lacob Cayanus and Matthew M. Martin

10 Teacher Self-Disclosure

Abstract: The argument has been made that the student-teacher relationship is interpersonal in nature. As such, teacher self-disclosure plays an important role in the development of this relationship. Teacher self-disclosure refers to the process of divulging personal information while giving instruction or interacting with students. From conversing about family to providing details about undergraduate life, this teacher communication behavior promotes understanding, influences the learning environment, and enhances the student-teacher relationship. From a theoretical perspective, the concept of teacher self-disclosure is multi-dimensional in nature, but the dimensions themselves have not yet been finalized. Amount, negativity, and relevance are the most commonly studied dimensions, with appropriateness starting to receive attention. A thorough examination of extant research indicates that teacher self-disclosure is an important instructional tool as it affects many facets of the classroom. The purpose of this chapter is to examine theoretical explanations, review past findings, and propose suggestions for future research in order to more fully understand the uses and effects of teacher self-disclosure.

Keywords: teacher self-disclosure, relevance, appropriateness, social penetration theory, communication privacy management theory, rhetorical and relational goals theory, student-teacher relationship, learning environment

The underlying premise of this volume is that classroom communication between students and teachers impacts both the teacher-student relationship and student learning. Consequently, it is imperative to form fuller understandings of the behavioral constructs that comprise instructional communication and examine how they work together (or against each other) to achieve instructional goals. The focus of this chapter is the communicative behavior known as teacher self-disclosure — when teachers discuss their own life experiences as a way of promoting clarity and understanding of the course material. For example, a teacher discussing the dilemma of perceived understanding may disclose something like the following:

There are many times I think that I am being understood at home, but it is just my perception. I told my son that he has to clean his room before he can go over to his girlfriend's house, and then I went back to my writing thinking that he was actually cleaning. About five minutes later he comes out of his room and says, "See you later!" I got up and checked to see if he had cleaned his room, and it was a disaster area. Obviously, I thought he understood he had to clean before leaving, but evidently his idea of what "clean" looked like was very different from mine. This is one of the many problems with perception.

This example describes a teacher's attempt to illustrate the classroom topic by recounting a personal experience, which is a common form of teacher self-disclosure

and arguably an effective pedagogical method. As stated by Fusani (1994), teacher self-disclosure is a "rich personal source of student-teacher communication" (p. 249) that can be brought into the teaching-learning process. However, as with most interpersonal relationships, it is not the sender's intent but the receiver's perception that determines the effectiveness and appropriateness of this instructional behavior. From the perspectives of both students and teachers, what is appropriate to discuss in one class may not be appropriate for all, as social and professional norms vary from class to class, creating individual communication climates. Thus, self-disclosure during instruction should be carefully monitored and evaluated, as it can produce either positive or negative effects on student learning, motivation, and affect for the teacher and course.

The purpose of this chapter is to examine what researchers have learned about this useful and effective communication behavior. First, we will define the construct as it occurs in interpersonal and classroom contexts. Next, we will examine some theoretical foundations that provide explanations for how and why self-disclosure works in teaching and learning. After an overview of the relevant findings and identification of important issues related to the use of self-disclosure during instruction, we will discuss the measures that researchers use to operationalize the construct. The chapter will conclude with practical implications for instructors and directions for future researchers.

Origins and Definitions of the Construct

In the 1970s the topic of self-disclosure began to receive attention from researchers interested in the role of communication in the development and maintenance of interpersonal relationships. Much like any new conceptualization, competing definitions of the construct emerged. Jourard (1971) defined disclosure as "the act of making yourself manifest, showing yourself so that others can perceive you" (p. 17), leading to the conclusion that telling others about oneself through love and trust (positive disclosures) is paramount for relationships. Taking a more general view, Wheeless and Grotz (1976) conceptualized interpersonal disclosure as "any message about the self that a person communicates to another" (p. 338).

Several key findings emerged from early studies of self-disclosure in relationships. For instance, Kleinke (1979) noted that individuals who receive an intimate disclosure feel an urge to respond with a similar level disclosure in return. In addition to reciprocity, timing of disclosure is crucial: Altman and Taylor (1973) suggested that disclosing too much information early in the relationship may push others away, as an individual should establish trust before going into deep disclosures. Some of this research focused on the disclosure-liking hypothesis, that (1) individuals like others more after disclosing to them, (2) the depth of the disclosures influences liking, and (3) individuals disclose more frequently and more deeply to those

they like (Collins & Miller, 1994). It is no surprise, then, that a positive association exists between self-disclosure and overall relationship satisfaction (Meeks, Hendrick, & Hendrick, 1998).

Although the argument is often made that the teacher-student relationship is an interpersonal one, self-disclosure in the classroom context is not the same as in the friendship context. A key factor in judging the effectiveness and appropriateness of instructor self-disclosure is relevance to the course content. "Desirable classroom self-disclosure differs from self-disclosure that may be desirable in personal relationships because it should be more illustrative than revealing" (Lannutti & Strauman, 2006, p. 96). The work of Wheeless and Grotz (1976) expanded the conceptualization and operationalization of self-disclosure into the teaching-learning context, providing a starting point for defining and constructing teacher selfdisclosure. In the early development of the construct, Nussbaum and Scott (1979) pointed out that teacher self-disclosure may involve either intentional or unintentional revealing of information to students. Sorensen (1989) articulated a fuller definition for the classroom context, describing it as "teacher statements in the classroom about the self that may or may not be related to the subject content, but reveal information about the teacher that students are unlikely to learn from other sources" (p. 260). For Goldstein and Benassi (1994), it is when a teacher shares "personal and professional information and experience about himself or herself" (p. 212). Synthesizing these definitions into a working understanding for this chapter produces the following definition: Teacher self-disclosure is a voluntary (planned or unplanned) transmission of information not readily available to students.

It is argued here that a significant factor is whether the disclosure is planned or unplanned. Sometimes classroom disclosures are not planned in advance. For example, an instructor may be discussing the topic of cheating in interpersonal relationships when a memory suddenly floods the teacher's mind and is used as an illustration of a cheating event. Though the disclosure was intentional, it was unplanned. When teaching, disclosures often are unplanned and thus could be either effective exemplars of course-related material or completely inappropriate and not relevant. As noted by James (2009), teacher self-disclosure is not static, and the teacher makes a conscious decision to enter the learning process personally. In order to better explain the process, a brief survey of relevant theories is warranted.

Understanding Teacher Self-Disclosure

Because the disclosure of private information often occurs in the context of friendships or family relationships, interpersonal theorists have examined how and why disclosure occurs. As noted, the teacher-student relationship is interpersonal in nature and thus, certain interpersonal theories may be used to explain teacher selfdisclosure. Three theories are discussed here as possible explanations for the use of teacher self-disclosure in the classroom: rhetorical and relational goals theory, communication privacy management theory, and social penetration theory.

Rhetorical and Relational Goals Theory

Going beyond the personal narrative in the classroom, rhetorical and relational goals theory (RRGT; Mottet, Frymier, & Beebe, 2006) provides a framework to examine and explain the use of teacher self-disclosure. Mottet and his colleagues identified two types of goals in the classroom: rhetorical and relational. Rhetorical goals refer to the results of successful course instruction such as acceptable grades and the achievement of learning outcome, whereas relational goals entail instructor communication that provides positive personal regard (affect) and an appropriate degree of interpersonal connectedness. RRGT posits that these two goals are equivalent in value and recognizes that self-disclosure is one communication strategy that teachers may use to attain these goals.

Students often report they like teachers more when they disclose things in the classroom that make them appear more human. However, when using self-disclosure to achieve rhetorical goals related to successful instruction, a teacher should thoughtfully consider the amount of relevant disclosures in terms of frequency (not too often), breadth (not for every teaching point), and depth (not too personal). For example, one of the main reasons students are in class is to obtain a good grade. As such, teachers sometimes focus rhetorical disclosures on grading issues that directly communicate how students may obtain the grade they desire. When discussing a grading rubric, an instructor could state "When I was a student, I really wanted an A in instructional communication. I did all the work, but I did not read the actual grading instructions in the syllabus and overlooked something important. I ended up with a B in the class."

Instead of making a straightforward announcement, "Consult the grading policy in the syllabus," the instructor used a more personal, self-disclosive style both to transmit the information and to build rapport with the students. In this case, the instructor's self-disclosure helped achieve both rhetorical and relational goals, which illustrates one of the propositions of RRGT, that the two goals are intrinsically linked (Mottet et al., 2006). Sorenson (1989) observed this phenomenon in early research, noting that teacher self-disclosure links relational construction and affect through instructional and explanatory functions.

Communication Privacy Management Theory

Whenever teachers talk about themselves, tell stories, and discuss their personal beliefs (Nussbaum, Comadena, & Holladay, 1987), it is obvious that an element of personal discretion is called for. Inappropriate disclosures may negatively impact the student-teacher relationship and could even interfere with the teaching-learning process. Thus, an important issue concerns what types of information the teacher should disclose to foster learning and the student-teacher relationship. This dimension of self-disclosure is addressed by communication privacy management theory (CPM; Petronio, 2002).

CPM provides a heuristic to grasp the ways people manage their privacy during interpersonal interaction, and the tenets of the theory have direct application to the teacher-learning context. The metaphor of the boundary is utilized in CPM to "identify the border around private information" (Petronio, 2000, p. 38). CPM argues that the way to comprehend how people regulate private information is to consider several core principles. First, people regard private information as something they own, and therefore it belongs to them. They can own it alone or co-own it with other people. Second, when private information is owned and co-owned by individuals, they collectively feel the need to control the information (Petronio, 2002). Third, CPM proposes that when co-owners or stakeholders work together to generate, adjust, and refine rules to regulate privacy boundaries, they are synchronizing a coordinated effort to yield successful management of the boundaries.

Clearly, the tenets of CPM apply to self-disclosures made by classroom teachers. When a teacher recounts a personal experience, previously-private information is now co-owned with the students. By making the experience more or less public, the teacher sacrifices a degree of control over the information, as many students may not maintain confidentiality of the self-disclosure, even if the teacher requests it. Thus, deciding what information to divulge constitutes a strategic decision with implications for both the student-teacher relationship and the success of the class. Few instructional behaviors influence the classroom like teacher self-disclosure because teachers enter an unspoken agreement with students in relation to privacy and relational intimacy. However, because the teacher-student teacher relationship is intrinsically different from a friendship, caution must be taken.

CPM explains that privacy rules are constructed to control the privacy boundaries surrounding confidential information. These rules, hence, are developed, taught, and sometimes negotiated among the group members to manage the permeability (how much is known to outsiders), linkages (who is privileged to know), and parameters of shared ownership (the degree to which co-owners individually have rights to make choices about the information). CPM further posits that when a choice is made to allow someone access to the private information, a decision should be made about the extent to which that person is expected to protect the information.

Social Penetration Theory

Within the classroom, a teacher must decide whether or not to be a part of the interpersonal learning environment. When the teacher makes this choice, he/she

enters the personal learning environment through self-disclosure (James, 2009). Once a degree of mutual trust has been established or assumed, social penetration theory (SPT; Altman & Taylor, 1973) helps explain the ways disclosure might occur during instruction.

SPT posits two dimensions of disclosure that help or hinder relationship development, breadth and depth. Breadth refers to the number of different topic areas in which the teacher discloses personal experiences or opinions, whereas depth denotes the level of intimacy or privacy that information reveals. Breadth occurs in classes where teachers disclose on a routine basis while teaching different topics. Most of these disclosures are surface-level disclosures much like the example at the beginning of the chapter. This type of self-disclosure is common, acceptable, and effective as a teaching device. Depth occurs less frequently in the classroom, as it cuts deep into more intimate areas. This type of instructor self-disclosure is more likely to occur later in the semester as the layers of a teacher's persona are gradually peeled away.

Altman and Taylor (1973) viewed self-disclosure as essential to the formation of love, faith, fear, and self-acceptance. Most people innately protect these private areas and resent intrusion from an untrusted or unexpected source. Teachers who venture into these areas of self-disclosure should use caution and be certain of their students' attitudes and reactions. They suggested that as the relationship progresses, the level of breadth and depth increases. Similarly, as the semester progresses, the teacher-student relationship develops in and out of the classroom. Teachers may begin to use more and varied types of disclosure in their examples as a more open climate is established. SPT helps explain how a teacher may move from a few surface-level disclosures to more in-depth information covering many topics. If, however, a teacher deems the use of disclosure as too risky in terms of professionalism, the layers stay intact, meaning the self-disclosures are kept to a minimum in terms of intimacy. This is a common tactic both in the classroom and in interpersonal relationships. Overall, SPT provides a general framework for understanding how classroom disclosures contribute to the development of the student-teacher relationship. These three interpersonal theories describe the conceptualization and explain the process of teacher self-disclosure, and they form a cognitive framework for interpreting the following research findings.

Major Research Findings

Most programs of research on teacher self-disclosure fall into four major categories, those that examine (1) frequency, (2) relevance, (3) appropriateness, and (4) valence. Overall, scholars are most interested in valence - i.e., the positive or negative perceptions of students and any potential effects those perceptions may have on classroom outcomes such as learning, motivation, and affect for the teacher and $_{\mbox{course.}}$ Chronologically, lines of research have emerged as self-disclosure measures have been introduced.

Frequency/Amount of Self-Disclosure

Initial findings based on data from the Instructor Self-Disclosure Scale (Cayanus & Martin, 2002) reinforced the relational side of the student-teacher relationship. For example, these data indicated that the amount (frequency) of teacher self-disclosure was positively correlated with students' perceptions of teacher responsiveness. In other words, students reported that they approved of their instructors' selfdisclosive instructional style because it communicated that the teacher was open and transparent with the students, and willing to engage in interpersonal exchanges with them concerning the course content. This explains why Cayanus et al. (2003) found that the amount of self-disclosure a teacher used was positively associated with student participation in the classroom: when the teacher is transparent, the students respond in like kind. Further research by Cayanus and Martin (2004) clarified that the amount of teacher self-disclosure was positively associated with students' motives to communicate (relational, excuse-making, and sycophancy) as well as out-of-class communication, student interest, and cognitive learning. Though these findings were based on data from the ISD scale, an early iteration of self-disclosure measurement, they provided initial understanding of the construct of teacher self-disclosure.

Amount, Relevance, and Valence

The development of the Teacher Self-Disclosure Scale (Cayanus & Martin, 2008) enabled investigation of the multi-dimensionality of the construct. Cayanus and Martin found that amount, relevance, and valence of teacher self-disclosure were all positively related to affective learning, motivation to attend class, teacher clarity, and student interest. As expected, amount and relevance were positively correlated with the outcome variables, but when students judged the self-disclosures negatively, inverse correlations were observed with each outcome variable. Further research indicated that amount and relevance were also correlated with student information-seeking strategies (Cayanus et al., 2008), specifically those of overt, third-party, and observation types. In other words, in classes where instructors engaged in self-disclosure while teaching, students felt freer to ask questions and engage in active information-seeking to clarify their understanding of course content. In the presence of frequent, relevant teacher self-disclosures, students reported higher motivation to learn (Cayanus et al., 2009) and lower receiver apprehension (Goodboy et al., 2014), but only if they judged the disclosures to be positive. Negatively-valenced self-disclosures were correlated with higher receiver apprehension, a state of anxiety that interferes with the receiving and processing of new information. The assessment of valence in these studies – i.e., whether students responded positively or negatively to specific disclosures of their instructors – fueled the next generation of studies that focused on relevance and appropriateness.

Relevance, Appropriateness, and the Teacher-Student Relationship

A current trend in this line of research is to investigate the role and impact of both appropriateness and relevance. As previously noted, Cayanus and Heisler (2013) learned that students consider teacher self-disclosures about sex, religion, and politics to be inappropriate, as well as those disclosures that have no obvious connection with the course material. Yet Cayanus and Youngquist (2016) reported that, when judging the valence of teacher disclosures, students place more importance on relevance than on social appropriateness. The implications are that even disclosures about sex, religion, and politics may be deemed appropriate if they clarify, illustrate, or relate directly to the material being covered in the class. Zhang (2010) believed that skillful instructors who emphasize the relevance of their disclosures can likely disclose what otherwise might be perceived as inappropriate. In other words, students' understanding of the purpose of the disclosure is more important than social appropriateness itself (Paluckaite & Zardeckaite-Matulaitiene, 2015).

Concerning appropriateness, research indicates that students generally expect social and professional boundaries to be observed within the classroom. Instructors who violate classroom norms may negatively affect students' perceptions of their professionalism. For example, perceptions of teacher competence are mitigated by judged appropriateness (comfort level) of the disclosure (Schrodt, 2013). In accordance with the tenets of CPM (Petronio, 2002), teachers should be aware of this boundary when choosing what, when, and how to disclose personal information during instruction. Students also want a variety of disclosures that are relevant, mostly positive, and help foster a student-teacher relationship, expectations that align with rhetorical and relational goals theory (Mottet et al., 2006). However, there is still a great deal of ambiguity concerning how students judge something as inappropriate in the classroom. For instance, some students may see a teacher's disclosure about personal problems as inappropriate (Nunziata, 2007), but not all see it this way. Harper (2005) noted that some teachers are afraid to disclose because they do not know how the students will react. On one hand, the disclosure creates immediacy and a more relaxed atmosphere, but at the same time it may result in loss of credibility if the instructor is perceived as crossing a professional boundary.

Instructor Self-Disclosure in Computer-Mediated Contexts

Most of the research to date has focused on teacher disclosure in the traditional face-to-face classroom on American college campuses, but the proliferation of dis-

tributed learning through online courses has introduced a new interpersonal dynamic. Computer-mediated communication (CMC) gives instructors an entirely different context within which they may choose to disclose personal information, and students may respond differently to online disclosure than they would face to face. Scholars are beginning to examine instructor self-disclosure as it occurs in two digital contexts: social networking sites such as Facebook and online instruction.

Facebook

Facebook is one of the most widely used social networking sites, providing a way for students to maintain social connections with one another and (sometimes) with their instructors. Selwyn (2009) noted that few education-related posts are found on Facebook and that students use it more as a form of entertainment. Students did, however, report a willingness to communicate passively with their professors. Obviously, instructors should monitor their Facebook disclosures as carefully as they would during classroom instruction, as their professional credibility may be affected. Although some researchers have detected no clear association between Facebook posts and instructor credibility (e.g., Hutchens & Hayes, 2014), others found that negative disclosures on Facebook (such as revealing pictures or sharing unflattering information) were correlated with perceptions of decreased credibility in the classroom (Corffelt, Strayhorn, & Tillson, 2014). Conversely, Mazer, Murphy, and Simonds (2009) found that teachers who chose to maintain a Facebook presence that included personal and/or family photographs elicited from their students higher attributions of credibility - at least in terms of trustworthiness and caring; perceptions of competence were not affected. These studies were conducted among college students and their instructors. Different research findings emerged when researchers examined Facebook usage by K-12 teachers, who were found to use Facebook for instructional purposes, to check on the well-being of students, and to promote the student-teacher relationship (Asterhan & Rosenberg, 2015). Future research will reveal more about these younger students' responses to their teachers' self-disclosures on Facebook.

Online classes

Another computer-mediated context where instructor self-disclosures might occur is during instruction in the online course. In fact, relating personal experiences or opinions online may have a higher impact on relationship satisfaction in online classes than in traditional classes (Song, Kim, & Luo, 2016). In the absence of nonverbal cues such as facial expressions and tone of voice, the verbal content of online disclosures may have increased impact on relational development and satis-

faction. Although it has been argued that negative self-disclosures in the classroom sometimes make teachers appear more human to students (Cayanus & Martin. 2008; Cayanus et al., 2009), credibility may be harmed if negative self-disclosure occurs in the online context. Perhaps in person, instructors appear self-confident and secure when they transparently admit to flaws or mistakes they have made. Online, without the important information carried by nonverbal cues, the same messages may seem demeaning or self-critical, with the result that students might form less positive attributions of the teacher.

As noted previously, self-disclosure in the classroom contributes to perceptions of immediacy or personal closeness. Similar results have been detected in online instruction. Al Ghamdi, Samarji, and Watt (2016) used the term e-immediacy to denote behaviors teachers use online to enhance immediacy, such as initiating discussion through stories and using self-disclosure. These communication cues contribute to a feeling of closeness between the teacher and students and serve to reduce perceptions of interpersonal distance. Ghamdi et al.'s findings involving teacher self-disclosure, immediacy, participation, and communication satisfaction are notable partly because this study involved students outside of American culture. Interpreting and applying the research findings reported in this chapter will have validity only when taking into consideration the social norms and classroom expectations that are characteristic of different local cultures.

Cultural Influences on Instructor Self-Disclosure

The majority of instructor self-disclosure research has been conducted in American college classrooms, which are typically governed by individualistic, low-context, and small-power-distance communication norms. In such an environment, teachers may freely talk about their personal lives as if students were their friends or peers. In other cultures, instructors may not be expected (or allowed) to self-disclose while teaching, as it would violate collectivistic, high-context, large-powerdistance cultural norms. Scholars have investigated cultural preferences in terms of communication style preference (Mortenson, Liu, Burleson, & Liu, 2006) and the acceptability of teacher immediacy behaviors (Gundykunst, Lee, Nishida, & Ogawa, 2005). For example, Myers, Zhong, & Guan (1998) found that self-disclosure, though appropriate in U.S. classrooms, was not deemed appropriate in Chinese classrooms. Zhang (2007) discussed how culture influences the effect sizes of teacher misbehaviors in the classroom, including negatively-valenced self-disclosures. Given the important variations in cultural definitions of acceptable and unacceptable classroom communication behavior, the conclusions and recommendations of self-disclosure scholars should be applied with caution in non-American contexts.

Measurement of Teacher Self-Disclosure

Though scholars have identified different types of disclosure and assessed the effects of teacher self-disclosure on various student outcomes, a single agreed-upon method of measurement has not yet emerged. In the past, scholars have operationalized self-disclosure by coding transcripts of recorded lectures (Downs et al., 1988), asking students to compare current instructors to past instructors (Goldstein & Benassi, 1994), using checklists of self-disclosive statements (Sorensen, 1989), classroom evaluations (Wambach & Brothen, 1997), reading instructor narratives (Ebersole, McFall, & Brandt, 1977), or adapting an interpersonal measure of self-disclosure (Myers, 1998). In recent years, scholars have made several attempts to construct a valid and reliable instrument.

Instructor Self-Disclosure Scale

Cayanus and Martin (2002) developed a unidimensional measure of the amount of teacher self-disclosure perceived by students, on the assumption that some teachers use more self-disclosure than others, and that students might interpret those instructional messages differently based on the frequency of their use. The Instructor Self-Disclosure Scale uses a Likert-type response format ranging from (1) *completely disagree* to (7) *completely agree*. Cayanus and Martin reported that the scale has face validity and has attained an acceptable reliability (α = .92). Sample items include: "My instructor often talks about him/herself," "My instructor shares his/her likes and dislikes," and "My instructor often gives his/her opinions about current events." Similar reliabilities (α ranged from .91 to .93) for the scale were reported by Cayanus, Martin, & Weber (2003) and Cayanus and Martin (2004). Additionally, Cayanus and Martin (2003) confirmed the unidimensional structure for the Instructor Self-Disclosure Scale.

Teacher Self-Disclosure Scale

Lannuti and Strauman (2006) noted that most teacher self-disclosure studies have not focused on the multi-dimensional aspect of self-disclosure but have been limited to frequency of use. To address this weakness in measurement, Cayanus and Martin (2008) devised the Teacher Self-Disclosure Scale, a 3-dimensional teacher self-disclosure instrument originally designed to address amount, relevance, and valence. As in the earlier measure, the *amount* dimension focused on how often a teacher uses self-disclosure, the *relevance* dimension examined how the disclosure relates to the class material, and the *valence* dimension addressed the perceived positive or negative effects of the self-disclosure. After initial testing, however, the

positive disclosure items did not separate from the relevance dimension and were thus discarded, so the third factor was reidentified as negativity.

Items for the Teacher Self-Disclosure Scale were derived from several sources. For the amount dimension, items were taken from the original Instructor Self-Disclosure scale based on their high factor loadings. Sample items include: "My instructor often shares his/her dislikes and likes," and "My instructor often gives his/ her opinions about current events." Relevance items stemmed from the work of Frymier and Shulman (1995) and Frymier, Shulman, and Houser (1996) and were modified to focus on teacher self-disclosure. Five items were retained for the final version of the scale. Sample items include: "My instructor provides personal explanations that make the content relevant," and "My instructor uses his/her own experiences to introduce a concept." Five negativity items were chosen based off of the disclosure work of Wheeless and Grotz (1976) and were modified to examine teacher self-disclosure. Sample items include: "My instructor reveals undesirable things about him/herself," and "My instructor has told some unflattering stories about him/herself." Responses were solicited using a 7-item Likert-type response format ranging from (1) completely disagree to (7) completely agree. Items loaded on each factor appropriately and had initial reliabilities of .80 (amount), .88 (relevance), and .84 (negativity). Similar loadings and reliabilities for each dimension were found by Cayanus, Martin, and Myers (2008) and Cayanus, Martin, and Goodboy (2009). Though the Teacher Self-Disclosure Scale has proved useful in a number of classroom studies, it has not been adopted widely to the exclusion of other measures of teacher self-disclosure.

Appropriateness of Teacher Self-Disclosure Scale

Around the same time this instrument emerged, Zhang, Shi, Tonelson, and Robinson (2009) introduced the Appropriateness of Teacher Self-Disclosure (ATSD) scale to focus on the crucial dimension of the social acceptability of disclosures. Items were developed from the works of Cayanus and Martin (2002), Downs et al., 1988, and earlier works of the authors. The ATSD scale contains three dimensions: topics (7 items), purposes (9 items), and considerations (4 items). Topics included aspects of teacher self-disclosure such as family, friends, hobbies, religion, and personal beliefs. Purposes entailed offering real-world examples, creating attention, achieving clarity, fostering the student-teacher relationship, and establishing classroom climate. Considerations involved students' biological sex, cultural background, emotional state, and grade level. The scale was designed to examine K-12 teachers using a 5-point, Likert-type response format ranging from (1) very inappropriate to (5) very appropriate. Upon testing, five factors emerged from the data: common topics, uncommon topics, common purposes, uncommon purposes, and consideration of students. Though the conceptualization of the ATSD scale was theoretically

sound, the overall reliability of the scale was not satisfactory, bringing into question the validity of the instrument. Only two of the dimensions achieved acceptable reliabilities: common purposes (α = .85) and consideration of students (α = .86). Common topics (α = .48), uncommon topics (α = .67), and uncommon purposes (α = .53) failed to reach acceptable reliabilities. Part of the measurement problem could be related to the fact that the scale asked teachers, not students, about the appropriateness of disclosures.

Revised Teacher Self-Disclosure Scale

Considering these attempts at measurement development, and based on the work Nunziata (2007), Cayanus and Heisler (2013) attempted to incorporate appropriateness into a Revised Teacher Self-Disclosure (RTSD) Scale. As a starting point, 157 students were asked what makes a teacher's self-disclosure inappropriate. Similar to past findings involving appropriateness, three main categories of disclosure emerged from the sorting procedure as inappropriate: discussion of sex life, talking about things not related to the class, and negative opinions addressing religion and politics. Respondents indicated that all other topics were safe to discuss in the classroom. Nine items for the RTSD scale were derived from the responses and from Canary and Spitzberg's (1987) appropriateness scale, but factor analysis indicated that only two of the items separated from relevance, amount, and negativity: "My instructor's disclosures are appropriate in the class," and "My instructor's disclosures are suitable for the class." Acceptable reliabilities were attained for all four dimensions of the RTSD scale, but to date it has only been used once in research and needs more testing and development.

Researchers are continuing to develop measures of the teacher self-disclosure construct. For example, Cayanus and Youngquist (2016) have just completed an exploratory inquiry into the relative importance of *relevance* and *appropriateness* in determining students' assessment of their teachers' self-disclosures. Initial data indicate that students have divided opinions about the ways relevance influences perceived appropriateness. Around 60 % of student participants indicated that they consider *any* self-disclosure appropriate as long as it is relevant to class content. Further analysis is currently under way, and the role of appropriateness and relevance, as well as other aspects of teacher self-disclosure (both teachers' and students' perspectives), will command the attention of scholars in the years ahead.

Implications for Instructors and Researchers

Teaching is an on-going process of decision-making (Hunter, 1979). Deciding when and what to use in terms of disclosure in the classroom involves evaluating the

class composition itself. As classrooms become more diversified in terms of ethnicity, culture, and social identity, teachers must strive for deeper interpersonal understanding of their students, individually and as a group. One barrier to achieving this understanding, as Shavelson and Stern (1981) noted, is that teachers are not entirely aware of the many details that should be considered when planning a class. At the college level, most instructors receive little to no actual teacher training. Although this issue is starting to receive attention as pedagogical training is being incorporated in some doctoral programs, many professors enter the workforce with little knowledge of which pedagogical strategies work best in the classroom. Most new instructors go through a trial-and-error process when attempting to learn classroom management skills. Among the insights new instructors gain through their early teaching experiences, learning how and when to self-disclose is an important skill at any level of education.

For some classes, given the topic, class size, age of students, and experience of the instructor, disclosures of a negative nature may be warranted and educationally effective, whereas other classes may require strict adherence to positive, relevant, and few disclosures. In many cases, the teacher's assessment of the composition of the class becomes as important as the conveying of material. As Hawley, Rosenholtz, Goodstein, and Hasselbring (1984) believed, "There is no one best instructional system, no quick fixes, and no universal criteria of teacher excellence that can be applied in all contexts, with all students, for all goals of academic learning" (p. 51).

Extant research has concluded that teacher self-disclosure may have either positive or negative implications in the classroom. On the positive side, its use helps create a beneficial classroom environment, helps explain and illustrate the material, and helps build relationships between the teacher and the students. Effective self-disclosure can also increase student affect for the content, contribute to perceptions of instructor credibility, and enhance learning outcomes. On the other hand, when used inappropriately, teacher self-disclosure can become detrimental to the classroom environment and work against all these positive outcomes. Instructors must gauge how much disclosure to use, or else they run the risk of being labeled a compulsive communicator by students, which is generally viewed as a form of teacher misbehavior (Sidelinger & Bolen, 2015).

Although each classroom is unique in terms of composition and temperament, future researchers may be able to detect some patterns between teachers' and students' perspectives on amount, relevance, effectiveness, and appropriateness of instructor disclosures. To pursue this line of research, several questions must be considered: Are these perceptions addressed in the classroom as part of the instructional climate? Are perceptions of the disclosure mediated by or related to other variables such as credibility, immediacy, interest, or participation? Are students aware when a teacher self-discloses to clarify content as compared with simply relating a narrative? Are students aware when a teacher discloses a relevant, appropriate example to illustrate a concept? How much or how little importance do students place on the teacher-student relationship, and in what specific ways does teacher self-disclosure affect this relationship?

Myers (2001) called instructor credibility "one of the most important variables affecting the student-teacher relationship" (p. 354). Because of this claim, future researchers should carefully address the theoretical and practical relationship between credibility and self-disclosure. Extant research has only begun to examine how these two classroom variables interact, and more extensive research is needed.

Scholars should also investigate a wider range of outcome variables in relation to instructor self-disclosure. For instance, do teachers' self-disclosive comments during instruction contribute to greater cognitive learning as evidenced by higher grades or better short-term and long-term recall of the course material? Can appropriate and relevant disclosure be associated with perceptions of a more conducive classroom climate or a more positive teacher-student relationship? Is it even possible to parse out teacher behaviors like self-disclosure in order to fully understand how it affects students, or are teacher and student behaviors so intertwined that all are mitigated by one another?

The groundwork for future research has been conducted, and further study of instructor self-disclosure will not only enhance our knowledge, but also make us better teachers. It is important to remember, however, that the valence of self-disclosure is determined not by instructors but by students, and accurate knowledge of their perceptions and expectations can only be gained through careful observation and thoughtful evaluation.

Disclosure in any relationship is risky at best, but it is the cornerstone for relational development. If the teacher-student relationship is viewed as an interpersonal one (Frymier & Houser, 2000), some level of instructor self-disclosure is definitely warranted in the classroom. Learning how to use this relational and pedagogical tool appropriately will enhance the effectiveness of both classroom and online instructors. Students frequently voice the expectation that their professors will teach more than just academics by being transparent and open in their interpersonal communication both in the classroom and beyond. Instructional self-disclosure is one way teachers can fulfill that expectation.

References

Al Ghamdi, A., Samarji, A., & Watt, A. (2016). Essential considerations in distance education in KSA: Teacher immediacy in a virtual teaching and learning environment. *International Journal of Information and Education Technology*, 6, 17–22. doi:10.7763/IJIET.2016.V6.651

Altman, I., & Taylor, D. (1973). Social penetration: The development of interpersonal relationships. New York, NY: Holt, Rinehart, and Winston.

Asterhan, C. S. C., & Rosenberg, H. (2015). The promise, reality, and dilemmas of secondary school teacher-student interactions on Facebook: The teacher perspective. *Computers and Education*, 85, 134–148. doi:10.1016/j.compedu.2015.02.003

- Canary, D. J., & Spitzberg, B. H. (1987). Appropriateness and effectiveness perceptions of conflict strategies. Human Communication Research, 14, 93-120. doi:10.1111/j.1468-2958.1987.tb00123.x
- Cayanus, J. L. (2004). Using teacher self-disclosure as an instructional tool. Communication Teacher, 18, 6-9.
- Cayanus, J. L., & Heisler, J. (2013, November). Teacher self-disclosure: Exploring a fourth dimension. Paper presented at the annual meeting of the National Communication Association, Washington, DC.
- Cayanus, J. L., & Martin, M. M. (2002, November). Development of a teacher self-disclosure scale. Paper presented at the annual meeting of the National Communication Association, Atlanta,
- Cayanus, J. L., & Martin, M. M. (2004) An instructor self-disclosure scale. Communication Research Reports, 21, 252-263. doi:10.1080/08824090409359987
- Cayanus, J. L., & Martin, M. M. (2008). Teacher self-disclosure: Amount, relevance and negativity. Communication Quarterly, 56, 325-241. doi:10.1080/01463370802241492
- Cayanus, J. L., Martin, M. M., & Goodboy, A. G. (2009). The relationship between teacher selfdisclosure and student motives to communicate. Communication Research Reports, 26, 105-
- Cayanus, J. L., Martin, M. M., & Myers, S. A. (2008). The relationship between perceived instructor self-disclosure and college student information seeking. Texas Speech Communication Journal, 33, 20-26.
- Cayanus, J. L., Martin, M. M., & Weber, K. D. (2003, April). The relationships between teacher selfdisclosure with out-of-class communication, student interest, and cognitive learning. Paper presented at the annual meeting of the Southern States Communication Association, Birmingham, AL.
- Cayanus, J. L., & Youngquist, J. (2016). Examining relevance and appropriateness of teacher selfdisclosure. Unpublished manuscript, Department of Communication and Journalism, Oakland University, Rochester, MI.
- Collins, N. L., & Miller, L. C. (1994). Self-disclosure and liking: A meta-analytic review. Psychological Bulletin, 116, 457-475. doi:10.1080/08824090902861523
- Corffelt, T. A., Strayhorn, J., & Tillson, L. D. (2014). Perceptions of teachers' disclosures on Facebook and their impact on credibility. Kentucky Journal of Communication, 33, 25-43.
- Downs, V. C., Javidi, M., & Nussbaum, J. F. (1988). An analysis of teacher's verbal communication within the college classroom: Use of humor, self-disclosure, and narratives. Communication Education, 37, 127-141.
- Ebersole, P., McFall, M., & Brandt, C. (1977). Imitation and prior classroom contact as determinants of reciprocal self-disclosure. Psychological Reports, 41, 87–91. doi:10.2466/pr0.1977.41.1.87
- Frymier, A. B., & Houser, M. (2000). The teacher-student relationship as an interpersonal relationship. Communication Education, 49, 207-219. doi:10.2466/pr0.1977.41.1.87
- Frymier, A. B., & Shulman, G. M. (1995). "What's in it for me?": Increasing content relevance to enhance students' motivation. Communication Education, 44, 40-50. doi:10.1080/03634529509378996
- Frymier, A. B., Shulman, G. M., & Houser, M. (1996). The development of a learner empowerment measure. Communication Education, 45, 181-199. doi:10.1080/03634529609379048
- Fusani, D. S. (1994). "Extra-class" communication: Frequency, immediacy, self-disclosure, and satisfaction in the student-faculty interaction outside the classroom. Journal of Applied Communication Research, 22, 232-255. doi:10.1080/00909889409365400
- Goldstein, G. S., & Benassi, V. A. (1994). The relation between teacher self-disclosure and student classroom participation. Teaching of Psychology, 21, 212-216. doi:10.1207/s15328023top2104_2

- Goodboy, A. K., Carton, S. T., Goldman, Z. W., Gozanski, T. A., Tyler, J. J. C., & Johnson, N. R. (2014). Discouraging instructional dissent and facilitating student learning experience through instructor self-disclosure. Southern Communication Journal, 79, 114–129. doi:10.1080/1041794X.2013.865256
- Gundykunst, W. B., Lee; C. M., Nishida, T., & Ogawa, N. (2005). Theorizing about intercultural communication. In W. B. Gundykunst (Ed.), *Theorizing about intercultural communication* (pp. 3–32). Thousand Oaks, CA: Sage.
- Harper, V. B. (2005). The new teacher-student channel. T. H. E. Journal, 33, 13-24.
- Hawley, W. D., Rosenholtz, S. J., Goodstein, H. J., & Hasselbring, T. (1984). Good schools: What research says about improving student achievement. *Peabody Journal of Education*, *61*, 1–178. doi:10.1080/01619568409538458
- Hunter, M. (1979). Teaching is decision making. Education Leadership, 37, 62-67.
- Hutchens, J. S., & Hayes. T. (2014). In your Facebook: Examining Facebook usage as a misbehavior on perceived credibility. Education and Information Technology, 19, 5–20. doi:10.1007/s10639-012-9201-4
- James, J. H. (2009). Reframing the disclosure debate: Confronting issues of transparency in teaching controversial content. *Social Studies Research and Practice*, 4, 82–94.
- Jourard, S. M. (1971). Self-disclosure: The experimental investigation of the transparent self. New York, NY: Wiley.
- Kleinke, C. L. (1979). Effects of personal evaluations. In G. J. Chelune (Ed.), Self-disclosure: Origins, patterns, and implications of openness in interpersonal relationships (pp. 59–79). San Francisco: Jossey-Bass.
- Lannutti, P. J., & Strauman, E. C. (2006). Classroom communication: The influence of instructor self-disclosure on student evaluations. *Communication Quarterly*, 54, 89–99. doi:10.1080/01463370500270496
- Mazer, J. P., Murphy, R. E., & Simonds, C. J. (2009). The effects of self-disclosure via Facebook on teacher credibility. *Learning, Media, and Technology*, 34, 175–183. doi:10.1080/17439880802823655
- Meeks, B. S., Hendrick, S. S., & Hendrick, C. (1998). Communication, love, and relationship satisfaction. *Journal of Social and Personal Relationships, 15*, 755–773. doi:10.1177/0265407598156003
- Mortenson, S., Liu, M., Burleson, B. R., & Liu, Y. (2006). A fluency of feeling: Exploring cultural and individual differences (and similarities) related to skilled emotional support. *Journal of Cross-Cultural Psychology*, 37, 366–385. doi:10.1177/0022022106288475
- Mottet, T. P., Frymier, A., & Beebe, S. A. (2006). Theorizing about instructional communication. In T. P. Mottet, V. P. Richmond, & J. C. McCroskey (Eds.), Handbook of instructional communication: Rhetorical and relational perspectives (pp. 255–282). Boston, MA: Allyn & Bacon.
- Myers, S. A. (1998). Students' self-disclosure in the college classroom. *Psychological Reports*, 83, 1067–1070. doi:10.2466/PR0.83.7.1067-1070
- Myers, S. A. (2001). Perceived instructor credibility and verbal aggressiveness in the college classroom. *Communication Research Reports*, 18, 354–364. doi:10.1080/08824090109384816
- Myers, S. A., Zhong, M., & Guan, S. (1998). Instructor immediacy in the Chinese college classroom. Communication Studies, 49, 240–254.
- Nunziata, A. M. (2007, November). College student perceptions of instructor communication privacy management. Paper presented and the annual meeting of the National Communication Association, Chicago, IL.
- Nussbaum, J. F., Comadena, M. E., & Holladay, S. J. (1987). Classroom verbal behaviors of highly effective teachers. *Journal of Thought*, 22, 73-80.
- Nussbaum, J. F., & Scott, M. D. (1979). Instructor communication behaviors and their relationship to classroom learning. In D. Nimmo (Ed.), *Communication Yearbook 3* (pp. 561–583). New Brunswick, NJ: Transaction-International Communication Association.

- Paluckaite, U., & Zardeckaite-Matulaitiene, K. (2015). The appropriateness of the relevant and irrelevant teacher's self-disclosure: Students' and their teachers' attitudes. *European Scientific Journal*, 11, 18–35.
- Petronio, S. (2000). Balancing the secrets of private disclosures. Mahwah, NJ: Lawrence Erlbaum.
- Petronio, S. (2002). Boundaries of privacy: Dialectics of disclosure. Albany, NY: SUNY.
- Schrodt, P. (2013). Content relevance and students' comfort with disclosure as moderators of instructor disclosures and credibility in the college classroom. *Communication Education*, 62, 352–375. doi:10.1080/03634523.2013.807348
- Selwyn, N. (2009). Faceworking: Exploring students' education-related use of Facebook. *Learning*, *Media, and Technology*, 34, 157–174. doi:10.1080/1749880802923622
- Shavelson, R. J., & Stern, P. (1981). Research on teachers' pedagogical thoughts, judgments, decisions, and behaviors. *Review of Educational Research*, 51, 485-498.
- Sidelinger, R. J., & Bolen, D. M. (2015). Compulsive communication in the classroom: Is the talkaholic teacher a misbehaving instructor? *Western Journal of Communication, 79,* 174–196. doi:10.1080/10570314.2014.943416
- Song, H., Kim, J., & Luo, W. (2016). Teacher-student relationships in online classes: A role of teacher self-disclosure. *Computers in Human Behavior, 54*, 436–443. doi:10.1016/j.chb.2015.07.037
- Sorensen, G. (1989). The relationship among teachers' self-disclosive statements, students' perceptions, and affective learning. *Communication Education, 38,* 259–276. doi:10.1080/03634528909378762
- Teclehaimanot, B., & Hickman, T. (2011). Student-teacher interaction on Facebook: What students find appropriate. *Tech Trends*, *55*, 19–30. doi:10.107/s11528-011-0494-8
- Wambach, C., & Brothen, T. (1997). Teacher self-disclosure and student classroom participation revisited. *Teaching of Psychology*, 24, 262–263. doi:10.1207/s15328023top2404_7
- Wheeless, L. R., & Grotz, J. (1976). Conceptualization and measurement of reported self-disclosure. Human Communication Research, 2, 338–346. doi:10.1111/j.1468-2958.1976.tb00494.x
- Wheeless, L. R., & Grotz, J. (1977). The measurement of trust and its relation to self-disclosure. Human Communication Research, 3, 250–257. doi:10.1111/j.1468-2958.1977.tb00523.x
- Zhang, Q. (2007). Teacher misbehaviors as learning demotivators in college classrooms: A crosscultural investigation in China, Germany, Japan, and the United States. *Communication Education*, 56, 209–227. doi:10.1080/03634520601110104
- Zhang, S. (2010). Secondary preservice teachers' perspectives on teacher self-disclosure on citizenship curriculum. *Action in Teacher Education*, *32*, 82–96. doi:10.1080/01626620.2010.10463552
- Zhang, S., Shi, Q., Tonelson, S., & Robinson, J. (2009). Preservice and inservice teachers' perceptions of appropriateness of teacher self-disclosure. *Teaching and Teacher Education*, 25, 1117–1124. doi:10.1016/j.tate.2008.07.011