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The Effects of Implementing a Chapter of Best Buddies International on the Frequency and Duration of Social Interaction of Students Intellectual Disabilities and the Attitudes, Beliefs, and Experiences of Students without Disabilities

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### **Abstract**

High school students with intellectual disabilities are often not socially included with their peers (Carter, Hughes, Guth, & Copeland, 2005). In order to address this concern, the researcher investigated the effects of Best Buddies International as an intervention on the frequency and duration of social interactions of high school students with intellectual disabilities and their peers without disabilities as well as the effect on the attitudes and beliefs of members of Best Buddies International without disabilities related to relationships with peers with disabilities. A total of 21 high school students between the ages of 16 and 19 participated, 4 of whom had intellectual disabilities and 17 with typical development. A pre/post AB design was used to evaluate the effect of Best Buddies on social interactions of students with disabilities and their peers without disabilities as well as attitudes and perceptions of students without disabilities related to their peers with disabilities. Results show that Best Buddies International as an intervention increased frequency and duration of the social interaction of students with significant cognitive impairments with their peers without disabilities, but had no impact on attitudes and beliefs of individuals without disabilities related to their peers with disabilities after one semester.

*Keywords:* friendships, Best Buddies, intellectual disabilities, social inclusion

## **Introduction**

According to the Diagnostic and Statistical Manual of Mental Disorders Fifth Edition (DSM5, 2013), Intellectual Disability (ID) involves impairments of general mental abilities that impact adaptive functioning in three domains: intellectual, social, and practical. The social domain refers to empathy, social judgment, interpersonal communication skills, the ability to make and retain friendships, and similar capacities. By definition, therefore, individuals with ID have impairments in interpersonal communication and the ability to make and retain friendships. Social interaction with peers is an important aspect of development that is closely linked to emotional well-being and success in school (Carter et al., 2010). Nonetheless, social interaction between students with and without ID continues to be limited.

Up until the enactment of the Education for all Handicapped Children Act in 1975, students with ID were not educated in public schools. Today, under the Individuals with Disabilities Education Act (IDEA, 2004), students with severe disabilities are indeed educated in public schools where their typically developing peers are also educated. However, social integration continues to be an area of concern (Carter et al., 2005; Carter & Hughes, 2005). Social interaction with peers is an important aspect of development that is closely linked to emotional well-being and success in school (Carter et al., 2010). Multiple researchers have sought to find the reason behind the lack of social inclusion of individuals with intellectual disabilities (Carter, et al., 2005; Carter & Hughes, 2005; Haring & Breen, 1992; Hughes, et al., 2002). Despite this research, individuals with intellectual disabilities continue to be segregated from their peers with typical development in school settings and beyond.

In 2005, Beadle-Brown, Murphy, and Wing demonstrated that the problem of limited social interaction among individuals with intellectual disabilities does still need a solution. They

conducted a follow up to a study started 25 years prior. The participants of the original study 25 years earlier were 173 individuals under the age of 15, known as the ‘Camberwell Cohort,’ who were identified as having intellectual disabilities in the Camberwell district of South London. In the 2005 follow-up, the participants included 91 of the original participants now ranging in age from 27-41. Researchers looked at outcomes in the areas of independent functioning, residential placement, employment, and quality of life as related to the IQ, challenging behaviors, and social impairment noted in those same individuals 25 years prior. In other words, the researchers asked if IQ, challenging behaviors, and social impairments noted in those individuals could predict their independent functioning, residential placement, employment, and quality of life 25 years later. Beadle-Brown et al. (2005) found that, in fact, those factors could predict their independent functioning, residential placement, employment, and quality of life. Not as obvious though, they discovered that those who were more socially impaired at the beginning of the study had poorer outcomes in the areas of independent functioning, residential placement, employment, and independently living and that their respective levels of social impairment had not changed noticeably in 25 years. The implication from this study is that if teachers do not intervene early (during school years) when a child is socially impaired, the student will likely always be socially impaired and therefore have poorer independent functioning, residential placement, employment, and independently living outcomes in the future. In fact, the researchers determined that an individual’s level of social impairment was the greatest predictor of outcome, with students categorized as “aloof” during childhood or adolescence had the poorest reported outcomes 25 years later. Clearly, an effective intervention is needed.

## Findings

In 1992, researchers Haring and Breen examined three things: (a) the development of peer support networks in general educational settings, (b) the effects of a peer network intervention on the social interactions of students with disabilities, and (c) the effects of peer satisfaction, attitude, and friendship development following involvement in a peer support network. The participants in their study were two students with moderate and severe disabilities who attended public junior high and high schools. These students were served educationally in self-contained special education classrooms for students with moderate to severe intellectual disabilities for most of their school day and spent 50 minutes daily in one general education class. These two students were given a peer support network selected by the researchers and school faculty. Members of the peer support network were selected based on several characteristics: having a mainstreamed class with one of the two students with disabilities, sharing an on-campus job, having a common interest, sharing a hobby, having a prior acquaintanceship, or through an expressed interest by the student with disabilities. Social networks including 4-5 friends without disabilities were established for each participant with disabilities. Social interaction, defined as any class of behavior that included at least one initiation followed by a response, was facilitated and measured. Data were collected by both researchers as well as the participants without disabilities. Qualitative data were reported daily by students without disabilities who indicated whether the interactions each day had been good, okay, or not good. Satisfaction of the participants with disabilities was also measured when they were asked if they wanted to come to the group social activity and asked if they wanted to continue to hang out with each of their peer network members during school; a positive response indicated satisfaction with the program. As a result of the facilitated peer support social

networks, frequency of interaction between the students with disabilities and the students without disabilities increased anywhere from 25-80% during the intervention and maintenance phases as compared to the baseline phase. Appropriate responding by the students with disabilities also increased greatly. Perhaps even more telling than the quantitative data is the qualitative data. Before the intervention, 22% of the participants without disabilities indicated their relationship with the student with disabilities to be that of that of 'friends.' After the intervention, 89% of participants described the relationship as 'friends' and 11% percent described their relationship as 'best friends.' Anecdotal evidence also shows that students with disabilities began to initiate communication with individuals outside of their peer networks and beyond their targeted contexts. More than 20 years ago, peer networks were shown to have a positive impact on individuals with and without intellectual disabilities and those peer networks resulted in genuine, lasting friendships. While friendships between students with and without disabilities may not exist frequently without the facilitation of peer networks, the results of a study conducted four years later indicates that, based on the attitudes and perceptions, typically developing middle and high school students are open to having relationships with their peers with intellectual disabilities.

In a 1996 study in which 1,137 typically developing middle and high school students were surveyed, only 38.2% of those students reported that they currently had a friendship with a student with a severe disability (Hendrickson et al). Furthermore, the results of this study indicated that the primary contact with individuals with severe disabilities occurred at school as 74.9% of respondents reported that they did not have a relative, neighbor, or family member with a severe disability. The students also reported that friendships with peers with severe disabilities were possible and that such friendships are beneficial to students with disabilities. Between 50%

and 65% of students indicated that they would personally benefit from a friendship with a person with a severe disability. Conclusively, students reported that having a friendship with a person with severe disabilities would not be easy. The students also ranked strategies for helping facilitate friendships between students with and without disabilities. The top five ranked strategies suggested were (a) employ ways of teaching in which students with and without disabilities work together; (b) present information on disabilities to students, teachers, and parents; (c) arrange social activities for all students; 4) teach students without disabilities to be tutors; and (d) organize a “circle of friends” around the student with disabilities (Hendrickson et al., 1996). Even nearly 20 years ago, the majority of students without disabilities, indicated that not only would they be willing to have a friend with severe disabilities, but that it could be beneficial to them, and they even had ideas about how to make it work.

In 2002, Copeland et al. conducted a similar study to the one conducted by Hendrickson et al. (1996) in which they surveyed 13 general education and 13 special education teachers about the benefits of the “Peer Buddies” network currently in place at their Nashville, Tennessee area high schools. In the survey, teachers and students alike were afforded the opportunity to make observations about benefits, drawbacks, and recommendations pertaining to the “Peer Buddies” program in their schools. The core of the program is an elective credit course in which general education students learn about various types of disabilities, learning differences, and instructional and motivational techniques as well as gain ideas on how to help their peers with moderate or severe disabilities become active participants in daily activities. In addition, students who participate in the course spend at least one class period each day providing the supports that their peers with disabilities need to be included in general education classes as well as daily and extracurricular activities (Copeland et al., 2002). Conclusively, teachers in both general and



special education commented that having “Peer Buddies” meets the needs of students with disabilities for increasing participation in general education classes and other high school activities. Additionally, general education teachers stated that peer supports not only allowed students with disabilities to experience the benefits available in general education settings, but also provided priceless benefits, including positive peer relationships between students with and without disabilities and increased exposure to diversity, to the general education student serving as the “Peer Buddy.”

Something rarely seen in the literature when considering individuals with disabilities, are the opinions of the individuals with disabilities themselves. The voice of the person with an intellectual disability has often been missing from debates as to how greater social inclusion can become a reality for them (Abbott & McConkey, 2006). Historically, other marginalized groups have used advocacy to achieve greater recognition of discrimination they face, however individuals with disabilities often have to rely on others to make a strategic analysis of the injustices they face and to seek support (Bersani, 1998). Their inability to seek advocacy independently likely contributes to the continued social exclusion of people with intellectual disabilities despite major shifts in service delivery and policy over the years. Abbott and McConkey (2006) conducted a survey showing perceptions about friendships, responsibilities, and barriers to social inclusion in regard to peer relationships as perceived by individuals with intellectual disabilities. Qualitative data were collected from individuals with disabilities living in assisted living or group homes who participated in the various focus groups and small group discussions offered by the researchers. As conversations were analyzed, the individuals 4 main desires related to social inclusion emerged: talking to people, being accepted, using community facilities, and opportunities to participate in community events. In essence, to the individuals

with disabilities social inclusion simply meant meeting other people in ordinary settings, and being treated similarly. From the data collected, four main barriers to social inclusion were identified: lack of needed knowledge and skills; role of support staff and service managers (i.e., not enough staff, people addressing staff members rather than individuals with disabilities); location of home; and community factors such as lack of amenities and attitudes. Most practically, the individuals with disabilities offered possible solutions to the barriers to social inclusion: personal ability and skills (being taught skills such as literacy, numeracy, budgeting, independent travel, getting to know their neighborhood); support from the community: educating the community, more advocates and volunteers to accompany them in the community; improvements in staff and management, and accommodations within their homes, specifically related to transportation. The possible solutions offered by the individuals with disabilities were parallel to what government programs were striving to accomplish at the time this study was published. There were some notable omissions from the barriers mentioned by the individuals with disabilities: lack of money was only mentioned in relation to the cost of a taxi not in regard to the reaching effects of socio-economic status, personal characteristics such as challenging behaviors, epilepsy, or impaired communication were not mentioned, and changes in public policy related to the care of individuals with disabilities was not mentioned (Abbott & McConkey, 2006). Interestingly, the opinions of the adults with disabilities included in this study mimic many research findings: individuals with disabilities need the opportunity to interact with their peers without disabilities, they need training on how to access places where people without disabilities typically go, and support from their respective communities (Carter, Hughes et al., 2005; Carter, Cushing et al., 2005; Carter & Hughes, 2005; Copeland et al., 2002).

While having appropriate social skills is obviously important for anyone, Cutts and Signafoos (2001) showed that social competence is not necessarily the only factor for determining the ability of students with intellectual disabilities to interact appropriately with their peers without disabilities. Based on their study of 9 Australian students with intellectual disability in a fully inclusive (all students are educated with peers with typical development throughout the day) suburban high school, Cutts and Signafoos (2001) found that students ratings on a norm referenced adaptive behavior scale did not necessarily indicate an individual's amount or type of social interaction with his or her peers. For example, a student who scored as having average social skills may actually engage and utilize those skills very little while a student who scored as having well below average social skills may actually initiate and engage in peer interaction frequently. Interventions focused on increasing social skills and social competence are no doubt important, however, they need to be supplemented with other interventions to promote social interactions between adolescents with and without intellectual disability in high school (Cutts & Signafoos, 2001). So, although a student with intellectual disabilities may have both the skills needed to interact appropriately with his peers as well as the opportunity to interact with his peers, that student may still not interact with his peers. Knowing that social interaction is so critical to a child's development (Carter et al., 2010), something more must be done to foster social interactions.

In 2005, Carter and Hughes reported similar findings to those of Cutts and Signafoos (2001) in a review of effective interventions aimed at increasing social interaction among adolescents with intellectual disabilities and their peers without disabilities. The authors categorized studies using 2 criteria: skill-based interventions, in which participants were taught skills to increase their social interaction, and support-based interventions, which focused on

arranging aspects of the school environment to promote or support peer interactions. They concluded that both skill-based and support-based interventions, when occurring simultaneously, proved to be effective at increasing peer interaction with students with a range of level of intellectual disabilities, differential effects were noted for several types of interventions. Ultimately, Carter and Hughes (2005) urge teachers to consider the appropriateness of an intervention as it relates to the relevant student needs and characteristics as well as the appropriateness for the school setting. Knowing that both skills-based and support-based interventions, when they occur simultaneously, are most effective at increasing peers interactions for students with intellectual disabilities, perhaps teachers should seek to implement an intervention that includes both components.

Various researchers have looked at the specific qualities and characteristics of an assortment of interventions which promote friendships to determine what makes a given intervention effective. In 2005, Carter, Cushing et al. examined the effect of peer support interventions on students' access to the general curriculum and social interaction. They looked at 3 students, ages 17, 13, and 12 with Moderate Intellectual Disabilities, as well as 6 general education students with A-B grades who were nominated by their teachers to be peer partners with students with intellectual disabilities in the general education setting. The schools in which these students were enrolled implemented full time inclusion for students with intellectual disabilities. Furthermore, Carter, Cushing et al. (2005) examined the effectiveness of matching students with intellectual disabilities with 1 versus 2 peer partners to determine which partner configuration best enhanced access to general curriculum and social interaction. The researchers concluded that 66% of the students in the study benefitted from being paired with 2 peers without disabilities as opposed to 1 in regard to social interaction. Thus, having a peer buddy is

not simply a nice way for students with intellectual disabilities to be included socially but creating a network of peer support actually enhances access to the general curriculum.

### **Discussion**

Despite the gains made related to the integration of individuals with severe disabilities over the past nearly 40 years, students with severe disabilities continue to have fewer opportunities to develop friendships than their typical, same-aged peers. To counter this situation and promote friendships, all stakeholders must engage in systematic intervention (Hendrickson et al., 1996). Researchers over the past 20 years have repeatedly reported effective types of interactions and interventions that best promote social integration. These include pairing students with disabilities with one or more peers without disabilities (Carter, Cushing et al., 2005; Copeland et al., 2002; Haring & Breen, 1992) as well as providing social skill training along with opportunities to interact with peers (Carter et al., 2010; Carter & Hughes, 2005; Cutts & Signafoos, 2001). Additionally, the opinions of students and adults with and without disabilities and the opinions of teachers in both general and special educational settings as well as caregivers have been reported and all of them support the idea of social inclusion though they admit that it is challenging (Abbott & McConkey, 2010; Copeland et al., 2002; Hendrickson et al., 1996). Irrefutably, students with typical development are open to the idea of having friendships with their peers with intellectual disabilities (Abbott & McConkey, 2010; Hendrickson et al., 1996), individuals with intellectual disabilities desire to have friendships (Abbott & McConkey, 2010; Hendrickson, et al. 1996), and teachers think that relationships between students with and without disabilities are beneficial to both populations (Abbott & McConkey, 2010; Copeland et al., 2002; Hendrickson et al., 1996). Opinions about the possibility of friendships existing between people with and without disabilities are favorable and people have ideas about how to

make those friendships work. Researchers have conducted multiple studies that show that social networks that utilize a system of matching or pairing students with and without disabilities are effective for the social inclusion of people with intellectual disabilities.

Previously, researchers have intervened to increase social interaction amongst the two populations through the use of peer networks (Carter, Hughes et al., 2005; Carter & Hughes, 2005; Carter, Cushing et al., 2005). Much of this research about the effectiveness of peer networks and facilitated friendships has resulted in suggestions for further research and implications for practice (Carter et al., 2005; Haring & Breen, 2002; Hendrickson et al., 1996; Hughes et al., 2002). One way a peer network can be facilitated is through the implementation of a chapter of Best Buddies International. According to the “About Us” section of their website, Best Buddies High Schools has, since 1993, paired students with Intellectual Disabilities in one-to-one friendships with high school students. By introducing Best Buddies into public and private high schools, participants are crossing the invisible line that too often separates those with disabilities from those without (bestbuddies.org/best-buddies, 2013). The purpose of this study is to evaluate the effect Best Buddies has on the frequency and duration of social interaction of high school students with intellectual disabilities with their typically developing peers as well as the impact Best Buddies has on the attitudes and beliefs of individuals without intellectual disabilities about their peers with intellectual disabilities. Therefore, this study will address the following research questions:

1. What affect does the implementation of a chapter of Best Buddies International (an organization that supports facilitated friendships) have on the frequency and duration of social interactions between high school students with significant cognitive disabilities and their peers with typical development?

2. What affect does the implementation of a chapter of Best Buddies International have on the attitudes and beliefs of high school students with typical development about their peers with significant cognitive disabilities?

## **Method**

### **Setting**

This study took place at a public high school in rural middle Georgia. According to most recently published enrollment information (2012-2013) obtained from the school district's website the high school hosting this research enrolled approximately 1173 students. Among those students, 66% were Caucasian, 30% Black/African American, and 4% identified as 'other.' The total number of students receiving special education services at the school was 120, with 15 of those students being identified as having an ID and receiving services through a self-contained program. Of the total population, 54% were considered to be economically disadvantaged.

### **Participants**

For purposes of this research, two distinct groups of students were observed. In one group, 4 students with ID, ages 14-22, with IQs below 55 who were educated in a self-contained special education program; and in the other group, 17 students without disabilities who voluntarily joined the Best Buddies chapter at the school. Students with ID were selected based on their current limited social interaction with their peers with typical development. Parental consent (see Appendix A) was obtained for all of the students with ID as well as students without disabilities who were under 18 years old. Student consent (see Appendix B) was obtained for any of the students without disabilities who were 18 years old or older. Once parental consent was received for students with ID and the students without disabilities who were under 18 years

old, minor assent was obtained (see Appendix C). Below is a description of the participants in the study.

**Nick.** The first student in the group of students with ID was Nic. Nick was a 17 year old male in the 11<sup>th</sup> grade. He had Down syndrome and functioned within the moderate range of intellectual disabilities. He was diagnosed with Apraxia and selective mutism and received speech therapy services for language and articulation. He communicated nonverbally primarily through facial expressions and gestures. During the school day, Nick participated in 2 general education courses, Team Sports and Basic Agriscience, during the 2013-2014 school year. During the lunch period, Nick typically sat with peers from his special education classes. Nick and his assigned Buddy did not eat lunch during the same period.

**Molly.** The second student in the group of students with intellectual disabilities was Molly. Molly was a 19 year old female in the 12<sup>th</sup> grade. She functioned within the moderate range of intellectual disabilities. She had a history of severe aggression. She communicated verbally although she often repeated phrases multiple times and was difficult to understand to unfamiliar listeners. During the school day, Molly did not participate in any general education courses. She typically sat with a teacher during the lunch period so that her aggression could be closely monitored. Molly and her assigned Buddy ate lunch during the same period.

**Richard.** The third student in the group of students with intellectual disabilities was Richard. Richard was a 16 year old male in the 10<sup>th</sup> grade. He functioned within the severe range of intellectual disabilities. During the school day, he did not participate in any general education courses. He was completely nonverbal but used vocalizations and facial expressions to communicate minimally. He used a voice output communication device to express basic wants and needs (e.g., scratch my back, bathroom). He typically sat with a teacher during the lunch



period as he required assistance with opening containers and had a history of eating fecal matter. Richard and his assigned Buddy did not eat lunch during the same period.

**Hayli.** The fourth student with intellectual disabilities to participate in the study was Hayli. Hayli was an 18 year old female in the 11<sup>th</sup> grade. She functioned within the moderate range of intellectual disability. She was verbal and conversational with both peers and adults. During the school day, she participated in 1 general education Basic Agriscience course. She typically sat with her special education peers and staff during the lunch period. Hayli and her assigned Buddy did not eat lunch during the same period.

**Students without disabilities.** The 17 students without disabilities ranged in age from 15-18 and were in grades 10-12. They elected to be included in the study by completing the official Best Buddies online application and returning parental consent (see Appendix A) or if 18 or older completing a consent form (see Appendix B). Students with disabilities under the age of 18 also completed a minor assent form (see Appendix C) Any willing student with parental consent or who gave his/her own consent if over the age of 18, who was a member of the school's Best Buddies chapter not served in the self-contained program for students with intellectual disabilities was included in the study.

**Researcher.** The teacher overseeing the implementation of Best Buddies as an intervention had an undergraduate degree in Special Education: Mental Retardation, a Master's degree in Multiple and Severe Disabilities. She has 9 years teaching experience serving 7 of those years as a special educator and 2 years in regular education. She taught students in kindergarten through grade 5 and students in grade 9 through 12. She worked with the participants of this study for 2 years.

**Observer.** The independent observer in this study was a Special Education paraprofessional. She held an Associate's degree and was a Registered Nurse. She worked as a paraprofessional at this school for 5 years and with the participants of this study for the entire time they were enrolled at the school. She completed an Observer Consent Form (see Appendix D).

### **Research Design**

A single subject AB design with pre/post surveys was used to evaluate the effect the implementation of a chapter of Best Buddies International had as an intervention on the frequency and duration of social interactions for students with ID and their peers with typical development and to evaluate changes in the opinions and perceptions of students without disabilities from pre to post. This design allowed data to be collected before the intervention was implemented, while the intervention was being implemented, and after the intervention had been implemented over a period of 3 months (Gay, Mills, & Airasian, 2006). The pre/post tests were surveys (see Appendix E) given to the students without disabilities to evaluate their perceptions and opinions about social interactions with peers with ID. The A/B portion of the design involved assessing the change in frequency and duration of social interactions for students with ID with their peers without disabilities. Using the AB design, baseline measurements were repeated until stability was established, then Best Buddies training and programming was implemented, then an additional 8 data points were collected during implementation of the intervention. The implementation of Best Buddies and its effects cannot be reversed and the intervention implementation cannot be staggered based on individual participants. Therefore, it was more valid to utilize the common AB design collecting data before and after the intervention, instead of the A-B-A withdrawal design or a multiple-baseline across participants

(Gay, et al., 2006). Furthermore, AB design allowed changes in the behavior of specific individuals and groups to be charted and followed. Although this design does not allow for the establishment of a true functional relation, this design does allow for the limitation of competing hypotheses to explain the change in behavior (Gay, et al., 2006).

Additionally, a pre/posttest design was used to compare and contrast the attitudes and beliefs of the peers with typical development regarding their peers with intellectual disabilities before and after the implementation of a Chapter of Best Buddies. The pretest was given at the very first chapter meeting on the Fall semester, before implementation of Best Buddies, and the posttest was given at the first chapter meeting of the Spring semester, after 1 semester of implementation of Best Buddies to determine if there was a change in attitudes and perceptions based on the implementation of the intervention.

### **Independent Variables**

The independent variable examined in this research was the implementation of a high school chapter of Best Buddies International at a public, rural high school in Georgia. Through the implementation of the intervention students with disabilities were paired one-to-one with students without disabilities. According to [bestbuddies.org/best-buddies](http://bestbuddies.org/best-buddies) (2013), Best Buddies has minimum social interaction requirements to occur between the one-to-one pairings both during the school day and after school hours as part of the official organization by-laws. One-to-one social interactions (e.g., phone call, text, email, chat in the hallway, etc.) must occur between pairings at least once per week and one-to-one social activities (e.g., going to a football game, eating lunch together, going to an afterschool activity together, etc.) should occur twice per month. The interactions and activities may occur either within the school day or outside of it. Whole group activities for all members of Best Buddies, not just the one-to-one pairs, must occur

once per month. Additionally, as part of the implementation of a Best Buddies Chapter, trainings must occur at least monthly to educate Best Buddies members without disabilities on a variety of topics to include characteristics of various disabilities, the disability rights movements, and disability etiquette.

### **Dependent Variables**

The dependent variables for this study were the frequency and duration of social interactions between students with and without ID, as well as the attitudes, beliefs, and experiences of the students without disabilities regarding their peers with ID. Social interaction was defined as a reciprocal verbal exchange using spoken words or a voice output device and/or a reciprocal non-verbal exchange to include eye contact, smile, high five, handshake, wave, or a fist bump. Attitudes and beliefs were defined as the thoughts and opinions held by students without disabilities about their peers with intellectual disabilities as measured by a self-report survey.

### **Data Collection and Measures**

Data were collected from participants both with and without ID. The data collected from students without disabilities was in the form of a survey (see Appendix E), modified by the researcher with permission from Hendrickson, et al (1996) who developed the original survey. The survey consisted of 8 questions about their attitudes, beliefs, and experiences in references to their peers with ID where students responded either yes or no. Students without disabilities first completed this survey before any training or implementation of Best Buddies occurred and then again after approximately 3 months, or one academic semester, of participating in formal Best Buddies Chapter activities as describe above.

The data collected from students with ID were collected by the researcher and observer using a researcher-created data sheet (see Appendix F). Data collected included frequency of interactions, marked by tallies, and duration of interactions, measured in minutes and seconds, of social interactions (including verbal and non-verbal interactions) occurring during the daily lunch period. Frequency and duration were measured from the first sign of mutual exchange: eye contact or other reciprocal exchange. For example, if a student waved at someone, then shook hands with someone else, and then gave someone else a high five and talked to them, the student would have 3 tally marks on his data sheet for frequency; he/she had 3 interactions with 3 different partners. Consecutive interactions (for example, a smile followed immediately by “hello”) with one communication partner were marked as one tally. Non-consecutive interactions (for example, a wave on the way to lunch, then later a conversation at the table) were recorded by 2 tallies. For those same interactions, the student’s duration data might look like this: wave: 1 second, hand shake: 2 seconds, high five and talk: 10 seconds, for a total of 13 seconds of social interaction. The measurement of duration ended when one person physically left the exchange, for example walked away from the lunch table or walked past the other communicator in the hallway. For the purposes of this study, the lunch period began when the bell rang for students to leave their classroom, the hallway on the way to the cafeteria, and in the cafeteria until the bell rang dismissing students from lunch; the total time equaled 35 minutes. Data were collected once per week for 3 consecutive weeks during baseline, and once per week for 8 consecutive weeks during the intervention phase of the study.

### **Implementation Procedures**

**Before baseline.** All potential members of Best Buddies (even those not participating in the study) completed the formal Best Buddies membership application (see Appendix G) and

one-to-one pairings were made in accordance with student preferences. Student participants without disabilities were recruited from the group of approximately 60 voluntary members of the school's Best Buddies organization. These students previously committed to be involved in this organization but had yet to receive any training or participate in any organized activities with their peers with disabilities. Students with ID were recruited from self-contained program for students with moderate, severe, and profound ID that was in the school. After the first chapter meeting of the Fall semester, the researcher obtained parent consent from all interested students by sending forms home via the student (see Appendix A). Along with the consent forms, students and their parents received an informational letter (see Appendix H). The purpose of the letter was to explain the purpose of the study and to explain the rights of the participants. After parental consent was obtained, student consent or minor assent (see Appendices A, B, and C) was obtained for students under age 18 when they returned their parent consent forms to the researcher.

**Baseline phase.** Upon receipt of parental consent and student consent and/or assent forms, students without disabilities completed the pre-test survey (see Appendix E) regarding their attitudes, beliefs, and experiences with individuals with disabilities. The survey was given to students at the first chapter meeting, which occurred in the school media center, of the fall semester. It was explained to the students and they had an opportunity to ask questions before completing the survey. The students completed the survey immediately and gave them to the researcher. Meanwhile, the researcher used the data collection sheet (see Appendix F) to record the frequency and duration of social interaction of specific students with intellectual disabilities during their assigned lunch period once per week for 3 consecutive weeks. These data were collected prior to the start of formal interactions through the Best Buddies organization and prior

to the students being paired in 1:1 partnerships. On days when frequency and duration data were collected for participants with an ID, the researcher or independent observer followed behind his/her assigned student with an ID on the way to lunch in the hallway, through the commons area, into the lunch line, and to the table. It was not apparent to students that the researcher or observer was following the student, however, the researcher or observer was able to observe the students actions and interactions throughout the duration of the lunch period. For each social interaction the student had with a different peer with typical development, the researcher marked a tally.

**Intervention phase.** After baseline data were collected, the Best Buddies members, both with and without disabilities, met as a whole group for informational meetings 3 times during the first semester of school. In the first meeting, students learned about the Best Buddies mission, beliefs, and requirements (see Appendix I). In the second meeting, students received training about various disabilities, their characteristics, and disability etiquette (see Appendix J). In the third meeting, students completed an activity related to their personal experience(s) with social isolation (see Appendix K). No data were collected from students with typical development during the intervention phase.

In accordance with Best Buddies International guidelines found at [bestbuddies.org](http://bestbuddies.org) (2013), students were paired up in one-to-one partnerships based on their responses about personal preferences and interests on the Best Buddies Membership Application (see Appendix G). Students with similar interests, schedules, and preferred modes of correspondence were matched. Buddies were required to interact at least once per week throughout the school day and do activities together twice monthly. Activities included eating lunch together, tie dying t-shirts with the whole group, visiting a local nursing with voluntary attendees, and attending sporting

events either in pairs or as a whole group. Some buddy pairs interacted less often than required, some complied guidelines, and some had interactions above and beyond the guidelines.

However, during this phase the researcher and independent observer collected data on the frequency and duration of the social interactions of the students with intellectual disabilities once per week. Procedures for data collection during this phase were identical to the procedures during baseline. On days when data were collected, the researcher and consenting independent observer followed behind his/her assigned student with an ID on the way to lunch in the hallway, through the commons area, into the lunch line, and to the table. It was not apparent to students that the researcher or independent observer was following the student, however, the researcher was able to observe the students actions and interactions throughout the duration of the lunch period. As stated above, the researcher marked a tally for each occurrence of social interaction (see above for specific procedures for consecutive and non-consecutive interactions with the same communication partner) as well as recorded the minutes and seconds of the duration of all interactions.

**Post-test phase.** Once the students had actively participated in the Best Buddies Chapter activities for a full semester, the researcher collected follow-up data to determine if the implementation of a Best Buddies Chapter had an impact on the attitudes and opinions of students without disabilities regarding their peers with disabilities. During this phase, students with typical development completed the posttest, which was the same survey they completed during the baseline phase (see Appendix E). Students answered the exact same questions in the exact same format as they did 3 months prior. The 17 participating students without disabilities were asked to meet together immediately after school to complete the survey, the survey was



explained to them, and students had an opportunity to ask questions before answering the survey questions. During this phase, data were not collected from students with intellectual disabilities.

### **Data Analysis**

The two sets of data were analyzed in two different ways. First, the survey data was averaged into total percentages of “yes” and “no” responses for baseline and again for post-intervention phase data. The percentages from each phase were compared to the other to determine the impact of Best Buddies on the attitudes, beliefs, and experiences of students with typical development to determine if there was a change in opinions and attitudes of the students without disabilities from before participating in the Best Buddies organization and after 3 months of participation and education related specifically to individuals with disabilities. Second, the frequency and duration social interaction data that were collected on the individuals with disabilities who participated in the Best Buddies chapter activities was calculated and averaged for each individual participant with disabilities for the baseline and intervention phases to allow for a comparison in data across phases. Additionally, individual student data for the students with ID were graphed in order to allow a visual comparison between baseline and intervention phases to determine the effect Best Buddies had on the frequency and/or duration of social interaction for each individual participant with disabilities.

## **Results**

### **Nick**

Nick’s graphed data are displayed in Figures 1 and 2. During Baseline, Nick had a range of 2 to 3 occurrences with an average of 2.66 interactions, for the frequency of social interaction with his peers with typical development. He had a range of 6 to 11 seconds with an average of 9 seconds, for the duration of those interactions. During intervention, he had a range of 0 to 5

occurrences with an average of 3.22 interactions, for the frequency of social interaction with his peers with typical development. He had a range of 0 to 191 seconds with an average of 36.55 seconds per instance, for the duration of those interactions. He showed an average increase in frequency of 0.56 interactions and an average increase in duration of interactions of 27.55 seconds.

### **Molly**

Molly's graphed data are displayed in Figures 3 and 4. During Baseline, Molly had a range of 0 to 1 occurrences with an average of 0.33 interactions, for the frequency of social interaction with her peers with typical development. She had a range of 0 to 12 seconds with an average of 4 seconds, for the duration of those interactions. During intervention, she had a range of 1 to 3 occurrences with an average of 2.33 interactions, for the frequency of social interaction with her peers with typical development. She had a range of 6 to 1338 seconds with an average of 431.11 seconds per instance, for the duration of those interactions. She showed an average increase in frequency of 2 interactions and an average increase in duration of interactions of 427.11 seconds.

### **Richard**

Richard's graphed data are displayed in Figures 5 and 6. During Baseline, Richard had 0 occurrences of frequency of social interaction with his peers with typical development. During intervention, he had a range of 0 to 1 occurrences with an average of 0.22 interactions, for the frequency of social interaction with his peers with typical development. He had a range of 0 to 1200 seconds with an average of 133.88 seconds per instance, for the duration of those interactions. He showed an average increase in frequency of 0.22 interactions and an average increase in duration of interactions of 138.88 seconds.

**Hayli**

Hayli's graphed data are displayed in Figures 7 and 8. During Baseline, Hayli had 2 occurrences of social interaction with her peers with typical development on each day data were collected. She had a range of 4 to 6 seconds with an average of 5.33 seconds, for the duration of those interactions. During intervention, she had a range of 0 to 4 occurrences with an average of 2.66 interactions, for the frequency of social interaction with her peers with typical development. She had a range of 0 to 480 seconds per instance, an average of 178.22 seconds, for the duration of those interactions. She showed an average increase in frequency of 0.66 interactions and an average increase in duration of interactions of 172.89 seconds.

**Students without Disabilities**

Students without disabilities enrolled as members of the school-wide chapter of Best Buddies International completed a survey (see Appendix E) of their perceptions and beliefs both before the intervention was in place and after 3 months of intervention. Post-intervention survey results yielded results identical to the pre-intervention survey. On questions 1-3, 17 students answer yes, 0 students answered no. On question 4, 13 students answered yes, 4 answered no. On question 5, 1 student answered yes, and 16 students answered no. On question 6, 17 students answered yes, 0 answered no. On question 7, 16 students answered yes, 1 answered no. On question 8, 1 student answered yes, and 16 answered no. There were no changes between pre and post-test assessments.

**Discussion**

The results of this study add to the current body of research in the area of peer networking as an intervention for increasing the frequency and duration of social interaction of students with intellectual and developmental disabilities (Carter, et al. 2005; Copeland, et al.

2002; Haring & Breen, 1992). The immediate impact of Best Buddies as an intervention on the particular individuals who participated in this study was varying, while the long-term impact is yet unknown. Before the implementation of Best Buddies Nick was well-liked and had a variety of acquaintances. However, his interactions facilitated through involvement in Best Buddies began to grow in depth beyond just “hey buddy” or a high-five to true, friendly, reciprocal engagement. Nick’s results can be seen on figures 1 and 2. Molly is a student with a history of extreme aggression which made many of her peers without disabilities fearful of her. After the implementation of Best Buddies, her peers without disabilities were much more likely to approach her and make greetings. Molly’s data can be seen in figures 3 and 4. Richard was new to the school and has extremely limited communication. Nonetheless, through his involvement in Best Buddies he developed a reciprocal relationship with his assigned Buddy that he had never previously experienced with anyone outside of his family. Richard’s results can be seen on figures 5 and 6. Hayli became involved in another student club through her assigned Buddy. Although the other club existed at the school for years, Hayli never knew it existed because she did not have the opportunity to socialize with anyone who was involved in the club. Hayli’s association with her assigned Buddy’s social network has increased Hayli’s social network just as intended. The Best Buddies chapter at this high school is something that will be continued and will grow in years to come. While limited progress was shown in the current study, greater gains are expected over time.

According to [bestbuddies.org](http://bestbuddies.org) (2013), the ultimate goal of Best Buddies International is to increase the social inclusion of students with intellectual and developmental disabilities in the high school community. The full effect of a climate of social inclusion spans well beyond the lunch period one day per week (which is the only time data were collected in this study) and

cannot be fully captured by the reported results of this study. However, some anecdotal evidence sheds light on the climate change evident in the high school environment in which the study was conducted. Several students with intellectual disabilities that were not included in data collection had lunch with their assigned buddies during which they were continually socially engaged. One student with an ID, Hayli, who was included in data collection, has participated with her assigned buddy in a before-school student club for 8 consecutive Wednesdays since the intervention was put in place. Students without disabilities, who are not members of Best Buddies at the school, voluntarily participated in various social activities with students with disabilities. Another student with typical development, whose buddy with ID was completely non-verbal, engaged with him multiple times daily after the implementation of the intervention. Overall, students with and without ID at this high school had opportunities to interact with each other in ways they never had before Best Buddies was introduced. As Best Buddies became established at the high school, an expectation of inclusion was established and the school climate was positively impacted.

### **Limitations**

When considering the results of this study, some limitations have to be noted. One limitation is that there was not a good measure to truly determine the impact of implementing a Best Buddies International Chapter on the attitudes, perceptions, and experiences of school population. Along with the lack of a valid assessment for measuring those changes, the time parameters, just 11 weeks with frequency and duration of social interaction data only being collected during lunch one day a week, was just not enough time to show the true impact of the intervention on social interactions of individuals with ID with their peers with typical development. Another limitation to truly determining the cultural impact of the intervention was

that the only students without ID that were included in the study were those who were already voluntary members of Best Buddies and therefore probably already had a predisposition to having positive opinions and perceptions of individuals with ID. In order to determine the true cultural impact of the intervention it would be ideal to survey students who were not voluntary members of the Best Buddies International Chapter. Finally, another limitation of the results related to the survey given to the students without disabilities is that the researcher suspected that the students did not respond honestly on the survey but rather gave what they perceived to be the “right” answer. The vast majority of responders gave the answer that would be considered nice or respectful both times the survey was given.

### **Implications for Future Practice**

A teacher implementing a new chapter of Best Buddies should utilize online resources from [bestbuddies.org](http://bestbuddies.org) and be in contact with a staff member from Best Buddies International for support. While guidelines are set for the number of interactions and activities, it is difficult to monitor all of those interactions thus it is most important to encourage and instruct everyone toward an inclusive culture rather than focus on meeting every guideline and following every rule; it would be nearly impossible to monitor every fine detail of the guidelines. Furthermore, a teacher implementing a new chapter should expect slow, steady change as seen at this high school where change, albeit minimal, was noted after just one semester of implementation as opposed to a sudden change in school culture and climate.

### **Future Research**

Future research should be conducted to study the effects of peer pairings and peer networks, particularly Best Buddies International, related to the effect on social interactions between individuals with ID and individuals without disabilities as well as on the overall culture

of a school related to the inclusion of individuals with ID over a longer period of time.

Additionally, students who are not members of Best Buddies, as well as school staff, should be surveyed over a longer span of time to indicate changes in the attitudes, perceptions, and experiences of individuals who observe the implementation and impact of a Best Buddies International chapter but who are not actively involved during the development and implementation of a chapter.

### References

- American Psychiatric Association. (2013). *Diagnostic and statistical manual of mental disorders* (5<sup>th</sup> ed). Retrieved from:  
<http://www.dsm5.org/Documents/Intellectual%20Disability%20Fact%20Sheet.pdf>
- Abbott, S. & McConkey, R. (2006). The barriers to social inclusion as perceived by people with intellectual disabilities. *Journal of Intellectual Disabilities, 10*, 275-287.
- Beadle-Brown, J., Murphy, G., & Wing, L. (2005). Long-Term outcome for people with severe intellectual disabilities: Impact of social impairment. *American Journal on Mental Retardation, 110*, 1-12.
- Bersani, H. (1998). 'From Social Clubs to Social Movement: Landmarks in the Development of the International Self-Advocacy Movement', in L. WARD (ed.) *Innovations in Advocacy and Empowerment for People with Intellectual Disabilities*. Chorley: Lisieux Hall.
- Carter, E. W., Cushing, L. S., Clark, N. M., & Kennedy, C. H. (2005). Effects of peer support interventions on students' access to the general curriculum and social interactions. *Research & Practice for Persons with Severe Disabilities, 30*, 15-25.
- Carter, E. W. & Hughes, C. (2005). Increasing social interaction among adolescents with intellectual disabilities and their general education peers: Effective interventions. *Research & Practice for Persons with Severe Disabilities, 30*, 179-193.
- Carter, E. W., Hughes, C., Guth, C. B., & Copeland, S. R. (2005). Factors influencing social interaction among high school students with intellectual disabilities and their general education peers. *American Journal on Mental Retardation, 110*, 366-377.



- Carter, E. W., Sisco, L. G., Chung, Y., & Stanton-Chapman, T. L. (2010). Peer interactions of students with intellectual disabilities and/or Autism: A map of the intervention literature. *Research & Practice for Persons with Severe Disabilities, 35*, 63-79.
- Copeland, S. R., McCall, J., Williams, C. K., Guth, C., Carter, E. W., Fowler, S. E., . . . Hughes, C. (2002). High school peer buddies: A win-win situation. *Teaching Exceptional Children, 35*, 16-21.
- Cutts, S., & Sigafos, J. (2001). Social competence and peer interactions of students with intellectual disability in an inclusive high school. *Journal of Intellectual & Developmental Disability, 26*, 127-141.
- Haring, T. G. & Breen, C. G. (1992). A peer-mediated social network intervention to enhance the social integration of persons with moderate and severe disabilities. *Journal of Applied Behavior Analysis, 25*, 319-333.
- Hendrickson, J. M., Shokoohi-Yekta, M., Hamre-Nietupski, S., & Gable, R. A. (1996). Middle and high school students' perceptions on being friends with peers with severe disabilities. *Exceptional Children, 63*, 19-29.
- Hughes, C., Copeland, S. R., Wehmeyer, M. L., Agran, M., Cai, X., & Hwang, B. (2002). Increasing social interaction between general education high school students and their peers with mental retardation. *Journal of Developmental and Physical Disabilities, 14*, 387-402.
- Gay, L.R., Mills, G. E., & Airasian, P. (2006) Educational Research: Competencies for Analysis and Applications (8<sup>th</sup> ed.). Columbus, OH: Pearson.
- Monroe County Schools (2014) *MCS by the Numbers FY 2014*. Retrieved from:

[http://www.monroe.k12.ga.us/files/\\_uPHb0\\_/86ae262497ec7b983745a49013852ec4/MC](http://www.monroe.k12.ga.us/files/_uPHb0_/86ae262497ec7b983745a49013852ec4/MC)

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Table 1. Results of the Pre and Post Survey

	Pre-Survey		Post-Survey	
	<u>Yes</u>	<u>No</u>	<u>Yes</u>	<u>No</u>
1. It is possible for me to have a genuine friendship with a person with an intellectual and/or developmental disability (IDD).	17	0	17	0
2. A person with IDD could benefit from having a friendship with me.	17	0	17	0
3. I could benefit from having a friendship with a person with IDD.	17	0	17	0
4. I currently have a genuine friendship with a person with IDD.	13	4	13	4
5. It is very difficult to have a genuine friendship with a person with IDD.	1	16	1	16
6. Teachers or other adults should help these friendships to happen in some way.	17	0	17	0
7. I currently have opportunities to form friendships with people with IDD at school (in classes, in sports, at school events after school hours).	16	1	16	1
8. My friends would criticize me for my friendship with a person with IDD.	1	16	1	16

Figure 1. Graphed Results of Duration of Social Interactions for Nick

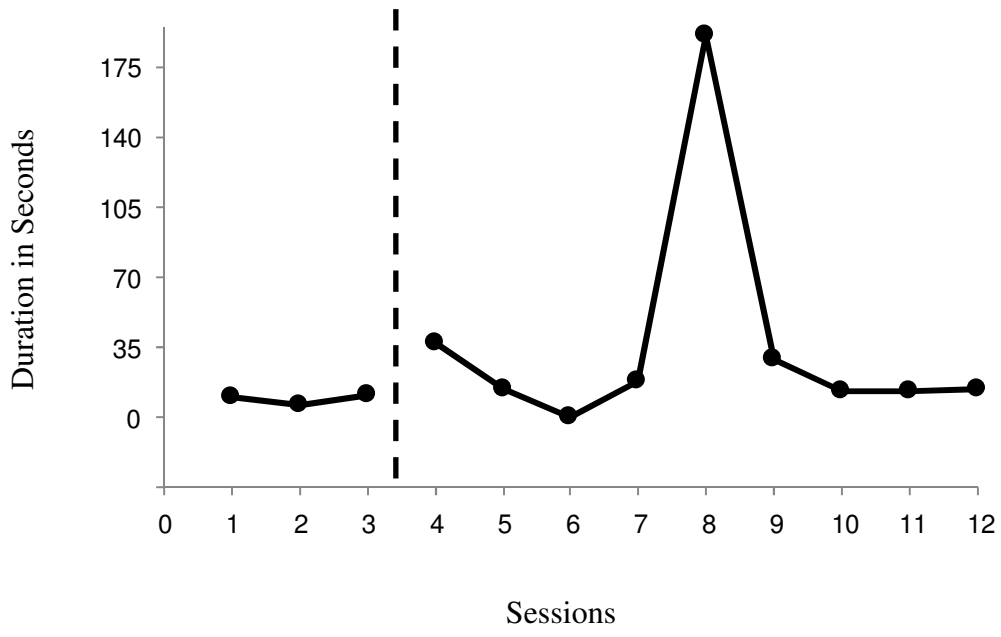


Figure 2. Graphed Results of Frequency of Social Interactions for Nick

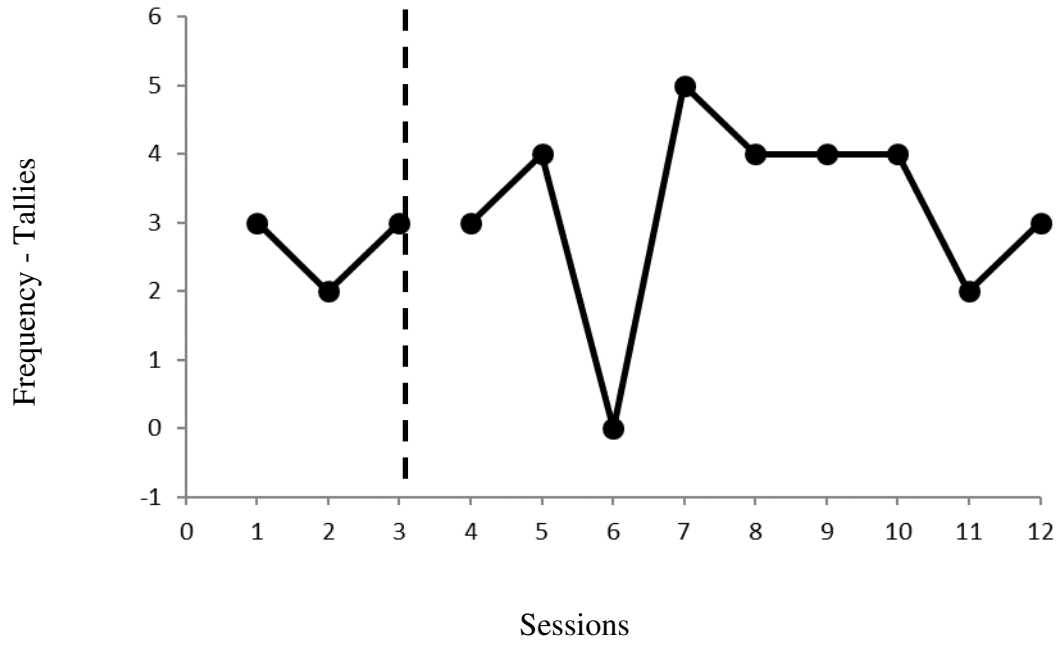


Figure 3. Graphed Results of Duration of Social Interactions for Molly

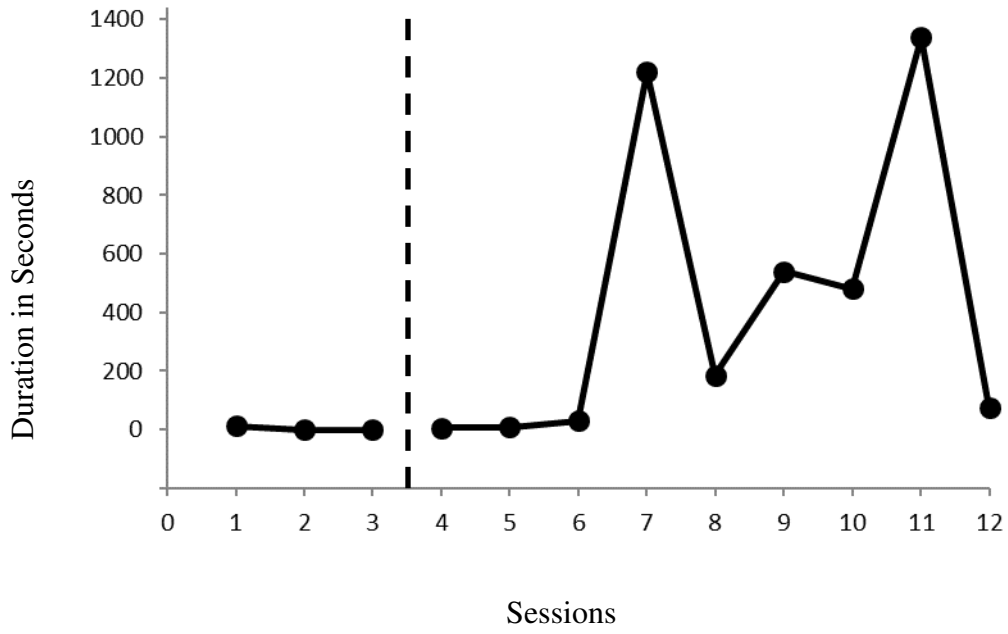


Figure 4. Graphed Results of Frequency of Social Interactions for Molly

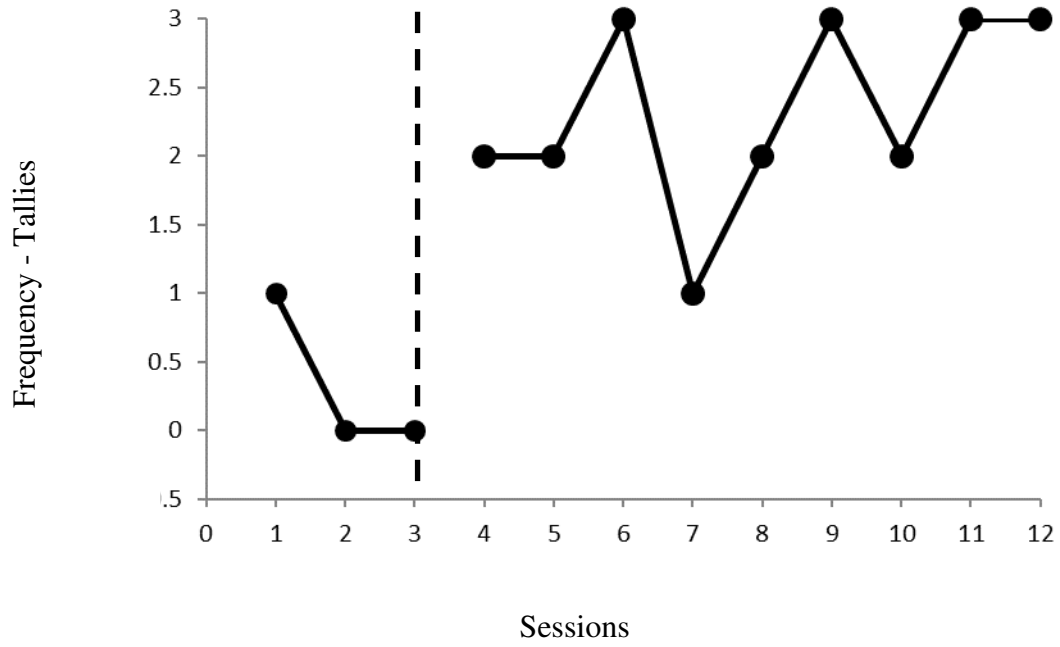


Figure 5. Graphed Results of Duration of Social Interactions for Richard

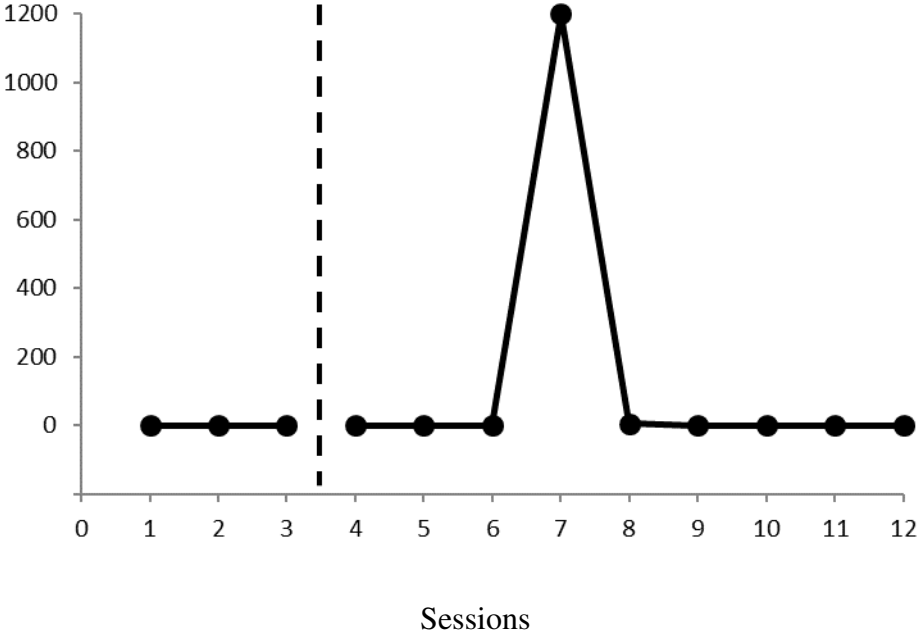




Figure 6. Graphed Results of Frequency of Social Interactions for Richard

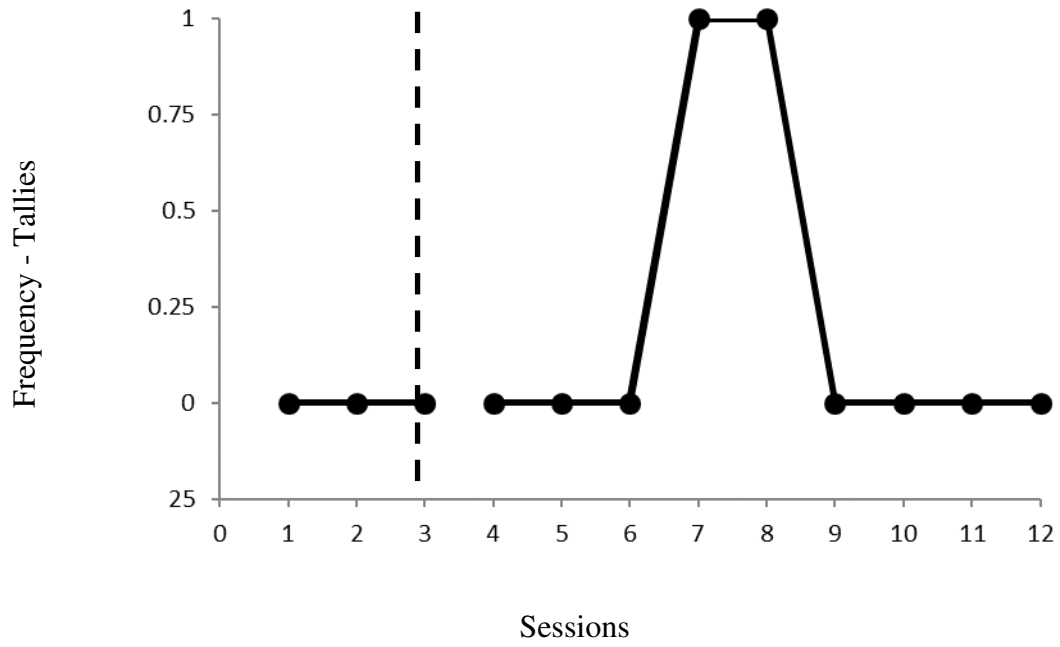


Figure 7. Graphed Results of Duration of Social Interactions for Hayli

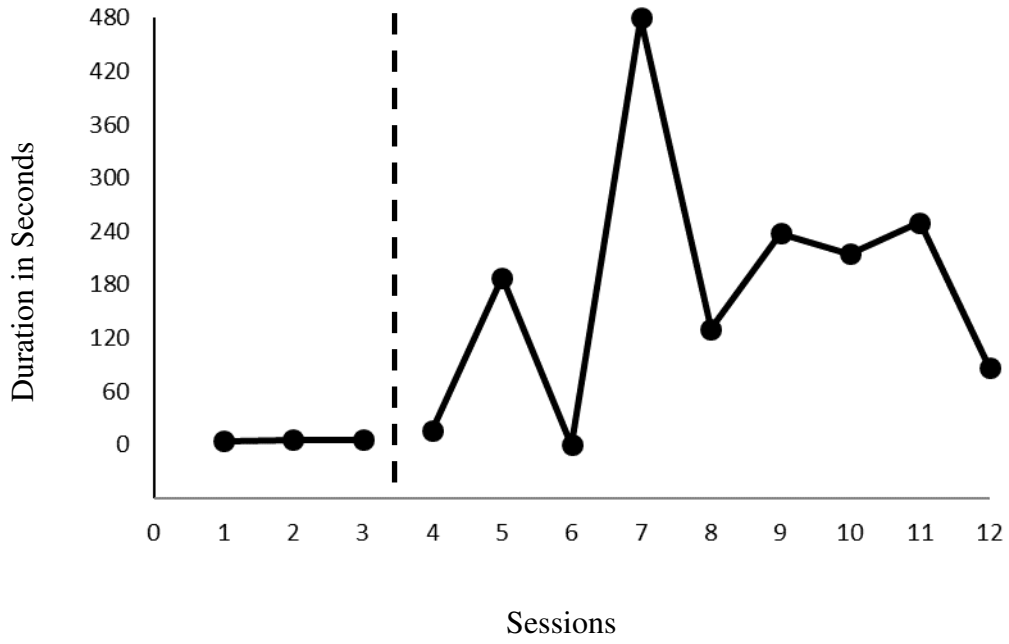
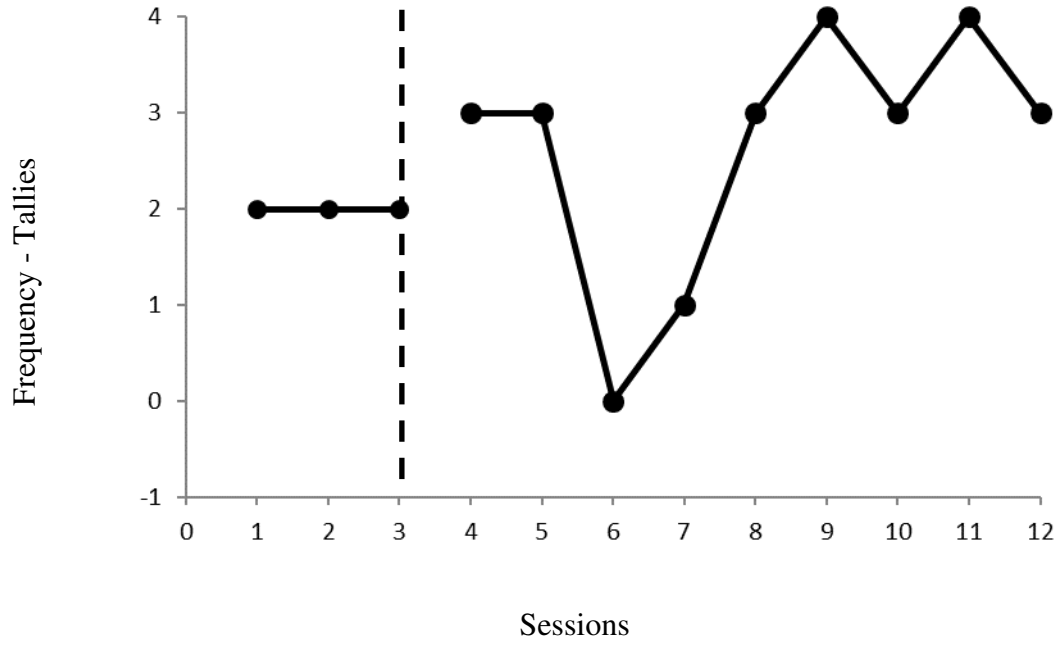


Figure 8. Graphed Results of Frequency of Social Interactions for Hayli



## Appendix A: Parent Consent Form (2 pages)

## Parent/Guardian Consent Form

I, \_\_\_\_\_, give permission for my child, \_\_\_\_\_, to be a participant in the research The Effects of Best Buddies on High School Students With and Without Intellectual Disabilities, which is being conducted by Elizabeth Holloway, who can be reached at 478-477-4878. I understand that my child's participation is voluntary; I can withdraw my consent at any time. If I withdraw my consent, my child's data will not be used as part of the study and will be destroyed.

The following points have been explained to me:

1. The purpose of this study is to determine the effects that implementing a chapter of Best Buddies International will have on the frequency and duration of the social interactions of students with intellectual disabilities and the attitudes and beliefs of students without intellectual disabilities regarding their peers with intellectual disabilities.
  2. The procedures are as follows: Your child will be asked to follow the requirements of Best Buddies International (available upon joining from Elizabeth Holloway). Your child's interactions may be recorded for frequency and duration (not word for word) and he/she may be asked to answer survey questions about his/her interactions with peers with and without disabilities.
  3. You will be asked to sign two identical consent forms. You must return one form to the investigator before the study begins, and you may keep the other consent form for your records.
  4. Your child may find that some questions are invasive or personal. If your child becomes uncomfortable answering any questions, he or she may cease participation at that time.
  5. Your child will not likely experience physical, psychological, social, or legal risks beyond those ordinarily encountered in daily life or during the performance of routine examinations or tests by participating in this study.
  6. Your child's individual responses will be confidential and will not be release in any individually identifiable form without your prior consent unless required by law.
  7. The investigator will answer any further questions about the research (see above telephone number).
  8. In addition to the above, further information, including a full explanation of the purpose of this research, will be provided at the completion of the research project on request.
-

Signature of Investigator

Date

---

Signature of Parent or Guardian

Date

(If participant is less than 18 years of age)

.....  
Research at Georgia College & State University involving human participants is carried out under the oversight of the Institutional Review Board. Address questions or problems regarding these activities to Mr. Marc Cardinalli, Director of Legal Affairs, CBX 041, GCSU, (478) 445-2037

Appendix B: Student Consent form

Student Consent Form

I, \_\_\_\_\_, agree to participate in the research The Effects of Best Buddies on High School Students With and Without Intellectual Disabilities, which is being conducted by Elizabeth Holloway, who can be reached at 478-319-9266. I understand that my participation is voluntary; I can stop at any time. If I withdraw my consent, my data will not be used as part of the study and will be destroyed.

The following points have been explained to me:

1. I will be asked to participate in Best Buddies and interact socially with my peers with and without intellectual disabilities.
2. My name will not be on the data sheet.
3. I will be asked to sign two identical consent forms. One form must be returned to the investigator before the study begins, and I can keep the other consent form.
4. If I become uncomfortable answering any questions, I can stop participating at that time.
5. I am not putting myself in any more physical, psychological, social, or legal danger than I would ordinarily encountered in daily life or during the performance of routine examinations or tests.
6. My information will be kept secret, and no one will know that the answers or results are mine, unless I tell them.
7. If I have any questions about this research, I can ask the researcher by calling the telephone number above.
8. If I want to know more about the research, I can ask for more information.

---

Signature of Investigator Date

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Signature of Minor Participant Date

.....  
 Research at Georgia College & State University involving human participants is carried out under the oversight of the Institutional Review Board. Address questions or problems regarding these activities to Mr. Marc Cardinalli, Director of Legal Affairs, CBX 041, GCSU, (478) 445-2037

Appendix C: Minor Assent Form

Minor Assent Form

I, \_\_\_\_\_, agree to participate in the research The Effects of Best Buddies on High School Students With and Without Intellectual Disabilities, which is being conducted by Elizabeth Holloway, who can be reached at 478-319-9266. I understand that my participation is voluntary; I can stop at any time. If I withdraw my consent, my data will not be used as part of the study and will be destroyed.

The following points have been explained to me:

1. I will be asked to participate in Best Buddies and interact socially with my peers with and without intellectual disabilities.
2. My name will not be on the data sheet.
3. I will be asked to sign two identical consent forms. One form must be returned to the investigator before the study begins, and I can keep the other consent form.
4. If I become uncomfortable answering any questions, I can stop participating at that time.
5. I am not putting myself in any more physical, psychological, social, or legal danger than I would ordinarily encountered in daily life or during the performance of routine examinations or tests.
6. My information will be kept secret, and no one will know that the answers or results are mine, unless I tell them.
7. If I have any questions about this research, I can ask Mrs. Holloway.
8. If I want to know more about the research, I can ask Mrs. Holloway for more information.

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Signature of Investigator

Date

---

Signature of Minor Participant

Date

.....  
Research at Georgia College & State University involving human participants is carried out under the oversight of the Institutional Review Board. Address questions or problems regarding these activities to Mr. Marc Cardinalli, Director of Legal Affairs, CBX 041, GCSU, (478) 445-2037

## Appendix D: Observer Consent Form

## Observer Consent Form

I, \_\_\_\_\_, agree to participate in the research The Effects of Best Buddies on High School Students With and Without Intellectual Disabilities which is being conducted by Elizabeth Holloway, who can be reached at 478-319-9266. I understand that my participation is voluntary; I can withdraw my consent at any time. If I withdraw my consent, my data will not be used as part of the study and will be destroyed.

The following points have been explained to me:

1. The purpose of this study is to determine the effects that implementing a chapter of Best Buddies International will have on the frequency and duration of the social interactions of students with intellectual disabilities and the attitudes and beliefs of students without intellectual disabilities regarding their peers with intellectual disabilities.
2. The procedures are as follows: You will be recording the social interactions of specific students with intellectual disabilities during the lunch period. You will be assigned certain students and will only record data on assigned days, to occur once per week. You will measure frequency by tallying each time they have a social interaction and measure the duration of the social interaction with a timer in minutes and second. Interactions should be recorded for frequency and duration, not word for word.
3. You will not list your name on the data sheet. Therefore, the information gathered will be confidential.
4. You will be asked to sign two identical consent forms. You must return one form to the investigator before the study begins, and you may keep the other consent form for your records.
5. You may find that some questions are invasive or personal. If you become uncomfortable answering any questions, you may cease participation at that time.
6. You are not likely to experience physical, psychological, social, or legal risks beyond those ordinarily encountered in daily life or during the performance of routine examinations or tests by participating in this study.
7. In addition to the above, further information, including a full explanation of the purpose of this research, will be provided at the completion of the research project on request

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Signature of Investigator

Date



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Signature of Participant

Date

---

Signature of Parent or Guardian  
(If participant is less than 18 years of age)

Date

.....

Research at Georgia College & State University involving human participants is carried out under the oversight of the Institutional Review Board. Address questions or problems regarding these activities to Mr. Marc Cardinalli, Director of Legal Affairs, CBX 041, GCSU, (478) 445-2037



Appendix F: Data collection sheet

Student initials: \_\_\_\_\_ Research phase (circle one): pre mid post

Frequency and duration of social interaction with peers without disabilities during lunch.

\*Verbal interaction: use of voice or voice output device. Non-verbal interaction: hand shake, fist bump, high-five, wave.

Date: <b>SAMPLE</b>		
<b>Frequency: X for each incident of social interaction</b>	<b>Duration of the interaction measured in seconds.</b>	<b>Description of interaction: *verbal or non-verbal.</b>
X	23 seconds	verbal
X	3 seconds	Non-verbal

Date:		
<b>Frequency: X for each incident of social interaction</b>	<b>Duration of the interaction measured in seconds.</b>	<b>Description of interaction.</b>

Date:		
<b>Frequency: X for each incident of social interaction</b>	<b>Duration of the interaction measured in seconds.</b>	<b>Description of interaction.</b>

\*\*Use as many blank copies as necessary

### Appendix G: Best Buddies High School Membership Application

The high school membership application is only available online at <https://www.bestbuddiesonline.org/instructions.aspx?t=>. Membership applications should be completed online only through an affiliated chapter log in. Permission to utilize the membership application for the purposes of this proposal only has been requested.

## Appendix H: Informational Letter

August 19, 2013

To Whom It May Concern:

The 2013-2014 school year will be the inaugural year for the [School Name] chapter of Best Buddies International. Best Buddies International is a global organization, founded in 1989 by Anthony Kennedy Shriver, with the purpose of social inclusion of individuals with Intellectual Disabilities. You can find more information about the work of Best Buddies International at [www.BestBuddies.org](http://www.BestBuddies.org). We are the first high school chapter in Georgia and I am very excited to bring this organization to our community! Your child has voluntarily applied to join this organization and has received 2 teacher recommendations to support his/her application.

As part of my course requirements to obtain an Education Specialist degree from Georgia College and State University, I am conducting research about the effects Best Buddies International will have on the social interaction of students with intellectual disabilities with their peers without disabilities as well as the impact it will have on the attitudes, beliefs, and experiences of students without disabilities. I am seeking your consent to allow your child to participate in this study. Please see the attached consent forms, which include my contact information, for further details.

I appreciate your support of our chapter implementation, my personal research, and the "Inclusion Revolution!"

Sincerely,

Elizabeth Holloway

Appendix I: Best Buddies Member Training Document #1, Page 1 of 3

## Welcome to Best Buddies

### Best Buddies International Expansion Chapter Guide

The foundation of the Best Buddies organization is to establish a global volunteer movement that creates opportunities for one-to-one friendships, integrated employment and leadership development for people with intellectual and developmental disabilities (IDD). We accomplish this through our eight formal programs — *Middle Schools, High Schools, Colleges, Citizens, e-Buddies®*, *Jobs, Ambassadors, and Promoters* — which positively impact nearly 700,000 individuals with and without disabilities worldwide.

As part of the Best Buddies program, expansion chapters will join our global volunteer movement and bring programs to areas of the country where we currently do not have a Best Buddies state office. This expansion chapter guide will help you learn about the basic structure of our school friendship programs and expectations of an expansion chapter.

#### ***Best Buddies Terminology***

Below is a list of program terminology that Best Buddies' uses in our school friendship chapters:

- **Buddy pair:** a pair of students, one with a disability and one without, who are matched in a one-to-one friendship for an academic year.
- **Peer buddy:** a high school student without a disability matched in a one-to-one friendship.
- **Buddy:** a person with an intellectual or developmental disability matched in a one-to-one friendship
- **Chapter president (CP):** a student identified to serve as the leader of their high school chapter.
- **Leadership team:** a group of both students and adults who are charged with managing the chapter. The leadership team typically involves one faculty advisor, one special education advisor, and the CP.
- **Officer corps:** a group comprised of students who serve as leaders of the Best Buddies chapter. The leadership team is comprised of students with and without disabilities.
- **Faculty advisor (FA):** a faculty member who, in conjunction with the special education advisor, oversees a chartered chapter of Best Buddies.  
The FA provides guidance and leadership to the chapter, works closely with the CP and peer buddies, and acts as a liaison between the school administration and the chapter.
- **Special education advisor (SEA):** a teacher who, in conjunction with the FA, oversees a chartered chapter of Best Buddies High Schools. The SEA works as a liaison between the peer buddies and buddies and provides chapter members with on-going disabilities training and information on intellectual and developmental disabilities.
- **Best Buddies Online (BBO):** the online system which provides each individual chapter with its own portal for managing their membership, schedule of events, pictures, and other information relevant to chapter progress.
- ***The Best Buddies commitment:*** *buddy pairs are expected to communicate once a week (either by phone, email, in person, etc.) and spend time together twice a month.*

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***Developing a Best Buddies Chapter***

**The goal of each chapter is to build a solid foundation for successful expansion of the Best Buddies movement. Below are the chapter goals we ask all expansion chapters to fulfill in order to ensure a simple and smooth introduction of the Best Buddies program in your community.**

- Promote inclusion and acceptance on your campus.
- Establish a leadership team comprised of one faculty advisor, special education advisor, and a team of student leaders.
- Develop one-to-one friendships for students with and without intellectual disabilities in your school.
- Plan monthly activities for buddy pairs to engage in their friendship and develop a mutually enriching relationship.
- Monitor friendship progress so that all pairs meet the commitment of communicating once a week and spending time together twice a month.
- Track chapter progress and share updates with Best Buddies by using the Best Buddies Online membership system.
- Identify and implement a leadership transition plan for the following year.

***Chapter Membership***

The chapter membership encompasses the chapter leadership team, college/peer buddies, buddies, and associate members. The creation of long lasting friendships is the core of the Best Buddies High School program. A peer buddy and buddy who are matched in a mutually enriching one-to-one friendship must commit to the following minimum requirements:

- Contact each other on a weekly basis (telephone calls, letters, text messages, Facebook, e-mails, or brief visits during the day).
- Have two one-to-one activities per month.
- Attend all chapter meetings, group activities, and fundraisers

Prior to being matched, it is important that each member reflect on the commitment and consider the following:

- Do participants have time for this commitment throughout the entire school year?
- Are participants prepared to work through some of the challenges that may be presented to meeting the commitment with the support of the chapter leaders and parents?
- Do participants have support for getting transportation for the outings and activities?
- Are participants prepared to include their new friend in everyday activities with current friends? Sitting together at lunch? Going to school events? Going out to the mall or the movies on the weekend?

***The Best Buddies Commitment***

The information included in this section will help you understand the basic program structure of a Best Buddies chapter and the expectations we ask each school commit to when starting a chapter at their school.

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**Making Matches**

One-to-one friendships are the core of the Best Buddies program. All expansion chapters are expected to make at least 10 matches, successfully matching 10 peer buddies and 10 buddies in the first academic year.

To be matched in a one-to-one friendship all students must:

- Have the desire and ability to form a mutually enriching friendship.
- Attend volunteer training held by the chapter leadership prior to meeting your match.

To fulfill the role of peer buddy or buddy and remain in good standing, all students must:

- Plan activities with peer buddy and buddy twice a month.
- Contact peer buddy and buddy once a week (by phone, e-mail, social media, letter, or in person).
- Attend all chapter meetings and group activities with their college/peer buddy and buddy.
- Honor the one-to-one commitment for an entire academic year.
- Complete a friendship update monthly to report weekly contact and monthly activities on BBO.

**One-to-one activities**

One-to-one activities allow buddy pairs to spend time developing their friendship and can be anything the buddy pair chooses to do. The goal is simply to spend time together and have fun! Buddy pairs are matched based on similar interests, so deciding on activities should be relatively easy and natural. What do other friends do together at your school? Buddy pairs and their activities should reflect the social culture of your campus. If most friends spend time together at lunch, then you should be having lunch together. If most friends go to the movies or the mall on the weekends, then so should you and your buddy! While it is understood that school schedules, transportation, and other challenges exist, each buddy pair should look to their chapter leaders, advisors, parents and friends for support to overcome these challenges and meet the commitment each and every month.

When planning activities, it is important to consider the cost of the activity and plan activities both of you can afford; spending time together does not need to cost a lot of money. Try to be creative and plan things that do not cost a lot or, better yet, are free.

**Group activities**

Group activities bring the members of your chapter together for a shared experience. They enable everyone in the chapter to have a chance to meet and have fun with each other as a group. There should be at least four group activities over the course of the academic year, including one community service project.

The student leadership team is responsible for making activity schedules and should try to plan outings that everyone will enjoy. Note that peer buddies and buddies are required to attend all group activities.

**Chapter Meetings**

Chapter meetings bring the chapter members together to discuss chapter business and are used to plan chapter activities or talk about other issues related to chapter operations. These meetings provide an opportunity for peer buddies and buddies to share their ideas and concerns. Chapter meetings are led by the chapter student leaders and are held on a monthly basis.



## Appendix J: Best Buddies Member Training #2

The second training for Best Buddies members will come from the Easter Seals website under the heading, “Explore Resources.” Within the “Explore Resources” the “Facts about Disability” Section will be utilized. The site can be located using the following link:

<http://www.easterseals.com/explore-resources/facts-about-disability/>

As a whole group, use a projector to explore each of the 4 sections entitled “Facts and Myths about People with Disabilities, Disability Etiquette, Understanding Disability, and Helpful Hints on Meeting Friends with Disabilities.” Before and reading or discussion, set the tone for a safe, judgment free conversation to occur. Encourage members to be thoughtful, honest, and open. Then, read aloud, or ask someone to read aloud, from each of the sections on the site. After each section allow some time for safe discussion, questions, and input from members. Depending on the size of the group, it may be best for discussion to occur in small groups rather than as a whole group and have small groups share out after their discussion. Either way is acceptable and serves the same purpose.

## Appendix K: Best Buddies Member Training #3

## An Exercise in Social Isolation

**social isolation***noun* *Sociology* .

a state or process in which persons, groups, or cultures lose or do not have communication or cooperation with one another, often resulting in open conflict.

THINK: Have you ever felt isolated? Jot down when, where, and why...\_\_\_\_\_

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THINK DEEPER: Describe a time when you saw someone being intentionally isolated: \_\_\_\_\_

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DEEPER STILL: How did you respond? \_\_\_\_\_

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Let's watch a video: Moving Beyond Differences: Teens Tackle Social Isolation

<http://www.youtube.com/watch?v=F3GuasiHHFw>

Take some time to discuss what was seen in the video – either as a large group or in smaller table groups. Be sure to set the tone for honest, judgment-free discussion.

Set a goal for yourself. In the next 4 months, what will you do to combat social isolation and be part of the inclusion revolution! Examples: I will simply say hello to 1 person per week that I think might feel isolated, I will stand up for the girl I've seen being bullied, I stand up for that guy when people at my lunch table are laughing at him.... *What's your personal goal?* \_\_\_\_\_

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