

FOSTERING POSITIVE RELATIONAL DYNAMICS: THE POWER OF SPACES AND INTERACTION SCRIPTS

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Despite well-accepted understanding that relational dynamics characterized by respect, openness, and connectedness are critical for healthy team functioning, we know little about how to foster such dynamics. Drawing on observation and interview data from an intervention that fostered positive change in the relational dynamics of a global distributed team, this paper theorizes the mechanisms that enabled a move toward positive relational dynamics. We find that the intervention brought about relational changes by not only creating spaces where the team could experiment with new forms of interaction, but also by utilizing “interaction scripts”—concrete guidelines for interaction that specify content parameters and participation rules. We establish that the combination of spaces and interaction scripts was critical for helping the team enact counter-normative forms of interpersonal sharing that led to the emergence of positive relational dynamics. While existing research has highlighted the importance of spaces for enabling positive relational change, this paper theorizes the complementary role that interaction scripts can play in the change process. These findings have implications for research on positive relationships at work, organizational change, and global and geographically dispersed teams.

How team members relate to one another affects how teams perform. A large body of research has highlighted how relational dynamics characterized by respect, openness, and connectedness can foster team creativity (Carmeli, Dutton, & Hardin, 2015), facilitate team learning (Edmondson, 1999), build resilience in the face of failure (Stephens, Heaphy, Carmeli, Spreitzer, & Dutton, 2013), and generate higher performance (Carmeli et al., 2015; Edmondson, 1999). Yet, we know surprisingly little about how teams can change relational dynamics in order to foster these positive outcomes.

In the present paper, we explore *how* teams can cultivate and develop what we label “positive relational dynamics,” or patterns of interaction characterized by respect, openness, and connectedness.

The authors would like to thank Jennifer Howard-Grenville and three anonymous reviewers for their helpful comments and excellent guidance during the review process. The authors gratefully acknowledge the Division of Research at the Harvard Business School for providing financial support for this research.

Using meeting observations and interviews from a 10-week intervention, we analyze how a globally distributed team moved from interactions characterized by mistrust, minimal communication, and disconnection to interactions characterized by respect, openness, and connectedness.

The intervention had team members set aside dedicated time each week to meet (both as a full group and in dyads). In addition, the intervention provided concrete guidelines for team members to engage in interactions designed to promote sharing about personal lives and current work challenges. Leveraging work that has established the importance of spaces, or bounded social settings, for enabling social and organizational change (Bucher & Langley, 2016; Howard-Grenville, Golden-Biddle, Irwin, & Mao, 2011; Kellogg, 2009; Polletta, 1999), and drawing on the notion of organizational scripts, we conceptualize the intervention as consisting of both spaces and a type of script that we call an “interaction script.” Interaction scripts are concrete guidelines for interaction that specify content parameters and participation rules for interaction. Our

observations suggest that the combination of the spaces and interaction scripts of the intervention enabled individuals on the team to experiment with new and socially risky forms of interpersonal sharing and was key to fostering positive relational dynamics between team members.

We unpack how the combination of spaces and interaction scripts engendered new ways of relating built on respect, openness, and connectedness. In the early weeks of the intervention, we observed the team enacting counter-normative forms of personal and work-related sharing, guided by the interaction scripts and supported by spaces. In the latter weeks of the intervention, we observed the team enacting the scripts with more disclosure and honesty while simultaneously adapting the scripts in ways that furthered the development of positive relational dynamics. We theorize how spaces and scripts work together to facilitate change: while spaces create an opening for new dynamics to emerge, interaction scripts specify and legitimate new forms of interpersonal sharing that can foster the emergence of positive relational dynamics.

RELEVANT LITERATURE

Positive Relational Dynamics in Teams

We draw on the literature on positive relationships at work to conceptualize the changes in the team we observed (e.g., Dutton & Ragins, 2007). While no universally shared definition exists as to what constitutes positive relationships at work, a large corpus of scholarship has emphasized the importance of respect (Carmeli et al., 2015; Dutton, 2003), openness (Eisenberg & Witten, 1987; Rogers, 1987), and connectedness (Dutton & Heaphy, 2003; O'Reilly, Caldwell, & Barnett, 1989).

"Respectful" interactions refer to those actions that confer a sense of value and worth to others (Carmeli et al., 2015: 68). Substantial scholarship has documented the lack of respect in workplace interactions, such as incivility, abusive supervision, public criticism, or rudeness (Andersson & Pearson, 1999; Liu, Liao, & Loi, 2012; Sutton, 2007). Respectful interactions, on the other hand, place value on others' perspectives by listening empathically (Dutton, 2003), fostering inclusivity (Blatt & Camden, 2007; Nembhard & Edmondson, 2006), and affirming and supporting others (Carmeli et al., 2015). In addition to promoting greater feelings of worth, respectful interactions have been linked to positive identity formation (Rogers,

Corley, & Ashforth, 2016), reduction of status differences (Phillips, Rothbard, & Dumas, 2009), increased group creativity (Carmeli et al., 2015), and faster error detection (Vogus, 2004; Weick, 1993).

"Openness" in interactions refers to candid and frank communication of issues and feelings at work and encompasses both task-related and personal dimensions (Eisenberg & Witten, 1987). Task-related openness involves the sharing of work issues, especially across hierarchical lines. Scholars have investigated this phenomenon across a number of streams of research, including employee voice (Morrison, 2011), issue selling (Dutton, Ashford, O'Neill, & Lawrence, 2001), superior-subordinate communication (Jablin, 1979), and critical upward communication (Tourish & Robson, 2006). Personal openness can range from engaging in casual social interactions in the workplace (Bowen & Blackmon, 2003) to disclosing personally sensitive information or feelings (Creed, 2003; Phillips et al., 2009). While personal openness at work does not assume intimate disclosure, it does presume some level of personal sharing, social interactions, and emotional expression.

Openness at work has been shown to have positive impacts on a variety of collective and individual level outcomes. For instance, openness in task-related communication has positive impacts on learning and improvement (Detert & Burris, 2007; Dutton et al., 2001; Edmondson, 1999), decision-making (Morrison & Milliken, 2000), group performance (Edmondson, 1999; O'Reilly & Roberts, 1977), and individual health (Cortina, 2008). Openness and disclosure of personal matters has also been shown to improve interpersonal relationships (Collins & Miller, 1994) and to reduce status and power differentials, and, in doing so, enhance feelings of empowerment (Ashcraft, 2000; Phillips et al., 2009).

"Connectedness" refers to the strength and quality of relationships between individuals. Dutton and Heaphy (2003) conceptualized the quality of a connection as a function of the amount and range of emotions expressed, the ability for a relationship to withstand stress and strain, and its ability to open new possibilities for action and creativity. These scholars view connectedness as manifesting in feelings of mutuality, positive regard, and vitality. Earlier research on groups studied connectedness under the guise of constructs such as social integration and cohesion, which was defined as the degree to which individuals in a group are "psychologically linked" or "attracted" to one another (O'Reilly et al., 1989; Shaw, 1981). Benefits of connectedness include better health (Dutton & Heaphy, 2003), the

attainment of valued information and resources (Burt, 2000), development of positive new identities (Ibarra, 1993), and improved coordination (Gittell, Seidner, & Wimbush, 2010).

While respect, openness, and connectedness are three distinct dimensions of what we label “positive relational dynamics,” these dimensions have been shown to be deeply intertwined and mutually reinforcing. For example, respectful interactions between group members encourage speaking up (Nemhard & Edmondson, 2006) and lead to feelings of greater connectedness (Carmeli et al., 2015). Open and frequent communication about work and personal matters can foster greater attraction between group members (Collins & Miller, 1994) and serve as a sign of mutual regard (Carmeli et al., 2015). Feelings of connectedness enable people to speak openly (Carmeli & Gittell, 2009; Edmondson, 1999) and are the foundation for respectful interacting (Dutton & Heaphy, 2003). Scholars of positive relationships at work emphasize the cyclical and self-reinforcing nature of interactions characterized by respect, openness, and connectedness: “Positive relationships in groups and communities are created through ongoing, self-perpetuating, and mutually reinforcing acts that both offer and generate positive energy among their members” (Kahn, 2007: 281).

Despite the self-reinforcing nature of positive relational dynamics, they can be difficult to foster. Status and power differences that pervade organizations can undermine mutual respect and encourage individuals to regard others as “less than” (Galinsky, Magee, Inesi, & Gruenfeld, 2006; Kipnis, 1972). Speaking openly about personal or work-related matters requires navigating complex social norms governing when and how to communicate such information and can lead to social sanctions when such norms are violated (Chaikin & Derlega, 1974; Detert & Edmondson, 2011; Morrison, 2011). Connecting with others at work often involves overcoming dominant, institutionalized norms of impersonality (Ashcraft, 2000; Martin, Knopoff, & Beckman, 1998) and organizational politics that foster competition rather than cooperation (Mayes & Allen, 1977).

While research has explored the antecedents of positive relational dynamics (e.g., Baker & Dutton, 2007; Nemhard & Edmondson, 2006; Vogus, 2004), there is strikingly little empirical work on how positive relational dynamics emerge in the course of everyday team interactions. Several scholars have noticed this lack and called for empirical research to explore this question (Dutton & Ragins, 2007; Edmondson & Lei, 2014). The research presented

here takes up this challenge by providing empirical insight into the microdynamics of change as one team began to develop positive relational dynamics. In theorizing this empirical story, we draw on two different analytical constructs: spaces and scripts.

Spaces as a Vehicle for Relational and Organizational Change

One construct that has been shown to play an important role in organizational change, including relational dynamics in groups, is the notion of “spaces.” Scholars studying how to foster effective group dialogue emphasize the importance of creating spaces that can enable people to actively listen, respect one another, suspend judgments, and speak honestly (Bohm, 1990; Isaacs, 1999; Senge, 1990). Referred to as “containers,” “holding spaces,” or “vessels,” such spaces are conceptualized as social settings separated by physical and symbolic boundaries from everyday work engagements where “creative transformation can take place” (Isaacs, 1999).

Spaces, or bounded social settings, have been shown to play an important role in fostering change in organizations. In explaining why one hospital successfully implemented an institutional mandate around reducing resident hours and another hospital did not, Kellogg (2009) theorized the importance of “relational spaces” in enabling potential reformers to mobilize, connect, and develop strategies to enact organizational change. In another study of changing institutionalized logging practices in the forestry industry, Zietsma and Lawrence (2010) emphasized the creation of “experimental spaces.” These spaces allowed representatives with different goals and perspectives (timber companies, local residents, and environmentalists) to try out new ways of working shielded from institutional pressures. In a study of routine change made at two hospitals, Bucher and Langley (2016) found that the existence of two different types of spaces—reflective and experimental—enabled hospitals to implement new complex medical routines. Furnari (2014) theorized the role of “interstitial spaces”—or social settings where members of different institutional fields come together to interact—in facilitating the emergence of new practices. Finally, in a study of a successful initiative to bring a sustainability focus into a for-profit enterprise, Howard-Grenville and colleagues (2011) theorized the importance of liminality in enabling the development and incorporation of new cultural repertoires into the dominant organizational

culture. Their notion of liminality, a process they label as “bracketing the everyday,” closely echoes the concept of spaces in other studies.

Thus, spaces have been identified as important enablers of a variety of types of change in and across organizations. Throughout these studies, spaces are characterized by their separation from team, organizational, or institutional norms and dominant modes of working. This separateness comes from physical, temporal, social, and/or symbolic boundaries, and is theorized to reduce the salience of existing norms and patterns of interaction while fostering reflection, experimentation, and risk taking (Bucher & Langley, 2016; Furnari, 2014; Zietsma & Lawrence, 2010).

However, while spaces have been shown to enable new dynamics to emerge, understanding why and how particular dynamics emerge in spaces remains under-theorized. To highlight this point, Furnari (2014) argues that, while spaces can support the emergence of new practices, they cannot, on their own, explain the emergence of new practices. Furnari (2014: 441) wrote:

The very same features of interstitial spaces that facilitate the initial emergence of new activities and ideas hinder their constitution into new practices . . . the inherently transitional nature of interstitial spaces means that the new activities and ideas that are tried out in these settings may easily “get lost,” thereby making difficult their repetition over time and the formation of the shared meanings that are necessary for them to be constituted into new practices.

Polletta (1999) makes a similar argument about the role of spaces in the social movements literature. She contends that, while scholars have highlighted the important role of “free spaces” in enabling social change, “the free space concept simply posits a ‘space’ wherein those dynamics occur, without specifying how, why, and when certain patterns of relations produce full-scale mobilization rather than accommodation or unobtrusive resistance” (Polletta, 1999: 8).

To better understand how the intervention facilitated the emergence of the relational dynamics that we observed, we further draw on the construct of scripts.

Scripts in Organizational Studies

Borrowing from the field of social cognition, scholars have used the notion of “scripts” to explain how people develop a shared understanding around

how to act and behave in organizations. According to these theorists, scripts are internalized cognitive schemas that direct individuals as to the appropriate behavior for specific organizational situations or contexts (Abelson, 1981; Ashforth & Fried, 1988; Gioia & Poole, 1984; Lord & Kernan, 1987). According to this work, scripts exist in common interactive processes such as formal meetings or board presentations as well as task processes such as production or go-to-market routines. Scripts can be either weak or strong, depending on how much detail is specified in the script (Gioia & Poole, 1984; Lord & Kernan, 1987). For example, a weak script might specify expectations of behaviors, and a strong script would specify both expectations of behavior and also the sequence of events (Gioia & Poole, 1984).

Scripts serve several functions that are relevant to these data. First, scripts legitimate behaviors within organizations. The content of scripts aligns with the expectations of those in power and thus reinforces norms around acceptable behavior (Ashforth & Fried, 1988). Scripts also provide a guide of what behavior is appropriate in a given situation, helping newcomers to become socialized into an organization’s way of doing things (Ashforth & Fried, 1988; Gioia & Poole, 1984). Finally, scripts conserve cognitive capacity by supporting automatic enactment of desired behaviors (Ashforth & Fried, 1988).

We find the concept of scripts to be useful for understanding the microdynamics of change observed in this study. Not only did the intervention create spaces for new behaviors to emerge, but it also included concrete guidelines for how interactions should proceed within the spaces of the intervention. These guidelines functioned like a script, providing parameters around the content and sequence of the interactions and reducing the uncertainty and risk associated with interactions that were counter-normative for the team.

While we found scripts to be a useful lens for understanding the change process that we studied, there are important distinctions between the scripts provided by the intervention and the notion of scripts found in the organizational literature. First, in contrast to the traditional understanding of scripts that operate in repetitive situations and socialize people into dominant organizational norms, the scripts in our study were used in novel situations and served as a source of experimentation and change. Second, whereas scripts in the literature are often taken-for-granted and understood implicitly by organizational members, scripts in our study were explicit, communicated as instructions throughout the

intervention. Third, while organizational scripts center around task-based routines, such as annual review processes or manufacturing workflows, the scripts in our study focused exclusively on guiding interactions. As a result, we distinguish the scripts in our intervention from the notion of scripts in the existing organizational literature by referring to them as “interaction scripts.”¹

RESEARCH SETTING

We studied a technology consulting team that worked in the health care industry within the technology consulting arm of TaxCo (a pseudonym), a large professional services firm employing over 100,000 people. This distributed global team was responsible for building the data warehousing and reporting functions for a client headquartered in the Northeastern United States.

The team itself consisted of six people in the United States and eight people in India. One U.S. team member was based at the client site for the duration of the project. Another U.S. team member was based in California and rarely traveled to the client site. The remaining four U.S. team members worked remotely from three different cities in the Northeast and traveled every two to three weeks to the client site. The eight members in India were based in four different offices throughout India. Four Indian team members were based in Bangalore, two were based in Delhi, one in Mumbai, and one in Hyderabad.

In addition to the senior partner, the team in the United States also included a partner, a senior manager (who was the overall project lead), and three managers. The team in India comprised one senior manager, one manager, and six engineers. As is evident from the team organizational chart (Figure 1), a clear hierarchical divide existed between the team members in the United States and those in India. The Indian team members, aside from the senior manager, were more junior and responsible for most of the coding and testing work.

The U.S. team members were predominantly managers, responsible for client communication, project management, technical design, and oversight.

The senior partner overseeing the team volunteered the team to participate in an intervention to improve team effectiveness. For two weeks prior to the intervention, we conducted on-site interviews in the United States and India to understand the issues facing the team. The initial focus of the intervention was to target work–life challenges on the team, and it quickly became clear during the first two weeks of fieldwork that “work–life challenges” meant very different things for the U.S. team members than it did for the Indian team members. The U.S. team members questioned the commitment and work ethic of their Indian colleagues, and they feared that, if they were not available to help, their Indian colleagues would sit idle. As a result, the U.S. team members felt overwhelmed by the volume of work and responsibility to always be available. In contrast, the Indian team members’ discontent stemmed from feeling unappreciated and underutilized. They complained that their U.S. managers gave them only low-level work, did not provide adequate client exposure, and generally treated them as doers rather than thought partners. Thus, U.S. team members felt that their work–life challenges stemmed from never being able to disconnect from work, while Indian team members felt that their work wasn’t satisfying and this dissatisfaction translated as a “work–life challenge”.

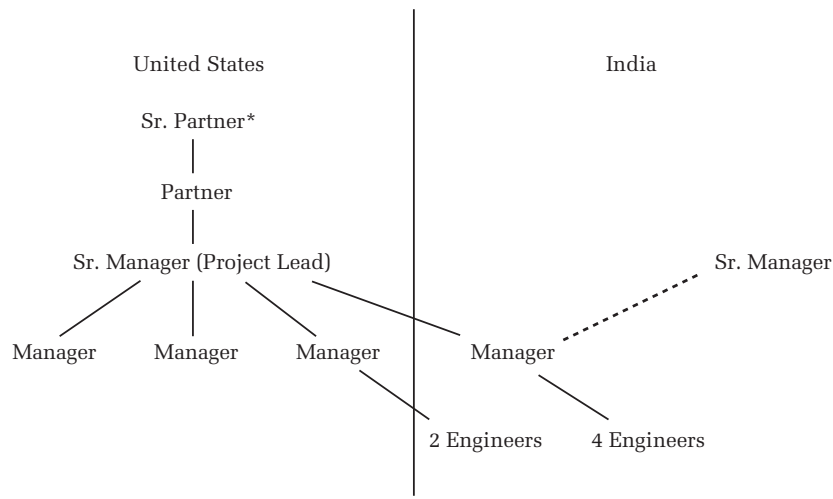
In response to these insights, the intervention was established. The intervention aimed to help team members work more effectively together so that they could share work in new ways. The hope was that, if the Indian team members could share more of the workload, the U.S. members would not be so overwhelmed and the Indian members would feel more satisfied in their work. The intervention consisted of two components: “collaborative work time” (“CWT”) calls and weekly “pulse check” meetings.

CWT

The first component of the intervention involved weekly one-on-one calls between junior and senior team members. These calls were structured to help the team members get to know each other better as humans and colleagues, with the hopes of sparking new forms of collaboration. Team members were instructed to spend the first 15 minutes of their one-hour call getting to know each other personally. The remaining 45 minutes of the call were to be spent

¹ We also distinguish our notion of script from the Goffmanian notion of script. For Goffman and others, scripts are the recurrent activities and patterns of action characteristic of a given setting that provide the basis by which individuals reproduce the institutional and interactional order (Barley & Tolbert, 1997; Goffman, 1983). Unlike Goffman’s concept of scripts, which are preexisting, implicit, and taken for granted, interactions scripts are novel, explicit, and not encoded cognitively.

FIGURE 1
Team Structure



*Not involved in day-to-day operations of the team.

collaborating on a “non-routine task.” The task was framed as work that built skills or knowledge, giving the Indian team members exposure to more intellectually stimulating work and giving the U.S. team members more knowledgeable, better-engaged thought partners. Most weeks, the six junior team members, all in India, were expected to choose managers they wanted to speak with and initiate scheduling the call.

Pulse Checks

The second aspect of the intervention asked the entire team (i.e., all 13 members) to hold a weekly, 90-minute, mandatory team meeting. The goal of these meetings, called “pulse checks,” was to create an opportunity for the entire team to engage in meaningful discussions about work challenges. To facilitate these conversations, team members were asked to respond to a set of four questions while in the meeting:

“How are you feeling?”

“How valuable is the work you are doing?”

“How satisfied are you with your learning?”

“Is your operating model sustainable?”

Facilitators provided four response options in the form of cartoon faces that ranged from smiling to crying. When given a prompt by the facilitator, each team member would take turns responding to the four questions in a round-robin format. They would identify which face represented their feelings around each question and provide an explanation for why

they had chosen that face. After each person provided their ratings and explanations, others were asked to comment. Throughout the pulse check meeting, the discussion would evolve organically as team members surfaced other issues and teammates tried to address issues that were raised.

Both the CWT calls and pulse checks operated as spaces, in that they were bounded social settings temporally and symbolically separated from the everyday work of the team (Bucher & Langley, 2016; Howard-Grenville et al., 2011; Kellogg, 2009; Zietsma & Lawrence, 2010). In conjunction, both the CWT calls and pulse check meetings contained interaction scripts. We define interaction scripts as guidelines for interaction that include *content parameters* such as topics for discussion, *conversation prompts*, direct questions to respond to, and response options, and *participation rules* such as who speaks, for how long, and in what order.

Facilitation

The four facilitators—the third author and three other individuals—took a role that bridged research and practice, taking extensive field notes regarding the team’s interactions and conducting interviews, while also helping implement the intervention. The third author both collected data and acted as overseer of the facilitation team. In the three early pulse checks, one of the facilitators led the team through the pulse check questions. In weeks 4 through 6 and in week 8, team members themselves led these

discussions and facilitators were present to observe the conversation. After the first week, one facilitator was based in India, spending a week at a time at each of the four different locations where the Indian team members worked. The other three facilitators spent time on site at the U.S. location, with at least one of them on site each time the U.S. team collocated (every two to three weeks).

METHODS

Data Collection

The facilitation team served as the data collection team, gathering qualitative data over the course of 12 weeks (two weeks prior to the intervention plus the 10-week intervention). All members of the facilitation team were trained in ethnographic data collection by the third author, who also oversaw all aspects of data collection. Short interviews (generally lasting 15–30 minutes) were conducted each week with most members of the team and were scheduled based on team member availability. Interviews were semi-structured and included questions such as “How are you feeling about your work?” and “What was your experience this week with the intervention, both in the one-on-one CWT calls and in the previous week’s pulse check?” In addition, individual interviews were conducted at the end of the intervention with each team member (lasting 30 to 60 minutes) to capture each person’s reflections on his or her experience with the intervention. In total, 127 interviews were conducted during the 12 weeks of the study. Weekly interviews were not taped but field notes were written up immediately following each interview. The interviews at the end of the intervention were captured via detailed notes taken by facilitators.

In addition, facilitators observed the following meetings: an initial team meeting in which facilitators discussed the issues that the team was facing, 10 pulse check meetings, two small-group CWT calls in week 7 of the intervention (described in more detail below), and occasional work meetings that were not directly related to the intervention (e.g., sprint retrospective meetings). In total, 15 meetings were observed during the course of the study. All pulse check meetings were transcribed by facilitators while the occasional work meetings that were observed were captured via detailed field notes.

Finally, email communications between members of the facilitation team and between facilitators and team members were saved as archival data. Emails included those sent throughout the intervention as

well as discussions between members of the facilitation team about how the intervention was going.

Data Analysis

The facilitation team came into the research project with an interest in work–life challenges. However, the ways in which people’s lives outside of work were or were not affected by the intervention were not salient in these data. Instead, what was most striking about the intervention was a shift in how teammates interacted. As a result, the facilitation team, led by the third author, focused its analysis on communication patterns and interpersonal dynamics within the team. They wrote two different forms of descriptive memos in the initial phase of analysis—detailed empirical descriptions of each team meeting and CWT call, and an annotated timeline of the entire team with reflections on what happened on a week-by-week basis with key milestones and empirical description woven into the team overview.

At this stage, the first and second author (neither of whom participated in the facilitation or data collection) were brought onto the project to bring an independent perspective to data analysis and mitigate insider bias. Using the techniques of grounded theory building (Charmaz, 2006; Strauss & Corbin, 1998), the first author conducted independent iterative textual analysis and open coding of the primary data—the interview notes, meeting transcripts, and archival data—as well as a review of the descriptive memos produced by the facilitation team. The goal of this exercise was to reexamine the data with a fresh perspective in order to understand the nature of the changes in the team’s interpersonal dynamics and how these changes emerged.

Based on this analysis, the first author wrote a series of analytic memos and shared them with the other two authors. The first series of memos revisited the primary data, in order to explore the nature of the changes that occurred within the team. The data that had been coded as “team changes” were reanalyzed and dimensionalized into subthemes such as “getting to know each other as people” and “more open discussion of work issues.” Together, the three authors then went back to the literature to contextualize the changes observed in the data and iteratively honed in on the notion of positive relational dynamics as a general category for capturing the changes observed.

The second set of memos focused on understanding how the changes in relational dynamics emerged through the course of the intervention. Categories

such as “structured conversational guidance” and subthemes such as “asking for more specific help” emerged through the open coding exercise. From this process, it became clear that the guidelines for interaction that had been introduced in both the CWT calls and pulse check meetings played a key role in changing team dynamics. These memos also interrogated the nature of the guidelines provided by the intervention. Through this analysis, and conversation between all three authors, the distinction between “content parameters” and “participation rules” emerged. This distinction, in parallel with reviewing literature on organizational change and organizational scripts, helped us hone in on spaces and interaction scripts as key constructs for understanding how positive relational dynamics emerged throughout the intervention.

These insights became the cornerstone of the next stage of our analysis in which we reanalyzed every CWT call and pulse check meeting through the lens of spaces and interaction scripts. This analysis, in conjunction with examining the literature on spaces, provided insight into the key mechanisms by which interaction scripts and spaces facilitated the enactment of counter-normative ways of speaking and acting and led to the emergence of positive relational dynamics.

In the final stage of analysis, we sought to link the emergence of positive relational dynamics in the early weeks of the intervention with the overall changes that we observed by the end of the intervention. Going back to earlier memos and the primary data as necessary, we induced aspects of the change process as a whole—such as the positive response of other team members, the increased energy and engagement of the team members, and the adaptation of scripts—that were key to understanding how the initial momentum of change grew over time. These insights led directly to the development of our theoretical model and the notion of a feedback cycle embedded within it.

FINDINGS

As the data below suggest, when facilitators first met the team, relational dynamics were characterized by a lack of respect, openness, and connectedness. The lack of respect on the team manifested as distrust and negative assessments of one another. U.S. team members described their Indian counterparts as “lazy” and “unaccountable.” One U.S. manager, who was from India originally, described the lack of respect that the Indian team members

experienced from other U.S. team members with even more poignant language: “The Indian team are humans, not robots. And it is important for the U.S. team members to understand that. [The Indian team members] are not treated as people.”

The lack of openness on the team was evident in communication patterns that hewed to strict hierarchical speaking rules and a general sense that U.S. members spoke and gave directions while Indian team members received direction and executed tasks. The project lead, who was based in the U.S., remarked that the U.S. members had not engaged the Indian members beyond requesting concrete tasks: “We have pushed [the Indian team members] into a box and they are living very comfortably in it.” An Indian engineer described a “parent–child” dynamic between the U.S. and Indian team members in which the U.S. members would funnel only the barest of needed information to the Indian members. Another Indian engineer said, “[The intervention] will give a lot more perspective to them and to us. Right now, there is a disconnect.”

A lack of connectedness characterized both the relationships across the India–United States divide and relationships within the local teams. Team members engaged in minimal interaction beyond what was necessary for completing the work. The U.S. team members met on-site at the client’s headquarters once every two or three weeks. Even during the limited time they were together, they made little effort to interact socially. They did not go out to lunch or make small talk in the conference room where they were “camped” out. The Indian team members had similar practices. At the Bangalore site, four team members were based in the same building but sat on different floors and rarely interacted face to face. They would even call into team meetings from their individual desks. One of the engineers in Bangalore said, “We don’t have lunch together . . . It is simply a work relationship.” Such a dynamic was not unusual at TaxCo. Reflecting on the social norms governing teams at TaxCo, an Indian engineer said of the team, “We don’t talk about the personal things, things to get to know each other. In the onshore/offshore model, we just talk about the work.”

In the two weeks of engagement and planning prior to the introduction of the formal intervention, the facilitators observed firsthand some of the dynamics on the team. Though everyone in the team was encouraged to speak up to provide input on the goals of the intervention, U.S. team members dominated the conversations. Indian team members were willing to discuss issues they were facing in their jobs

when speaking one on one with facilitators, but, when the team met together, they would remain silent, not bringing these issues to the attention of the team. When speaking with facilitators, Indian team members would often express curiosity about the U.S. team members and their personalities. In contrast, U.S. team members expressed no interest in the Indian team members as individuals. Instead, U.S. members were focused on how much work their counterparts were doing and questioned how they spent their time.

Early Weeks of the Intervention: Trying on New Ways of Interacting

In the section below, we describe how, in the early weeks of the intervention, the spaces and interaction scripts of the intervention set the stage for the team to interact in new ways. Team members made tentative steps toward getting to know each other personally and airing work challenges. However, team members were often uncomfortable as they enacted the interaction scripts. There was a sense of people “trying on” new forms of interaction in the face of perceived social risk.

Trying on new ways of interacting in the CWT calls: Sharing personally. As described above, CWT calls comprised both a space and an interaction script. As dedicated times when team members were to interact in counter-normative ways, the CWT calls operated as spaces that were separated temporally and symbolically from everyday norms and patterns of interaction. The CWT calls also contained guidelines for interaction with content parameters—the injunction to get to know each other personally and collaborate on work—and participation rules—the specification that a junior and senior team member were to spend 15 minutes talking about personal topics and 45 minutes on a collaborative task. Together, the content parameters and participation rules formed an interaction script that enhanced the symbolic separation of the 60-minute spaces of the CWT calls and provided direction to team members on how to engage within these spaces.

When the concept of the CWT calls was introduced, team members were both excited about the prospect of having personal conversations with each other and nervous about what such interactions might be like. As soon as the intervention was described, several members expressed a concern that the instructions to “get to know each other personally” were too vague and asked for additional support on how to have these conversations with each

other. For example, in the first pulse check, a U.S. manager remarked about the prospect of having the CWT calls

I know we have been talking about the collaborative time, but do we have any parameters or guidance on the type of [personal] conversations we should be having? . . . I know we are career oriented and career driven, but I think it's equally important to invest in [the personal component].

Another U.S. manager said, “I think in the beginning it would be good to have guidance on the personal conversations.” An Indian engineer agreed with this request, saying that “The [Indian team] is not used to this.”

As a result of the expressed discomfort, the facilitators sent out weekly emails in the first five weeks of the intervention with suggested topics, in the form of explicit conversation prompts, that people could use to jumpstart the personal portion of the CWT call. For example, in the second week of the intervention, the facilitators sent out the following list in an email to the entire team:

In case you would like something to guide the 15 minutes of relationship building, I have included a few questions to get you started:

- Is there a story behind your name? Does your name mean something?
- How many siblings do you have? Are you the oldest, middle, youngest, or only child? Who are you closest to in your family?
- What is one thing about you that people would be surprised to learn?
- What is the best piece of career advice you have ever received?

In each following week, a different set of prompts were sent out by the facilitators. In week 4, the following email was sent:

Hi all,

As you schedule your Collaborative Work Time for the week, here are some questions for getting to know your collaboration partner:

- Where did you grow up? Do you still live close to that place?
- What did you study in university?
- How did you get into technology consulting?

Looking forward to hearing how this week's conversations go.

The request for more guidance on how to have personal conversations reveals just how counter-normative these new interactions were and how the specificity of the guidelines for interaction supported the enactment of these new behaviors.

The injunction to get to know each other personally had its desired effect: after engaging in CWT calls for just a few weeks, people reported that they were getting to know each other better as people, not just as coworkers. In order to allow for the emergence of a new interpersonal dynamic, the facilitators did not ask to listen in to these one-on-one calls. However, the energy and excitement that came from these personal interactions was palpable. For example, after her call in week 4 with the U.S. project lead, an Indian engineer commented to one of the facilitators, “Do you see the smile on my face?” The facilitator described in her notes:

[The Indian engineer] said it was a great call, that they had had a really wonderful conversation about where they are from, their career paths, their families, Bangalore . . . they talked a bit about the current project, but it was mostly a chance to get to know one another. [The engineer] was very, very happy about the call.

Similar positive sentiments were expressed across the team. A U.S. manager said, “[The Indian engineer] and I had a really good session. It was the first time we really got to know each other.” After speaking with the Indian manager in week 3, another U.S. manager reflected how important it was to get to know his counterpart and to learn that his wife would be having a baby soon (which he had no idea of until this call). Another Indian engineer had a conversation with a U.S. manager in week 3 in which they went beyond the original directive and chose to spend the entire call getting to know each other. Reflecting on the call, this engineer said with surprise, “It’s easy and comfortable to talk about things with [the US manager] . . . The personal connection with people makes it easier to talk about things related to work.” The U.S. manager described the same conversation as oriented around “how the team is going, our families, where we are from,” and reflected how “the conversation was more open in work and personal discussions.”

While the CWT calls’ interaction scripts provided guidance to team members on how to interact within the spaces of the calls, the scripts still allowed for unspecified interactions to emerge. For example, the conversations in CWT calls in the early weeks also included discussion of people’s desires for growth and professional development. In week 3, one of the

engineers in India reported having a “great conversation” with a U.S. manager in which he shared that he was interested in doing more technical work besides documentation and the manager suggested that the engineer could help her with data modeling. The U.S. manager reflected on the same conversation: “It was the first time we really got to know each other. I learned about his background and the technical exposure he wants to get.” These conversations about professional growth were perceived as valuable by Indian and U.S. team members. The fact that they emerged organically reveals that scripts guided conversations without fully specifying what was said, leaving open the possibility for unspecified interactions to emerge that supported positive relational dynamics.

Thus, in the first few weeks, the spaces and interaction scripts of the CWT calls guided team members in engaging in new forms of interaction centered around personal sharing. Notably, the personal sharing in the CWT calls was reciprocal, as both junior and senior members of the team were sharing with each other.

Trying on new ways of interacting in the pulse checks: Sharing work challenges. Like the CWT calls, the pulse checks comprised both a space and an interaction script. The dedicated time set aside for each week’s pulse check, as well as the presence of external facilitators, signaled to team members that what was to occur in the pulse check was separate from everyday routine interactions. Interaction scripts further enhanced the symbolic separation of the 90-minute spaces and guided the substance of the conversation within them. Four specific question-and-answer prompts (or content parameters) were provided to foster sharing and encourage the discussion of work challenges. The participation rules—the round-robin format—aimed to develop a more balanced and egalitarian speaking dynamic. Notably, both the content and the format of these interactions were non-normative for this team.

In the early pulse checks, we observed both junior and senior members of the team responding to the pulse check questions by sharing their difficulties and work challenges. Given the “chin up,” positive attitude often projected by the U.S. managers prior to the intervention, the presence of negative responses to the questions was noteworthy. An Indian engineer who was new to both TaxCo and the project was completely overwhelmed in trying to come up to speed. The team, however, had no idea about her struggles. When it was her turn to speak up in the first pulse check, she appeared visibly emotional to those

in the room with her and responded to the pulse check question about the team's operational sustainability by saying, "Learning: there is so much learning, I am probably stretching to my limit, I probably can't do this forever—I can't sustain this pressure for very long." Such openness immediately humanized the engineer and affected others on the team. A U.S. manager turned to the facilitator sitting next to him with clear concern in his eyes and said, "She sounds like she is going to cry. I need to talk to her."

The team's response to this disclosure was as notable as the disclosure itself. A U.S. manager immediately suggested that the team help take some of the deliverables off the Indian engineer's plate while she comes up to speed on the technologies. Later in the pulse check meeting, the U.S. project lead said of the new Indian engineer's struggles:

We need to make the expectations clear. Give her some time not only to understand the project, but the technology and the role. Give her some time to get familiar—assign tasks wary of the fact she is not on the same level.

After the pulse check, several team members took it upon themselves to reach out to this engineer in order to help. A U.S. manager called her to discuss how to prioritize her time. These efforts made a real difference; the following week, the Indian engineer expressed that she was doing much better and that her manager was giving her more manageable tasks: "He is honest with me and tells me what he's giving me three days to do would take him one day . . . I work at ease, I feel no pressure, I understand what I am doing."

Another Indian engineer, who had worked at TaxCo for a few years but was new to this project team, was also struggling because the work on this team did not align with his expertise. In his first pulse check, he said, "How valuable is my work? 'Frowning' to 'crying.' I'm not aligned with what I need." At the end of the meeting, the U.S. project lead tried to allay some of his concerns:

[Directed to the Indian engineer:] You come from a different technical practice. You are moving away from your technology from the past and concerned about growth. The reason we brought you here is you came highly recommended in Oracle—we are very, very appreciative—a lot of it you can take it back to Oracle practice. Some of the concepts work here—it should be a win/win. We'll try to assign you work that helps. In my opinion, it shouldn't be a complete shift.

In the second pulse check, a different Indian engineer answered the pulse check questions with striking honesty. She described the frustrations that arose from sitting idle while waiting for code to be delivered for her to test. This lack of a smooth work stream created a great unevenness in her workload:

"How am I feeling?": Between "accepting" and "frowning." This week is okay . . . the way Agile is, my work will not be easily distributed over three weeks. . . . "How satisfied am I with learning?": Between "accepting" and "frowning." I'm learning from a testing point of view [but not in other ways]. It's not working very well for me right now. "Operating model": "Accepting" to "frowning." [Two other Indian engineers] both have their own set of responsibilities. I don't have a backup person or a plan in place right now. I'm trying to bring them up to speed on the testing process, but they have their own set of responsibilities as well. It will take some time.

Beyond eliciting honest negative feelings about how the work was going, which would have been taboo prior to the intervention, the pulse check meetings became a space where team members, particularly managers, heard about issues facing individual team members and the team as a whole. The degree to which managers responded to these surfaced issues in an empathetic and productive fashion was notable. For example, after this engineer spoke up about her uneven workload, the U.S. project lead immediately began to address her concerns:

We'll try to be creative for the next sprint and look into the even distribution part. [The two other Indian engineers] are new to this process, talk to [the Indian manager], see if he can help you on any of your asks, or any of the developers here in the United States.

Thus, the pulse checks provided a forum where team members began to share feelings and raise issues about how work was going. Furthermore, the pulse checks encouraged team members, particularly senior members, to listen empathetically and respond in productive ways.

Indian team members were not the only ones to share their work challenges. The degree to which senior U.S. team members also shared their struggles in response to the pulse check questions was striking. In week 1, the U.S. project lead responded to the question about his satisfaction with his learning by saying:

[I am between] "accepting" and "frowning." The nature of our work is so much driven by the deadlines, we don't get to focus on important things. We are

driven by the urgency factor. I need to invest in myself . . . but that doesn't happen for various reasons.

In the same week, the U.S. partner on the project said:

"How am I feeling?" I think I'm somewhere between "accepting" and the "frown" . . . I got a call from a partner on the West Coast regarding an oral presentation Thursday morning—I'm not too sure what I'm leading . . . I had to clear everything on my calendar yesterday, have client conversations about it, and put together a "response" to a client I've never met before, a solution I have no experience with.

Such insight into the daily lives and challenges faced by senior managers and partners on this project was new for the rest of the team and humanized those in power.

Hence, even in the early weeks, the spaces and interaction scripts of the CWT calls and pulse checks enabled the team to engage in new, counter-normative forms of interpersonal sharing. Through this sharing, team members began to see one another as humans with lives outside of work who were also experiencing real challenges at work. The same Indian team members who just weeks earlier were described as being treated as "non-human" and "robots" were not only sharing about their lives and their experience on the project, they were also being heard. As the U.S. project lead said after the first pulse check:

Some of the feedback I heard is really eye opening; folks are overwhelmed with the volume of work and new things coming. Agile and [the intervention] should help them. It's nice to get the personal aspect from everyone. Hopefully, on the next pulse check, there will be more "smiley" faces. I really appreciate what the intervention is trying to do. It will really help.

This quote suggests that the team leaders quickly developed a positive perspective of the communication and disclosures elicited by the intervention, a perspective that encouraged additional sharing and provided participants with the experience of feeling heard.

These insights and disclosures, along with the positive response to them, began to shift the relational dynamics on the team. One indication of this shift was that, in week 4, the four team members based in Bangalore, who had previously sat on different floors of the same office building, intentionally moved their workspaces to be together. Attributing the change to the growing sense of connectedness sparked by the intervention, they chose

to cram together into two cubicles despite this being an unusual practice for teams at TaxCo. They were so proud of the change that they sent a picture of themselves sitting side by side in the two cubicles to the facilitators. The subteam benefited from colocation both in terms of work efficiency—"It's faster when we're working in the same space"—and in terms of feeling more connected to one another. In his week 4 pulse check, one Indian engineer from Bangalore responded, "'My learning': 'smiling,' coming to office regularly and sitting with the team—I'm getting to know everyone and nothing went wrong [this week]."

Despite the emergence of respect, openness, and connectedness in the early weeks of the intervention, change did not happen immediately. Indian team members still remained mostly silent outside of their pulse check check-ins. In working team meetings not directly related to the intervention, Indian members rarely spoke up except when called upon. In week 3, a U.S. manager remarked that it took "a lot of encouragement from [another U.S. manager]" to get Indian members to talk in the meetings. Also, Indian team members continued to share some work difficulties in private conversations with facilitators but did not bring them up in the pulse checks. For instance, a facilitator wrote in her notes in week 2:

[The Indian manager] has mentioned that it can be challenging to manage the Indian team members and a full task load. Didn't hear anything about that on the [pulse check] call. And [an Indian engineer] has told me numerous times how he doesn't feel like he's using much of his brain in his work, and yet he gave an "accepting" face for "How satisfied are you with your learning?"

Getting to know each other personally and sharing work struggles across geographic and hierarchical divides challenged team norms. Weeks into the intervention, team members struggled to engage openly across these boundaries, indicating the difficulty of changing the team's relational dynamics. However, as we describe below, the energy and excitement generated by the interactions in the early weeks in the intervention supported deeper enactment of the scripts in the latter weeks and fueled a cycle of increasing positive relational dynamics.

Latter Weeks of the Intervention: Deeper Enactment and Adaptation of Interaction Scripts

In this section, we describe how team members continued to enact the interaction scripts in the

spaces of the intervention but with increasing honesty, openness, and playfulness. They also began to take ownership of the process, “working” the spaces of the intervention by experimenting and adapting the interaction scripts. We view these adaptations as important in the life of the change process, as they represented a new level of engagement in the intervention and led to further emergence of positive relational dynamics.

Deeper personal sharing. In the intervention’s fourth week, an Indian manager suggested to a facilitator that, in order to foster more engagement from the team, the team should experiment with rotating facilitation of the pulse check between team members. He then nominated a particularly outgoing Indian engineer for the job. The facilitators and the project lead agreed to this idea, and the nominated engineer not only agreed to lead the next pulse check, but also asked if he could add to the script—asking everybody to tell a funny or embarrassing story, in addition to the four standard pulse check questions.

Notably, the Indian engineer’s suggestion came out of the growing connectedness he had been experiencing since he and the other team members in Bangalore started sitting together. In describing his motivation, he said the team in Bangalore had been able to joke around a bit that week since they had all been together, and suggested, “This team is too formal. If the whole project team were in a team room together, maybe things would be more casual, more fun.” This motivation is revealing on multiple levels. First, it points to the fact that the greater connectedness from the first weeks of the intervention inspired team members to become more engaged and invested in the change process. Second, it suggests that some team members began to view the scripts as resources they could use and adapt to further promote positive change in the team’s relational dynamics.

The funny or embarrassing story script prompted new levels of personal sharing within the team. Individuals shared humorous stories about their children, dogs, and friends. An Indian engineer started things off with a story about having terrible handwriting. It didn’t get a big laugh, but the facilitator bantered with her about his own bad handwriting. A U.S. engineer shared how her one-year-old daughter added a lot of curiosity to her life. An Indian engineer told a story about a group of friends who ended up eating a very small piece of cake together after expecting it to feed all of them. The energy picked up when a U.S. manager shared a story of his young daughter, who was going to be the flower girl in his

cousin’s wedding that weekend. Everyone laughed as he described having his “hyperactive” daughter practice walking down the aisle, tossing plastic Easter eggs instead of flower petals. The senior manager in India talked about her four-year-old son who liked to pet the dog next door. After she told him that he must wash his hands after petting the dog, her son decided from then on to keep his hands high above his head around the dog, allowing the dog to lick his entire face and body instead. “That’s how he tries to get out of handwashing!” she exclaimed. The Indian engineer who was facilitating added, “Have him take a bath!” At that point, the entire team was laughing. The same engineer then told a story from his youth about putting a firecracker in a neighbor’s mailbox and the trouble that he got into as a result.

People were laughing at the stories and engaging with one another with an energy not observed in previous pulse checks. At one point, a U.S. manager asked an Indian team member how her back was doing, as she had been dealing with back pain. At another point, an engineer based in Delhi mentioned that it was nice having another Indian engineer who was also based in Delhi to sit next to. The engineer to whom the comment referred responded, “Oh, that’s sweet.” The U.S. partner gave the Indian engineer who was facilitating a hard time about his story about dropping a firecracker in a mailbox. There was a palpable energy in the room from the personal sharing and the responses to one another’s sharing. Communication and interaction was occurring in new ways across United States–India lines and around the personal details of each other’s lives. Team members commented on the pulse check afterward, reflecting to facilitators that they enjoyed having “more interactive” time together, that it was good to have an “informal” piece to the check-in so that people “start opening up,” and that it was just plain fun.

Buoyed by the success and energy of this pulse check, members of the project team chose to continue to facilitate the pulse checks for the next two weeks. They passed the baton between teammates on the India side, and each new facilitator brought their own addition to the pulse check. In week 5, an Indian engineer asked each team member to pick the team member with whom he/she would trade places with for a week and why. In week 6, another Indian engineer had the team play the parlor game “two truths and a lie.”

Notably, the adapted pulse check script in week 5 did not lead to the same level of energetic and light-hearted communication across hierarchical lines

that emerged in the week 4 and week 6 pulse checks. In response to the question of which team member they would want to trade places with for a day, every team member chose a U.S. team member. While the interaction was not perceived or experienced as overtly negative, it exposed the power and status divides that persisted within the team. As the facilitator wrote in her field notes that week, “The team was not dynamically engaged, even with the personal question. Everyone wanted to be a [U.S. team member] . . . Not a soul wanted to be someone in India.” These interactions also revealed that not all adaptations of the interaction scripts over the 10 weeks of the intervention had the same positive effect on the team’s relational dynamics, variation that we explore later in this paper.

In weeks 6 and 7, the team further experimented with the interaction scripts in ways that deepened personal sharing. While reflecting with the facilitators on how the intervention was going, two Indian engineers mused over the right group size to foster more open and connected interactions. According to the facilitator’s field notes:

This was my last week in Bangalore, and as [two Indian engineers] were reflecting on [the intervention], they had the idea of having a small-group pulse check—they thought it would be more intimate and give people a better chance to know each other and really talk about the issues they were facing—it was too difficult to really get into any meaningful conversation on the large pulse checks.

The very fact that this was a topic of reflection is noteworthy, given the initial dynamics on this team. These team members came up with the idea of a “small-group CWT call,” and successfully pitched their idea to the facilitators. In the following week, the team put this idea into practice.

The small-group CWT calls were initiated in week 7, replacing the one-on-one CWT calls. Facilitators split the team into two groups with a mix of U.S. and Indian members in each group. Two Indian engineers, with feedback from other members of the team, developed the interaction script for the calls. One of the two Indian engineers sent the following email to his small group:

Hi All,

Below is the agenda of the meeting.

The CWT will run for one hour. The conversation [will] consist of two elements:

1. Relationship building (15 minutes)

The group will spend 10 minutes talking about personal interests. Get started by sharing about a fun weekend adventure you have recently had.

2. Share on individual strengths and areas for growth (45 minutes)

One team member will share about the skills and strengths he or she brings to the table and the areas he or she is working to develop. The other team members will have a chance to react, respond, and share their own impressions. The group will do this with each person on the call. The goal of this exercise is to be more aware of each team member’s abilities so that, as issues arise in the work, there will be greater understanding of who is best equipped to respond to what issues and who can stretch in their development areas.

As this email indicates, the small-group CWT calls constituted spaces, in that they were temporally, socially, and symbolically separated from daily work interactions. In addition, they contained the elements of an interaction script: content parameters (getting to know each other better by sharing a recent fun weekend adventure and sharing strengths and weaknesses) and participation rules (half of the team members in a small group, 15 minutes of individual personal sharing followed by 45 minutes of sharing on strengths and weaknesses, and each individual shares while others respond). In essence, members of the team adapted the boundaries of the space and modified the interaction scripts of the weekly CWT calls in a manner that continued to foster respect, openness, and connectedness.

The small-group CWT adaptation led to deeper personal sharing than we observed in the early weeks. For example, in one of the small-group CWT calls, everyone was asked what as children they had wanted to be when they grew up. When a U.S. manager said he wanted to be the Pope, an Indian engineer responded by asking the U.S. manager whether he was still religious. The U.S. manager took a deep breath, clearly uncertain about how much to share, and after hesitating said:

Yeah, I mean . . . it’s always an interesting question. My religious denomination is Roman Catholic, but there’s always the question of “do you agree with the church?” And I don’t agree with the church in all things, but I think at the end of the day religion to me is being spiritual, a set of guiding principles and morals, a way to develop as a person. Church for me is something we do as a family, it’s a good time to spend together and grow in our spirituality.

This type of disclosure about religious beliefs represented a substantial deepening in the intimacy of the personal sharing in the team. In experimenting with how to foster deeper personal engagement by changing the number of people on the calls and expanding the time spent discussing personal and professional goals, the team moved beyond being passive recipients of the intervention to become designers of their own change process.

Deeper sharing of work challenges. In the latter weeks of the intervention, the team also adapted the scripts in the pulse checks with the aim of inspiring deeper sharing of work challenges. In pulse check responses throughout the early and middle weeks of the intervention, team members frequently brought up the challenge of feeling crunched for time and not having enough hours to complete work. In fact, multiple team members raised challenges around hours worked in their responses to the pulse check questions in weeks 3 through 7. After hearing repeated frustration about this issue of hours, the facilitators tried to initiate a discussion about hours in the week 5, 6, and 7 pulse checks. While these attempts generated some discussion, the conversations yielded little concrete resolution. The lack of resolution was due, in part, to the limited time remaining after the round-robin responses to the pulse check questions. At the end of the week 7 pulse check, the team finally addressed the issue head on. A U.S. manager expressed his desire for the team to dive deeper into the underlying problem with hours:

I just wanted to put out one point that everyone is coming up with time, but it's really great to know that—why they are not getting time? Is it because of too much work and they already committed, as per estimation, but are not able to do it? There has to be a reason, right? It's not that 24 hours has squished to 20 hours, that's not it. So, if everybody can come up with how to talk about time and how it can be improved, rather than just mentioning time.

Motivated by a desire to engage in a real discussion about the hours challenge, the same U.S. manager suggested an adaptation to the following week's pulse check script. Rather than have everyone answer the four standard pulse check questions in a round-robin style, he instead wanted to focus the entire team's time, energy, and attention on the issue of hours for the week 8 pulse check. The U.S. manager facilitated the meeting and opened by encouraging people to express their concerns about hours:

We want to be thinking about how we can work smarter, not harder . . . If we are not finding time to do what we need, we need to talk about it—not just the reason but how we can make adjustments around the issue of time.

After weeks of generalized discussion of the topic, the substance and productivity of the week 8 pulse check discussion was remarkable. Not only did the India side raise concrete issues around hours, the U.S. project lead and managers responded in a way that indicated they acknowledged the challenges the Indian members were facing and genuinely wanted to resolve these issues. In response to the U.S. manager's encouragement, two Indian engineers pointed out that the time required for testing their code was not included in time estimates for tasks in the team's project planning. This meant that they had to put in more hours than was expected to finish their tasks. A third Indian engineer questioned the usefulness of the "showcase" meetings that the team held each week to show the client the progress the team made. The entire team was expected to be on these two-hour calls, even members who weren't presenting their work. To accommodate the client, the calls took place in the evenings, India time. He said:

Basically, we have four to five showcase meetings . . . they will help me understand the other activities in the project, but, if I have a time crunch or my plate is full, I wish I could drop off that call and focus on my work.

He also questioned the value of meetings that had been created among the Indian team members to make sure that the Indian manager was aware of issues before they were raised in the meeting with the entire team. Finally, a fourth Indian engineer raised an issue related to the challenges the team had with conferencing software that often took a long time to set up: "Sometimes, Citrix is really slow; there are days when we have to restart our laptop for Citrix and it takes 15 minutes or 20 minutes to start a call."

Not only were Indian team members openly sharing their issues and challenges, the U.S. managers heard the challenges and developed concrete actions to try to address these issues. For instance, the U.S. project lead agreed that it may not make sense for everyone to be on the call for the showcase meetings and even admitted that it "was probably poor planning on my part." The team also discussed the problem of not including estimates of time spent

testing code in their sprint planning. Based on this discussion, the team decided to allocate more time to testing and to start documenting how much time was being spent on testing so that they could develop accurate estimates for future efforts. The U.S. project lead said:

What we need to account for is testing support, that's the short-term solution we can account for [Indian engineer's] time or somebody's time to support the tester to navigate through the process, so we account for that, that is one thing. Once we account for that, other things will start to fall off their plate. You're right, we're not accounting for that anywhere, but it is an important task, yet we all hear from Scrum calls that work is not getting done because of support for testers.

Awareness of a positive change in relational dynamics was shared throughout the team. As one Indian engineer reflected after the pulse check, "Everyone is talking—the team is becoming more vocal and speaking up about their perspectives."

Thus, in the latter weeks of the intervention, the positive change in relational dynamics continued to build through the deeper enactment and adaptation of the intervention's interaction scripts. Team members, buoyed by the momentum from the early weeks, worked the spaces of the intervention and redesigned the interaction scripts to further the change effort. In so doing, they connected more deeply as people, not just as colleagues, and tackled persistent work challenges. As a result, new forms of interacting and relating, which were counter-normative before the intervention, increasingly became accepted and embraced by the team.

Changes in Team Relational Dynamics

Throughout the course of the 10-week intervention, we witnessed a shift in the level of respect, openness, and connectedness on the team. The emergence of positive relational dynamics on this team was evidenced by both the actions and reflections of those involved.

Respect. The increase in respect among team members was evident in the degree to which team members increasingly valued and supported one another, especially across geographical and hierarchical divides. An example of the increased respect within the team occurred in week 9, when the U.S. team lead suggested a change in the time of one of the team's calls. In an email to the team, he wrote:

Team—As you might have started to realize that we are literally fighting for meeting time during the day . . . I am thinking if it will be a good idea to move the [meeting name] calls to the night (India morning) so that we can free up the prime-time meeting slots. I have given a few options, let me know the consensus. Also, "No" is also an acceptable answer!!

Several Indian team members pointed to this incident as indicative of a broader shift in the way the U.S. team members were engaging with the Indian team members. In week 10, an Indian engineer reflected, "Usually the U.S. [team] just tells us when it is. There's more two-way dialogue now." Another Indian engineer also noted a change in the way the U.S. project lead engaged with the Indian team members: "[The U.S. project lead] is now more open to the team's perspectives and ideas." A third Indian engineer compared this team to those he had been on in the past: "In this project, the first thing is [the Indian team members] have been heard—the feeling that your voice is heard by the leadership."

Openness. The development of openness within the team was evident in the increased sharing about personal matters and work issues. In the meetings leading up to the intervention's start and during the first few weeks of the intervention, everyone on the team was encouraged to speak up to provide input on the goals of the intervention. However, the senior U.S. members of the team dominated the conversations during this early period and Indian team members would often remain silent.

By the end of the intervention, the team was sharing more openly, surfacing and addressing issues across the group. The Indian team members became more willing to speak directly and reflected that they had become "more equal in terms of communication and the kind of work that is happening." As one Indian engineer said in her week 10 reflection, "It's definitely increased our communication together." Another Indian engineer reflected:

[The intervention] has definitely helped the team come together. People are more expressive, there is a platform to express opinions and problems. Any one of us would not have taken the step to do that on our own.

This reflection points to the role of spaces in bringing the entire team together outside of everyday interactions and the critical component of interaction scripts that enabled the expression of "opinions and problems" in a productive manner. The "platform" referred to is, in essence, the spaces and interaction scripts of the intervention.

Connectedness. The increased connectedness within the team was reflected in the way the team members began to connect with one another as people, not just as coworkers. In the CWT calls and the adapted pulse check meetings, team members learned about each other's personal lives and engaged with each other in both light-hearted (telling funny stories) and earnest (talking about one's religious views) ways. After the intervention ended, an Indian engineer reflected:

The team became more close-knit after all those weeks ... All those icebreakers on the pulse check, they may seem like stupid questions, but at the end of the day they really help—everyone was laughing, and that really helps.

At one point in week 9, the workload on the team became intense. It was at this moment, when an earlier incarnation of this team may have developed frustrations with their global counterparts, that the team's greater connectedness became evident. Instead of each member of the team retreating into his or her own workload, an Indian engineer stepped forward and volunteered to help the U.S. manager with a complex task that the manager did not have the time to work on. During this period, an Indian engineer shared, "The team is working really hard to help each other out to make sure everything is finished for the deadline. We're working together to see that we didn't miss anything." Also in week 9, the U.S. manager emphasized the change in the way the team was collaborating during this time of high workload and increased stress:

If we hadn't had [the intervention], we would still be in small, small teams and passing specs across the wall from one side to the other and not this level of [team-wide] collaboration ... like the email from [the Indian engineer this week] saying "I am available." Those kinds of things are happening because of [the intervention]—better understanding, knowing people better on personal level, understanding career aspirations, and feeling much more comfortable reaching out asking for help or asking for work.

To be sure, team relational dynamics are the product of numerous small exchanges, and not every single interaction observed was uniformly positive. In fact, how team members dealt with exchanges that they experienced as less than positive was also an important part of the change process. For example, in the week 8 pulse check, the most junior Indian engineer raised that one of her challenges was feeling like part of her day was less productive because she

was waiting for direction. After the call, her manager admonished her for sharing this on the call and asked her to run things by him before she brought them to the entire team. The junior engineer turned to one of her Indian colleagues to make sense of this exchange. As she relayed to a facilitator, the colleague told her that "she had every right to say what she did and that she should always have that right going forward." This response reassured her, and, a week later, she was adamant in her weekly check-in with the facilitator that the team had become more open and connected. She emphasized that she hoped that the intervention would continue, indicating her continued faith in her colleagues and the intervention. This incident, while rare in our data, reveals the difficulty, if not impossibility, of fostering relational dynamics that are uniformly positive. It also suggests that, once a team has made a shift to more respectful, open, and connected forms of interaction, these positive relational dynamics can help contextualize and mitigate difficulties when they arise.

Across the board, teammates were struck by the dramatic growth of respect, openness, and connectedness in the team during the intervention. Table 1 provides additional data documenting the emergence of positive relational dynamics that occurred over the course of the 10 weeks.

FOSTERING POSITIVE RELATIONAL DYNAMICS

Based on our findings, we induced a theoretical model that distills how the intervention—a set of spaces and interaction scripts—facilitated the emergence of positive relational dynamics on a global team. Below, we present each component of our model.

Spaces and Interaction Scripts Facilitated the Enactment of Sharing Interactions

During the course of the intervention, we observed the team interacting in new ways. Specifically, we saw evidence of team members sharing aspects of their personal lives and work challenges across geographic, cultural, linguistic, and hierarchical divisions. We also witnessed team members responding to each other's sharing in positive ways. We label the combination of a sharing behavior and a positive response as a "sharing interaction." Understanding how the intervention facilitated the enactment of sharing interactions requires insight into how spaces and interaction scripts worked together to transform the team's taken-for-granted ways of interacting.

TABLE 1
Changes in Positive Relational Dynamics over the Course of the Intervention

	Early weeks: Low levels	Middle weeks: Growing levels	Latter weeks: High levels
Respect: Affirming, Supporting, Listening, Helping	<p>"I'm more excited for the [Indian team members] . . . Before, it was like a parent-child, funneling information." (Indian senior manager)</p> <p>"I echo [the U.S. senior manager, who gave a low score on being heard]—I want to challenge the team that, when issues are raised, people respond to them." (U.S. manager)</p> <p>"Right now, [the U.S. manager] is passing the commands to the Indian team members and you can't just pass the commands . . . He is in order giver mode. He needs to become more engaged and to help offshore." (U.S. senior manager)</p>	<p>"[A U.S. manager] struggles. He is a pretty involved person who gets upset when things are not done on time . . . He is accepting these realities . . . I have seen a softening of his tone. I am encouraging him to ask what we can do to help when things are not done in time." (U.S. senior manager)</p> <p>"It's important to have time to appreciate the work of the team. It's good to have more interactive time together and have other activities with the team." (Indian engineer)</p> <p>"[A U.S. manager] 'blocked time to talk informally' on Friday (his initiative). She feels he is the mentor she's been looking for." (Facilitator notes, conversation with Indian engineer)</p> <p>"I had a great conversation with [the U.S. senior manager] last week and will be helping out on one of his firm initiatives this week. He gave a lot of advice about a lot of things. He asked me all the questions I have for him and took time to answer each one." (Indian engineer)</p>	<p>"It was the first time I ever heard [U.S. managers] ask us to think about what would work best on our end as a team." (Indian engineer)</p> <p>"So many things are going on—just working, working, working. The team is reviewing each other's work, stepping up, and generally functioning at high throttle together. We're working together to see that we didn't miss anything." (Indian engineer)</p> <p>"The team is functioning more like a team now and helping each other if a task is not completed." (U.S. manager)</p>
Openness: Sharing, Disclosing, Speaking up	<p>"I don't discuss things with others. I prefer to think about a problem on my own and solve it myself." (Indian engineer)</p> <p>"She agrees that the Indian team is quiet, that it takes 'a lot of encouragement from [a U.S. manager]' to get them to talk. She also thinks part of the issue is that they are more junior; 'I, too, didn't have the confidence to speak up when I was more junior.'" (Facilitator notes, conversation with Indian senior manager)</p> <p>"When offshore has spoken up in the past, the pushback from [the U.S. side] has been very hard. I think this makes people more hesitant to speak up and to feel as if their voice is not being heard." (Indian engineer)</p>	<p>"The CWT calls are one of the best ways to get people talking and breaking the ice." (Indian engineer)</p> <p>"The team is doing better than last week . . . the dynamics are improving . . . The team was very vocal on the call [with an Indian senior manager] and were talking to each other." (Indian engineer)</p> <p>"Offshore doesn't generally speak much on the calls but the team is starting to speak up on calls the last two weeks." (Indian engineer)</p> <p>"From the business perspective, people were talking about themselves, trying to be more honest. Important things came out like technical skill sets, development needs, and soft skills that people want to develop. It will help us get good at managing those types of things. We also gave suggestions—if you are doing this, you may want to try this instead.' We gave suggestions for next steps." (U.S. manager)</p>	<p>"I like the CWT and meetings with the whole team. It's definitely increased our communication together." (Indian engineer)</p> <p>"We're doing good, all been speaking up, give inputs that we hadn't really been doing. Most people have issues—the same ones that you would find at other companies or with other people—but we talk about them." (Indian engineer)</p> <p>"Last three to four weeks, everyone talking—they said they've seen a change in the last three to four weeks as far as everyone on the team really willing to be open and share their concerns." (Facilitator notes, conversation with two Indian engineers)</p> <p>"Since we've [been on the project] here, the point was more of one-way communication. Now, everyone is speaking and highlights [their] concerns openly." (Indian engineer)</p>

TABLE 1
(Continued)

	Early weeks: Low levels	Middle weeks: Growing levels	Latter weeks: High levels
Connectedness	<p>“There should be some kind of motivation for the team, a team outing, a team lunch. It would definitely help us. Something from the on-site team motivating us . . . We are only professionally connected.” (Indian engineer)</p> <p>“Note that [Indian engineer] was expecting his first child and yet very few people knew about it on the team.” (Facilitator notes)</p> <p>“[Indian engineer] says that there are many team members that she does not know, and thus would like to focus on getting to know more of them during the CWT calls.” (Facilitator notes, conversation with Indian engineer)</p> <p>“I feel really disconnected from the team.” (Indian engineer)</p>	<p>“[Indian engineer] still feels that it is inappropriate to voice his issues on the team calls since it is not an issue that impacts everyone . . . He said he would be more comfortable bringing up issues in a small group setting because he doesn’t want to ‘bug’ the team by ‘generalizing’ things that don’t apply to everyone.” (Facilitator notes, conversation with Indian engineer)</p> <p>“I’m seeing a change that is a very good sign . . . [The intervention] is really helping to bring the Indian team members together and getting them to increase the level of communication.” (U.S. senior manager)</p> <p>“It was such a delight talking to [the U.S. senior manager]. I now fear him a little less than I did before the call.” (Indian engineer)</p> <p>“[Speaking about the small-group CWT calls:] Since I am on the BO team, I don’t interact as much with ETL—we got a chance to know each other. Plus, there was a light moment, to help to chill out with each other . . . Overall, we got to know each person—not just professionally, but personally.” (U.S. manager)</p>	<p>“[The U.S. senior manager] thought there were clear benefits in improving one-on-one rapport, collaborating across the United States and India and understanding what work is on each other’s plates.” (Facilitator notes, conversation with U.S. senior manager)</p> <p>“I feel good—I know [U.S. manager] as a person, I now know certain things about [the U.S. senior manager] that I didn’t know before. We are more bonded within the team.” (Indian engineer)</p> <p>“It is difficult to differentiate [the intervention] from the way that the team now operates. There has been a positive impact on collaboration since the experiment began.” (U.S. manager)</p>

The intervention’s spaces—the temporally and symbolically bounded CWT calls and pulse check meetings—created the opening for new forms of interaction to emerge. The separation of the spaces from the everyday interactions of the team rendered existing norms and patterns of interaction less salient. As a result, team members came into the CWT calls and pulse checks knowing that the typical norms might not apply. The symbolic and temporal separation of the spaces also meant that team members could not rely on habitual patterns of interacting as a guide for how to behave in the spaces. Instead, spaces encouraged individuals to set aside their preconceived notions and bring an open mind to the situation at hand. Furthermore, the intervention’s spaces were referred to explicitly as a place for the team to interact with each other in new and different ways, supporting experimentation and risk taking.

However, spaces on their own do not provide direction for how a team might interact within the space or what type of experimentation could occur. Taking a theater metaphor, spaces can be conceived as a new stage, a place where people don new clothing, set aside taken-for-granted assumptions, and experiment with a new style of interaction. However, an empty stage on its own leaves open infinite possibilities—thus, the value of having a script. Whereas spaces created the opening for change, interaction scripts provided direction and shape to the change process. These data suggest that interaction scripts shaped interactions within spaces through three mechanisms.

Interaction scripts guided experimentation into specified forms. Within the boundaries of spaces, scripts provided specific guidance on what to discuss (content parameters) and how to discuss it

(participation rules). The specificity and explicitness of the interaction scripts were key to reducing uncertainty during the change process and structuring what type of experimentation and risk taking was to happen in the spaces of the intervention. The value of the specificity of the scripts was evident when team members continued to ask for concrete conversation prompts to guide their personal sharing in the early weeks of the intervention.

The scripts' concrete guidelines also made team members aware of potential disconnects between ideal sharing behaviors as specified by the scripts and how the team was actually interacting. For example, in week 3 of the intervention, the Indian senior manager expressed to the U.S. project lead that the Indian team members were still not speaking up in the pulse checks as much as desired and that senior members of the team needed to continue to encourage them to express their feelings. Such feedback points to how the explicit guidelines of the scripts provided a benchmark by which team members could assess their interactions and encourage each other to more fully engage in sharing behaviors.

Interaction scripts legitimated counter-normative forms of interaction. Whereas the spaces of the intervention reduced the salience of existing interaction norms, scripts seeded the development of new norms. In this study, scripts expanded the scope of what was legitimate sharing and, in doing so, challenged expectations of what was appropriate behavior. Prior to the intervention, sharing personal information and work challenges violated implicit team norms and entailed social risk. The scripts, however, explicitly asked individuals to engage in such sharing. In doing so, the scripts reduced the social risk of broaching such topics, making them legitimate topics of conversation.

Interaction scripts established an expectation of shared risk taking. Interaction scripts also fostered risk taking by establishing an expectation that everyone would engage in the same risky behaviors. Classic research in game theory points to the difficulty for a single person to take a risk that only yields benefit if others also take the same risk. In strong organizational cultures, an individual challenging normative assumptions about what, when, and how to speak is likely to be censured, mocked, or completely ignored. Interaction scripts, however, mitigated that risk through the promise of collective engagement. It was established up front that every single member of the team was expected to take the risk (i.e., participate in the intervention activities).

As a result, the collective action problem was alleviated and benefits accrued for each group member.

Notably, the same mechanisms through which spaces and scripts facilitated sharing of personal and work-related matters also facilitated consistently positive responses to disclosures. Positive responses manifested as empathetic listening, reciprocal sharing, and active responding to the expressed challenges. First, the fact that these interactions were occurring in a space separate from the everyday created latitude for the team to take the time to hear each other. Second, the participation rules of the scripts (e.g., round-robin turn taking in which people were given a turn to talk and clear expectations of when to listen) set the stage for collective sharing. This guided reciprocity and structured listening limited immediate and unreflective reactions to disclosures. Third, because scripts legitimated the new sharing behaviors, the chances that any single disclosures would be viewed as socially deviant were reduced. Instead, individuals were primed to give each other leeway and respond positively to sharing.

Figure 2 depicts how spaces and interaction scripts facilitated the enactment of sharing interactions. The intervention spaces created the opening for change by reducing the salience of existing norms, fostering greater mindfulness of one's interactions, and facilitating experimentation. Scripts provided shape and direction to the change process by specifying both the what and the how of the interactions, establishing the legitimacy of such behaviors, and creating an expectation that all would engage in these new risky behaviors. Notably, the mechanisms by which spaces and interaction scripts facilitated sharing interactions were mutually reinforcing. The symbolic and temporal separation of the spaces from everyday patterns of interaction facilitated the enactment of the new interactions specified by the scripts. Conversely, the existence of scripts that explicitly specified forms of experimentation and counter-normative interaction further enhanced the symbolic separation of the spaces.

Positive Cycle of Emerging Positive Relational Dynamics and Deeper Sharing

As the intervention progressed, the sharing interactions sparked the emergence of a virtuous feedback cycle of relational dynamics built on respect, openness, and connectedness. Building from Figure 2, which details the link between spaces, interaction scripts, and sharing interactions,

FIGURE 2
How Spaces and Interaction Scripts Facilitated Enactment of Sharing Interactions

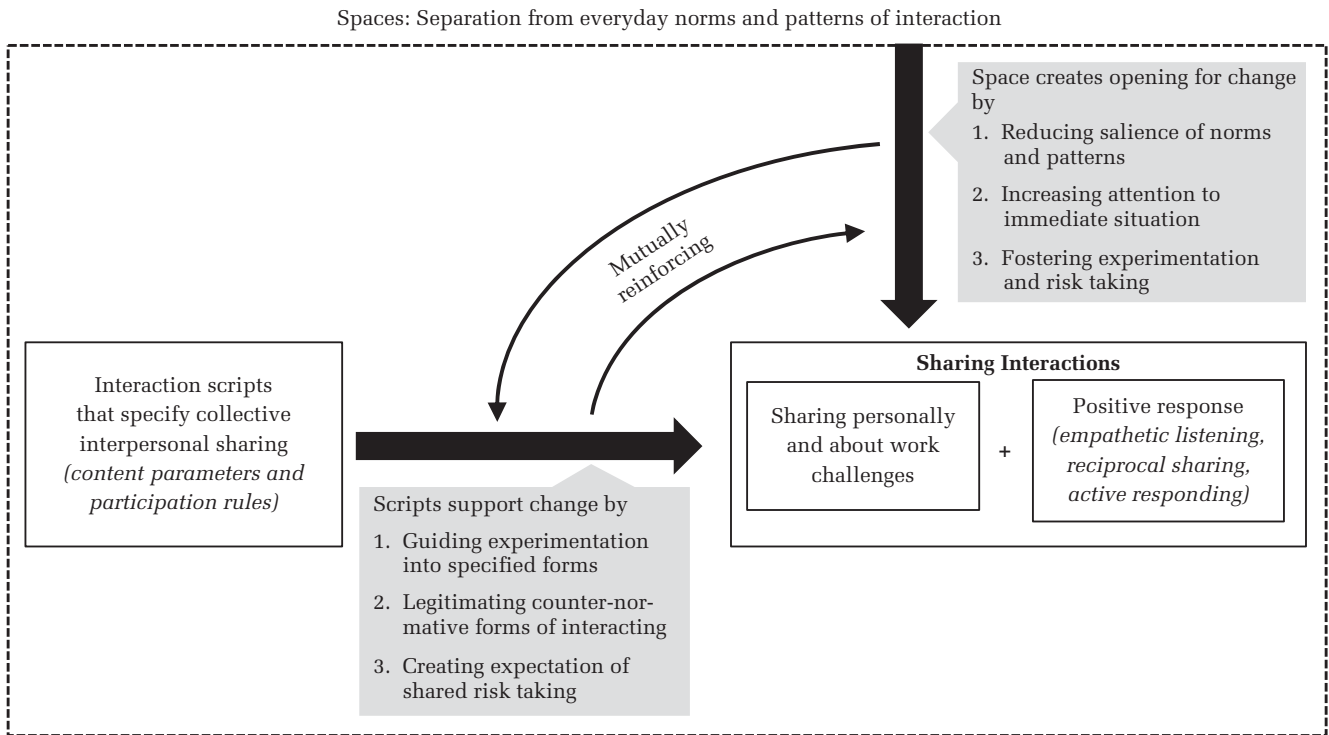


Figure 3 outlines our full model of how positive relational dynamics emerged. This model illustrates how sharing interactions led to a feedback cycle of increasing respect, openness, and connectedness. Below, we unpack the elements and links in this cycle.

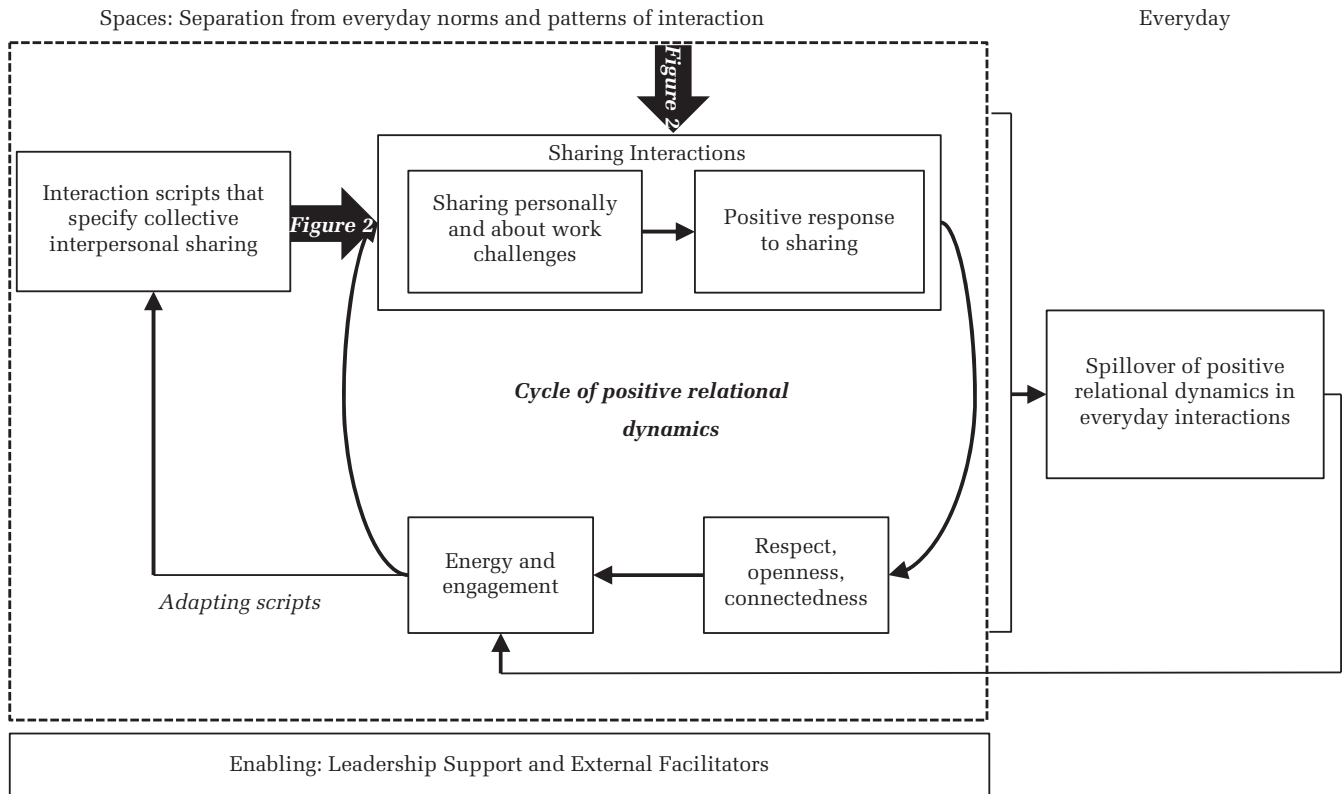
First, the sharing interactions directly established respect, openness, and connectedness. The sharing interactions fostered respect by humanizing individuals across hierarchical, cultural, linguistic, and geographic distances. These interactions helped team members see one another as *people*, with lives, interests, and passions outside of work. The sharing interactions established openness by virtue of the wider range of topics—both personal and work related—that the team shared in pulse checks and CWT calls. And the sharing interactions fostered connectedness through the positive responses to personal and work-related disclosures. Taking the form of reciprocal sharing, empathetic listening, and active responding, positive responses fostered a sense that the group cared about each other's work experiences and who they were as people. In these ways, the sharing interactions established the beginnings of positive relational dynamics on the team.

Second, the respect, openness, and connectedness that emerged from early sharing interactions generated energy and engagement within the team, fueling a cycle of growing positive relational dynamics. The energy was evident in the excitement and satisfaction that individuals displayed after their CWT calls and during the fun, personal pulse check conversations in weeks 4 and 6. The increased engagement by the team manifested in the team's adaptation of the initial scripts, starting in week 4. Such adaptation of the interactions scripts indicated that team members were progressively investing more of their time, energy, and belief in the possibility of change.

The increased energy and engagement of the team, in turn, inspired individuals to fully embrace the scripts in latter weeks. Thus, the enactment of sharing interactions, facilitated by the intervention's spaces and interaction scripts, initiated a cycle of growing respect, openness, and connectedness on the team—a cycle fueled by increased energy and engagement in the change process.

One important feature of our theoretical model is that not every type of interaction script will necessarily lead to the emergence of positive relational

FIGURE 3
How Spaces and Interaction Scripts Fostered Positive Relational Dynamics



dynamics. In this particular intervention, the content parameters—interpersonal sharing about personal or work challenges—and participation rules—collective engagement across cultural and hierarchical team divides—of the interaction scripts were important to the observed outcomes of the intervention. The collective interpersonal sharing specified by the interaction scripts in our study were key to humanizing individuals, fostering positive responses to disclosures, and generating positive relational dynamics.

In addition, not every single instance of interaction scripts fostered sharing interactions that were equally successful at facilitating respect, openness, and connectedness—notably, the week 5 pulse check when team members were asked with whom they would like to trade places. One feature of the adaptation of the week 5 pulse check script was that it prompted social comparisons within the team. The content parameters in other weeks did not prompt social comparisons, but instead asked people to share a personal story or to discuss a work challenge.

This variation suggests that interaction scripts that elicit social comparisons are less likely to humanize team members and, as a result, are less likely to foster respect, openness, and connectedness. This variation also highlights how spaces on their own would likely not have led to a transformation in the team's relational dynamics.

The Role of Script Adaptation to the Change Process

The organic adaptations of the scripts, prompted by suggestions from the team members to the facilitators, played a critical role in the change process. Such adaptations indicate that, while the scripts were initially developed via a top-down process, their evolution occurred through a bottom-up process. The adaptations of scripts led to some of the most consequential moments in the team's evolving relational dynamics, indicating that, when there is an opportunity for bottom-up adaptation of scripts, valuable experimentation may occur.

Spillover of Positive Relational Dynamics Outside of the Intervention Spaces and Scripts

The emergence of positive relational dynamics within the spaces of the intervention led to improved dynamics outside of these spaces. Examples of spillover included the team members moving to sit together in week 4. Further, their sitting together fed back into how the team engaged within the spaces of the intervention. Another example of spillover occurred in week 8, when the U.S. project lead asked the Indian team members for their input in changing one of their meeting times, and in week 9, when a team member became aware of how busy certain colleagues were and offered to pitch in and help those with more on their plate. These examples highlight the fluidity of the boundaries between the intervention spaces and the everyday interactions of the team as well as the positive feedback in relational dynamics across these boundaries.

Enabling Conditions: Leadership Support and External Facilitators

These data suggest that, in order to realize the generative potential of spaces and interaction scripts for fostering positive relational dynamics, two enabling conditions should be present: leadership support and external facilitation.

Leadership support. As noted above, one of the key functions of spaces and interaction scripts is that they mitigate the social risk of enacting new behaviors. However, the legitimating power of spaces and interaction scripts do not solely reside in the spaces and scripts themselves. The authority of the team and organizational leaders who sanctioned and supported the intervention imbued the spaces and scripts with external legitimacy. Such legitimacy was particularly important in the initial stages of the intervention, when team members were deciding how to enact the scripts and whether or not to engage in what they perceived to be socially risky behaviors. The engagement and support of the U.S. senior manager and partner were critical for signaling to the other team members that it was legitimate and safe to interact with one another in new ways.

Team and organizational leaders supported the intervention in multiple ways. They sanctioned the intervention as an official firm priority by ensuring that time spent on the intervention could be logged as part of each team member's target hours toward firm initiatives. Just as importantly, the project lead and senior partner participated in the intervention itself.

Their participation and engagement in the sharing interactions reinforced the sense that everyone on the team would be taking the same risks, thus reducing the risk for any one person.

External facilitation. Facilitators also supported the change process in multiple ways. First, the presence of the external facilitators in the intervention enhanced the symbolic separation of the intervention's spaces and the everyday work of the team. Their presence signaled to team members that team norms would not necessarily apply in these spaces. Second, the neutral status of external facilitators mitigated the impression that participating in the intervention was a top-down imperative of management. The presence of facilitators, as outsiders to the team's formal power structure, bolstered the sense that everyone on the team was in the change effort together. Third, facilitators provided in situ feedback and encouragement to support script enactment. For example, following a team member's response to the pulse check questions in week 5, the facilitator said, "Thank you so much. That was terrific. So we are hoping that all of your openness that existed in the first half of the call will carry over in the second half."

DISCUSSION AND IMPLICATIONS

This research documents one way that organizations can foster positive relational dynamics on teams. We found that the combination of spaces and interaction scripts can enable the emergence of respect, openness, and connectedness in teams. While spaces create the opening for new relational dynamics to emerge, interaction scripts provide content parameters and interaction rules that can guide team members to interact in ways that generate respect, openness, and connectedness.

These findings contribute to the literature on positive relationships at work. Existing research in this area highlights the importance of relationships characterized by respect, openness, and connectedness to team and organizational functioning (Carmeli et al., 2015; Dutton & Heaphy, 2003; Edmondson, 1999). While scholars have suggested different potential enablers of positive relational dynamics, such as inclusive leadership (Fletcher & Ragins, 2007; Nembhard & Edmondson, 2006) and relational skills and practices (Baker & Dutton, 2007; Quinn, 2007), few studies have empirically investigated the processes and mechanisms by which relational dynamics can be transformed. This present study deepens our understanding of how positive relational dynamics can

be fostered. We illustrate how, by carving out spaces and providing interaction scripts that encouraged collective interpersonal sharing, a distributed global team developed a virtuous cycle of respect, openness, and connectedness. This study also provides empirical support for the positive feedback loops that scholars of positive relationships at work have theorized are inherent to the evolution of positive relationships (Kahn, 2007; Quinn, 2007), and the role of energy as a catalyst for these feedback loops (Dutton & Heaphy, 2003; Quinn, 2007).

This study also deepens our understanding of *when* interpersonal sharing can lead to positive relationships at work. Existing research in psychology highlights the positive relationship between personal sharing and relational strength in general social contexts (e.g., Collins & Miller, 1994). However, studies of sharing in work contexts have noted the negative impact that personal disclosure can have in these settings (Detert & Edmondson, 2011; Morrison, 2011). The present study supports the importance of normative context in influencing how interpersonal sharing is received, but also suggests that the preexisting normative context is not fully determinant. The preexisting team norms in this study were hardly favorable to the sharing of personal matters or work challenges. Instead, the temporary opening in the normative context of the team, facilitated by the interaction scripts and spaces of the intervention, was sufficient for the interpersonal sharing to be received positively.

In addition to contributing to the research on positive relationships at work, the concept of interaction scripts contributes to research on change in organizations. Prior research has highlighted the importance of spaces, or bounded social settings, for enabling change in institutional practices, routines, group dynamics, and organizational culture (Bucher & Langley, 2016; Furnari, 2014; Howard-Grenville et al., 2011; Isaacs, 1999; Kellogg, 2009; Zietsma & Lawrence, 2010). However, the notion of spaces, which are, by definition, neutral as to what happens within them, fails to provide insight into the dynamics and mechanisms of change (Furnari, 2014; Polletta, 1999).

This study introduces the notion of interaction scripts to deepen our understanding of how and why certain changes in interaction patterns can emerge within a space. Furthermore, this study identifies the mechanisms by which interaction scripts complement spaces in affecting relational change: namely, they help a team overcome the uncertainty, social risk, and collective action problem associated with

deviating from team norms and engaging in risky interpersonal sharing behaviors.

Notably, when we revisited the empirical research that establishes spaces as a vehicle for change in organizations, we found evidence of additional structures resembling our concept of interaction scripts that contributed to the change processes. For instance, in Howard-Grenville and colleagues' (2011) study of cultural change, they note the use of "liminal spaces" that appear to incorporate interaction scripts. One of the key liminal spaces in their study is a strategy retreat that introduced celebration and games (content parameters) and invited participation from all hierarchical levels (participation rules). As Howard-Grenville et al. (2011: 530) explains:

Actors gave careful thought to how they would facilitate and invite interaction, intentionally bringing to the fore moments, events, or occasions in which people could interact differently, suspend the usual organizational social dynamics, and allow role-based interactions to recede in importance.

In other words, these actors were consciously incorporating scripts to structure interactions within the space to bring about new ways of relating.

Similarly, Bucher and Langley's (2016) study of routine change describes how both reflective and experimental spaces facilitated successful changes in medical routines. Upon examination, both kinds of spaces in their study contained structured guidelines for interaction. For example, in reflective spaces, individuals were explicitly directed to review the old routines while envisioning new routines (i.e., content parameters), and, in one of their cases, an external facilitator was even brought in to guide the reflection. In experimental spaces, the new envisioned medical routines provided the structured guidelines governing how the teams would interact within the space. In Kellogg's (2009) study of institutional change at two hospitals, in addition to relational spaces where reformers could meet to interact and mobilize, additional guidelines shaped reformer's interactions in ways that supported the change process. For example, directors of surgery gave directives to doctors to discuss how to change practices in order to comply with the new hours policy (content parameters) and, in afternoon rounds, juniors and seniors were both expected to speak and raise issues (content parameters and participation rules).

That guidelines for interaction with content parameters and participation rules are present in several existing studies of organizational change highlights

that spaces are often accompanied by additional structures that support the change process. However, this hidden role of interaction scripts as a unique contribution to fostering change has been undertheorized. For example, while Furnari (2014) recently suggested that, in addition to spaces, successful interaction rituals—or interactions characterized by mutual attention and emotional energy—are needed to support the emergence of new practices, he did not address how successful interaction rituals come to be. Our notion of interaction scripts serves as one possible means for facilitating successful interaction rituals within spaces.

This work also contributes to the literature on distributed and global teams. Research on global teams has highlighted the challenges of overcoming cultural, hierarchical, linguistic, and geographic distance to achieve team effectiveness (Cramton, 2001; Espinosa, Slaughter, Kraut, & Herbsleb, 2007; Herbsleb & Mockus, 2003; Hinds & Bailey, 2003; Hinds & Mortensen, 2005; Metiu, 2006). Scholars note the importance of fostering closeness within global teams to manage coordination challenges. Current work suggests that in-person site visits are critical for fostering this familiarity (Hinds & Cramton, 2014). According to this research, site visits allow individuals to work together in vivo and provide informal time for getting to know one another outside of work (Hinds & Cramton, 2014). Our study suggests an alternative mechanism for fostering closeness in global teams that may not require extended time with each other on-site. In these data, spaces and interaction scripts fostered positive relational dynamics even while the team remained distributed. The team described in this research never met face to face as an entire group.

This research has implications for practitioners and leaders seeking to foster positive relational dynamics in teams. Practitioners should think about how to structure personal sharing and open discussion of work issues in service of fostering respect, openness, and connectedness and should consider using spaces and interaction scripts as a resource. The recent research on choice architecture in behavioral economics provides a useful analog for understanding the potential implications of interaction scripts for practitioners. Choice architecture is the study of how designing the decision environment can influence or “nudge” individuals to make decisions that have better outcomes for the individual and/or society, such as making 401(k) contributions a default option in order to increase retirement savings (Benartzi & Thaler, 2007; Thaler

& Sunstein, 2012). Interaction scripts can be viewed a form of “interaction architecture”; just as choice architecture can be used to nudge individuals to make more optimal decisions, interaction scripts may serve as a way to nudge group members to interact with each other in more productive and beneficial ways.

This study was limited in temporal scope. While the relatively short duration of the study (two-week assessment plus a 10-week intervention) speaks to the power that spaces and interaction scripts can have in fostering new dynamics, it would be worthwhile to examine how team relational dynamics evolve over a longer timeframe. To borrow Lewin’s classic framework on the process of group change (Lewin, 1947), we observed the “unfreezing” and “changing” stages of change but likely did not observe the full process of the team “re-freezing” around new norms or patterns of interaction. Do teams continue to utilize spaces and interaction scripts even after the new patterns of interaction are firmly established, or do they no longer need them? Future research could explore the temporal dynamics of relational change over time and the evolving role that spaces and scripts play throughout a longer process of relational change.

Future research is needed to further understand the conditions under which spaces and interaction scripts are likely to foster positive relational dynamics. Specifically, future research could explore whether there are certain content parameters and participation rules of interaction scripts that make them more or less effective at fostering positive relational dynamics. For example, what level of personal sharing is needed to foster connectedness? What might be the downside of too much personal sharing (e.g., Martin et al., 1998)? Also, while the intervention we studied comprised spaces and scripts, future research could explore under what conditions bounded spaces might be sufficient to foster positive change without the addition of interaction scripts. Alternatively, can scripts effectively facilitate change outside of spaces? Finally, the question of whether external facilitation is needed in order for spaces and scripts to enable change is an open question. Notably, the interaction scripts in Howard-Grenville and colleagues’ (2011) study were developed and utilized by insiders, suggesting that external facilitators may not always be necessary for scripts to support change.

Lastly, future research is needed to explore the relevance of interaction scripts for fostering other types of change. As noted, interaction scripts can be

found in many other case studies of change in and across organizations but have yet to be theorized or identified as an important enabler of change. How might the relevance and functioning of interaction scripts be different when the change is in organizational routines, practices, or cultural repertoires rather than in relational dynamics? What are the boundary conditions for when interaction scripts are useful for facilitating such change?

It is notoriously difficult for teams to change negative patterns of interacting and relating. Our research shines light on one resource for facilitating the emergence of positive relational dynamics in teams. We found that the combination of spaces and interaction scripts can guide groups to collectively manage social risk and experiment with new forms of interpersonal sharing. In doing so, they plant the seeds of respect, openness, and connectedness that can grow and ultimately transform a team's relational dynamics.

REFERENCES

- Abelson, R. 1981. Psychological status of the script concept. *American Psychologist*, 36: 715–729.
- Andersson, L. M., & Pearson, C. M. 1999. Tit for tat? The spiraling effect of incivility in the workplace. *Academy of Management Review*, 24: 452–471.
- Ashcraft, K. L. 2000. Empowering “professional” relationships: Organizational communication meets feminist practice. *Management Communication Quarterly*, 13: 347–392.
- Ashforth, B., & Fried, Y. 1988. The mindlessness of organizational behaviors. *Human Relations*, 41: 305–329.
- Baker, W., & Dutton, J. E. 2007. Enabling positive social capital in organizations. In J. E. Dutton & B. R. Ragins (Eds.), *Exploring positive relationships at work: Building a theoretical and research foundation*: 325–346. Mahwah, NJ: Lawrence Erlbaum Associates.
- Barley, S. R., & Tolbert, P. S. 1997. Institutionalization and structuration. *Organization Studies*, 18: 93–117.
- Benartzi, S., & Thaler, R. H. 2007. Heuristics and biases in retirement savings behavior. *Journal of Economic Perspectives*, 21: 81–104.
- Blatt, R., & Camden, C. T. 2007. Positive relationships and cultivating community. In J. E. Dutton & B. R. Ragins (Eds.), *Exploring positive relationships at work: Building a theoretical and research foundation*: 243–264. Mahwah, NJ: Lawrence Erlbaum Associates.
- Bohm, D. 1990. *On dialogue*. New York, NY: Routledge.
- Bowen, F., & Blackmon, K. 2003. Spirals of silence: The dynamic effects of diversity on organizational voice. *Journal of Management Studies*, 40: 1393–1417.
- Bucher, S., & Langley, A. 2016. The interplay of reflective and experimental spaces in interrupting and reorienting routine dynamics. *Organization Science*, 27: 594–613.
- Burt, R. S. 2000. The network structure of social capital. *Research in Organizational Behavior*, 22: 345–423.
- Carmeli, A., Dutton, J. E., & Hardin, A. E. 2015. Respect as an engine for new ideas: Linking respectful engagement, relational information processing and creativity among employees and teams. *Human Relations*, 68: 1021–1047.
- Carmeli, A., & Gittell, J. 2009. High-quality relationships, psychological safety, and learning from failures in work organizations. *Journal of Organizational Behavior*, 30: 709–729.
- Chaikin, A. L., & Derlega, V. J. 1974. Variables affecting the appropriateness of self-disclosure. *Journal of Consulting and Clinical Psychology*, 42: 588–593.
- Charmaz, K. 2006. *Constructing grounded theory: A practical guide through qualitative research*. London, U.K.: SAGE.
- Collins, N. L., & Miller, L. C. 1994. Self-disclosure and liking: A meta-analytic review. *Psychological Bulletin*, 116: 457–475.
- Cortina, L. M. 2008. Unseen injustice: Incivility as modern discrimination in organizations. *Academy of Management Review*, 33: 55–75.
- Cramton, C. D. 2001. The mutual knowledge problem and its consequences for dispersed collaboration. *Organization Science*, 12: 346–371.
- Creed, W. E. D. 2003. Voice lessons: Tempered radicalism and the use of voice and silence. *Journal of Management Studies*, 40: 1503–1536.
- Detert, J. R., & Burris, E. R. 2007. Leadership behavior and employee voice: Is the door really open? *Academy of Management Journal*, 50: 869–884.
- Detert, J. R., & Edmondson, A. C. 2011. Implicit voice theories: Taken-for-granted rules of self-censorship at work. *Academy of Management Journal*, 54: 461–488.
- Dutton, J. E. 2003. *Energize your workplace: How to create and sustain high-quality connections at work*. Hoboken, NJ: John Wiley & Sons.
- Dutton, J. E., Ashford, S. J., O'Neill, R. M., & Lawrence, K. A. 2001. Moves that matter: Issue selling and organizational change. *Academy of Management Journal*, 44: 716–736.
- Dutton, J. E., & Heaphy, E. D. 2003. The power of high-quality connections. In K. S. Cameron, J. E. Dutton,

- & R. E. Quinn (Eds.), *Positive organizational scholarship: Foundations of a new discipline*, 3: 263–278. San Francisco, CA: Berrett-Koehler.
- Dutton, J. E., & Ragins, B. R. E. 2007. *Exploring positive relationships at work: Building a theoretical and research foundation*. Mahwah, NJ: Lawrence Erlbaum Associates.
- Edmondson, A. 1999. Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, 44: 350–383.
- Edmondson, A. C., & Lei, Z. 2014. Psychological safety: The history, renaissance, and future of an interpersonal construct. *Annual Review of Organizational Psychology and Organizational Behavior*, 1: 23–43.
- Eisenberg, E. M., & Witten, M. G. 1987. Reconsidering openness in organizational communication. *Academy of Management Review*, 12: 418–426.
- Espinosa, J. A., Slaughter, S. A., Kraut, R. E., & Herbsleb, J. D. 2007. Team knowledge and coordination in geographically distributed software development. *Journal of Management Information Systems*, 24: 135–169.
- Fletcher, J. K., & Ragins, B. R. 2007. Stone center relational cultural theory. In B. R. Ragins & K. E. Kram (Eds.), *Handbook of mentoring at work: Theory, research, and practice*: 373–399. Los Angeles, CA: SAGE.
- Furnari, S. 2014. Interstitial spaces: Microinteraction settings and the genesis of new practices between institutional fields. *Academy of Management Review*, 39: 439–462.
- Galinsky, A. D., Magee, J. C., Inesi, M. E., & Gruenfeld, D. H. 2006. Power and perspectives not taken. *Psychological Science*, 17: 1068–1074.
- Gioia, D. A., & Poole, P. 1984. Scripts in organizational behavior. *Academy of Management Review*, 9: 449–459.
- Gittell, J. H., Seidner, R., & Wimbush, J. 2010. A relational model of how high-performance work systems work. *Organization Science*, 21: 490–506.
- Goffman, E. 1983. The interaction order: American Sociological Association, 1982 presidential address. *American Sociological Review*, 48: 1–17.
- Herbsleb, J. D., & Mockus, A. 2003. An empirical study of speed and communication in globally distributed software development. *IEEE Transactions on Software Engineering*, 29: 481–494.
- Hinds, P. J., & Bailey, D. E. 2003. Out of sight, out of sync: Understanding conflict in distributed teams. *Organization Science*, 14: 615–632.
- Hinds, P. J., & Cramton, C. D. 2014. Situated coworker familiarity: How site visits transform relationships among distributed workers. *Organization Science*, 25: 794–814.
- Hinds, P. J., & Mortensen, M. 2005. Understanding conflict in geographically distributed teams: The moderating effects of shared identity, shared context, and spontaneous communication. *Organization Science*, 16: 290–307.
- Howard-Grenville, J., Golden-Biddle, K., Irwin, J., & Mao, J. 2011. Liminality as cultural process for cultural change. *Organization Science*, 22: 522–539.
- Ibarra, H. 1993. Personal networks of women and minorities in management: A conceptual framework. *Academy of Management Review*, 18: 56–87.
- Isaacs, W. 1999. *Dialogue: The art of thinking together*. New York, NY: John Wiley & Sons.
- Jablin, F. M. 1979. Superior–subordinate communication: The state of the art. *Psychological Bulletin*, 86: 1201–1222.
- Kahn, W. A. 2007. Meaningful connections. In J. E. Dutton & B. R. Ragins (Eds.), *Exploring positive relationships at work: Building a theoretical and research foundation*: 189–206. Mahwah, NJ: Lawrence Erlbaum Associates.
- Kellogg, K. C. 2009. Operating room: Relational spaces and microinstitutional change in surgery. *American Journal of Sociology*, 115: 657–711.
- Kipnis, D. 1972. Does power corrupt? *Journal of Personality and Social Psychology*, 24: 33–41.
- Lewin, K. 1947. Frontiers in group dynamics: Concept, method and reality in social science: Social equilibrium and change. *Human Relations*, 1: 5–41.
- Liu, D., Liao, H., & Loi, R. 2012. The dark side of leadership: A three-level investigation of the cascading effect of abusive supervision on employee creativity. *Academy of Management Journal*, 55: 1187–1212.
- Lord, R. G., & Kernan, M. 1987. Scripts as determinants of purposeful behavior in organizations. *Academy of Management Review*, 12: 265–277.
- Martin, J., Knopoff, K., & Beckman, C. 1998. An alternative to bureaucratic impersonality and emotional labor: Bounded emotionality at The Body Shop. *Administrative Science Quarterly*, 43: 429–469.
- Mayes, B. T., & Allen, R. W. 1977. Toward a definition of organizational politics. *Academy of Management Review*, 2: 672–678.
- Metiu, A. 2006. Owning the code: Status closure in distributed groups. *Organization Science*, 17: 418–435.
- Morrison, E. W. 2011. Employee voice behavior: Integration and directions for future research. *Academy of Management Annals*, 5: 373–412.
- Morrison, E. W., & Milliken, F. J. 2000. Organizational silence: A barrier to change and development in a pluralistic world. *Academy of Management Review*, 25: 706–725.

- Nembhard, I. M., & Edmondson, A. C. 2006. Making it safe: The effects of leader inclusiveness and professional status on psychological safety and improvement efforts in health care teams. *Journal of Organizational Behavior*, 27: 941–966.
- O'Reilly, C. A., III, Caldwell, D. F., & Barnett, W. P. 1989. Work group demography, social integration, and turnover. *Administrative Science Quarterly*, 34: 21–37.
- O'Reilly, C. A., & Roberts, K. H. 1977. Task group structure, communication, and effectiveness in three organizations. *Journal of Applied Psychology*, 62: 674–681.
- Phillips, K. W., Rothbard, N. P., & Dumas, T. L. 2009. To disclose or not to disclose? Status distance and self-disclosure in diverse environments. *Academy of Management Review*, 34: 710–732.
- Polletta, F. 1999. “Free spaces” in collective action. *Theory and Society*, 28: 1–38.
- Quinn, R. W. 2007. Energizing others in work connections. In J. E. Dutton & B. R. Ragins (Eds.), *Exploring positive relationships at work: Building a theoretical and research foundation*: 73–90. Mahwah, NJ: Lawrence Erlbaum Associates.
- Rogers, D. P. 1987. The development of a measure of perceived communication openness. *Journal of Business Communication*, 24: 53–61.
- Rogers, K. M., Corley, K. G., & Ashforth, B. E. 2016. Seeing more than orange: Organizational respect and positive identity transformation in a prison context. *Administrative Science Quarterly*, 62: 219–269.
- Senge, P. 1990. *The fifth discipline: The art and practice of the learning organization*. New York, NY: Currency Doubleday.
- Shaw, M. 1981. *Group dynamics*. New York, NY: McGraw-Hill.
- Stephens, J. P., Heaphy, E. D., Carmeli, A., Spreitzer, G. M., & Dutton, J. E. 2013. Relationship quality and virtuousness: Emotional carrying capacity as a source of individual and team resilience. *Journal of Applied Behavioral Science*, 49: 13–41.
- Strauss, A., & Corbin, J. 1998. *Basics of qualitative research: Techniques and procedures for developing grounded theory*. Thousand Oaks, CA: SAGE.
- Sutton, R. I. 2007. *The no asshole rule*. London, U.K.: Sphere.
- Thaler, R. H., Sunstein, C., & Balz, J. P. 2012. Choice architecture. In E. Shafir (Ed.), *The behavioral foundations of public policy*: 1–13. Princeton, NJ: Princeton University Press.
- Tourish, D., & Robson, P. 2006. Sensemaking and the distortion of critical upward communication in organizations. *Journal of Management Studies*, 43: 711–730.
- Vogus, T. J. 2004. *In search of mechanisms: How do HR practices affect organizational performance?* (Unpublished doctoral dissertation). University of Michigan, Ann Arbor.
- Weick, K. E. 1993. The collapse of sensemaking in organizations: The Mann Gulch disaster. *Administrative Science Quarterly*, 38: 628–652.
- Zietsma, C., & Lawrence, T. B. 2010. Institutional work in the transformation of an organizational field: The interplay of boundary work and practice work. *Administrative Science Quarterly*, 55: 189–221.



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