Standing at the mast-head of my ship during a sunrise that crimsoned sky and sea, I once saw a large herd of whales in the east, all heading towards the sun, and for a moment vibrating in concert with peaked flukes. Standing at the mast-head of my ship during a sunrise that crimsoned sky and sea, I once saw a large herd of whales in the east, all heading towards the sun, and for a moment vibrating in concert with peaked flukes. Standing at the mast-head of my ship during a sunrise that crimsoned sky and sea, I once saw a large herd of whales in the east, all heading towards the sun, and for a moment vibrating in concert with peaked flukes. Standing at the mast-head of my ship during a sunrise that crimsoned sky and sea, I once saw a large herd of whales in the east, all heading towards the sun, and for a moment vibrating in concert with peaked flukes.

Ralph James Savarese

SEE IT FEELINGLY

Classic Novels, Autistic Readers, and the Schooling of a No-Good English Professor

“Impassioned and persuasive . . . A fresh and absorbing examination of autism.” —Kirkus Reviews
SEE IT

FEELINGLY
THOUGHT IN THE ACT
A series edited by Erin Manning and Brian Massumi
RALPH JAMES SAVARESE

SEE IT FEELINGLY

Classic Novels, Autistic Readers, and the Schooling of a No-Good English Professor
FOR THE SIX IN THE BOOK

. . .

And in memory of F. D. Reeve, my former teacher,
and Mando Montaño, my former student
LEAR:

... No eyes in your head, nor no money in your purse?
... Yet you see how this world goes.

EARL OF GLOUCESTER:

I see it feelingly.

William Shakespeare, *King Lear*
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Sooner or later in a reading life, one finds words are living things. Whether this knowledge comes by writing or reading, via reader-response theory or neuropsychoanalysis, hardly matters—a word or stanza (in the case of a poem) starts up from its page, extends broad wings, and reader and writer never forget it. In my case I read poems by D. H. Lawrence during a severe adolescent illness, a near-death experience, and found these simple lines to a torn pomegranate:

For my part, I prefer my heart to be broken.
It is so lovely, dawn-kaleidoscopic within the crack.

Later I’d learn of Lawrence’s long struggle with tuberculosis and know him as a lyric poet of the body in crisis, but first encountering his pomegranate, I only knew the words were sharp as broken glass, cryptic, and then lifting. I’d never seen anything like it. That a man’s heart could be preferably broken was interesting enough to a disabled teen fighting to stay alive, but then the poem’s living words flew up and away from custom: it is so lovely, dawn-kaleidoscopic within the crack. Wounds, I saw, could be the cracked doors of hope.

No adult had ever shared so much sharpened intimacy with me, not my teachers, not our local priest, certainly not my parents who held my blindness as something unmentionable whether in emotional or practical terms.

Lovely dawn-kaleidoscopic; torn skin of the fruit-heart-man; one who’s implicitly survived the night. If prior to this discovery words were quiescent, passive, easy to overlook, they were no longer.

In disability there are innumerable obstacles to having what we often call an empowered life—Helen Keller comes immediately to mind. When she sought admittance to Radcliffe College she was compelled to demonstrate her literacy
and she endured tests designed to prove that her written words and her inner life were not her own. How could a blind-deaf woman who used an amanuensis to communicate have an authentic and self-directed capacity for language? In Keller’s case her natural talent with language was so far beyond the skills of her “teacher,” Annie Sullivan, the matter was settled, if not quickly, speedily enough.

My reception as a blind writer who can speak has been less onerous than Keller’s, though it’s not without its cringeworthy moments. During an interview for a teaching position at a major American university, a professor in the creative writing department asked how I could write so clearly about the world if I can’t see? Aside from its borderline illegality (did he think I was faking blindness?), the question revealed how little some contemporary writers understand what language does at its most fundamental level. That all nouns are images had never occurred to my questioner, a well-regarded fiction writer who presumably should have recognized what I said next: “I say strawberry, you see a strawberry; I say battleship, you’ll see it. Whether I’ve seen the poxy thing myself has no bearing on your reception—this is why poets were believed to be magical in ancient times.” Of course, blind people produce mental imagery just like sighted people, as contemporary neuroscience has demonstrated. A working retina is not required.

But literary language is often as much about the unseen as the seen. Accordingly, Milton was the right poet to describe the vaults of hell. But what’s more interesting is the evident and often mysterious joy that comes from sensing the unseeable or unnameable in our reading. Joy is not always or invariably concerned with custom. Pablo Neruda, who spent many years alone as a young man traveling with the Chilean Foreign Service, wrote,

I grew accustomed to stubborn lands
where nobody ever asked me
whether I like lettuces
or if I prefer mint
like the elephants devour.
And from offering no answers,
I have a yellow heart.

In literary consciousness solitude is always instructive. Filtered through Neruda’s imagination, it’s both figuratively improbable and unforgettable.
There’s a growing acknowledgment among readers familiar with writers like Oliver Sacks and Steve Silberman that people with autism (who prefer, rightly, to be called autistics or autists) innately grasp the elephant’s mint and its influence on the yellow heart with nary a wink. Or with many winks. Like the blind, they haven’t been asked too many questions either and, until recently, have offered few answers. But the times, as Bob Dylan famously sang, “they are a-changin’.”

In *See It Feelingly: Classic Novels, Autistic Readers, and the Schooling of a No-Good English Professor*, the poet and memoirist Ralph James Savarese has engaged with people on the spectrum, not to study them, not to inflict upon them the Keller test, but to explore classic literature with men and women who know a great deal about solitude, the crack in the pomegranate, the dawn-kaleidoscopic, and the silent wounds in lovely hearts. One can’t help but feel while reading this remarkable book the wonder of reading truly. I was reminded of Paulo Freire’s dictum: “Nobody studies authentically who does not take the critical position of being the subject of curiosity, of the reading, of the process of discovery.” Emily Dickinson put it like this:

He ate and drank the precious words,  
His spirit grew robust;  
He knew no more that he was poor,  
Nor that his frame was dust.  
He danced along the dingy days,  
And this bequest of wings  
Was but a book. What liberty  
A loosened spirit brings!

This is a volume about reading unlike any I’ve ever encountered. Put away those pernicious clichés and stereotypes of autism. Autistics lack theory of mind. . . Autistics suffer from linguistic impairment. . . Autistics cannot engage in imaginative play. . . Follow along as a nonspeaking man from Austin, Texas, swims through *Moby-Dick* to tell his own sensory story. Or watch a cyberpunk writer and computer programmer from Portland, Oregon, track the empathetic failings of Rick Deckard, a bounty hunter in *Do Androids Dream of Electric Sheep?* who “retires” six escaped androids. Like these androids, autistics are said to lack empathy.

What do neurodivergent minds bring to novel reading? Plenty. Their oft-reported talent for “thinking in pictures” may even provide a leg up in literature’s “cinema of emotions.”
W. H. Auden once remarked that “as readers, most of us, to some degree, are like those urchins who pencil moustaches on the faces of girls in advertisements.” But what if we’re the pencil, the urchin, the girl, the advertisement, the mustache, without the drag anchor of uncertainty? That is, what if no reader is neurotypical? Wouldn’t masterful neuro-atypical readers then become mentors in whose authority we can derive much profit? This is at its very core one of the most probative and imaginative recognitions we can “brave”—that all writers and readers are more complicated and surprising than we’ve customarily known.

Stephen Kuusisto
Annie Dillard once wrote, “I think that the dying pray at the last not ‘please,’ but ‘thank you,’ as a guest thanks his host at the door.” Finishing this sort of book has been a little bit like dying, and I, too, wish to thank my gracious hosts: DJ, Tito, Jamie, Dora, Eugenie, and Temple. What a dinner party of ideas they each put on! Their remarkable generosity gave life to this project. What I did with it—well, that’s my responsibility, not theirs. I hope, at the very least, that I have honored their participation by foregrounding their own words and by dramatizing repeatedly the intractable problem of any anthropological endeavor. Mistakes are inevitable, but interpretive humility is not.

I want to thank Erin Manning, whose belief in this book made all the difference, and Ken Wissoker and Elizabeth Ault at Duke University Press. My agent, Deirdre Mullane, performed her duties with great skill and gusto. Thanks as well to Gillian Silverman for considerable help with the Grandin chapter and to Lisa Zunshine, to whom that chapter is dedicated. Meeting Lisa and working closely with her on a project about literature and autism turned out to be the sort of coincidence that changes one’s life. Nancy Barber read the whole book and offered invaluable feedback; her friendship of almost thirty years lifted me up when I fell down. Pilar Martinez Benedi read every word (in multiple drafts), offering both warm encouragement and invaluable guidance. I profited enormously from talking to her about literature and neuroscience.

I am very grateful to the Mellon Foundation for granting me a Humanities-Writ-Large fellowship, which funded a year at Duke University’s Institute for Brain Sciences. Special thanks to Michael Platt, Zab Johnson, Tanya Schreiber, Lasana Harris, Len White, Laura Eastwood, Chris Chia, Geri Dawson, and, especially, Deborah Jenson. I learned so very much from Deborah about cognitive literary studies—no one could have been more generous.
with her time or more enthusiastic about my work. I now count her and her husband, Jim Jenson, as dear friends. While I was at Duke, Priscilla Wald and Joe Donahue befriended me— and housed me as well! I drafted the Mukhopadhyay chapter in their guest room. I am indebted, in addition, to the book’s anonymous, external reviewers, whose comments were extremely useful, and to the National Endowment for the Humanities, which awarded me a summer research fellowship.

I also received tremendous support from Grinnell College, and I wish to thank both the president, Raynard Kington, and the dean, Mike Latham, for helping to make Grinnell a place where research and teaching symbiotically thrive. I owe the students in a recent independent study and those in my “neuro-lit” seminars, where I first began to try to reconcile the insights of disability studies and cognitive literary studies, a great deal. I owe my colleague Johanna Meehan and her partner, Maura Strassberg, even more. They opened up their house to me—I commute to Grinnell from Iowa City—and their hearts. They’ve heard more about this project than any friends should have to. I feel the same way about two other couples: Mark Montgomery and Tinker Powell and Maria Tapias and Xavier Escandell. Writing is lonely; comrades in the endeavor help a great deal. Even closer to home, my in-laws, Phil and Rachel Thornton, have offered unflagging love and support. My son, DJ, once said of them, “You’re old enough to be my grandparents but young enough to be my friends.” By not only embracing difference but also unreservedly relishing it, they have taught me much. Their gentle spirits are balm for a hostile world.

My colleagues in the Grinnell English department offered significant assistance while I was chair of the department—half of the book was drafted, and all of it was revised, during that time. Erik Simpson was especially helpful. Dean Bakopoulos and Alissa Nutting ran the department’s reading series, Writers@Grinnell. They did so skillfully and cheerfully while sending their own books out into the world. Their devotion to the daily practice of writing steered me through the waters of despair. Without De Dudley and Lisa Mulholland, the department’s support staff assistants, I would be worse than lost. Their good humor is a life raft; their competence, a rescue helicopter! I’m grateful to my colleague Shanna Benjamin for providing some research guidance for chapter 4.

I’m also grateful to Mary K. Bercaw Edwards for graciously conducting a tour of the Charles W. Morgan at Mystic Seaport and to Will Garrison, the curator of the Berkshire Historical Society at Arrowhead, and Will Demick,
guide, for conducting a tour of Melville’s homestead. The first “Will” was a 1985 graduate of Grinnell.

I could not have written this book without the example, input, and/or encouragement of so many writers, scholars, artists, activists, and friends across the country—and indeed the globe. A woefully incomplete list will have to suffice: Sara Maria Acevedo, Kazim Ali, Melanie Almeder, Diane Alters, Mel Baggs, Julia Bascom, Jill Bennett, Tammy Berberi, Michael Bérubé, Doug Biklen, Larry Bissonnette, Sonia Boué, Maria Brincker, Lydia X. Z. Brown, Victoria Brown, Brenda Brueggemann, Mike Burke, Sheree Burke, David Campbell, Joy Castro, Kerima Cevik, Geoff Hume Cooke, David Coster, Tom Couser, Lennard Davis, Selene DePackh, Marty Dobrow, Elizabeth Donaldson, Anne Donnellan, John Duffy, Marshall Duke, David Dunbar, Paula Durbin-Westby, Judy Endow, Eva Feder-Kittay, Angus Fletcher, Stephen Forssell, Chris Foss, Chris Gabbard, Susannah Goodman, Ibby Grace, Mike Guenther, Elizabeth Hamilton, Laura Hans, Bev Harp, Aeron Haynie, Andy Hazucha, Judith Hill-Weld, Monica Huerta, Paweł Jędrzejko, Dan Kaiser, Julie Kane, Estee Klar, Kevin Kopelson, Jennifer Krohn, Martha Leary, Dawn-Joy Leong, Cynthia Lewiecki-Wilson, Heather Lobban-Viravong, Janet Lyon, Brian Massumi, John Matteson, Harley McIlrath, Bobbie and Shirley McKibbin, Karen McRitchie, Celeste Miller, Susannah Mintz, Mario Montano, Cal Montgomery, Soma Mukhopadhyay, Stuart Murray, Nico Ian Nicolson, Christina Nicolaidis, Keith Oatley, Laura Otis, Nick Pentzell, Martina Pfeiler, Jeff Porter, Lynn Powell, Elizabeth Prevost, Dawn Prince, Chammi Rajapatirana, Scott Robertson, Julia Rodas, Rachel Rottenberg, Sue Rubin, Dani Alexis Ryskamp, Becky Saletan, Carrie Sandahl, John Schaut, Carlos Schaut, Phil Schwarz, Sue Schweik, Amy Sequenzia, Jenn Seybert, Stephen Shore, Steve Silberman, Olga Solomon, Chris Sten, Laura Stevenson, Jane Thrailkill, Tracy Thresher, Sarah Thwaites, Emily Titon, Elizabeth Torres, Jason Tougaw, James Trent, Nick Walker, Brent White, Marco Wilkinson, Amy Williams, Donna Williams, James Wilson, Tilly Woodward, Melanie Yergeau, Zhenyu Yuan, Martin Zelder, and Mary Zournazi.

A few people deserve special thanks. Ben Reiss and Rosemarie Garland-Thomson reminded me, when I needed it most, that what I was writing was both important and distinctive. The novelist Elizabeth Graver, with whom I went to college, has, for almost forty years, been a lighthouse of encouragement and fine sentence making. David Blake, with whom I taught high school English some three decades ago, has offered continual instruction in artful thinking and writing—I’ve learned much from him and his work. John
Bryant, Melvillean extraordinaire and fellow adoptive father, has tutored my very soul. Suzanne Paola alerted me to the possibilities of writing about neurodiversity in both factual and creative ways. Her friendship has been sustaining. In his poems and conversation, the poet Rick Kenney has repeatedly demonstrated that literature and science, like Ishmael and Queequeg, belong in the same bed. Peter Sokol is the kind of friend that one dreams of having (and that one can never come close to equaling). Let me put John and Elaine Mahon in that category as well. I sometimes think that my friend Michael Hofmann exists in order to prove that extraordinary achievement and extraordinary humility can sometimes go hand in hand. He, like his partner, Barbara Hofmeister, is also extraordinarily kind. I count it a lucky blessing that the Internet brought the poet Chris Martin into my life; we had each been teaching poetry writing to autistics without knowing of the other’s activities. The comedian Henny Youngman once joked that his brother worked as a lifeguard in a carwash. Steve Kuusisto and David Weiss work there as well. Again and again, they rescue me in my convertible! I feel the same way about Jeremy Mindich, my oldest friend. His wife, Amy Smith—let me call her a brother-guard, too. Their remarkable generosity has no expression in language. For thirty-five years, John and Leslie Paoletti have been like much-needed parents, and Sarah and Rebecca Paoletti like much-needed sisters. Emily Thornton Savarese has been my partner for almost three decades, the last two parenting DJ. Would that I were as filled with such steady and unassuming wisdom as she. Would that I were as indefatigably generous.

Finally, since this is a book about teaching—autistics teaching me, me (sort of) teaching autistics—I’ll conclude with a short list of teachers who made a difference in my life. From middle school and high school: Charles Campbell, Tad Cauvoti, Bill Doswell, Rod Dulany, Gail Nields, Ed Sundt, Peter Swineheart, and Fred Zirm. From college: George Creeger, Annie Dillard, Sherman Hawkins, Gertrude Hughes, Priscilla Meyer, John Paoletti, F. D. Reeve, Richard Stamelman, and John Tivenan. From graduate school: Don Ault, Marsha Bryant, Michael Hofmann, David Leverenz, John Murchek, Robert Ray, Robert Rothstein, Stephanie Smith, and Phil Wegner. These teachers showed me what a life of the mind (and body) could be.

Grateful acknowledgment is made to the editors of Fourth Genre, who published a version of the prologue, and to the editors of Thinking in the World, who published an earlier version of chapter 2. The prologue was a “Notable Essay” selection in the Best American Essays series of 2013.
Donald Barthelme once described “the aim of literature” as “the creation of a strange object covered with fur which breaks your heart.” Like a creature birthed in a basement study, a creature at once preposterous and terrifying, literature cannot be fully domesticated. It will not sit; it will not roll over; it will not greet you at the door. However firm the leash—or shackles—of form, this Adam of the writer’s labors takes the reader for a walk.

When Barthelme says that the hirsute entity should break our hearts, he is in part alluding to an effect of narrative. “All stories are about wolves,” writes Margaret Atwood, and wolves bring conflict and loss. Of course, a majority of the time, the wolves in life are human, as when I opened my computer this morning and saw a photograph of a rhino—a living rhino—whose face had been hacked off by poachers wanting its horns. Because the poachers had removed most of the rhino’s underlying bones, leaving only soft tissue, veterinarians used elephant skin, which is tough, to close the gaping wound. One of the news accounts I read reported, “As clients pay top dollar for rhino horns, poachers have become more brutal and sophisticated, forcing veterinarians to come up with innovative ways of treatment.” If the writer is a kind of Dr. Frankenstein, she is also a sympathetic and experimental veterinarian.

But what does literary creation have to do with autism? The disorder’s well-known “triad of impairments” (in communication, imagination, and social interaction) suggests that reading literature, let alone writing it, would be a considerable challenge for autistics. Indeed, studies from the last three decades have consistently presented evidence of deficits in two key areas: theory of mind (ToM) and the apprehension of figurative language. Simon Baron-Cohen, chief purveyor of the ToM hypothesis, says of autistics that they are unable “to develop an awareness of what is in the mind of another
human.” If the mental states of others are beyond their reach, how can they possibly manage that moody jungle gym of make-believe conflict called a novel? And, further, how can they ascertain the undisclosed and indirect meaning of irony or metaphor? An obdurate, self-contained literality plagues autistic consciousness, the experts maintain. This view of autism has become so prevalent that a bestselling novel, *The Curious Incident of the Dog in the Night-Time*, makes social and metaphoric bafflement a central aspect of the protagonist’s characterization.

Yet the proliferation of autistic autobiography—in print, on the web, in presentations at conferences—reveals a very different picture of autism, one more in line with what I have experienced with my son, DJ, and with the many autistics I know. Literary reading and writing are by no means too alien or demanding for them. Even a figure like Temple Grandin, who conceives of herself as an overly logical animal scientist, turns out to be much more sensitive to literature than we were led to believe. In his 1993 *New Yorker* profile of Grandin, “An Anthropologist on Mars,” Oliver Sacks presented a portrait of conspicuous psychological and aesthetic impairment that came to shape popular conceptions of autism. The piece is slippery, and at times he almost puts words in Grandin’s mouth.

Consider, for example, the passage in which he asks her about Greek mythology and Shakespeare:

“I understand Nemesis and Hubris,” she said. But the loves of the gods, *I ascertained* [my italics], left her unmoved—and puzzled. It was similar with Shakespeare’s plays. She was bewildered, she said, by Romeo and Juliet (“I never knew what they were up to”), and with *Hamlet* she got lost with the back-and-forth of the play. *Though she ascribed these problems to “sequencing difficulties,” they seemed to arise from her failure to empathize with the characters* [my italics], to follow the intricate play of motive and intention.

Like a wrangler corralling cattle, Sacks maneuvers Grandin into the autistic pen. Dismissing her own account of her challenges, he “ascertains” a more fundamental and debilitating lack. Yet one needn’t have autism to be confused by, or to be uninterested in, Shakespeare, as anyone who has taught college literature courses knows.

Not half a page later, Sacks quotes from the very article in which she blames sequencing difficulties for her struggles with literature: “My inter-
ests are factual and my recreational reading consists mostly of science and livestock publications. I have little interest in novels with complicated interpersonal relationships, because I am unable to remember the sequence of events. Detailed descriptions of new technologies in science fiction or descriptions of exotic places are much more interesting.” Sequencing difficulties may prevent identification with characters in longer literary works—think, for instance, of how intricate some nineteenth-century British novels are—but it doesn’t mean that Grandin lacks empathy, as her profound feeling for livestock shows, or that she is incapable of responding to shorter works.

At the same time, Grandin herself suggests that beauty—in art or nature—doesn’t make her “swoon.” “Her inability to respond deeply, emotionally, subjectively, is not confined to music,” Sacks writes in the profile. “There is a similar poverty of emotional or aesthetic response to most visual scenes: she can describe them with great accuracy but they do not seem to correspond or to evoke any strongly felt states of mind.” While in some ways Grandin contributes to the stereotype of unfeeling, Spock-like detachment in autism, Sacks pushes the idea too far, once again straining to reconcile what he observes as a progressive “neuro-anthropologist” with what he has learned as a conventional doctor. Because he is such a fine writer and because he seeks to explore the “paradox of disease,” what he calls its “creative potential,” the profile of Grandin is alive with humanizing complexity and contradiction. But the reader must look for moments when autism appears simply as another form of life and not as lamentable pathology.

When I interviewed Grandin—Temple—in the summer of 2016, I discovered that one of her favorite classes in college had been “Western Civilization,” which she described as a “great books” course. With fondness, she remembered reading Keats’s “Ode on A Grecian Urn” and Dante’s Inferno. That the center of hell appears in this latter work as a frozen wasteland, with Satan emerging mid-breast from the ice, had remained fixed in her mind. She found the paradox intriguing. She said that she especially enjoyed the way the professor helped to elucidate the deeper meanings of the text, and more than once she spoke about the value of ambiguity, a key element in literature. She conceived of ambiguity as an antidote to simplistic thinking. She also reported that literature helped her to understand her own and others’ feelings.

But did it affect her? Did it stir her emotions? Although she specifically cited the movie Titanic and the song “The Widow Maker” as examples of things
that had made her cry, she said that literature had also elicited emotion from her in the past, though not to the same degree. Interestingly, both of the above-mentioned “disaster romances” turn on the gallant sacrifice of a male lover. (Temple is celibate and has claimed repeatedly that she doesn’t understand the subtle nuances of romance.) In “The Widow Maker,” a truck driver purposefully swings his rig off the road in order to save ten kids in a pickup. When, in ethnographic researcher mode, I dryly asked why the end of Titanic had moved her, Temple was incredulous: “The lovers can’t ever be together!” Tragedy—of Jack and Rose or Billy Mack and Wanda Ann—did in fact wound her.

But my point isn’t simply that autistics can “do” literature. In a number of key ways literature lines up nicely with an autistic neurology. Here, Barthelme’s quip about “strange objects covered with fur” anticipates my argument. Famous for redesigning the chutes at cattle-processing plants—rounded chutes, it turns out, are much more soothing to livestock awaiting slaughter than rectilinear ones—Temple has gone so far as to propose that autistic cognition resembles animal cognition. “The thing is I don’t think in language,” she says, “and animals don’t think in language. It’s sensory based thinking, thinking in pictures, thinking in smells, thinking in touches.”

If, as studies have demonstrated, autistics disproportionately rely on posterior sensory regions of the brain to think, then neurotypicals disproportionately rely on their frontal lobes. Neurotypicals, Temple believes, are “abstractified in their sensory perceptions as well as their thoughts.” “Animals don’t see their ideas of things,” she stresses. “They see the actual things themselves.” Temple illustrates the difference between the two groups by pointing to what their brains look like in a scanner when performing an embedded figure task. In this protocol, subjects must find a figure hidden within a complicated picture—autistics tend to find the figure much more quickly than neurotypicals. Using a remarkable poetic analogy, Temple compares the visual center of autistic brains during the test to “a little bright cabin out in the snowy wilderness.” “Everything else is shut off, but [it] is turned on really bright,” she says. Neurotypical brains, by contrast, remind her of a lamp store: “There’s so much stuff turned on that the visual stuff gets obscured.” For Temple, the unfiltered visual concentration of autistics resembles that of animals.

Of course, all of that “other stuff” in the lamp store is crucial for understanding literature. The point is that literature partially corrects for the “abstractification” of neurotypical cognition just as it partially corrects for the
resolute concreteness of autistic cognition. As Temple herself makes clear, autistics accomplish higher order thought in a different way. To explain the distinction between the two neurotypes, she must move beyond the sensory, even as she uses a concrete image to make her point. As literature explores its larger themes, it, too, thinks in pictures, smells, and touches. “That’s right,” Temple said when I described how its diction sets off sensory fireworks. While obviously word-based, literature aims to simulate embodied experience by activating nonlinguistic areas in the reader’s brain, and it may be as close to an autistic way of engaging with the world as any form of language will allow. Literature may even constitute, as I have come to believe, a wordy haven or home. (Or, with Barthelme in mind, we might say a wordy burrow or lair.)

In act IV, scene VI, of Shakespeare’s tragedy *King Lear*, the Earl of Gloucester, whose eyes have been gouged out, begs to be led to the cliffs of Dover so that he may jump off and kill himself. While on the heath, he runs into Lear, who foolishly bequeathed his kingdom to his conniving daughters and has himself plunged into madness. As Lear decries the failure of ordinary sight to uncover ruthless deception, Gloucester invokes a different—and, in the end, superior—kind of vision. “Your eyes are in / a heavy case, your purse in a light; and yet you see how / this world goes,” the king says. “I see it feelingly,” Gloucester replies. While the blind may lack images generated by the retina, they do not lack images generated by the visual cortex, as research has shown. Gloucester’s remark uncovers the neurological basis of the familiar *insight* trope: mental imagery. Literature, we might say, actively cultivates the condition of Gloucester’s blindness so as to enable the reader to feel beyond or beneath what her eyes merely see. Think of a novel or a play or a poem as a visual limbic system, a verbal cinema for the emotions. The poet Anne Sexton gets at the idea, albeit in an inverted form, when she writes in a letter, “I like you. Your eyes are full of language.”

...
grade-point average. (That, for the record, is a lot better than his old man’s undergraduate GPA!) My intention from the beginning of this project has been to eschew the customary focus on autistic deficits and to explore instead how a talent for sensory engagement—and, yes, strong feeling—might contribute productively to the reading process. If my son and other autistic people have taught me anything, it is to look for competence in unexpected forms and, when thwarted, to try again.

What, you might ask, are my qualifications for writing this book? First and foremost, I am a reader, an unapologetic lover of books. My attention, like my hands, is constantly divided. I read while eating; I read while doing the laundry; I even read while bathing myself. I am also a writer and English professor whose scholarly work falls largely into two categories: disability studies and cognitive approaches to literature. The latter involves the application of neuroscientific insights to literary understanding. The former tries to look at physiological distinctiveness—being blind or deaf, using a wheelchair—as just another way of existing in the world and not an occasion for pity. With the advent of a difference model in autism, self-advocates (and increasingly doctors and scientists) speak not of pathology but of neurodiversity.

In 2012–13 I was awarded a neurohumanities fellowship at Duke University’s Institute for Brain Sciences. Before the academic year began, I participated in a boot camp for incoming doctoral students in neuroscience. For two weeks, from 8:00 a.m. to 7:00 p.m., I learned about the brain—I even touched one during a neuroanatomy lab! I also learned firsthand about some of the discipline’s tools for probing the mysteries of human thought and action, such as event-related potentials (ERP), functional magnetic resonance imaging (fMRI), and transcranial magnetic stimulation (TMS). During my fellowship year, I took science classes, attended lectures, and taught a neurohumanities course. My fellowship project tried to account for what Ilona Roth has termed the “conundrum of autistic poetry.” As Roth explains, “Prose and poetry written by people with ASD [autism spectrum disorders] call for investigation because to write a poem without imagination, or to write about oneself without awareness, would seem an oxymoron.” I had had success teaching my son and other autistics to write poetry, and I wanted to try to square what the research literature said about autistic impairment with significant evidence to the contrary.

The project may sound academic, but what motivated it was the sheer joy of poetry—my own and that of the autistic poets with whom I worked. Here’s
how I once described the project to the six-year-old son of a colleague in Durham, North Carolina, who had precociously asked me about my “research.” “Remember Eeyore, from Winnie-the-Pooh, who believes the other animals in the forest to be ‘brainless’? There’s ‘only grey stuff . . . blown into their heads by mistake;’ he whines, while of course celebrating his own intelligence. Eeyore writes poetry that Pooh says is superior to his own. Well, I’m trying to teach the other animals in the forest how to write poems. I want poetry to be as plentiful as the leaves on the trees!”

My other qualifications for writing this book? I talk about strange objects covered with fur for a living. My students at Grinnell College are very bright young people from all over the United States and, in fact, the world. Like playful puppies, they love to chew on texts, and they come to class prepared. At least a few times a semester, I get to witness the transformative power of literature. It’s like reenacting my own awakening as an undergraduate: the son of a lawyer and an economics major becomes a bookworm. Picture me as Bill Murray in Groundhog Day, blissfully stuck in a time loop. I, too, am a weatherman of sorts, trafficking in the future, waiting for Punxsutawney Phil to emerge from his den, coaxing the flowers that he might herald from the ground.

Over the years, I’ve increasingly found myself teaching students at Grinnell who have what the medical community used to call Asperger syndrome, a relatively “mild” form of autism. (Now there’s just a single diagnosis: ASD.) While the stereotype would look for students only in those disciplines that foreground logical thinking—in the aforementioned Curious Incident of the Dog in the Night-Time, the protagonist, though clearly deficient in most academic subjects, is studying to take his A-levels in math—at my college we don’t allow this sort of rigid specialization. We glorify the liberal arts: we want our students to be well rounded. The economics majors take painting; the biology majors take anthropology; and the lit majors take calculus. And so even if an Aspie kid has failed to ascertain what kind of college he is attending and longs to take nothing but computer science, he’s steered toward classes in the humanities, at least a few of them anyway.

I remember one young man who was in my introductory poetry-writing course. He seemed the epitome of the quiet math nerd—until, that is, he put pen to paper and out poured exquisite figures of speech and strangely elegantly rhythms. He used to walk the railroad tracks, which bisect the campus, before class, counting the ties. Back and forth he’d go, his head down, ostensibly oblivious to the world above and around those wooden timbers. I could see him from my office in the English/History building. The higher-ups in Student
Affairs were concerned that he might get hit by a train, but if anyone knew the railroad’s schedule—the line moved corn sweetener from one end of the state to the other—it was this young man. “Counting ties calms my anxiety,” he told me. “I love their symmetry.”

Because the college itself is quite quirky, he was able to make it through. (We tend to attract the alienated bohemian type. As a colleague once joked, “It’s a place where misfits thrive.”) Because the college is also quite small, we are able to get to know our students and provide support. Sadly, this is far from the rule in higher education, and many with Asperger syndrome or “high-functioning” autism fall through the cracks. And those with much more significant autism never make it to college in the first place. By some estimates, my son will be just the tenth nonspeaking person with autism ever to earn a bachelor’s degree.

This book is in part a response to this predicament. While I’m generally not a fan of distance learning—I prefer an actual classroom—I started to use Skype with a few autistics who had been much less fortunate in their educational pursuits than my son or the young man mentioned above. They lived in other states, and Skype seemed our only chance for regular, half-bodied connection. We’d read a novel—Tim O’Brien’s *The Things They Carried*, say—and talk about it. Although an ardent inclusion advocate, I quickly noticed an advantage of this technology (once you overlooked its occasional fitfulness). Because autistics take in so much detail, they tend to become exhausted in unfamiliar places. A kind of hypervigilance reigns, which brings anxiety. Being able to work in their home environments allowed them to relax and to concentrate. They could also take a break when necessary and tic or stim as much as they wanted. Such actions wouldn’t be deemed “disruptive.”

After several years of conducting regular Skype tutorials, I began to ponder the idea of a narrative about my experience. Why not share the compelling insights of autistic readers? Perhaps it would inspire people to view autism differently. Chatting with eager, neurodivergent minds had certainly invigorated my own love of literature. Again and again, books I knew quite well had come alive in fresh ways. For instance, reading Mark Twain’s novel *The Adventures of Huckleberry Finn* with DJ compelled me to think more deeply about its adoption conceit and the kind of emotion that a novel can elicit in readers. I remember being astonished as much by DJ’s ferocious identification with the runaway slave Jim as with the lonesome river itself. The latter’s melancholy intelligence seemed akin, he said, to that of a nonspeaking autist—both remain unrecognized.
When I discussed Herman Melville’s novel *Moby-Dick* (1851) with Tito Mukhopadhyay, a nonspeaking young man from Austin, Texas, he identified so intensely with the book’s cetacean hero that he began to view the current obsession with finding a cure for autism as a kind of whale hunt. In the novel, of course, a megalomaniacal ship captain named Ahab seeks to avenge the loss of his leg at the hands—or, rather, the *jaws*—of Moby Dick, a huge white Leviathan. By the time Tito and I were done reading, even I thought the novel, that strange object encased in blubber, was an allegory of the present-day autism wars. Interestingly enough, Tito found an actual autistic character in the book. When he called my attention to how Melville describes the carpenter who fashions Ahab a leg, I was shocked, though perhaps I shouldn’t have been. Autism is by no means a new condition, even though it wasn’t officially recognized until the early 1940s. With the novel’s elaborate evocation of the sperm whale’s sensing, *Moby-Dick* turned out to be an excellent way of exploring sensory-processing differences in autism. Whatever the challenges that autistics face, one thing is clear: their sensory lives are much richer and more immediate than our own. Tito, who has authored a number of well-received books but never been included in a regular school, is wildly and uncommonly synesthetic. Both auditory and tactile stimulation have a visual, and sometimes even an olfactory, component.

And so, deciding to write a book, I recruited some additional conversation partners. Because I have my doctorate in American literature, I opted to stick with American classics. Whenever I could, I tried to pick a novel that might resonate with a particular partner. For example, I knew that Jamie Burke was keenly interested in Native American history and culture, so I chose Leslie Marmon Silko’s novel *Ceremony* (1977), which tells the story of a Laguna-Pueblo veteran who suffers from posttraumatic stress disorder and gradually journeys back to wholeness. The novel promotes a Native understanding of health, and I was curious to see how Jamie conceived of his own therapeutic journey to better sensory integration, movement, and speech. With the intervention of an innovative occupational therapist, he had learned to type independently and then, at the age of thirteen, to read aloud what he was typing. He can now speak conversationally. More and more, scientists are viewing autism as a complex sensorimotor condition and not some innate defect of imagination or sociality. Silko’s *Ceremony* presents something like a Native American version of occupational therapy with its emphasis on whole body healing through ritualistic movement. Jamie’s visuospatial prowess and his acute appreciation of pattern illuminated
both the novel’s spiritual geography and the subtle key to the protagonist’s recovery.

Sometimes I got lucky. I’d read online that Dora Raymaker had once worked as a computer programmer. She circumvented her dyscalculia (or difficulty making sense of numbers) by seeing code as a series of colorful, interlocking 3D shapes. She is now a community-based researcher, despite sometimes being unable to speak for periods at a time. We had both appeared in an autism documentary, *Loving Lampposts, Living Autistic*, and in the film she typed everything she said. Dora was apparently interested in artificial intelligence, so I proposed that we read Philip K. Dick’s novel *Do Androids Dream of Electric Sheep*? (1968), in which a bounty hunter tracks down and kills six rogue androids. Although she hadn’t read the novel before, she’d seen *Blade Runner*, its filmic adaptation, at least twenty-five times—indeed, it was her favorite movie.

Incredibly, she was also a budding cyberpunk writer whose own futuristic novels feature autistic heroes who must work around their poorly understood disabilities while, at the same time, exploiting their unique abilities. A classic of science fiction, Dick’s *Androids* hinges on the question of whether the replicants, who are said to lack empathy, are really less human than the empathy-challenged humans who hunt them. For years, of course, scientists have claimed that autistics lack empathy. Codirector of the Academic Autism Spectrum Partnership in Research and Education, Dora read the novel as if she were adhering to the principle of community-based participatory research. According to this principle, research subjects—in this case, androids—should be given a chance to weigh in on questions about their essential nature. Approaching the novel like this, she fruitfully unpacked Dick’s coruscating ironies.

Eugenie Belkin describes herself as “White. Japanese. Mongolian. Black. Cherokee. Indonesian. Female. Autistic. Deaf. Jewish.” She is also the mother of an autistic child. All too frequently, autism is conceived of as a “white” disorder, and it is rarely discussed in relation to another race or ethnicity, let alone another disability. Nor is it discussed in relation to parenting—indeed, the operative assumption is that people with disabilities shouldn’t parent. With Eugenie, I chose to read Carson McCullers’s novel *The Heart Is a Lonely Hunter* (1940), which features, among other characters, two deaf individuals, a labor agitator, a teenage girl on the cusp of sexual awakening, and an African American doctor, all of whom are psychologically alienated. In the novel, one of the deaf characters becomes mentally ill and is sent to an in-
stitution. Set in Georgia, which had the fifth highest rate of sterilization of the mentally ill and “deficient” in the first half of the twentieth century, the novel maps a terrain of immense isolation and repression. “The most fatal thing a man can try to do is stand alone,” the doctor says, and yet how to stand together? (The word “autism” can be translated as “the person alone.”) How to communicate across insurmountable divides?

Like many people with Asperger syndrome, Eugenie received an autism diagnosis in adulthood, and she represents an especially intriguing example of what academics like to call intersectional identity. What would a sense of connectedness mean for a mixed-race, deaf, autistic woman whose hearing, yet autistic, son passes as white? A classically trained ballerina and ice-skating coach who is fluent in American Sign Language and who has one cochlear implant, Eugenie “thinks in feelings,” as she puts it. For her, the translation of fluid emotion into something mechanically cognitive remains a challenge, though she is a quick thinker and an effective writer. Although she struggles with motion dyslexia, her dedication to ballet, a historically white art form, suggests an antidote to the clumsiness of narrow identity labels and politics.

In the book’s final chapter, I converse with Temple, about whom much has been written and yet about whom much is apparently still to be known. When she recited lines by heart from William Wordsworth’s “Ode: Intimations of Immortality from Recollections of Early Childhood,” I was stunned. Nobody had ever really asked about her experience with literature. Temple did seem less emotionally engaged as a reader, but that judgment is relative, not absolute, and anyway she brought other strengths to the discussion table. The old adage about autism—“When you’ve seen one person with autism, you’ve seen exactly one person with autism”—very much applies to autistic reading. While DJ, Tito, Burke, Dora, Eugenie, and Temple share some notable similarities, what distinguishes them is just as interesting and important. Autism, like so-called neurotypicality, is conspicuously heterogeneous.

In an effort to be sensitive to Temple’s sequencing challenges, busy schedule, and avowed interests, I suggested that we read two short stories from a recent anthology, *Among Animals: The Lives of Animals and Humans in Contemporary Short Fiction*. The first is about a family that ethically raises the animals it eats. Narrated from a young child’s point of view, it presents a father who insists on naming a new pig “Meat” so that everyone will be reminded of its fate. The second is about a female researcher whose devotion to gentoo penguins in Antarctica leads to a kind of lonely misanthropy.
Eschewing romantic relationships, she finds herself drawn into a brief sexual relationship with a tourist who was left behind by his boat.

I must admit that I tipped the scales of readerly engagement with Temple. I was confident she would respond to a story about the politics of meat consumption. But would she appreciate what the medium of fiction can do with this familiar topic? I predicted that she would identify with the solitary researcher in the second story, yet here she surprised me. Like any other reader, she brought her personal experiences to bear on the central conflict. Instead of lamenting her own steadfast celibacy, however, she offered a quasi-feminist defense of it. She related that her aunt, at whose ranch she was introduced to livestock as a teenager, had an abusive husband and that she'd never seen a single marriage she admired. In fact, she had witnessed too many women, including some of her students, sacrifice their own ambitions for love. “I’m all about my career,” she said. Suddenly, what many, including Temple herself at times, presented as a nearly inevitable consequence of autism seemed anything but. Neurological explanations for remaining celibate gave way to psychological and social ones. As in literature itself, complex motivation reigned.

"Will such a book prove anything?" a friend of mine recently asked. No, it won’t prove anything. My data set, if you can call it that, is ridiculously small, and I strategically chose the books and participants. What is more, the project is intentionally, if casually, ethnographical. I spend time with my conversation partners, report what they have to say. In the process, I become their friend and, yes, their champion. I also become their student—not only of autism, but also of literature. The poet Robert Graves reminds us, “In love, as in sport, the amateur status must be strictly maintained.” In this book, I try desperately not to be an expert, or at least one who refuses to learn anything himself and who alienates all but fellow English professors with his recondite discourse. Instead, I tell a story, pitched halfway between memoir and literary criticism, about neurodiverse brains. I look at the emerging science of autism, and I compare it to what we know about how neurotypical brains read poems and novels. In the end, the book is about loving literature—truly, madly, deeply, as it were—and I hope at least some of that love is contagious.

Readers who have a horse in the autism race may be tempted to label my conversation partners anomalies. If I generalize about competence or potential competence, it is because so many people generalize about incompetence, and that negative generalization serves as yet another barrier to achievement, to say nothing of autistic fulfillment and happiness. When no one expects an autistic child to be good at language arts, he is found anywhere but in the
language arts classroom. A few years back, I wrote to the authors of a study on metaphoric comprehension in autism to object to their sweeping claim of impairment. When I presented evidence of comprehension in individual autistics, the authors dismissed it as statistically meaningless. “Probabilistically,” they said, autistics have great difficulty with metaphor.

But is it wise to reject such evidence out of hand, especially when we still don’t know much about autism (and the many subtypes that comprise it) and when access to education and therapy is so uneven? Lisa Zunshine has pointed out that we don’t describe Henry James, William Shakespeare, or Jane Austen as “outliers on the neurotypical spectrum.” No, “we feel that they are ‘like us,’ only more intensely so, glorifying the community of ‘us,’ by showing ‘us’ what ‘we’ are capable of.” Let’s think of exemplary autistics like this. And while we’re at it, let’s imagine a more expansive and inclusive “us”: people who, as Umberto Eco once put it, “live for books.”
INTRODUCTION
I have cited only autism-related books and articles, cognitive literary studies–related books and articles, and literary criticism. The first mentions of the primary novels and short stories appear in the endnotes; after those first mentions, I use in-text citations within parentheses. All other quotations come from the conversations that I had with my collaborators, or from other writers and thinkers, which I’ve treated, the way a memoirist would, as little, uncited flares of wisdom or humor.


2 Consider, for example, the passage . . . Oliver Sacks, An Anthropologist on Mars: Seven Paradoxical Tales (New York: Vintage, 1996), 259.


3 “Her inability to respond deeply . . .” Sacks, Anthropologist on Mars, 86.

3 “There is a similar poverty . . .” Sacks, Anthropologist on Mars, 86.

3 While in some ways Grandin . . . Sacks, Anthropologist on Mars, xx.

3 Because he is such a fine writer . . . Sacks, Anthropologist on Mars, xvi.

4 But my point isn’t simply . . . In line with the thinking of many self-advocates, I prefer the term “autistic” (or “autist”), as a noun, over “person with autism.” As Jim Sinclair notes, “Saying ‘person with autism’ suggests that the autism can be separated from the person.” If autism isn’t understood pejoratively, as something that needs to be eliminated, but rather is celebrated, as a form of neurological difference, then the linguistic problem disappears. See Jim Sinclair, “Why I Dislike ‘Person-First’ Language,” http://autismmythbusters.com/general-public/autistic-vs-people-with-autism/jim

If, as studies have demonstrated . . . See, for example, Hideya Koshino et al., “Functional Connectivity in an fMRI Working Memory Task in High-Functioning Autism,” NeuroImage 24, no. 3 (2005): 810–21. This study asked subjects to remember individual letters presented to them on a screen. Whereas the control group “used the expected verbal strategy . . . to facilitate memory . . . the autism group processed the letter stimuli as nonverbal, visualgraphical codes” (818). The study spoke of autistics as engaging in “lower level visuospatial feature analysis,” and it cited the attachment to such analysis as confirmation of a 2004 study’s claim of underconnectivity in autistic brains. Literate autistics, the theory goes, ought to suppress such basic sensory information in favor of frontal lobe abstractions; instead, they really looked at the letters! According to the study, autistic cognition is “shifted toward the right hemisphere as well as toward the posterior part of the brain” (819).

Neurotypicals, Grandin believes, are . . . Temple Grandin and Catherine Johnson, Animals in Translation: Using the Mysteries of Autism to Decode Animal Behavior (New York: Mariner Books, 2006), 30. Neurotypicals miss much of the actual world—both with respect to what they attend to and how they attend to it. As Olga Bogdashina explains, “With maturation, there is a strategy to suppress [‘raw sensory information’]. The maturing mind becomes increasingly aware only of concepts to the exclusion of the details that comprise these concepts.” And to the exclusion, we might say, of the things themselves. See Olga Bogdashina, Autism and the Edges of the Known World: Sensitivities, Language, and Constructed Reality (London: Jessica Kingsley, 2010), 84.

“Animals don’t see their ideas . . .” Grandin and Johnson, Animals.

Using a remarkable poetic analogy . . . Klinkenborg, “What Do Animals Think?”

“Everything else is shut off . . .” Klinkenborg, “What Do Animals Think?”

Neurotypical brains, by contrast . . . Klinkenborg, “What Do Animals Think?”

To explain the distinction . . . Laura Otis reminds us that generalizations can only take us so far and often occlude significant differences in the ways that individual minds engage in the production of sensuous mental imagery. Here, in my own ethnographical project, I want to be particularly sensitive to this point. On the one hand, there do indeed appear to be
conspicuous differences between autistic and nonautistic processing; on the other hand, no two autistic or nonautistic people think in exactly the same way. See Laura Otis, *Rethinking Thought: Inside the Minds of Creative Scientists and Artists* (New York: Oxford University Press, 2015).

While the blind may lack images . . . See, for example, Helder Bertolo, “Visual Imagery without Visual Perception?,” *Psicologica* 26, no. 1 (2005): 173–88. For years, debate reigned about the relationship between visual perception and the generation of visual mental imagery. Was the latter actually a kind of seeing? Did it rely on the same brain regions as the former? Stephen Kosslyn’s work showed that in general it did, but the degree to which it activated these regions varied from person to person. As Otis explains, “When . . . Martha Farah asked participants to form visual images in response to verbal cues, she noticed that in some people the activity reached farther back into the occipital cortex than it did in others. In people with visually rich mental lives, imagery was not like vision; it was vision, relying on the same neural structures that made vision possible” (*Rethinking Thought*, 67). And yet, to conflate visual perception with visual imagery would be a mistake, for it would then follow that the blind cannot produce mental imagery, which is not the case. Indeed, some blind people use mental images more effectively than sighted people.

*My son, for example, carries . . .* I have chosen not to update the book’s biographical elements; rather, I let them develop as the book develops. My son graduated from Oberlin in May 2017—with High Honors in anthropology and election into Phi Beta Kappa.


As Roth explains, “Prose and . . .” Roth, “Imagination,” 146.


*More and more, scientists are viewing autism . . .* See, for example, the work of Laurent Mottron at the University of Montreal—in particular,


10 Dora was apparently interested in . . . Philip K. Dick, *Do Androids Dream of Electric Sheep?* (New York: Del Rey, 1996).


11 She related that her aunt . . . After Temple’s mother got divorced, she married a man whose sister was married to a rancher. At this man’s ranch, she was introduced to cattle.


**PROLOGUE**


15 In the case of Tubman . . . Savarese, *Reasonable People*, 417, 418. To be clear, I am not disparaging intellectually disabled people; nor am I uncritically venerating intelligence. Rather, I am resisting—strenuously—the equation between outward appearance and inward inability, and I am doing so in the context of a historical underappreciation of autistic talent.