## Talking with history: Using Goethe's scientific approach with human artifacts

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In the story of Brer Rabbit and the Tar-Baby<sup>1</sup>, Brer Fox sculpts tar and turpentine into the likeness of a baby, and places it in the middle of the road to trap Brer Rabbit. Before long, Brer Rabbit comes down the road and sees the Tar-Baby. He greets the Tar-Baby, but the Tar-Baby says nothing. The conversation only goes downhill from there. From "Good morning" to "How are you feeling" to "What's the matter with you? Are you deaf? Because I can holler louder" to "You're stuck up, that's what you are. You think you're too good to talk to me" to "If you don't take off that hat and say howdy, I'm going to bust you wide open." He strikes with one fist, which sticks in the tar, and then a second, which also sticks. "Turn me loose before I kick the stuffing out of you," says Brer Rabbit. "But the Tar-Baby just sat there."

The story of Brer Rabbit and the Tar-Baby is a case study in dysfunctional conversation. A conversation is a kind of approach, an attitude towards the conversational partner. Steve Talbott (2004) and Craig Holdrege (2005) have explored the metaphor of conversation as an approach to the world. The way in which one approaches a conversation, they show, reveals much about how one conceives of the world, how one relates to the other. At the risk of killing the charming fable with a word, Brer Rabbit's failure to communicate betrays a bigger failure. He cannot see the origins of things, the processes out of which they come. The thing is all exterior, no interior, no inner being or meaning (Talbott, 2004). Brer Rabbit fills the vacuum by projecting his own personal meanings into the thing, to satisfy his own personal yearnings. When the thing fails to respond, Brer Rabbit's frustration grows, and the more he forces the issue, the more stuck -- trapped -- he becomes with the thing. Brer Rabbit is done in by his preconceptions about the world. Brer Rabbit didn't know how to talk to the Tar-Baby.

My relationship with the things around me extends out of my relationship with nature. The human artifacts around me come from nature, perhaps in a roundabout way (the keys on my keyboard, also the electricity that enable these words to appear on my monitor, were once trees or shrubs or slime in a prehistoric jungle; the silicon and copper and gold on the motherboard came from the earth; and so on). Closer in time, nature, in the form of human beings, designed, assembled, shipped, accounted, mopped and accomplished thousands of other concrete labors under specific historic conditions to produce the things around us. If I see nature as all surface and no inside, nature shrinks to resource and dump site. If the things around me lose their interior -- their history -- they become just things and I lose the connections to my fellow humans that they represent.

Goethe's approach to science, "science-as-conversation" as Holdrege (2005) describes it, provides a way to see past the surfaces and into the interior of phenomena. Goethe's consistent approach, his method as it were, was "to grasp [the] outward, visible, tangible parts in context, to see these parts as an indication of what lies within and thereby gain some understanding of the whole through an exercise of intuitive perception" (In Miller, 1988, p. 63; numbers after all

<sup>&</sup>lt;sup>1</sup> Online versions of the Tar-Baby story are available at http://xroads.virginia.edu/~ug97/remus/tar-baby.html (Joel Chandler Harris's version) and http://www.otmfan.com/ html/brertar.htm (retold by Catharine Farrell, after Harris; quotes are from the latter).

subsequent Goethe quotes refer to Miller). As a way of knowing (Wahl, 2005), Goethe's approach leads towards discovering the primal or archetypal or formative forces of phenomena. Once the archetype is won, one has gained insight into the whole, into "the inner truth and necessity", and reached the "pregnant point... which yields several things." (41) Certainly, as a research method, Goethe's approach would be productive. But Goethe's approach also opens what he called "new organs of perception." (39) So conducting Goethean science also means the "metamorphosis of the scientist" (Amrine, 1998), "treading a path of conscious development" (Holdrege, 2005).

This same approach, I think, can be productively applied to recover a whole understanding of the artifacts around us, and in the process gain something else. With that recovery will come a renewed connection, a new perception, a solidarity, if you will, with our humanity.

Isis Brook (1998) sees in Goethean science a "living and developing tradition," which means variety, experimentation and extension. That being said, the Goethean study of human artifacts is not that much of a stretch. Minerals, plants, animals, and ecosystems also have a human context because human beings have shaped the context in which nature is found. Humans transform terrain, they transport or eliminate species, they rearrange genes, and so on (see, e.g. Simmons, 1993). Even in traditional uses of Goethe's approach, with living organisms, the object of investigation exists in a human (a social and historical) context in addition to its natural one. In the unity of the world, humans are part of nature, so too must be human activity, and the products of human activity. The segregation of human artifacts, or social processes, from the rest of nature is arbitrary. The best descriptions of applied Goethean science acknowledge the human dimension (e.g., Brook, 1998; Hoffman, 1998; Holdrege, 2006).

Goethe recognized the importance of the cultural, social and historical dimensions of phenomena, and included them in his explorations. He hinted at such applications in his description of a "genetic method," where he included the terse fragment "Example of a city as the work of man." (75) He explicitly examined social and historical dimensions in *Theory of Color*, considered to be his most extensive scientific work (Miller, 1988). Goethe included not just results of his color experiments, but also descriptions of industrial applications, the use of color in various cultures, and the "sensory-moral effects" of color. Only by using such a "multifold language," as Christina Root (2006) notes, can a phenomenon be fully understood.

Given that, the only peculiar aspect of human-made objects is the degree to which the human or social dimension looms over the natural roots of the object. While artifacts are made of nature stuff, they are also products of human beings with all that that entails: desires, intentions, creativity, social relations, economic ties, and so on. While the human-made artifact is no more complex than a plant or animal or even a rock, it is no less complex either.

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I explored the possibility of using such an approach with a human artifact, trying it out on a cast iron frying pan. To help structure an investigation into the complex and multi-layered human dimension, I borrowed a series of questions that Floris Lowndes (2000) uses for organizing one of Rudolf Steiner's meditation exercises:

- a. physical: What is it made of? What are its properties?
- b. historical: How is it made? How is it used?
- c. emotional: Why this design? What are my feelings about it?
- d. creative: Who created it? Invented it?
- e. desire/need: What need or desire led to its invention?
- f. origins, background: What preceded it? What was its context?
- g. archetype: What is the concept of the thing? Other forms?

As with natural phenomena, the investigation of the artifact began with a focused study of the physical object. Although this is only one of seven categories of investigation, it is the foundation of the rest of the exercise. The questions are a set of "canned riddles" that formalize and direct the conversation which leads from the physical object to a form that can only be grasped imaginatively or intuitively. By working through the questions from (a) to (g), the process follows Goethe's "genetic method" of proceeding from empirical observation to archetype. By reversing the order, so that it flows from archetype to object, the process mirrors organic processes of evolution and development. Lowndes (2000) uses biological terms: "(1) archetype (2) descent through the 'family tree' (3) the dawning intention and discovery (as conception), motivation for its creation (4) creation (5) 'embryo stage' (6) birth and growth (7) maturing, perfection/completion." (p. 73) The replaying of the sequence in the imagination, from archetype to object, recapitulates the process of the object in its becoming: out of a historic context, sparked by desire, shaped by ingenuity and creativity and artfulness, emerging out of the production process of humans transforming nature, and wielded by other human hands.<sup>2</sup>

Lowndes organizes his seven categories in a way that highlights relationships among them (see Fig. 1). Categories (a) - (c) explore the individual object or phenomena -- individual properties, individual history, individual feelings or emotions. Categories (e) - (g) relate to the phenomena in its generality. Creativity (d) straddles both the general and the specific. I understand categories (a) - (c) as ways of experiencing the phenomena in the world, as a sensual thing that can be touched, struck, observed, used, etc. Categories (e) - (g) are internal to the phenomena, and can only be grasped conceptually. As generative and past forces, they give rise to the phenomena. While we access historical context (f) through the empirical observations of others (i.e., the historical record), we can only assemble the various threads of history into a meaningful whole via the imagination. The archetype in particular can only be apprehended imaginatively.

Outer being
d. Creative
c. Emotion/feelings <-> e. Need/desire
b. Biography <-> f. Historical context
a. Physical properties <-> g. Archetype
Figure 1

<sup>&</sup>lt;sup>2</sup> For a description of my experience with this exercise see http://www.gocatgo.com/texts/history.exercise.pdf

The arrangement of the categories indicates a correspondence between physical properties (a) and archetype (g), as in Goethe's description of the archetype as "identical with all instances" and "symbolic because it includes all instances" (303). Likewise biography (b) represents an individual history where (f) represents the broad historical context from which the individual history emerges. By seeing the process flowing from archetype to physical, some of the categories take on added meaning. For example, emotion/feelings (c) represent a nurturing stage. It represents the stage of individual desire that pushes the human being to transform the creative flash into concrete thing, corresponding to the "social desire" of (e).

Lowndes uses the term "outer being" to describe the empirical, sense-perceptible categories and "inner being" to describe the conceptual, thought-perceptible categories. "Being" is a problematic word. "Being" evokes something individual, as in "human being", but it also is a form of "to be", as in "be-ing": present, alive, in the sense that the is-ness of the artifact exists in a human, expansive, unfolding process that I can participate in. The artifact connects to the needs and desires and social connections -- history -- from which it developed. Through the contemplation of this complex web of connections and interactions, I can understand the artifact in a way not immediately apparent from its surface. Perhaps more important, the artifact in turn gives those connections and interactions a concreteness, a tangibility or reference point. In the metaphoric conversation, history expresses itself through the artifact. I talk with history.

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The application of Goethe's approach to human artifacts has special challenges that either do not exist or are not as severe for natural objects. One obvious weakness of the approach described above is the relative absence of direct observation. While I can observe my frying pan, and use it to anchor my research, beyond the physical-ness of the pan I must rely on the research of others for most of my observations. Even that does not get me very far in exploring the particularity of the artifact. Although the frying pan is "mineral", if I was investigating a rock, I could see its relationship to other geological forms, the environmental and human forces that shaped the landscape, its relationship to local flora and fauna. The frying pan has traveled far from the mountains that yielded the ore, the fields that fed the miners and iron workers and truck drivers and shop clerks, and all of the other parts of nature that undergirded the production of the frying pan. From mine to foundry to shop to kitchen, I must imagine most of its existence.

In addition, the results that I obtain depend on my personal mix of prior experience. My research includes both my observations, as well as the writings of others that shaped my understanding. Goethe recognized the importance of observations by others in supplementing what he himself obtained, but also cautioned about accepting the explanations that came with the observations.

Distinguishing between "real" knowledge and the made-up is perhaps the biggest danger, as Brer Rabbit discovered. Goethe was certainly conscious of this danger: "In observing nature on a scale large or small, I have always asked: Who speaks here, the object or you?" (308) How does one distinguish those two voices? Since "we theorize every time we look carefully at the world" (159), I can only try to be as aware as possible of my theorizing:

The ability to do this [i.e., theorizing] with clarity of mind, with self-knowledge, in a free way, and (if I may venture to put it so) with irony, is a skill we will need in order to avoid the pitfalls of abstraction and attaining the results we desire, results which can find a living and practical application. (159)

This can be accomplished, Goethe held, by anchoring the investigation to the phenomenon, to always keep it center stage, and to return to it frequently. Empiricism roots the imagination:

I do not mean an imagination that goes into the vague and imagines things that do not exist; I mean one that does not abandon the actual soil of the earth, and steps to supposed and conjectured things by the standard of the real and the known. Then it may prove whether this or that supposition be possible, and whether it is not in contradiction with known laws. (Goethe, in Naydler, p. 118)

In the case of human artifacts, the "standard of the real and the known" becomes especially problematic once I move beyond the "outer being" investigation to the "inner being", because history and social relations are contested territory. By necessity, I must stray from the concrete object under investigation, and reconstruct its past using the tools of the anthropologist, archaeologist and historian. In this poking around in the dust of history, there are many opportunities to lose sight of "the real and the known." These are real and difficult problems, but surmountable ones, requiring honesty and, as Goethe says, self-knowledge.

Goethe's approach gravitates around sensible phenomena, which holds together the investigation. The Goethean study of abstract human categories like "racism" or "globalization" would be foolish and futile. These are already-processed constructions, not concrete phenomena. With such abstractions, there is no reference point to anchor the investigation, nothing, as it were, to talk to. The approach to investigating such phenomena instead must be through concrete expressions. For example, "globalization" is a large, complex, uneven, dynamic process. Instead of investigating "globalization" in the abstract, the Goethean approach would study individual instances of globalization: an artifact, for example, like a frying pan, a bicycle or a circuit board. The artifact provides the starting point. More complex phenomena could serve as well, e.g., the local Wal-Mart, a border-crossing in Arizona or a hedge fund. A conversation requires a specific, particular partner (Talbott, 2004).

A similar approach of focusing on an artifact to reveal broader processes enjoys some popularity as a genre of social writing, the "commodity biography." A recent example is Pietra Rivoli's (2005) *The Travels of a T-Shirt in the Global Economy: An Economist Examines the Markets, Power, and Politics of World Trade.*<sup>3</sup> Rivoli follows a hypothetical t-shirt from the cotton fields of Texas to a factory in China to a shop in New York to a used clothing market in Tanzania. In the process, as the title pretty much explains, she discovers different dimensions of the global economy today. A number of other examples, typically cross-disciplinary as a matter of necessity, also reflect this approach. While generally not explicitly Goethean, the idea that by

<sup>&</sup>lt;sup>3</sup> National Public Radio broadcast a series based on Rivoli's book in April, 2005. The broadcast and supporting material is available at http://www.npr.org/templates/story/story.php?storyId=4622200.

<sup>&</sup>lt;sup>4</sup> Holdrege (2006) described a similar approach he used in a high school lesson. Using sugar as the focal point, he was able to explore with his students the chemistry of sugar, how the body processes it, the sugar cane plant, and the history of the sugar trade, including slavery and colonialism. Douglas Feick informed me of John Stilgoe's wide-ranging work on landscapes, culture, environment, history, etc. etc. (see http://www.people.fas.harvard.edu/~stilgoe/index.html). The *Uncommon Ground* collection edited by William Cronon (1995) contains different

burrowing into a part, and by understanding the instance and its interconnections, its "inner being," one might arrive at an understanding of the whole, has a productive tradition in historical and cultural research.

Allan Kaplan (2005) describes another example of the application of Goethe's approach to social phenomena, focusing not on an artifact but on personal experience. With a co-worker, he facilitated an annual gathering of aid workers, where they discussed issues they faced in the very difficult work of social development in Africa. Like Holdrege, Kaplan describes the process as conversation. Although "conversation" between humans can be easily grasped, an honest, meaningful, revealing conversation that transforms the participants is not so easily achieved. Kaplan describes a process that oscillated between reflecting on what participants had observed (this was the phenomena under investigation), and using "imaginative faculties" to *understand* (a holistic experience) as opposed to *explain* (an analytic experience). The goal of Kaplan's process was to arrive at the "formative idea", or "intention" alive in both the individuals, and the aid work in which they were engaged. "Intention" is meant here not as "goal", but in a phenomenological sense as "the intention informing the system". "To focus on living activity; such intention is a verb, a doing, which produces the phenomenon, which becomes the phenomenon's gesture, and it is this we are trying to read." (p. 325)

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A metaphorical conversation with nature seems like a plausible enough extension of human conversation. Especially with living organisms, one senses that there is something there to talk to. "Conversing" with a frying pan or t-shirt or circuit board may sound about as productive as talking to a Tar-Baby. But approached properly, things do, metaphorically, talk back, and even have important things to say. With a Goethean approach, I think we can move beyond a world of dead things and projected meanings. Beyond, we will find a world that unfolds with organic processes that also include human beings and the things they do, a world with an inside. The artifact becomes, instead of a trap, a doorway. One grows in the process, and the world as well. As Holdrege (2005) so wonderfully says it, "Now I am knowing."

Comments are welcome. Please send them to jdATgocatgo.com

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