Otherness: Explorations at the Intersection of Fine Art and Conservation Biology

A Thesis

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by

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Authorization to Submit Thesis

The thesis of David A. Roon, submitted for the degree of Master of Fine Arts with a major in Art, " OTHERNESS: EXPLORATIONS AT THE INTERSECTION OF FINE ART AND CONSERVATION BIOLOGY," has been reviewed in final form. Permission, as indicated by the signatures and dates given below, is now granted to submit final copies to the College of Graduate Studies for approval

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Abstract

My MFA thesis work functions at the interface between Conceptual Art and Conservation Biology. Sub-themes within this work include:

1. Otherness and the Animal. I'm interested in the presence/depiction of non-human entities in fields like wildlife art. I discuss my ideas on what constitutes a respectful/open exploration of the non-human, with examples from my own work and from other artists.
2. Absurdity and Tension in the Human-Environment Relationship. Human beings continue to push ecosystem function and evolution in unsustainable directions. A subset of my work engages with these scenarios both literally and metaphorically.
3. Reconciliation Art. An emergent body of art practice seeks to create site-specific works that interface with ecosystem function. Again, I discuss the history of this movement, with examples from my own practice.

In addition, I comment on my antecedents, and discuss my artistic progression from the standpoint of craft and media.

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Finally, my wife Lisette is my friend, adventure buddy and anchor. I'd have never considered getting a second degree if she hadn't suggested it, and I'd never have succeeded without her selfless support.

Dedication

This work is dedicated to C.S. Lewis, who clearly articulated an idea (drippings of Grace) that is central to my work… and to Mary Roon (my mum), who taught me to love tough-minded women, Narnia and garter snakes.

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We’re lost without resistant reality

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Stick and stone and fossil bone, insect small and sky so tall

We like to think that we’re the apogee
But all is spun in linked and lovely intricacy

Short Biography: Intentions

C.S. Lewis coined the expression Drippings of Grace (Lewis 1949) to describe experiences which conveyed a sense of infinite potentiality, of holiness or the sublime. These rare instants of transcendence are linked to many existential encounters (music as one example)- but equally to experiences in the wild, in natural settings where the fey and the lovely are unfettered. The drive to create art can be inextricably interwoven with such experiences- and there's nowhere that these experiences are more accessible than in encounters with Otherness.

I'll discuss the conceptual idea of Otherness in more detail later. The term has been variously used by scholars ranging from Derrida (Barnett 2004) to David Brin (1989); but for me, the essence of the concept lies with resistant reality. Whether it's a human lover, an animal companion, or an otter in a wild river, existence forces us to engage with entities that defy our suppositions and projections. For some, the instant response is rejection and antagonism… or an active assertion of the 'imperialism of the same' (Claviez 2006). However, for the scientist and the artist (among others), Otherness can evoke curiosity and the desire for connection.

Conceptually, my practice is inextricably linked to this relational narrative. At its broadest, all art is ultimately about telling a story. This story can be quite simple (a scream or a laugh). It can be intensely introspective (explorations of gender identity). In my case, the process of making is a process of looking outward- seeking for meaning in tropic webs, in ecosystem cascades, in the enigmatic gaze of a harbor seal or an otter. My story-telling is grounded in decades of formal scientific exploration, as well as a lifetime of intuitive reaching out towards Otherness. It is also anchored in a drive towards advocacy; a recognition of brokenness in the Human-Nature relationship, and a desire for healing.

I work across media, and utilize conceptual language drawn from many sources: mythology and personal faith, objectivist science and intuition. Two recent works hint at these integrated threads. (Note- both works will be discussed in detail later in the exposition).

Strange Evolution: Acutus and the Androgene (Fig 1, Fig 2) is a mixed media work that draws from a specific body of published research in ecology- related to a warped evolutionary pattern in which hormone-laced effluent is interfering with gender rations in reptiles and amphibians. *Acutus* is not simply a documentation of ecological process or an encounter with Otherness, however- it's also a commentary on the absurdity, unhinged pacing and chaos of our own human Darwinism. *Acutus* is also noteworthy for its synthesis of media –the work utilizes Raku and mid-fired ceramic elements, as well as welded steel, fabric, paint, raw clay.

Drawing from work by the ecological theorist Jared Diamond (Western et al 1989), *Sinister Six: Gilgamesh and Humbaba* (Fig 3) utilizes ancient Sumerian mythology to illustrate one of six key global conservation threats. In creating this imagery, I reach back—again-- to C.S. Lewis and other writers I admired as a child. From these writers, I learned that it's possible to take layered ideas and present them lyrically and approachably through the language of myth.

Both works inherently treat with Otherness, however, and with the potentiality that emerges when the subject relinquishes ownership and control. As I discuss some key antecedents in my work, I will iteratively return to these concepts- the experience of Otherness, and the desire to ever reach for Lewis's Drippings of Grace.

Conservation Art- A Brief Survey of the Intersection

Much of my work can be defined as conservation art. There have been a number of books and scholarly essays written on the fields variously termed Ecological Art, Environmental Art, or Conservation Art (Baker 2013, Brown 2014, Matlinsky 1992, Spaid 2002, Western et al 1989). These fields trace their inception to the Acadian vision, or possibly to the caverns of Lascaux. However, the emergence of the Anthropocene (Steffen et al 2011), (the era in which humans are arguably the dominant force in global biogeography), has irrevocably changed the character of these modes of making.

Conservation artists are people who walk open-eyed in what Aldo Leopold referred to as a 'world full of wounds' (Leopold 1996). The contemporary relationship between *Homo sapiens* and the natural world is marked by unsustainability, tension, imbalance, desolation, and frequent absurdity. Whether playing the role of a coalmine canary or a Cassandra, artists who treat with the contemporary natural world all work as Leopold's disciples.

In *Art and Ecology Now* (2014), Andrew Brown describes some modes of expression for Conservation Artists. These include:

Viewing

Artists in this modality are primarily inspired to represent and serve as witness- not only to the splendor and beauty of robust ecologies and wild creatures, but increasingly to environmental imbalance, damage, threat, and injustice. *Strange Evolution: Acutus and the Androgene* (Fig 1,2) certainly has this intent, but so do examples of my work- like my *Lontra* series (Fig 4)- which are more celebratory.

Forming

The physical environment itself can, in some cases, serve as the base material for making. Most art practice can be viewed through these lens- especially traditions like ceramics that emphasize a materiality that inherently evokes the natural world. However,

movements like earth art explicitly use natural substances in-situ, and other artists actively choose to use materials from 'primary reality' (Birksted 2000). Some of my Reconciliation Artwork- such as my emergent experiments with in-situ coffee clay installation- displays this tendency.

Searching.

Artists in this category view their work as exploratory, even experimental- contributing to an understanding of ecological process. Brown argues that 'all creative practice is a kind of research'- but interdisciplinarity and collaboration allow for art to formally exist within the scientific method. My aforementioned coffee-cay installation work has a formal heuristic intent, addressing questions about ecological function.

Using

Many contemporary artists conceptually explore the extraction, re-constitution and disposal of material resources. Trash Art is one prominent example of this type of practice (Whiteley 2000). Some artists engage in this niche because of their uneasiness with the impact of traditional modes of making- it's hard to work in clay and not consider the ramifications of mining, or the carbon footprint of kiln firing.

Creating

Art practice can serve as an incubator for innovation: a platform for prodding at the status quo. The human place in ecological systems is defined by aeon-old conventions and habits, and it's manifest that some of these are failing us. Art allows the freedom to propose novel pathways. Although I don't work directly within this modality, my works such as *Strange Evolution: Acutus and the Androgene* (Fig 1, Fig 2) challenge the viewers' conceptions about natural systems and processes.

Transforming

This final category of ecological art practice focuses on the remediation, healing, mitigation. Art within this modality restores habitat, cleanses degraded water, enhances ecological function. As I'll discuss later, there's considerable overlap between Brown's notion of 'transformative' ecological art (Brown 2014), and my conceptualization of 'reconciliation art'. In reality, there's considerable parsimony between all of these categories; between documentarians who seek to depict and publicize, and reconcilers who actively intervene in ecological process.

Scientists engage with the natural world at several of these scales. In its origins, science was a descriptive, viewing process. Classic examples range from Aristotle studying seasonality in broad-leaf plants to Da-Vinci transcribing the arcing wing-strokes of birds in flight. Even in descriptive science, however, the artist is a latent presence. Da Vinci's life work makes this manifest, as do Richard Owens' remarks about science emerging from Aristotle's labors "like Minerva from the Head of Jove, in a state of noble and splendid maturity" (Owen 1992).

Science as discovery or searching, is where most researchers self-identify. At its strictest, investigative science is a cold, mechanistic process- adhering to a rigid Popperian code where beasts are enumerated rather than named (Keuth 1976). Nonetheless, curiosity and investigation are inseparable from art. Popperian logic sets pragmatic constraints in scientific inquiry… just like conventions of perspective or chiaroscuro in painting. Even within the hard sciences, however, there's been a renewed appreciation for intuition, indigenous knowledge and poetry. I've personally known no one in science who achieves fulfillment without an artist's yearning for poetic, transcendent communication. Dispassionate science does not exist. Whether they'll admit it or not, most working scientists encountered Lewis's Drippings of Grace at some formative stage in their lives. Call it the sublime, or wonder, or holiness- but there's an inexpressible otherness in the natural world that lays our very soul bare. The most test-tube oriented of researchers are trying to articulate this resistant reality on some level.

I personally work across the continuum. In all of my practice, I draw from my background in the sciences (leavened with a lifetime of experience exploring rivers,

mountains, and other wild places). I frequently operate in reactive, documentarian space- in the role of the viewer. This dimension of my practice is at play my explorations of the ecologically absurd, or in my deconstructions of perspectives on the Alterity. At the same time, I'm very alive to the potential for my art to reconcile. When I track the stream-based filtrative capacity of coffee-clay objects, or utilize pheromone-laced ceramic insects to combat bark-beetle infestations, I'm creating and transforming. The first body of work is more individual and introspective, the second is outwardly focused and rooted in social practice. In either case, however, it's safe to say everything I make functions in response to the current unfolding ecological tragi-comedy.

About Media

As already mentioned, I came to my MFA work as a raku artist, with a strong affinity for wheel thrown forms. However, I developed an early, intense interest in the potential for a clay surface to serve as a matrix for carved designs. Through combining line-work and selective glaze application, an artist can create a mosaic effect, parsimonious with stylized naturalistic designs. In my case, these early designs were loosely inspired by various indigenous art traditions, although explicitly hewing to no one style or culture.

Up until my decision to matriculate as an MFA student, I thought of myself as a wheel-based ceramicist. Even then, I'd already been experimenting with complex, conglomerated forms, along with the incorporation of ecologically-based media such as light, water, rocks, and plant life. However, I took an introductory sculpture class as part of a 'should I pursue a second graduate degree' exploratory process. As I delved into the process of making in wood, steel, plaster, and other muti-media, my core artist identity shifted profoundly towards a multi-media approach. I also engaged in participatory art for the first.

The University of Idaho's MFA program is integrated by design, and students are encouraged to explore alternate modes of making. I have long experienced a pull towards printed artwork; my house as a kid was crowded with works by Elton Bennet (Fig 5), Robert Davidson (Fig 6) and Dale DeArmond (Fig 7). The rough, primal energy and impressionism of these images struck me as more accurate reflections of both ecology and mythology than more literal imaging. Thus, I opted to devote a considerable portion of my exploratory phase to developing capacities in print. There are strong practical and conceptual linkages between print work and ceramics. Both emphasize materiality, the natural, visceral essence of the template. Both reward patience and experimentation. Both demand a meticulous approach, while ultimately offering up results that- while out of the artist's complete control- can be frustrating or transcendent.

One of the reasons that I'm enamored of both print work and ceramic work is the tension between controlled predictability and chaotic potentiality.

Consequently, at this point in time, I remained strongly rooted in ceramics (particularly raku), with an emergent practice in printmaking, particularly relief and

collagraph. At the same time, I also became liberated to utilize other media as appropriate to a specific concept.

Important MFA Themes: **Absurdity in the Human-Environment Relationship**

Human beings currently utilize over 25% of the Earth's primary productivity, (Fridolin et al 2013) and have impacted every significant bio-geographical process on the face of the planet. I use the term tragi-comedy to describe this trend, because the specific, point results are frequently laced with irony and absurdity. The Chinese are forced to hire hand-pollinators in the wake of collapsing bee colonies (Goulson 2012). The citizens of the United States gleefully purchase bottled municipal tap water at a 280,000% markup (Durden 2013, Opel 1999)).

A tension exists in any Ecological art between directness and clarity on the one hand, and discovery and complexity on the other. There's also a well-documented tendency in ecology and conservation in general for communication to veer into the realm of the strident and pedantic. Redford and Sanjayan referred to this tendency as the Cassandra Syndrome (2003). In Greek legend, Cassandra was cursed with the gift of absolute prophecy- combined with the unfortunate addendum of a uniformly disbelieving audience. Conservation Biologists frequently find themselves in the same role- too many ugly stories about extinction, contamination, and impending doom, and the emotionally exhausted recipient tunes out and turns away.

One of the reasons that I'm drawn to the idea of the absurd in ecological art stems from the power of humor to soften the narrative hammer-blows. There are pervasive threads of the ridiculous in our ecological hubris and its varied repercussions. Laughter is more empowering than shrillness and despair.

In addition, the ecologically absurd is not always bleak. In many cases, absurdities arise through the capacity for living things to adapt to the pressures exerted by an expanding, technologically rapacious human population. There's a warped but hopeful quality to witnessing the use of vermicidal cigarette butts by nest-building songbirds, or hearing a lyrical mating song by the ornate lyrebird that incorporates the roar of a chainsaw[1].

[1] 'Life will find a way', to quote Jurrasic Park

Many of my explorations in absurdity tend to emphasize wildlife imagery. I'm admittedly biased. I'm personally fascinated by wild creatures. I'd argue, however, that wild creatures serve as our most accessible witnesses to the invasive, warping progress of the Anthropocene. Thus, my use of wildlife imagery often has a literal, narrative underpinning. However, these images speak to a broader pattern of disassociation, eventually creating a dialog about our own uneasy evolution as Homo sapiens.

Absurdity: Early Explorations

As an MFA student, my first exploration of absurdity centered on bottled water. As a wholly manufactured need, bottled water is an essential symbol of a distorted, commercially manipulated wrongness in our ecological footing.

Conceptually, I imagined a world where water (as a core necessity of life and a public good) was physically replaced by water in bottles. This lent itself to several visuals; a fossil otter skeleton clinging to a single Dasani bottle (Fig 8), a Dasani bottle re-imagined as an egg, with desiccated bones spilling forth (Fig 9), or a seal's head rising up through a raft of water bottles, (Fig 10).

The making process for all of these projects quickly centered on slip casting and raku firing. I'd never experimented with slip casting before- but once I started creating these raku water bottles, I discovered that they had an interesting language of their own. The implied disposable character of the bottled water vessel is ironic, in that plastic is one of the most persistent objects on the planet. There's also an intrinsic loveliness in a water-bearing plastic bottle- which is, of course, ignored in their mass post-use rejection, burying, incineration. Through creating an array of funhouse-mirror objects with these qualities- persistence, beauty, even individuality- I encouraged the viewer to reconsider the core philosophy that would devalue a water bottle, or any mass-produced object.

At the terminus of these explorations, however, I wasn't convinced that my installations and integrated works carried more narrative impact than the fired water bottles by themselves.

For example, in *Phoca finds her Oasis* (Fig 10), I sought to evoke incongruity through an emphasis on the central harbor seal figure. For some viewers, however, the message was too strident. The seal figure was also an early exploration of figurative sculpting, and needed some refinement[2]. I learned some lessons about unity and subtly through this exercise. In addition*, Phoca* restricts itself to my traditional media (ceramics and raku surfacing)- whereas there may have been innate communication potential in other material choices.

[2] 'Too cute' according to some evaluators at critique

One interesting note about my explorations with cast water bottles- I found an unsuspected personal affinity for replication and massed arrays of objects. This tendency may stem from a visual parallel to biological communities or aggregates of organisms. Forests, coral reefs, even inorganic objects like snowflakes or crystalized salt: all of these things are ramified and integrated. This tendency to aggregate continues to pervade my work- I present vortex masses of cast cigarette butts, rafts of raku-fired water lilies.

In any case, the installation-based, site specific character of *Phoca finds her Oasis* anticipates future directions for my work, as does the shift away from functional forms and surface decoration.

A later work, *Liquid posterity* (Fig 9), uses incongruity more effectively. A Dasani bottle is reimagined as an egg or chrysalis, with dry bones as the emergent offspring. While the ecological narrative of this piece is accessible, it allows for an open-ended conversation. Even so, the piece fails to laugh… and there's ample scope for laughter in bottled water culture.

Absurdity: Strange Evolution

Nature is not passive, and our constant manipulations at the ecological interface yield unexpected consequences. Donna Hardaway has observed that we're embroiled in a co-evolving matrix, in which technology, the human, and non-human entities traditionally considered natural or wild are all abrading, interacting, and morphing into new forms (Haraway 2016). Extinction is a tragic component of this ongoing process- leaving humanity depauperated and bereft (even if subconsciously). However, this process also provides examples of resiliency and adaptation- especially on a case-specific level. Coyotes thrive amidst the towers of downtown Los Angeles (Gil 1970), monkeys loot human campfires for dietary charcoal (Struhsaker et al 1997), peregrine falcons snatch pigeons, rats and poodles off the streets of Manhattan (MacDonald 2015). These scenarios encourage us to evaluate our ecological footprint, while reminding us that nature is often more vital, robust, and adaptive than we fully comprehend.

As I explored this strange evolution paradigm, I opted to re-visit the bottled water theme- this time through the medium of print. Our embrace of bottled water serves as a metaphor for evolution reversed. Plastic is petrol, and petrol is a scion of the primordial ooze, tectonic amalgam of bones and bodies that sift endlessly down through the water column. The residue of ancient coelacanths haunts every disposable bottle that we grasp.

Strange Evolution: *Raining Devolution*

In *Raining Devolution* (Fig 11), I utilize two print processes- a relief overlay and an underlying collagraph impression. The collagraph image depicts the slow descent of plastic into the depths (Desforges et al 2014). The overlay interweaves three marine creatures- a contemporary arctic grayling, a placoderm (a Mesozoic, armored fish) and a Devonian trilobite. All contemporary marine life suffers under siege from this plastic rain. In a very real sense, we're pushing evolution back to its inception.

Devolution lacks playfulness or an acknowledgement of resiliency- but it possesses layers of nuance in excess of works like *Liquid Posterity* (Fig 10), allowing for a broader interpretive scope.

Devolution also was my first conscious exploration of the use of color in print. As I already discussed, I'm intrigued by the parallel spontaneity and unpredictability of both print and ceramic work. In Raku, for example, glaze chemistry and application, firing schedules, and ambient conditions allow some scope for predicting a final color palette. Nonetheless, subtle factors[3] can wildly skew an outcome, and the artist who demands absolute control is doomed to disappointment.

The color palette in *Devolution* evokes the sickly iridescence of fossil fuels, the waning glory of light sifting to blackness through the water column - as well as some of the bright, garish notes of commercial plastics. In addition, I celebrate the subtle visual grace notes of the creatures themselves[4]. By presenting *Devolution* as a triptych, I vary the prominence of these color elements and associated imagery. The regressive circularity of the current process is echoed in this variance.

Strange Evolution: *Styhly Serenade*

Styhly Serenade (Fig 12, Fig 13) presents a second example of strange evolution. The male ornate lyrebird (native to the rainforests of Queensland in Northern Australia) is the most accomplish of avian mimics (Mulder 1992). During mating season, lyrebirds seduce potential mates through appropriating the vocalizations of other birds- not to mention wind, rainfall, and other ambient noises. Recently, some lyrebirds have also regurgitated audio from camera shutters, car engines, and even chainsaw. While there's something macabre about regaling one's mate with the roaring notes of a Husqvarna, this bizarre adaptation also highlights a certain joyful malleability.

In *Styhly Serenade*, the contrasting expressions of relief carving and collagraph allude to this paradox. Relief prints present a lean, streamlined energy, while collagraph images tend

[3] Everything from the phase of the moon to raccoon farts
[4] (inferred in the case of placoderm and trilobite).

to an atmospheric, ephemeral character. Juxtaposing the two creates dialog and depth- this can be accentuated by the color palate.

In some of early iterations of *Styhly Serenade*, the relief imagery of the chainsaw headed lyrebird tended to meld into the background imagery. The use of chine-collé (with select application of hand-dyed paper) allowed for emphasis and separation, while color parsimony still created unity in the composition.

The central figure (echoed in the background) obviously possesses a cyborg character. The idea of a chainsaw melded to a bird's body is initially comical, but inspires a layered response on more detailed viewing. The chainsaw bar is subtly directed out from the composition plane, a menacing potentiality. At the same time, the hybrid creature is tentative and uncertain in its posture, as if cautiously exploring an uncertain reality.

A chainsaw on a bird's head could be viewed as merely grotesque, an ecological re-casting of something from Hieronymus Bosch's bestiary (Fig 14). There's a well-developed tradition of artists trading in grotesqueries like this; whether it's Dougal Dixon with his speculative, apocalyptic creatures (Fig 15), Beauvais Lyons with his whimsical hybrids (Fig 16) or Ellen Jewett's plant-animal hybrids (Fig 17). Lyrebird behavior does not happen in a vacuum, however- it occurs in a specific ecological context. The rainforests of Northern Queensland, Australia are subject to high levels of land conversion. The foreground color palette in *Styhly Serenade* draws from the verdant greens and blues of this landscape. Other colors are veiled in the background- the blood red of a Husqvarna saw, the dry orange-ochre of denuded soil- even the garish hues of plastics. In some prints, these plastic hues are accentuated in the figures themselves.

The use of chainsaw noises in Lyrebird mating rituals also evokes the cyborg. Lyrebirds do not consciously opt to marry themselves to technology- but then again, millennials don't consciously marry their iPhones either.

In actuality, there are elements in this story that are hopeful. Lyrebird males will pursue their evolutionary imperative in spite of our influence… and they'll even appropriate our racket in order to do so. Nature is a paradoxical thing- both adaptive and brittle, fragile and resilient.

Strange Evolution: Acutus and the Androgene I

Since the publication of Rachel Carson's *Silent Spring* (Beyl 1992) the impact of persistent environmental toxins has permeated the public consciousness- with restrictions on DDT and mercury compounds leading to some of the most stunning species recoveries of the 20th century. The array of substances seeping into our waterways and air has diversified, however, a cryptic shadow ecology. With seven billion people and counting, superficially benign substances leach out from our farms, toilets, and bedrooms. The impacts of these substances are complex, poorly understood, and possibly synergistic.

Medicinal hormones are one such substance. Compounds like estrogen and sildenafil citrate (Viagra) easily penetrate eggshells and skin- especially in certain amphibians and reptiles. It's not surprising, therefore, that wild populations of American crocodiles in some polluted rivers display skewed sex ratios- and even hermaphrodism (Guillette et al 1994).

I initially developed *Strange Evolution: Acutus and the Androgene I* (Fig 18) as a reduction block linoleum print. The crocodile is cradled in a stylized water lily- but a lily with the type of stereotypical sexual characteristics often highlighted in High School biology textbooks. The lily pad beneath the flowering lotus is textured to resemble a birth control packet, while forms beneath the surface hint at Viagra tabs.

The posture and expression of the crocodile in this print is whimsical, almost languid- a creature poised at an identity threshold. The unfolding conformation of the lotus suggests emergence and metamorphosis. It's possible that a viewer might project a non-ecological interpretation on this work[5]. However, I've always intended that works like *Acutus* should be displayed in conjunction with contextual information- not as a script for viewer response, but as waypoints that can serve as a point of entry for exploration.

In its final edition run, *Strange Evolution: Acutus and the Androgene I* presented several process challenges- for example, excessive pressure and fragile linoleum don't mesh well. I'm still mastering the use of color in a print setting as well- especially in a reduction print with multiple, synergistic overlays.

[5] An exploration of gender fluidity in a chemically mediated culture, perhaps

Strange Evolution: Acutus and the Androgene: Installation

Strange Evolution: Acutus and the Androgene (Fig 1, Fig 2) was easily re-conceptualized as a 3-dimensional work. After I finished with the linoleum print, I spent time reimagining the spatial possibilities of the concept, and the potential for an installation-based interpretation. I grappled with several questions:

1. How literal should the presentation of medicinal hormones be? On a spectrum between a inclusion of labeled bottles to the subtle use of color, where would I find the most potential for engagement and conversation?
2. How should I visually present the idea of gender fluidity and hermaphrodism- especially given that crocodiles are not known for prominent secondary sexual characteristics?
3. How would I want the viewer to spatially interact with the work?

I considered creating whole-body sculpts of the creatures in various contexts- but kept coming back to the cryptic nature of the process- the insidious, hidden evolution. This mirrors the behavior of crocodiles- an occluded threat until too late.

In the end, I retain a lotus flower as a symbol of hermaphrodism, but utilized reticulation glazing to texture the petals. Tinted in Viagra blue or estrogen pink, a reticulation glaze yields a surface that evokes a sea of hormone tabs, with hints of saurian's hide (Fig 19).

The lotuses are nestled in a raft of raku fired lily pads. These pads invite an ordered investigation of the installed work, with their hue (running the spectrum from viagra blue to soft reddish pink) symbolizing graduated levels of contamination. Along this continuum, three crocodiles rest. Two of these represent the male and the female. Barely breaking the surface, these two gendered crocodiles imply hidden threat.

In the case of the female, an incised, red-pink lotus pattern scrolls along its smooth surface. Creating this pattern was an interesting exercise in making- my first experiment with digital imaging and laser cutting. I generated the motif in thin plywood, and then pressed it into the female's epidermis. The surface textures for the male is rougher (Fig 20), as is the

copper-based, matte glazing. For the female (Fig 22), I also utilize secondary adornments such as exaggerated lashes and eye shadow. The eyes themselves are vacant, but leak faux hormone tablets like tears.

The central figure rears from the waterline, with these stereotypical gender markers intermingled in hermaphroditic glee (Fig 2). Patches of incised lotuses intersect with mottled sections of 'male' skin textures. One eye displays male characteristics, one female.

The near-campiness of these depictions is deliberate. To present the scenario as another single-note ecological tale of woe is to tap into deep wells of defensiveness and apathy, end-product of decades of alarmism. It is important to not de-value alarmism is and of itself- our thoughtless disruption of core balances in nature should shock us. Citizens of contemporary Western society are sated and postmodern in their outlook, however, and disinclined to exist in a relentless state of outrage. The language of absurdity presents an indirect path to a more open dialog about these issues.

The Politics of Repair

Ceramic artists are highly sensitive to the structural integrity of their work. Repairs are generally viewed as anathema- unless points of fracture are owned as part of a work's conceptual design. The exceptions arise with work like Japanese kintsugi (Posthuma 2016), where the imperfections are highlighted, thus becoming part of the conversation.

Challenges arise with large, raku sculptural elements, however. As my skill in craftsmanship increases, I hope to reach a place where I can design and fire a massive crocodile head and have it emerge from the kiln pristine and whole. I'm not at the point yet, however. *Acutus* broke in several places during the firing process.

I feel that perfection in craft is a moving target, and pursuit of this goal can potentially paralyze the artist. However, I do have several fixed standards…

1) Inherently functional work should conform to baseline craft standards, and should not be repaired under any circumstances.

2) In sculptural work, repairs should be unobtrusive (not visible except upon targeted inspection) … or should be owned and emphasized for communications sake.

In the case of sculptural raku work, I'm comfortable with utilizing epoxy (PC7) for select repairs. I view this as analogous to Beth Cavener's practice in large-scale sculpture (Whitney 2015), where works are sectioned and reassembled post-firing. I believe that conceptual communication is more important than purity of craftsmanship in sculptural/installation work, and that the artist should free their ideas and communications from these imposed constraints.

Strange Evolution: Nicotina

A cigarette is about as conceptually linked to human irrationality as any single object. Humans are assumed to be the only organisms both creative and unwise enough to fumigate their alveoli in rancid smoke.

In point of fact, the only cigarette-smoking animals[6] have been carefully trained into the habit. However, in a weird piece of emergent Darwinism, songbirds from Central Park to Chicago have been observed weaving discarded cigarette butts into their nests. Random debris collection can't explain the frequency with which these butts are selected. In fact, it turns out that nicotine has a vermicidal function. Traditionally, these birds utilized native plants that functioned similarly, but urbanization has forced them to exploit other resources (Suarez et al 2013).

This weird transubstantiation[7] exemplifies the lawless, wild-west flavor of a world dominated by seven-billion plus blind tinkerers. Ecologists work to understand the outcome of these activities, but find themselves constantly blindsided by the chaos of synergistic change. We know that there will be winners and many, many losers in the hurly-burly of the Anthropocene, but only a fool would lay money down on any specific outcome.

In exploring possible visual treatments of this scenario, I initially considered sculpting a hot tub party vignette, in which a group of birds sported in a foamy sea of cigarette butts.

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[6] Chimps in Chinese zoos, dogs in proto-redneck households

[7] Death-sticks transmogrified into the avian equivalent of louse soap

Along with other related ideas[8], I intended to accentuate the camp elements of this scenario. Most of my sketches (and early forms) had a heavy, cartoonish quality to them, in many ways reminiscent of work by Alessandro Gallo (Fig 22). I also considered a near-literal depiction of the actual scenario.

These early forms were useful as fodder for some saggar-firing experiments, however. This process yielded a rufous, variegated surface that hinted at smoldering ashes (Fig 23). It was easy to imagine that the creatures had somehow hybridized with the cigarettes themselves

In presenting this initial iteration of *Strange Evolution: Nicotina* (Fig 24), I discovered that found object cigarettes reek to high heaven. My first installation had such a pervasive funk that we had to move the work outdoors. While I'm slightly intrigued by the idea of adding an olfactory element to my work, it seems to defeat the purpose when people can't engage.

As a consequence, I decided to extrude the cigarette butts. This allowed me to scale up the work as a whole- with a parallel increase in the size of the sculpted birds.

During this process, I made a mental shift away from the hot tub concept. While there's a comical dimension to nests and cigarettes, I didn't want to shift the work so far into the camp end of the spectrum that viewers would be able to lightly dismiss it. I was also intrigued by the potential for using the extruded cigarettes to create a larger, dynamic form.

Initially, I envisioned a cigarette nest installed on the ground, disintegrating into a vortex of spinning butts, with the birds aloft in the maelstrom. I decided, however, to re-orientate the work and mount it on the wall. In this rendition, the vortex is exploding out towards the viewer. In the lexicon of ecology, vortices are associated with the synergistic processes that drive extinction. In the final iteration of *Nicotina* (Fig 25), however, the vortex represents ecological chaos and unhinged evolution. The outward facing orientation engages the viewer, implying participation- even collusion. The birds are surfaced using both raku and sagger-firing, a continuum of fusion/hybridization between birds and cigarettes.

[8] i.e. shower-heads that dispense cigarettes

Absurdity: Kawauso, Nuckelavee, Humbaba and The Evil Quartet

I used to drive my mother up the wall with my nighttime reading habits: lurking under the blankets with a flashlight and *The Silver Chair* or *The Two Towers*. I'd often leave the library with a three-foot stack of books. I still believe that young adult fantasy is the most vibrant and honest genre in literature.

As a consequence of this mania, I'm left with a life-long interest in mythology- both archaic and contemporary. Mythology distills complex ideas into an accessible form and teases at existential questions. In particular, there's a long-standing tradition of utilizing mythology to grapple with tangled social issues. The lineage stems from Marduk and Kali directly to John Henry, an even to contemporary popular media[9]. To take an example close to my own practice, the films of Haio Miyazaki draw from Japanese mythology to dialog eloquently about conservation, feminism, technology and warfare (Lim 2013).

Kawauso and Tohuku

One of my first experiments with mingling mythological imagery and ecological commentary relates to the Japanese myth of the Kawauso. As I'll discuss later, there's a variable tapestry of myth-building surrounding otters (*Lutra spp*., *Lontra spp.,* etc.). In Japan, the Kawauso can be a fearful figure- linked to shape-changing, Geisha-esque women who can sexually lure men to a lurid, moat-bound death (Umezawa 2013).

As an ocean-bound civilization, it's not surprising that the Japanese feel some ambivalence about creatures that move fluidly between land and water. The ocean itself, of course, is a complex entity- mother and devourer, mistress and foe.

The 2011 都北 (tohuku) earthquake and tsunami has undoubtedly underscored this ambivalence. While the earthquake itself wasn't a function of human recklessness, the tsunami's terrible cost is directly linked to rampant coastal development and the placement of the Fukushima power plant (Gill et al 2013). It's not hard to imagine a Kawauso figure at play

[9] Like Captain America (in *Winter Soldier*) as a commentary on post-modern Orwellian authoritarianism

in the story- an observer, or even an agent. *Kawauso and Tohuku* (Fig 26) was the offspring of these imaginings, and my first exploration of a larger-format wood cut.

In *Kawauso and Tohuku* (Fig 26), I consciously draw from Japanese scroll paintings, utilizing a strongly vertical composition, with flattened perspective, consciously echoing artistis like Mizuta Chikuho (Fig 27) and Himejima Chikugai (Fig 28).

The Evil Sextet: Nuckelavee

When I designed *Kawauso and Tohuku*, my intent was simply to present the central, mythological figure as a witness to contemporary madness. I've since revisited the use of such imagery in light of contemporary ecological theory, however.

Conservation Biologists are always looking for pithy, tractable ways to present complex concepts- particularly in a postmodern, media driven age, and mythological themes are tailor-made for this. I've already alluded to Redford and Sanjayan's 'Retiring Cassandra' paper. Through an evocation of Greek mythology, Redford and Sanjayam were able to communicate about the social ineffectiveness of alarmism in ecology, and do so in a streamlined, accessible fashion.

In his recasting of the four horsemen of the Apocalypse as the 'Evil Quartet', Jared Diamond's provides another example of mythological appropriation in Conservation Biology. Diamond's 'Evil Quartet' references the apocalyptical horsemen- famine, disease, war and pestilence- but replaces them with four key mechanisms that drive species extinction (Western et al 1989). These are:

1. overhunting (or overexploitation)
2. introduced or invasive species
3. habitat destruction
4. chains of linked extinctions (trophic cascades, or co-extinctions)

Others have developed the concept further (Bradshaw 2011)- proposing additional 'horsemen' including global warming, and synergistic processes.

Since the Four Horsemen were introduced in the book of Revelation, they have often parameterized discussion about humanity's self-destructive tendencies. I'm intrigued by potential for other mythological entities to render Diamond's evil quartet equally resonant and accessible.

The Japanese Kawauso is an ambiguous figure in mythology- its human interactions spanning from mildly benevolent to fearsome. Other mythological figures, however, arguably lend themselves to a clearer illustration of Diamond's concepts. One such character is the Scottish Nuckelavee. The Nuckelavee is one of the most menacing entities in Celtic mythology (Towrie 1996)- a titanic, demonic fusion of the human and horse, erupting from the sea to prey upon coastal denizens. Interestingly, the creature traditionally responds to the disruption, noise, and stench of human enterprise; the fumes of coastal seaweed pyres were said to drive it into a frenzy.

For all that the indigenous Scotts were terrified of the Nuckelavee, their legends imply that the beast was never unleashed without cause. If the Nuckelavee responded poorly to burning seaweed, I can only imagine its reaction to oil derricks, the fumes from a benthic trawling rig, or even the incremental loading of carbon dioxide in the atmosphere. My large woodcut *Evil Sextet, Nuckelavee* (Fig 29) attempts to depict this scenario.

I've proposed absurdity as one means to avoid the Cassandra syndrome, and utilized this approach in my Unnatural Evolution series. Reinventing classic mythology in light of contemporary ecological threat offers another pathway into the absurd. It's easy to belittle the so-called superstition of 18th century villagers on the Isle of Skye who believed that their behavior could summon a towering, bestial demon out of the waves. Nonetheless, these beliefs were very real, and had the power to alter human behavior. It's ironic that contemporary humanity unleashes demons more potent than the Nuckelavee, and yet fails on some vital level to grasp the causal pathways and moral accountability that were so intuitive to indigenous peoples.

This variant on the absurd speaks to hubris, to our own troubled evolution. Statistics about sea levels and ocean acidification should galvanize and terrorize, but they tend to numb and bore the postmodern citizen. We have not transcended the grasp of myth- not when a myth surrogate like Cecil the Lion (Hamblin 2015) can prompt more public outcry than a peer-reviewed study. If viewers are intrigued or unsettled by the imagery in *Nuckelavee*, I

hope that they will ask themselves why the underlying scientific narrative doesn't have the same visceral impact.

The Evil Sextet: Gilamesh and Humbaba

The Sumerian hero Gilgamesh was a proto-Hercules, and one of his principle feats involved conquering a guardian titan called Humbaba. Humbaba was the protector of a sacred grove of cedar trees. Gilgamesh used duplicity to overcome Humbaba, and eventually killed him- against the explicit counsel of the gods (Amin 2015).

Gilgamesh's theft of Humbaba's trees is often cast as a Prometheus-like action, defying Thrones and Principalities to bring empowerment and enlightenment to humanity. At Gilgamesh's deathbed, his slaughter of the titan is cited as a crowning achievement.

However, Gilgamesh can easily be re-cast as the villain. In fact, the god Enlil chastises Gilgamesh for his actions, stating:

> *Why did you act in this way? Was it commanded that his (Humbaba's) name should be wiped from the earth? He should have sat before you! He should have eaten the bread that you eat, and should have drunk the water that you drink! He should have been honored by you!* (Bolman 2017).

Habitat conversion is a morally tangled process. A converted landscape is a productive landscape- at least in the narrow view. However, the costs of a felled forest or a drained river are typically marginalized- and this leaves out the question of whether non-human entities are worthy of ethical standing in their own right (Balmford et al 2002).

In *Evil Sextet: Gilgamesh and Humbaba* (Fig 3), the ultimate confrontation between putative hero and the titan is still pending. Gilgamesh stands poised in mid-theft. The consequences loom on the horizon- both treeless landscape and towering ziggurats of modernity.

In the future, *Nuckelavee* and *Gilgamesh and Humbaba* will be part of a six-print series. Other entities will be used to illustrate additional 'Horsemen'- possible examples

include the Egyptian basilisk (invasive species) and Anansi the Spider from Yoruba legend (synergistic processes).

A Note on Printmaking

I never worked as a two-dimensional artist before my head-first dive into printmaking- but I've found that my surface-work in clay serves as an elegant point of departure for design work in print. Print allows for more deliberation and detail, but still rewards clarity of line and directness of form. A clear link exists between early designs on my mosaic-style Raku pieces (such as my *Ling Cod* series) (Fig 30, Fig 31) and the more activated figures in *Raining Devolution* (Fig 11).

As I explore the specific toolbox available to printmakers (mark-making, color palate, composition) I've sometimes thought to develop a signature style- impressionistic and pared down to the essentials, yet respectful to the distinctiveness of the specific organisms and ecological scenarios that I'm conceptually engaging with. There's been a clear evolution in my work from early experiments (*Slake*) (Fig 32) and my first formal woodcut (*Dendroctonus Galleria* (Fig 33), a commentary on bark-beetle infestations) through intermediate projects like *Kawauso and Tohaku* (Fig 33) and then into more recent works like *Lyrebird* (Fig 12, Fig 13) and *Nuckelavee* (Fig 29). My compositions have become increasingly volumetric, and I've worked to increase the visual nuance of my mark-making. At the same time, I'd argue that a visual link to my early sensibility remains.

Having said this, I do believe that mark-making, composition and style ultimately serve narrative and concept, and I've been able to relinquish some of the self-imposed mandate to define myself visually. As I proceed, I will trust narrative and process to define me visually.

My creative process in 2D visualization retains heavy elements of deliberation- I typically go through multiple revisions- and I've always trying to improve the final work from a design standpoint. The evolution of *The Evil Sextet: Nuckelavee* can be clearly seen in a comparison between the final work and an early conceptual sketch (Fig 34). However, the final work still displays a quirk or two (elements that juxtapose in an awkward fashion, for instance). I will continue to strive for excellence in design, so that the visual choices take a step back, giving the concepts room to breathe.

Important MFA Themes: **Otherness and the Animal**

When I was four, I wandered out of a shower stall in a lakeside cabin in Minnesota, with a two-foot garter snake wrapped around my chubby little mitts. My mother, rather than throwing an apoplectic fit, sat down with me and shared the encounter. I often wonder if I'd love wild animals as much if she'd reacted differently. That moment was laced with drippings of Grace if any moment ever has been.

I've been responsive to visual depictions of wild creatures since about that time; I was an early reader and in love with the full bestiary, real and imaginary. My Grandpa Tony was an amateur painter, and an eager disciple of Richard Ellis, the marine wildlife painter. He had reproduced one of Ellis's Greenland Shark studies (Fig 35), and there was something in the atmospheric grace notes of Ellis's painting that haunted me. Some of my lifelong fascination with the ocean may have its genesis in my grandfather's studio.

As I've developed a mature interest in visual depictions of wildlife, I've become increasingly frustrated with wildlife art as a niche or movement- both in its contemporary and historic manifestations. More than any other panoply of visual expression, I often find wildlife art distasteful, crass, pretentious, or just subtly 'wrong' in a way that I can't always define.

At the same time, I still love Richard Ellis, as well as a number of other contemporary artists who depict wild animals. In some cases, (such as Ellis), these works are fairly interpretations of wild creature in situ, while other examples involve the re-casting of the animal as metaphor or meme (as in examples from Mel Chin (Fig 36) or Josh Keyes (Fig 37).

So- where does the gap lie between Ellis's work and the work of someone like Wyland (Fig 38); two artists who depict the same suite of creatures? Wyland has been successful in promoting marine conservation- but his work often strikes me tone-deaf and strident. Similar, why am I instantly drawn to some of Beth Cavener's conceptual art (such as *Forgiveness* (Fig 39) or *Trapped (Fig 40)*), while feeling a low-level annoyance in the presence of Damien Hirst's *The Physical Impossibility of Death in the Mind of Someone Living* (Fig 41)?

As a category, Wildlife Art is generally relegated to the commercial bin by art critics- animal motifs are only taken seriously when utilized in symbolic reflection on the human condition. In either case, honest engagement with wild creatures is often lacking- the 'object'

is romanticized and anthropomorphized on the one hand, or treated as a shortcut or shorthand on the other.

I would argue that the essential element in successful art that treats with wildlife (or any entity in the non-human world) lies with a serious consideration of Otherness. Otherness has been variously defined by thinkers ranging from the science fiction writer David Brin (Brin 1989) to philosophers like Emmanual Levinas and Thomas Claviez- but the essence of the concept hinges on a recognition of our inherent tendency to propagate an 'imperialism of the same' (Claviez 2006). We recognize the unknowable even in other human beings, including those closest to us. How much more so with the non-human?

Current conceptualizations of Otherness are imperfect. For example, Levinas' understanding of the Other does not encompass the non-human. Nonetheless, Otherness provides a framework for describing the type of reaction that depictions of animals in art should inspire.

The idea of Otherness is strongly linked to concept of wonder. In discussing the relationship between scientific inquiry and 'wonder', Philip Ball cites the Cartesian distinction between useful and useless wonder (Ball 2012). While the former focuses and sharpens the intellect, the latter is a stupefying force. Ball links the idea of wonder to the Kantian and Burkeian concepts of the sublime- but also to examples of 'passionate' scientific inquiry tracing back to Aristotle. Wonder can be spurred by novelty, but traces of the Other can be found in all natural objects, including the mundane and the common. In a similar fashion, Celia Deane-Drummond compares the type of wonder evoked by the natural world to 'religious awe', and implicitly compares the experience to classical conceptualizations of the sublime (Deanne-Drummond 2006).

This is the type of response that Richard Ellis's work inspires in me. Even now, I don't walk away from one of his paintings with any sense of having mastered or understood his great whales or sharks. Rather, I'm struck by the fey vitality of these creatures. I sense that there are worlds (almost in the Heideggerian sense of World (Heidegger 1971)) behind their eyes that I can't ever fully understand or even access.

I have a similar reaction to Beth Cavener's sculpture. Cavener uses wild animals metaphorically- exploring themes like alienation, gender politics and coercion; but the animal remains a vital-if-enigmatic presence in her work. The snow leopard in *Forgiveness* (Fig 39)

or the fox in *Trapped* (Fig 40) are not comfortable entities to look at- they possess a prickly, complex character that confounds the gaze. In contrast, work by Alessandro Gallo (*Whatever*) (Fig 42) operates on a strictly metaphoric plane, and avoids a serious consideration of the non-human entity in its own right.

Rather than develop a scholarly treatise on depictions of animals in art, I'll briefly speculate on what I see as shared elements between works that I find frustrating. It's important to note that specific case studies are often drawn from artists that I admire, and that I sometimes recognize these tendencies in my own work.

Unintentional Kitsch[10]

Nothing obscures the Otherness of a wild creature like a shimmery, velvet painting skyscape, or a chryselephantine pedestal. Wyland is often guilty of such lapses (take *Day of the Dolphin* (Fig 43) as just one example)- and they seem to be pervasive in the Wildlife Art genre. Note that kitsch and camp can have a place in depictions of the Other… the difference lies in the intentionality of the artist.

Clumsy Incorporation of Mythology

Although I'm a firm believer in the potency of myth, and its appropriate use in visual commentary on alterity- the use of myth in art is a minefield. You don't need to dive down to Boris Vallejo's level to get into a nasty goulash of cultural appropriation, pubescent fantasy, and general tackiness. The genre is rife with clumsy tropes.

Hyper-Realism

Many wildlife artists lean towards the hyper-realistic. This is particularly tempting for those who wish to display a mastery of their subject- the articulation of an otter's hind limb,

[10] unless kitsch or camp are explicit or embedded objectives within the work.

or the overlay of feathers along an egret's flank. It's worth noting, however, that Bob Ross could evoke a photo postcard as well as anyone- and he wasn't noteworthy for his honest translations of the natural world. In fact, I'd argue that photorealism implies an asymmetrical, dominance-based understanding of the object. There are exceptions. For example, biological illustration often blurs the line between fine art and design, and allows for a near-reverent approach to the Object. Ernst Haeckle's lithographs- such as *Basimycetes* (Fig 44)- serve as one example. Overall, however, I find myself drawn to the impressionistic in wildlife art. For me, it gives the Other space to breathe.

An Easy Default to 'The Gaze'

Leaning on the notion that the eyes are the windows of the soul, many wildlife artists attempt to create an implicit dialog between viewer and object, in which the eyes are the focal point. An interactive stare suggests kinship… and a kinship that often resides in the imagination of the viewer. The 'gaze' can also edge into trope status in many works. The International League of Conservation Photographers recently named Jim Brandenburg's *Brother Wolf* (Fig 45) one of the top 40 nature images of all time (Brandenburg 2010)- and yet I personally find it hard to navigate past the imposition of the gaze.

At the 2017 Seeing with Animals conference, Gretchen Woodman presented a series of drawing in which the eyes of deer and other large mammals were isolated and emphasized (*Eyelines*, Fig 46). Woodman stated that her goal was to capture the essence of the Other[11]- but she repeatedly mentioned that she 'had yet to get it right'. The question is- in 'getting it right' would she truly be in dialog with the Other, or with herself? The 'gaze' all too easily implies an unearned and unexamined intimacy between viewer and object.

Forced Narrative

One of the most iconic Gary Larson cartoon features a hunter shooting a peaceful bear at a watering hole, and then re-imagining it through taxidermy in a classic "I'm going to rip your gizzard out" stance (Fig 47). Many wildlife artists metaphorically do the equivalent-

[11] Like a camera-toting Victorian anthropologist in an indigenous community

'killing' an organism through static representation, and through forcing the object into a romanticized, exaggerated visual narrative. There is, of course, a fine line here- wild creatures do engage in species-specific, vivid behaviors- and sharing these accurately can incite curiosity and wonder. Elements like biological accuracy and observational specificity function best when they disappear, subsumed into a respectful openness on the part of the viewer.

Direct Exploitation

Damien Hirst famously contracted with professional hunters to kill a tiger shark for *The Physical Impossibility of Death in the Mind of Someone Living* (Fig 41). This procurement arguably took place before the contemporary awakening to the fragility of the oceanic trophic web- but Hirst was certainly not engaging in anything resembling reciprocity or dialog. Kim Jones once set a cage of live rats afire as performance art (*Rat Piece*) (Harries 2007), while Marco Evaristti created an interactive exhibition in which participants were invited to mulch live goldfish in blenders (*Helena & El Pescador*) (Nikkah 2009). In each of these cases, the animal is treated as a means to an end, as an accessory to the artist's vision. Evaristti makes this explicit, stating that 'we all have a need to decorate Mother Nature because 'it' belongs to all of us (Gulli 2005). However laudable any specific vision may be, however, a direct engagement with Otherness is nearly impossible in such scenarios. Certainly, there have been works that attempt to integrate the Other as a free agent- *I Like America and America Likes Me* serves as one example (Gilewicz 2012). *Rat Piece* and *Helena & El Pescador* are also interesting to me, in that some of my Reconciliation Art engages with living organisms as participants- but I'll discuss this aspect in the next section.

Lazy Disregard for Biological Accuracy

There are historical examples of animals in fine art in which the Other was misrepresented to a near-comical degree- while still retaining an essential power. *Watson and the Shark* (Copley) (Fig 48) serves as one such example. Certainly, the majority of aboriginal art (whether Northwest Coastal, Andean or Hawaiian) is very free with proportion and

anatomy (Fig 6). However, Indigenes were profoundly knowledgeable about the creatures that they depicted- for example, the intertwined characters in Northwest Coast totemic art often revealed a nuanced understanding of trophic webs and inter-species dynamics.

This is not an exhaustive list- rather, it's an attempt to calibrate in towards the sort of gestalt that I want to avoid. I'm also skating over the considerable body of literature regarding the link between theriomorphism and visual culture, and the evolution of this relationship across time. There's a considerable difference between the religiously codified use of a swan or wolf in midlevel iconography (Eco 1986), and the calculated exploitation of alterity memes in Madison Avenue (Fig 49).

Overall, my goal to create a space for the viewer in which an understanding (or dominance, or possession, or co-option) of the Other is not assumed or even desired. Rather- I hope that the viewer approaches each entity (whether otter or microorganism or sequoia) with something akin to a Kantian sense of the sublime (Dickson 1997, Walhout 2009).

Much of the work that I've already discussed, including examples like 1) *Strange Evolution: Acutus and the Androgene,* 2) *Strange Evolution: Nicotina* and 3) *Styhly Serenade,* consciously seeks to create a relational space in which the Other can persist. As one example- in sculpted the birds for *Strange Evolution: Nicotina Dries* (Fig 24, Fig 25), I consciously left the species ambiguous, and kept the surface treatment rough and somewhat frenzied. With the narrative focused on the wild chaos of unhinged evolution, I felt that a specific, museum-resolution treatment would evoke diorama and taxidermy, and evoke a feeling of control in the viewer.

However, the work series in which I've most directly grappled with the idea of Otherness is a sculptural series related to river otters, *Lontra Canadensis*, *Lutra lutra*[12], etc.

[12] Globally, there are at least 10 species of river otter- and they're all awesome.

Faces of Lontra: An Exploration of Otherness

Otters are strongly stereotyped in neo-mythology among white North Americans- they tend to be affable (as in *Wind in the Willows*) or even a bit bumbling. In an internet age, they've become a symbol of cuteness[13].

However, as I alluded to in my discussion of *Kawauso and Tohuku* (Fig 33), the mawkish otter of contemporary American commercial culture is sometimes an object of trepidation and Freudian menace in Japanese mythology. In the Tlingit traditions of Southeast Alaska, the Kushtaka ('land otter man') can be a nightmarish figure, savaging isolated travelers and pulling them beneath the waves (Barazzuol 1981)- very different from the aura of fortune and lucre in Nordic legend (otters were the linchpin for the Volsunga saga) (Mcgillivray 2015), or the associations with accelerated libido in some Chinese stories. It's worth noting that even the Kawauso tales of Honsho are contradicted among the Ainu on Hokkaido, where otters were viewed as an analog to the serpent in the Garden of Eden- responsible for mankind's imperfections (Ohnuki 1991).

It is this patchwork of inconsistency that delights me. It's a patchwork that applies to most charismatic megafauna.[14] The Other is socially constructed in a continuous, evolving process. In truth, we do this to our Homo sapiens friends and lovers as well, but most people have the reflexivity to recognize the process. With animals, the construct is conflated with absolute reality.

My series *Faces of Lontra* confronts the viewer with a series of otter heads, presented as wall installations, arrayed at slightly above the average North American sightline. Each head is evocative of a specific culture, intellectual tradition, faith system, or other human lens. The goal for this installation series is to confront the viewer with the often contradictory, paradoxical character of these lenses.

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[13] To a degree that could gag a goat
[14] Wolves, bears, sharks, etc.

Faces of Lontra: *Can't Live Without It*

Can't Live Without It (Fig 50, Fig 51) was the first work created in this series. Otters, like most charismatic wild creatures, have the potential for appropriation by Madison Avenue. However, (with the exception of an advertisement for Dawn dish detergent), I can find few allusions to otters in any mainstream commercial. Given the endless parade of bear and salmon themed ads, I wonder if the inextricable link between otters and wild, clean waterways might be an explanation. In an increasingly water-driven economy, otters are impediments to certain types of economic development- particularly with companies like Nestle seeking a broad-based privatization of the National water supply (Jaffee 2013).

The existing slogans for bottled water advertisement are laced with irony ('The Purest Part of You'! 'From Nature'! "Tracing Treasures: Blue Gold'). In *Can't Live Without It*, the otter's façade is scarred with a network of these slogans The Other is simultaneously presented as branding meme, competitor and impediment.

Faces of Lontra: *Neither Fish nor Fowl*

A second work, *Neither Fish nor Fowl,* (Fig 52) alludes to an interesting quirk of medieval cosmology. Catholics were not allowed to eat meat on holy days- but fish were not considered meat in the ecclesiastical sense. Otters lived at the liquid interface and sported matted, scale-like fur. Clearly they[15] were fish- or so it was decreed by clergy in some regions of pre-industrial Europe.

Neither Fish nor Fowl is an exercise in mixed-media- featuring an armature constructed of steel, raku ceramic façade, found elements (a deacon's stole with fish imagery). Conceptually, the idea of shoe-horning otters into a fishy phylogeny is pretty ludicrous… but I personally think that the net impact of *Neither Fish nor Fowl* is a bit too cartoonish for my tastes. The garishness of the glaze treatment evokes anamorphic forms on a calliope. One of my friends refers to this work as La Papa Nutria[16]- and this type of affable amusement seems to be a typical reaction.

[15] Along with the humble beaver
[16] the otter pope

Faces of Lontra: *Kushtaka*

I've already alluded to the ambivalent relationship beween the Tlingit (and other Northwest indigenous peoples) and river otters. Otters- or The Kushtaka- were thought to present an immediate existential threat. There are still parts of the Northwest Coast where people will bite their thumbs when otters are in sight[17].

The ocean has long symbolized Otherness and the Sublime- a presence that can be impersonal or nurturing, familiar and alien. It's perhaps not surprising that the Tlingit- so culturally intertwined with the marine environment- would project this ambiguity onto *Lontra spp*. It's interesting, however, that the mythology is so much darker than that surrounding the Celtic Selkie, for instance. My interpretation of the Kushtaka myth (*Kushtaka*) (Fig 53) reflects this darkness, utilizing sagger firing and a wounded surface texture to yield a necrotic mottling.

For each of the works in *Faces of Lontra* I grappled with the question of The Gaze. I worked with a glass-blower friend to obtain life-like eyes for each piece… but I did not always opt to include these. As I discussed earlier, the direct gaze can confer an unearned sense of kinship, or even ownership. In the case of Catholicism and *Neither Fish nor Fowl*, the religious construction of otter-as-food absolutely encompasses this type of asymmetry. *Kushtaka*, in contrast, draws from a tradition where the darker aspects of the Sublime come into play. Thus, *Kushtaka* is presented as eyeless, and therefore more overtly enigmatic.

Faces of Lontra: *Lontra and the Land Ethic*

The constructed projections of mythology and theology also exist within the natural sciences. In *Lontra and the Land Ethic* (Fig 54), I allude to Aldo Leopold and his ideas about ethical holism- his classic statement that "A thing is right when it tends to preserve integrity, stability and beauty of the biotic community" (Leopold et al 2013). Leopold's ideas approach dogma for the modern ecologist. In the land ethic, all things are part of an interwoven network, and every strand is important. Thus, otters are viewed as inherent kin to the rocks

[17] Like Eastern Europeans performing hand gestures to ward off the evil eye

beneath the riverbed, to the mosses that blanket the margins, and to us as well. Modern ecologists ingest Leopold's ideas so thoroughly that other viewpoints may be ignored[18]. I'm personally invested in Leopold's ideas… but it's important to remember that these ideas are yet another lens or projection, and that Otherness abides.

In creating *Lontra and the Land Ethic*, I experimented with an amalgam of clay and coffee grounds. This material has been used to build inexpensive water filters in Africa (Blanch 2002)- and while I'm intrigued by this functional aspect, I also appreciate the rugged, granite-like texture.

Lontra and the Land Ethic is also one of my first attempts at integrating living plants and sculpture. Ephemeral growing things were once considered the province of horticulture… but multiple practitioners at the art-conservation interface have utilized them of late. Examples range Robert Cannon's figurative works (Fig 55) t0 Per Kristian Nygård's indoor facsimiles of grassy knolls (*Not Red but Green*, Fig 56) and Rachel Champion's fabricated environments (i.e. *Limits of Progress,* Fig 57). In the case of *Lontra and the Land Ethic*, I evoke organic interconnectedness… but also hint at the darker aspects of the ethical holism paradigm.

Faces of Lontra: *Kawauso*

Kawauso (Fig 58) is currently the final work in the *Faces of Lontra* series. I've already mentioned the *Kawauso* myth in discussions of my print, *Kawauso and Tohuku.*

In Japan, the Kawauso myth is intensely relational, with overtones of sexuality. As Elund discusses in Subversion, Sexuality and the Virtual Self (Elund 2015)., individuals constantly seek Authenticity through contact with Otherness. It's no surprise that enigmatic creatures like otters could be enfolded into psychosexual mythmaking. Similar patterns are observed with other mythos[19].

As a consequence, I emphasized the gaze in *Kawauso*. Through subtle sculpting, I created an interaction that is unsettling by design.

[18] Such as the pragmatic vampirism of Madison Avenue, or the old, metaphorical reactivity of the coastal Tlingit
[19] (The Celtic Selkie, bears in indigenous North American legend, etc.

The surface treatment on the main otter form utilizes majolica glazes to evoke Geisha imagery, as well as Kabuki theater. Geisha culture presents paradoxical elements of empowerment and coercion, while Kabuki interweaves gender-based uneasiness and an inherent fascination with masks, lenses and the Other (Croissant et al 2008).

The cowl for *Kawauso* entailed a novel approach, in which thin slabs of clay were hammered into cheesecloth, molded and fired. This method yields an organic form with surprising resiliency to thermal shock. Finished with a copper-based Raku glaze, the cowl resembles a hybrid between rippling water and fabric, but with coppery, bloody highlights intermingled with the predominant blue surface. Again, the effect is subtly unsettling.

I intend to continue *Faces of Lontra* moving forward. There are many, many stories/lenses related to otters. I anticipate that the series could be compartmentalized-displayed in smaller segments… but I hope to someday display the entire series. Ideally, I'd like to see 'Faces of Lontra' displayed in a setting where people could observe real otters… a reputable, research oriented zoo perhaps, or the visitors' center at a wildlife refuge. Again, the goal would be to challenge presuppositions, projections, and lenses… and encourage people to approach the Other with engaged naivety and openness.

As a final note on the *Faces of Lontra* series- I should acknowledge that my making is not ultimately motivated by a desire to make a profound conceptual point about Otherness or the Sublime. At bedrock level, I love the creatures and want to engage with them, and the making itself is an exploration and interaction. As an emergent sculptor, I've found that grappling with the nuances of a specific living entity is an iterative process[20], almost a species of research in its own right.

With this in mind, I've been regularly sculpting otters as an exploratory exercise (Fig 59). I approach each new sculpt without an end goal, working with the clay, playing with configuration and surfacing. I do try to emphasize a different approach on each sculpt… but the only unifying element, ultimately, is a sense of play.

This is perhaps appropriate. Regardless of cultural lens, we always seek to find a connecting thread in our engagement with Otherness… and play is one of the most universally acknowledged points of kinship between ourselves and *Lontra canadensis* (Krauss et al 2005). As a sculptor, my fascination with this creature should serve as an occasional

[20] The lines, patterns of motion, facial expressions, and textures of *Lontra canadensis*

reminder to set conceptual dictates aside and simply go forth to play in the mud. For me, this is a gateway to Lewis's Drippings of Grace, an opportunity for communion. As long as the process is pursued with humor and humility, I believe that the Other will remain accessible and vital.

Reconciliation Art

At its essence, the discipline of Conservation Biology traditionally focus on two endeavors (Van Dyke 2008).

1) Preservation (of ecosystems, wild places, endangered species, etc.)
2) Restoration (of degraded and damaged systems)

Both of these activities are similar in one way- they implicitly accept a dichotomy between places inhabited by *Homo sapiens*, and so-called wild or natural places. From the Acadian Vision down through John Muir and Edward Abbey, nature has been portrayed as an Eden, a place where human beings are transients and wayfarers.

Although I affirm the deep importance of wild places, the human-nature dichotomy is no longer tenable. According to the 2010 Living Planet report (Living Planet Report 2010), human beings are currently using the of two production capacity equivalent of two Earths. A study by the Wildlife Conservation Society estimates that 83% of the Earth's surface is heavily modified by human activity (agriculture, urbanization, etc.) (Mayell 2002). Given this reality, we can't conserve nature within parks and protected areas alone. We need to integrate ecological processes, species habitat, and tropic webs into the very places where we live.

Earlier, I cited absurdity as one way to circumvent the Cassandra Syndrome. There are other approaches, however, and one of the most important involves the provision of viable, seductive alternatives to unsustainable practice. People don't respond well to repeated screams of Thou Shalt Not[21].

People are starved for contact with wild things. Multiple researchers have demonstrated a link between exposure to healthy ecosystems and human well-being. Viewership continues to skyrocket for programs like Shark Week, and zoos and parks are bursting at the seams. Thus, an agenda that promotes an integration of nature into regions dominated by humanity has tremendous potential.

[21] Try to take away the keys to your workout buddy's HumVee or your office-mate's Dasani bottle, and you'd better be able to offer them a fair trade.

In 'Win-Win Ecology' (Rosenzweig 2003), Michael Rosenzweig proposes a third pillar for Conservation Biology- a new discipline that he titles 'Reconciliation Ecology'. As it turns out, there are many species that can co-exist with human-dominated landscapes- even heavily urbanized regions. Some of these organisms (dandelions, rats, pigeons) are popularly referred to as Weedy Species'[22]. However, it's also possible to accommodate a wide spectrum of more sensitive species if human beings make modest changes to their lifestyles, architecture, and infrastructure.

Rosenzweig provides several examples- crocodiles that inhabit coolant canals at the Turkey Point nuclear power plant in Florida, or an underwater restaurant in Israel that runs a coral restoration garden as part of its décor. Reconciliation Ecology can also be as simple as planting a native plant backyard garden. Peregrine falcons serve as a particularly vivid case study. Urban sky-scrapers provide a vast array of potential nesting sites for these raptors… but few of these were traditionally utilized because of a lack of protective sills, or because of intrusive human activity[23]. All you have to do is re-time exterior cleaning and make a few structural modifications, and you suddenly have thriving peregrine populations in Boise, Minneapolis, Chicago, and New York, and everyone's happy[24].

There's tremendous potential for fine art to contribute to the process of reconciliation ecology- to the point where Reconciliation Art can be proposed as a movement in its own right. It's laudable to recreate our human habitats to accommodate wildlife, oxygen generation, and other dimensions of a living biosphere. It's even more laudable to do so in a manner that's beautiful, conceptually challenging, and educational.

Antecedents: Conservation Biology and Restoration Ecology

Referring back to my earlier overview of the intersection of art and conservation, Reconciliation Art is creative[25] and transformative[26]. The disciplines of Conservation Biology

[22] Often with pejorative connotations- such as labeling gulls 'flying rats'
[23] Window-washing, seasonal air-conditioning racket, etc.
[24] Except for people who want to walk their Pomeranians in peace.
[25] Seeking innovative and novel approaches to emergent ecological challenge
[26] Seeking direct intervention in process disruption and the extinction vortex.

and Restoration Ecology are clear antecedents for Reconciliation Art. There are equally powerful antecedents from traditions in Art and Architecture, however.
People have long re-imagined their habitats to incorporate wildlife- and these modifications can be noteworthy for their visual impact. The Dutch rebuilt their chimneys to attract storks (Fig 60). The Polynesian colonists who settled Hawaii built fish ponds in arid parts of the coast. These were bracketed by petroglyphs, and the architecture itself was profoundly harmonious (Fig 61).

Antecedents: Earth Art

Earth Art is an important progenitor of Reconciliation Art. One of these is. When Robert Smithson built *Spiral Jetty* (Fig 62), he had no intention of enhancing water quality or brine shrimp reproduction in the Greater Salt Lake (Lippard 2013). Similarly, when Andy Goldsworthy created some of his site-specific installations (work from Rivers and Tides, or ephemeral productions like *Rowan Leaves & Hole*) (Fig 63), he wasn't trying to remediate an estuary or enhance nitrogen cycling (Blandy 1998). Nonetheless, these works share an attention to the rhythms and nuances of place[27]. Reconciliation Art demands a comparable site sensitivity.

Antecedents: Viewing and Witnessing

Reconciliation Art also draws from the Viewing or Witnessing dimensions of ecological art[28]. It's laudable for installations to remediate or transform environments- but acknowledgement of threat can also be part of the communication. Examples range from cinvasive, monolithic tree structures (built from discarded rainforest pallets and other scrap) (Fig 64) to the luminous but disturbing fish sculptures constructed on the Rio beaches during the U.N. conference on sustainable development (Fig 65). The conversation inspired by these works is sometimes direct and strident, as in Evan Hobart's *All that We Create, we Destroy*

[27] Patrick Dougherty's wickerwork forms and Tetsunori Kawana's modern riffs on the Japanese Ikebana tradition provide additional good examples
[28] Work roughly definable as 'protest art'.

(Fig 66). It can also be tangential and subtle, as in some of Mel Chin's work like *Bird is the World* (Fig 36) or *Rafetus Euphraticus* (Fig 67). Ecological protest art can also entail Using- as in Guy Riefler's collaborations with Ohio-area painters and ceramic artists (such as John Sabraw) *(Chroma Series*) (Fig 68) in which mining effluent is used as pigment (Pope 2013). Some examples of Reconciliation Art lack this referential dimension, but many of the best examples incorporate it.

Antecedents: Bioremediation Art

Conceptually, Reconciliation Art explicitly incorporates several existing movements, including bioremediation art, habitat architecture, and biosculpture.. Biomediation art can be installation-based or performance oriented, but always seeks to reduce, eliminate or filter undesirable or invasive elements from an environment. Mel Chin's *Revival Field* (Fig 69) is a classic example- as is Aviva Rahmani's *Ghost Nets* (Boetzkes 2007), in which the artist built riparian gardens and water buffer zones to transform a former town dump (Fig 70). Buster Simpson utilized more of a performance approach, carving limestone into giant pill shapes and tossing these tablets into an acidified, degraded section of the Hudson River (Fig 71).

Antecedents: Habitat Architecture

In Habitat Architecture, the architecture creates site-specific forms that provide essential services for a species[29], ranging from nesting and denning sites to settlement matrices and protective cover. Joyce Hwang's *Bat Cloud* is an installation at the Tifft Nature Preserve in Buffalo (Maynard 2012)- an array of creatively designed roosting sites, suspended from wires in a research forest site. *Bat Cloud* is visually parsimonious with its environment, but is also designed to be visible to the general public (Fig 72). As a consequence, *Bat Cloud* incites curiosity and highlights the vulnerability of this often-maligned taxa.

In an age of massive land conversion, habitat architecture can theoretically be pursued at a grand scale. Ken Olthius has envisioned floating Sea Trees- multi-level, terraced islands of artificial habitat, with each level catering to a different component of the trophic web

[29] Or suite of species. It's becoming increasingly important to work at the ecosystem scale.

(Smith 2002). Olthius's first realization of this concept is slated for the Amsterdam Harbor, with an anticipated completion in 2018.

Antecedents: Biosculpture

Biosculpture is definable as art that is alive- either through colonization by plants and other biota, or through using living materials in the fabrication process[30]. Daniel McCormick and Mary O'Brien create watershed-scale installations that revitalize eroding riverbanks (Fig 73), using a woven combination of natural fibers, rip-rap, and seeded plants (Rothstein 2016). The late Jackie Brookner utilized a unique concrete polymer that served as an effective biofilter. Seeded with plants and positioned to serves as water catchments (whether through active or passive flow) her sculptures assist with remediation in a sewage treatment pond in Finland (*Veden Taika*) (Fig 74) and an Ohio river (*Laughing Brook*) (Fig 75). Brookner's installations often incorporated social practice; Laughing Brook was the end product of a lengthy, community-level outreach, involving local schools, regional artists and architects, and community planners (DeWeerdt 2013).

Antecedents: Social Practice Aspects

The participatory aspects of *Laughing Brook* exemplify many efforts in Reconciliation Art. Although solo projects (like Simpson's work in the Hudson River watershed) can have some success, a broader ripple effect is possible when communities contribute to the design and implementation of projects. In addition, the practice of Reconciliation Art often mandates a diverse but specific array of skills, and few artists possess the technical acumen to develop a *Revival Field* or a *Veden Taika* outside of a collaborative framework.

In 'What We Made: Conversations on Art and Social Cooperation' (2013), Finkelpearl defines social practice as "art that's socially engaged, where the social interaction is at some level the art." At its purest, social practice empowers the participant to become the artist, and the art professional steps back into the role of catalyst, or facilitator, or even observer. Not all

[30] Incidentally, 'biosculpture' is also the name of a line of manicure products… which makes online research very difficult when using this term.

example of Reconciliation Art will qualify as social practice[31], but the intersection is important enough that the Maryland Institute College of Art now offers a concentration in Sustainability and Social Practice.

In exploring potential collaborations in Reconciliation Art, therefore, my goal is to foment collaboration- to create projects that are participatory at minimum, and ideally venturing into the realm of social practice.

[31] Nor should they

Reconciliation Ecology I: Guardian Beetles

My first investigation in Reconciliation Art was initiated through dialog with my fellow faculty in the College of Natural Resources. The College of Natural Resources operates an outdoor education center called the McCall Outdoor Science School (MOSS). MOSS is located on the shores of Payette Lake in central Idaho- a site noteworthy for centuries-old ponderosa pines.

One of the current ecological crises in the Western United States centers on several species of bark beetle. Bark beetle are small, aggregating insects that attack the inner cambium layer of various conifers. They are not an invasive species per-say. However, they were kept in check in the past due to their sensitivity to cold winters (Hicke 2012).

Currently, a combination of climate disruption (leading to hot summers) and fire suppression (leading to fuel loading) creates an ideal environment for bark beetle infestation. Several species- including the Mountain Bark Beetle (*Dendroctonus ponderosae*) and the Douglas Fir Bark Beetle (*Dendroctonus pseudotsugae*) have instigated massive forest die-offs in Idaho, as well as Colorado, British Columbia, and other states and territories.

There's been considerable research into the ecology and life history of these species. It turns out that bark beetles communicate hormonally. Multiple species utilize a disaggregation pheromone to signal that the outer bark of a tree has been breached[32]. Another 'disaggregation' pheromone is release when a tree dies (Mehmel 2002).

It turns out that disaggregation pheromone can be synthesized and applied to trees. Several companies sell these chemicals commercially- generally as a pouch or chemical-laced bubble (Fig 76). If slapped on at the proper time of year, and in adequate number, these patches can shield an individual trees from infestation.

This is not a panacea for all ravagings of bark beetles- only colder winters would ultimately accomplish this. The process is too costly and time consuming, and could not be applied at scale[33]. However, these patches can serve two purposes: A) protecting legacy trees-

[32] The arthropod equivalent of 'The keg's tapped dudes!!!' at a frat house.
[33] Plus the pheromones themselves are toxic, and could pollute if broadly distributed in the backcountry.

trees that are valued because of size, location or history, and B) educating the public about bark beetles.

This second goal (education) is undermined by the drab, camouflaged character of these patches, however. Most people aren't observant enough to note a small plastic scrap nailed to a ponderosa trunk ten feet off the ground.

My colleagues at MOSS were interested in rendering these patches visible and educational, and (ideally) involving the public in the design and dispersal of these patches. I immediately thought of slip casting. Through my experiments with cast water bottles, I'd discovered the tension between uniqueness and uniformity that define slip case objects. A basic form can be altered, carved, refined through additive and subtractive approaches. A slip cast beetle is a wonderful template object for a grade school child or an art and design graduate student.

The summer programs at MOSS offer access to diverse stakeholder population. In cooperation with two undergraduates from the University of Idaho (Annie Canto and Kara Fletcher) I worked with a grade-school group from McCall, and a cohort of Upward-Bound students.

Working with Fletcher and Canto, I implemented a program in which students 1) engaged in field oriented exercises related to bark beetle ecology, 2) participated in synthetic classroom activities, and 3) constructed bark beetles. The student lacked ownership of only one portion of the making cycle- the initial slip casting. They were full collaborators in sculpting, bisque firing, glazing, and raku firing.

As part of this exercise, students traced bark beetle galleries- patterns of bored cambium under infested bark. They mapped locations of vulnerable trees using GPS, and observed species characteristics under scanning microscopes. However, the making portion was deeply memorable for all participants, whether second graders or upper-division High Schoolers.

Many students kept interactive journals related to this experience. One student wrote that "Art is an effective tool to teach and raise awareness" particularly when a made object can be "looked at, touched, or worn". The participant will be "reminded of the experience, and won't forget". Another student wrote that "I used to wonder what the strange circles were on the trees. Now I know. Now, because of the brightly colored clay bugs, others will want to

know too. I knew a little about bark beetles, but never thought of them much. Now, every time I see that design in a tree I'll know what it means."

As a side experiment, I offered several of these blank beetle forms to my friends and colleagues in the University of Idaho's College of Art and Design. The results were diverse and interesting[34] (Fig 77). I'd argue that these works were matched (or even eclipsed) by some of the creations thrown together by the seven-year-olds, however. One particular girl was fiercely, assertively committed to lavishing a ramified conglomeration of shark fins, insect parts, unicorn horns, and nameless, alien protuberances onto her beetle (Fig 78). The result has an emergent harmony[35].

Once these beetles were raku fired, they were installed at the MOSS campus. This collaboration with MOSS is a work in progress, however. In 2018, I plan to work with an undergraduate ecology and conservation biology (ECB) student at the University of Idaho to extend the program into the adjacent Ponderosa Pine State Park (with a trailhead kiosk and an interpretive walk).

This specific example of Reconciliation Art is unusual in that it is not a case of instituting a novel remediation. The pheromone patches were already in use- they were just cryptic and utilitarian. The ceramic beetles take an existing intervention and render it visible, celebratory, and educational.

It should probably be noted that there's an irony in symbolically enlisting bark beetles- the very agents of destruction in this scenario- as tree guardians. However, the current forest devastation is a harbinger of a system out of balance. Whether predator or parasite, any organism is a potential calamity in the Anthopocene. We should not seek to eliminate *Dendroctonus pseudotsugae*, but to restore its ecological function as a detritivore and agent of regeneration. In anticipation of restored balance, a ceramic avatar of *D. pseudotsugae* serves as an eminently appropriate forest warden.

Although the MOSS *Guardian Beetle* project was participatory on several levels, it was not an example of social practice in the most egalitarian of senses. There's are multiple technical barriers to the implementation of such a project, such as acumen with the Raku process and with slip casting and nuanced understanding of bark beetle ecology. In the future,

[34] Ranging from scaled textures to vaguely Greco-Roman phallic scraffito
[35] and should frighten any living example of *Dendroctonus pseudotsugae* back into the primordial ooze.

I'd like to see (and maybe help found) a vibrant online community for Reconciliation Art, in which working scientists can easily collaborate with artists and the general public. Initiatives like my Bark Beetle project could be adapted to local conditions and materials, and new collaborations could be developed from the ground up.

Reconciliation Ecology II: Coffee Clay Water Filtration

Due to a rapidly expanding population, the global demand for fresh water is accelerating at an unsustainable rate. Non-point sources of pollution, such as urbanization and agriculture, exacerbate this problem through the eutrophication and sedimentation of freshwater. In addition to rendering water unsuitable for human use, heavy influxes of nitrogen and phosphates disrupt ecosystem functioning (Carpenter 1998).

There are a variety of potential approaches to combatting this problem, ranging from systematic reduction in the use of fertilizers and improved practices at the source to ecosystem restoration. Direct treatment of contaminated water is one option- but the process of water-treatment is generally veiled from the public eye, thus missing an important opportunity for education and outreach.

I've mentioned my admiration for Jackie Brookner. Early in my MFA tenure, I contacted her to ask about her materials (I was interested in using her concrete polymer in some of my own sculpting). We ended up having an interesting email exchange, in which she talked about some of her frustrations with concrete as a medium (globally, concrete production is a major contributor to greenhouse gas emissions). She noted that I worked in ceramics, and suggested that I look into work by Tony Flynn.

Tony Flynn is an Australian Environmental Scientist working in Africa, where access to clean drinking water is a major social justice crisis. Flynn as developed a method for producing simple water filters in rural communities utilizing three materials: cow dung (as fuel), local clay, and coffee grounds. According to Flynn's tests, these filters can remove not only particulate matter, but also 98% of water-borne pathogens (Water, water everywhere 2015).

While the potential for providing 'open source' water filters is exciting, I'm personally interesting in the potential for this material to serve as a catalyst for long-term biological remediation of organic pollutants. The porosity of Flynn's coffee-clay matrix potentially allows for colonization by bacteria and algae, facilitating active metabolism of organo-compounds. Similar processes have been utilized at an industrial scale; for example, ceramic

granules have been integrated into constructed wetlands to breakdown dissolved nitrogen and phosphorus (Qu et al 2013).

In exploring Flynn's material, I initially experimented with its tactile and engineering aspects. Flynn used a 50-50 mixture (by weight) of clay and coarse coffee grounds. This yields a mixture that is granular, lacking the elasticity or plasticity of most clay bodies (Fig 79). After multiple experiments (and lots of playing around in the studio) it's become clear that coffee-clay does not work well with additive or reductive sculpting methods. Needless to say, it would be an unmitigated disaster on the wheel!

However, the material, when fired, is surprisingly robust- I've dropped a six-inch half sphere (0.5-inch diameter wall) from a five-foot height without a break or chip. It can be formed into hollow shapes using press-molding (Fig 80). This limits the range of possible forms- as objects need to be concave and relatively simple. However, (as noted earlier) I've used coffee-clay to sculpt one of the masks from the 'Faces of Lontra' series (*Lontra and the Land Ethic*) (Fig 54). I did this using press-molding- this seems to be the one making approach that yields viable forms.

Other than *Lontra and the Land Ethic*, my experiments with coffee-clay have centered on spheres. Spheres are the most primal of forms- evoking seeds, eggs, and many organic shapes, but very few inorganic objects. When you see a stone sphere in nature (or ice, or earthen), the tendency is to ascribe an anthropogenic causality. I remember the eerie impact of 'vortex stones' along certain rivers (stones that are polished round in eddies and vortices).

Spheres that are formed from coffee-clay can be delicately pigmented with chromium, iron or copper, yielding a subtle, granite surfacing. Alternatively, these vessels can be left in-situ, allowing bacteria, mosses, and algae to colonize and mottle the curve. They look simultaneously organic and rich with latent intention (Fig 81).

At this point in time, I don't know how these spheres will function in a degraded stream environment. There have been no active tests of Flynn's material for long term bio-remediation purposes. Thus, my coffee-clay work is in its inception phase- in large part because I want to collaborate with an undergraduate researcher, and I haven't found the right person yet. However, my eventual plan is to install an array of these spheres (or other forms) in a mucky, nitrogen clogged waterway in the Moscow Idaho Arboretum (Fig 82). Using both bench experiments and adaptive monitoring, I plan to test whether coffee-clay sculptural

objects can significantly reduce phosphate and nitrogen loading in this stream. Further, I propose to assess whether this installation can serve as an interface for public education and awareness, expanding local knowledge about sustainable, ecologically responsible water use.

Initially, this project will not be participatory beyond the involvement of an undergraduate at the senior thesis level. However, in cooperative with my undergraduate collaborator, I will design a project website. This website will have information on public water quality management and ecologically active art, with specific tracking information on the Moscow Arboretum installation. A plaque near the installation will direct visitors to this website.

Through the website, visitors will be offered the opportunity to interact directly with the project, through placing coffee clay spheres in their own regional waterways, leaving them on-site for a 3-month interval, and then returning them to the project. Upon return, these objects will be sectioned and assessed for colonization by bacteria and algae as in objective one. These results will be posted on an online, interactive map on the program website.

Synthesis: MFA Show and Future Directions

Out of the work that I generated during my MFA, I've opted to present two works from the Evil Sextet series (*Gilgamesh and Humbaba*, *Nuckelavee*) and two works from the Strange Evolution series (*Acutus and the Androgene*, *Nicotina*).

These works represent a synthesis of the themes discussed in this thesis: alterity and the sublime, the use of mythology to elucidate ecological threat, evolution and transformation, etc.

Equally importantly, however, each of these works immersed me in at least one stark feverish instant of intuition and wonder. There's a selflessness in creation and discovery, a sense of channeling something inherently real. It's Lewis's drippings of grace captured in the carved line on a piece of MDF board or the coppery gleam of ceramic as it emerges from a raku kiln.

As I move forward, I anticipate that the types of practice represented by these works (mixed media installation, relief printmaking) will continue to be a focus. However, I don't think that any one means of making will define me.

When I embarked on my MFA journey, I thought of myself as a functional potter with a Raku focus. I was intensely obsessed with the minutia of craft, and with a narrow palette of visual expression. After three years of discovery, I consider myself a conceptual artist with a highly personal narrative focus, and with a flexible, expanding array of visual tools.

Joy lies in exploration rather than the end product.

We're lost without resistant reality.

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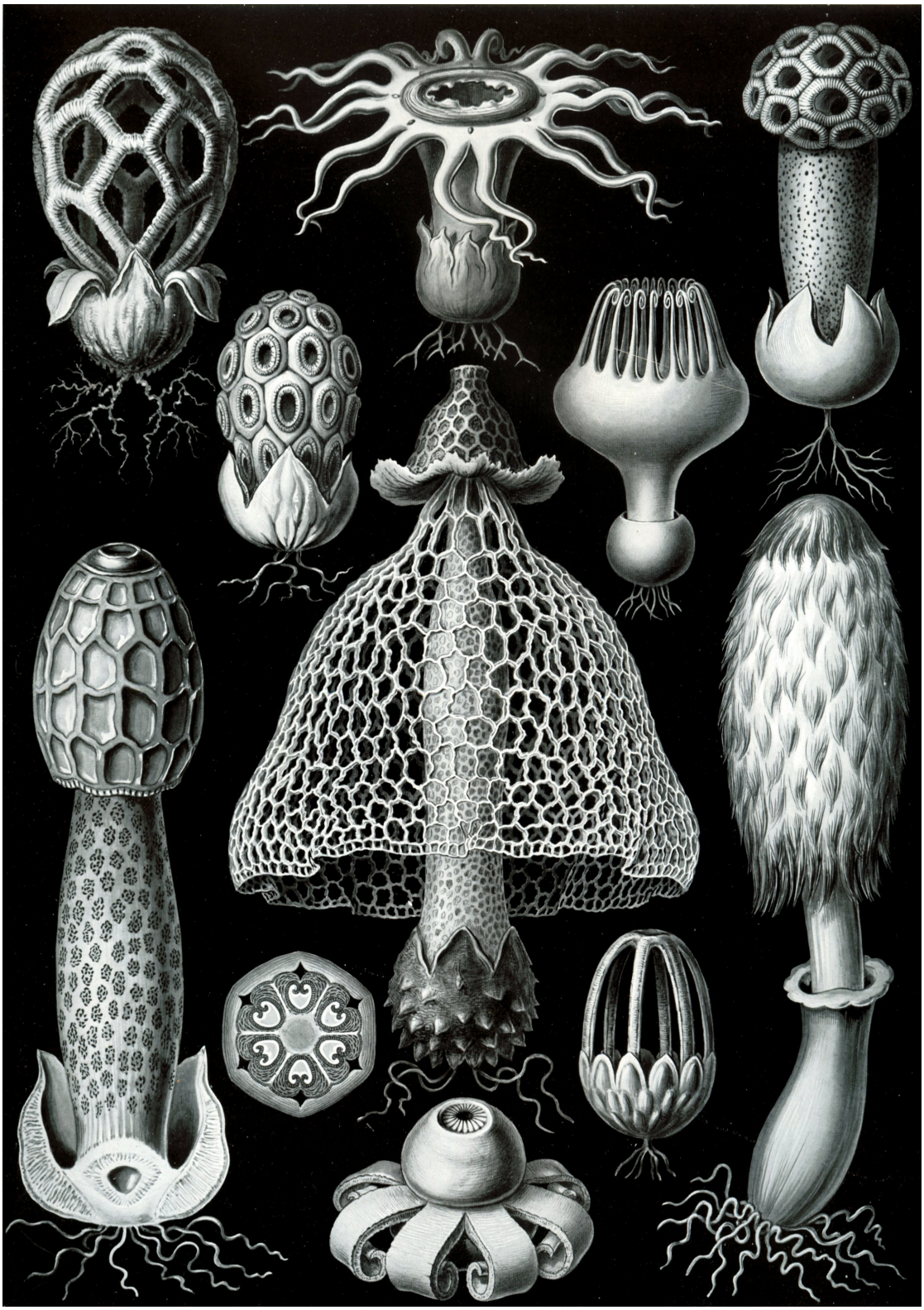

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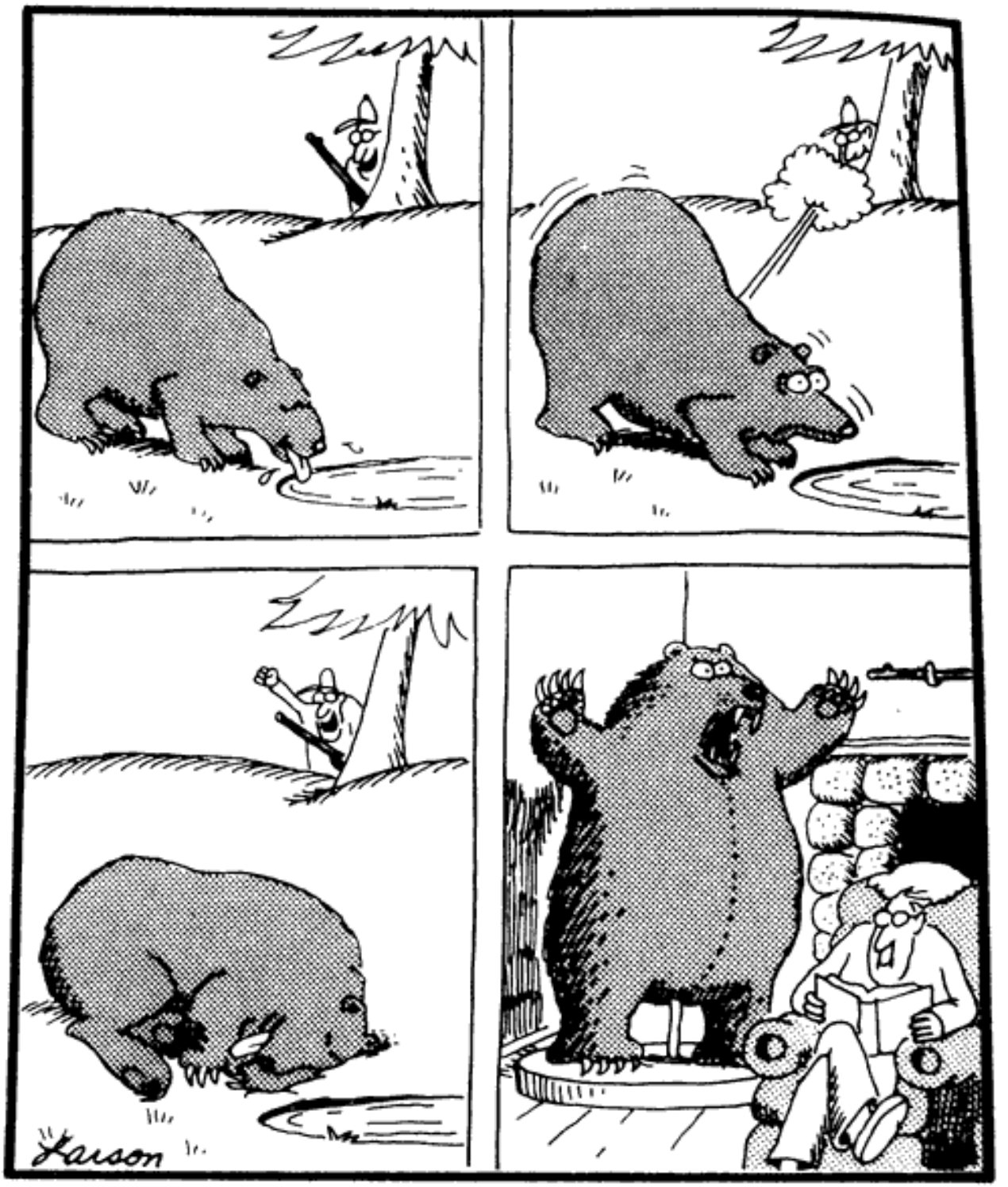

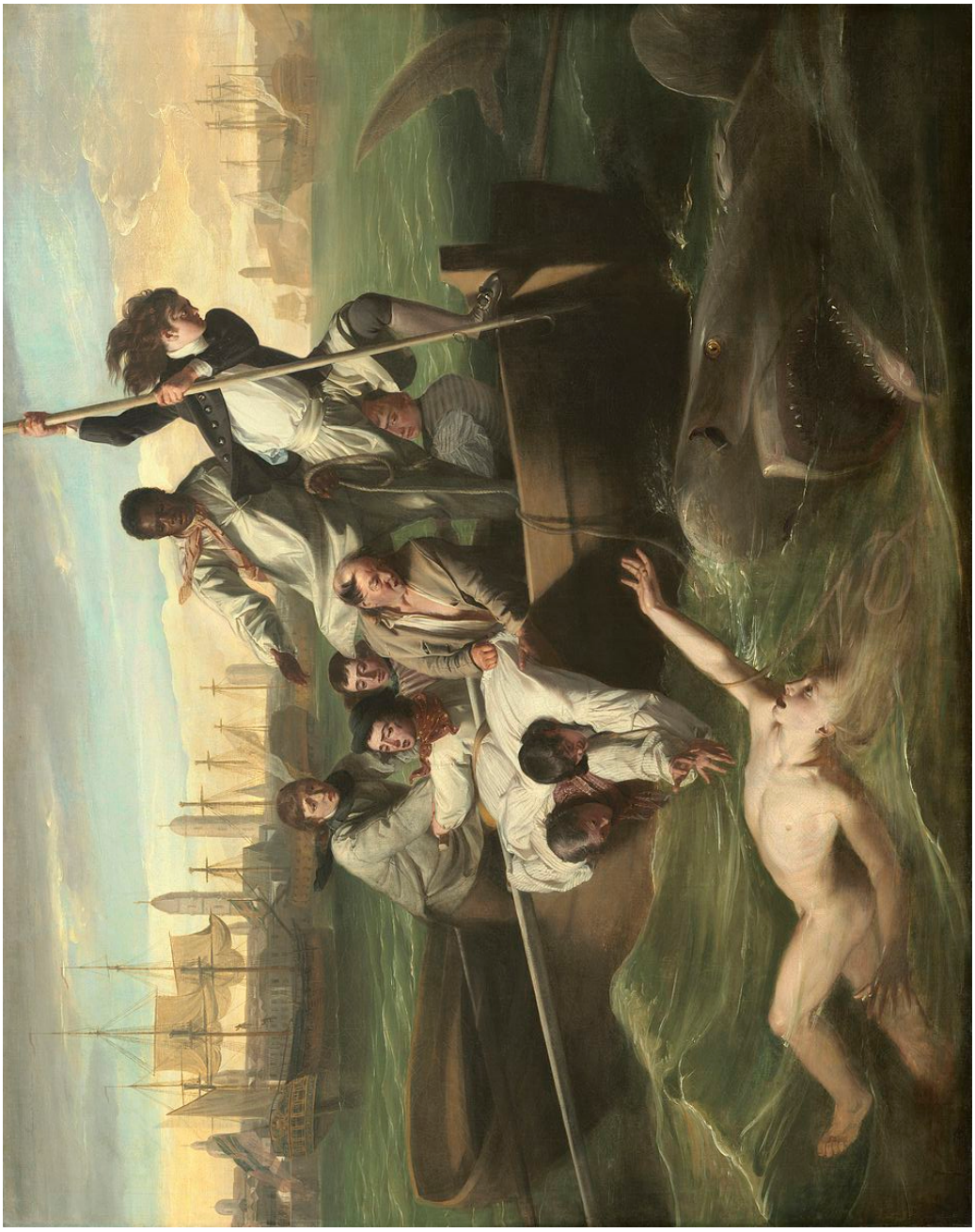

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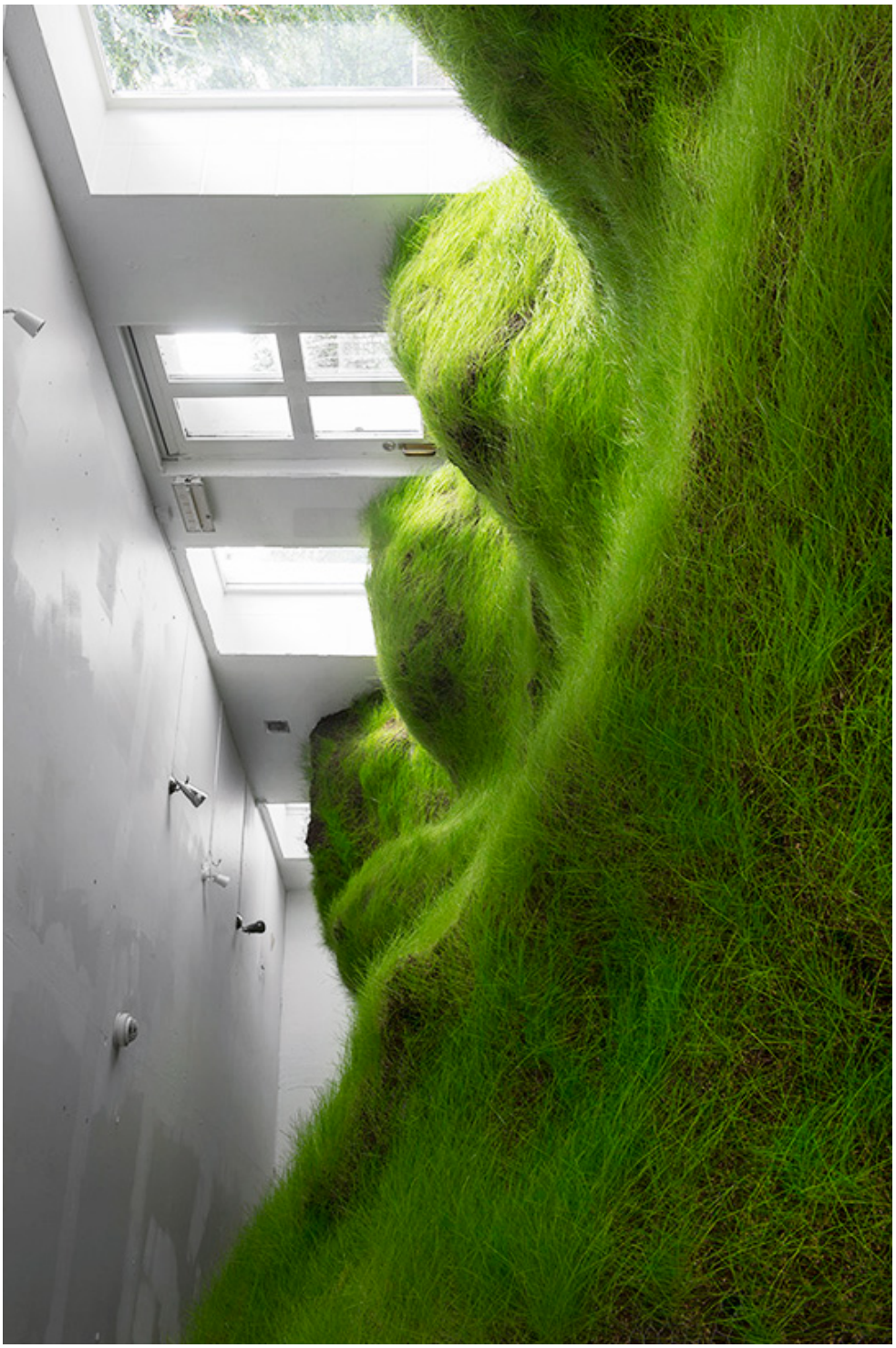

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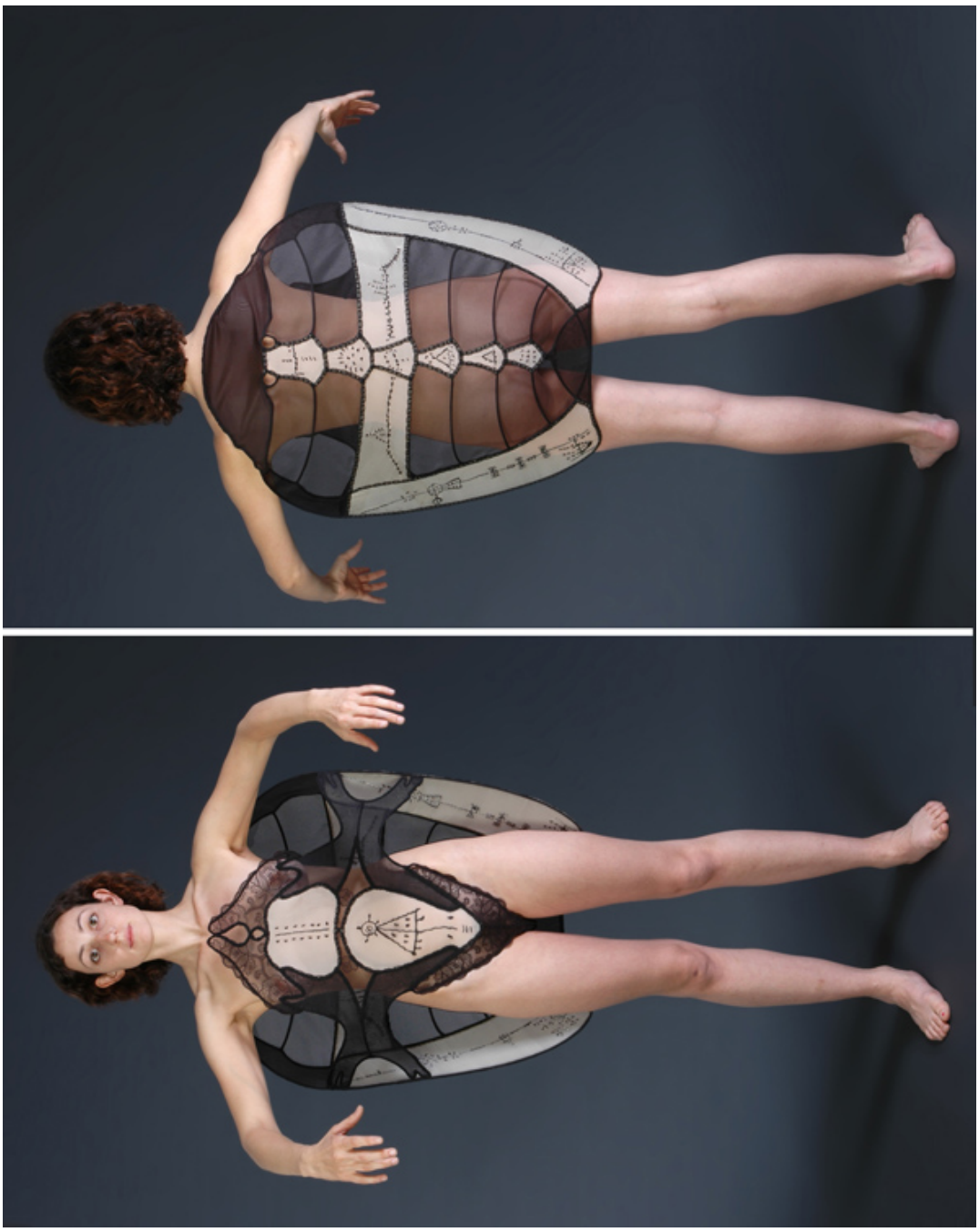

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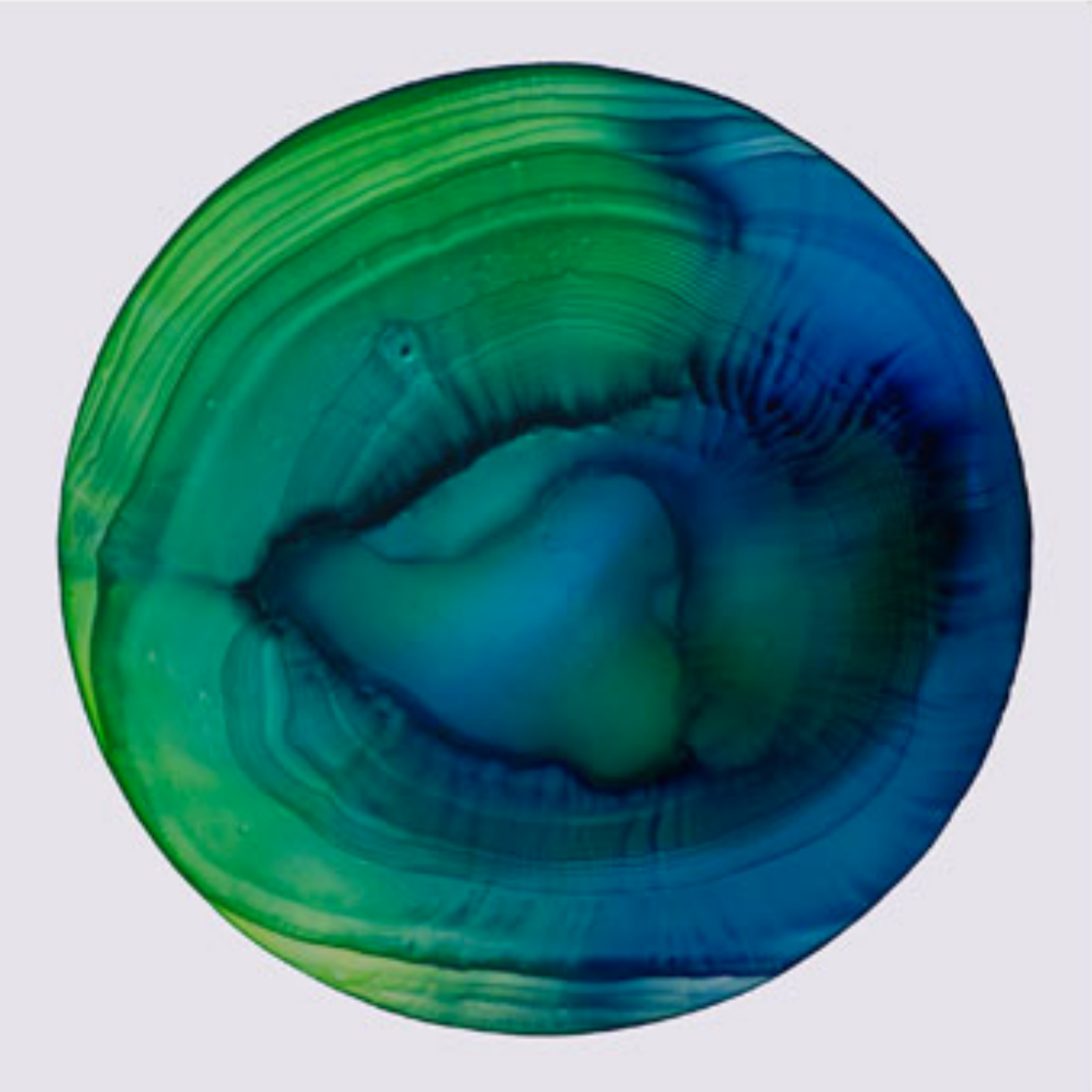

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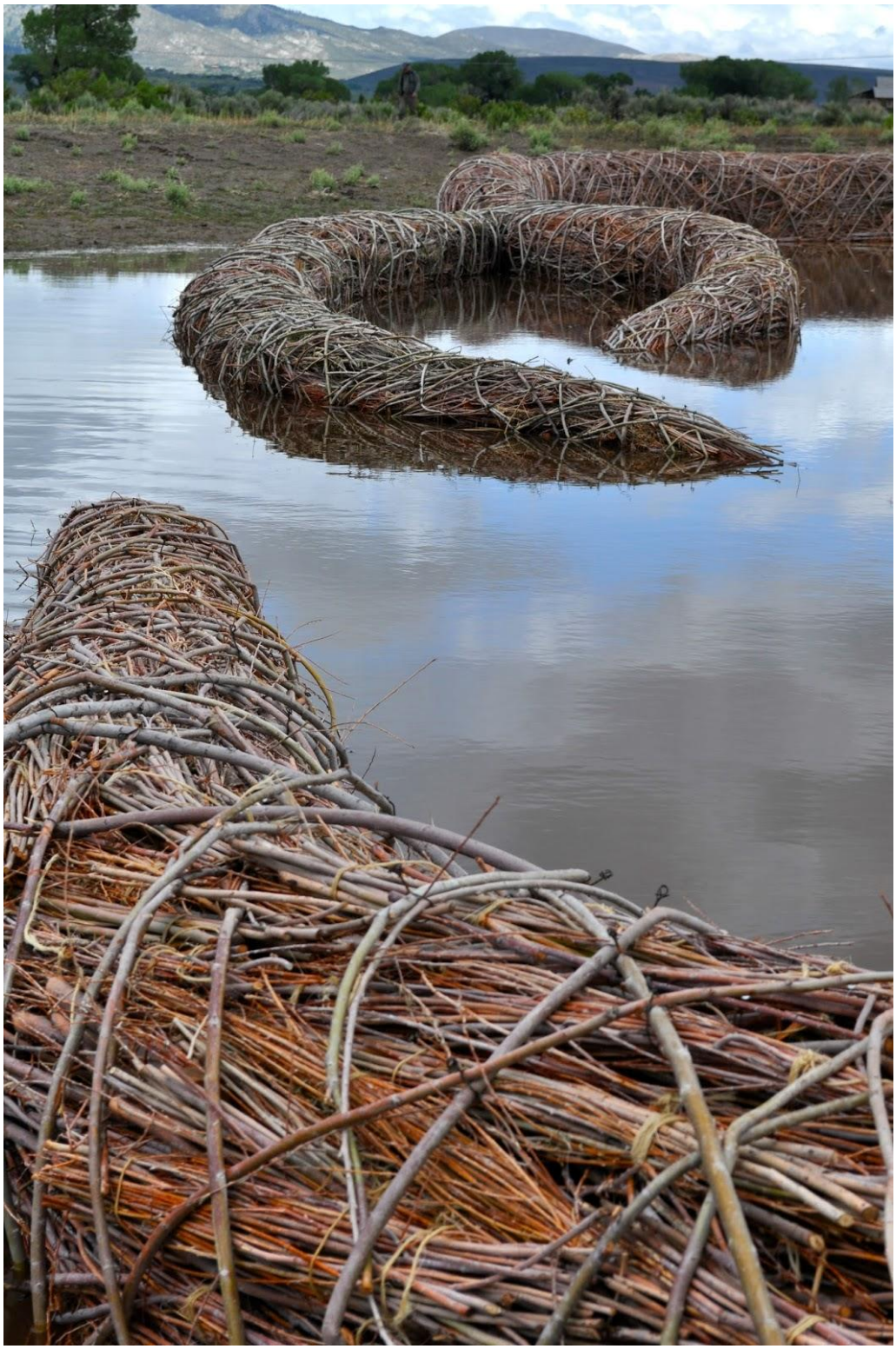

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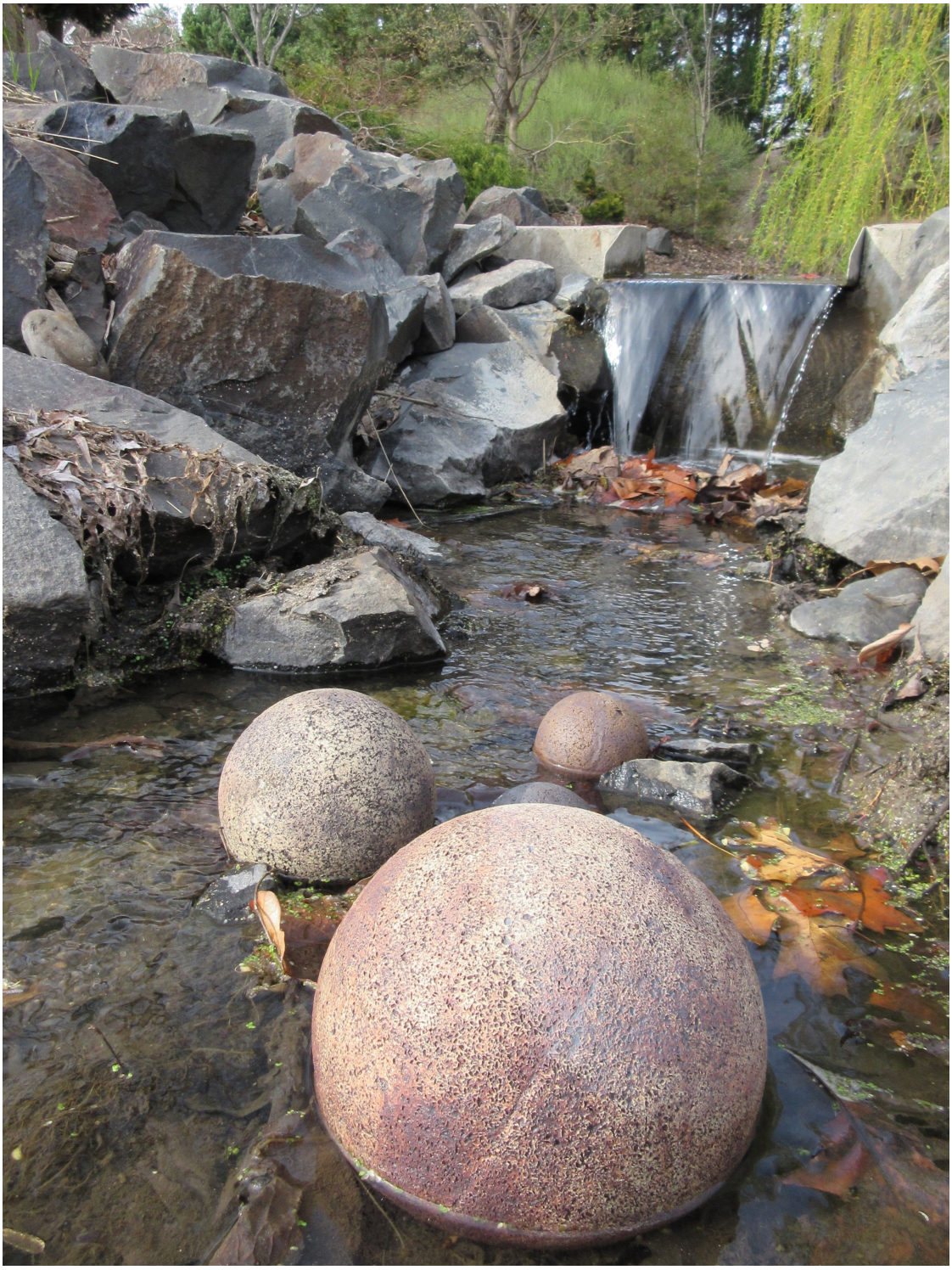

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