

Humor and Students' Perceptions of Learning

by

Kent Truett, B. A.

A Thesis

In

COMMUNICATION STUDIES

Submitted to the Graduate Faculty
of Texas Tech University in
Partial Fulfillment of
the Requirements for
the Degree of

MASTER OF ARTS

Approved

Narissra Punyanunt-Carter, Ph. D.
Chair of Committee

Bolanle Olaniran, Ph. D.

David Roach, Ph. D.

Peggy Gordon Miller
Dean of the Graduate School

August, 2011

Copyright 2011, Kent Truett

ACKNOWLEDGMENTS

My journey as a graduate student was an amazing learning experience in multiple areas in my life. Without having faith in God, my family, and friends, this journey would have ended without completion. This experience as a graduate student has blessed me in more ways than I can express. The following thanks are for those people who made my master's degree possible.

I would first like to thank my graduate committee for helping me make my study as good as possible. You all have challenged me to think extensively and work hard for what we accomplished. Without my committee members, I feel that my study would have been lacking and would not have been completed. I appreciate the time all of you took to help me with my study through critiques and discussions. All of those things encouraged me to push through and complete my thesis.

Next, I would like to thank my family and Cheryl. My parents and brother have encouraged me throughout the past two years of graduate school and have stood beside me through the joys and pains of graduate school. I am blessed to have a family who knows how to help one another when times are difficult. A special thanks is owed to my dad because he instilled in me an incredible work ethic that is second to none. I remember when I was young and had to work long hours in the summer on the farm, which was not too much fun; however, I specifically remember one day when I was complaining about having to work all the time, and my dad told me I would thank him one day. Today is especially one of those days that I can truly say thank you dad! For my wonderful girlfriend Cheryl, I cannot thank you enough for all of your encouraging words and your positive outlook for me throughout this process. You listened to me when I was down and always expressed how much you believed in me! I am thankful to have such a wonderful woman who stands by my side through difficult and trying times. I will be by your side and do anything I can for you when you begin your thesis.

The people I met while in graduate school have touched my life and definitely helped me get through challenging assignments. First and foremost, Jessica was by far the best partner in crime anyone could ever ask for! J Spott, you have no idea how much

you helped me, and I agree, we spent way too many hours in the TA lounge working on papers and helping one another out. Even when I was a “Debbie downer”, you stuck by my side and even helped me change my attitude and outlook on a daily basis. You are a true friend and true encourager! You always made me see the greater things in life and in school and helped me produce work that was the best I could complete. Melanie, you were the strict mother figure that displayed an abundant amount of love for others. Thank you for reading, re-reading, and critiquing my work and thesis. I am blessed to have had the opportunity to spend a year with you and develop a great friendship with you. Jeff and Colleen, both of you made the past two years of graduate school a lot of fun! Not only did you help me and many others, but you are great people to be around to boost spirits. I appreciate and value our friendship that we developed and am excited for the future! I wish all of these people an exciting and blessed future and am very grateful for all of you!

TABLE OF CONTENTS

ACKNOWLEDGMENTS	ii
ABSTRACT	vi
LIST OF TABLES	vii
CHAPTER	
I. INTRODUCTION	1
Rationale	2
Immediacy in Relation to Perceived Learning	3
II. LITERATURE REVIEW	5
Humor in the Classroom	5
Appropriate Humor	7
Inappropriate Humor	10
Humor in Relation to Sex Differences	12
Verbal and Nonverbal Immediacy in the Classroom	13
Student Perceived Cognitive Learning in the Classroom	15
Instructional Humor Processing Theory	17
Incongruity-Resolution Theory	17
Disposition Theory	18
Elaboration Likelihood Model of Persuasion	18
III. METHODOLOGY	22
Participants	22
Procedure	22
Instructor Humor Scale	23
Student Perceived Cognitive Learning Scale	23
Data Analysis	24
IV. RESULTS	27
Research Question One	27
Research Question Two	28

V. DISCUSSION	30
Instructional Humor Processing Theory	31
Related Humor	34
Self-Disparaging Humor	35
Unrelated Humor	38
Offensive Humor	39
Limitations	42
Future Research	44
Conclusion	45
REFERENCES	47
APPENDICES	
A. DEMOGRAPHIC SURVEY	54
B. TEACHER HUMOR SCALE	56
C. STUDENT PERCEIVED COGNITIVE LEARNING SCALE	59

ABSTRACT

Students on all educational levels learn differently than others, and some communication tools that teachers use assist students when learning in the classroom. The college classroom for some is the last place people receive teaching or instruction before entering the work force. It is important that teachers are equipped with proper teaching tools that will help students learn as much as possible. The current study looked at the frequency of humor use by teachers in the classroom and students' perceptions of learning. The participants filled out the Instructional Humor Scale and the Student Perceived Cognitive Learning Scale.

Results displayed that students' perceptions of learning was greater when teachers incorporated related humor, self-disparaging humor, unrelated humor, and offensive humor. Males and females identified the frequency of humor use by teachers almost the same in the study; therefore, males and females displayed that they were able to identify when teachers incorporated specific types of humor in the classroom. The results from this study can help teachers strategize the use of certain types of humor in lectures or discussions to increase students' perceptions of learning. This study also establishes a basis for future studies to look into other types of student learning so that teachers will be more equipped to teach properly.

LIST OF TABLES

1. Alpha Reliability Statistics	25
2. Means and Standard Deviations for Sex on Types of Humor	28
3. Correlation Matrix	29

CHAPTER I

INTRODUCTION

Teachers at universities have an important job to effectively instruct, guide, develop, and challenge students before they enter into the real world. Teachers instruct, guide, develop, and challenge students to perform at levels students may not think possible. Previous research has found different methods that help teachers effectively educate students (Frymier, Wanzer, & Wojtaszczyk, 2008; Wanzer, Frymier, & Irwin, 2010). Compliance-gaining strategies (Punyanunt, 2000), self-disclosure (Wanzer, Frymier, Wojtaszczyk, & Smith, 2006), immediacy (Witt & Wheelless, 2001), and appropriate use of humor in the classroom (Frymier et al., 2008) are several topics of interest that benefit collegiate teachers. When teachers use these tools in the classroom, students receive benefits such as improved learning. By incorporating various strategies in the classroom, teachers create a welcoming environment for students. A welcoming environment creates a positive climate and gives the teacher an advantage when delivering lectures, leading discussions, and building rapport with their students (Teven & McCroskey, 1997; Wanzer & Frymier, 1999). Teachers have the option of incorporating an assortment of communication tools that can increase students' perception of learning. Humor is one communication tool teachers can utilize to assist learning.

Humor can be used in many different situations by the teacher and by the students, but some types of humor can be more effective than others. The use of humor in the classroom does require a specific technique because some people are naturally funnier than others. Identifying a teacher's frequency of humor use in the classroom can help teachers develop a more beneficial, engaging classroom that might increase students' perceptions of learning and create a relaxed classroom environment. Some of the different types of humor that are used in the classroom are puns, jokes, riddles, cartoons, sarcasm, nonverbal behavior, and one liners (Wanzer et al., 2006). Many aspects of humor have been studied such as appropriate forms of humor (Wanzer et al., 2006), humor orientation (Ayloy & Oppliger, 2003), and immediacy (Gorham & Christophel,

1990); however, little research has been conducted to find out which types of humor enhance learning in students. It is important for teachers to understand how to effectively communicate with students via humor. All teachers use different teaching strategies and techniques for students, but humor gives the teacher an advantage because it allows the class to momentarily veer away from the topic, which can give students an opportunity to reboot their thinking process. Humor also allows the teacher to deliver the message from an additional vantage point, which can be advantageous for some students. Garner (2006) stated that humor increases students' interest in learning, and students who are taught by a teacher who incorporates humor often learn more. The current study will identify types of humor students prefer when learning.

Because immediacy is a communication delivery that develops closeness and decreases psychological or physical detachment between two or more individuals (Richmond & McCroskey, 1998), it can be combined with humor in the classroom to aid student learning. Previous research has found that teacher immediacy assists in making students feel more comfortable in the classroom (Gorham & Christophel, 1990; Teven & Hanson, 2004; Teven & McCroskey, 1997; Zhang, 2005). Researchers have found that when teachers display immediacy, students' apprehension is decreased (Gorham & Christophel, 1990). Thus, immediacy should lead to more communication in the classroom between the teacher and students. When students feel that the teacher cares enough about them to break the awkward introduction, students will not only be more motivated and engaged but will likely learn more information. Teachers can use humor to break through to students, which can be displayed via immediacy. The knowledge gained from this study will assist teachers when communicating in the classroom and produce better, more knowledgeable students.

Rationale

Humor and immediacy are two communication tools that will be discussed in this study, and this thesis will show how they produce a positive learning environment for students to prosper. Humor is the main focus in this study because students were found to be more knowledgeable when teachers used humor in the classroom (Minchew, 2001). If teachers combine humor with immediacy, it will lighten the mood and help reduce the

anxiety of students in the classroom (Neumann, Hood, & Neumann, 2009). Because teacher humor causes students to feel more relaxed in the classroom, it is important to identify students' perceptions of a teacher's frequency of humor.

Humor can assist teachers when they are delivering information to students. In the college classroom, humor captivates the students' attention, creates engagement, lowers anxiety, motivates, and assists in learning (Bell, 2009; Frymier et al., 2008; Punyanunt, 2000; Wanzer, Frymier, & Irwin, 2010). Torok, McMorris, and Lin (2004) and Neumann et al. (2009) found similar results with teachers who incorporated humor in which students were engaged throughout the allotted class time. However, there has been little research that has established a link between the teacher's frequency of humor use and students' perceived learning. Not all teachers possess effective humorous qualities, but they can work on certain types of humor and use humor to assist in lectures and discussions. Previous research has found that students do prefer listening to teachers who incorporate humor into the lecture (Minchew, 2001; Neumann, Hood, & Neumann, 2009). Students deserve to be taught by teachers who can create and maintain engagement throughout the lecture. Teachers who combine humor and immediacy can help students learn as well.

Immediacy in Relation to Perceived Learning

Within this study, immediacy will be compared to humor as a teaching tool used by teachers to affect student learning. Richmond et al. (2006) found that teachers who frequently use a variety of verbal and nonverbal communication behaviors through immediacy reduce physical and psychological distance between themselves and students. Immediacy helps bolster relationships between the teacher and student(s) when used effectively. Teachers can incorporate verbal immediacy by giving praise to students or using the pronoun "we" instead of "you." Examples of nonverbal immediacy are eye contact, facial expressions, and gestures (Richmond & McCroskey, 1998). Richmond, McCroskey, Kearney, and Plax (1987) studied behavior alteration techniques (BATs) and students' perceived learning. The researchers found that immediate reward from behavior was one BAT that assisted students' learning, such as when a teacher tells a student that something they are about to do will be rewarding or interesting. King and Witt (2009)

found a strong correlation between nonverbal immediacy used by teachers and perceived learning by students. Also, Witt and Wheelless (2001) found that greater use of verbal and nonverbal immediacy increased recall and decreased learning loss. Hence, immediacy assisted teachers when creating a positive learning atmosphere and students' perceived learning increased. Not only do American students find immediacy to be beneficial, but Japanese students find it to help in the classroom. According to Hinkle (1998) Japanese students perceived they learned more when the teacher displayed nonverbal immediacy. These previous studies concerning immediacy are important to the current study because they exhibit that immediacy helps create a positive learning environment for students. Additionally, when teachers amalgamate humor with immediacy, students can have a better perception of learning. College classrooms are unique in every setting, so proper teaching tools such as humor are needed in order for students to learn. Because humor serves a purpose in the classroom, it is important to identify teacher's frequency of humor use and the effects it has on students' perceptions of learning.

CHAPTER II

LITERATURE REVIEW

When teachers exhibit humor and immediacy in the college classroom, some students can receive benefits. Engaging students is a goal every teacher should try to attain when lecturing or discussing concepts in the classroom because students process information differently. Humor assists teachers when delivering lectures because it causes students to feel more relaxed and welcomed (Wanzer & Frymier, 1999). Additionally, Bryant, Comisky, Crane, and Zillmann (1980) found that when male teachers used humor they were viewed by students as more appealing, delivered information better, and viewed as better teachers than female teachers. If teachers are not comfortable incorporating humor in class lectures, assignments, or tests, they need to possess other communication tools such as immediacy. Not only do students feel welcomed, but a positive learning environment is established when teacher exhibit immediacy (Teven & Hanson, 2004). Students construct opinions about every teacher throughout the semester, and the students' attitudes toward the teacher are reflected in their participation, reciprocity, and verbal and nonverbal communication (Johnson, 2009). Previous research found humor (Wanzer, Frymier, Wojtaszczyk, & Smith, 2006) and immediacy (Witt & Wheelless, 2001) to assist students when incorporated by a teacher. Humor established a positive student-teacher relationship (Wanzer et al., 2006), and immediacy increased student recall of information (Witt & Wheelless, 2001). These two communication tools will be discussed in order for readers to understand why it is important for teachers to use these tools.

Humor in the Classroom

Humor assists in creating a friendly atmosphere in classrooms because it can create funny emotions. Robinson (1983) researched humor and expressed that what is "learned with laughter is learned well" (p. 121). Moreover, according to Cosner (1959) humor and laughter were similar to an invitation to start a conversation because they assisted in decreasing social distance. Previous research has found that humor in the classroom caused students to feel more at ease, created engagement, and displayed to the

students that the teacher is a regular person (Neuliep, 1991). Minchew (2001) found that humor was a teaching tool that engaged students, livened the classroom environment, and enhanced learning. Berk's research in 1996 concluded that humor can break down barriers so that teachers and students can better communicate and reciprocate messages. Similar to Berk's study, humor was found to lighten the mood during lectures and helped reduce stress and anxiety in students (Neumann et al., 2009). Booth-Butterfield, Booth-Butterfield, and Wanzer (2007) found that when individuals encoded humorous messages, their focus on the sender increased. Here, students were more attentive when the teacher incorporated humor into the class and were able to identify humorous messages. The majority of research provided has been from American classrooms; however, other studies have been conducted to find out the effects of humor in the classroom. Shiyab (2009) found that 66.7 percent of Arab students believed that the use of humor increased their understanding and comprehension of material and motivated students to attend class. When social anxieties are reduced, students are relaxed and more attentive to the teacher because the built up tension has decreased due to the incorporation of humor.

Not all teachers are naturally funny as other teachers. Humor orientation was defined as "individual differences in the predisposition to enact humorous messages" (Booth-Butterfield & Booth-Butterfield, 1991, p. 32). Some teachers display high levels of humor orientation while others possess low levels of humor orientation (Aylor & Oppliger, 2003). Wanzer, Booth-Butterfield, and Booth-Butterfield (1995) found that high humor-oriented individuals were more competent communicators and were more affectively oriented. Booth-Butterfield and Booth-Butterfield (1991) explained that high humor-oriented people reported using multiple humorous strategies across various situations. Additionally, Wanzer and Frymier (1999) discovered that students with high levels of humor orientation learn more when they have teachers who possess high levels of humor orientation; therefore, it is important for teachers to be able to incorporate some type of humor when communicating with students because in order to enhance student learning.

Appropriate Humor. There are many forms of humor that are used in the classroom, but some categories of humor are appreciated, while other types of humor are not valued. Some types of humor are jokes, riddles, puns, sarcasm, one-liners, stories, nonverbal expressions, and cartoons and can be expressed in virtually any situation or topic (Cornett, 1986; Wanzer et al., 2006; Frymier et al., 2008); however, there are some forms of humor that students prefer. Appropriate humor illuminates a sense of positive humor because positive humor incorporates an attitude or perspective that reduces tension in the classroom (Chabeli, 2008). Researchers have identified four different categories that were seen as appropriate humor: related humor (Cornett, 1986), unrelated humor to class material (Loomans & Kolberg, 1993), self-disparaging humor (Bryant & Zillmann, 1989), and unintentional or unplanned humor (Martin, 2007). The current study uses Wanzer and colleagues' research to provide a foundation of understanding appropriate forms of humor. Related humor can include jokes, stories, college stereotypes, role playing, or creative language that is related to the topic being covered in the classroom. Unrelated humor identifies the same examples of related humor but is not related to material covered in lectures or discussions. Self-disparaging humor can be used by a professor when he or she uses stories, jokes, or comments about himself/herself in a belittling fashion. Lastly, unintentional or unplanned humor can be identified when teachers said or did something that was not intended to be funny, but students perceived the teacher's actions to be humorous (Wanzer et al., 2006). Appropriate humor has multiple forms and delivery tactics. Englert (2010) gave several steps to effectively use humor in the classroom: identify in the presentation where appropriate humor can be used, decide what type of humor appropriately fits the situation, and evaluate how effective the type of humor used have on the students (Englert, 2010). When humor assists student learning, the teacher knows to use it in the future.

The top four related humor uses Wanzer et al. (2006) found were media/external objects, jokes, examples, and stories. With today's technology teachers have many sources available at their fingertips. Media objects can be identified as using a video for class that is related to what is being covered, and for today's classroom, YouTube is a common tool that contains clips and videos. Teachers are creative when planning their

lectures and discussions because there is important information that must be understood by the students. The use of external objects can include a teacher who wore a red clown nose in order to make the students feel more at ease (Chiarello, 2010). Stories used in the classroom can be incorporated by teachers and/or students to share funny or embarrassing situations, thoughts, or experiences (Chauvet & Hofmeyer, 2007). Additionally, the researchers believe that story sharing encouraged students to listen, helped them engage in laughter, and assisted them to accept their peers in the classroom. Also, teachers can incorporate a personal story that relates to the material, which will gain attention from the students. Hellman (2007) expressed that it is important to use humor at a specific time in the classroom. He went on to say that teachers must first establish rapport and credibility with their students and then incorporate the proper type of humor. Another way humor can be incorporated is through the use of unrelated humor.

Unrelated humor does not pertain to the information being covered, but it does have a purpose in the classroom. Unrelated humor can be viewed as jokes, humorous stories, or punch lines that are used by a teacher that do not increase lesson enhancement (Loomans et al., 2002). Unrelated humor assists students by allowing them to relax and get away from the monotony of lectures. Zhang (2005) found that small talk, self disclosure, and personal stories increased effectiveness and liking in students. One way to incorporate small talk by the teacher is to show up a few minutes before class. This can be an opportune time for teachers to establish rapport and develop teacher-student relationships. Because small talk and self disclosure falls under unrelated humor, it gives the teacher the opportunity to show he is a normal person allowing students to feel more comfortable (Glenn, 2002). Teachers can also make students feel comfortable by using euphemisms or creative words and phrases. The use of euphemisms can assist teachers with humor; for example, they could refer to a person who is not tall with the phrase “vertically challenged” (Hellman, 2007). This example displays that teachers can make everyday talk funny.

Another type of humor researched by Wanzer and colleagues was self-disparaging humor. Students can take advantage of the professor’s humor when they hear a funny story and can add additional stories or comments to relate the story to a similar topic.

Frymier et al. (2008) found that humor-oriented individuals prefer teachers who use disparaging humor because students tend to display the same or similar humorous qualities as their professor. Hence, it benefits teachers to try to identify with their students, so they can incorporate the desired form of humor. When the professor uses self-disparaging humor, it gives students the opportunity to use humor themselves. Hellman (2007) stated that it is important to let students enjoy their moment when incorporating humor. Allowing students to use or build on humor in the classroom shows that the students feel comfortable with the professor because the professor allows opportunities for students to display their humor orientation. Self-disparaging humor was found to enhance motivation in students to process the information (Wanzer et al., 2010). When students juxtapose their personality with their teacher, the students can relate to their teacher easier. Finally, unintentional humor can be an effective form of humor in the classroom.

Teachers are not perfect; they make mistakes and do not always say what they mean to say which identifies unrelated humor (Wanzer et al., 2006). An additional example of this can be a slip of the tongue. When teachers are delivering lectures, they are constantly thinking about their next point to cover and are trying to establish and maintain engagement. While teachers process information and reciprocate information to students, teachers sometimes say something they wish they could take back. Unintentional humor happens in multiple classes and is not necessarily a negative attribution; it shows that even teachers make mistakes and are not perfect every time they deliver lectures or create discussions. Unplanned humor was the least frequently used category found in the study from Wanzer et al. (2006). Teachers' use of unintentional humor can be an appropriate form of humor and might help students because it does not belittle them.

If teachers are able to use humor effectively, students will benefit from this type of communication tool. Torok et al. (2004) identified humor as having "the potential to humanize, illustrate, defuse, encourage, reduce anxiety, and keep people thinking" (p. 14). Since humor has the ability to accomplish the previous findings, the frequency of humor use by a teacher can affect students' perceptions of learning. Neumann et al.

(2009) displayed similar findings in which humor assisted students in maintaining concentration throughout the class period. One student explained that the use of humor causes students to pay better attention to the overall lecture, so they [students] would not miss out on the type of humor that was incorporated. Other students said humor brought back engagement when they were not concentrating on the lecture (Neumann et al., 2009). The use of humor is an important teaching tool that must be studied in order to have more effective teachers.

Inappropriate Humor. Humor used by teachers that does not contribute to classroom participation, engagement, or learning should be avoided by teachers in order to prevent negative implications in the classroom. If the professor uses humor inappropriately, students can become inclined to thinking that they are being violated in the classroom (Wanzer et al., 2010). Previous researchers have identified inappropriate forms of humor used by teachers such as offensive humor (Torok et al., 2004), unrelated humor (Ziv, 1988) student-disparaging humor (Martin, Puhlik-Doris, Larsen, Gray, & Weir, 2003), other-disparaging humor, and self-disparaging humor (Wanzer et al., 2006). Inappropriate humor can be viewed as negative humor. Chabeli (2008) defines negative humor as “an attitude or perspective that is intended to belittle, ridicule, discriminate and encourage negativity amongst learners” (p. 52). Moreover, Ziv (1988) unrelated humor and found that irrelevant humor used in the classroom does not improve learning. The researcher discussed that unrelated humor could distract students and make it harder for students to re-engage in the information covered in the class. Wanzer and colleagues found that the most offensive humor was vulgar, sexual, or related to alcohol consumption (Wanzer et al., 2006). Specifically, sexual humor is not seen as a type of humor that is professional, so teachers should avoid using it. Because college students represent a diverse population, teachers need to be cognizant of what they say and do inside and outside of the classroom. Teachers who use verbally aggressive humor are sometimes liked or disliked by students but, it depends on the student’s perspective. This type of humor is viewed by most students as inappropriate humor, but some students do identify it as effective humor. Verbally aggressive students prefer aggressive humor because they deem verbal aggressiveness as a positive interaction (Frymier et al., 2008).

Students who have an aggressive sense of humor might excel in a classroom that has a teacher who possesses the same style of humor that is verbally aggressive. Sometimes there are hidden phrases that verbally aggressive individuals identify with, while nonverbally aggressive individuals would not catch. Students who find offensive humor as appropriate humor might identify it as an effective communication tool, or other students feel they are being targeted as the butt of the joke. Because some students find offensive humor appropriate while others find it inappropriate, teachers need to be aware of using offensive humor. Increasing knowledge and learning should be a high priority for teachers at the collegiate level. It is the teacher's responsibility to show that he/she cares about the class and the students that are enrolled. Frymier (2007) found that a teacher and students construct an interpersonal relationship, in which they both need to commence class with relational goals. A relational goal for teachers could be a positive learning environment or help establish rapport with students. Teachers must maintain professionalism when teaching, so a connected classroom environment is important to implement. Dwyer, Bingham, Carison, Prisbell, Cruz, and Fus (2004) described a connected classroom environment in which students' perceptions of a helpful and civil communication environment was present. Different types of disparaging humor can have negative effects on students. If a teacher belittles students in class or stereotype college students as a whole, the teacher can do more harm to the classroom environment. When individuals become offended, positive interactions can be more difficult to implement. It is important that teachers do not insult students because it will cause problems among the teacher and students. Wanzer et al. (2006) gave examples of disparaging humor where students' intelligence, gender, appearance, religion, and opinion were targeted by the teacher. Belittlement of students can be identified as a negative form of humor and can cause negative implications between the teacher and students because students might feel they are being constantly targeted by the teacher. A teacher may not intentionally belittle a student, but the humor used by the teacher may be interpreted by the student as a putdown or inappropriate. Other-Disparaging humor targeted nonstudent groups (Wanzer et al., 2006). "Others" received attention based on race, gender, university affiliation, sexual orientation, appearance, religion, and/or political affiliation. Because classrooms

are a diverse population, it is important that teachers use humor not only professionally, but also appropriately. This will help create a positive learning environment and help students identify their teacher as a professional. Previous research has found humor to be a positive learning tool used by teachers, so it is important that teachers know the positive and negative types of humor used by teachers (Aylor & Oppliger, 2003; Torok et al., 2004). If teachers know how to properly incorporate humor into the classroom, they will have a better chance of creating a positive learning environment for students. The purpose of teacher humor use has been discussed, but additional explanations need to be explained concerning males and females' perceptions of humor.

Humor in Relation to Sex Differences

Identifying how males and females perceive humor is an important area of study because males may find some types of humor to be funny while females do not. Gorham and Christophel (1990) found that males and females identified humor differently. Females' learning outcomes were not as strongly influenced by overall humor as were males, but stories that were related to the material being studied influenced females more. Males were more likely than females to identify things the teacher said or did as humorous (Gorham & Christophel). Other researchers have found differences in the use of certain types of humor perceived by males and females. Martin et al. (2003) found that males engaged in more aggressive types of humor such as put-downs and sarcasm and had a greater tendency to employ self-disparaging humor. Males might use these types of humor because males do not become as offended as females. Moreover, Prerost (1975) discovered that when male arousal or increase of aggressive feelings were present, they were more responsive of sexual and aggressive humor. Rosenfeld and Anderson (1985) studied humorous responses on items contained in tests. Results showed that males rated humor in the items to be funnier than did females. Males might be able to identify more humor than females in the classroom setting.

On the opposite spectrum, Azim, Mobbs, Jo, Menon and Reiss (2005) looked at brain activation elicited by humor in males and females. This study looked at the number of stimuli activated when participants responded to cartoons that were funny. There were no significant differences in males and females when identifying humor within the

cartoons. Additionally, Herzog (1999) studied cartoons and found that females liked sexual humor just as much as males when a male was the humorous target; however, when a female was the humorous target, the females strongly disliked the cartoon. This displays that males and females enjoy humor, but females can become offended when females are targeted. There is little recent research that has looked specifically at males and females' perceptions of humor; instead, the majority of research identifies males and females as students. Because some studies have identified differences and similarities in males and females' views of humor, it is important to identify if there are relationships or differences in males and females' perceptions of humor.

Verbal and Nonverbal Immediacy in the Classroom

Teachers commence the semester with students who are nervous, anxious, and eager to learn, so it is important that the professor constructs a positive learning environment. There are several ways to create a positive learning atmosphere by using humor (Skinner, 2010; Wendt, 2008) and immediacy (Zhang, 2005). Sanders and Wiseman (1990) studied the effects of immediacy and identified some immediacy behaviors as smiling at students, moving around the room, using eye contact, and decreasing student-teacher distance. Hence, when teachers combine humor with immediacy, a positive atmosphere can develop. Gorham and Christophel (1990) recommended that teachers should constantly attempt immediacy behaviors such as being vocally expressive, using humor, maintaining eye contact, and praising students. Teachers who do not seem to care or who speak in a monotone voice can create a negative learning environment, which can hinder student learning. Gorham and Christophel (1990) found that humor and immediacy assisted learning, but each had different positive effects on students; however, the researchers stated that the relationship established between the teacher and students created more learning when teachers implemented humor and immediacy together (Gorham & Christophel, 1990). For example, a teacher can tell a funny story and can incorporate different facial expressions or use hand and body gestures to make the story more engaging and humorous for students. Teachers who use nonverbal and verbal messages create a combination that displays positive attributes of the teacher. Richmond, Lane, and McCroskey (2006) found

that teachers who displayed immediacy often used a multitude of nonverbal and verbal communication behaviors that display positive attributes of the teacher, thus reducing physical and psychological space between themselves and students. This creates a more effective student-teacher relationship. Witt and Wheelless (2001) found that when teachers use various levels of verbal immediacy in conjunction with nonverbal immediacy, students had greater recall of information and learning loss decreased. Voice assists teachers when incorporating humor by allowing the teacher to alter his/her voice (Richmond & McCroskey, 1998). Additional researchers found similar results, realizing that when teachers increased the use of verbal and nonverbal immediacy, students learned more (Witt, Wheelless, & Allen, 2004); therefore, teachers need to be cognizant of the benefits their students receive when they implement immediacy and humor together in the classroom.

Teachers have the ability to incorporate immediacy by showing students excitement and passion for teaching, which helps students feel they can relate to their teacher inside and outside of the classroom. Self disclosure and personal examples used by teachers allow students to get to know their teacher. Students will have a better idea of how to interact with their teacher in the classroom and in one-on-one conversations. Comments that teachers use to encourage students to continue discussion or to praise for explanations in the classroom will assist in creating increased immediacy (Richmond & McCroskey, 1998).

Nonverbal immediacy can be used in different humorous situations. It is logical to think that a professor who uses nonverbal communication tools in conjunction with verbal communication tools is more appealing to watch and listen. Simple hand gestures, facial expressions, posture, touch, eye behavior, and bodily movement can assist teachers when trying to incorporate immediacy (Richmond & McCroskey, 1998). Hand gestures and facial expressions can assist teachers' delivery of information by revealing emotions that correlate with the humorous message. Posture and bodily movement can also increase engagement because students must focus on the relationship of nonverbal immediacy to humor. Students feel more comfortable talking to teachers when the teacher demonstrates through immediacy behaviors he/she is dedicated to student

learning. Mottet and Beebe (2002) found that teachers who incorporated nonverbal immediacy activated a pleasure-emotion response, which assists students when approaching teachers. Teacher immediacy displays caring for students, which for many college students is important because of the stress due to college course loads (Frisby & Martin, 2010). If teachers can close the communication-apprehension gap by combining immediacy with humor, students might feel more comfortable asking questions in class. This might increase knowledge and allow students to remember more information in the future.

When teachers display immediacy, perceptions of the teacher might be different. Houser and Frymier (2009) found that highly teachers who often displayed immediacy were more approachable, so students sensed they had more of an impact in the class. Hsu (2010) found that when teachers expressed immediacy behaviors such as smiling, gesturing, and using different vocal expressions, students were more motivated to learn. Smiling, gesturing, and vocal variety can be incorporated via humor by a professor. Anderson (1979) discovered that when students identify their teacher to exhibit immediacy, students were more prone to be attracted to the teacher and the class as well. Also, Frymier and Houser (1999) expressed that a safe learning environment is established once a trusting and caring relationship is cultivated between the teacher and students. Skinner and Fowler (2010) found that humor produces a beneficial learning environment. Immediacy and humor are two communication tools that will give teachers an advantageous presence when conducting class.

The combination of humor and immediacy created and sustained engagement when used by teachers (Neumann et al., 2009; Richmond & McCroskey, 1998; Witt et al., 2004). Brosvic and Epstein (2007) found that when teachers maintained motivation in students, they learned and remembered more information. Immediacy by teachers is an important communication tool that can increase motivation and learning in students.

Student Perceived Cognitive Learning in the Classroom

Students expand their knowledge in a particular subject by extending their education after high school. It is the teacher's responsibility to incorporate communication tools such as humor and immediacy that will assist teachers covering

information that will contribute to student learning. Some students identify learning as the grade received in the class, being motivated to attend class or teacher impact on students. Perceived cognitive learning can be identified when one feels that some type of change has happened, new information has been attained, or additional understanding has been achieved (Caspi & Blau, 2008). Students may not fully grasp information covered, but they might perceive they do in fact understand the information discussed. In order to identify how much students learn, Richmond, et al. (1987) strove to design a scale that would assess cognitive learning via learning loss. The Learning Loss Scale (LLS) asked the following two questions: “How much did you learn in this class?” and “How much do you think you could have learned in this class had you had an ideal instructor?” (Richmond et al., 1987, p. 6). Learning loss was produced by subtracting the answer to the first question from the answer to the second question. This score displayed the reported sum of learning the student perceived was learned in a class (Richmond et al., 1987). The researchers found a strong correlation between nonverbal immediacy and students’ perceived learning (Richmond et al., 1987). This scale has been widely used, but it has been altered to fit specific studies. In 1994 Roach adapted Richmond and colleagues’ scale measuring cognitive learning via students’ perceived learning. The study examined behavior alteration techniques (BATs) used by teachers and found that BATs increased to the highest point during the midpoint of the semester and remained relatively consistent through the remainder of the semester (Roach 1994); however, cognitive learning perceived by students did not change extensively over the semester. Additional studies have used the Student Perceived Cognitive Learning Scale (SPCLS) from Roach’s 1994 study. Roach, Cornett-DeVito, and DeVito (2005) studied communication used by teachers in American and French classrooms. The researchers found that American students displayed higher levels of perceived affective learning, liked their teachers more, and displayed higher cognitive learning (Roach et al., 2005).

Students might learn more when their teacher incorporates humor in the classroom because humor can make students feel more comfortable. The SPCLS has proven to be a reliable scale and has been chosen for the current study because the questions support the purpose of the current study. Many researchers have used the

original LLS developed by Richmond et al. (1987); because the SPCLS has not been widely used, there is little research that has incorporated the measurement in studies. Hence, the lack of use of the SPCLS in previous studies gives the current study an opportunity to display the benefits of perceived cognitive learning in the classroom. Students' perceptions of learning are important to identify because researchers can specify what works for teachers when covering material in the classroom. If teachers have a better understanding of how students learn, they can incorporate specific material to increase learning.

Instructional Humor Processing Theory

Previous research concerning the use of different types of humor in the classroom has found benefits for students' perceived learning. Wanzer et al. (2010) stated that how humor is understood and the nature of the humor used determines if humor assisted in learning or not. Teachers must be able to recognize their strong and weak communication tools and must take advantage of their skills in order to be an effective teacher. Instructional Humor Processing Theory (IHPT) was created by Wanzer, et al. (2010) and consists of the following three theories: Incongruity-Resolution Theory (LaFave, Haddad, & Maesen, 1996), Disposition Theory (Zillman & Cantor, 1996), and Elaboration Likelihood Model of Persuasion (Petty & Cacioppo, 1984).

Incongruity-Resolution Theory. Incongruity Theory reveals that people identify funny messages that exhibit inconsistency, contrast, or surprise (Berlyne, 1960). LaFave et al. (1996) expanded Incongruity Theory and established the Incongruity-Resolution Theory (IRT). The IRT emphasized how humorous messages were cognitively understood by the receiver of the message. The IRT illustrates humor as a double phase process in which the inconsistency or incongruity in the stimuli of the message has to first be recognized then precisely understood to be considered funny by the receiver of the joke (LaFave et al., 1996). IRT starts with the essential assumption that people come into situations with certain anticipations of appropriate behaviors. For the humorous message to be interpreted and subsequently assessed as humorous, the receiver recognized an occurrence that was inconsistent with his/her anticipation (LaFave et al., 1996). This inconsistent message can be perceived as funny; however, if the incongruity

is too complex for the receiver, the receiver will not understand the humorous message. When teachers use humor that is ambiguous or complex, they must be able to explain the ambiguity or complexity of the message. Once the message is made clear, students will be able to identify the purpose of the humor used by the teacher. Because teachers use different types of humor, students must think outside the box. This can lead to further understanding of information covered in the classroom.

Disposition Theory. The Disposition Theory model displays that appreciation of humor increases when the person who is using the humor is seen positively. When the person using humor is disliked, individuals will not find the humor to be funny (Zillman & Cantor, 1996). If the person or object that is targeted by the humor is seen in a positive manner, people will identify the humor to be inappropriate; however, if the person or object is seen in a negative manner, people will perceive the humor to be funny (Zillman & Cantor, 1996). Thus, it depends on peoples' perceptions of humor on the individual using the humor and the person or object who is the target. Some people prefer self-disparaging humor, while others prefer other-disparaging humor to be funny. Some people do not identify messages to be funny, so it depends on the person's sense of humor. Raney (2004) simply states that Disposition Theory predicts the satisfaction increases when people who are liked receive positive outcomes, while people who are disliked receive negative outcomes. An example of this would be that people like to see the "good guy" win and the "bad guy" lose. Disposition Theory ties into the current study because it helps students identify which types of humor teachers are using more often than others. Moreover, Disposition Theory will help the study identify which types of humor help students perceive they are learning.

Elaboration Likelihood Model of Persuasion. Elaboration Likelihood Model of Persuasion (ELM) explains how people perceive persuasive messages and elucidates the relationship linking learning and thinking (Cacioppo & Petty 1984; Petty & Cacioppo, 1981, 1986). When certain conditions bolster a person's motivation and engagement, people are likely to do the following: focus on the appeal; try to recall applicable images, associations, or experiences from memory; identify inferences about the value of the argument for a suggestion through the appeal that is accessed from one's memory; and/or

derive a final evaluation of or attitude in favor of the recommendation (Cacioppo & Petty, 1984). The ELM contains two explanations for persuasion through high and low elaboration likelihoods. When elaboration likelihood was high, a person was engaged through issue-relevant thought and was highly motivated (Petty & Cacioppo, 1984). When elaboration likelihood was low, a person's ability to think was not present or significantly reduced and motivation decreased as well (Petty & Cacioppo, 1984). Additionally, a person either takes the central or peripheral route through ELM. The researchers discussed that "Under the central route, attitude changes result from a person's careful attempt to evaluate the true merits of the advocated position" (Petty & Cacioppo, 1984, p. 668). The peripheral route causes attitudes to change because people relate the object or issue with negative and positive cue(s). People can also construct easy inferences about the qualities of the advocated point through multiple easy cues in the persuasion framework (Petty & Cacioppo, 1984). According to Petty and Cacioppo (1984) people who were in the high-relevance state used the central route, and people who were in the low-relevance state used the peripheral route.

Wanzer et al. (2010) established the IHPT that consisted of the three previous theories discussed. Wanzer and colleagues chose the Incongruity Resolution Theory because students must understand how to process humor. They believed there were three possible outcomes that existed for the IRT. First, the incongruity of the humorous message was not recognized; thus, students did not grasp the humor in the message. Second, the incongruity of the humorous message was identified but was not resolved. Hence, students were not able to understand the humorous message. Third, the student identified and understood the humor and was perceived as funny (Wanzer et al., 2010). The Disposition Theory was chosen because people have different perceptions of feelings of people who are targeted or made the "butt" of a joke (Zillman & Cantor, 1996). This theory helps students identify appropriate and inappropriate forms of humor. The Elaboration Likelihood Model of Persuasion applies to the IHPT because when students perceive that the message is relevant, they should have greater motivation; therefore, students would have greater understanding and retention of the information (Wanzer et al., 2010). IHPT looks at the different types of teacher humor and the positive and

negative effects humor has on student learning. This theory also assists in describing variability in perceptions of students' views of humor use by a teacher (Wanzer et al., 2010). Because IHPT identifies different types of humor and the effects it has on learning, the theory has been chosen to guide the current study. IHPT is a relatively new theory and therefore has limited amounts of previous research. IHPT will help identify the effects of teacher's frequency of humor use on students' perceived learning in the classroom. Wanzer et al. (2010) believed that how humorous messages were understood, determined if humor promoted learning or not:

If the humorous message has elements that enhance students' ability to process such as being related to the course content or makes the content relevant, then students will be more likely to process the instructional message and learning will be enhanced.

(Wanzer et al., 2010, p. 7)

The current study hopes to expand IHPT because it looks at humor and the effects on learning.

Humor has the ability to assist teachers when teaching students. Previous researchers have identified that the use of humor helps sustain engagement and increases learning (Minchew, 2001; Skinner & Fowler 2010), makes students feel more at ease in the classroom (Neumann et al., 2009), and increases communication between the teacher and students (Johnson, 2009); There is research that has identified that males and females perceive different types of humor (Brodzinsky, Barnet, & Aiello, 1981; Prerost, 1975). Also, there is information that displays males and females find certain types of humor to be equally funny (Azim et al., 2005). Since there is information available that has identified relationships and differences, it is important to identify in the current study if there are differences in males and females' perceptions of humor. This leads to the first research question.

RQ₁: Are there differences in male and female perceptions of teacher's frequency of humor use in the classroom?

To expand on research question one, it is important to know specifically if the professor's frequency of humor use affects students' perceived learning. The majority of

research using the LLS has linked immediacy and perceived learning, but there has been little research linking the frequency of humor use by teachers and students' perceived learning; hence, identifying teacher's frequency of humor use and the effect it has on students' perceptions of learning is important to identify, which leads to the second research question.

RQ₂: Is there a relationship between students' perceptions of teacher's frequency of humor use and students' perceptions of learning?

CHAPTER III

METHODOLOGY

Participants

The current study examined undergraduates enrolled during the 2011 spring semester in Communication Studies courses such as Public Speaking, Business and Professional Speaking, and Persuasion and Social Movements. These classes were chosen because of the accessibility to teachers in these courses. All participants were students who were at least 18 years of age and were enrolled at Texas Tech University. All participants were asked to take the survey voluntarily. No extra credit was given to students who took the survey. Participants provided demographic information of themselves and rank of their teacher such as a teaching assistant or full professor. (See Appendix A). Overall there were 178 (48.6%) females and 188 (51.4%) males who participated in the study, totaling 366 who completed the survey. Of the 366 participants, 93 (25.4%) were freshmen, 89 (24.3%) sophomores, 70 (19.1%) juniors, 111 (30.3%) were seniors and three (.8%) were other. Graduate teaching assistants and professors from the Department of Communication Studies classes allowed their students to partake in the study on a voluntary basis. These Communication Studies courses were chosen because of the relationships that have been established between the researcher and teachers within the department. Teachers were not present while students took the survey so students would not feel pressured to take the survey.

Procedure

With approval from the Institutional Review Board, teachers were contacted to gather participants for the study. Students had the opportunity to choose not to participate in the questionnaire if they did not want to fill out the questionnaire. Students who chose to participate in the survey were asked to complete the survey in the classroom, while those who declined to participate waited quietly in the classroom. The instructions concerning completion of the question were the same for each participant and could be read and understood by each participant. Oral instructions were given by the researcher before the participants began the survey to explain each type of humor for students to

understand. The researcher administered one questionnaire to each student in order to receive data for the study. The questionnaire gathered demographic information, perceptions of teacher's frequency of humor use, and self perceptions of learning. Students identified the teacher and the class he/she had before the class that they were completing the questionnaire to help answer all of the statements and questions in the survey on which they were basing their answers. The researcher asked participants to turn in their survey to the researcher when they had completed the survey.

Instructor Humor Scale

The purpose of the study was to identify the teacher's frequency of humor use and humor's effects on students' perceptions of learning. There are several communication tools that teachers use to increase learning; however, humor was the primary focus of the study. Additionally, the questionnaire asked students to choose the professor before the class they took when filling out the questionnaire to help answer the teacher's frequency of humor use in the classroom. To clarify, the teacher that was the most recent teacher the student had before the class that the researcher gathered participants was the teacher they were to use to answer the questions and statements in the questionnaire. The current study used the same statements from Frymier et al. (2008). There were changes made to the instructions that identified the frequency of humor use by a teacher (See Appendix B). The Instructor Humor Scale (IHS) was based on a five point Likert-type scale in which participants ranked whether the statement is 1 (*Never*) to 5 (*Always*) true to the types of humor used by teachers. There were 44 statements on the IHS. The frequency of humor use by a teacher was one important area in this study, but students' perceptions of learning was measured as well.

Student Perceived Cognitive Learning Scale

Measuring students' perceptions of learning is the next focus for the study. The Learning Loss Scale was designed by Richmond et al. (1987) and altered by Roach (1994) to evaluate students' perceptions of cognitive learning. The SPCLS was used in the current study to measure students' perceptions of learning when teachers incorporate humor in the classroom (See Appendix C). The SPCLS will ask students the following two questions: "How much are you learning in this class?" and "How much

knowledge/understanding are you gaining in this class?" (Roach, 1994). An alpha reliability for the SPCLS reported ($\alpha = .93$) (Roach, 1994) and has proved to be a valid scale. The current study displayed an alpha reliability of ($\alpha = .94$). Students identified the teacher they had before the class that distributed the questionnaires to help answer the questions concerning students' perceptions of learning in the classroom as well. Students answered the two questions that assessed perceived learning based on a scale ranging from zero to nine; zero (0) = nothing and nine (9) = more than any other class taken.

Data Analysis

Data collected from the participants was analyzed. The demographic portion consisted of seven questions, the IHS consisted of 44 statements, and the SPCLS consisted of two questions. The IHS portion of the survey used a Likert-type scale from 1 (*Never*) to 5 (*Always*) to measure frequency. The scale used in the study had a Cronbach's alpha reliability of ($\alpha = .864$). The subscales used in the study were run as well. The humor subscales reported the following: related humor ($\alpha = .843$), unrelated humor ($\alpha = .860$), self-disparaging ($\alpha = .850$), offensive humor ($\alpha = .842$), student disparaging humor ($\alpha = .873$), and other disparaging humor ($\alpha = .786$). Unintentional humor had only one variable, so it was not able to be tested. The SPCLS was based on a zero (0) to nine (9) scale in which zero meant the student learned nothing, while nine meant the student learned more than in any other class taken. A Cronbach's alpha for the SPCL was reported at ($\alpha = .939$). Table 1 displays the alpha reliability statistics for the IHS and SPCLS.

Table 1. Alpha Reliability Statistics

Type of Scale	Alpha Reliability Statistic
Related Humor	.843
Unrelated Humor	.860
Self-Disparaging Humor	.850
Student-Disparaging Humor	.873
Other-Disparaging Humor	.786
Offensive Humor	.842
Overall Humor	.864
Student Perceived Cognitive Learning	.939

The demographic portion of the survey identified the type of teacher ranging from a teaching assistant through full-time professor and identified the age of the teacher. There are different classifications of teachers at universities that range from teaching assistants to full professors. Of the teachers identified by students in the survey, 124 (33.9%) were females and 242 (66.1%) were males. Additionally, 37 (10.1%) were teaching assistants, 78 (21.3%) were instructors or adjuncts, 10 (2.7%) were assistant professors, 28 (7.7%) were associate professors, 178 (48.6%) were full professors, and 35 (9.6%) were unknown. The age of teachers ranged from 21 to 75 and displayed a mean of 38.7 years of age.

In order to accurately answer research question one, an independent t-test was run. Research question one asked “Are there differences in male and female perceptions of teachers’ humor usage in the classroom?” The second research question analyzed the portion of the survey that identified teacher’s frequency of humor use and students’ perceived learning. Research question two asked “Is there a relationship between students’ perceptions of teacher’s frequency of humor use and students’ perceptions of

learning?” A Pearson’s correlation was run to determine if a relationship existed between the frequency of humor use by a professor and students’ perceived learning. This research questions focused on teacher’s frequency of humor use in relation to students’ perceived learning.

CHAPTER IV

RESULTS

The current study addressed two research questions. The first research question asked if there were differences in male and female perceptions of teacher's frequency of humor use in the classroom. A t-test was used to explore this question. The second research question asked if a relationship existed between the teacher's frequency of humor use and students' perceived learning. A Pearson's correlation was run to determine this relationship.

Research Question One

Teacher's frequency of humor use was identified by males and females. The IHS measured humor used by teachers when covering material in the classroom. The questionnaire focused on the following seven dimensions humor: related humor, unrelated humor, self disparaging humor, unintentional humor, offensive humor, student-disparaging humor, and other-disparaging humor. An independent t-test was run to identify if there were differences in males and females. Table 2 contains the means and standard deviation of males and females for each type of humor but was not found to be significant.

Table 2. Means and Standard Deviation for Sex on Types of Humor

Type of Humor	Sex	Mean	Standards of Deviation
Related Humor	Female	2.78	.70
	Male	2.63	.74
Unrelated Humor	Female	2.17	.75
	Male	2.14	.75
Self-Disparaging Humor	Female	2.58	1.0
	Male	2.46	1.0
Offensive Humor	Female	1.77	.60
	Male	1.83	.50
Disparaging Humor Student	Female	1.32	.58
	Male	1.35	.63
Disparaging Humor Other	Female	1.44	.52
	Male	1.52	.54
Unintentional Humor	Female	2.07	1.09
	Male	1.96	1.05

Research Question Two

Teachers' frequency of humor use and students' perceived learning was asked in the second research question. The IHS was measured in relation to the SPCLS to identify if students perceive they are learning when teachers incorporate humor into the classroom. A Pearson's correlation was run and found moderate significance.

Significance was found between the measurements with regards to related humor ($r = .37, p < .05; n = 366$), unrelated humor ($r = .20, p < .05; n = 366$), self disparaging humor ($r = .25, p < .05; n = 366$), and offensive humor ($r = .20, p < .05; n = 366$).

Disparaging humor with students and unintentional humor were negatively correlated but were not significant. Table 3 displays the correlation matrix from the Pearson's correlation.

Table 3. Correlation Matrix

Variables	1.	2.	3.	4.	5.	6.	7.	8.
1. SPCL								
2. Related Humor		.369**						
3. Unrelated Humor		.202**	.690**					
4. Self Disparaging Humor		.245**	.658**	.653**				
5. Offensive Humor		.200**	.555**	.721**	.537**			
6. Student Disparaging Humor		-.036	.310**	.501**	.273**	.618**		
7. Other Disparaging Humor		.082	.428**	.617**	.480**	.745**	.726**	
8. Unintentional Humor		-.044	.391**	.473**	.490**	.403**	.310**	.409**

CHAPTER V

DISCUSSION

Teacher's frequency of humor use has an important place in classrooms. The current study not only provides new insight in the field of Communication Studies, but it also agrees with previous research concerning appropriate and inappropriate humor (Wanzer et al., 2006; Frymier et al., 2008). Previous research provided by Banas, Dunbar, Rodriguez, and Liu (2011) studied humor in classrooms and concluded that "humor has been associated with a more interesting and relaxed learning environment, higher instructor evaluations, greater perceived motivation to learn, and enjoyment of the course" (p. 137). Moreover, Romal (2008) conducted a meta-analysis from the 1980s into the 2000s and found that the use of humor is more effective in today's classrooms than it was in the 1980s. Hence, one could agree that the use of humor by teachers will assist students as they progress through college curriculums.

The current study found appropriate types of humor such as related humor, unrelated humor, and self-disparaging humor to be significant, while only one inappropriate type of humor, offensive humor, was significant. Males and females identified the frequency of humor to be almost the same for the seven types of humor identified in the questionnaire. One reason males and females chose almost equal responses is the questionnaire looked at appropriate and inappropriate forms of humor. Teachers are more likely to use related, unrelated, and/or self-disparaging humor because students prefer positive or appropriate humor. Because these types of humor have been identified as appropriate and inappropriate, teachers use some of them more than others. Thus, students can identify the teacher's frequency of humor use because teachers incorporate appropriate types of humor more. If teachers use inappropriate humor, students can react negatively which can lead to problems and/or cause them to distance themselves from the teacher; therefore, the frequency of inappropriate humor is used less because it can have negative implications in the classroom. Humor is not a communication tool that is used all the time. Therefore, students are able to identify the frequency of humor use by teachers because it is a special tool that captivates and

motivates students in the classroom. Results gathered by Wanzer et al. (2006) identified related humor, unrelated humor, self-disparaging humor, and unintentional humor as appropriate forms of humor, while offensive humor, student-disparaging humor, other-disparaging humor, and self-disparaging humor were identified as inappropriate forms of humor. Self-disparaging humor can also be seen as an appropriate form of humor when used to benefit student learning. Results from the current study align with previous research which is connected with a beneficial use of humor used by teachers in the classroom. Because related humor, self-disparaging humor, and unrelated humor were found by previous researchers to be appropriate forms of humor (Wanzer et al., 2006; Frymier et al., 2008), it is important to note that these types of humor were discovered to positively affect students' perceptions of learning in the current study as well. Therefore, teachers need to specifically incorporate these types of humor into their lectures in order to better reach students.

On the opposite spectrum, offensive humor was found to be a significant variable in students' perceptions of learning. Most teachers do not use profanity, tell dirty jokes, or say inappropriate things in the class that make students feel uncomfortable; however, this type of humor might be appropriate and even popular in some classrooms. Some teachers might be able to use offensive humor depending on the topic that is being discussed in the class. If the topic is unpleasant to students, a teacher might be able to crack an offensive joke to lighten the mood. This would get the class acclimated for the topic that will be discussed. Offensive humor can create negative feelings or be seen positively by students, thus, it is important to identify how and when teachers can use offensive humor. Further explanations of these types of humor will be discussed in greater detail.

Instructional Humor Processing Theory

In order to guide the current study, IHPT was chosen because it has the ability to help link humor with student learning. Males and females understood the seven types of humor in the IHS because they identified almost the same frequency of humor incorporated by teachers. Students understood and preferred related, unrelated, self-disparaging, and offensive humor. Related humor can be used to help further the IHPT by

emphasizing the Incongruity-Resolution Theory (IRT). When teachers relate humor to the information being covered in the class, students are more likely to identify the incongruity of the humor because it specifically relates to the information. This will stimulate students to think about the humor in the message, which will make them identify how it relates to the topic. Because of the incongruity of the related humor used by the teacher, some students will be able to identify the purpose of the incongruity in the message and apply it on upcoming assignments, quizzes, or tests. This will develop critical thinking in students and help students learn information from different perspectives.

Disposition theory can be identified through forms of disparaging humor. Students identified that teachers are more likely to incorporate self-disparaging humor than student or other-disparaging humor. A teacher portrays himself/herself in a positive light and creates a positive learning environment when making fun of himself/herself. When this occurs, the teacher illuminates the “good guy” perspective by not making fun of students. Thus, self-disparaging humor helps students feel more comfortable instead of making them feel belittled (Wanzer et al., 2010). The current study also displayed that student and other-disparaging humor were not popularly used by teachers and did not assist learning. Student-disparaging humor and other-disparaging humor can be seen as a similar type of disparaging humor. If a teacher makes fun of students or college stereotypes, most students who are belittled will not find it funny. Also, the teacher exhibits a negative persona and creates a negative learning environment because the teacher is using his/her authoritative position to make students feel less of a person or a group. Additionally, the use of offensive humor can come across negatively because the teacher can be viewed as the “bad guy.” Offensive humor can cause students to disengage because the teacher portrays a negative image of himself/herself. Because some students will be offended when teachers make fun of them, offensive humor can be identified as a form of student-disparaging humor. If the teacher’s humorous personality is not appropriate, students will not listen to the message, they will not perceive any type of humor to be funny, and they will not perceive they are learning because they are not paying attention to the information delivered by the teacher.

Elaboration Likelihood Model of Persuasion (ELM) can be identified when a teacher creates a positive learning environment. When this atmosphere is present inside classrooms, students will be more likely to listen to the humor that is integrated into the lecture or discussion and, this will lead to perceived learning. Thus, when related humor is integrated by the teacher, some students who are engaged by the related humor will be more likely to learn the information. ELM works better for students who challenge themselves in the classroom to become interested and engaged in the information covered by the teacher. Therefore, it is the teacher's responsibility to use humor effectively to help students learn as much information as possible. Students who take the central route of the ELM have a teacher who is good at using related humor in the classroom. The teacher knows that using related humor works best for student learning. Students also can take what was related and use their own personal examples or stories to further understand the explanation and/or information. Students who take the peripheral route are not as motivated to critically think how the humor helps perceived learning. Thus, offensive humor might be better for these students. If a teacher uses an offensive word as an acronym, the students who take this route do not have to think about the information as much as those who take the central route. Students focus in on the simple word for the acronym and remember the words that represent the letters in the acronym. Additionally, some of these students might find that offensive acronyms are negative and learning will not be gained, while other students will find the offensive acronym to assist perceived learning. Some types of humor help students learn, while other types of humor do nothing for student learning; thus, teachers need to integrate different types of humor to reach all students in the classroom thus increasing students' motivation to learn.

Instructional Humor Processing Theory has identified some links between the frequency of humor and students' perceptions of learning in the classroom. The current study found that teacher's frequency of humor use is more prevalent with related, unrelated, self-disparaging, and offensive humor. In essence, the current study is directly in line and consistent with the previous test of IHPT (Wanzer et al., 2010). Therefore, teachers need to understand how to properly use different types of humor to positively

enhance or influence student learning. Specifically, the following paragraphs will discuss in detail how each type of humor influences students' perceptions of learning.

Related Humor

The current study revealed that related humor was the most frequently identified variable when measured against students' perceptions of learning. Related humor to the topic being covered in class helps students learn because they can understand the information from a different view point. Not all students understand every concept covered by the teacher; however, if teachers relate humor to the concept or information properly, some students will be able to comprehend the material through the humorous message. An example of this could be related to muscle structure in the human body. A teacher can discuss with students what a particular muscle does in the leg and then use an abnormal walk that would replicate what it would look like walking without that muscle. The walk could demonstrate an awkward looking movement through role play that would be humorous. Another way to relate humor to the classroom would be through a story. Teachers can explain a funny story and then reveal how it relates to the information. Also, teachers can tell students at the start of the semester that humor will be related to information being covered in the class; therefore, students will be more attentive to listen to the humor that is used by the teacher. Kaplan and Pascoe (1977) identified that students learn more when teachers incorporate related humor that is pertinent to class material. Teachers can use multiple forms of related humor by means of stories, videos, role play, or concepts that relate to the information. Some students may not be able to understand exactly what is going on in a certain portion of the discussion or lecture; thus, if a teacher is able to relate confusing, intricate portions of information to related humorous examples, students are more likely to understand the information. Zillman and Bryant (1983) found that when teachers integrate humor that is relevant to the topic being discussed, the material is more enjoyable and students have higher retention of information on the material. By making lectures more enjoyable, communication will increase because students are having fun in the classroom. If students perceive they are learning more with related humor, it will make students more knowledgeable, assist on tests and quizzes, and produce better grades in the classroom. The current findings

concerning related humor have similar findings to previous research and should be used by teachers in the future when teaching their classes. Muddiman and Frymier (2009) studied relevant strategies used by teachers in the college classroom and found that related humor was a relevant strategy that should be used when delivering lessons. Teachers need to identify how they can incorporate related humor into a lesson plan when preparing for a class. This will allow the teacher to effectively incorporate a strategic form of humor that can positively affect class learning. Javidi and Long (1989) found that more experienced teachers are more easily able to relate humor to the course content. Thus, if teachers are taught how to use humor properly, students' perceptions on learning will increase due to proper use of related humor. Additionally, teachers need to identify and remember specific types of related humor that work best for students each semester. Once teachers pinpoint specific types of related humor, they can strategically incorporate what helps students the most. Because related humor was the most frequent type of appropriate humor identified by students, teachers should use related humor more often than any other type of humor. Now that benefits of related humor have been discussed, self-disparaging humor and its relation to students' perceptions of learning will be addressed.

Self-Disparaging Humor

When teachers inform students about their personal lives, students not only get to see what their teacher is like outside of the classroom but also know their teacher is personable. Teachers that use self-disparaging humor in the classroom can use funny, embarrassing stories that have occurred in their life. When self-disparaging humor is incorporated by the teacher, some interesting benefits arise. First, the teacher exhibits immediacy because the students get to know some of the teacher's past when the teacher incorporates a funny occasion that happened to him/her. This will benefit the classroom by creating a welcoming and fun environment for learning because the students are not the ones who are being targeted by the teacher. Second, through the explanation of the humorous occasion, the teacher can then explain how it relates to the information or concept being covered in the class. This type of humor can be viewed as a double-edged sword because it combines related and self-disparaging humor to help students learn and

understand the material. Self-disparaging humor was the only significant variable of disparaging humor identified when measured against learning in the study. One reason self-disparaging humor was the only disparaging humor with significance is students prefer when the teacher makes fun of himself/herself instead of students. When a teacher makes a joke about himself/herself, students are more likely to identify with him/her due to the immediacy displayed through self-disparaging humor. When students identify with the teacher via self-embarrassing humor, students will be more likely to communicate with the teacher inside and outside of the class. Students' anxieties will be mitigated because they feel comfortable discussing material and approaching the teacher after class. Sharkey, Park, and Kim (2004) researched reasons for intentionally embarrassing oneself. The scholars found that when people embarrassed themselves in front of others, they displayed togetherness, strengthened relationships, and generated fun interactions. By exhibiting togetherness, the teacher reveals he/she cares about the students. Some teachers do not care about students in the classroom as much as other teachers; thus, teachers should strive to create an atmosphere that exhibits togetherness between the teacher and students in order for students to feel the teacher cares for them.

During each semester, some students reach a certain point where frustrations are at their highest such as after a midterm exam. The teacher can use self-disparaging humor that he/she went through while in college and show how he/she overcame the difficult time. This would display that the teacher knows that students' frustrations arise which would cause students to identify an environment of togetherness. Furgeson and Ford (2008) researched different theories, in particular social identity theory and found that some people used disparaging humor to adapt in different situations. Here, the use of disparaging humor by a teacher helped the teacher create a welcoming, fun environment which makes students more comfortable. A fun welcoming environment can motivate students to attend class more, participate more, and learn more.

The current study researched three types of humor that consisted of the following disparaging humors: self-disparaging humor, student-disparaging humor, and other-disparaging humor. The most frequent type of disparaging humor was when the teacher made fun of himself/herself, while the other types of disparaging humor were not

frequently incorporated by the teacher. Teachers that make students the butt of a joke can cause other students to laugh with the professor. While some students might think the joke was funny, the student who was belittled becomes offended which causes him/her to feel less of a person. For this and several other reasons, teachers do not need to incorporate student-disparaging humor. First, the student or students who are targeted feel the teacher does not like them. Second, this behavior might cause students to group up against the professor and challenge multiple topics covered in the lecture or discussion, thus hindering other students' ability to learn and understand information. Third, communication can decrease in students because they do not want to ask a "dumb question" because they are afraid of the teacher through put downs or negative comments made by the teacher. Positive and negative humor styles in communication were researched by Cann, Zapata, and Davis (2009) who found that when people made fun of others, the person that received the negative communication did not find the humor to be funny. While the teacher feels he/she is using humor and thinks he/she is funny, the students identify it as inappropriate. This can harm the students' learning in the classroom for not only the victim but others as well. Therefore, humor that belittles students should not be the used by teachers.

Another interesting discovery of self-disparaging humor was studied by Ziv, Gorenstein, and Moris (1986) who found that when teachers combined the use of self-disparaging humor with other forms of disparaging humor, students displayed greater evaluations of appeal and originality. The current study did not find student-disparaging humor to be significant, and it was negatively related to students' perceptions of learning. Additionally, other-disparaging humor was not frequently identified in the current study because it targets certain groups of people within a race, political views, and/or religion. Students identify with certain races and religious beliefs and do not want to be belittled for such relations. Regardless of Ziv and colleagues' findings, there is not enough evidence available to support their claim. Teachers should stray from using other-disparaging humor and student-disparaging humor because it can make students feel that the teacher is trying to display abusive power. The previous statement agrees with Ferguson and Ford (2008) when adapting to a specific situation such as establishing

dominant or abusive power by a teacher. This can lead to multiple problems in the classroom and decrease communication between students and students and students and teacher due to discomfort. While self-disparaging humor has an understandable purpose in the classroom, unrelated humor seems to positively affect perceptions of learning as well.

Unrelated Humor

The current study revealed that unrelated humor assists with students' perceptions of learning. Unrelated humor can be used in multiple varieties for different purposes. It would benefit students at the beginning of class by initiating engagement because students' minds will be fresh and ready to learn. Also, before class starts, teachers can use unrelated humor to discuss something funny that happened over the weekend. Unrelated humor can show students what the teacher enjoys on his/her time which will help students relate to the teacher. Students might be able to contribute unrelated humor that would help develop a stronger student-teacher relationship. When student-teacher relationships are maintained or strengthened, communication and learning should increase. Moreover, unrelated humor can assist teachers before discussing important information. A teacher can tell a funny joke or story to captivate the students' attention in the middle of a lecture or discussion. Once the teacher has the students' attention, he/she can let students know the next item covered is very important for students to hear. Another way that unrelated humor can be used is by veering away from the topic momentarily. Humorous breaks have the ability to promote learning by providing the brain a "breather" to understand and integrate material in a lesson (Loomans & Kolberg, 1993). By providing a breather, teachers can recapture the students' attention and deliver crucial information after delivering the unrelated humor. Because the teacher has re-engaged students, it would be beneficial for him/her to discuss important information while the students are attentive. If a teacher is not good at incorporating a specific type of unrelated humor, a teacher can search for funny things via Google to integrate a joke, funny video, or story. Classes that are longer than 50 minutes and/or classes that have breaks can be restarted with unrelated humor to re-engage students. This is similar to starting class by incorporating unrelated humor. Berk (2009) believes that irrelevant

humor after a break can jumpstart students' attention and get them ready to delve back into the material that was left off before the break. Unrelated humor has multiple benefits, so teachers need to try different types of unrelated humor to see what students prefer most. On the other hand, unrelated humor can cause problems in the class if used too much.

Unrelated humor can be identified as telling a story, joke, or watching a video that displays humorous content; however, this type of humor has nothing to do with the information that is being discussed in the classroom. Walker (2006) believed that unrelated humor was a distraction to students and wasted valuable class time. This is a valid argument, but it does not solidify the frequency of unrelated humor if used properly. The researcher did not identify the teacher's frequency of unrelated humor, therefore, it does not have complete validity. If a teacher uses unrelated humor on every point in a lecture, his/her teaching effectiveness would be seen as poor by students. One reason for this is students would identify the class as a waste of time because the teacher is only trying to be funny instead of teaching material in a proper manner. When a teacher frequently uses unrelated humor for every point covered, they do waste valuable time and negatively impact student learning. Teachers need to watch for students' reactions in the classroom such as nodding, attentiveness, or boredom. Once the teacher knows students are not attentive and are not responsive, the teacher can use unrelated humor to re-engage students back into the information that is being covered in the classroom. Unrelated humor can be used effectively if teachers know when it will benefit student learning. While these types of humor have been discussed, offensive humor needs to be addressed as well.

Offensive Humor

Students discern positive and negative types of humor used by teachers in the classroom (Gorham & Christophel, 1990), but not all students agree with one type of humor over the other. Offensive humor was found to be a significant variable of humor regarding students' perceptions of learning information. Teachers must be cognizant of the content in the humor. The teacher must make sure that offensive humor respects all walks of life, so the teacher is less likely to offend students. Thus, the humor incorporated

might contain swearing or making fun of something or someone to make students laugh. This type of humor can also assist learning by relating it to the material through the use of acronyms. The acronym might be a cuss word or a negative word. However, if it helps students remember information and learn, then it can be seen as an appropriate form of humor. Another place where offensive humor might be appropriate is in classes that discuss uncomfortable topics such as sex. Offensive humor can be used with an adult dirty joke that lightens the mood and increases communication about sex. These classes should be able to incorporate offensive humor more than a class covering communication. While Wanzer and colleagues identified offensive humor as inappropriate, the current study displays that it can be used as an appropriate form of humor in certain instances and/or in certain courses to help students learn the material. Therefore, teachers need to be very creative and cognizant when incorporating specific types of offensive humor in order that they do not offend students. Some students identify themselves with teachers who use offensive humor. Infante, Riddle, Horvath, and Tumlin (1992) found that students who were verbally aggressive or used offensive language were more likely to view offensive types of humor as appropriate in the classroom. When students know their teacher uses offensive humor, such as swearing, to be funny, they know they can curse in class and not receive punishment due to the use of offensive language; thus, students feel they can relate to the teacher easier and develop a stronger student-teacher relationship, which can lead to an increase in perceived learning through communication. Moreover, some students will be more motivated to attend class, participate in discussion, and approach the teacher because they feel that they can relate with the teacher through offensive humor. Offensive humor can be used appropriately in certain occasions, but it can also have negative side effects on students.

Wrench and Punyanunt-Carter (2005) studied advisor and advisee communication and found that verbal aggression negatively impacted instructional communication. Wrench and Punyanunt-Carter's study can relate to teaching through instructional communication. Some teachers express their aggression humorously by being a wise guy. An example of this would be if a student received a low grade on a test and the teacher said with a smile "Great job!" In reality, the teacher belittling the student. When a teacher

expresses humor in this fashion, the students' communication with the teacher will have negative implications. Students will feel embarrassed and putdown through verbal aggression. When a teacher curses in class order to incorporate humor, students can feel they are being attacked by the teacher due to offensive words. This can also mitigate communication between the teacher and students and decrease learning for students. Stuart, Rosenfeld, and Bank (1994) found that when teachers used hostile or offensive humor, students united and formed a group that was identified as an enemy of the teacher. Not only do Stuart and colleagues identify offensive humor negatively, Meyer (2000) also agrees that humor "can smooth the way and integrate a rhetor into a greater level of credibility within a group, but it can also ruffle feathers and cause social friction and conflict" (p. 317). Once a teacher offends a student, they do not forget what was said. When this occurs, other students might feel the teacher will make fun of them if they do not answer or do something correctly or properly. If students cannot feel somewhat comfortable with the teacher, students' perceptions of learning will decrease because communication is lacking in discussions and lectures. Teachers should strive to create a professional image, and the use of offensive humor does not generate this appearance.

When a teacher uses offensive humor, some students will take offense which, can lead to multiple problems. First, communication can cease between students and the teacher because respect is lost. A teacher who does not respect their students should not expect the students to respect him/her. Moreover, offensive humor can be seen as creating distance between the teacher and students. McMorris, Boothroyd, and Pietrangelo (1997) determined that distance can be generated when the person expressing the humor puts himself/herself in a higher authoritative position relative to the person of which the humor is directed. Teachers can place themselves in an authoritative position at the beginning of the semester by explaining that respect will be given to everyone equally, and he/she will handle any situations that arise during the semester. Thus, the teacher does not have to use offensive humor to place himself/herself in an authoritative position. Second, students can disengage themselves due to the negative environment created by the teacher. Negative environments do not benefit students because they are less motivated to pay attention, attend class, and learn. Some students might find

offensive humor to be funny or acceptable, but unless the majority or all of students agree with this type of humor at the beginning of the semester, teachers should stray from using it. Offensive humor has been identified that it can be used appropriately in certain instances and/or class, and it has been addressed that it can negatively impact student learning in the classroom; this type of humor needs to be studied more in depth in order to identify to what extent it should be used to enhance student learning.

Limitations

The current study shed light on the teacher's frequency of humor use and students' perceptions of learning; however, there were several limitations. The first limitation can be identified with the demographics used for the study. Because the current study was limited to undergraduate students, this left out graduate students and high school students. Studying those other groups might provide insight into other types of humor that affect students' perceptions of learning. Some undergraduates do not have much experience or classes accumulated, therefore, they may not be able to recognize the benefits of having a teacher who uses humor in the classroom. Graduate students on the other hand have had more classes as well as graduate courses that allow more discussion in the classroom, which can lead to an increase of humor recognition. Moreover, graduate students sit through three-hour long discussions that require greater means of engagement; therefore humor may be used more to sustain engagement. Graduate students might have higher significance when humor is used compared to undergraduate students; hence, the current study was limited because participants were only undergraduate students.

Another limitation can be identified in the courses used to gather participants. All of the participants were from communication classes, in particular Public Speaking and Business and Professional Speaking courses. If the current study gathered participants throughout the university and not solely from specific classes, the results might have been different. Some majors at universities have different curriculums and have more intricate information such as biology or anatomy and physiology classes. These classes may not have time to bring in humor into the allotted time, or a specific type of humor might be used in these classes as opposed to education classes. Also, if students could identify their

major in the survey, researchers might be able to identify new findings that would further humor and perceived learning in specific classrooms. Researchers might find that a less technical class incorporates more humor because there is not as much difficult information to discuss, or that more technical classes might incorporate more humor to increase learning.

Next, the perceived learning scale used in the study could be different. The current scale only asked how much a student thought he/she was learning and how much knowledge he/she was gaining in the classroom. Additionally, if there were more questions concerning students' perceptions of learning, higher significance might have been displayed in the study. Moreover, there are other ways of measuring learning in the classroom. Some scales measure test scores and the overall grade given in the class, while other learning scales measure learning loss. Additionally, future scholars could study humor and its relation to retention, affective learning, cognitive learning, and/or actual learning instead of students' perceptions of learning. Thus, an additional or different perceived learning scale can provide additional findings to the current study.

Unintentional humor could not be tested in the study because there was only one variable in the questionnaire that identified unintentional humor. The statement in the questionnaire read the teacher did something unintentional such as "trip over a student's foot" (See Appendix B). There could be additional statements that describe unintentional humor used by teachers such as accidentally saying the wrong word, mispronouncing a word, and/or using a pun in class without knowing they said it. Additional statements that align with unintentional humor can show scholars whether or not it positively affects students' perceptions of learning.

Lastly, the current study was a quantitative study and could have been conducted as a qualitative study. There were 53 questions on the survey, and interviews or focus groups could substitute for the survey. One-on-one interviews and focus groups might be able to identify more specific uses of humor and an increase or decrease in student perceived learning. Focus groups would allow for open-ended questions which would allow students to further explain different types of humor. The current study placed participants in a specific scenario and asked them to answer specific statements. Focus

groups and interviews would give students the opportunity to construct their own scenario that could help researchers identify greater significance when humor is used by professors. Additionally, researchers can code what is discussed via open-ended questions, one-on-one interviews, and focus groups.

Future Research

Continuing research on this study is important and can have positive gains for the Communication Studies community. This study explored a basic understanding of teacher's frequency of humor use within the classroom; however, the results of the study could be enhanced in future studies. Future research done on this topic could incorporate an engagement measurement which would measure a relationship between humor and involvement of students within the classroom. Engagement in the classroom can be incorporated into a humorous story, joke, or pun that sustains the students' attention throughout the allotted time in the class. One reason for expanding the current study in this direction is because without engagement in the classroom, students can become bored or think about something else instead of the message the teacher is sharing. Engagement can help students learn more; therefore, looking into this area of communication can help future teachers. If this type of measurement is incorporated there might also be a relationship amongst the use of humor, engagement, and perceived learning identified by students in the classroom.

Also, the Instructor Humor Scale identified seven types of humor and the frequency of each type of humor used by the teacher. If future studies found out when humor is used in the kairotic moment, teachers might know when and how often humor can and/or should be used in future instances. The kairotic moment can be understood as incorporating humor at the most opportune time in the lecture or discussion. Teachers cannot use humor every time they say something; however, it would be beneficial to the field of Communication Studies to identify specifically when teachers need to incorporate humor to sustain engagement. The current study sought to identify the frequency of humor use by professors, but humor incorporated every 15 minutes might benefit the students as a whole by keeping an engaged, positive environment.

Another direction for future studies can look at how teachers can be taught to use humor effectively in the classroom. The current research found multiple teachers that did not incorporate any or incorporated very little humor in the classroom. Not everyone possesses humorous qualities, but teachers can work on specific types of humorous examples to use in class. Department and/or university-wide training seminars could be implemented for teachers to receive training that would assist in their delivery of humor in the classroom. Moreover, training seminars could display the benefits of humor and why it should be used in the classroom. However, this type of research should stray from being incorporated in cultures that contain an educational style that is highly formal because these cultures do not use much humor in the classroom (Zhang, 2005).

Conclusion

Humor used by teachers in the classroom and student learning have been researched in many forms and fashions. Student learning is very important at all levels, especially at the collegiate level. It is the teacher's responsibility to infuse lectures and discussions with proper communication tools that will produce learning. Teachers can incorporate communication tools such as humor, immediacy, credibility, and power that can accomplish the teacher's task of teaching. Communicating humor in the classroom can be accomplished in several ways, so teachers need to be able to properly use the best types of humor that assist learning.

The current study found several correlations and differences through the frequency of humor use by teachers and how it affected perceived learning. Males and females displayed very similar significance when identifying the frequency of humor use by teachers; moreover, males and females identified almost the same mean when teachers incorporated humor in the classroom. These results display that males and females are able to recognize the frequency of humor use by teachers in lectures and in discussions. Students recognize humor because it is not used that often in the classroom. The study confirms that the frequency of humor use by teachers does correspond to students' perceptions of learning. Related humor, unrelated humor, self-disparaging humor, and offensive humor displayed significance in the study. Moderate significance was displayed from the data which revealed that excessive frequency of humor use by professors would

not be as effective. If high significance was found, it would express that the teacher's class is perceived as a joke. This would not benefit students' perceptions of learning because the course would be similar to a comedy club.

Learning in the classroom has, is, and will always be very important at all educational levels. There are many communication tools that teachers can use to achieve learning; and research must continue in order for teaching techniques to keep up with new technologies and future generations. The findings of the study suggest that teachers need to incorporate different types of humor in the classroom in order to assist in students' perceptions of learning.

REFERENCES

- Anderson, J. F. (1979). Teacher immediacy as a predictor of teaching effectiveness. In D. Nimmo (Ed.), *Communication Yearbook*, vol. 3 (pp. 543–559). New Brunswick, NJ: Transaction Books.
- Aylor, B. & Oppliger, P. (2003). Out-of-class communication and student perceptions of instructor humor orientation and socio-communicative style. *Communication Education*, 52(2), 122-134.
- Azim, E., Mobbs, D., Jo, B., Menon, V., & Reiss, A. L. (2005). Sex differences in brain activation elicited by humor. *Program in Neuroscience*, 102(45), 16496-16501.
- Banas, J. A., Dunbar, N., Rodriguez, D., & Liu, S. J. (2011). A review of humor in educational settings: Four decades of researcher. *Communication Education*, 60(1), 115-144.
- Bell, N. D. (2009). Learning about and through humor in the second language classroom. *Language Teaching Research*, 13(3), 241-258.
- Berlyne, D. E. (1960). *Conflict, arousal, and curiosity*. New York, NY: McGraw-Hill.
- Berk, R. A. (1996). Student ratings of 10 strategies for using humor in college teaching. *Journal of Excellence in College Teaching*, 7(3), 71-92.
- Berk, R. A. (2009). Multimedia teaching with video clips: TV, movies, youtube, and mtvu in the college classroom. *International Journal of Technology in Teaching and Learning* 5(1), 1-21.
- Booth-Butterfield, M., & Booth-Butterfield, S. (1991). Individual differences in the communication of humorous messages. *Southern Communication Journal*, 56(3), 32-40.
- Booth-Butterfield, M., Booth-Butterfield, S., & Wanzer, M. (2007). Funny students cope better: Patterns of humor enactment and coping effectiveness. *Communication Quarterly*, 55(3), 299-315.
- Brosvic, G. M. & Epstein, M. L. (2007). Enhancing learning in the introductory course. *The Psychological Record*, 57(1), 391-408.
- Bryant, J., Comisky, P. W., Crane, J. S., & Zillmann, D. (1980). Relationship between college teachers' use of humor in the classroom and students' evaluations of their teachers. *Journal of Educational Psychology*, 72, 511-519.

- Bryant, J. & Zillmann, D. (1989). Using humor to promote learning the classroom. In P.E. McGhee (Ed.), *Humor and children's development: A guide to practical applications* (pp.49-78). New York, NY: Haworth Press.
- Cacioppo, J. T. & Petty, R. E. (1984). The elaboration likelihood model of persuasion. *Advances in Consumer Research*, 11, 673-675.
- Cann, A., Zapata, C. L., & Davis, H. (2009). Positive and negative styles of humor in communication: Evidence for the importance of considering both styles. *Communication Quarterly*, 57,(4), 452-468.
- Caspi, A., & Blau, I. (2008). Social presence in online discussion groups: Testing three conceptions and their relations to perceived learning. *Social Psychology of Education*, 11, 323-346.
- Chabeli, M. (2008). Humor: A pedagogical tool to promote learning. *Curationis* 31(3), 51-59.
- Chauvet, S. & Hofmeyer, A. (2007). Humor as a facilitative style in problem-based learning environments for nursing students. *Nurse Education Today*, 27, 286-292.
- Chiarello, M. A. (2010). Humor as a teaching tool: Use in psychiatric undergraduate nursing. *Journal of Psychological Nursing* 48(8), 34-41.
- Christophel, D. M. (1990). The relationship between teacher immediacy behaviors, student motivation, and learning. *Communication Education*, 39, 323-340.
- Cornett, C. E. (1986). *Learning through laughter: Humor in the classroom*. Bloomington, IN Phi Delta Kappa Educational Foundation.
- Cosner, R. L. (1959). Some social functions of laughter: A study of humor in a hospital setting. *Human Relations*, 12(2), 171-182.
- Dwyer, K. K., Bingham, S. G., Carison, T. E., Prisbell, M., Cruz, A. M., & Fus, D. A. (2004). Communication and connectedness in the classroom: Development of the connected classroom climate inventory. *Communication Research Reports*, 21(3), 264-272.
- Englert, L. M. (2010). Learning with laughter: Using humor in the nursing classroom. *Nursing Education Perspectives*, 31(1), 48-49.
- Ferguson, M. A. & Ford, T. E. (2008). Disparagement humor: A theoretical and empirical review of psychoanalytic, superiority, and social identity theories. *Humor*, 21(3), 283-312.

- Frisby, B. N. & Martin, M. M. (2010). Instructor-student and student-student rapport in the classroom. *Communication Education* 59(2), 146-164.
- Frymier, A. B. & Houser, M. L. (1999). The revised learning indicators scale. *Communication Studies*, 50(1), 1-12.
- Frymier, A. B. (2007). *Teachers' and students' goals in the teaching-learning process*. Paper presented at the annual meeting of the National Communication Association, Chicago, IL.
- Frymier, A. B., Wanzer, M. B. & Wojtaszczyk, A. M. (2008). Assessing students' perceptions of inappropriate and appropriate teacher humor. *Communication Education*, 57(2), 266-288.
- Garner, R. L. (2006) Humor in pedagogy: How ha-ha can lead to aha! *College Teaching*, 54(1), 177-180.
- Glenn, R. (2002). Brain research: Practical applications for the classroom. *Teaching for Excellence*, 21(6), 1-2.
- Gorham, J. & Christophel, D. M. (1990). The relationship of teachers' use of humor in the classroom to immediacy and student learning. *Communication Education*, 39(1), 46-62.
- Hellman, S. V. (2007). Humor in the classroom: Stu's seven simple steps to success. *College Teaching*, 55(1), 37-39.
- Herzog, T. R. (1999). Gender differences in humor appreciation revisited. *International Journal of Humor Research*, 12(4), 411-423.
- Hinkle, L. L. (1998). Teacher nonverbal immediacy behaviors and student-perceived cognitive learning in Japan. *Communication Research Reports*, 15(1), 45-56.
- Houser, M. L. & Frymier, A. B. (2009). The role of student characteristics and teacher behaviors in students' learner empowerment. *Communication Education*, 58(1), 35-53.
- Hsu, L. (2010). The Impact of perceived teachers' nonverbal immediacy on students' motivation for learning English. *Asian EFL Journal*, 12(4), 188-204.
- Infante, D. A., Riddle, B. L., Horvath, C. L., & Tumlin, S. A. (1992). Verbal aggressiveness: Messages and reasons. *Communication Quarterly*, 40, 116-126.

- Johnson, D. I. (2009). Connected classroom climate: A validity study. *Communication Research Reports*, 26(2), 146-157.
- Kaplan, R. & Pascoe, G. C. (1977). Humorous lectures and humorous examples: Some effects upon comprehension and retention. *Journal of Educational Psychology*, 69(1), 61-65.
- King, P. & Witt, P. (2009). Teacher immediacy, confidence testing, and the measurement of cognitive learning. *Communication Education*, 58(1), 110-123.
- LaFave, L., Haddad, J., & Maesen, W. A. (1996). *Superiority, enhanced self-esteem, and perceived incongruity humor theory*. In A. J. Chapman and H. C. Foot (Eds.), *Humor and laughter: Theory research and applications*. (p. 63-91). New Brunswick, NJ: Transaction Publishers.
- Loomans, D., Kolberg, K., (1993). The laughing classroom: Everyone's guide to teaching with humor and play. In R. Vinck, & N. G. Carleton (Eds.), Tiburon, CA: H. J. Kramer.
- Martin, R. A., Puhlik-Doris, P., Larsen, G., Gray, J., & Weir, K. (2003). Individual differences in uses of humor and their relation to psychological well-being: Development of the humor styles questionnaire. *Journal of Research in Personality*, 37, 48-75.
- Martin, R. A. (2007). *The psychology of humor: An integrative approach*. San Diego, CA: Elsevier Academic Press.
- McMorris, R. F., Boothroyd, R. A., & Pietrangelo, D. J. (1997). Humor in educational testing: A review and discussion. *Applied Measurement in Education*, 10(3), 269-297.
- Meyer, J. C. (2000). Humor as a double-edged sword: Four functions of humor in communication. *Communication Theory*, 10(3) 310-331.
- Minchew, S. S. (2001). Teaching English with humor and fun. *American Secondary Education*, 30(1), 58-68.
- Mottet, T. P. & Beebe, S. A. (2002). Relationships between teacher nonverbal immediacy, student emotional response, and perceived student learning. *Communication Research Reports*, 19(1), 77-88.
- Muddiman, A. & Frymier, A. B. (2009). What is relevant? Student perceptions of relevance strategies in college classrooms. *Communication Studies* 60(2), 130-146.

- Neuliep, J. W. (1991). An examination of the content of high school teachers' humor in the classroom and the development of an inductively derived taxonomy of classroom humor. *Communication Education*, 40(4), 343-355.
- Neumann, D. L., Hood, M., & Neumann, M. M. (2009). Statistics? You must be joking: The application and evaluation of humor when teaching statistics. *Journal of Statistics Education*, 17(2), 1-16.
- Petty, R. E. & Cacioppo, J. T. (1981). *Attitudes and persuasion: Classic and contemporary approaches*. Dubuque, IA: W. C. Brown.
- Petty, R. E. & Cacioppo, J. T. (1984). Source factors and the elaboration likelihood model of persuasion. *Advances in Consumer Research*, 11(1), 668-672.
- Prerost, F. J. (1975). The indication of sexual and aggressive similarities through humor appreciation. *The Journal of Psychology*, 91, 283-288.
- Punyanunt, N. M. (2000). The effects of humor on perceptions of compliance-gaining in the college classroom. *Communication Research Reports*, 17(1), 30-38.
- Raney, A. (2004). Expanding disposition theory: Reconsidering character liking, moral evaluations, and enjoyment. *Communication Theory*, 14(4), 348-369.
- Richmond, V. P., McCroskey, J. C., Kearney, P., & Plax, T. G. (1987). Power in the classroom VII: Linking behavior alteration techniques to cognitive learning. *Communication Education*, 36, 1-12.
- Richmond, V. P. & McCroskey, J. C. (1998). *Communication apprehension, avoidance, and effectiveness*. Needham Heights, MA: Pearson Education Company.
- Richmond, V. P., Lane, D. L., & McCroskey, J. C. (2006). *Teacher immediacy and the teacher-student in relationship*. In T. P. Mottet, V. P., Richmond, & J. C. McCroskey (Eds.), *Handbook of Instructional Communication: Rhetorical and Relational Perspectives* (p. 167-194). Boston: Allyn & Bacon.
- Roach, D. (1994). Temporal patterns and effects of perceived instructor compliance-gaining use. *Communication Education*, 43, 236-245.
- Roach, D., Cornett-DeVito, M., & DeVito, R. (2005). A cross-cultural comparison of instructor communication in American and French classrooms. *Communication Quarterly*, 53(1), 87-107.

- Robinson, V. M. (1983). Humor and health. In P.E. McGhee & J. H. Goldstein (Eds.), *Handbook of humor research* (Vol. II, pp. 109-128). New York, NY: Springer-Verlag.
- Romal, S. B. (2008). Use of humor as a pedagogical tool for accounting education. *Academy of Educational Leadership Journal*, 12, 83-106.
- Sanders, J. A. & Wiseman, R. L. (1990). The effects of verbal and nonverbal teacher immediacy on perceived cognitive, affective, and behavioral learning in the multicultural classroom. *Communication Education*, 39, 341-353.
- Shiyab, S. (2009). Pedagogical effect of humor on teaching. *Digital Stream Proceedings*, 2, 1-9.
- Skinner, M. E. & Fowler, R. E. (2010). All joking aside: Five reasons to use humor in the classroom. *The Educational Digest*, 76(2), 19-21.
- Stuart, W. D., Rosenfeld, L. B., & Bank, C. (1994). Student perceptions of teacher humor and classroom climate. *Communication Research Reports*, 11(1), 87-97.
- Teven, J. J., & McCroskey, J. C. (1997). The relationship of perceived teacher caring with student learning and teacher evaluation. *Communication Education*, 46(1), 1-9.
- Teven, J. J. & Hanson, T. L. (2004). The impact of teacher immediacy and perceived caring on teacher competence and trustworthiness. *Communication Quarterly*, 52(1), 39-53.
- Torok, S. E., McMorris, R. F., & Lin, W. C. (2004). Is humor an appreciated teaching tool? Perceptions of professors' teaching styles and use of humor. *College Teaching*, 52(1), 14-20.
- Walker, B. E. (2006). Using humor in library instruction. *Reference Services Review*, 34(1), 117-128.
- Wanzer, M., Booth-Butterfield, M., & Booth-Butterfield, S. (1995). The funny people: A source orientation to the communication of humor. *Communication Quarterly*, 43(2), 142-154.
- Wanzer, M. B. & Frymier, A. B. (1999). The relationship between student perceptions of instructor humor and students' reports of learning. *Communication Education*, 48(1), 48-62.

- Wanzer, M. B., Frymier, A. B., Wojtaszczyk, A. M., & Smith, T. (2006) Appropriate and inappropriate uses of humor by teachers. *Communication Education*, 55(2), 178-196.
- Wanzer, M. B., Frymier, A. B., & Irwin, J. (2010). An explanation of the relationship between instructor humor and student learning: Instructional humor processing theory. *Communication Education*, 59(1) 1-18.
- Wendt, D. A. (2008). Creating a nurturing classroom. *Spectra*, 44(8), 30.
- Witt, P. L., & Wheelless, L. R. (2001). An experimental study of teachers' verbal and nonverbal immediacy and students' affective and cognitive learning. *Communication Education*, 50(4), 327- 342.
- Witt, P. L., Wheelless, L. R., & Allen, M. (2004). A meta-analytical review of the relationship between teacher immediacy and student learning. *Communication Monographs*, 71(2), 187-207.
- Wrench, J. S. & Punyanunt-Carter, N. M. (2005). Advisor-advisee communication two: The influence of verbal aggression, humor assessment on advisee perceptions of advisor credibility and affective learning. *Communication Research Reports*, 22(4), 303-313.
- Zhang, Q. (2005). Teacher immediacy and classroom communication apprehension: A cross-cultural investigation. *Journal of Intercultural Communication Research*, 34(1), 50-64.
- Zillman, D. & Cantor, J. R. (1976). A disposition theory of humor and mirth. In A. J. Chapman & H. C. Foot (Eds.), *Humor and laughter: Theory, research, and applications*, pp. 93-115. London: Wiley
- Zillman, D. & Bryant, J. (1983). Uses and effects of humor in educational ventures. In P. McGhee & J. H. Goldstein (Eds.), *Handbook of Humor Research*, Volume II: Applied studies, pp. 173-193. New York, NY: Springer-Verlag.
- Zillmann, D., & Cantor, J. R. (1996). *A disposition theory of humor and mirth*. In A. J. Chapman & H. C. Foot (Eds.), *Humor and laughter: Theory research and applications* (p. 63-91). New Brunswick, NJ: Transaction Publishers.
- Ziv, A. Gorenstein, E., & Moris, A. (1986). Adolescents' evaluation of teachers using disparaging humour. *Educational Psychology*, 6(1), 37-44.
- Ziv, A. (1988). Teaching and learning with humor: Experiment and replication. *Journal of Experimental Education*, 57, 5-15.

APPENDIX A

DEMOGRAPHIC SURVEY

Directions: Please answer questions one through four that most accurately describes you. These preliminary questions will help the researcher identify the demographic characteristics of the participants. All results will be confidential.

1. University Classification: Freshman Sophomore Junior Senior
Other

2. Sex (circle one): Female Male

3. Do you say humorous things in class? Yes No

4. Which of the following best describes you (please check one)?

_____ I prefer to have a teacher that incorporates humor half of the class time.

_____ I prefer to have a teacher that incorporates humor throughout the class time.

_____ I prefer to have a teacher who does not incorporate humor during class.

Directions: The following statements will display the demographics of your teacher. Think about the teacher you had before this class to help you answer the following statements. Please use this specific teacher to answer all of the questions.

1. What is the gender of the teacher you are going to relate to? Female
Male

2. How is the teacher identified? Teaching Assistant Instructor/Adjunct
 Assistant Professor Associate Professor Full Professor Unknown
3. Approximately how old do you think the teacher is? _____

APPENDIX B

TEACHER HUMOR SCALE

Directions: For each of the following behaviors, use the scale below to indicate how often your teacher from your previous class used the following behaviors when teaching. Please indicate your first response.

5= Always 4=Often 3=Sometimes 2=Rarely 1=Never

Rate how often your teacher uses the following behaviors in the classroom:

- _____ 4. Use humor related to course material.
- _____ 5. Use funny props to illustrate a concept or as an example.
- _____ 6. Tell a joke related to course content.
- _____ 7. Tell a story related to course content.
- _____ 8. Is critical or cynical of course material, such as using sarcasm.
- _____ 9. Uses stereotypical college student behavior as examples to illustrate course content (e.g., beer drinking examples).
- _____ 10. Teases students in a lighthearted way or uses students in class as examples of course content.
- _____ 11. Performs or acts out course material to illustrate concepts.
- _____ 12. Facilitates student role-play exercises to illustrate course content.
- _____ 13. Uses language in creative and funny ways to describe course material.
- _____ 14. Tells stories unrelated to course content.
- _____ 15. Tells jokes unrelated to course content.
- _____ 16. Uses critical, cynical or is sarcastic humor about general topics (not related to the course).
- _____ 17. Makes comments about stereotypical college student behavior.

_____ 18. Teases students in class.

5= Always

4=Often

3=Sometimes

2=Rarely

1=Never

Rate how often your teacher uses the following behaviors in the classroom:

_____ 19. Performs or puts on an act in class to be funny.

_____ 20. Uses puns or other forms of word play in class.

_____ 21. Makes humorous comments about current and political events.

_____ 22. Uses funny props or media unrelated to the course material.

_____ 23. Makes fun of him/herself in class. (this combines three sub-categories).

_____ 24. Tells embarrassing stories about him/herself.

_____ 25. Makes fun of him/herself when he/she makes mistakes in class.

_____ 26. He/she does things unintentionally that are funny (e.g. trips over a student's foot).

_____ 27. Tells sexual jokes or makes sexual comments.

_____ 28. Uses vulgar language or nonverbal behaviors in a humorous way.

_____ 29. Makes references to drinking or getting drunk.

_____ 30. Tells jokes that are unrelated to the class (based on inappropriate jokes).

_____ 31. Tells humorous stories about his/her personal life.

_____ 32. Talks about drugs or other illegal activities in a humorous way.

_____ 33. Uses morbid humor such as about death or severe injuries.

_____ 34. Uses sarcasm in class.

_____ 35. Makes humorous comments about students' intelligence or appearance (who are not in the class).

_____ 36. Teases students in class about their intelligence.

_____ 37. Makes humorous comments about a student's personal life or personal interests.

_____ 38. Tease a student about he/she is dressed.

5= Always

4=Often

3=Sometimes

2=Rarely

1=Never

Rate how often your teacher uses the following behaviors in the classroom:

_____ 39. Tease or make a joke about a student based on the student's gender.

_____ 40. Make humorous comments about a student's religion.

_____ 41. Tells jokes or makes humorous comments based on stereotypes.

_____ 42. Tells jokes that target specific racial or ethnic groups.

_____ 43. Uses humor targeted at others teachers.

_____ 44. Uses humor targeted as specific religious groups.

_____ 45. Uses jokes or other humor target at homosexuals.

_____ 46. Humor that disparages a certain political affiliation.

_____ 47. Makes fun of self in front of the class.

APPENDIX C

STUDENT PERCEIVED COGNITIVE LEARNING SCALE

Directions: Think about the class you had before this class to help you answer the following statements.

Answer the following questions based on a zero to nine scale:

Zero (0) meaning you learned nothing, and Nine (9) meaning more than any other class taken.

0 1 2 3 4 5 6 7 8 9

_____ 1. How much are you learning in this class?

_____ 2. How much knowledge/understanding are you gaining in this class?