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Experimental Forest: Notes Toward an Installation

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Welcome to "Experimental Forest," a multi-media installation project I've been working on for about five years that's based on a US Forest Service research site in the high alpine zone of the Front Range in Colorado, near the Continental Divide and the headwaters of the Colorado River in Rocky Mountain National Park. About nine years ago, I started wandering around the site, almost always with my dog, and I kept running into weird things in the middle of what felt to me like a remote wilderness. I'd be in the middle of the woods, or tracing a mountain stream, and come across a strange structure, like something out of a sci-fi film, and I started taking pictures of these weird objects on my phone, not really knowing why--or what, if anything, I would ever do with them. I was just collecting pictures of Weird Shit in the Forest, and that was it. And then, with each new walk and each picture, I gradually realized that these were studies, in a way, for the project I'm going to talk about today. But I really didn't have any idea what was percolating at the time.

"Experimental Forest" is in part a loving portrait of this particular place where I have spent hundreds of hours over a nearly ten-year period; in part a forensic documentation of the strange aesthetics of scientific practice as a sign system in its own right; and in any case, an inquiry into the changing meanings of the concept of "ecosystem" as those are materialized, visibly and invisibly, on the site. As scientist turned anthropologist Natasha Myers writes about her "Becoming Sensor" project based in a Black Oak Savannah in Toronto—which I think of as a kind of sister project—one of the aims here is "to interrogate the self-evidence of approaches to conservation ecology and environmental monitoring by throwing open the question of what it means to pay attention to all these beings who have been paying attention for so many millennia," an undertaking that questions "the techniques and practices of ecology beyond the normative, moralizing, economizing discourses that ground conventional scientific approaches."[1]

[1] https://becomingsensor.com

Here, in the "Experimental Forest," "green" (organic) and "gray" (technological) ecologies meet, but in a wonderfully out of synch way—a way inscribed and bodied forth in the forest itself. The project centers on how the strange and uncanny experience of stumbling upon the symbolic and material network of scientific monitoring , tagging, measuring, and cataloging devices in the middle of a seemingly primeval forest—like stumbling upon the lost symbolic system of another civilization for which one does not have the key—is a kind of visual equivalent for the contrasting, asynchronous communications and monitoring networks that we have before us in the site: one visible above ground (a network of monitoring stations scattered throughout the forest, devoted to air quality, hydrology, forest management, and snowpack, among other things); and one invisible and beneath the soil, what has recently been labeled "The Wood Wide Web": a vast and complex network of interconnections between plants and trees in the forest made possible by the fine network of mychorrizal fungi connecting root system to root system, a network that some have compared to a kind of "brain" of the forest itself.

The visual and formal characteristics of "Experimental Forest" therefore evoke a place that is both intensely real and, at the same time, eerily virtual--not in the rather hackneyed sense of "virtual reality" made popular by mass media and now being mined by the pathetic morphing of Facebook into Meta and the Metaverse. Rather, "virtual" here means not "less real" but "*more* real," because it calls attention to how any environmental space is a concatenation and co-existence of different forms of life, different "worlds," none of which may exhaustively see or describe the environment it shares with others.

The site in question in this project, the Fraser Experimental Forest, is a 23,000 acre (36 square mile) site about 50 air miles northwest of Denver, and ranges across areas from 8800 feet in altitude to nearly 13 thousand feet, bordering the Vasquez Peak Wilderness Area to the east and the Byers Peak Wilderness Area to the west. In operation since 1937, it is part of the Rocky Mountain Research Station's Experimental Forest and Range System, founded in 1908, which comprises 14 research sites in a 12 state area in the American West, ranging from the Coram site in Montana, near the Canadian border, in the north, to the Black Hills site in South Dakota to the East, to the Priest River and Boise Basin sites in Idaho to the West, and the Sierra Ancha site in southern Arizona to the South.

In the forested areas below timberline on the site, Engelmann spruce and subalpine fir are predominant at higher elevations, on north-facing slopes, and along streams, while Lodgepole pine is the predominant tree at lower elevations and on drier, south-facing upper slopes. The majority of the forest began growing, sometimes slowly, after a fire that cleared much of the area in 1865, though there are pockets of older trees in riparian areas and at higher elevations, including the oldest Engelmann spruce tree in the world, estimated to be 870 years old. The flat, low elevation portion of the forest was logged in the early 1900s, traces of which remain throughout in the form of old overgrown logging roads, trails, and paths, many of which I've explored over the past nine years.

As for wildlife: elk, deer, moose, black bears, and mountain lions are the forest's big animals. The elk mostly live in the alpine grassland and high cirque basins in the summer, but they winter outside the forest. Mule deer are more common than elk, and in the summer, they graze in the timbered areas and openings of the forest. Moose live in the area year-round, and are more commonly seen than elk and even the mule deer. Black bears, unlike the elk and deer, are very shy, and are rarely seen—I've only encountered them twice in nine years, though their scat is regularly seen. Mountain lions are occasional visitors and are very rare sightings. Many small, furred animals live in Fraser, such as marten, mink, badger, musk rats, red and gray fox, coyote, bobcat, lynx, and beaver, who live along the water courses. Snowshoe hares, pine squirrels, mice, gophers, shrews, and voles are also abundant in the area. Numerous game and non-game birds, such as ptarmigan, various kinds of hawks, and bald eagles live throughout the forest. Trout live in many of the streams, beaver ponds, and lakes.

Though many different kinds of research have taken place at the Fraser Experimental Forest—on riparian habitats, invasive species and insects (including the Mountain Pine Beetle, which ravaged the area in the early 2000's), wildlife, soils, and, especially, snowpack depths and density--the main research focus of the Fraser Experimental Forest has traditionally been on how different forest management practices affect water yield and water quality downstream.[2] And this is not surprising, given the site's location. About half of the almost 3 million people in the greater Denver metropolitan area receive 50 percent of their water from the rivers, streams, and reservoirs in the area that surrounds the Experimental Forest[3] and the creeks, rivers, and streams are heavily managed by the Denver Water Board, in conjunction with the US Forest Service.

Equally significant—though of less pressing immediacy for the residents of the state of Colorado--is the proximity of the site to headwaters of the Colorado river in nearby Rocky Mountain National Park, about thirty minutes away by car. St. Louis Creek originates in the Fraser Experimental Forest, and flows into the Fraser River in the valley below, which in turn joins the Colorado river about 20 miles to the west, near the town of Granby. The Colorado, as is well known, is crucial to the history and survival of Los Angeles, Las Vegas, and the city we're in right now, Phoenix, but the river's flow "has already declined by nearly 20 percent, on average, from its flow throughout the 1900s, and if the current rate of warming continues, the loss could well be 50 percent by the end of this century." As a recent overview in *The New York Times* of the increasingly untenable situation noted, "Phoenix expanded more over the past 10 years than any other large American city, while smaller urban areas across Arizona, Nevada, Utah and California each ranked among the fastest-growing places in the country....These statistics suggest that the climate crisis and explosive development in the West are on a collision course." In fact, roughly 40 million people depend directly upon the river, but its huge significance, the article notes, "extends well beyond the American West. In addition to providing water for the people of seven states,

[2] https://www.fs.usda.gov/rmrs/sites/default/files/documents/FraserEXF-WEB.pdf

[3] https://www.denverwater.org/tap/where-does-your-water-come#:~:text=Denver%20Water%20collects%20around%2050,side%20of%20the%20Continental%20Divide.

29 federally recognized tribes and northern Mexico, its water is used to grow everything from the carrots stacked on supermarket shelves in New Jersey to the beef in a hamburger served at a Massachusetts diner. The power generated by its two biggest dams—the Hoover and Glen Canyon—is marketed across an electricity grid that reaches from Arizona to Wyoming." In fact, "about 70 percent of water delivered from the Colorado River goes to growing crops, not to people in cities," and the "majority of the water used by farms—and thus much of the river—goes to growing nonessential crops like alfalfa and other grasses that feed cattle for meat production. Much of those grasses are also exported to feed animals in the Middle East and Asia." And this is why "water usage data suggests that if Americans avoid meat one day each week, they could save an amount of water equivalent to the entire flow of the Colorado each year, more than enough water to alleviate the region's shortages."[4] Ironic, given how iconic the cattle ranching industry is not just in the state of Colorado, but in the Rocky Mountain West as a whole.

The area in and around the Fraser Experimental Forest, in other words, is woven into what we think of normal everyday life in the US—having a cheeseburger, going to a swimming pool, having a glass of tap water—in surprising, and surprisingly capillary, ways. And it also woven into the international flows of capital and its distribution and transportation networks in equally significant ways—not least, the international meat trade whose environmentally devastating effects, especially with regard to global warming, have been made clear time and time again. As such, the site encourages us to think about ecology, as I have put it elsewhere, in "topological" rather than "topographical" terms—as ecological relations that are not given *prima facie,* subject to a fixed set of coordinates (as in Cartesian grid), but rather *made,* performatively.[5] Philosophically, this point extends to what Jakob von Uexküll calls the "umwelt" (or lifeworld) of any individual organism and it specific capacities and ways of organizing its world (in which things nearby may be irrelevant and distant for the organism in question, and things remote or at a distance, a pheromone on the wind, let's say, may carry heightened significance—a point we'll pick up on later with Heidegger's concept of "nearness"). More literally, this "topological" understanding of ecology is made even clearer by the mountain pine beetle infestation in the early 2000s, which literally inscribed on the landscape in this area (on entire mountain ranges, in fact) the fact of global warming which, scientists agree, led to the "perfect storm" of conditions (repeated years of drought, warmer than normal winters, etc.) that led to the infestation, leaving up to 70 percent of the pine forest in some areas of the infestation in Colorado either dead or dying.[6]

From the vantage point of a topological rather than topographical concept of ecology, places that are physically far apart in terms of distance, climate, flora and fauna—alfalfa being grown downstream of the Colorado River in California, let's say, versus a feedlot in the Middle East or Asia—can in fact be tightly bound in other, quite material

[4] https://www.nytimes.com/2021/08/27/sunday-review/colorado-river-drying-up.html

[5] For a discussion of this distinction in several different registers, see my *Ecological Poetics, or, Wallace Stevens's Birds* (Chicago: University of Chicago Press, 2020), 20, 46, 65-66, 83, 110-111, 114, 127, 147-148m 151.

[6] Cary Wolfe and Maria Whiteman, "Landscape and Inscription," *Environmental Humanities* 18:1 (May 2016): 145-146.

(but also quite abstract) ways. In my book *Ecological Poetics, or, Wallace Stevens's Birds,* I draw upon Michel Serres' way of explaining the difference between topology (with its lexicon of folds, knots, and paths) and geometry. While "geometry emphasizes fixed identities and clear distinctions, topology emphasizes connection and transformation," the advantages of which would seem clear for living systems, which are dynamic, changing, and time-based. As Serres puts it,

> If you take a handkerchief and spread it out in order to iron it, you can see in it certain fixed distances and proximities. If you sketch a circle in one area, you can mark out nearby points and measure far-off distances. Then take the same handkerchief and crumple it, by putting it in your pocket. Two distant points suddenly are close, even superimposed. If further, you tear it in certain places, two points that were close can become very distant.[7]

From this vantage, a topological querying of the concept of ecology would ask questions such as, what is closed?; what is open?; what is a connective path versus a tear or rupture?; what is continuous or discontinuous; what is a threshold versus a limit? Or to borrow Jacques Derrida's language from the second set of seminars on *The Beast and the Sovereign,* what does "*coming closer* or *distancing* mean?" What is "near" and what is "far" if such terms are not, from this vantage, simply given?"[8]

I'll return to these questions more than once as our discussion moves forward, but it's probably worth pointing out that I have never been to the Fraser Experimental Forest site in winter, in part because it is difficult to access that time of year: you need snowmobiles, snowshoes, backcountry ski equipment, or a combination of all three—but here's the kind of terrain it is in winter, as shown in a video from nearby Berthoud Pass, a famous backcountry skiing destination that is literally on the Continental Divide, right across US highway 40, just a few miles from the Experimental Forest. [9] [The seminar views a video of a dog buried for twenty minutes in an avalanche being rescued by backcountry skiers.]

The dog miraculously surviving dog in the video we just watched has a sort of cousin—two cousins, actually, and three if you count my dog, Zena—in my presentation today. Rising like a Phoenix (pardon the expression!) from beneath the snow, that retriever finds another iteration in a story told by forestry scientist Suzanne Simard, whose work on what would come to be called "The Wood Wide Web" forms part of the conceptual spine of my project. Simard tells the following story of her dog, Jigs, who inadvertently helped her germinate her theories about the forest for which she is now famous, in a radio interview:

Suzanne Simard:
And all of a sudden we could hear this barking and yelping and we were all like, Oh my goodness, Jigs is in trouble. And so the whole family and uncles and aunts and cousins, we all rush up there.

Robert Krulwich:
But they followed the sound of the barking and it leads them to an outhouse.

[7] Michel Serres with Bruno Latour, *Conversations on Science, Culture, and Time,* trans. Roxanne Lapidus (Ann Arbor: University of Michigan Press, 1995), 60.
[8] Wolfe, *Ecological Poetics,* 110.
[9] https://www.youtube.com/watch?v=G33IRoXjZUE

Robert Krulwich:
And when they go in. . .

Suzanne Simard:
There is Jigs at the bottom of the outhouse. Probably six feet down at the bottom of the outhouse pit.

Robert Krulwich:
Oh dear.

Suzanne Simard:
You know, where we've all been, you know, doing our daily business. He'd fallen in, he's looking up at us, quite scared and very unhappy that he was covered in, um, and toilet paper. And of course we had to get Jigs out. I mean, Jigs was part of the family and…

Robert Krulwich:
Since he was so deep down in there,

Suzanne Simard:
We had to dig from the sides.

Robert Krulwich:
To sort of like widen the hole.

Suzanne Simard:
Basically expanding it from a kind of a column of a pit to something that we could actually grab onto his front legs and pull them out. And so we were digging away and Jigs was, you know, looking up with his paws, you know, looking at us waiting.

Robert Krulwich:
And they're digging and digging and digging and all of a sudden she says she looks down into the ground and she notices all around them where the soil has been cleared away. There are roots upon roots upon roots in this thick, crazy tangle.

Suzanne Simard:
We're sitting on the exposed root system, which was like, it was like a mat. It's, it's like, it's just a massive mat of intertwining, exposed roots that you could walk across and never fall through.

Robert Krulwich:
She says, it was like this moment where she realizes, Oh my God, there's this whole other world right beneath my feet.

Suzanne Simard:
Jigs had provided this incredible window for me, you know, in this digging escapade to see how many different colors they were, how many different shapes there were, that they were so intertwined. As abundant as what was going on above ground. It was magic for me.

Jad A.:
Well, what, so what's the end of the story? Did Jigs, did Jigs emerge?

Suzanne Simard:
Jigs emerged. We pulled Jigs out and we threw him in the lake with a great deal of yelping and cursing and swearing, and Jigs was cleaned off.

Robert Krulwich:
But that day with the roots is the day that she began thinking about the forest that exists underneath the forest.[10]

If we fast forward thirty years from the story of Jigs, we land at the discovery, by Simard and others, of how the forest is something very different from what we thought it was—a mutualist community whose cooperative behavior is nothing short of astonishing, in which individual trees very distant from each other (even of different species) are connected not just by a complex, highly articulated root system, but also by a network of mycorrhizal fungi that connects those roots in a highly complex communications network.

In a straightforward evolutionary way, this makes perfect sense. As Peter Wohlleben writes in *The Hidden Life of Trees,* these mechanisms are "a good example of what trees can do to change their environment. As foresters like to say, the forest creates its own ideal habitat." [11] Above ground, as he notes, coniferous forests in the Northern Hemisphere—of the sort we find in the Fraser Experimental Forest—"give off terpenes, substances originally intended as a defense against illness and pests. When these molecules get into the air, moisture condenses on them, creating clouds that are twice as thick as the clouds over non-forested areas. The possibility of rain increases, and in addition, about 5 percent of the sunlight is reflected away from the ground. Temperatures in the area fall. Cool and moist—just how conifers like it."[12]

But many of the claims of "the new forestry" go well beyond this. Wohlleben, for example, writes, "when trees are really thirsty, they begin to scream. If you're out in the forest, you won't be able to hear them, because this all takes place at ultrasonic levels. Scientists at the Swiss Federal Institute for Forest, Snow, and Landscape Research recorded the sounds, and this how they explain them: Vibrations occur in the trunk when the flow of water from the roots to the leaves is interrupted. This is purely mechanical event and it probably doesn't mean anything. And yet?"[13] Wohlleben's work has drawn harsh criticism from much of the scientific community. A recent *New Yorker* article summarizes many of the objections. As the author of the piece writes of *The Hidden Life of Trees*, "in one of the book's more nonsensical moments, he explains that some trees can detect animal saliva and therefore concludes that trees must `have a sense of taste,' which is roughly equivalent to saying that, because a cat can hear a bat squeaking, the cat is also capable of echolocation."[14] He continues,

> Wohlleben's detractors have three main objections to his work. First, he humanizes trees, a cardinal sin in popular science writing dating back at least to the "nature fakers" debate of the early nineteen-hundreds. Second, they charge that Wohlleben cherry-picks and exaggerates many of the scientific findings that underpin his book. And, lastly, they argue that he portrays forests as cartoonishly coöperative.[15]

[10] https://www.wnycstudios.org/podcasts/radiolab/articles/from-tree-to-shining-tree
[11] Peter Wohlleben, *The Hidden Life of Trees: What They Feel, How They Communicate*, trans. Jane Billinghurst, fwd. Tim Flannery (Vancouver: Greystone Books, 2016), 100.
[12] Wohlleben, *The Hidden Life of Trees*, 107.
[13] Ibid., 48.
[14] Robert Moor, "The German Forester Who Wants the World to Idolize Trees," *The New Yorker* (June 10, 2021): https://www.newyorker.com/books/under-review/the-german-forester-who-wants-the-world-to-idolize-trees#:~:text=Peter%20Wohlleben%2C%20the%20German%20Forester,Idolize%20Trees%20%7C%20The%20New%20Yorker
[15] Moor, "The German Forester."

Even Simard says that, "Some of the anthropomorphizing was just over the top. Even I was, like, 'Ugh, I can't read this.' "[16] Wohlleben's aim is to push back against "the reductive understanding of Darwinism as a merciless, perpetual war of all against all"—a worthy task, and one that I myself am dedicated to in my own work. But the fact is, as the author notes, that

> Arboreality is often much uglier than Wohlleben lets on. Black walnuts poison other plants with a natural herbicide called juglone; some eucalyptus trees continually shed their oily bark, fueling fires that immolate their competitors; various species of fig tree plant themselves high in the branches of other trees, then slowly creep downward, either strangling the host tree or splitting it apart. Trees of all species shade the ground, depriving seedlings—including their own offspring—of light, allowing only the fittest to survive. "If humans were like trees, we would go into a hospital and eliminate ninety-nine per cent of the babies, and keep only the best ones," Christian Messier, a professor of applied forest ecology, told me.[17]

Of course, I don't like that familiar neo-Darwinian reductionist narrative either, and that's part of what this project (and a lot of my other current work) is about. I know from experience that the forest is a very, very special place, in no small part for the reasons that these scientists have described in an increasing flood of books. But I'm also deeply suspicious of the danger of anthropomorphizing the forest that has overtaken much of this work—no doubt with the best of intentions: a danger to which I'm especially sensitive given my own intellectual and scholarly background. I began to wonder if the difference of the forest in all its alterity weren't somehow being domesticated and anthropomorphized by the very attempts to capture its special character and its complexity—a question I had spent quite a bit of time navigating for much of my scholarly career around "the question of the animal" and the persistent charge of "anthropomorphism" routinely mobilized by the scientific community against those who wanted to do justice to the complexity of the life-worlds of at least some non-human animals.

So another way to put it is to ask what we do when come across material like the following, from an article in *The Guardian:*

> One of Simard's most thrilling beliefs is that trees can recognise us. "Trees perceive many things. They know when they're infected and have an instantaneous biochemical response. When we manipulate trees, they respond." Would she go as far as to suggest a tree can feel pain or grief? "I don't know. Trees don't have a brain, but the network in the soil is a neural network and the chemicals that move through it are the same as our neural transmitters." She is currently collaborating on research to see whether trees can distinguish us as humans.[18]

And I think we're forced to push the question even further when we remember, as the article notes, that Simard's

[16] Ibid.
[17] Ibid.
[18] https://www.theguardian.com/environment/2021/apr/24/suzanne-simard-finding-the-mother-tree-woodwide-web-book-interview

book, *Finding the Mother Tree,* revolves around a "grafting of events from her life – the tragic death of her rodeo-rider brother, the birth of her daughters, the end of her marriage to a fellow forester, her new relationship with a woman, her recent breast cancer – on to her experience of the forest." In other words, the forest has done a lot of therapeutic work for Simard. As she puts it in that same article, "the forest accepts me. There's no judgment. You're just there with it. When I was going through cancer treatment, all I wanted was to be there."[19]

Giovanni Aloi, in his introduction to the edited collection, *Why Look at Plants?: The Botanical Emergence in Contemporary Art,* captures the problem (and the challenge) well when he writes,

> underneath the unwillingness to acknowledge that plants are active agents, that they want and desire, that they are aware of their surroundings, and that they might even feel pain in very different ways from ours lies a form of deep anxiety that is entirely human and exclusively about us.... At what point are we prepared to seriously acknowledge that our sensorial is just as partial as, and in many cases more limited than, those of other nonhuman beings? At what point can we acknowledge that we only access a very superficial notion of nonhuman perceptiveness and that ultimately all animals and plants see, hear, smell, sense, and feel the world in ways we cannot even conceive?[20]

This, it seems to me, is precisely the rub, but it is one that pulls us—or at least me—in two opposite directions at once. To put it bluntly, in acknowledging that plants "feel," "desire," and so on, aren't we avoiding the challenge, or at the very least domesticating it, that forms of non-human life "see, hear, smell, sense, and feel the world in ways we cannot even conceive?"

An immediate default response to this question is to take recourse to the more fundamental (and as it were, positionless) language of science and chemistry, showing, for example (as Simard points out), that some of the chemicals that move through the underground mychorrizal network in forests are the same ones found in our neural transmitters. But surely, as we know from decades of debate in philosophy of mind and cognitive science, we don't want to leap to the reductionist claim that "mind" just *is* the wetware, anatomy, and chemistry of the "brain" and nothing more. That would be to canonically confuse "brain" and "mind," and—equally canonically—to confuse empirical and philosophical claims, something underscored by Derrida's reading of Heidegger, which we'll take up later.

Hence the need, in my view, to "keep the forest weird." But this is a different weirdness from that which is most associated with the forest in the Western canon of art, literature, and philosophy: namely as the domain of the Sublime in both the Burkean and Kantian senses. As Aloi notes,

> In a Kantian sense, the forest is a site capable of embodying both the mathematical as well as the dynamic conception of the term. The forest is sub-

[19] Ibid.
[20] Giovanni Aloi, "Introduction: Why Look at Plants?," *Why Look at Plants? The Botanical Emergence in Contemporary Art* (Leiden: Brill Rodopi, 2018), 6-7.

> lime in size and in the frequent repetition of similar trees, which makes it a place of disorientation. Likewise, the forest can materialize or amplify the wind and the violence of a storm to dynamical sublime effects. In both instances, the rapid alternation between the specific pleasure found in being overwhelmed and the fear of such instance metaphorically inscribes the very drama of humanity against nature. The "greatness of dimension" and "infinity" of the forest became the essential counterweight to the relentless, gritty ugliness imposed upon cities and countryside by the industrial revolution.[21]

As Aloi notes, this sense of the sublime (and its association with national identity) is embodied in the great tradition of landscape photography that we find in figures such as Ansel Adams, "whose images capture an unspoiled paradise defined by monumental drama and sacred timelessness: an environment closely managed by man but simultaneously one from which man's presence must be categorically negated, at least representationally"—which is one reason my project is emphatically *not* in the tradition of landscape, and hence its commitment to a forensics which lays out a formal aesthetics of scientific practice in the services of human management whose meaning as a sign system is far from clear.[22]

Not doing the Ansel Adams thing, *not* doing the Sublime, is part of the point of the poems included in the installation, and a couple of different reasons the forest remains weird are teased out by the remarkable, scientifically literate poet A.R. Ammons, whose work I've been writing about off and on since I was a graduate student. Remembering my point earlier about the "virtuality" of worlds (in Uexküll's sense) and the related point about a topological vs. topographical understanding of ecological space, we can appreciate the humor, but also the brilliance and insight, of Ammons' discussion of trying to locate the tree in his back yard--a remarkable passage that sets up a progression—a *task*, you might say—for philosophy's understanding of what it does, what we might call its self-image.

Here's the passage from his amazing long poem, "Essay on Poetics," where—after ruminating on the shared etymology of *tree* and *true*--he speculates that he

ought to do a booklength piece on the elm in the backyard here:
I wish I had done it now because it could stand for true, too:
I did do a sketch one day which might suggest the point:

I guess it's a bit airy to get mixed up with
an elm tree on anything
like a permanent basis: but I've had it
worse before—talking stones and bushes—
and may
get it worse again: but in this one
the elm doesn't talk: it's just an object, albeit
hard to fix: unfixed, constantly
influenced and influencing, still it hardens and enters
the ground at a fairly reliable point:

[21] Giovanni Aloi, "Lost in the Post-Sublime Forest," *Why Look at Plants? The Botanical Emergence in Contemporary Art* (Leiden: Brill Rodopi, 2018), 43.
[22] Ibid., 43-44.

especially since it's its
general unalterability that I need to define and stress
I ought to know its longitude and latitude,
so I could keep checking them out: after all, the ground drifts:
and rises: and maybe rises slanting—that would be difficult to keep track of, the angle
could be progressive or swaying or
seasonal, underground rain
& "floating" a factor: in hilly country
the underground mantle, the
"float" bedrock is in, may be highly variable and variable in effect:
I ought to know the altitude, then, from some fixed point:
I assume the fixed point would have to be
the core center of the planet, though I'm perfectly prepared to admit the core's involved
in a slow—perhaps universal—slosh that would alter the center's position
in terms of some other set of references I do not
think I will at the moment entertain
since to do so invites an outward, expanding reticulation
too much to deal precisely with:

true, I really ought to know where the tree is: but I know it's in my backyard.[23]

Ammons' musings here open onto the necessary progression—to give a nod to my sponsors—from epistemology and logic to a different order of complexity associated with the very shaggy term "materialism." As I have argued elsewhere, it forces upon us a deconstruction of the supposed opposition of ontology and epistemology, and confronts us fully with the mostly overlooked complexities (especially these days, at least, in the era of Big Data) of what the term "empirical" means. To put it another way, it captures in a nutshell what Deleuze meant when I said, "I have always felt that I am an empiricist, that is, a pluralist."[24]

The second point here is that we can approach this fact about singularity and *quidditas* from a number of vantages. Ammons opens his remarkable essay "A Poem Is A Walk" with a quotation from the poet Lao-tse: "Nothing that can be said in words is worth saying"—and then elaborates brilliantly, explaining why art is better than philosophy for exploring what the thin, bare bones discourses of epistemology and logic cannot:

> Nothingness contains no images to focus and brighten the mind, no contrarieties to build up muscular tension: it has no place for argumentation and persuasion, comparison and contrast, classification, analysis. As nothing is more perfectly realized, there is increasingly less (if that isn't contradictory) to realize, less to say, less need to say. Only silence perfects silence. Only nothingness contributes to nothingness.[25]

"For example," he continues,

[23] A.R. Ammons, *Selected Longer Poems* (New York: Norton, 1980), 37-38.

[24] Gilles Deleuze and Claire Parnet, *Dialogues*, trans. Hugh Tomlinson and Barbara Habberjam (New York: Columbia University Press, 1987), vii.

[25] A.R. Ammons, "A Poem is a Walk," *Set in Motion: Essays, Interviews, & Dialogues,* ed. Zofia Burr (Ann Arbor: University of Michigan Press, 1996), 12.

> All is One, seems to encompass or erase all contradictions. A statement, however, differs from a work of art. The statement, All is One, provides us no experience of manyness, of the concrete world from which the statement is derived. But a work of art creates a world of both one and many, a world of definition and indefinition. Why should we be surprised that the work of art, which overreaches and reconciles logical paradox, is inaccessible to the methods of logical exposition? A world comes into being about which any statement, however, revelatory, is a lessening.[26]

And so, "Unlike the logical structure, the poem is an existence which can incorporate contradictions, inconsistencies, explanation and counter-explanations and still remain whole, unexhausted and inexhaustible; an existence that comes about by means other than those of description and exposition."[27]

Ammons draws not just an epistemological or ontological lesson from these facts, but an ethical one as well. As he writes at the end of that essay,

> Poetry leads us to the unstructured sources of our beings, to the unknown, and returns us to our rational, structured selves refreshed. Having once experienced the mystery, plenitude, contradiction, and composure of a work of art, we afterward have a built-in resistance to the slogans and propaganda of oversimplification that have often contributed to the destruction of human life. Poetry is a verbal means to a nonverbal source. It is a motion to no-motion, to the still point of contemplation and deep realization. Its knowledges are all negative and, therefore, more positive than any knowledge. Nothing that can be said about it in words is worth saying.[28]

Now Ammons, as some of you may know, is taken to be the main inheritor of the Emerson/Wallace Stevens line of American Romanticism in poetry, and Ammons' point here is one I tried to elaborate, with the help of Gregory Bateson, on a larger canvas when reading Stevens as an ecological poet in my book, *Ecological Poetics,* zeroing in on Stevens' poem "The Region November" (1954)—one of the last poems Stevens ever wrote, published only after his death:

"The Region November"
It is hard to hear the north wind again,
And to watch the treetops, as they sway.

They sway, deeply and loudly, in an effort,
So much less than feeling, so much less than speech,

Saying and saying, the way things say
On the level of that which is not yet knowledge:

A revelation not yet intended.
It is like a critic of God, the world

[26] Ammons, "A Poem is a Walk," 13.
[27] Ibid., 15-16.
[28] Ibid., "A Poem is a Walk," 20.

And human nature, pensively seated
On the waste throne of his own wilderness.
Deeplier, deeplier, loudlier, loudlier,
The trees are swaying, swaying, swaying.[29]

So let's remind ourselves of Ammons' statement touched on a moment ago: "Why should we be surprised that the work of art, which overreaches and reconciles logical paradox, is inaccessible to the methods of logical exposition?" And then we can zero in on the central question of the poem: what kind of "saying" is at work in this "swaying," "So much less than feeling, so much less than speech." And yet—indeed, *for that very reason*, the poem suggests--"Deeplier, deeplier, loudlier, loudlier."

Here are a couple of speculations on that question by the remarkable reader of poetry from the 1960s, Roy Harvey Pearce, who writes,

> The poem see-saws between "sway" and "say"—the movement of meter and sensibility being enforced by the outrageous adverbs, "deeplier" and "loudlier"…. The effort of the treetops is "So much less than feeling, so much less than speech." Yet it proves a feeling and speech of some sort; and the poet can suppose that they "say / On the level of that which is not yet knowledge." "On the level of. . ." is "philosophic" diction, and so bids us think with this lyric, not sing mournfully with it. The "not yet intended" of the seventh line is in fact a bit of technical language out of Stevens' dabbling in phenomenology, in whose logic all revelations are nothing if not "intended." Now he decides that, spontaneously, without intention, to be is to say: to say what "It is hard to hear." In short, Stevens is claiming that if the treetops do "say," it is not in the language of any "speech."…He will not let himself be trapped in the anthropocentrism, as often as not masked as theocentrism, of his "romantic" forebears and contemporaries. He will be a radical humanist to the end. But his humanism now forces him to acknowledge both the virtual life of the non-human and its virtual capacity to "say."[30]

As we know from our discussion at the outset, "virtuality" is indeed the point here, and the question is then how we ramify that point, you might say—something brought into focus by Pearce when notes that Stevens' "humanism," here associated with a Husserlian take on phenomenology, attributes "saying" to the trees even as Stevens assiduously marks the self-reference (to use systems theory language) of that attribution in way that "theocentrism" (the voice of god speaking, equally as it were, through the whole of creation) does not. That's what makes Stevens a "modernist" and not a stereotypical Romantic poet, after all.

We can push the trajectory of this investigation to the next station by pausing briefly over a poem by an illustrious contemporary of Ammons, John Ashbery, in his beau-

[29] Wallace Stevens, *Opus Posthumous: Poems, Plays, Prose*, ed. Milton J. Bates (New York: Vintage Books, 1990), 140.

[30] Roy Harvey Pearce, "Wallace Stevens: The Last Lesson of the Master," in *The Act of the Mind: Essays on the Poetry of Wallace Stevens,* ed. Roy Harvey Pearce and J. Hillis Miller (Baltimore: Johns Hopkins University Press, 1965), 130.

tiful and nuanced poem, "Some Trees," which is one of the most celebrated early poems in his celebrated—and remarkably long—career. The opening stanza is almost a conceit for what Simard imagines going on not just above but also below ground in the forest:

"Some Trees"

These are amazing: each
Joining a neighbor, as though speech
Were a still performance.
Arranging by chance

To meet as far this morning
From the world as agreeing
With it, you and I
Are suddenly what the trees try

To tell us we are:
That their merely being there
Means something; that soon
We may touch, love, explain.

And glad not to have invented
Such comeliness, we are surrounded:
A silence already filled with noises,
A canvas on which emerges

A chorus of smiles, a winter morning.
Placed in a puzzling light, and moving,
Our days put on such reticence
These accents seem their own defense.[31]

Ashbery's use of slant rhyme (or "off-rhyme") here is, for my purposes, brilliant. While rhyme canonically unites maximum semantic difference with maximum acoustic similarity (the rhyming of "king" and "thing" would be a classic example) what we might call the "fuzzy logic" of slant rhyme is "the same and not the same." And here, it opens onto a phenomenological progression. The last two stanzas—and in particular the lines "glad not to have invented / Such comeliness"—provide a kind of elaboration of Stevens' line from "The Region November," "a revelation not yet intended," and kick the phenomenological orientation here from a Husserlian register into a Heideggerian one. This is a poem *not* about intention and agency but *reception*, canonically put front and center in Heidegger's emphasis on the common etymological root of "thinking" and "thanking," with its figure, the open, upward facing hand, in the background, which both Derrida and Stanley Cavell underscore in their readings of Heidegger.[32] All of which, in Ashbery's poem, depends upon *hearing it from the trees*.

Heidegger's weird but wonderful way of putting this, which Cavell has emphasized in his conjugation of Heidegger, Emerson, and Wittgenstein, is that what Heidegger calls the "near" can't be *forced* nearby (as it were) prehensile "grasping," using philosophy as analytical apprehension and capture. Rather, it has to be allowed to *come* near, it has to be allowed to approach, on its own (as it were), and the job of philosophy is to prepare us for that approach through a kind of attunement. Without going down the involuted rabbit hole that Heidegger invites us

[31] John Ashbery, *Some Trees* (New Haven: Yale University Press, 2019), 21.

[32] See Derrida's essay "*Geschlecht* II: Heidegger's Hand," trans. John P. Leavy, Jr., in *Deconstruction and Philosophy: The Texts of Jacques Derrida,* ed. John Sallis (Chicago: University of Chicago Press, 1987), 161-197, and Cavell's "Finding as Founding: Taking Steps in Emerson's `Experience'," in Stanley Cavell, *Emerson's Transcendental Etudes* (Stanford: Stanford University Press, 2003), 111-140.

to explore on this topic, let's just note that this nearness is not a matter of empirical measure or extension. As Heidegger writes at the opening of his enigmatic late essay "The Thing," from 1950--which has remarkable resonance not just for our own moment of the Internet and social media, but more directly for our questions about the new forestry—and also, especially, for the short film which will be the last component of the "Experimental Forest" installation:

> All distances in time and space are shrinking. Man now reaches overnight, by plane, places which formerly took weeks and months of travel. He now receives information, by radio, of events which he formerly learned about only years later, if at all. The germination and growth of plants, which remained hidden throughout the seasons, is now exhibited publicly in a minute, on film.... The peak of this abolition of every possibility of remoteness is reached by television, which will soon pervade and dominate the whole machinery of communication....
>
> Yet the frantic abolition of all distances brings no nearness; for nearness does not consist in shortness of distance. What is least remote from us in point of distance, by virtue of its picture on film or its sound on the radio, can remain far from us. What is incalculably far from us in point of distance can be near to us. Short distance is not in itself nearness. Nor is great distance remoteness.
>
> What is nearness if it fails to come about despite the reduction of the longest distances to the shortest intervals? What is nearness if it is even repelled by the restless abolition of distances? What is nearness if, along with its failure to appear, remoteness also remains absent?
>
> What is happening here when, as a result of the abolition of great distances, everything is equally far and equally near? What is this uniformity in which everything is neither far nor near—is, as it were, without distance?
>
> Everything gets lumped together into uniform distancelessness. How? Is not this merging of everything into distancelessness more unearthly than everything bursting apart?[33]

If you're thinking Big Data, the Internet, and the Google-ization of everyday life, I am too—and I want you to linger for a moment as well over the many tones of "unearthly" in the last sentence.

Thinking back to our earlier discussion of Michel Serres, we can see how this passage exemplifies what has been called the "topological" character of Heidegger's thought.[34] And for Heidegger, the point here is to be taken within the larger context of the sharp line he draws between empirical and scientific knowledge, on the one hand, and the philosophical and existential domain, on the other. Derrida rightly criticizes Heidegger's uncharacteristically "dogmatic" thesis that the animal "has no world" or, at best,

[33] Martin Heidegger, "The Thing," in *Poetry, Language, Thought,* trans. Albert Hofstadter (New York: Harper Colophon, 1971), 165-166.

[34] As in the large body of writings on Heidegger by the philosopher Jeff Malpas. See among others, *Heidegger's Topology: Being, Place, World* (New York: Bradford Books, 2008).

is "poor in world," or "has a world in the mode of not-having," but he also respects Heidegger's ultra-philosophical insistence on the difference between scientific and philosophical knowledge.[35]

Derrida highlights this turn toward the "near" in Heidegger's thought in the second set of seminars on *The Beast and the Sovereign,* framing Heidegger's essay as "a great text on death, on the mortality of *Dasein,* in opposition to an a-mortality or even immortality of the beast"—and, it goes without saying within these Heideggerian parameters, the a-mortality of plants and trees.[36] This is surely born out in the closing pages of Heidegger's essay, where he famously asserts, "Only man dies. The animal perishes," because only humans are capable of "death as death."[37]

Now, we know Derrida's deconstruction of this aspect of Heidegger's thinking, on the "as such" of death—human beings don't have access to the "as such" of death either, so that (as I've put it elsewhere) "having a world in the mode of not-having," which Heidegger attributes to animals, is as good a definition of Dasein as we're likely to get (and the same could be said, of course, for the rigorous line between "reacting" and "responding" that Derrida deconstructs with regard to the human/animal divide).[38] But what I want to draw attention to here is a remarkable, but very short, turn in Derrida's engagement of this question of "the near" in the second set of seminars, where he picks up on Heidegger's reference to Meister Eckhart's discussion of the thing (where Eckhart uses the word "thing," *dinc,* for God as well as the soul). Derrida quotes Eckhart's assertion that "love is of such a nature that it changes man into the things he loves," and comments in a remarkable passage that

> This quotation matters to us here, because it is a question of *love,* indeed, but a love that appropriates what it loves to make of it the thing it loves.... We shall be wondering whether, in death and in mourning, things are not the same as they are in love, and whether loving, then, does not mean loving so as to make it one's lovable thing, to the point of having it at one's disposal. . .which can also be as far as can be from oneself. Everywhere.[39]

I think that this is exactly what's going on in a lot of work in "the new forestry," some of which we discussed above, and the point here would not be admonition, but rather to take seriously Derrida's fundamentally deconstructive relationship to this question of "the near": that the very things that bring the world near are also, and unavoidably, the very things that push it away. To put it another way, in attempting to make the forest a very special "here," the domestication and anthropomorphization of the forest makes it, to use Derrida's term, not just an "us" but actually, an "*everywhere.*"

Two contemporary tree-centric works that really get at what I'm talking about are Eija-Liisa Ahtila's *Horizontal* and Mark Dion's *Neukom Vivarium.* The artist's synopsis for the former reads as follows:

[35] See in particular Jacques Derrida, *Of Spirit: Heidegger and the Question,* trans. Geoffrey Bennington and Rachel Bowlby (Chicago: University of Chicago Press, 1989).
[36] Jacques Derrida, *The Beast & the Sovereign, Vol. 2,* ed. Michel Lisse, Marie-Louise Mallet, and Ginette Michaud, trans. Geoffrey Bennington (Chicago: University of Chicago Press, 2011), 120.
[37] Heidegger, "The Thing," 178.
[38] See Cary Wolfe, *Before the Law: Humans and Other Animals in a Biopolitical Frame* (Chicago: University of Chicago Press, 2013), 63-86.
[39] Derrida, *The Beast & The Sovereign, Vol. 2,* 121.

> Horizontal is a six-channel moving-image work of a living spruce tree. The idea of the work is to show the tree in its entirety, as far as possible retaining its natural size and shape. Because the life-size tree does not fit in a standard-sized human space, the tree is presented horizontally in the form of successive projected images. The work is a portrait of the tree. It is a record of its existence as a living organism.[40]

But as the artist put in a conversation that we did together for *Bomb* magazine in New York a few years ago,

> Everything that this excerpt of the text says concerning the spruce is, we could argue, not true. What we see and hear in an exhibition space is a huge tree moving in a heavy wind. But if we take a closer look, we'll see that it's not (only) a portrait of a tree but an image of the technical apparatus constructed as an extension of the human eye and perception.
>
> Any attempt to show a fully grown spruce or some other tall tree using the moving image is bound to run into difficulties. First comes the problem of film frame: You cannot get the entire tree into one horizontal frame. Special lenses will distort the image. If one steps back what one gets is a landscape not a portrait of a tree. We filmed our spruce tree on a windy day in early October. The preparations had taken much longer than we had anticipated. Although we had decided to shoot the tree in parts in order to avoid distortion and maximize the amount of visual information, finding a tree of suitable size was difficult. The proportion of the width to the height of the tree was important to allow us to present it using five projectors. Second, the background had to be "empty" to give prominence to the tree and its form. The tree also needed to grow in a place where we were able to set up scaffolding or use a scissor lift. We discussed what kind of a camera and lens we should use and how many would be needed. We knew from experience that using multiple cameras would also multiply the horizon and the background, which would be visible in more than one picture in the final work. We weighed different solutions both for the shooting and for postproduction. It soon became obvious that the more we tried to reproduce in the portrait of what we saw standing next to the tree and combine that with our ideas about the portrait of the tree, the more the final work would be about the devices and technology of cinematography and about us humans as observers. Again, the spruce returned us to Uexküll's ideas about the coexistence of separate spatial and temporal worlds of different living beings and to the idea of existence next to and with something else.[41]

Ahtila's observations will recall for you, I hope, our earlier discussion of the poems by Ammons, Ashbery, and Stevens, and especially Ammons' musings on the elm-tree in his back yard in "Essay on Poetics."

[40] "Eija-Liisa Ahtila, by Cary Wolfe," *BOMB* 120 (Summer 2012): 142. Also available at https://bombmagazine.org/articles/eija-liisa-ahtila/.

[41] "Eija-Liisa Ahtila, by Cary Wolfe": 142.

A second remarkable work, Mark Dion's *Neukom Vivarium,* in Seattle, consists of many elements, the main components of which are a Western hemlock nurse log retrieved from the forest in 2006, and a large glass-enclosed building which was designed as a life support system and viewing area for the log and its various other inhabitants.

As Dion puts it in an interview about the piece:

> I think that one of the important things about this work is that it's really not an intensely positive, back-to-nature kind of experience. In some ways, this project is an abomination. We're taking a tree that is an ecosystem—a dead tree, but a living system—and we are re-contextualizing it and taking it to another site. We're putting it in a sort of Sleeping Beauty coffin, a greenhouse we're building around it. And we're pumping it up with a life support system—an incredibly complex system of air, humidity, water, and soil enhancement—to keep it going. All those things are substituting what nature does, emphasizing how, once that's gone, it's incredibly difficult, expensive, and technological to approximate that system—to take this tree and to build the next generation of forests on it. So, this piece is in some way perverse. It shows that, despite all of our technology and money, when we destroy a natural system, it's virtually impossible to get it back.... In some way, I want to acknowledge or even enhance the uncanniness of nature and the wonder of the vast complexity and diversity within a natural system. I want to show how difficult it is for us to grasp, not just conceptually but also practically. How difficult it is for us to figure in all of the variables that you would need to replicate a forest.[42]

There's a lot going on in both of these works, particularly Dion's, which consists of many more elements than I've covered here. But one of the things both works dramatize, for me, is how, in an attempt to bring other forms of life "near," in an act of appreciation—in this case, trees—we gradually realize, in fact, how different they are, and how that act of "nearing" simultaneously makes them "far"—in Ahtila's case, by foregrounding the inescapably constitutive role of technology as we try to provide as "accurate" as possible a picture of a single tree, and similarly, in Dion's case, in realizing just how much technology is needed to simulate the "natural" conditions of the ecosystem in which the nurse log lived. And in that "farness," Dion suggests, a kind of "nearness" is achieved, in the sense of a greater appreciation of the alterity and complexity of ecology and ecosystems.

* * * * *

So in the brief time I have left, let me lay out for you a quickly as I can the elements of my own installation project, "Experimental Forest."

The basic layout is easy enough to describe and even imagine. It's a two-room installation with a small anteroom in the second, and an exit annex. In the larger main room, we find two decommissioned or recreated research structures: one self-consciously "high tech," like the ones beings used to monitor the snow pack and beam informa-

42 "Interview: `Neukom Vivarium,' Mark Dion," *Art21, https://art21.org/read/mark-dion-neukom-vivarium.*

tion about it to satellites in space, in a cooperative venture with NASA and one self-consciously in the "garage" aesthetic mode, like the primitive structures made of ladders, coolers, and modified milk urns used to collect rain water and insects that are scattered about the site. On these research structures, the text of the poems about trees and the forest discussed earlier in this presentation are printed on the silver and blue metallic material used for tagging trees throughout the forest, and the poems are hung from the structures themselves, one word per tag. It's hard to be much more specific about this because it would depend on the size, volume, etc. of the room.

At the center of the room is a large rectangular terrarium, roughly five feet long by three feet high by three feet wide, spot lit from the four corners of the room, that contains live mychorrizal fungi connecting roots and rootmats of trees native to the Experimental Forest. If possible, (and I can't imagine that it would be, but who knows, maybe someday...) I'd like to also grow psilocybin mushrooms as part of this fungal culture, to suggest that the underground forest, as a kind of unconscious of the "brain" of the forest above ground, is dreaming, but in a language we can't understand—that is to say, tripping.

The room itself is occupied by a sound field that is composed of the sounds of creeks and streams recorded on-site in the forest slowly morphing into satellite transmission static and then back again. It's probably worth noting that the sound field reflects the original research emphasis of the Fraser Experimental Forest on water and hydrology, but it also raises the issue of digital vs. analog forms of communication and their networks (which would be another entire essay in itself, of course), which itself tethers to the seriality and iterability of the metal tree tags and their photographs, of the poems themselves, and of the video that concludes the installation space.

The walls of the main space are populated, as the space allows, by groups and grids of photos arranged by type: tree blazes, cables, silver tree tags, blue tree tags, culverts, research structures large and small, signs, detritus, and so on—and in some situations the types will be mixed serially, left to right, so that the number of photos will match the number of syllables or beats per line, with the same line breaks, as the poems hanging on the research structures.

The second, smaller room will continue some of the forensics of the first, but will also be different in tone and formal bearing. There will be a display case of the sort found in natural history museums, containing "Objects Found in the Experimental Forest"—some will be natural items and some, cultural artifacts. Three walls will be occupied by large photo diptychs of research structures old and new, and the geometry of the room will guide the viewer to a small anteroom, where the "Dog Shrine," will be installed.

The "Dog Shrine" is a latecomer to the project—in fact it only came onto the scene last summer. As I was hiking in the Experimental Forest in an area known as the Deadhorse/Spruce Creek loop, I noticed something at a bend in the trail, at a distance, and I realized it was a faded picture of a dog, roughly 4x6 inches, the picture itself unprotected from the weather, nailed to a tree at the four corners of the photograph. As I came closer, I saw at the base of the tree what I am guessing are the ashes of the photographed

canine in question, so none of this could have been there that long, but it's hard to say how long. Needless to say, this was a poignant and moving discovery for me; it sort of took my breath away, and it made me happy and sad, all at the same time, thinking about how formative my experience with my dog in this area has been, year after year, hours and hours spent wandering in the area, just the two of us, just as I imagine was the case for that dog and his or her human companion. There had to be something special about that particular site too, but that we'll never know.

So I decided that the "Dog Shrine" needs its own little anteroom in the second room space. I haven't designed the piece yet, but it will a diptych or a triptych, with images of the dog photo and the ashes at the base of the tree, and the whole thing will be framed in the largest dog biscuits I can find, in part to keep the piece from being too mournful and maudlin, and in part to remind us of the joy that those two companions must have shared in the Experimental Forest, just as my dog Zena and I have shared ours—because, well, we know how much dogs love dog biscuits!

In terms of the "Dog Shrine's" larger relationship to the project, I don't want to say a whole lot more. All the dogs in the project—the Berthoud Pass avalanche dog who miraculously survived that avalanche in the YouTube video, Suzanne Simard's dog Jigs who fell into the latrine and inadvertently helped her discover the Wood Wide Web, my dog Zena, and this unnamed but obviously much-loved dog of the "Dog Shrine"—they are all, as my friend Donna Haraway would put it, "kin." They are all the same dog, in a way: the dog who wanders the Experimental Forest.

The final component of the installation is something you come across as you exit the anteroom/second room space: a video monitor with headphones that plays the short film I will play for you now, called "Flynt's Blues." It's a roughly eight-minute 1080p video composed of a series of slow-motion passing shots of cell phone towers, most of them in the desert, shot with my Samsung Galaxy phone on a drive from Phoenix to the Grand Canyon a few years ago. The music for the film is the first eight minutes or so of Henry's Flynt's instrumental drone piece, "Purified by the Fire," a 41 minute and 41 second composition recorded in 1981.[43]

* * * * *

[43] A nice short take by Marcus Boon on Flynt's piece may be found at https://marcus-boon.com/purified-by-the-fire/.