all this data, the research will be able to view the intervention effectiveness from multiple perspectives as well as find correlations or patterns of behavior that contributes to or detracts from the normalization of the upper school classroom.

**Initial Data Analysis**

**Developmental Environmental Rating Scale, Baseline**

This study began with collecting baseline data using Developmental Environmental Rating Scale (DERS). Whole class observations were categorized in five ways: initiation and concentration; inhibitory control; working memory; linguistic and cultural fluency; and social fluency and emotional flexibility. The environment supported student-driven work; some children were in deep concentration. Throughout the hour observation, students engaged in a variety of work both individually and collaboratively. There was an understanding of social expectations and children were able to participate in appropriate conversations. Most children expressed comfort and joy in the environment in both social interactions and their work.

*Figure 1. DERS Baseline Data Showing the Presence of Environmental Attributes.*
As shown in Figure 1, the classroom has a balance throughout the five categories. Social Fluency and Emotional Flexibility is the area of the classroom this study focused on. It began as the lowest ranked attribute in the classroom, at 18%.

Also analyzed by DERS were certain elementary child behaviors (see Figure 2). It ranks the behavior zero to three, where three is frequently observed, and zero is not often observed. Figure 2 shows joy, conversation, planning and reflection, collaboration, comfort with adults, persisting in the face of challenge, and resolving needs with words to be the top-rated attributes of the children in the Upper School classroom. However, social graces were one of the weakest characteristics.

<table>
<thead>
<tr>
<th>Table 1</th>
<th>Elementary Child Behaviors (Pre)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attributes</td>
<td>Ranking</td>
</tr>
<tr>
<td>Disrupting</td>
<td>0</td>
</tr>
<tr>
<td>Caring for classroom</td>
<td>1</td>
</tr>
<tr>
<td>Social Graces</td>
<td>1</td>
</tr>
<tr>
<td>Navigating the room with care</td>
<td>2</td>
</tr>
<tr>
<td>Maximum effort</td>
<td>2</td>
</tr>
<tr>
<td>Offering/receiving help from peers</td>
<td>2</td>
</tr>
<tr>
<td>Shifting</td>
<td>2</td>
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<tr>
<td>Seeking adult approval</td>
<td>2</td>
</tr>
<tr>
<td>Joy</td>
<td>3</td>
</tr>
<tr>
<td>Conversation</td>
<td>3</td>
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<tr>
<td>Planning and reflection</td>
<td>3</td>
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<tr>
<td>Collaboration</td>
<td>3</td>
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<tr>
<td>Comfort with adults</td>
<td>3</td>
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<tr>
<td>Persisting in the face of challenge</td>
<td>3</td>
</tr>
<tr>
<td>Resolving needs with words</td>
<td>3</td>
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</tbody>
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*Table 1*. Ranking Elementary Child Behaviors with DERS Baseline.

**Pre-Survey**

Following the DERS baseline data collection, a pre-survey was given to collect the children’s initial understanding and perspective on empathy. The survey classified the questions
into four categories: affective sharing, self-awareness, mental flexibility and perspective taking, and emotion regulation. The most challenging area for the majority of the students was mental flexibility and perspective taking. This category is an essential component of exhibiting empathy and not just compassion. It is what allows the person to understand and relate other’s situations. Seeing this result in the pre-survey supports the initial observation when developing the research question that students could not first think how the other may be feeling before acting.

*Figure 2. Pre-Survey Response by Category.*  

![Pre Survey Response by Category](image_url)
With this data tool, the more frequent an answer is given, the more strongly it indicates a child’s understanding. In the survey, when the student circled a higher number it meant they had a better understanding of empathy or related to more strongly to the statement. Mode was used to analyze the data because it showed if the student most often understood or related to the statement, or not. Figure 3 displays the mode responses. As you can see fourteen students most often chose five, strongly indicating that the statement reflected them. Agreement with the statements indicates that students understood and exhibited empathy. While two students most often chose one, and two students most often chose two, indicating a weak understanding of empathy.

Figure 3 also shows the average response of each student. The closer the students’ average and most frequent answer, the more consistent they were in their responses. For example, Student A only had six out of twenty responses on the extreme (one or five); however, Student Q had fifteen out of twenty answers on the extreme (one or five). Indicating one or five meant that the student related strongly for or strongly against that statement. Student S revealed
through the pre-survey there was little understanding of empathy and they mostly felt they did not display or feel empathy. Student H shows with this pre-survey a strong understanding of empathy and is confident they practice empathy regularly.

**Tally of Behaviors and Interactions Matrix**

The researcher made daily observations and recorded them using two data tools: a tally of behaviors, and interactions matrix. Figure 4 illustrates all five categories of behavior and their change over time — civility, joy, and compassion increase throughout the study. Uncivil behavior shows a sharp decline throughout the study. Empathy shows a very slight decrease. Along with the tally of behaviors, notes were kept. While types of uncivil behavior remained the same, the frequency at which they were observed declined. Uncivil behavior included throwing pencils or erasers, banging on tables, careless movement, loud conversations, and curt responses.
Compassion was one of the harder categories to observe. There was a particular nuance between observable compassion and empathy. As the study progressed, the definition of discernible compassion became more like community contribution and awareness of other, while empathy remained steadfast in exhibiting an understanding of another's feelings and attempting to build them up, not just console. The most excellent example of empathy occurred on March 7, 2019. Student J was hugging Student L, and they crashed into a shelf. Student L hit her head, and Student J bumped her arm. After the crash, Student J quickly stood up and walked away. Student R and Student B saw the crash happen and rushed over to Student L who was still on the floor and in tears. Student B asked if she was ok and said, “Can I get you some ice?” Student L
accepts. Student B goes to the freezer. Student R ushers her to a table saying, “Do you need a hug?” Student L accepts. While Student L holds the ice to her head, she is still tearful. Student R proceeds to make silly faces trying to make Student L laugh. Eventually, she succeeds, and Student L has recovered.

Overall, the classroom exhibited civil behaviors more often than any other observed. Joy and uncivil behavior were equally observed, as shown in Figure 5. Empathy and compassion were the least observed behaviors; however, this was not unexpected. Both of these behaviors require certain situations that cannot always be observed in an hour.

![Frequency of Classroom Behaviors](image)

*Figure 5. Frequency of Classroom Behaviors.*

Interaction matrixes were also completed daily. This tool concentrated on significant interactions between students. One of the observations made was called a civility rating, which ranked the interaction from one (uncivil) to five (civil). Figure 6 shows a gradual increase in the civility rating over time. When the tally of classroom behaviors data is compared to the interactions matrix data, there is a definite increase in civility in the classroom throughout the
Three times throughout the study, debrief questions were asked. These questions allowed for the students to reflect on their mentoring sessions. The first two questions focused on the session as a whole. "What went well in the mentorship this week? Why?", was the first question asked aloud. Students had a variety of responses. In the beginning, the best part of their time spent together was the work they chose to do. Student L said, "Corn muffins with Jack went well." Student E said, "The puzzle map went well." The next question asked was, "What went poorly? Why?". In the first debrief, most mentees said the conversations were the hardest. Student B said, "Conversations were hard to start." Student S said her mentee talked too much.

The middle two questions were asked to help the students reflect on the specifics of the session and how certain aspects may contribute. The first of these questions elicited only a few responses during the first two debriefs, but during the last, this was the most answered question –
"What made the session good or bad?" The responses to this question during the first two debriefs mostly reflected on the mentee, not the mentor. In the last debrief, mentors were noticing what they had done to contribute to the interaction, good or bad. “I was patient, and that made the conversation easier,” said Student A. "He had already chosen work, and I just joined," said Student E. This question was followed by, “What could be done differently next time?”

Throughout the responses, most mentors said something that they had control over. However, there were a few responses that centered around the mentee. Student E stated the first week that he could, "observe before to know what lessons he's had," which would be something Student E could do to change the outcome of the session. Student H said in the last debrief that she would have her mentee sit next to her when she reads aloud instead of showing her the pictures after reading a page. The answers did not evolve much as the study progressed.

The last two questions addressed the mentors’ impressions of their mentee and themselves – "How have your impressions of your mentee changed?" "How have your impressions of yourself changed?" These responses changed the most throughout the study. By the last debrief, mentors were showing appreciation for their mentee. "I thought he would be silent, but he actually has lots to share. I like his stories", said Student S. Their reflections on themselves revealed a better understanding of what they are capable of contributing. Student D said, "I used to think I couldn't teach others, now I feel like I can." He also stated, "I interact better with children now instead of losing my temper."

Post-Survey

On the last day of the study, the post-survey was conducted. This had the same questions and was administered in the same way as the pre-survey. Fifteen students responded with a four or higher most frequently. Five students answered with a two or below most frequently.
also shows the average response for each student. The closer the average response is to their most frequent response, the more consistent they were in answering. Student B and E had the most consistent responses. However, Student Q responded with the extremes, indicating that she felt the majority of the statements were exactly like her or not at all.

![Graph showing student responses]

**Figure 7.** Post Survey, Student Responses on Average and Most Frequent.

**Synthesis of Data**

When the pre and post surveys are compared, Table 2 shows how the student’s responses changed. Student O and P were unable to take the post or pre-survey, which is indicated with a 0. Students R and S showed the most positive change from the pre-survey to the post-survey. This means that these students gained a better understanding of empathy and were able to be empathetic more often. Overall, more students expressed a positive change than a negative change (Figure 8) according to the surveys.
### Table 2

**Pre and Post Survey Comparison**

<table>
<thead>
<tr>
<th>Student</th>
<th>Average Response, Pre</th>
<th>Average Response, Post</th>
<th>Percent Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>O</td>
<td>3.1</td>
<td>0</td>
<td>-310%</td>
</tr>
<tr>
<td>T</td>
<td>4</td>
<td>3.35</td>
<td>-65%</td>
</tr>
<tr>
<td>M</td>
<td>4</td>
<td>3.4</td>
<td>-60%</td>
</tr>
<tr>
<td>I</td>
<td>3.25</td>
<td>2.8</td>
<td>-45%</td>
</tr>
<tr>
<td>L</td>
<td>3.2</td>
<td>2.85</td>
<td>-35%</td>
</tr>
<tr>
<td>H</td>
<td>4.35</td>
<td>4</td>
<td>-35%</td>
</tr>
<tr>
<td>F</td>
<td>3.5</td>
<td>3.3</td>
<td>-20%</td>
</tr>
<tr>
<td>E</td>
<td>3.7</td>
<td>3.55</td>
<td>-15%</td>
</tr>
<tr>
<td>C</td>
<td>2.75</td>
<td>2.7</td>
<td>-5%</td>
</tr>
<tr>
<td>D</td>
<td>3.45</td>
<td>3.45</td>
<td>0%</td>
</tr>
<tr>
<td>G</td>
<td>3.45</td>
<td>3.45</td>
<td>0%</td>
</tr>
<tr>
<td>U</td>
<td>2.2</td>
<td>2.2</td>
<td>0%</td>
</tr>
<tr>
<td>J</td>
<td>3.1</td>
<td>3.15</td>
<td>5%</td>
</tr>
<tr>
<td>K</td>
<td>3.25</td>
<td>3.3</td>
<td>5%</td>
</tr>
<tr>
<td>N</td>
<td>3.7</td>
<td>3.8</td>
<td>10%</td>
</tr>
<tr>
<td>A</td>
<td>3.7</td>
<td>3.85</td>
<td>15%</td>
</tr>
<tr>
<td>Q</td>
<td>2.9</td>
<td>3.05</td>
<td>15%</td>
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<tr>
<td>B</td>
<td>3.15</td>
<td>3.45</td>
<td>30%</td>
</tr>
<tr>
<td>S</td>
<td>2.7</td>
<td>3.55</td>
<td>85%</td>
</tr>
<tr>
<td>R</td>
<td>3.4</td>
<td>4.3</td>
<td>90%</td>
</tr>
<tr>
<td>P</td>
<td>0</td>
<td>3.1</td>
<td>310%</td>
</tr>
</tbody>
</table>

*Table 2. Pre and Post Survey Comparison.*

![Student Response Change From Pre Survey to Post Survey](image)

*Figure 8. Student Response Change from Pre-Survey to Post Survey.*
The pre-survey indicated that mental flexibility and perspective taking was the weakest area of empathy understanding in the classroom. While this did not change, Figure 9 shows that it was the category that showed the most growth.

Finally, the last data was collected using the Developmental Environmental Rating Scale (DERS) tool. The classroom was again observed as a whole for one hour. Figure 10 illustrates the change in the frequency of observed behaviors by category. Overall, increased observable behaviors were indicating more initiation and concentration, more inhibitory control, more working memory, more linguistic and cultural fluency, and more social fluency and emotional flexibility. While the social fluency and emotional flexibility remained the lowest observed behavior, it did show one of the more significant improvements, along with linguistic and cultural fluency.

Figure 9. Pre and Post Survey Responses by Category.
DERS also ranks specific attributes exhibited in the classroom. In the baseline observation using DERS, social graces were listed as one of the least observed. Table 3 shows that this attribute became more apparent after the intervention. Offering and receiving help from peers also became more frequently observed. Unfortunately, disrupting and resolving needs with words decreased in frequency.

Students expressed a desire to continue visiting their mentee, and the class has begun developing ways to support their understanding of empathy. One suggestion has been to vary who they sit with at lunch so they can have conversations with students with whom they don't always interact. Overall, the upper school classroom showed growth in their understanding and expression of empathy and civility. As shown in Figure 4, 6, and 8, observable acts of civility increased. Most individuals' knowledge of empathy showed a positive change.
Table 3

*Elementary Child Behaviors (Post)*

<table>
<thead>
<tr>
<th>Attributes</th>
<th>Ranking</th>
</tr>
</thead>
<tbody>
<tr>
<td>Caring for classroom</td>
<td>1</td>
</tr>
<tr>
<td>Shifting</td>
<td>1</td>
</tr>
<tr>
<td>Navigating the room with care</td>
<td>2</td>
</tr>
<tr>
<td>Maximum effort</td>
<td>2</td>
</tr>
<tr>
<td>Disrupting</td>
<td>2</td>
</tr>
<tr>
<td>Social graces</td>
<td>2</td>
</tr>
<tr>
<td>Seeking adult approval</td>
<td>2</td>
</tr>
<tr>
<td>Collaboration</td>
<td>2</td>
</tr>
<tr>
<td>Persisting in the face of challenge</td>
<td>2</td>
</tr>
<tr>
<td>Resolving needs with words</td>
<td>2</td>
</tr>
<tr>
<td>Joy</td>
<td>3</td>
</tr>
<tr>
<td>Offering/receiving help from peers</td>
<td>3</td>
</tr>
<tr>
<td>Conversation</td>
<td>3</td>
</tr>
<tr>
<td>Planning and reflection</td>
<td>3</td>
</tr>
<tr>
<td>Comfort with adults</td>
<td>3</td>
</tr>
</tbody>
</table>

Table 3. Ranking Elementary Child Behaviors with DERS Post.

**Action Plan**

This action research project implemented mentorships between the upper school students and the Children’s House with the hope of seeing social behavior changes in the upper school classroom. The social behaviors being targeted were empathy, civility, joy, and compassion. My research showed a steady improvement in civility, joy, and compassion. Through the mentoring opportunity, students were able to practice these skills outside of their normal environment and without peer pressure.

The mentorships were highly encouraged, and students were reminded, however, not all students chose to participate on a regular basis. It was presented as any other lesson; it was a choice they could make any time. The activities they did with their mentee varied from joining the work their mentee already had out, showing their mentee something new in the upper school
classroom, and/or eating lunch with their mentee. It was an open-ended opportunity for the mentors to build a relationship with someone outside their usual peer group. Mentees were assigned. Many mentors were apprehensive of their partner, but by the end of the intervention, their perspectives had shifted. Most mentors were surprised by the level of conversation their mentee was capable of and that they (the mentors) actually enjoyed the interactions.

At the beginning of the week a new grace and courtesy was presented. These presentations focused on conversations, i.e., ways to interact with someone who will not stop talking or is not saying anything, etc. These arose as mentors reflected on issues they were having, during the debriefs. While the mentors did not take these grace and courtesy presentations and use the words directly, they did say that the conversations got easier and more two sided. Being able to have a conversation with someone is the basis of building a relationship with them. When you can build a relationship, then you can begin to express empathy. Working with the mentees provided an opportunity to practice relationship building.

Reaching out beyond their classroom strengthened the community both within the upper school and also in the school as a whole. Students on the playground interacted more beyond their age groups. During the debriefs with the mentees, there was eagerness to share and joy expressed as they heard others’ stories.

While there were positive results to this intervention, it is not clear that the changes were a direct result of the mentorships. In the future, refining the parameters of the mentoring and the grace and courtesies would be helpful. Even presenting the grace and courtesies more frequently instead of once a week. The mentorships were the one thing that changed drastically in the classroom during this time, so there is some support they were the cause of the positive change.
Conducting the research over a longer period of time would allow the students to really develop strong relationships with their mentee and feel confident enough to bring those same behaviors into their classroom on a more regular basis. More time would also allow the grace and courtesy lessons to extend beyond conversations. That is where a relationship starts, but there are many more elements to building a relationship that were left out due to time.

In the future, conducting a similar study but instead of mentorships out of the classroom, there are pairs of children within the classroom. For example, one child tends to get under another’s skin frequently, so they are paired. The requirement is to have five minutes of positive interactions daily. At the end of the study evaluating if there was any change in social behaviors from either party.

Future action research focusing on empathy and civility development could include community service. Implementing a more robust going out program with the elementary students where they researched, planned, and executed a community service project would provide opportunities for relationship building, and practicing communication. Also, the nature of selecting community service elicits concern and awareness for others – compassion.

Building relationships is hard work. To be a good teacher, you must have a good relationship with each of your students. To have a strong community, you must have good relationships among community members. Even though the intervention is complete, relationship building will be at the forefront, not only between the students, but also between the adults and the students. Continuing to work and practice building relationships will continue to support civility, empathy, joy, and compassion in the classroom.

Students have already expressed growth from this experience, saying they had no idea they could interact appropriately with such a young person or that their conversation skills
improved. They will be able to build on this experience and hopefully use the patience they
developed or the listening skills they practiced, to nurture the upper school community. The
mentoring provided an opportunity for the upper school students to practice compassion,
patience, understanding, and confidence. These skills will continue to translate into their
community and their interactions with each other. Elementary children are capable of being
compassionate, confident, and civil leaders. Mentoring gave them a small opportunity to practice
this beyond their classroom. Building a strong foundation for this in school and at this age will
translate to the adults they will become in the future – positive, contributing members of society.

References
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Paul, Minnesota, USA.
Courtesy: A Human Responsibility* (pp. 88-93). Rochester: Association Montessori
International of the United States, Inc.
Read Emotion. *All Things CONsidered [Radio broadcast]*. Indiana: NPR.
*Grace and Courtesy: A Human Responsibility* (pp. 54-57). Rochester: Association
Montessori International of the United States, Inc.


### Questions: Answer honestly and ask if you need clarification.

<table>
<thead>
<tr>
<th>Questions</th>
<th>Circle one:</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. (MF/PT) I try to see things from other people’s points of view.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>2. (MF/PT) When I don’t understand someone’s point of view, I ask questions to learn more.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>3. (MF/PT) When I’m upset at someone, I usually try to “put myself in his shoes” for a while.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>4. (MF/PT) (-) If I’m sure I’m right about something, I don’t waste much time listening to other people’s arguments.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>5. (MF/PT) I’ve told my friends things like, “you shouldn’t be upset about that” or “Stop feeling that way.”</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>6. (AS) I daydream and fantasize, with some regularity, about things that might happen to me.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>7. (AS) When I watch a good movie, I can very easily put myself in the place of a leading character.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>8. (AS) (-) Becoming extremely involved in a good book or movie is somewhat rare for me.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>9. (AS) When I am reading an interesting story or novel, I imagine how I would feel if the events in the story were happening to me.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>10. (AS) When I’m reading a book or watching a movie, I think about how I would react if I was one of the characters.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>11. (SA) When a friend is upset, I try to show them that I understand how they feel.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>12. (SA) When I know one of my friends is upset, I try to talk to them about it.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>13. (SA) (-) Sometimes I don’t feel very sorry for the other people when they are having problems.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>14. (SA) (-) When I see someone being treated unfairly, I sometimes don’t feel very much pity for them.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>15. (SA) When I see someone being taken advantage of, I feel kind of protective towards them.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>16. (ER) In emergency situations, I feel apprehensive and ill-at-ease.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>17. (ER) I sometimes feel helpless when I am in the middle of a very emotional situation.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>18. (ER) (-) When I see someone get hurt, I tend to remain calm.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>19. (ER) Being in a tense emotional situation scares me.</td>
<td>1 2 3 4 5</td>
</tr>
<tr>
<td>20. (ER) (-) I am usually pretty effective in dealing with emergencies.</td>
<td>1 2 3 4 5</td>
</tr>
</tbody>
</table>
### Appendix B
Tally of Classroom Behaviors

<table>
<thead>
<tr>
<th>Behavior</th>
<th>Tally of Frequency Observed</th>
<th>Comments/Quotes (as time allows)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uncivil</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Compassion</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Empathy</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Joy</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Civility</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
## Appendix C
### Interactions Matrix

<table>
<thead>
<tr>
<th>Description of Interaction</th>
<th>Basis of Interaction (work, social, prompted, unprompted, etc.)</th>
<th>Civility Rating (1 is low, 5 is high)</th>
<th>Time of day and length</th>
<th>Children involved</th>
<th>Intervention necessary? Type?</th>
<th>Result or culmination of interaction</th>
<th>Notes/Observations</th>
<th>Date:</th>
</tr>
</thead>
<tbody>
<tr>
<td>morning work cycle - transition to lunch - lunch/recess - transition to afternoon work cycle - afternoon work cycle</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>
Appendix D
Debrief Questions

1. What went well in the mentorship this week? Why?
2. What went poorly? Why?
3. What made the session good or bad?
4. What could be done differently next time?
5. How have your impressions or your mentee changed?
6. How have your impressions of yourself changed?
Appendix E

DERS Results

Organization Name: AMI/USA
Class Name: MMSUS
Exported By: BethAnn Slater

Observation Date: 01/23/2019
Duration: 00:40:28

Initiation & Concentration

Some students displayed deep concentration in their work, often attempting multiple ways of solving a problem, formulating ideas, or organizing presentations. Several students sought adult approval or permission while others assumed responsibility for their own work. All or almost all materials and furnishings are child sized. Students had two and a half hours or more of uninterrupted work time. The room arrangement supports collaborative work, there are ample materials to support student-generated research projects, and students have ongoing access to art materials. Students have access to all areas of the environment at all times and choose their work freely from a wide variety of options.

Inhibitory Control

There is a mix of students who were able to shift plans, activities, partners, and/or focus and children who cannot. Students consistently engaged in collaborative work, consulting on extended, complex projects and easily engaging in work-related conversation. Many students were seen to exercise persistence in their work, attempting multiple ways of solving a problem, and working through frustration.

Working Memory

Many students were able to navigate the classroom with coordination and attention to detail. The environment is carefully maintained, with meticulous attention to order and cleanliness; shelves and tables were tidy, free of dust, and ready for children's use. Digital technology was present as a support but not a delivery of instruction, and students use digital tools to develop and deliver presentations. Students did not receive instruction or assessment via computers, whole group instruction was not delivered with the aid of computers and SmartBoards, and classroom time was not taken up with individual, computer-based activities. Wall decor is carefully curated, consisting of fine art rather than commercial posters, and reflects students cultures, creating a comfortable, home-like environment.
Linguistic and Cultural Fluency

Most students appeared to be aware of the classroom community, and sometimes expressed needs verbally, and demonstrated understanding of social graces. The classroom is characterized by a low hum of conversation. Most learning materials were made from natural materials, including wood, glass, and fabric; there was minimal use of plastic. Either conversation was ongoing, or age-appropriate texts were always available, or there was a cozy reading area. Students had ongoing access to outdoor environments. Student prepared, consumed, and cleaned up meals and snacks in the classroom. A large complement of child-sized work tools were available and many children were observed using them.

Social Fluency & Emotional Flexibility

Most students regularly displayed signs of comfort, pleasure, and ease within the environment, including laughing, smiling, and expressing satisfaction with their work. One student was observed caring for the environment, but this is not a pervasive element of classroom culture. An easy relationship between adults and students dominates the classroom culture, with many conversational exchanges between students and adults, which often include smiles or jokes. Students were in mixed-age groups of three years. Interaction among students is organic and not orchestrated by adults.

Rated Attributes

Self-Study Elementary Child Behaviors

- Disrupting
- Caring for classroom
- Social graces
- Navigating the room with care
- Maximum effort
- Offering/receiving help from peers
- Shifting
- Seeking adult approval
- Joy
- Conversation
- Planning and reflection
- Collaboration
- Comfort with adults
- Persisting in the face of challenge
- Resolving needs with words
Self-Study Elementary Environment Attributes

- Clutter
- Excessive reliance on digital technology
- Directed child interaction
- Language rich
- Links to wider community
- Child-sized
- Cleanliness
- Uninterrupted work
- Natural materials
- Mixed age grouping
- Big work
- Materials ready for use
- Access and Choice
- Easy access to nature
- Prudent use of digital technology
- Curated decor
- Food
- Animals
- Plants
- Real tools and real work
Initiation & Concentration

Some students displayed deep concentration in their work, often attempting multiple ways of solving a problem, formulating ideas, or organizing presentations. Several students sought adult approval or permission while others assumed responsibility for their own work. An observer's chair was visible, but not used. Adults spent much of their time circulating, looking over students' shoulders and checking work completion; few lessons are given. Lessons and/or presentations were consistently offered as the beginning of learning, and students were encouraged to extend exploration and inquiry beyond the lesson. Adults gave few lessons during the observation, and appeared tentative with regard to his/her command of the content and enthusiasm for the content. Adults sometimes communicated curiosity about content. All or almost all materials and furnishings are child sized. Students had two and a half hours or more of uninterrupted work time. The room arrangement supports collaborative work, there are ample materials to support student-generated research projects, and students have ongoing access to art materials. Students have access to all areas of the environment at all times and choose their work freely from a wide variety of options. Adults sometimes demonstrated a friendly relationship with error, communicating respect for the process of trial and error. Sean on a resource map. Charlie on a story. Mary crochet Kevin reading It is not necessarily big work but they are focused. We have to wait for Mrs. Walton. We don't know what to do. Says Ishan to Logan who proceeds to attempt the work anyways.

Inhibitory Control

Disruption is common, but eventually resolved. Some students demonstrate the ability to shift, by refocusing when a desired material is unavailable, recovering from distraction, and switching between solo and group work, but many did not. Students sometimes engaged in collaborative work, consulting on extended, complex projects and easily engaging in work-related conversation. Some students were seen to exercise persistence in their work, attempting multiple ways of solving a problem, and working through frustration. Chairs falling due to the way children are sitting in them. Three times today. Maybe it's the time of day, but there's a lot of idling. Work
journals open but not adding anything. We have to wait for Mrs. Walton. We can’t do this by ourselves.

**Working Memory**

Many students were able to navigate the classroom with coordination and attention to detail. Adults’ physical movements were consistently calm, intentional, and precise. The environment is carefully maintained, with meticulous attention to order and cleanliness; shelves and tables were tidy, free of dust, and ready for children’s use. Digital technology was present as a support but not a delivery of instruction, and students used digital tools to develop and deliver presentations. Students did not receive instruction or assessment via computers, whole group instruction was not delivered with the aide of computers and SmartBoards, and classroom time was not taken up with individual, computer-based activities. Wall decor is carefully curated, consisting of fine art rather than commercial posters, and reflects students’ cultures, creating a comfortable, home-like environment. Loud movements and big movements are frequent. Zion Niall and Owen were the most frequently observed. And often together.

**Linguistic and Cultural Fluency**

Students sometimes used social graces spontaneously, and sometimes prompted by an adult. The classroom is characterized by a low hum of conversation. Verbal instructions were consistently clear, precise, and delivered with attention to students’ ongoing language acquisition. Adults consistently used a soft, conversational voice. Most learning materials were made from natural materials, including wood, glass, and fabric; there was minimal use of plastic. Conversation was ongoing, age-appropriate books and physical texts were available at all times, and the environment contained a cozy reading area. Students had ongoing access to outdoor environments. Student prepared, consumed, and cleaned up meals and snacks in the classroom. Some child-sized work tools were available, a few children were observed using them. All children exhibit spontaneously but the adult still has to remind of acceptable responses occasionally. I told Niall I would help him with his story. I don’t think I will also have time to give you a lesson. Maybe another time. (Sean to Ishan) Often interrupting.

**Social Fluency & Emotional Flexibility**

Most students regularly displayed signs of comfort, pleasure, and ease within the environment, including laughing, smiling, and expressing satisfaction with their work. One student was observed caring for the environment, but this is not a pervasive element of classroom culture. An easy relationship between adults and students dominates the classroom culture, with many conversational exchanges between students and adults, which often include smiles or jokes. Adults refrain from using loud, didactic talk. Collaboration may occur at times - indicated by room arrangement or assigned projects - but was not clearly evident during the observation. Adults consistently exhibited warmth and connection by smiling and sharing in students’ enthusiasm. Adults refrained from calling across the room. Students were in mixed-age groups of three years. Interaction among students is organic and not orchestrated by adults.
Rated Attributes

Elementary Child Behaviors

- Caring for classroom
- Shifting
- Navigating the room with care
- Maximum effort
- Disrupting
- Social graces
- Seeking adult approval
- Collaboration
- Persisting in the face of challenge
- Resolving needs with words
- Joy
- Offering/receiving help from peers
- Conversation
- Planning and reflection
- Comfort with adults
Elementary Adult Behaviors

- Loud, didactic talk
- Content confusion
- Calling across the room
- Observation
- Encouraging collaboration
- Confident presentation
- Wonder
- Focus on monitoring
- Friendliness with error
- Clarity
- Precision
- Soft/convivial voice
- Encouraging exploration
- Warmth and connection
- Care of environment
Elementary Environment Attributes

- Clutter
- Excessive reliance on digital technology
- Directed child interaction
- Links to wider community
- Child sized
- Cleanliness
- Uninterrupted work
- Natural materials
- Mixed age grouping
- Big work
- Materials ready for use
- Language rich
- Access and Choice
- Easy access to nature
- Prudent use of digital technology
- Real tools and real work
- Curated decor
- Food
- Animals
- Plants