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REPRESENTING ANIMAL MINDS IN EARLY ANIMAL AUTOBIOGRAPHY: CHARLOTTE TUCKER'S *THE RAMBLES OF A RAT* AND NINETEENTH-CENTURY NATURAL HISTORY

By Julie A. Smith

ANIMAL AUTOBIOGRAPHY – A FIRST-PERSON fictional narrative in which an animal tells its own story – emerged in the late eighteenth century as the first attempt to represent animal minds in extended narrative form. Authors of this genre were anxious to create accurate, believable animal characters, even as they afforded them human language and a habit of critical commentary. To do this, they wrote in sync with scientific understandings of animals as set out in books of natural history. A few authors are explicit about their debt to natural history, and their comments point to a broad but intended compatibility between the ideas of animal minds in animal autobiography and those in the popularized scientific discourse of the day.

The history of animal autobiography in late-eighteenth and nineteenth-century England has been effectively surveyed by Tess Cosslett. Discussing nearly twenty such works, from Dorothy Kilner's *The Life and Perambulation of a Mouse* (1783) to *Pussy Meow: The Autobiography of a Cat* by S. Louise Patterson (1901), Cosslett shows animal autobiography to be a popular genre. Her accounting does not include the many new editions and reissues (new impressions with minor changes) of the works. For example, Kilner's *The Life and Perambulation of a Mouse* went into nine reissues or new editions in England and America from the time it was published until the end of the nineteenth century. Charlotte Tucker's *Rambles of a Rat* (1857) was published in twenty-nine reissues or new editions between 1857 and 1897 in London and New York, as well as served as the basis for two French adaptations.[1] Although individual works ring their own variations on the genre, *Rambles* conforms to type in having an animal narrator who relates the challenges of surviving in a largely human-controlled world. Also conventional is the work's stated purpose to improve human behavior through lessons about kindness. Like other works of its kind, the book's apparent audience is children. However, the demarcation between adult and children's literature had slippage then as does it now, as "children's literature" can include works for young adults of interest to older ones. Indeed, *Rambles* and other animal autobiographies often have adult characters who serve as positive and negative exemplars, pointing to a desired audience beyond the juvenile one. *Rambles* is also conventional in being socially conservative, careful to reinforce middle

class values and prevailing social hierarchies, not to mention the Great Chain of Being. The solution to poverty is charity, not a reshuffling of the social order. Starving children are not exempt from the prohibition against theft, although those who fail to assist them are severely castigated. Importantly, Tucker, like all authors of animal autobiography, believed that the minds of her animal characters were representative of their species as they existed in real life. Confidence for this assumption depended on mutuality between animal autobiography and the scientific culture of the day as it was expressed in natural history, as I will argue below.

As the genre moved into the twentieth century, authorial interest in it shifted to North America. There writers continued to grapple with familiar problems: how to explain or frame the linguistic capacity of their characters, how even perhaps to create a language that might believably represent a non-languaged mind, and how to utilize the form to speak to the welfare of animals (in some cases). Although no tabulation of twentieth-century animal autobiographies exists, one easily finds interesting animal narrators: a loquacious cat of a celebrated explorer; the horse of a famous Southern general perplexed by human battle; a rat gone insane in a scientific laboratory, who adopts the speech and point of view of the human experimenter; an African Gray Parrot tortured by the banal sounds of a typical domestic household; Shakespeare's dog, who mulls over the disconnect between exquisite human language and the much less beautiful human behavior.[2] At the end of the twentieth century, the possibilities of animal autobiography came to fruition under postmodernism, in my opinion. Authors such as John Hawkes, Paul Auster, and the Polish author Andrzej Zaniewski shed all self-consciousness about creating languaged animals and produced some of the most eloquent, metalinguistic animals in the literary record, even as, paradoxically, they suggested the possibility of a complex consciousness beyond language.[3] The result is animal narrators who cope with their experiences outside of strict frameworks of victimhood or rectitude. None seems simply a human with limitations. All the same, posthumanist authors were indebted to nineteenth-century animal autobiography for a literary form that located animals in human worlds that profoundly impacted them, for animal narrators capable of a point of view, and for a literary form that took animals' minds seriously, as I hope to suggest below.

I. Critical Backgrounds

NATURAL HISTORY BOOKS presented information about animals through one or another organizational scheme amounting to a "dictionary of nature." The entries for each species typically described its physical features, its geographical distribution, habitat, "manners" or behavioral traits, temperament, and relations to others. Anecdotes supplemented the descriptions, rendering animals as individuals as well as exemplars of species. A prefatory essay took up polemical matters, such as the difference between human reason and animal instinct. Thus, three kinds of discourse – argument, description, and anecdote – constitute the genre's identity as text. As a mixed-mode for representing animal minds, natural history was filled with complicated, competing, and contradictory attitudes. Furthermore, it was written by many different kinds of people for diverse audiences. When animal autobiographers expressly borrowed from natural history or were indirectly influenced by it, they imported this heterogeneity and often unsettled ideas about animals even further by converting third-person point of view into a fictive first-person one.

Charlotte Tucker's *The Rambles of a Rat*, published in 1857, derives from a natural history bibliographic essay on rats that is identified in its preface. It thus serves as an explicit case of a literary author using natural history for her construction of animal minds. Borrowing extensively from the essay for her plot, Tucker created what she saw as facts of animal behavior dressed in fiction. In so doing, she imported and unpacked ideas about animal consciousness that were part of the narrative, descriptive, and expository features of natural history.

The history of natural history has been written thoroughly and well.[4] The relevant line of inquiry for this essay is the broad involvement in natural history by an amateur public. This is because it suggests both the interest and availability of natural history texts to the very people who would write and read animal autobiography. All historians of natural history have made clear its wide-spread popularization. For example, Harriet Ritvo has written of the attraction of natural history for a middle-class audience:

> In the middle of the eighteenth century, knowledge about nature was accumulating rapidly. Natural history had become both a prestigious scientific discipline and a popular avocation. An eager adult public awaited the dissemination of information collected by Enlightenment naturalists. . . . [M]ost awaited the popular distillations. ("Learning from Animals" 72)

In her "Animal Pleasures: Popular Zoology in Eighteenth- and Nineteenth-Century England," Ritvo reports on the many writers producing natural history books for a general audience and remarks that "[n]atural history became part of the increasingly commercialized, predominantly middle-class culture of leisure" (240). Drouin and Bensaude-Vincent note that popular natural history within a broad cultural context might be said to be almost a "way of life" for much of the populace (409), and they go on to discuss the strategies for writing popular natural history for the middle-class audience. This included collaboration between paid professionals, gentlemanly specialists, and amateur practitioners. Indeed, one might say that the sheer number of natural history books is one indication of their pervasive influence.[5]

Animal autobiography has likewise received close and expert critical attention. Contemporary discussion of the genre began with Samuel Pickering's 1981 study of children's literature in the eighteenth century. Pickering showed that children's literature, including animal autobiography, drew on the educational theories of John Locke in order to educate the sensibilities of children into kindness to the end of producing benevolent and humane adults. In 1994, Jacqueline Colombat added to Pickering's discussion of Locke the suggestion that nineteenth-century Romantic interest in consciousness in animals was also a central influence on animal autobiography.[6] In excellent chapters on Sarah Trimmer and Anna Sewell, Moira Ferguson analyzes the ways these women writers used speaking animals to link moral responsibility toward animals with support for class hierarchy, empire, and women's authority.

Tess Cosslett's 2006 *Talking Animals in British Children's Fiction, 1786–1914* sets out to trace the many lines of influence on talking animals in children's literature of the period. As do earlier critics, Cosslett points to Locke as seminal in the linking of animal characters, the appeal for better treatment of real-life animals, and moral education for children. But Cosslett examines other interesting influences as well, including Aesopian fables, medieval bestiaries and Renaissance emblem books, natural theology, the educational theory of Jean Jacques Rousseau, and the emergence of women writers of children's books.

Cosslett's reference to natural theology, that is, the use of nature to demonstrate the existence and goodness of God, can be elaborated to include a seminal role for natural history books. Natural theology pervades books of popular natural history and was the likely source for its transmission into animal autobiography, where it is also found. In her chapter "Animal Autobiography," Cosslett says that one important purpose of the genre was the transmission of information about real animals – "the desire to convey accurate natural historical information" – about living beings (39). As we will see below, Tucker insists on the truth of at least part of her representation of her animal characters as well as their role in evidencing God's goodness. The question then becomes where did she such find such truths or think that she did? She is very clear that she found them in books of natural history. And prior to Tucker, that indefatigable guardian of children's minds and godmother of animal biography, Sarah Trimmer, says much the same thing – that nature as represented in natural history books, including her own for children, provides the veridical substrate for speaking fictionally as animals.

With respect particularly to the representation of animal minds in animal autobiography, Cosslett remarks that authors made attempts to create a non-human consciousness. However, she appears to conclude that for the most part animal consciousness was built up through analogies with human types (65), that within these works "animal consciousness is similar to human consciousness, or at least . . . human consciousness can serve as a metaphor for animal consciousness" (73). Cosslett's remark points to a central issue in critical discussions about animal minds in animal autobiography: do early animal narrators reflect human consciousness, particularly that of marginal, disadvantaged human persons – women, children, servants, slaves, the elderly – or animal consciousness? There is no critical consensus. Teresa Mangum says that she began her study of nineteenth-century autobiographies of dogs with the intention of showing how they functioned as a polemic against brutal treatment of older humans (44). However, she came to conclude that dogs were also represented as "subjects in their own right, capable of not only pain but also fear, misery, memory, and mourning" (37). Looking at a broad historical span of animal autobiography that goes back to earlier texts, Karla Armbruster feels that the genre demonstrates "a new awareness of animal subjectivity, and a desire on the part of many animal lovers to give that subjectivity a voice" (4). Taking a similar view, Marion Copeland maintains that animal autobiographies of horses dating back to *Black Beauty* (1877) "make a claim not only for the sentience of the other-than-human animal but for its self-awareness, intelligence, grasp of past and future, as well as present, and understanding of the worlds, cultural and biological, in which it lives" (180). In his introduction to *Black Beauty*, Peter Hollendale likewise asserts that Sewell attempted an imaginative fidelity to the horse's mind and drew on a non-fiction volume called *The Horse Book* (xxvii). Some critics, however, view the genre as primarily giving voice to human consciousness as a way to further human agendas. Monica Flegal argues that animal autobiography allowed women to sympathetically imagine their own victimization and participate in the power erotics of mastering (mistressing) animals (92). Anne Milne writes that "[t]o be reader-credible at the end of the eighteenth century, animal voices are molded and sold as innate, intuitive, instinctive as a way to help the 'new' individual human reader connect the fixed and fictionalized animal to their own apparently heart-felt . . . response to that animal-type" (173). As the above summary suggests, the emphasis of most criticism of animal autobiography has been its sources and purposes, with some discussion about ways it might reflect authors' understanding of real animals' minds.

Such criticism, however, rarely examines the nature of those minds as understood by the period more broadly nor the source for them beyond an author's personal sensibilities.

More important to animal autobiography than the Romantics or the sensitivities of individual authors was the ongoing debate about whether animals' behavior was the product of reason or instinct. Authors of popular natural history distilled and responded to arguments made by major thinkers of the period. Robert Richards has thoroughly examined the discourse of those writing in response to Descartes and looking forward to Darwin.[7] As Richards shows, some thinkers supported Descartes's idea of animals as automatons acting from instinct. Others, most familiarly Erasmus Darwin, were proponents of Sensationalist doctrine that granted reason and intelligence to animals to varying degrees on the argument that the origin of these capacities was simply an ability to have sensations. These discussions were transmitted to the public through books of natural history, which were themselves enmeshed in the play of competing ideas. The question of animal reason as opposed to animal instinct mattered deeply to a religious public that wanted to reconcile the truths about animal capacities conveyed by observations transmitted through natural history with a necessary boundary between humans and animals based on human rationality.[8] As Ritvo ("Animal Consciousness") and Rob Boddice have shown, one strategy for keeping obviously clever animals in their place was to formulate and deploy varieties of the term "sagacity."

Animal autobiography sought to represent animals' minds as established at least in part by scientific fact. Simply put, it needed to depict real animals in order to promote the lesson of kindness. Compassion for creatures whose natures were fantastic, only of the human imagination, would make no sense, since such animals would obviously not be impacted by mistreatment. Furthermore, many authors of animal autobiography cared deeply about real animals and animal welfare. Thus, animal autobiography needed real animal natures to write about. Natural history laid out the natural dispositions of animal species, and animal autobiography depicted those dispositions in individual animals under assault, making them capable of speaking about that distress. One finds numerous such animals complaining about human mistreatment precisely on the basis that it violated their natures. In *Memoirs of Dick, the Little Poney*, Dick says, speaking of his castration, "Ye tasteless sons of men! Is Nature such a bungling performer, that her works must submit to your improvements in almost every instance?" (31; ch. 4).

Two works of Sarah Trimmer mark the trail from natural history to talking narrative animals. In her preface to *An Easy Introduction to the Knowledge of Nature*, Trimmer cites Dr. Watts' *Treatise On Education*" (v) to make the point that the natural powers of children will be improved by teaching them to observe nature and through nature to discover God's wisdom, the expected message of natural theology. Accordingly, in the text proper, she takes her two children for an educational walk in the meadow and discourses on the plants and animals they see there. But subsequently she recommends the reading of "some Books of Natural History" as a way to augment the direct study of nature (71). In fact, her report on the walk is the framing device for her own natural history book for children. In her later *Fabulous Histories*, Trimmer suggests that the lessons in *An Easy Introduction* will be enhanced by imagining the animals to speak:

> Many young Readers doubtless remember to have met with a Book, which gives an account of a little boy, named Henry, and his sister Charlotte, who were indulged, by their Mamma, with walking in the fields and gardens, where she taught them to take particular notice of every object that presented

> itself to their view. The consequence of this was, that they contracted a great fondness for Animals; and used often to express a wish, that their Birds, Cats, Dogs & could talk, that they might hold conversation with them. Their mamma, therefore, to amuse them, composed the following Fabulous Histories; in which the sentiments and affections of a good Father and Mother, and a Family of Children, are supposed to be possessed by a Nest of Redbreasts; and others of the feathered race, by the force of imagination, endued with the same faculties. (ix-x; introduction)

Trimmer's purpose is to convey moral instruction through the robins but also to "excite compassion and tenderness for those interesting and delightful creatures" by making them speak (x; introduction). Although an animal biography with excessively quoted robins rather than autobiography per se, *Fabulous Histories* establishes the genealogy from natural history books to talking animals who tell the stories of their lives.

Lest one interpret the last line of Trimmer's statement as saying that her robins are figments of her imagination, one need only to look to later statements by the two adult protagonists of the book, Mrs. Benson and Mrs. Wilson. After presenting the biography of the talkative robin family, Mrs. Benson takes the children to visit Farmer Wilson's wife to see "many different animals treated with propriety" (146; ch. 17). Mrs. Benson and Mrs. Wilson discuss the conditions under which one might take the life of an animal or insect. Mrs. Wilson says that "it would be a good way to accustom one's self, before one kills any thing, to change situation with it in imagination" (159; ch. 18). The imaginative act here does not disturb animal fact as acquired from natural history books. One of the children, Harriet, taking Mrs. Wilson's lesson to heart, says, "I am sure I shall never kill anything, without first magnifying it in my mind, and thinking what it would say for itself if able to speak" (160; ch. 18). Her mother replies that

> in order to have a proper notion of their form, and to be capable of making these ideal speeches, you must study Natural History; from whence you will learn, how wonderful their construction is; how carefully and tenderly the inferior creatures provide for their young; how ingenious their various employments are; . . . and how excellently they are informed and instructed by their great Creator, for the enjoyment of happiness in their different classes of existence, which happiness we have certainly no right wantonly to disturb. (160–61; ch. 18)

Thus, the speaking animals of animal biography and autobiography were considered true to the natures of real animals, enhanced by human speech to the end of promoting kindness. In fact, popular natural history itself often had the same motive. Edward Jesse begins his *Gleanings in Natural History* by saying, "One of the chief objects I had in view in writing them [his Natural History books], was to pourtray the character of animals, and to excite more kindly feelings towards them" (v).

In the end, both genres found themselves in the same difficulty – appearing to grant animals capacities that needed to be contained to conform to cultural and religious dictates. Mrs. Trimmer is constantly warning the children against too much affection for animals even as she strives to inculcate empathy for them. Animal autobiographers had the same anxieties about granting too much. When they translated the descriptions of animals into narrative, when they described animals making their way in the real world, they began to suggest features of consciousness that might be said to herald much later questions about animal minds that arose in the late twentieth and early twenty-first centuries in literature,

philosophy, and neuroscience. One might say that fiction was the test and exploration of implications about animal consciousness articulated in natural history.[9]

II. Charlotte Tucker and Natural History

CHARLOTTE TUCKER (1821–1893) was a distant relation of James Boswell. Writing under the pseudonym A.L.O.E. ("A Lady of England"), she produced over 150 books and booklets of moral instruction for children. She was born into a large middle-class family immersed in the Indian civil service. Tucker never married but formed deep attachments to several of her siblings and their children. For most of her life, she lived with her parents, functioning as a formidable head of household after the death of her father. When her mother died, Tucker lost the domestic authority she had achieved after her father's death. She moved in with her brother's family for six years. In 1875, at the age of fifty-four, she left England forever to become a self-supported missionary in India.[10]

As I have suggested above, for middle-class people like Tucker, natural history was the primary source for explaining animals in the late eighteenth and early nineteenth centuries. Tucker was squarely in that demographic: "[b]ooks on Natural History always proved an attraction to her," writes her nineteenth-century biographer, and "many little Natural History facts come incidentally into her correspondence, sometimes given from her own observation" (Giberne 24). In 1842, when she was twenty-one, Tucker wrote a farce called *The Pretender*. The play has an assertive heroine named Horatia, who is nicknamed Ratty and described as "much devoted to scientific pursuits." Anathemtized by the buffoon of the play as a "scientific Monster," Ratty is bookish; and Tucker surely modeled this character on herself: "Miss Ratty's sadly taken up with the books, d'ye see. She's poring all day long over a lot of different sorts of learnings; I don't remember their names, but they all ends in *oddity*" (Giberne 43). Fifteen years later Tucker would make the main character of *Rambles* a rat named Ratto and his one surviving brother a rat named Oddity, locating her characters and herself within the popular scientific tradition of natural history that is referred to in her early work.

In her preface to *The Rambles of a Rat*, Tucker defends her representation of extraordinary rat behavior by reference to the natural history essay that she used as her source:

> For my anecdotes of this much-despised race I am principally indebted to an interesting article on the subject which appeared in the "Quarterly Review."
>
> I would suggest to my readers how wide and delightful a field of knowledge natural history must open to all, . . . for the more deeply we search into the wonders around us, the more clearly we discover the wisdom which is displayed even in the lowest forms of creation! (v-vi)

"Rats" appeared in the *Quarterly Review* the same year *Rambles* was published, 1857. It is a bibliographic essay that reports on selected natural history and literary works about rats. Tucker used it for all but one of her episodes. Her *Rambles of a Rat* tells the story of a character named Ratto, one of seven black rats born in a shed near the Thames. The rats share the shed with a group of brown Norwegian rats and two orphaned human children. The youngest boy is depicted in the frontispiece watching one of the rats lead a blind rat with a stick (see Figure 1). As the narrator, Ratto predates the most famous animal narrator, Black Beauty, by some twenty years. His story has the episodic structure typical of animal

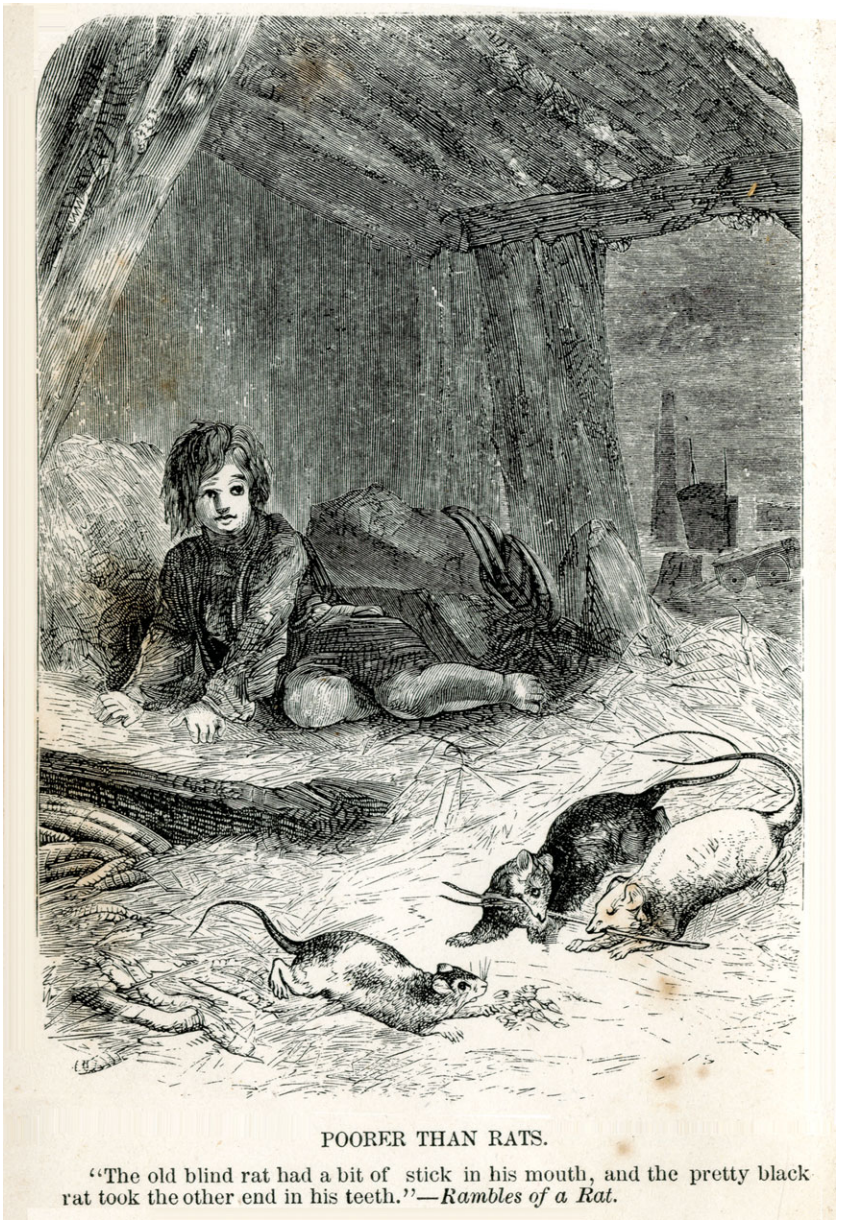

Figure 1. (Color online) Frontispiece from *The Rambles of a Rat* (New York: Robert Carter & Brothers, 1861). Baldwin Library of Historical Children's Literature, George A. Smathers Libraries, University of Florida.

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autobiography. Ratto and his friend Whiskerandos leave the shed to seek adventures in the wider world. The two travel first to the Zoological Gardens in London and then to Russia. After time abroad, Ratto and Whiskerandos return to England to reunite with relatives and friends, including Ratto's piebald brother, Oddity, who has become the domesticated pet of a farmer.

In adapting anecdotes from the *Quarterly Review* essay, Tucker imports into her text the animal mental capacities found in her natural history source. "[F]acts are enclosed in my fiction" (v; preface), as she puts it. These facts include not just rat adventures derived from anecdotes in her source but an assortment of cognitive and emotional states:

> Let not my readers suppose that in writing *The Rambles of a Rat* I have been blowing bubbles of fancy for their amusement, to divert them during an idle hour. Like the hollow glass balls which children delight in, my bubbles of fancy have something solid within them, – facts are enclosed in my fiction. I have indeed made rats talk, feel, and reflect, as those little creatures never did; but the courage, presence of mind, fidelity, and kindness, which I have attributed to my heroes, have been shown by real rats. Such adventures as I have described have actually happened to them. (v; preface)

Tucker's preface presupposes the obligatory divide between humans and animals, which then gives her license to grant her animals a range of complex mental states. As in natural history, in animal autobiography, animals may be represented as having sophisticated cognitive responses and situation-appropriate emotions to a variety of predicaments as long as descriptions are grounded in the assumption of human superiority.

III. Literary Animals in Natural History

ONE MIGHT WELL SPECULATE that animal autobiographers looked to natural history for their representation of animal minds for reasons additional to its cultural pervasiveness and its ready-to-hand material on animals. Natural history had early associations with literature, and it shared with literature a holistic approach to animal lives. Natural history books since the early modern period had represented the natural world through a complex matrix of perspectives, and meaning was thought to be accessible only when approached from different angles (Ashcroft 23; Miller 65). This complexity made possible the transformation of natural history animals into animals who were characters in extended narratives.

The importance of the literary side of natural history is made clear in Oliver Goldsmith's description of the objectives of natural history in his 1774, eight-volume, *An History of the Earth, and Animated Nature*:

> Natural History, considered in its utmost extent, comprehends two objects. First, that of discovering, ascertaining, and naming all the various productions of Nature. Secondly, that of describing the properties, manners and relations, which they bear to us, and to each other. The first, which is the most difficult part of this science, is systematical, dry, mechanical, and incomplete. The second is more amusing, exhibits new pictures to the imagination, and improves our relish for existence, by widening the prospect of Nature around us. (iii; vol. 1; preface)

For Goldsmith, the second aim of natural history, that is, description of animals, was an act of immersion and imagination that benefitted from literary talents. Speaking of his primary

source, Le Comte de Buffon, Goldsmith praises above all "[t]he warmth of his style, and the brilliancy of his imagination" (x; vol. 2; preface).

Natural historians sometimes divided themselves into two kinds – the "classifiers" and the "describers" – consonant with the two objectives described by Goldsmith. The "describers" did not reject classification but emphasized instead the "habitudes and histories" of animals:

> for as, in the moral world, we judge the character of a man, not from a single act, but by the tenor of his life, so, in the natural world, it is necessary to the right understanding of the station which an animal holds in the scale of creation, that all of its characteristics are known. (Swainson, *Preliminary Discourse* 75–76)

The describers, what we would call popularizers, took for granted that natural history would study living animals. Reverend J. G. Wood, who wrote the popular 1853 *Illustrated Natural History*, emphasizes elsewhere the importance of the "whole life" by criticizing those who take natural history into the direction of comparative anatomy:

> Some again call themselves Naturalists, and under the shelter of that high-sounding name occupy themselves in destroying nature. The true naturalist never destroys life without good cause. . . . [F]or the life is really the nature, and that gone, the chief interest of the creature is gone too. We should form but a poor notion of the human being, were we only to see it present to our eyes in the mummy; and equally insufficient is the idea that can be formed of an animal from the inspection of its outward frame. Nature and life belong to each other; and if torn asunder, the one is objectless and the other gone. . . .
>
> . . . [W]e do not intend to treat of the dead and dried bodies of animals, but of their life. (*Common Objects* 7)

Even professional systematizers like Georges Cuvier understood that traditional natural history adopted a holistic approach to animal lives. Cuvier writes that the natural historian is not permitted "as in the case of the experimenter, to subtract successively from each condition, and so reduce the problem to its elements; but he must take it entire, with all its conditions at once, and can analyze only in thought" (2).

IV. Animal Consciousness in Natural History

TAKEN AS A WHOLE, natural history allowed animals a "grab bag of intellectual and emotional attitudes" and served as a repository for broad cultural thinking on the topic of animal minds made accessible and interesting to a non-specialist audience (Ritvo, "Animal Consciousness" 850). My point here is that animal autobiography, directly and indirectly, had strong connections to what its authors viewed as scientific data relevant to animal mental states. However, such mental states were not necessarily understood to mean what they meant when applied to humans.

Animals in natural history were viewed as having not only physical forms suitable to their ways of life (their "economies") but species-specific dispositions. The temperaments of animals were part of their species' nature: "The strange animosities, attachments, alliances, habits, and propensities, which govern and agitate such vast multitudes of different hostile and congenial natures, must be necessarily interesting to the human heart" (*Beauties* viii).

All of these dispositions signaled mental states that were as much a part of the makeup of an animal species as the length and configuration of the tail. Thus when Goldsmith describes rats, which he loathed, as having a kind of vicious, calculating mentality, a "contemptible meanness," a capacity for "teizing," a "disposition to injure" (64–67 passim; vol. 4, ch. 2), he is talking about qualities that he sees as little different from the two large cutting teeth in each jaw. The writer of the *Quarterly Review* essay explains rat disposition more appreciatively:

> Dwelling in the midst of alarms, he might be supposed to pass an uneasy and nervous existence. But it is nothing of the kind. The same Providence which has furnished him with the teeth suitable to the work they have to perform has endowed him with the feelings proper to his lot, and no animal, if he be watched from a distance, appears more happy and complacent. In danger he preserves a wonderful presence of mind, and acts upon the principle that while there is life there is hope. His cunning on such occasions is often remarkable, and evinces a reasoning power of no contemptible order. ("Rats" 133–34)

Thus, animal mental capacities did not need to be explained any more particularly than as an endowment of the creator.

But for some commentators, animal mentalisms needed to be mapped onto a discussion of instinct in opposition to human reason. For these authors, mental states apparently identical in animals and humans were really very different. One was the operation of instinct, the other of reason: "The quadruped animals, of their own will and nature, and from inborn instincts, do actions which require knowledge, reasoning, and judgment in mankind" (Goodrich 166). William Swainson makes clear that instinct in animals is the God-given capacity to appear to act reasonably. Quoting from John French, Swainson writes, "the instincts of animals [are] those unknown faculties implanted in their constitution by the Creator, by which, independent of instruction, observation, and experience, and without a knowledge of the end in view, they are impelled to the performance of certain actions, tending to the well-being of the individual, and the preservation of the species" (*On the Habits and Instincts* 1–2). For Swainson, instinct "explains the apparent rationality observable in many of the actions of animals" (3). Again quoting French and then commenting, he writes,

> 'whenever they [animals] do so act, it is from a dictating energy, operating above the sphere of their consciousness, and disposing them so to do: that the business of mental analysis and extraction is performed *for them*, as it were, in every instance where they appear to exhibit proofs of it; and that, properly speaking, there is nothing of design attributable to brutes in their actions, but merely a subordinate voluntary principle and discriminating perception. . . .' This theory, at once, explains the apparent rationality observable in many of the actions of animals. (3)

When Swainson tries to correlate instinct with observed behavior, his idea of instinct begins to unravel. Animals may have a "cultivated instinct" or latent qualities brought out through human training (8). Or they may have "developed instincts," made manifest only as the animal appears to gain experience. Animals may have "sagacious instincts" (17), that is, guiding forces that lead them to execute wonderful behaviors. If an animal is a quadruped, it may have a "superior instinct" (19). A few insects exhibit "extreme perfection of instinct" (29). Animals may also have "false instincts" (38), which impel them to perform acts opposite to what they would do if they had reason.

No one represents the assertion of animal intelligence in popular natural history more energetically than Edward Jesse, whose *Gleanings in Natural History* was in its eighth edition at the time of Tucker's *Rambles* and was cited at the head of the essay that Tucker used. A long quotation from Jesse helps convey the implications of animal reason for animal autobiography:

> it is no doubt exceedingly difficult, and perhaps impossible, to define where instinct ends, and reason begins with animals. But that some of them are endowed with a faculty which does not come under the usual notion of instinct, by whatever other name we may choose to call it, will, I think, hardly allow of a dispute. . . . How, then, upon the notion of mere instinct, shall we account for that superiority of intelligence, which is found in one individual, to others of the same species, and which is familiar to those who are employed about, or in any way in the habit of *conversing* with, animals? But the observation which appears to me most decidedly to carry the faculties of animals to something exceeding the measure and character of instinct, is that of the new and ingenious contrivances to which they will often have recourse in situations, and upon occasions, much too accidental and peculiar to admit of our imagining that they could have been contemplated and provided against in the regular instinct of the whole species. (20–21)

Influenced by Sensationalist doctrine that granted reason to animals, Jesse allows for individuality in animals of the same species and gives them an understanding of cause and effect necessary for plot. Thus, natural history provided a range of views on the mental capacities of animals and license to represent them as intelligent, individualized agents as long as they were also clearly marked as inferior to humans.

Naturalists felt less anxiety about granting animals emotions, as long as they insisted on the absence of reason in animals or an inferior degree of it to humans. Indeed, we see in Tucker's statement on the mental faculties of animals, cited at the beginning of this essay, a tendency to grant emotional states and deny rational ones, even though she also blurs the difference. Even people like Swainson attributed a range of complex emotional states to animals, once human intellectual superiority was established:

> The diversity of dispositions observable among the human species, and the variety of passions which agitate the breasts of man, have been subjects of curious speculation. . . . But let us not suppose that these passions are altogether confined to our own species. Very many of them, on the contrary, are common to the generality of animals; and we find some among the brute creation in a very high degree susceptible both of love and hatred — fear and tenderness — gratitude and anger. (*On the Habits and Instincts* 62)

Like Tucker's categories, Swainson's entail slippage. In spite of his argument that animals lack reason, he allots them a "discriminating perception."

Natural history also granted purpose to animal lives. The purpose was often self-preservation, management of an animal economy, "the well-being of the individual" (Swainson, *On the Habits and Instincts* 1–2), even happiness. At least some sense that animals were imbued, however indirectly, with an understanding of their purpose was part of this attribution. The obligation to respect God's creation through kindness to animals implied that animals had a capacity to feel the consequences of thwarted purpose. Thus, animals were often given purposes that they did apprehend and that their behavior executed.

The result was a rich spectrum of mental capacities available to the animal autobiographer without transgressing cultural restrictions.

V. Anecdote in Natural History

ONE VEHICLE by which the animal mentalisms of natural history were imported into animal autobiography was the anecdote, that is, the short narrative of arresting animal action. The role of anecdote was to reinforce conventional understandings of animal behavior and animal minds. Often, however, it destabilized them, in both natural history and animal autobiography.

The natural historians who wrote for general audiences invited readers to engage in "diligent researches into the works of Nature" in order to observe animals and collect anecdotes (Jesse 3), and the public did so outside of the controls of an increasingly professionalized science. While observing the good and wise purpose of the Creator, the personal naturalist might find "something heretofore unnoticed" (Jesse 3). He or she ought to keep a diary: "it is only, therefore, by the united observations of different persons, that those more accurate discoveries can be made and fresh anecdotes obtained, which are necessary to form a correct natural history" (Jesse 3–4). In his second edition of *British Zoology*, Thomas Pennant thanks the "lovers of natural history, who since the appearance of the first edition have contributed to enrich the present with several valuable observations" (iix). In the preface to his *Illustrated Natural History*, Reverend J. G. Wood describes his entries as a collaborative collection: "The present volume, . . . is but a brief digest of a large mass of materials, derived either from personal experience, from the most recent zoological writers, or from the kindness of many friends. . . . It has been an object in the accounts of each animal, to give as far as possible *new* anecdotes" (iii-iv).

In making the study of animals a public project, writers of natural history rendered it a lightly controlled, one might say Protestant, affair, while also seeking to give anecdote authority by emphasizing its origins in observation.[11] They advertised their own accounts as founded in observation and stressed observation as a regulatory principle. Wood writes that "[a]ll the best-known works on Natural History are liable to many objections," citing in particular the failure of conventional anecdotes to "evince the personal experience of the animal race which is best calculated to prevent romance and inaccuracy" (*Illustrated Natural History* iii). In other words, for Wood, anecdote must be disciplined by a habit of careful observation. Anecdote was thus understood as a report by a dedicated and responsible observer, even as it opened up the field to non-specialists.

Anecdotes in natural history were, of course, intended to illustrate a generalization. Often functioning as narratized descriptions of general behavior, they could support pre-established ideas about the "dispositions" of animals laid out in the expository sections of the text. For example, the *Quarterly Review* essay on rats used by Tucker "anecdotalizes" typical rat behavior in order to illustrate a conventional point about the movement of rats around the globe:

> Scarcely a ship leaves a port for a distant voyage but it takes in its complement of rats as regularly as the passengers. . . . The colony of four-footed depredators, which ships itself free of expense, makes, for instance, a voyage to Calcutta, whence many of the body will again go to sea, and land perhaps at some uninhabited island where the vessel may have touched for water. In this manner many a hoary

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> old wanderer has circumnavigated the globe oftener than Captain Cook, and set his paws on twenty different shores. ("Rats" 125)

To the author of this passage, imagining rat behavior in terms of a narrative does nothing to falsify it. Anecdotes such as this, and those which recount particular events of observed behavior, reinforce the established understandings of animal dispositions (resourcefulness, capacity for emotions, individuality) found elsewhere in the natural history text.

In his compelling article on the anecdote in the writing of human history, Lionel Gossman describes two opposite directions for anecdote that are relevant to our understanding of its operations in natural history and then in animal autobiography. One is the performance of a supportive role, such as illustrated above. "Each anecdote is a singular instance of a general rule that it exemplifies." But as Gossman explains, against this confirmatory role, anecdote could have a radically subversive effect, alluded to by its etymology as "something yet unpublished" or a "secret history" (5).

In this manifestation, anecdote is a small, curious, narratized fact that can reveal the underside of things. Purportedly unshaped, less worked over than other literary forms, "the anecdote, understood as a naive, unreflected, and unvarnished report of a fragment of reality offers reliable clues to the way things are (or were), unaltered by either ideological or formal-esthetic elaboration. . . . [It is] a window onto reality as it is, rather than as we have preshaped it" (Gossman 7). Anecdote can destabilize familiar ideas of reality as clear, orderly design, offering instead a vision of the real as a messy mixture, a "process of unpredictable and continuous mutations, not something already preformed and simply waiting to be elaborated and unfolded" (2). Offering unsuspected patterns of action and interaction not easily understood, it points to the exceptional case that deconstructs the well-mapped surface of conventional thinking.

Such disruptive anecdotes pepper natural history. These are often short narratives which disable, however temporarily, the explanatory power of the human to account for the animal behavior under review. What makes them special to natural history is that they occur as sites where animal behavior collides with human explanatory efforts. Often incorporated into the text as examples of extraordinary animal sagacity, anecdotes and their implications were presumed to be contained within a framework of providential nature that would always privilege the human. But often the anecdote disrupted such assumptions by conveying the inadequacy or irrelevance of explanation; the "not easily understood" was coupled with wooden, clumsy discursive forays, usually generalizations. Animals in anecdote thus existed as presences behind a reported observation of their behavior and eluded the discursive equipment struggling to wall them in. Natural historians themselves had some sense of this, as is suggested by their description of two parts to anecdote. They knew that anecdote was not the same thing as the meanings given to it. Swainson says,

> Natural history is a science of facts and inferences. The former regard structure and economy; and as these, under favourable circumstances, can be investigated by everyone, few prejudices of sense can arise respecting them. But when we proceed further, and attempt from these facts, to draw inferences, the case is different. No principles having been yet established, . . . [e]very naturalist therefore thinks he is at liberty to draw his own inferences." (*Preliminary Discourse* 152–53)

Edward Jesse's *Gleanings in Natural History* contains an anecdote borrowed by the *Quarterly Review* essay on rats and then adapted by Tucker. Cited in full, Jesse's account illustrates the way anecdote can work against explanation:

> our original animals [the Black rats] appear to have been sociable in their habits, and to have shown kindness and friendship to each other. The fact referred to was communicated to me by the Rev. Mr. Ferryman, a clergyman in Sussex, an accurate observer of nature, and whose beautiful collection of specimens of British birds and animals, is second to none that I have ever seen; they are all stuffed by himself, and he has given them a great interest by displaying their peculiar habits; he is in his 85th year, but his mind is still as vigorous as ever. Besides being a good scholar and a naturalist, he has made many curious and important discoveries in mechanics. . . . He informed me that some fifty years ago, when the old English rat was numerous, he resided at Quorn, in Leicestershire. Walking out in some meadows one evening, he observed a great number of rats in the act of migrating from one place to another, which it is known they are in the habit of doing occasionally. He stood perfectly still, and the whole assemblage passed close to him. His astonishment however was great, when he saw amongst the number an old blind rat, which held a piece of stick at one end in its mouth, while another rat had hold of the other end of it, and thus conducted its blind companion. Mr. Ferryman has a large glass case of English rats, in which this interesting anecdote is commemorated with equal truth and fidelity. (176–77)

Jesse attempts to manage the anecdote by giving to it meanings in advance of its recital and by elaborating on Mr. Ferryman's credentials. He wants the reader to believe Ferryman's account but also to conventionalize the meaning of the incident; that is, that rats are sociable and friendly with each other, and, in short, provide a good example for humans. However, Mr. Ferryman did *not* interpret what he saw and does not interpret it for Jesse but reports himself to have been astonished. Although he does not domesticate the scene through language, he recreates it in a taxidermy diorama which transforms the unruly living animals into dead ones under his control. Here both language and taxidermy share the role of fixing the allusive subject into a normalized form necessary for human mastery. Nevertheless, whatever it was that Mr. Ferryman saw, it continues as a kind of secret, unsettling him and fracturing explanatory efforts. One comes away thinking how awkward is Jesse's explanation, how indecipherable the scene, how weakly explained in its most important respect: the way the rats themselves understood what they were doing. This mysterious core of anecdote is transported to animal autobiography, where literary authors take their turn at naturalizing animal behavior in conventional and often awkward terms.

VI. Transforming Anecdote into Animal Autobiography

WHEN LITERARY AUTHORS transformed the animals of natural history into fictional characters, they adopted its foundational assumption that animals had cognitive capacities as well as lives, that is, coherent existence through time. However, they still needed extended plots. In creating these, they necessarily had to elaborate on ideas of animal minds found in their natural history sources.

The plot of animal autobiography proceeds by more or less laying anecdotes end to end in a sequence of loosely connected episodes, as does the picaresque novel. The plot is in sharp distinction to that in human autobiography, where plot is intrinsically linked to the development of a self. In human autobiography, events are thought to be determined

by an internally-guided force, a "consciousness-making activity of living on the part of the individual human subject" (Buss 117–18). Lives of animals in animal autobiography do not have this teleology: existence is not tied to a personal struggle to realize the true spiritual self of the Christian nor its close cousin, the reified human self of Cartesianism. Animals in these works have no long-range goals for self-actualization. What, then, can be the plot of an animal autobiography?

The options were two, and the most important one assumed that animals had natures that were more or less fixed at Creation. If humans were agents always trying to realize the potentials of an internal self, animals might be represented as struggling to maintain established dispositions under assault, mostly by humans. This pointed to a sense of self rather more stable than that of humans. It was concrete, anchored in the body and the world, located in present-time rather than in an imagined future. What plot did was to unpack the mental states behind this already-realized animal self.

When animal autobiographers plotted out their stories using anecdotes, they (unintentionally, I would argue) showed that the task of survival was more complicated than natural history and even animal autobiography itself intended to convey. Anecdote had alluded to rather sophisticated animal minds under the rubrics of "mysterious," or "astonishing," or even just "sagacious." When anecdote was expanded into narrative, such suggestions became more explicit and less containable through interpretive exposition by a human commentator. As Tucker develops anecdotes from her natural history source, she unwittingly suggests that survival is an affair tied to complicated mental states.

A good example comes in the story of Whiskerandos playing dead in order to escape a pack of dogs. The anecdote derives from *Anecdotes of Animals* by a "Mrs. Lee," which is cited and repeated in the *Quarterly Review* essay, where Tucker got it. A man sets his dogs upon a rat but then takes the rat from the dogs and carries it into his dining room to examine it by the lamp. "During the whole period it remained as if it were dead, – limbs hanging, and not a muscle moving" ("Rats" 134). Thinking the rat is dead, the man then throws it to the dogs, "but to the astonishment of all present, it suddenly jumped upon its legs, and ran away so fast that it baffled all its pursuers" ("Rats" 134). Tucker changes details, but the core of the anecdote remains: a rat escapes death by tricking a human into thinking it is dead. Following the classic anecdotal gestalt, Mrs. Lee ends the story with her astonishment. The author of the *Quarterly Review* essay follows the natural history practice of labeling the event in generalized terms: "The sagacity of the rat in eluding danger is not less than his craftiness in dealing with it when it comes" ("Rats" 134).

Tucker, however, must elaborate the story. She has her narrator Ratto observe the scene, and when Whiskerandos escapes, the two have the following exchange:

> 'And you were really alive and had your senses while that savage was holding you up with your head hanging down! Why, you looked as like a dead rat as ever I saw one!'
>
> 'I was wide awake all the time,' said Whiskerandos, 'but I knew that it was my only chance to feign death. This has been a narrow escape, Ratto; I was never so near being torn to pieces before.' (144; ch. 20)

Whiskerandos is granted the requisite ingenuity ascribed to him by natural history. But expanded into narrative, the anecdote depicts Whiskerandos as not only clever but capable of the intellectual feat of insight, the ability to assess a problem and plan a course of action

mentally rather than through trial and error. It also gives him a capacity for counter-factuals, a capacity to think about something that is *not* the case. He notes that he was only bruised by the fling because the yard was *not* paved with stones (144). Likewise, he thinks about something that has *not* happened to him, that is, being torn to pieces. The anecdote also gives Whiskerandos what contemporary theorists call "theory of mind." Whiskerandos understood that the human could be fooled; in fact, his escape depended upon this understanding. And such understanding was only possible because he also grasped that he and other individuals have mental states that govern their behavior. What the expanded anecdote of this passage does is make explicit capacities of reflexive consciousness.

The issue of course is whether any or all of Whiskerandos's abilities in Tucker's reworking of the anecdote are required for performance of the core event. Supposing that the incident was accurately observed by the naturalist, were the mental processes needed by a rat to escape by playing dead accurately if unintentionally unpacked by Tucker? Natural history simply ascribed such behavior to ingenuity or sagacity or instinct, each a label that deferred discussion of the mental complexities behind the behavioral act. By making those complexities salient within the safe place of fiction, and by naming her cleverest character "Whiskerandos," that is, a "man with Whiskers," Tucker raised questions about the sophistication of animal minds without having to take them seriously.

University of Wisconsin, Whitewater (Retired)

NOTES

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1. I have relied on the bibliographic records in WorldCat for my calculations of editions and reissues.
2. DeMello and her contributors give additional examples.
3. See Smith, "Resisting Metaphor."
4. Historians of natural history include Merrill, Barber, and Allen. All write on its popularity during the first half of the nineteenth century and its increasing decline in the face of the ascendance of professional biology. Although the relation between natural history and the emerging discipline of biology is not relevant to this essay, it does provide a way to contrast two very different approaches to the study of nature that demonstrates a special compatibility between natural history and literature. Both approached the natural world with an emphasis on holism, life activities, and interrelations. For example, Camerini writes, "Natural history, including fieldwork, straddles the borders between amateur and professional, sacred and profane, science and emotion" (355). Speaking of the emerging competition between popular natural history and laboratory science, Merz writes of eighteenth-century naturalist Gilbert White: "He may be said to have represented that other side of natural science, which does not try to comprehend nature through the artificial arrangement or classification of a museum, but in those connections, among her own animate and inanimate objects, which constitute reality, and are the characteristics of life and development" (1: 288–89). Schmitt provides an interesting example in Victorian beetlemania of the move from the study of nature "being an amateur pursuit driven by affective attachments to being part of the apparatus of rational and institutional knowledge production [of the biological sciences]" (36). Lightman, however, has shown that in the later nineteenth century, professional, highly specialized, biological research had its own nonprofessional popularizers.

5. See Bridson.
6. While the Romantics no doubt enhanced the attribution of mental states to animals, details about those states are scarce, both in their works and those of their critics. Kenyon-Jones sees the Romantics as seminal to the period's expanded sympathies for animals and identification with them, as reflected in Romantic literature. Perkins traces the influence of Romanticism on early animal rights, including the rise of humanitarianism and reform. Edgecombe sees the Romantics as qualifying the objectification of animals with empathetic identification, which allowed the poet to feel what it is like to be an animal and to speak for him (277). Oerlemans sees Romantic representations of animals as recognition of "a kind of life in nature that is at once much like our own, and which is yet different from it, not capable of being reduced to merely human designs or desires" (4). He sees in Romantic poetry an animal consciousness defined by "an energy and presence not possessed or even understood by the humans around them" (9). Although Romantic attitudes no doubt influenced perceptions of the capacity of animals to suffer, they seem far afield of the down-to-earth representation of animal minds one sees in animal autobiography.
7. I am indebted to Robert Mitchell for bringing this book to my attention. He also pointed out to me that for some commentators instinct included what we would call intelligence.
8. Reason was often asserted as the distinguishing trait of humans, and books of natural history played an important role in the discussion. Ritvo ("Learning from Animals") argues that books of natural history for children maintained the impenetrable boundary between animals and humans on the basis of reason. Fudge documents the force of the Aristotelian tradition of reason for maintaining the animal-human divide during the early modern period and calls books of natural history important disseminators of the early modern discourse of reason that excluded animals. What I am attempting to show is that many popular writers of natural history tried to make the boundary somewhat more permeable and that animal autobiography contributed to this.
9. See Smith, "Sensory Experience as Consciousness."
10. Information on Tucker's life comes exclusively from Giberne's nineteenth-century biography, which is heavily dependent on Tucker's hundreds of letters to her sister Dorothea Laura.
11. For a thorough and judicious view of anecdote in science, see Mitchell et al.

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