



Adam K. Anderson

Award for Distinguished Scientific Early Career Contributions to Psychology

Citation

“For his outstanding contribution to understanding the representation of emotion and its influence on cognition. By combining psychological and neuroscience techniques with rigorous and creative experimental designs, Adam K. Anderson has advanced affective science by introducing new and exciting research domains and answering important questions that were previously unexplored. He has enhanced our understanding of the human amygdala by showing not only what it does but also what it does not do. He has extended our appreciation of the importance of facial expressions by demonstrating their role in perception. His theoretical depth, intelligence, and rigor have led to unique and important advances.”

Biography

Adam Keith Anderson was born in Brooklyn, New York, the first of two sons of Judith Schwaid and Carl Eric Anderson, whose union was an amalgam of Eastern European Jewry and Swedish boat building heritage. Early in his life his family made the short but common migration from Brooklyn across the Verrazano-Narrows Bridge to Staten Island, known famously for its ferry, which navigates past Ellis Island and the Statue of Liberty, and infamously for the Fresh Kills Landfill, the largest garbage dump in the world. Anderson’s early academic career was not exemplary. He was fond of finger sucking late into his development, loved drawing and painting, and had a rich

inner mental life that left little room for schoolwork. He was put in the slow track in primary school after failing an entrance exam (asked by the principal to spell the October 31st holiday, he responded “Haloween”). He was and remains very poor at spelling.

Following graduation from New Dorp High School, a large New York City public school, Anderson drove two and one-half hours north to attend tiny Vassar College. He entered with two missions: to earn a degree in physics and to get in enough practice time to enter a music conservatory to study classical guitar. Neither mission was precisely accomplished, but more progress was made on the latter. Vassar was one of the few undergraduate schools at that time that had a formal program in cognitive science. Cognitive science was the major for those who had trouble picking a major, with required courses in psychology, philosophy, neuroscience, computer science, and linguistics. During this time, Anderson read two very different influential books that fostered his curiosity about the cross-fertilization between art and science and a multiple-levels-of-analysis approach to the mind: R. Buckminster Fuller’s children’s book *Tetrascroll* and Michael Gazzaniga’s *The Social Brain*. Influential teachers during this time were Carol Christensen, who made the integration of neuroscience and cognition seem indispensable, and Janet Andrews, who met weekly with him to supervise his honors thesis. Some of his greatest lessons came from a surprising source—Terry Champlin, an adjunct faculty member in music. Champlin had abandoned studying science and mathematics at the Massachusetts Institute of Technology to pursue a life in music. Anderson would abandon music and fine arts for a life in science. Much of what he learned about himself emerged from conversations with Champlin while holding a classical guitar in a musty old room in Skinner Music Hall.

During his senior year, Anderson developed an interest in visual cognition, writing a literature review on the relation between perception and mental imagery for his honors thesis. Vassar was a wonderful place for studying, but Anderson acquired little in the way of practical experimental skills. Given his interests, he applied for and accepted a research assistant position in Stephen Kosslyn’s visual cognition laboratory at Harvard University. This work was exciting, challenging, and dispiriting. At the end of his time in Kosslyn’s lab, Anderson realized he was a terrible research assistant and really wished to be a graduate student pursuing his own research ideas, so he applied to graduate school in psychology. Unfortunately, this challenging time did not end so readily. All of his graduate applications were rejected except for one.

Anderson moved back to Staten Island and applied for a research fellowship at the Center for Developmental Neuroscience at the Institute for Basic Research in Developmental Disabilities, an institute he had not known existed a

few miles from his childhood home. There he worked with David Lewkowicz on intersensory perceptual development and enrolled in a doctoral program at the City College of New York. After a year of taking graduate classes, Anderson felt that he required a different context to maximize his own intellectual development, and he reapplied to graduate schools. He accepted an offer at Yale University's Department of Psychology to work with Mike Tarr on object recognition, but before Anderson arrived at graduate school, Tarr left Yale. Anderson made the critical decision to stay on at Yale to be one of the first graduate students of a recent hire, Liz Phelps. They were both huge New York Knicks fans, and in those early days when publications were not as plentiful, Phelps would reward students for publishing papers by taking them to a Knicks game. In addition to this extrinsic motivation, Anderson was intrinsically motivated to diversify his interests to examine the emotions, a recent shift in the research focus of Phelps's lab.

Anderson became interested in the New Look movement of the late 1940s and in extending these early postbehaviorist examinations of motivational influences on perception to include contemporary cognitive and neuroscientific approaches. His dissertation involved cognitive and neuropsychological examinations of emotional interactions with attention, a topic of research that expanded exponentially in the ensuing decade. This work highlighted the critical subcortical amygdalar contributions to the attentional salience of emotionally arousing events. Much of Anderson's graduate career was spent driving around a not-so-portable lab to examine patients in the comfort of their own homes. Kevin LaBar and Kevin O'Connor were excellent driving mates during these years. Many thanks are owed to the patients, in particular S.P., for being such willing participants in this research program. Anderson remains indebted to Liz Phelps for changing the direction of his intended course of study and providing him the freedom and resources to develop and pursue his own ideas. It takes a village to train a graduate student, and at Yale, Anderson was grateful to the many faculty members who were instrumental in his training and research program development, including Marvin Chun, Peter Salovey, Mike Davis, and Mahzarin Banaji, as well as to his peers Ingrid Olson and Yuhong Jiang.

Following graduation, Anderson was awarded a McDonnell-Pew postdoctoral fellowship to extend his methodological base to include functional neuroimaging at the Stanford University Department of Psychology in the laboratory of John Gabrieli. Although meeting time with Gabrieli was not always in abundance, it was of the highest quality. Gabrieli had an amazing knack for providing critical advice and for making clear the narrative of a scientific story. Anderson also learned to share Gabrieli's tendency toward being a scientific generalist rather than a specialist. In his

first six months as a postdoctoral student, Anderson shared an office with Noam Sobel, an expert in human olfaction. Sobel had a great influence on Anderson, teaching him how big questions can be addressed by small simple experiments. The rest of Anderson's postdoctoral years were spent sharing an office with Kevin Ochsner, who offered a striking counterpoint to Sobel and in conjunction with James Gross demonstrated that an understanding of emotions required a greater appreciation of their complexity. Kalina Christoff was instrumental in developing Anderson's understanding and application of neuroimaging and in fostering an appreciation of its utilization in understanding higher order functions. During this time, Anderson also had conversations with Bob Zajonc on the relations between their work, which sprouted into a collaboration. Anderson and Zajonc wrote a paper on the development of affective primacy that Anderson regrets remains unpublished.

Following his postdoctoral studies, Anderson headed northeast to join the faculty at the Department of Psychology at the University of Toronto, where he set up the Affect and Cognition Laboratory. He was attracted to Canada by the offer of a Canada Research Chair in cognitive and affective neuroscience. From his very first day on the job, he received invaluable support and encouragement from all his colleagues and collaborators at the University of Toronto. They have always made the department feel like his home. Anderson has been fortunate to work with an outstanding crop of graduate students. In collaboration with his students, he has seen his research extend in new directions, from examining evolutionary theories of the simple sensory origins of the emotions to investigating their present-day utility in regulating complex moral decision making.

Anderson's greatest appreciation is owed to his family, particularly his mother Judy, who has always had unwavering confidence in him even when his own confidence wavered, and his wife Eve and young daughter Noa. Destiny took its course when Adam Anderson met Eve. His first memory of Eve is of the strong prescription rose-colored glasses she wore as she described the beautiful mountains of Staten Island to him. He knew at that moment that anyone who could make a beautiful mountain out of a landfill was someone special. Every day of his life Anderson admires and cherishes Eve's joyful lightness of being. Any accolades he receives are Eve's to share.

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