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Insights into stigma management communication theory: Considering stigmatization as interpersonal influence

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Abstract

The theory of stigma management communication has helped identify and categorize the communication tactics people use to manage stigmatization, yet communication research has provided little insight into predictors of these tactics. To address this gap, we considered stigmatization through the lens of interpersonal influence: as an act in which stigmatizers attempt to persuade their targets to accept categorization and de-individualization into a social group and, further, to accept its marginalized status in the society at large. We used the obstacle hypothesis, a theory of resistance to interpersonal influence, to derive predictors of stigma management strategies. Participants ($N=124$) facing possible stigmatization due to their genetic risk for a chronic health condition completed an online survey and shared memories of their initial test disclosures. The empirical tests showed that having a stronger sense of meaning in life, more unsafe experiences, and a broader information network predicted resisting stigmatization. Guilt predicted greater use of avoidance strategies (e.g., secrecy and avoiding risky interpersonal settings). We discussed practical implications of bolstering one's sense of meaning in life and argumentation skills and their connections to resilience research.

Keywords

stigma management; interpersonal influence; obstacle hypothesis; disclosure memories; resistance; intrafamily secrets

Up from a past rooted in pain / I rise

—Maya Angelou, *And still I rise: A book of poems*,
1978

Some people with stigmatized health conditions publicly, actively attempt to educate the community about their condition and confront stigmatizers in action. Often when they share their stories, they share harrowing personal tales of living through interpersonal and institutional rejection. The field of communication has multiple theories about disclosure and support seeking. This scholarship suggests that unsupportive reactions (e.g., McLaren &

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High, 2015) and intrafamily secrets (e.g., Vangelisti, 1994) are painful to experience, which motivates people to engage in protective actions in order to avoid similar experiences in the future. But why do some people instead react to these painful experiences by seeking active, public roles, such as reaching out to others through community-based organizations?

The theory of stigma management communication (SMC; Meisenbach, 2010) considers many reactions to managing stigmatization—from avoidance to advocacy—and proposes that tactic selection is based on accepting or challenging a public stigma and/or its self-application. Although SMC has been useful to identify and categorize the communication tactics people use to manage stigmatization (e.g., Brule & Eckstein, 2016; Noltensmeyer & Meisenbach, 2016), we still have not met SMC's call (Meisenbach, 2010) for more guidance into the factors that allow some people, but not others, to resist stigmatization. To answer this call, we considered stigmatization through the lens of interpersonal influence: as an act in which stigmatizers attempt to persuade their targets to accept de-individualization and categorization into a social group, and, further, to accept the marginalized status of this imposed group. This lens provides an opportunity to consider predictors of stigma management based on theories of resistance to influence, such as the obstacle hypothesis, a theory that embraces influence as interpersonal (e.g., Clark & Delia, 1979; Ifert, 2012; Ifert & Roloff, 1994, 1998; McLaughlin, Cody, & Robey, 1980). In brief, the obstacle hypothesis states that individuals will comply with interpersonal influence if there are no obstacles to doing so; obstacles allow for resistance. In this study, we focused on people with the genetic risk for Alpha-1 antitrypsin deficiency (Alpha-1), a common but under-recognized (Stoller et al., 2005) inherited, monogenic disorder associated with adult-onset lung and liver disease (Zuo, Pannell, Zhou, & Chuang, 2016), which we review next.

Alpha-1 Antitrypsin Deficiency

Alpha-1 affects approximately one in 2,000 to one in 5,000 people (Stoller & Aboussouan, 2012), making it comparable in incidence to cystic fibrosis (1/2,500–1/3,200; Rosenstein & Cutting, 1998). Low levels of antitrypsin predispose people to chronic obstructive pulmonary disease (COPD) and liver disease, which can lead to early death (Klitzman, 2009). Importantly, the prognosis for Alpha-1 varies widely: genetic markers for severe deficiency do not always result in symptoms, and some carriers do experience symptoms. Treatment and lifestyle modification can influence the onset or progression of clinical symptoms. Because Alpha-1-related symptoms mimic other conditions like asthma, patients may live through five to eight years of misdiagnoses and inappropriate treatment (Stoller et al., 2005). Alpha-1 intersects with other stigmas. The lung and liver symptoms associated with Alpha-1 have their own stigmas (Berger, Kapella, & Larson, 2011). In addition, Alpha-1 has a noted history of employment discrimination. Asymptomatic people with the genetic risk for Alpha-1 have reported job discrimination (e.g., Klitzman, 2009, 2010, 2012), indeed one such case was included in the congressional testimony involved in the creation of the 2008 Genetic Information Nondiscrimination Act (GINA; Feldman, 2012; Jones & Sarata, 2008). Symptomatic individuals who can still work also experience job discrimination (Silvers & Stein, 2002). Sometimes the symptoms become problematic enough that they may be unable to work (e.g., Prigmore & Scullion, 2012), which can be a different reason for them to experience stigmatization (Dougherty, Rick, & Moore, 2017).

Altogether, Alpha-1 is a genetic health condition that intersects multiple stigmas, making it very challenging to manage discursively.¹

In the era of genomic medicine, more people know their genetic health risks than ever before through direct-to-consumer venues (e.g., 23andme), predictive testing, and diagnostic testing. For example, the American Thoracic Society and European Respiratory Society have recommended genetic testing for Alpha-1 for everyone diagnosed with COPD (ATS/ERS Statement, 2003). As people share their genetic test results, some, including those at risk for Alpha-1, experience rejection from employers and health care providers, as well as shame, guilt, and ridicule from family and friends (Klitzman, 2012). One example from semi-structured interviews with people living with Alpha-1 was dating: the fundamental taint of carrying a genetic health risk complicated every aspect of dating (who to date, when to tell, what to tell) as many anticipated and experienced social rejection (Klitzman, 2012). Some even discover that someone else in their family knew about the condition, but only revealed the information after the fact (Klitzman, 2012). The features of Alpha-1, its stigmatized symptoms, history of employment discrimination, and reported interpersonal rejection make it a salient context in which to consider stigma management.

Stigma Management Communication Model

In the past decade, communication research has seen a growth in the studies investigating communication and stigma, especially in areas outside of coping and disclosure (Smith, Zhu, & Quesnell, 2016). Two communication-based theories of stigma have emerged: the model of stigma communication (MSC, Smith, 2007) and the theory of stigma management communication (SMC, Meisenbach, 2010). Both theories presume that communication plays a critical role in the creation, management, and performance of social stigmas. Social stigmas are defined as normalized, profoundly negative stereotypes of a group and its members. The MSC (Smith, 2007) focuses on the creation of social stigmas: the intrinsic message features that allow private prejudices to become collective norms (Rimal & Lapinski, 2015) or social facts (Durkheim, 1982). The SMC (Meisenbach, 2010) focuses on communication tactics used by actors to manage experiences of stigmatization by another person in particular encounters and is the focus of this study.

SMC (Meisenbach, 2010) considers a range of tactics used by those experiencing stigmatization (from secrecy to advocacy). Meisenbach (2010) categorized the tactics based on their ability to meet two goals: (1) acceptance or rejection of the social stigma's existence, and (2) acceptance or rejection of the stigma's applicability to the self. The intersection of these goals results in four quadrants (e.g., accept the stigma, but reject its self-application), with tactics categorized as meeting the goals within the quadrant.

In this study, we focused on tactics in two quadrants: those that limit the self-application of the stigma while either accepting or challenging the social stigma. *Avoiding strategies* are tactics that attempt to deny self-application but accept the existence of the social stigma; they are "most appropriate when the individual [potential target] is discreditable, but not yet

¹We thank an anonymous reviewer for this insight and phrasing.

discredited” (Meisenbach, 2010, p. 280). These tactics attempt to avoid public connections to the stigmatized group by hiding stigmata (i.e., marks to identify connection to the group; Smith, 2007) and by avoiding risky encounters (e.g., stigma-by-association or unintentional disclosure). In contrast, *denying strategies* are tactics that attempt to challenge the social stigma and any application to the self by rejecting its existence, attacking the stigmatizer’s ethos or educating others to arm them with refutational evidence and to highlight logical fallacies (Meisenbach, 2010).

Researchers have used the SMC to identify and categorize strategies used by people experiencing stigmatization due to health conditions (e.g., Noltensmeyer & Meisenbach, 2016), occupations (e.g., Brewis & Godfrey, 2017), and familial abuse (Brule & Eckstein, 2016). To date, two calls made by Meisenbach in her original article (2010) have not been accomplished: empirically testing predictors of communication strategies and identifying the factors that are associated with resilience and vulnerability in these encounters. Overall, Meisenbach predicts that a person’s attitude toward the public stigma and its self-application predict the use of a strategy to enact the attitudes. If we can identify the predictors associated with stigma resistance, then we create the chance to promote resilience in the face of challenging circumstances.

We offer a different path forward, by considering stigmatization as a complex, dynamic, goal-oriented activity in which different communicators attempt to achieve their goals through influence. We consider stigmatization in this paper as an act of influence on the part of the stigmatizer to persuade a target to accept the stigmatizer’s a) belief about the existence of a social group, b) belief that the target is a member of this social group, and c) that the group has a marginalized status in the society at large. The fundamental premise is that social groups are constructed, and stigmatizers and their targets may not share the same social category scheme. Even if targets and stigmatizers share similar perceptions that a social group (e.g., Alphas) exists, targets may not see themselves as Alphas or only as Alphas (de-individualized so that only this social membership defines them). Even those who may self-identify as Alphas may not perceive that the community at large perceives Alphas as fundamentally devalued and discredited. Stigmatization, then, can be seen as an act of interpersonal influence in which stigmatizers try to impose their social views (e.g., social categorization and devaluation) on their targets. Meisenbach (2010) argues that stigmatized persons may discursively manage stigmas by using argumentation techniques, such as “logically deny[ing] a stigma by providing specific evidence that refutes the stigma” (p. 284). We expand on this theorizing to consider targets’ discursive resistance to people using communication to impose their social views through interpersonal influence. The target may resist interpersonal stigmatization by arguing against these social arguments (e.g., social categorization) explicitly, actively, and publicly, or by avoiding such encounters.

Looking at stigma management through the lens of interpersonal influence aligns with the SMC’s assumption (Meisenbach, 2010) that stigmatizers and their targets are both involved in the perception, determination, and enforcement of social stigmas. Stigmas are revealed, constructed and enforced through talk (Meisenbach, 2010). We investigated predictors of resistance to stigmatization based on theories of resistance to influence, specifically the obstacle hypothesis.

Obstacle Hypothesis: Resisting Influence

The obstacle hypothesis (Clark & Delia, 1979; Ifert, 2012; Ifert & Roloff, 1994, 1998; McLaughlin et al., 1980) considers influence as a complex, dynamic, goal-oriented activity. In moments of interpersonal influence, if targets perceive no obstacles that cause them to resist complying with a requested action (i.e., no obstacles; Ifert & Roloff, 1998), then they will comply. Obstacles are critical for resistance; they are reasons why a target is unwilling or unable to do, think, believe, or feel what the influencer wants the target to do, think, believe, or feel (Clark & Delia, 1979; Ifert & Roloff, 1998).

Research has revealed multiple types of obstacles (see Ifert, 2012 for a review). The different types can be arranged by the degree to which they reflect an unwillingness and/or an inability to be influenced (Ifert & Roloff, 1994; 1998). The type of obstacle affects the ways targets convey obstacles (i.e., communicate their resistance; Ifert, 2012; Ifert & Roloff, 1998).

According to the obstacle hypothesis, targets who are unwilling to be influenced have the ability, but lack the motivation, to be influenced (Ifert & Roloff, 1994). For example, a target may have the money to support a cause, but does not want to support it. Perceiving the influence as illegitimate, inappropriate, or as violating personal principles, or perceiving the influencer as without ethos all provide sufficient reasons to be unwilling (i.e., lack of motivation) to be influenced (Ifert & Roloff, 1994). Targets who are unable to comply have the motivation but lack the power or resources to do so (Ifert & Roloff, 1994). For example, a target may want to give money to support a cause but lack the funds to do so. In this study, we focused on SMC tactics that reject the self-application of a stigma but vary in whether they accept or reject the social stigma's existence.² Unwillingness, then, is most relevant for this context: Targets are able but unwilling to accept a stigmatizer's perception that the social stigma exists and applies to them.

Those who are unwilling (but able) to be influenced respond to influencers with what Ifert and Roloff (1994) labeled as recalcitrance, inappropriateness, and source responsibility. These refusals correspond well with denial strategies in the SMC (Meisenbach, 2010). Examples of obstacle-based refusals include "I won't do that" (recalcitrance), "I think it's unfair of you to ask" (inappropriateness), and "That's your problem" (source responsibility) (Ifert & Roloff, 1998, p. 137). The refusals explicitly signal the refuser's disapproval of the influencer and the influence attempt (Ifert & Roloff, 1994) and the target's desire for social distance from the influencer (Kline & Floyd, 1990). The refuser's unwillingness to violate their personal principles becomes what Dillard, Anderson, and Knobloch (2002) refer to as the primary goal—that which motivates the speaker—and overcomes secondary goals such as relationship maintenance. Importantly, these types of refusal can cause conflict in a relationship (Ifert, 2012). Influencers can react to these refusals with more aggressive, punishing forms of influence strategies (e.g., the rebuff phenomenon; Hample & Dallingier, 1998; see Dillard et al., 2002 for a review).

²An important facet of these quadrants is the difference between enacting stigmatization and the existence of a public stigma. A person may speak dehumanizing comments that are not accepted by the larger community and be considered abnormal for their dehumanization.

Resisting Stigmatization

Why would a target of influence be unwilling to accept the arguments of stigmatization? The argument of stigmatization is de-individualization into a social group that has no value in society. The target may be unwilling to accept the loss of individuality and value because they have an existing counterargument: a strong sense of *meaning in life* (Steger, Frazier, Oishi, & Kaler, 2006). In psychology, meaning in life (Steger et al., 2006) is described as a strong sense of self-acceptance (i.e., positive attitudes toward one's self and past life) and purpose (i.e., direction in life). We argue that for those with a stronger sense of meaning in life, stigmatization is fundamentally illegitimate and a direct violation of personal principles and should be met with denial strategies (i.e., education and confrontation, Meisenbach, 2010). Other scholars have argued that a positive, meaningful identity provides a basis for stigma resistance (Firmin et al., 2017) and that affirming identity anchors provides resilience (Buzzanell, 2010). Our argument, then, highlights one means by which affirming identity, through strengthening self-acceptance and purpose, translates into stigma resistance.

H1: A stronger sense of meaning in life predicts greater use of denial strategies.

A complementary consideration of the argument of stigmatization is the dehumanized and unprotected status of those categorized into the stigmatized social group. A person may be unwilling to accept such a place in society. In fact, they may be motivated to create safe places because they have experienced unsafe ones (Noltensmeyer & Meisenbach, 2016). Indeed, providing a safe place for others (e.g., safer contexts for others' future disclosures) is considered a form of stigma resistance (Firmin et al., 2017). Noltensmeyer and Meisenbach (2016) illustrated the role of unsafe experiences in motivating denial strategies in the words of one respondent: "I can make it mean something to somebody else, and they can move forward and make it good for somebody else" (p. 1388).

We considered two unsafe experiences relevant to Alpha-1: intrafamily secrets and unsupportive reactions to initial disclosures. Intrafamily secrets refer to instances where some family members know information that is kept from other family members (Vangelisti, 1994). For example, a person may have no knowledge of a family history of Alpha-1 prior to testing, but discover after being tested that there is a family history of Alpha-1. Unsupportive reactions from confidants included being judged, having fights, and changing the topic (Rossetto, 2015). A common thread is that intrafamily secrets (Afifi, Merrill, & Davis, 2015) and unsupportive reactions (McLaren & High, 2015) can be painful, hurtful, unsafe experiences with negative relational consequences, such as liking or trusting the secret-keeper or confidant less. These experiences, even if they do not include stigmatization, may motivate people to create safe spaces for others or themselves. They may also lead to questioning the integrity of stigmatizers. Indeed, Thompson and Seibold (1978) highlighted that a stigmatizer always risks being seen as inhumane. For people with unsafe experiences, stigmatization is an inappropriate appeal coming from someone without ethos and should be met with denial strategies.

H2: Experiencing an intrafamily secret about a family history of Alpha-1 and unsupportive reactions to the initial disclosure of the test results predict greater use of denial strategies.

Argumentation support.

Some denial strategies entail counter-persuasion: trying to resist influence by attempting to change the stigmatizer's beliefs or actions (Meisenbach, 2010). In the SMC, Meisenbach (2010) described counter-persuasion as active argumentation (see also Bochner & Insko, 1966). Research on resisting influence suggests that those who are better able to counterargue, whether due to natural ability or better access to resources to bolster arguments, are better able to resist influence (Compton, 2013). For those with a genetic-based health condition, having a broader information network as a resource from which to learn about the condition can provide insights into prognosis and treatment, as well as reasons why stigmatization arguments are illogical or invalid (Firmin et al., 2017). A broader information network, then, bolsters one's ability to enact denial strategies by providing data to refute stigmatizers' claims (Meisenbach, 2010). Buzzanell (2010) described similar reframing through alternative logics in her description of resilience.

H3: A broader information network about Alpha-1 predicts greater use of denial strategies.

Alternative mechanism: Unexpressed obstacles.

According to the obstacle hypothesis, not all obstacles are shared with the influencer (Ifert & Roloff, 1994). Withholding obstacles can protect the relationship with the influencer (e.g., Folkes, 1982). Also, the target may prefer to end the conversation, avoid the influencer, and avoid similar future interactions, rather than navigating the potentially heated, conflicted, aggressive conversation coming after their unwillingness to comply (Ifert, 2012). In addition, sharing obstacles with an influencer can arouse unpleasant feelings, such as guilt.

Guilt is an acutely unpleasant negative emotional state (Baumeister, Stillwell, & Heatherton, 1994) caused by the appraisal that one has acted incorrectly: a "self-perceived shortfall with respect to one's own standards" (O'Keefe, 2002, p. 329). Guilt is the result of a fundamental threat to self-integrity. The feeling results in self-oriented actions to repair one's integrity, such as making amends (apology to victim) or acting in self-affirming ways (random acts of kindness; O'Keefe, 2002). People living with Alpha-1, as well as other genomic health conditions, report feeling guilt (Klitzman, 2012). For example, they report guilt about unintentionally passing the problematic genes to their children and jeopardizing their family's wellbeing as they all face potential stigmatization and discrimination (Klitzman, 2012). If people feel greater guilt when they think about Alpha-1, they may prefer to avoid talking about it, rather than navigate a fraught conversation that provides further threats to their sense of self. In this case, they may be more likely to employ SMC's (Meisenbach, 2010) avoidance strategies.

H4: Stronger feelings of guilt when thinking about Alpha-1 predict greater use of avoidance strategies (secrecy and avoiding risky interpersonal encounters).

Management in Context: Memories of Initial Disclosures

The primary goal of this study is to consider and test predictors of stigma management, with a focus on predicting denial and avoidance strategies. The deductive strategy used in the

preceding paragraphs can guide extensions of the SMC, but this strategy may fail to describe stigma management in context of other communicative acts and actors. For example, as people attempt to disclose their genetic test results, they may experience unsupportive reactions, learn of family secrets, and attempt to manage stigmatization within the same conversation. Meisenbach (2010) ended her seminal article by asking how friends or enemies enact stigma communication. A common claim in stigma management (Meisenbach, 2010) and resilience (e.g., Afifi, 2018; Theiss, 2018) is that interpersonal communication shapes how we perceive and react to stressors, such as stigmatization. To explore how stigma management and its potential predictors appear, we asked respondents for their memories of the first time they disclosed their genetic test results to someone. We explored the following:

RQ1: How do stigma management strategies and their predictors appear in recollections about the first time people disclosed their genetic test results related to Alpha-1?

Methods

Respondents and Procedures

Participants were recruited through the Alpha-1 Research Registry at the Medical University of South Carolina (MUSC). The study was approved by institutional review boards at MUSC and the authors' university. Recruitment invitations were e-mailed to registered members who were 21 years of age or older. A total of 124 registry members (79% female; 84% heterosexual) completed a survey and shared their memories of their initial test-result disclosures. Of them, 51% ($n = 63$) of respondents reported genetic tests associated with severe deficiency (e.g., ZZ, SZ), 44% ($n = 54$) reported carrier status (e.g., MZ, MS), and others reported inconclusive results (5%, $n = 7$). (As a reminder, those with a carrier status may be symptomatic; 63% of carriers in our sample reported that they were currently experiencing Alpha-1 symptoms.) Most self-identified as White ($n = 120$, 97%), which reflects the biology of Alpha-1 (de Serres, Blanco, & Fernandez-Bustillo, 2010). Average age of participants was 53 years ($SD = 14.86$, *Minimum* = 23, *Maximum* = 81). Participants varied in employment status (e.g., 54% currently employed and 26% retired); 12% had current or past military service.

Measures

Stigmatization responses.—Thirteen items (adapted from Link, Struening, Neese-Todd, Asmussen, & Phelan, 2002) were used to assess two different responses to stigmatization: *denial strategies* (educating and challenging stigmatizers, 7 items, $\alpha = .80$) and *avoidance strategies* (avoiding stigmatizing encounters and hiding the stigmata [i.e., test results], 6 items, $\alpha = .82$). Responses were marked on five-point scales (1 = *strongly disagree*, 5 = *strongly agree*).

Meaning in life.—Nine items (Peterman, Fitchett, Brady, Hernandez, & Cella, 2002, $\alpha = .92$) were used to assess respondents' sense of purpose and peace with their life. Responses were marked on five-point scales (1 = *strongly disagree*, 5 = *strongly agree*).

Alpha-1 information network size.—Respondents were asked if they had received information about Alpha-1 from sixteen different sources (e.g., genetic counselor, physician, newsletter, book). Responses were marked on two-point scales (1 = *yes*, 0 = *no*); yes responses were summed to estimate the network size (score ranged from 0 to 16).

Guilt.—Respondents were asked to reflect on the emotions they feel when they think about Alpha-1 (i.e., *Alpha-1 makes me feel...*), including guilty. We used the single item for guilty, which was marked on a five-point scale (1 = *strongly disagree*, 5 = *strongly agree*).

Intrafamily secret.—Respondents were asked two questions about their knowledge of a family history of Alpha-1: a) *When you were getting tested, did you know of a history of Alpha-1 in your family?* and b) *Did you learn of your family's history of Alpha-1 after receiving your test results?* Responses were marked on two-point scales (1 = *yes*, 0 = *no*). The combination to indicate a family secret was effect-coded. Respondents who did not know of a family history when they were tested (no to the first question) but found out afterwards (yes to the second question) were coded as having an intrafamily secret (= 1); all others were coded as not having an intrafamily secret (= -1).

Disclosure memories.—Respondents were asked, *To the best of your ability, would you tell us what you said when you shared your results? To the best of your memory, what did you say?* They were provided an open-ended box in which to recall this experience.

Unsupportive reactions to initial disclosures.—After writing about their initial disclosures, respondents were asked about three unsupportive reactions that they might have experienced from their listeners during their conversation (e.g., *he/she/they judged me*). Responses were marked on two-point scales (1 = *yes*, 0 = *no*), and were summed into one score (from 0 to 3).

Results

Descriptive Statistics

Respondents varied in their use of denial and avoidance strategies to manage stigmatization related to Alpha-1 (see Table 1). The scores for both types of strategies ranged across the continuum, from complete, strong disagreement to complete, strong agreement. On average, this sample indicated use of denial strategies ($M = 3.85$, $SD = 0.56$) and less use of avoidance strategies ($M = 2.45$, $SD = 0.80$). Of note, this sample was more likely to use denial rather than avoidance strategies, paired-sample $t(123) = 14.68$, $p < .001$, $r = -.19$. Further inspection of the data revealed that 19% of the respondents reported using both denial and avoidance strategies; only one participant reported using neither strategy.

Most respondents (mode) reported three sources for information about Alpha-1 ($M = 4.48$, $SD = 2.35$, $Minimum = 1$, $Maximum = 14$). The most common sources of information were Alpha-1 community websites (86%), health providers (76%), and general medical websites (50%). Notably, only 7% reported getting information from a genetic counselor, which was lower than receiving information from drug representatives (12%).

On average, this sample reported a moderate sense of meaning in their lives ($M = 3.76$, $SD = 0.77$, $Minimum = 1.56$, $Maximum = 5$). Respondents varied in how much guilt they feel when they think about Alpha-1: 12% agreed or strongly agreed that they felt guilt, 15% reported a neutral response, and 72% disagreed or strongly disagreed. Notably, 44% of respondents reported an intrafamily secret about Alpha-1: when they were getting tested, they did not know of a family history of Alpha-1, and only learned of an existing family history after receiving their own test results. Over half (66%) of the respondents experienced unsupportive reactions from their listeners when they first disclosed their test results.

Exploration of individual differences.—We explored whether the predictors varied by sociodemographic factors (sex, sexual orientation, current employment, current health insurance), symptomology (currently experiencing symptoms), and history variables (time since they received their test results) using chi-square, t , or correlation tests (depending on the type of variable). The exploratory tests showed that employed respondents reported greater meaning in their lives ($M = 3.94$, $SD = 0.63$) than unemployed respondents ($M = 3.52$, $SD = 0.85$), $t(121) = 9.84$, $p < .001$, $r = .27$. In addition, respondents currently experiencing disease symptoms reported less meaning in their lives ($M = 3.64$, $SD = 0.83$) than asymptomatic respondents ($M = 4.05$, $SD = 0.44$), $t(122) = 7.57$, $p < .001$, $r = -.24$. Symptomology also was associated with intrafamily secrets: of those who had an intrafamily secret about Alpha-1, 82% were currently experiencing symptoms; of those who did not have an intrafamily secret, 64% were currently experiencing symptoms, $\chi^2(122) = 4.92$, $p < .05$, $\phi = .20$. Sexual orientation also was associated with intrafamily secrets: 49% of respondents identifying as heterosexual, but only 21% of respondents identifying as non-heterosexual (homosexual, bisexual, or something else) learned about an intrafamily secret about Alpha-1, $\chi^2(122) = 4.94$, $p < .05$, $\phi = .20$. Those who had known about their test results for longer had broader information networks about Alpha-1, $t(122) = .29$, $p < .001$. There were no differences in receiving unsupportive reactions to initial disclosures or feeling guilt when thinking about Alpha-1.

Hypothesis Testing

H1–4 described five predictors (meaning in life, intrafamily secret, unsupportive reactions to an initial disclosure, Alpha-1 information network size, and feeling guilt when thinking about Alpha-1) of using denial or avoidance strategies to manage stigmatization. The hypotheses were tested simultaneously in two separate regressions: one for denial strategies and one for avoidance strategies. Both models were statistically significant, $F(5, 118) = 6.91$, $p < .0001$, $R^2 = .23$ for denial strategies, and $F(5, 118) = 5.93$, $p < .0001$, $R^2 = .20$ for avoidance strategies. The parameter estimates appear in Table 2.

As predicted, people with a greater sense of meaning in their lives (H1), who experienced an intrafamily secret about Alpha-1 and more unsupportive reactions to their initial disclosure (H2) and had a broader information network about Alpha-1 (H3) were more likely to use denial strategies to manage stigmatization. Also as predicted, those who felt stronger guilt when thinking about Alpha-1 (H4) were more likely to use avoidance strategies to manage stigmatization.

The regressions revealed whether the predictors of denial and avoidance strategies also explained the lack of use of the other strategy. Only meaning in life predicted both strategies; greater meaning in life predicted greater use of denial strategies, while weaker meaning in life predicted greater use of avoidance strategies.

Disclosure Memories

RQ1 explored how stigma management and its potential predictors appeared within the respondents' descriptions of the first time they disclosed their genetic test results to someone. To answer this research question, we used an iterative approach to analyze 124 open-ended responses (Tracy, 2013). Two researchers, independently, immersed themselves in a line-by-line reading/rereading of participants' responses to become familiar with the data. Then, researchers analyzed the responses, alternating between deductive and inductive readings to determine themes (Tracy, 2013). Key concepts and themes were first identified based on the SMC's conceptual definitions and descriptions of denial and avoidance strategies (Meisenbach, 2010), regardless of who mentioned them (the respondents or their interaction partners), and conceptual definitions of the predictors. Next, the data that did not fit into the themes generated by the SMC were examined inductively to identify additional themes. Researchers then discussed their independently derived themes using a consensus process to establish reliability by addressing any discrepancies and mutually agreeing on a final list of themes (Harry, Sturges, & Klingner, 2005). This process produced four themes, described below.

Intersecting stigmas.—Education strategies appeared in many respondents' descriptions of their initial disclosures. These strategies may be particularly salient in initial disclosure of health conditions. Education often appeared as sharing facts and informational resources pertaining to Alpha-1. Metaphors also appeared as useful means of understanding the health condition and explaining it to others. A young adult who received the diagnosis over ten years ago as a teenager recalled,

I was given a great example by my doctor many years ago which I use. I say that when you get an infection your body starts a sort of fire to destroy the infection in your lungs and then when the infection is gone, firefighters come and put out the fire though I do no[t] have enough firefighters and the fire continues to burn and destroy my lungs. That's why I get replacement therapy, to put the firefighters back into my body... I usually then have to tell them that I have never smoked a cigarette in my life (ID 600).

This example highlighted not only the educational utility of metaphors, but also the respondent's need to address the confidants' implicit assumption that their symptoms were caused by smoking. The need to address smoking presented a complex moment. It highlights the possibility of facing intersecting stigmas, with attempts to avoid association with a smoker stigma. Although the SMC (Meisenbach, 2010) presumes that people may engage in multiple strategies, such as avoidance and denial, it does not explicitly consider intersecting stigmas. In addition, the example challenges whether the respondent chose to act in ways that caused the stigmatizing condition. According to the SMC, evading responsibility, falls

into a different quadrant: accepting the self-application of the stigma, but challenging the public's understanding of it.

Education to create safe places.—In addition to addressing incorrect assumptions, education was also used to create a safe place, especially among those who had lived with years of misdiagnoses. As recalled by one respondent,

In the [six] months since I was diagnosed, only one person had ever heard of it and [they] didn't know what it was. I am telling everyone I see, speak to, email or communicate that they should get this test as quickly as possible. I am telling them, that no one seems to know about it. I called my heart dr. today for a prescription, and asked, they had never heard of it. I think the most important thing I can do now, is make people, anyone, and everyone I can, aware of this (ID 822).

This respondent's attempt to raise awareness goes beyond education for personal benefit, but to create safer contexts for others to process their genetic health risks.

Unsupportive reactions and silencing.—The respondents described many different kinds of unsupportive reactions during their initial disclosures. They recalled angry reactions, being judged for getting the test, and being symptomatic. They recalled confidants questioning the credibility of the genetic tests or medical providers. As one respondent described, "When I told my mother that I had a genetic condition known as Alpha-1 Antitrypsin Deficiency and did not have asthma, but emphysema, she told me my doctor was a quack" (ID 342).

The respondents also recalled the unsupportive reaction of changing the topic. Some experienced this from health providers. As one respondent shared, "I told the physician said I had a rare genetic condition. I had to read it off of a piece of paper, because I had difficulty remembering it. I told them he did not know much about it and he told me to read about it on the Internet" (ID 566). Topic changes by family appeared in association with attempts to influence respondents to keep the information secret from others, including at-risk family members. Memories included examples of confidants (including physicians) telling disclosers to not tell anyone else, telling disclosers to not talk to them about it again, and expressing anger about the test results being discussed at all. Some respondents who remembered such influence attempts, also recalled resisting them. As described by one respondent,

I first called my brother to tell him I have Alpha-1... he got very angry and responded that the doctors do not know what they are talking about... The second person I called was my sister and she said she did not intend to get tested because she feared if she tested positive, her job would be in jeopardy. She also told me not to tell my 22 and 26 yr. old nieces. However, I felt an obligation to tell them, so I called each one (ID 846).

Family secrets, roles, and narratives.—The memories revealed the fundamental role of family in stigma management and its predictors. Some respondents reported long-standing intrafamily secrets within their initial disclosures. For example, one respondent

revealed the family's attempt to hide the real cause of the respondent's mother's death, saying "my mother died of emphysema (they tried to cover it up, made the doctor change the cause to heart)" (ID 319).

Other memories highlighted shifts in family narratives. One respondent recalled, "We talked about the Alpha1 Foundation and also about my brother who had died in his early 40's from liver disease. The family had no knowledge of Alpha1 and assumed that he was an alcoholic" (ID 771). Some memories, though, showed the complex dynamics in family communication associated with genetic test results. As one young respondent described,

First, when I told my parents and brother I had Alpha-1 they were confused because they had never heard of it but they were also relieved because we were looking for an answer to my illness for a while. I said that I was a ZZ which means that mom and dad were most likely both carriers. My parents were shocked, my dad got upset that he was a carrier and my brother was wondering what this meant for him and for me. I said that I didn't know anything else, but the doctor had given us a lot of pamphlets and contacts for an Alpha-1 group in the area (ID 515).

This example shows the many different identity disruptions for this family and the new role for the young respondent to initiate health discussions with her family.

Discussion

The goal of this study was to extend work on SMC (Meisenbach, 2010) to identify predictors of SMC strategies through a theory of interpersonal influence: the obstacle hypothesis (Clark & Delia, 1979; Ifert, 2012; Ifert & Roloff, 1994, 1998; McLaughlin et al., 1980). The results showed empirical support for reasons why someone would be unwilling to accept the arguments inherent in stigmatization. Having a stronger meaning in life, more unsafe experiences (unsupportive reactions to initial disclosures and intrafamily secrets), and a broader information network about Alpha-1 predicted denial strategies. In addition, guilt about Alpha-1, which was considered a reason for people to not express obstacles, predicted avoidance strategies. The exploration of disclosure memories provided additional insights into stigma management.

Unwillingness to Accept Stigmatization

Communication research has progressed in recent years to examine and identify strategies used to respond to stigmatization (e.g., Meisenbach, 2010; Smith, 2007). While scholarship has offered insight into the SMC, this study was the first to identify and test predictors of specific strategies outlined in the SMC (Meisenbach, 2010). By considering stigmatization as interpersonal influence, we embraced the interpersonal and collective nature of disclosure conversations surrounding a stigmatized health condition (Meisenbach, 2010; Smith, 2007; Thompson & Seibold, 1978).

Meaning in life and guilt.—We considered stigmatization as an act of interpersonal influence. One appeal embedded within stigmatization is that of de-individualization into a social group that has no value in society. The target of stigmatization may be unwilling to accept the loss of individuality and value because that would be antithetical to their strong

sense of self-acceptance and purpose. The results showed that a greater sense of meaning in life was the strongest predictor of denial, and, to our surprise, avoiding strategies. Those who reported less meaning in life were more likely to use avoidance strategies. According to the obstacle hypothesis, not all obstacles are stated (Ifert & Roloff, 1994), since stating obstacles can arouse unpleasant feelings, such as guilt. Indeed, respondents who reported greater guilt when they think about Alpha-1 were more likely to use avoidance strategies. It is possible that those with a weaker sense of meaning in life try to protect their wellbeing by avoiding direct attacks as well. To be clear, even when obstacles are not expressed verbally, they may still be effective in resisting interpersonal influence because they may interrupt the interaction (Ifert, 2012).

Unsafe experiences.—We investigated two experiences noted as painful and unsafe: intrafamily secrets (Vangelisti, 1994; Afifi et al., 2015) and unsupportive reactions to initial disclosures (McLaren & High, 2015). We proposed that a person may be unwilling to accept a dehumanized and unprotected status in society. Indeed, people may be motivated to create safe places because they have experienced unsafe ones (Firmin et al., 2017; Noltensmeyer & Meisenbach, 2016). Our prediction stood in contrast to existing research, which investigated how negative prior interactions and disclosure conversations decreased the likelihood of future disclosures (Afifi & Olson, 2005; Afifi & Steuber, 2009). These studies found that actual or feared negative reactions to disclosures often created a cycle of concealment comprised of the pressure to conceal aspects of their identity and suppress potentially stigmatizing information (Afifi & Olson, 2005). Our prediction was supported: those who experienced intrafamily secrets about Alpha-1 and had more unsupportive reactions in their initial conversation about their test results were more willing to educate others and confront stigmatizers. Importantly, physical health topics are not typical intrafamily secrets (Vangelisti, 1994). Usually health secrets are kept by one person from the whole family, or by the whole family together (e.g., Vangelisti, 1994). The presence of intra-family secrets, an experience of 44% of our sample, is notable: intrafamily secrets are more often about taboo (vs. physical health) topics (Vangelisti, 1994). Importantly, the lack of awareness of a family history has consequences: delays in prevention, early detection, and diagnosis across a range of chronic conditions (Baptiste-Roberts et al., 2007; Parrott, Greenberg, & Hong, 2015; Qureshi et al., 2009).

The disclosure memories highlighted multiple forms of unsupportive reactions, including the appearance of topic avoidance with explicit demands that the respondents tell no one else, stop talking about the genetic test results, and stop seeing providers who believe in the health condition. The presence of avoidance strategies and advocacy by confidants stands in contrast to a study that included burn survivors' partners, who typically challenged others' perceptions of stigma (Noltensmeyer & Meisenbach, 2016). That said, the disclosure memories align with existing work on family secrets (e.g., Afifi et al., 2015; Afifi & Olson, 2005; Afifi & Steuber, 2009; Vangelisti, 1994). The use of avoidance strategies by parents could be a form of self-protection, as parents often blame themselves and feel guilty for genetic abnormalities in their children (James, Hadley, Holtzman, & Winkelstein, 2006; Klitzman, 2010). The memories may also reveal general patterns of adaptation and adjustment noted in family communication and resilience. As Theiss (2018) noted in her

essay on families and resilience, “the entire family system can respond to trauma or crisis in ways that either reinforce or unravel the ties that bind it together” (p. 10).

Of note, respondents recalled responding to silencing demands by speaking up and speaking out. None of the respondents who recalled pressure to keep the condition secret reported complying. Respondents’ reactions also could be motivated by anticipated guilt about withholding valuable genetic information, attempting to prevent other people from suffering as they have, or an unwillingness to be influenced by the unsupportive confidant. In the SMC, denial strategies are discussed primarily as a way to manage self and social stigma. Denial strategies may also be used in response to other people trying to impose different management strategies upon them. Thus, even if someone is not explicitly stigmatized by other people, the implicit arguments embedded in promoting secrecy may be enough to provoke denial strategies.

The disclosure memories included education as a denial strategy in ways similar to the education reported by burn survivors (Noltensmeyer & Meisenbach, 2016). In addition, both studies revealed education as a means to create a safe space for others. Future research should continue to consider when and why denial strategies are focused on the immediate interactants and/or a greater good.

The findings also provide an insight into memorable messages. Research shows that memorable messages motivate later behavior (Cornacchione et al., 2016); these painful, unsafe experiences may motivate disclosers to create safe spaces for others, without diminishing one’s sense of meaning in life or ability to resist stigmatization or their hope for change. Alternatively, it is possible that resilient respondents are the kind of people who feel hopeful about transforming the dialogue around health conditions (e.g., Alpha-1) and use that hope as a protective factor, allowing them to act when the opportunity arises to educate and confront stigma (Włodarczyk, Basabe, Páez, & Zumeta, 2017; Zimmerman et al., 2013).

Argumentation support.—We proposed that information networks play a supportive role in resisting stigmatizers, in that they provide support for counter-arguing. Indeed, respondents with broader information networks were more likely to use denial strategies, suggesting that information networks served as resources from which to learn about the condition, its prognosis and treatment, and reasons why stigmatization arguments are illogical or invalid (Firmin et al., 2017). The disclosure memories highlighted other features of argumentation support, including useful metaphors to explain Alpha-1 and collective efforts to broaden and deepen the information network available to respondents and their social networks. The extensive use of ‘we’ language (e.g., “we wondered,” “we knew,” “we compared,” “we just talked”) throughout the disclosure memories revealed the deeply interpersonal and collective nature of stigma, disease, and identity management. Argumentation support should be considered in future research.

Practical Implications

The findings are consistent with existing research on resilience. Resilience involves “the process of reintegrating from disruptions in life,” and is comprised of implicit and explicit attempts at creating meaning (Richardson, 2002, p. 309). Resilience research points to three

ways to bolster resistance to Alpha-1 stigmatization: affirming identity anchors, employing alternative logics (Buzzanell, 2010), and bolstering adaptation within the support system (e.g., Theiss, 2018). People who are secure in their knowledge of themselves and their relationship with their family appear to be more resilient, as they have conviction in their identity (Buzzanell, 2010) and healthy attachments (Carver, 1998). Resilience is also associated with receiving emotional support and validation through positive relational maintenance (Afifi, Merrill, & Davis, 2016; Keating, Russell, Cornacchione, & Smith, 2013). It may be useful to build interventions that encourage open communication and positive narrative building within family systems (Theiss, 2018).

There may also be reasons to target interventions for particularly vulnerable groups. In our study, unemployment and current symptoms were associated with less meaning in life. Both unemployment (Dougherty et al., 2017) and the lung and liver symptoms associated with Alpha-1 (Berger et al., 2011) are stigmatized. Together, these circumstances may create a “deeply interconnected, web of stigmas” (Dougherty et al., 2017, p. 511) that could powerfully threaten psychological wellbeing.

Buzzanell’s (2010) description of reframing through alternative logics connects to Meisenbach’s (2010) description of the utility of logical fallacies: ways of confronting stigma by providing data to refute stigmatizers’ claims, thus highlighting the error in their logic. By viewing stigmatization as a communicative act by stigmatizers to persuade a target to accept their social views, argumentation became a focal feature of stigma management and resistance. Although much attention has been paid to bolstering access to information, less attention has been paid in this research to developing argumentation skills and bolstering access to examples of logical fallacies. Teaching argumentation skills to those who are stigmatized or have the potential to be stigmatized may help them identify and produce effective counterarguments and thus, improve their ability to resist influence. Investing in argumentation as a practice may be a critical way forward to developing stigma resistance and general resilience.

Providing opportunities for advocacy may also be useful. Creating safe spaces for others allows stigmatized individuals to foster an environment of shared understanding and support (Firmin et al., 2017). Advocacy has been shown to affirm self-worth, provide a sense of accomplishment, and improve interpersonal relationships for stigmatized individuals through the receipt of support, public encouragement, and empathy (Yi & Nam, 2017). Indeed, influence research highlights how gaining support from like-minded individuals, such as friends or others who share similar beliefs or experiences with stigmatization, can be a means to resist influence (e.g., Aronson, Turner, & Carlsmith, 1963; Bochner & Insko, 1966; Kincaid, 2004).

Limitations

This study’s findings were limited by the cross-sectional design and sampling procedure. The disclosure memories highlight the ongoing nature of stigmas, stigma management, and stigma resistance (e.g., Firmin et al., 2017). The cross-sectional design of our study limited our ability to make causal claims and to investigate conversational and identity dynamics over time. For example, being able to create a safe space for someone else may bolster

someone's sense of meaning in life (Firmin et al., 2017). In addition, although the Alpha-1 research registry provided an invaluable opportunity to hear the stories of this special community, it is possible that people who enroll in registries may be more proactive in general; overall, the sample was more likely to use denial, rather than avoidance, strategies. Future research should consider other avenues to reach this community and investigate the degree to which our findings generalize to those not in the registry.

Conclusion

This work contributes to our understanding of stigma management and resisting interpersonal influence. It seems prudent to continue exploring the ways in which these two bodies of literature intersect and how they may contribute to our understanding of communication's role in resilience (Houston & Buzzanell, 2018).

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Table 1

Descriptive Statistics and Intercorrelations Among Key Variables (N = 124)

	<i>M</i>	<i>SD</i>	1	2	3	4	5	6
1. Meaning in Life	3.76	0.77	--					
2. Intrafamily Secret	-0.11	1.00	-.04	--				
3. Unsupportive Reactions	0.73	0.58	-.22	.12	--			
4. Information Network Size	4.48	2.35	.00	.03	.16	--		
5. Guilt	1.87	1.14	-.16	-.01	.09	-.13	--	
6. Denial Strategies	3.85	0.56	.23	.20	.22	.30	-.03	--
7. Avoidance Strategies	2.45	0.80	-.38	-.08	.09	-.08	.27	-.19

Notes. Intrafamily secret was coded (1 = present, -1 = not present); 44% were coded as having an intrafamily secret.

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Table 2

Regression Estimates Predicting Denial and Avoidance Strategies of Stigma Management (N = 124)

	Denial Strategies			Avoidance Strategies		
	<i>b</i>	<i>SE</i>	β	<i>b</i>	<i>SE</i>	β
Meaning in life	.21	.06	.29*	-.36	.09	-.35*
Intrafamily secret	.10	.05	.17*	-.07	.07	-.09
Unsupportive reactions	.22	.08	.22*	.02	.12	.02
Information network size	.06	.02	.26*	-.02	.03	-.06
Guilt	.02	.04	.03	.14	.06	.21*
<i>R</i> ²	.23*			.20*		

Notes. Models were statistically significant, $F(5, 118) = 6.91, p < .0001, R^2 = .23$ for denial strategies and $F(5, 118) = 5.93, p < .0001, R^2 = .20$ for avoidance strategies.

* $p < .05$

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