

Moreno's Sociometry: Exploring Interpersonal Connection

Ann E. Hale¹

This paper examines sociometry separate from its usual role as an adjunct of psychodrama. Sociometry is a set of methods created by J. L. Moreno (1934) to study the interpersonal connections of individuals and groups of all sizes. Sociometry provides opportunities for the improved interpersonal and group dynamics by making existing dynamics manifest to the people involved in the group in situ. The author describes the history of sociometry and explains its theories and techniques, which have relevance for psychotherapists and group leaders in all settings.

KEYWORDS: Sociometry, group dynamics, interpersonal relations, psychodrama, group leadership.

J. L. Moreno (1934) conceived of sociometry as a branch of the social sciences through which to study interpersonal relationships. Through action methods in the context of live groups, it provides qualitative and quantitative opportunities for improving interpersonal dynamics by making latent dynamics manifest to the people involved. Sociometry is used to understand the relationships in an individual's life, or the relationships among individuals and groups of all sizes, extending even to international and global relationships. Sociometry has great relevance for psychotherapists, particularly group therapists, and for group leaders in all settings. Although it is sometimes treated as handmaid of psychodrama, psychodrama and sociodrama were originally conceived as therapeutic ways to address information already gathered from sociometric investigations of group structure. This paper will confine itself to sociometry alone.

¹ Director, International Sociometry Training Network, Riner, Virginia. Correspondence should be addressed to Ann E. Hale, MA, MSLIS, TEP, 114 Airport Road, Riner, VA 24149. E-mail: annehale@swva.net.

HISTORICAL ROOTS OF SOCIOMETRY

In 1915–1917, Moreno, a young medical officer and psychiatrist, worked with refugees who fled from approaching armies in the Italian countryside to safety in Austria. The Austrian government housed them in Mitterndorf, several families to a cottage. Persons were assigned to cottages based on the number of rooms required. Moreno had a bird's-eye view of the social dynamics in these necessary but autocratic assignments. He found that individuals and families he interviewed, and whose assignments he adjusted according to their *preference*, had fewer health and emotional problems, with fewer fights in the cramped conditions. As a result, Moreno began to explore ways to involve people in creating structures and communities that take into account choice, as each person impacts each other person within the community (Moreno, 1955). He wanted to design a system for discovering the map of interpersonal preferences, for gathering and interpreting such data, and for involving participants in the use of the results. He wanted to convince those in authority to change traditional methods so as to allow individuals to exert the power of choice.

Moreno decided his philosophy of healing society, *sociatry*, would stand a better chance of survival if first practiced in a country with democratic values. He immigrated to the United States in 1925, and by 1932 he had begun building a community with sociometric principles at the Hudson School for (Delinquent) Girls. His coresearcher, Helen Hall Jennings, wrote many papers with him that were widely circulated among social scientists and medical societies. The Hudson School's proximity to Hyde Park, New York, brought Moreno to the attention of President Roosevelt. When they met he told Moreno, "When I am back in Washington I will see where your ideas can be put to use." Moreno has written: "I thought that President Roosevelt might forget our meeting but his interest created a new enthusiasm in Washington which culminated in a large number of sociometric community studies" (Moreno, 1955, p. 58).

Moreno devoted many years to creating the role of sociometrist—building the theory and methodology, and representing the field in publications and at international meetings. The journal *Sociometry* began in 1937; its editorial board and contributing editors included such figures as Gordon Allport, Paul Lazarsfeld, John Dewey, George Gallup, Adolf Meyer, Margaret Mead, and Gardner Murphy. In 1942, the Sociometric Institute opened and he formed the American Society of Group Psychotherapy and Psychodrama. In 1936, Henry J. Meyer, at the School of Social Work, University of Michigan, had differentiated three types of sociometry: (1) as an orientation towards life, (2) as a theory of society, and (3) as a method of research. Enthusiastic supporters began to form attachments to aspects of Moreno's work and to build methods of their own in applied settings. I once heard him refer to some of this as "stealing the raisins from my cake" (Personal communication, November 1973). Some people developed exciting methods, e.g., for group exploration in the

form of exercises, while others used sociometry as research to support a particular approach to a group. However, what languished was the supporting humanitarian philosophy that inspired Moreno's integrative approach, first developed in World War I. Years later Peter Dean Mendelson wrote a doctoral dissertation, *Rethinking Sociometry: Toward the Reunification of Theory, Philosophy, Methodology and Praxis* (1976), describing the fascination of social psychologists, teachers, activists, military professionals, psychotherapists and others with Moreno's methodologies, as well as the mixed impact of the field of sociology on Moreno's legacy.

RELEVANCE OF SOCIOMETRY FOR PSYCHOTHERAPY

Sociometry has great relevance for psychotherapy. It is possible through sociometry to discover the number of relationships a person is able to sustain—his or her *emotional expansiveness*. Each person has a *sociometric set*, which is his or her usual number of relationships; the quality and quantity of those relations determine the person's likelihood of living a safe, productive, and rewarding life. Most people are able to stretch their set number to include others except in times of stress. When sociometrically trained people work with a family or group, they assist in identifying answers to the questions, "Where do I fit?" and "Will I be able to be myself here, or will I have to forfeit an essential part of myself in order to belong?" What sociometrists explore with clients, usually, but not always, in the context of a group, are the patterns they have for choosing others; the expectations and perceptions they have about these choices; the emotions these choices evoke; and, at times, the historical basis for the choices. Individuals continue to develop their interpersonal preferences over the lifespan. The experiences we have of *choosing* and *being chosen* by others, from childhood into our adult years, impact our "warm-up" in new situations where we are meeting a number of persons for the first time. As the work progresses, clients can identify where they are in their individual cycle of *harmonic to conflictual states*. This cycle refers to the individual tendency at any given time toward comfortable or harmonic choices, as opposed to challenging or risky ones (Hale & Little, 2004).

When faced with trauma, a person's interpersonal capabilities may be impaired. Sociometric methods, described in more detail later, can help clients construct an overview of chosen connections, and the roles they consider to be essential during the crisis. For example, a sociometric investigation can reveal the personal relationships that need healing and the steps that offer possibilities for repair (Moreno, 1960). The process helps the client move from numbness to conscious awareness that choices do exist, and that life can once again have supportive people with whom to interact and create meaning.

Moreno's View of Social Reality

Moreno contrasts *external* reality, or what is visible by noticing and recording demographic information—such as membership in specific groups—with the *internal* and subjective reality of each person's responses and choices for each other person according to specific criteria and roles. Subjective data are tabulated on a *sociomatrix*, a cross-section of each person's choices for each other person, and made more visible through depiction in a *sociogram*, a kind of network map. Using the example of the Mitterndorf camp, external reality includes data about the refugees' homeland, official roles and titles, the number of cottages, etc. Within the resettlement community, there were affiliations between people due to attraction and repulsion, human being to human being. The flow of feelings between people transcends the external reality of position and title and exerts an influence on the "field of operations" through the expression, or suppression, of feelings. Moreno's (1978) belief was that the more the official social structures resemble the informal network, the more harmony people will experience in their association with one another.

Moreno's Theory of Interpersonal Relations

Moreno described the makeup of interpersonal connections as involving positive choice, negative choice, indifference, and ambivalence. The elements of empathy, *tele*, and transference prompt many of those connections. *Tele* is a word he made up to describe the flow of feeling across space, which carries with it recognition as that person knows him- or herself to be. The two people appear to *click* (Moreno, 1978). Their receptivity to one another is mutual. Siegel (2007) refers to this as *attuned communication*. Moreno described empathy as one-way *tele*, the capacity of one person to see into another without expecting reciprocity. This one-way rapport may be met by projection in return from the other person. Transference is described by Moreno as a relationship whereby both parties project onto the other an image resembling the person in some ways, with degrees of accurate and inaccurate assumptions about the person. While *tele* is an abstraction, Moreno (1978) hypothesized that the larger the number of mutual pairs in the group, the greater the rate of interaction and the probability of high group cohesion.

Our interpersonal relationships consist of configurations of pairings and sub-groupings, which are either mutual or incongruous. Pairings may change, depending on the activity, the mood, the energy level, capacity for the role, the time of day, the location and the pool of people, present and absent, from which we can choose.

Role Theory

Many roles are culturally determined and are different from personalized roles. For example, the role of *the* Mother will be different from the personalized role of *a*

Mother in response to a specific child. Moreno gave a great deal of attention to roles as he built his personality theory on the spontaneity theory of child development (Moreno, 1946). Moreno stressed, "*Role emergence* is prior to the emergence of the self. *Roles do not emerge from the self, but the self may emerge from roles*" (1978).

Sociometry investigates the choices people make of others to fulfill needed or desired roles for them at specific points in time. It also looks at how we move into various roles ourselves and in relation to others. The first step in *role development* is *role taking*, being in the role as shown or described by others. As the person begins to feel confined by the prescribed role, he or she may expand the role to fit his or her own capabilities and ideas. This is *role playing*. The person makes changes to the nature of the role, investing more of the self in the interaction and experiencing more freedom. While building confidence, he or she may engage more fully in *role creating* or may lose energy and fall back into the role as defined by others.

Role development has elements of perception, expectation, and enactment. During the role taking phase, when the role is in *ascendance*, there will be some anxiety, which will fall away as freedom and spontaneity surface. For example, when we learned to lead groups, we knew the relevant processes; however, most of us were anxious as we began to lead. *Role expectations* were high. The role of confident group leader emerges when a setting is created that invites the spirit of play to enter. By contrast, roles may peter out or fall into *descendance*; investment has weakened and the person is seeking *role relief*.

Groups tend to make clear that a competent person is necessary and beneficial to the system, and they will recruit and/or maintain that person in the needed role. Sometimes a given role in the group is vacated. The sociometrist's response to an existing or possible vacancy is to ask, "Who needs this role for the further development of themselves?" The leader develops a wide perspective of the role needs of the group members and can channel energies that foster the emergence, rather than the diminution, of the self. (Group exercises for exploring roles of high value are described in Hale, 1985, pp. 153-155.)

In the early 1980s, at the Wasley Center in Perth, Australia, psychodramatists Lynette and Max Clayton began to expand role theory for use with clients to enable them to monitor their progress in therapy. The role system is identified during an exploration of here-and-now interactions with the people in their lives, in conjoint sessions, or during psychodramatic enactments. A role chart identifies three main groups: *progressive*, *coping*, and *fragmenting* roles. *Progressive* roles are roles that are developing and strengthen the clients' personality and interpersonal skills. *Coping* roles are roles taken in an effort to survive and overcome hardships in life. *Fragmenting* roles are roles of dysfunction that defeat the person's forward movement in life (L. Clayton, 1982; M. Clayton, 1994). Through this mapping of role clusters, participants engage in their own personal sociometry as observer, journal keeper, and change agent.

HOW IS SOCIOMETRY APPLICABLE TO GROUP LEADERS?

Within the framework of sociometry there are many procedures and processes useful for strengthening the bonds between people as well as for intervening in even the most difficult interpersonal relationships. *Group building exercises* focus on acknowledging existing relationships, relationships between people meeting for the first time, and linkages between people that may act as a bridge into the group or clearly define a subgroup. *Warm-ups to choice-making* are activities a sociometrist may use to build skills necessary for the group to function interpersonally. (Two examples are described below.) *Explorations of group position and composition* may involve pen-and-paper answers to a specific group question, or the question may be explored in action. Examples include anchoring opinions within the group space, identifying range of choices for specific roles, even tracking the movement over time between acceptance and resistance to a specific role or topic. *Conflict and impasse resolution* may involve the use of pen-and-paper diagramming of clusters of roles (*the role diagram*) shared by the parties involved in a conflict, and/or a facilitated action exploration of the moment of difficulty in a relationship.

Sociometry is intended to *raise consciousness* about (1) the current choice-making activity in a group; (2) potential choice for partners with whom one shares time, space, energy, and information; and (3) the effects of actual *and potential* choices on group structure, as well as the tensions, struggles, and complementarity within that structure. Sociometry is also about bringing together those persons capable of harmonious interpersonal relationships in order to increase the felt sense of belonging, to strengthen networks, and to provide a safety net of support for taking risks and self-disclosing. Being involved in sociometric events enables participants to develop versatility in social interactions and increase their ability to face, tolerate, and embrace intimacy, conflict, and change.

Moreno wrote: "The sociometric concept of social change has four chief references: (a) the spontaneity-creativity potential of the group; (b) the part of the universal matrix relevant to its dynamics (the group within the larger social picture); (c) the system of values it tries to overcome and abandon; and (d) the system of values it aspires to bring to fulfillment" (1978 edition, p. 115). Participation in discovering these elements in the group and oneself is central to self-understanding and therapeutic work.

The Sociometrist's Approach to the Anxiety of the Group

Often the sociometrist is called upon to achieve a resolution of conflict and and/or to help a group access its resources for authentic engagement. Like any leader in this situation, the leader is challenged to reduce the anxiety of the group in order to achieve cohesion. Not surprisingly, sociometric exercises that reveal the choices people are making initially causes anxiety regarding being rejected, or having to

reject someone else. For some members, the fear of being highly chosen and exposed as a star is also a fearful experience. Sociometrists welcome the expression of these and other anxieties because this articulation leads to reduced tension and greater ease in relating as well as increased self-disclosure (Hale, 1974).

Simple reassurance from the leader is appreciated by the group. For instance, I like to share with people that, after 35 years of helping groups look at their connections, I have found that people anticipate 50 to 60 percent more rejection than is ever the case. People perceive more negativity than actually exists. When we actually ask the question, "Am I one of your choices for this role?" the answer is more likely to be "yes" than "no." If the answer is "no," a reason is given, and both individuals are there to make sense of it in their own process. What provokes more anxiety is *not knowing* and having to guess. Additionally, groups find it freeing to share traditional injunctions and social norms that inhibit speaking openly about personal connections and preferences. When a group examines these injunctions more closely, it becomes possible to alter them in order to enhance connections.

Examining Nearness and Distance

The measurement aspect of sociometry involves the degrees of nearness and distance that may be shown in action or on paper in a sociogram. Below are some examples.

One activity involves two volunteers from a group. The pair engages in a brief exploration of interpersonal space; each stands facing the other with approximately eight feet between them. They are asked to imagine they are in a space defined by their relationship, rather than by their individual field. They maintain eye contact, and when asked to do so, each takes a step toward the other. Each makes one statement to the other about anything that occurs to them right in that moment. Then they take another step and repeat the process. This continues until they are about two feet from one another. They are each asked to make a final statement, maintaining their eye contact. The facilitator then with imaginary scissors makes a cutting sound and one motion at eye level in the space between them. The two people frequently report they experience a momentary severing of connection. The pair will have had the experience of a visceral connection, which can later be reestablished.

Group Positions

This is an example of a warm-up in the whole group. Group members identify a range of positions, from near to distant from the group center. Pillows are placed to represent spots the group wants to explore, e.g., at the center, two off on their own together, far out on the periphery, out by the door, a sub-group of several pillows. Even the bathroom may be represented within the action space. Once the positions are in place, group members will mill around and "visit" as many of the

spaces as time allows. When a person arrives on or near a particular pillow, they begin to speak aloud their impressions of taking that position, and any feelings that the position evokes. If someone else is also standing near the same spot they may join in an extemporaneous discussion of the position's merits. At the close of this activity, group members return to their seats. One by one each group member goes to a specific position and reveals, (1) "This position is the most comfortable one for me right now," or, (2) "This is a position I would like to be in more often." It is possible to follow this up with small groups of two or three. The participants describe more fully their preferred group positions and what they may do to spend more time there.

Telling the Truth

This warm-up uses a model of co-existing opposites, called the Diamond of Opposites (Carlson-Sabelli, Sabelli, & Hale, 1994). It depicts the reciprocal and opposing elements within a single choice. A large square is taped on the floor, with a zero placed on one point. I usually place the roll of masking tape to represent the zero. To the left, a plus (+) and to the right a minus (-) and directly across from the zero is placed a plus/minus (+/-). (See Figure 1.) The question before the group is, "When I stand at the zero point, and look to my left (+), how strong is my pull to tell the truth about _____ [supply a topic]? When I stand at the zero point and look to my right (-), how strong is my pull to not tell the truth?" Each person is invited to walk the mutually antagonistic either/or field of + and -, moving from the zero point to a point on the right or the left to represent the strength of the inner pull. The person speaks aloud their positive position and then their negative position. After expressing the underlying pulls, the person speaks about holding both pulls, the steps into the synergistic space inside the square where the two intersect. When it comes to making a decision, the person may decide which pull they are most likely to allow the greater influence. Once each person has done this, the group is able to know that here and now the group members are choosing to speak truthfully (positive dominance), not speak truthfully (negative dominance), to be neutral to the subject (nearer the zero point), or to be in a conflicted position (towards the +/-). This exercise allows the group to experience the complexity of authentic responses and to separate out the complexity of truth telling and the related *decision* of whether to be truthful.

The Social Atom

Sociometrists have many techniques that illustrate how members' choices of one another define the nature of their group. One such method, the group *social atom*, was so named by Moreno to indicate that the members of the group are held together or kept apart by forces not unlike the molecular charge of atoms.

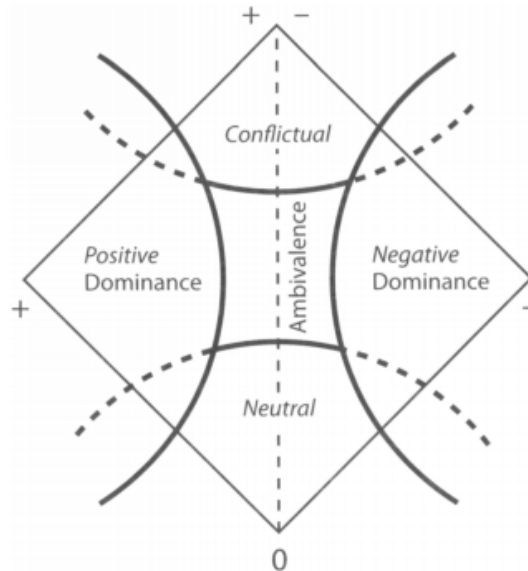


FIGURE 1. Diamond of Opposites (Carlson-Sabelli, 1992).

The group chooses criteria that reflect the roles they most value at the time. For example, they might want to explore how members use the group for support. The leader or a member might ask them to consider: “Whom in the group do I look to, or seek, when I feel vulnerable during a group session?” If the group wants to explore how each person experiences him or her in group, the criterion might be, “Whom in the group do I choose to spend a half-hour with in order to receive information about how I am perceived?”

In a frequently used *social atom* exercise, each person receives a “target social atom” (one page containing three concentric and equidistant circles) with the central circle representing nearness to oneself and the other two circles representing degrees of distance. Each person places each other person somewhere on the three-tiered circle in relation to him or herself, based on the criterion they have helped the group to define, e.g., “How much trust I feel in X.” Each then speaks with each other group member in a timed interaction, and they share their placement of one another, including the statement, “I have placed you here in my social atom on this criterion because _____ [reason].” A person may also show on the social atom a position they can imagine the other moving to sometime in the future (see Figure 2).

Following the individual pairings, the discussion reverts to the group as a whole, tending to feelings generated by the exercise and analyzing the data about the group. The leader might invite further exploration by suggesting that the social atom be represented as a group space and that each person stand at a position within the circle that seems to best represent a composite of where other members placed

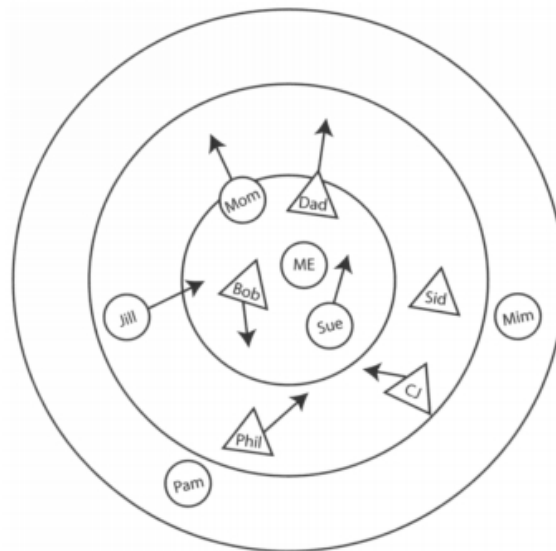


FIGURE 2. Target Social Atom with nearness and distance indicated.

them on this criterion. Each person speaks about the position and the feelings or response it evokes. If the criterion was trust, this would lead to intense discussion about why some members were highly trusted and others were not by the group. Using trust as a criterion would be a high-risk exercise. Less risky criteria could be used in less cohesive, or more vulnerable, groups, e.g., “Similar to me with respect to addiction,” or “My family situation.”

When people have face-to-face time with their highly ranked choices, and several members actively choose criteria for the group to explore, the group becomes highly interactive and involved in investigating its own dynamics.

CONCLUSION

Moreno’s sociometry emerged from a response to the ravages of war and from his determination to redirect a therapeutic response from his role of psychiatrist toward society in general, developing theories and methods capable of encompassing the whole of humankind (Moreno, 1978). He believed that individuals needed “techniques of freedom, a technique of balancing the spontaneous social forces to the greatest possible harmony and unity of all” (Moreno, 1978).

Moreno was a pioneer in the exploration of human connection. I believe, if he were alive today, he would be excited by many recent developments that, while not emerging directly from sociometry, bear out his theories. He would be delighted by the discoveries of interpersonal neurobiology, the mirror neuron and its connection

to empathy, as well as by neuroplasticity, the term used when connections change in response to experience (Siegel, 2007). Each novel experience presents us with an opportunity to decide to integrate the choices we have made into an updated interpersonal identity. If we make a shift, other people connected to us will often experience the impact. He would also welcome social network mapping, attachment theory, the growing interest in social intelligence (Goleman, 2006), and the variety of social messaging services available over the Internet. I believe he would be heartened by the current Obama administration's establishment of an Office of Public Engagement, on February 21, 2009. The administration has adopted core principles of openness and vowed to "explore new ideas unconstrained by predetermined outcomes" (National Coalition of Dialogue and Deliberation, 2009, p. 1).

However, I believe Moreno would have been alarmed by the increase of social isolation in America reported in the General Social Survey (2004). McPherson, Smith-Levin and Brashears (2006) conclude: "The number of people who have someone to talk to about matters that are important to them has declined dramatically, and the number of alternative discussion partners has shrunk" (p. 371). On the individual and group level, our emotional and physical health is integrally tied to positive connection with others (Pert, 1997). Moreno most likely would encourage each of us to use his methods to create communities of inclusion, with the survival and flourishing of all as the main objective.

REFERENCES

- Carlson-Sabelli, L., Sabelli, H., & Hale, A. (1994). Sociometry and sociodynamics. In P. Holmes, M. Karp, & M. Watson (Eds.), *Psychodrama since Moreno: Innovations in theory and practice* (pp. 147-285). London: Routledge.
- Clayton, L. (1982). The use of the cultural atom to record personality change in individual psychotherapy. *Journal of Group Psychotherapy, Psychodrama & Sociometry*, 35, 111-117.
- Clayton, M. (1994). Role theory and its application in clinical practice. In P. Holmes, M. Karp, & M. Watson (Eds.), *Psychodrama since Moreno: Innovations in theory and practice* (pp. 121-144). London: Routledge.
- Goleman, D. (2006). *Social intelligence: The new science of human relationships*. New York: Bantam.
- Hale, A. (1974). Warm-up to a Sociometric Exploration. *Journal of Group Psychotherapy, Psychodrama & Sociometry*, 27, 157-172.
- Hale, A. (1985). *Conducting clinical sociometric explorations: A manual for psychodramatists and sociometrists*. Roanoke, VA: Royal Publishing.
- Hale, A., & Little, D. (2004). *Sociometric processing of action events*. (2nd ed.). Riner, VA: International Sociometry Training Institute.
- McPherson, M., Smith-Lovin, L., & Brashears, M. (2006). Social isolation in America:

- Changes in core discussion networks over two decades. *American Sociological Review*, 71, 353–375.
- Mendelson, P. (1976). *Rethinking sociometry: Toward the reunification of theory, philosophy, methodology and praxis*. Unpublished doctoral dissertation, Washington University, St. Louis.
- Moreno, J. L. (1934/1953/1978). *Who shall survive? Foundations to sociometry, group psychotherapy and sociodrama*. Beacon, NY: Beacon House.
- Moreno, J. L. (1946). *Psychodrama* (Vol. 1). Beacon, NY: Beacon House.
- Moreno, J. L. (1955). *Preludes to my autobiography*. Beacon, NY: Beacon House.
- Moreno, J. L. (Ed.). (1960). *The sociometry reader*. Glencoe, IL: The Free Press.
- National Coalition of Dialogue and Deliberation. (2009). *Core principles for public engagement*. Retrieved April 12, 2009 from: http://www.thataway.org/?page_id=1442/.
- Pert, C. (1997). *Molecules of emotion*. New York: Scribner.
- Siegel, D. (1999). *The developing mind: Toward a neurobiology of interpersonal experience*. New York: Guilford.
- Siegel, D. (2007). *The mindful brain: Reflection and attunement in the cultivation of well-being*. New York: Norton.