CHAPTER 1

War, Ruins and Wildness at Orford Ness

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This chapter explores the shifting heritage landscape of Orford Ness, a shingle spit on the British coast that was home to military-scientific research throughout the twentieth century, its most politically important phase being as an Atomic Weapons Research Establishment (AWRE). After its abandonment, the site was transformed into a nature reserve and monument to the Cold War. Managed by the National Trust, the buildings were left to decay in so-called controlled ruination, creating a disturbing visitor experience that works together with its ecological framing to disrupt nostalgic memorialization, the mysterious, ruining buildings evoking a sense of time-in-process. Taking a more-than-representational approach to Orford Ness, this chapter investigates the site's affective potential in terms of wildness, loneliness and absence, boundaries, decay and destruction.

Affective Landscapes

An approach foregrounding affective potential seems obvious at Orford Ness, where many people report an unsettling felt experience. Attending to this atmosphere demands resisting the deadening effect of prioritizing representation or, as John Wylie put it, draining the life out of things (Wylie 2007a: 163). Working against this deadening tendency, more-than-representational

theories draw on phenomenological styles of thinking and extend them, considering how our bodies are in play with sensations and affect, and how they perform, participate or are put to use (MacPherson 2010). As Hayden Lorimer observes, affect is difficult to pinpoint, distributed in and between (not exclusively human) bodies, objects, technologies, sounds, activities and other things (Lorimer 2005: 2). Exploring the affective qualities of place means considering how a landscape forces us to think and feel through its contexts, prompts and (un)familiarity (Dewsbury 2009). The arrival of military research at Orford Ness and its subsequent shift into a nature reserve call to mind Joy Parr's work on the changes in embodied knowledge wrought by Canadian megaprojects, where residents struggled to adapt their ways of sensing, understanding and interacting with their environments (Parr 2009). Parr examined the disorienting effects of the 1952 construction of the NATO base at Gagetown, New Brunswick, and the new embodied knowledge gained by workers at Ontario's Bruce Nuclear Generating Facility.

More-than-representational theories claim that landscapes should be understood as continually in process, permanently coming-into-being. As Wylie elaborates, attempting to understand landscape must involve recognizing the 'simultaneous and ongoing shaping of self, body and landscape via practice and performance' (2007a: 166). Through its emphasis on landscape as continual doings rather than something constant and seen, this approach also brings the one doing or seeing into focus. Landscapes are therefore the sensibilities with which we see, encompassing precognitive and conscious experience (Merriman et al. 2008).

Taking this insight to a heritage site, visitors' capacity to be affected by heritage emerges as qualified by the experiences inevitably and already encoded within their person (Anderson 2014), and the past is felt through embodied experience of the environment (Tolia-Kelly, Waterton and Watson 2017). Emma Waterton argues that embodied experience and the processes of meaning making are crucial to understanding heritage, emphasizing what heritage does rather than what is seen (Waterton 2014). As she observes, perception is full of memories, such that spaces of heritage are always two: past and present.

Like Parr's megaprojects, the industrialization at Orford Ness concerned twentieth-century military and nuclear research. The interwar period was arguably a key phase of military development in Britain (Edgerton 2006), and as the Second World War gave way to the Cold War, defence policy depended on the work of hundreds of scientists, engineers and technicians engaged in research, producing fissile material and other materials, and designing, fabricating and testing nuclear devices and weapons (Arnold and Smith 2006). During the Cold War, the importance of science was made evident to the public through the high-profile status of atomic weapons,

guided missiles and space research (MacDonald 2006). With this history, the site at Orford Ness shares parallels with museum exhibitions, and the difficulties encountered there in presenting the relationship between science and warfare (Gieryn 1998). The site is presented as a monument to the Cold War, making scholarship on war memorialization also relevant (Moshenska 2010). The wider region around Orford Ness, East Anglia, was heavily militarized during the Second World War (Davis 2019), and Sam Edwards (2015) has studied memorializations of American troops in East Anglia. Edwards explores the continual creation of collective military memory in post-1945 Europe by American military elites, which normalized the experience of war through a framework of heroism, patriotism, martial sacrifice, masculine camaraderie and unit pride. As he shows, the American approach to memorialization was adapted into the community memory, shaped by regional and national concerns often defined by local elites.

Adding another layer, this military heritage site is also a nature reserve. The Ness is managed by the National Trust, a large conservation body in the United Kingdom, and its identity as a reserve is reinforced by its designation as a Site of Special Scientific Interest, a Special Protection Area, a National Nature Reserve and a Special Area of Conservation. Rachel Woodward (2005) has examined the naturalization of the British Army's presence in the countryside, and Marianna Dudley's (2012) environmental history of military training areas traces the emergence of military environmentalism, whereby narratives of militarization that allow nature to thrive became increasingly linked to military training areas after the Second World War. David Havlick (2011) has also investigated recent conversions of American military land to wildlife refuges, and Shiloh Krupar (2013) has explored arsenals and nuclear facilities that have been converted to nature refuges, tracing the shifts in rhetoric, memory and politics needed to naturalize military—industrial territories.

In this chapter, I will combine ethnographic analysis and expressive writing with textual analysis of other visitors to the Ness. In a similar vein to Jason Dittmer and Emma Waterton's (2016) exploration of the Australian War Memorial, my work here revolves around performativity and ethnography, allowing myself to become 'affected and inflected by encounters' (McCormack 2008: 2), using my own body as an 'instrument of research' (Longhurst et al. 2008: 215). This autoethnography is based on several visits to Orford Ness, including a guided tour with property manager Grant Lohoar (Davis 2008). My approach resonates with Hayden Lorimer's (2006) ethnographic reflections and expressive narratives, Wylie and Lorimer's (2010) narrations of walking, Krupar's (2006) ethnofable, and Harriet Bell's (2014) imaginative walking and experimental writing. I also interviewed archaeologist Angus Wainwright – who was key to establishing the National Trust's presentation of the site – and analyse how

Orford Ness has been written about in the media, by urban explorers and in nature writing.

Walking in Ruins

I drive to the village of Orford along narrow lanes enclosed by hedges and trees, and in the village the houses crowd close to the street. The road ends abruptly at the shore. Once a thriving port, Orford was gradually cut off from the world by 500 years of the spit's southward extension, making ship access increasingly difficult. Today, it attracts visitors with its smokehouses, gastropubs, castle and harbour, as well as the National Trust site. At the harbour, I look from the white sailboats dotting the River Ore to the buildings hovering across the river, and they seem bizarrely close. A narrow shingle spit stretching 16 km alongside the coast, Orford Ness is only accessible by boat and is only partly open to the public. The National Trust does not provide its usual pristine environment and tea-shop experience here, recommending three-to-four hours' walking, and aiming for the visitor experience to be uncomfortable and emotionally challenging.

There is a sense of tense anticipation among the group sitting in the tiny boat on the way across. Orford Ness is only open on Saturdays in March to June and October, and five days a week in July to September, and there are just three crossings per hour between 10 AM and 2 PM. In the National Trust's booklet, I read about 'a landscape of unusual character with its sheer scale perhaps its most memorable feature', a landscape that 'can be exposed, lonely, hostile and wild' (National Trust 2006: 2). Before being released on the other side, we are given a short briefing on the birds, habitats and buildings we might see, and are told to stay on the marked path because of nesting birds, plants and unexploded ordnance.

Pasture and marshland stretch off to my sides as I pass the old airfield along the path, looking ahead towards a group of low-lying buildings: the Street. Most of the twenty-seven buildings that the Trust removed were from here, although their foundations remain as illegible scars. They are not labelled. Some have been minimally restored with a tin roof, windows and ventilation, and one is preserved as an interpretation centre. Inside, I find a brief display on the site's geomorphological and ornithological features and military history, next to an inaccessible room containing a large, rusting switchboard. A sign requests information from returning veterans.

The Royal Flying Corps arrived at the Ness in 1915, irrigating the marshland to create an airfield and experimenting with parachutes, aerial photography, and bomb and machine-gun sights (Kinsey 1981). The people working here were known as the islanders, and various structures appeared

near the airfield, providing living and experimental spaces on the Street. After the First World War, the site became a bombing range for bomb ballistics tests, and a rotating-loop beacon was built as a form of radio compass for aircraft navigation (Heazell 2010). A small group came for six months in 1935, erecting large wooden aerials and secretly making the first practical demonstration of what became radar (Brown 1999). During the Second World War, the airfield was closed and scattered with concrete blocks to prevent invasion, but experimental work continued on the vulnerability and resistance of warplanes.

Continuing away from the Street, a water channel splits this part of the Ness from the shingle beyond, and as I walk towards the bridge, the flat, emptiness of the landscape creeps in on me. But not quite empty. Punctuating the space to my left are the concrete posts of the old fence of the AWRE, now unconnected. Half-hidden in the gorse and grass are strange carcasses of buildings, entrails of twisted metal, collapsed wood and jutting concrete. I notice a need to monitor and scan in both directions, slightly on guard. The bridge marks the passage onto the shingle, where the concrete and metal shapes littering its vast expanse seem even more inscrutable, but I do not go closer.

I have been following the red arrows stencilled on the ground and now they point up the steps of the Bomb Ballistics Building with the instruction: 'viewing area'. Suddenly enclosed within the building, I notice feeling a sense of relief. Up on the roof, on some days the wind sings in ghostly wails through the metal railings, and when other visitors are up here, I notice them looking at one another, unsure, letting out bursts of anxious laughter. I gaze at the panorama of ecological progression and military devastation arranged below and a huge, inexplicable ring of concrete.

The exceptional geomorphology of the Ness is one of the reasons the National Trust bought it in 1993. One of the most dynamic landforms in the United Kingdom, it changes shape through erosion and sedimentation, and much of its enormous area of shingle is vegetated along the tops of ridges running parallel to the sea. Vegetated shingle is extremely rare, its plant life depending upon the smaller shingle size along the ridge tops, and Orford Ness is the largest vegetated spit in Europe. The ridges form over many centuries and human disturbance causes irreversible damage, as I see in the barren patches driven over by military trucks.

After this view, a new immersion in the site begins. On the way down to the lighthouse at the shore, the shingle shifts and crunches underfoot, ripping through the silence and locking my attention down to the ground. Heavy legs. Mesmerized by the vast expanse of shingle marked by decaying, surreal objects, I try to pull my eyes up from my feet to look at what I had seen from the Bomb Ballistics Building, but the parallel ridges in the shingle draw me down dizzying vanishing points.



Figure 1.1. View of shingle and AWRE laboratories, Orford Ness, United Kingdom. © S. Davis

At the lighthouse, I sit on the steep bank by the sea's edge and suddenly all is lost in the roar of the water against the shingle. I grew up by the North Sea, near another of the east coast's long spits, Spurn Point, and gazing at the grey, brooding water here feels familiar, comforting. Walking along the bank, I pass debris discarded by the water, a surreal mixture, and as I reach the metal frame of the old Police Tower, I am in a daze. Eventually I reach the Black Beacon, where diagrams and photographs of the Pagodas offer a special view of these off-limits structures. These distinctively shaped AWRE laboratories were built with flat roofs atop narrow concrete columns, with the idea that they could readily collapse in case of explosion. On the Beacon's third floor, there are labelled drawings beside each of the narrow windows, fitting the site and its features into a new frame.

After the United States ended collaboration on nuclear weaponry in 1946, British efforts to restore the link hinged on demonstrating competence (Twigge and Scott 2000: 100). The remoteness of Orford Ness seemed ideal for environmental testing of the trigger mechanisms of atomic weaponry in order to ensure that bombs would go off at the right time, regardless of the changes in vibration, pressure, G-force and temperature (Cocroft and Alexander 2009). The AWRE at Orford Ness officially began in 1956 with the construction of laboratories in the shingled part of the Ness, banked by mounds of shingle to muffle accidental explosions. As the nuclear programme expanded throughout the 1950s, more laboratories appeared with progressing architectural designs, joined by control rooms and connecting

roads. The success of Britain's research programme was pivotal in bringing back American cooperation in 1958, but this also signalled the gradual decline of that research, which finished in 1971. Finally, a massive web of aerials was erected on the northern part of the Ness's spit for an Anglo-American over-the-horizon radar project, codenamed Cobra Mist. Consisting of eighteen 620 m strings, it was intended to detect far into the Soviet Union, but was mysteriously abandoned as nonviable only a year after its completion in 1973.

Back on the ground, the strange hulks that had lurked on the horizon become slowly larger as I approach the AWRE site, shingle banks gradually distinguishable from the laboratories nestling inside them. As a child, I used to play in an old pillbox at Spurn Point, broken slabs of concrete in the sand perfect for hiding, and as I near the half-hidden laboratories, I become more curious than dazed. A sign declares that the laboratories have been left to become more evocative as they ruin, and after all the shifts in mood, this suddenly seems hilarious.

The only laboratory you can get close to is Laboratory 1, just before which is its small control room, where I encounter a shining white atomic bomb. Apart from the bomb, the room contains only a few posters on the atomic testing and a label: WE177A. The bomb cuts through my mood again, leaving emptiness behind. I stare at it for some time, disturbed, my stomach suddenly concrete. Unable to process this sight, I find myself back outside, wandering into Laboratory 1. Down a dark hallway, I drift into a side room along the way, rubble on the floor, switches on the wall. Back in the hallway, paint peeling on the walls, I reach a wire fence, beyond which bright light pours in through the steel skeleton of the roof. Pipes, wires and roof trusses break into unexpected angles, fluorescent lights hang in perplexed purposelessness above a deep pit, walls and floor drip with slime and algae. After seeing so many surreal, decaying structures from the path, now I am inside one, submerged, but still half-outside.

Following its abandonment, the Ness was barely visited except by scrapmetal dealers and an eighteen-year operation to remove unexploded ordnance. Undisturbed, the decaying structures have been colonized by various types of vegetation, and barn owls breed in some buildings. The wet marshes attract redshanks and lapwings, and the shingled area is an important habitat for little terns, ringed plovers and lesser black-backed gulls. The rest of the AWRE site is barred to visitors, and from Laboratory 1 all that is left is to cut back directly to the bridge and return through the grassland to the boat. The journey back is much swifter, the structures at the same time more familiar, and yet colder, shifted in meaning by the detached, desolate mood I have sunk into: an unsettling combination. Finally, the wardens at the jetty tick my name of the list, making sure that everyone who comes here also leaves.



Figure 1.2. View of Laboratory 1, Orford Ness, United Kingdom. © S. Davis

Wild Ness

My experience at Orford Ness was one of an exposed, disorderly, uncontrolled, and wild place. Although my experiences were clearly influenced by my implicit memories, there is a sense in which they were also orchestrated by the National Trust. Orford Ness has received a lot of media attention, with one article in *The Independent* boasting: 'There really is nowhere else like Orfordness in Britain' (Rowe 2008). In this section, I explore the wildness produced and experienced at the Ness.

The type of wildness at the Ness was not an obvious choice for the National Trust. It took the Trust two years to open the site to the public, after resolving internal conflicts over what some dubbed Awful Mess. Key to establishing its current presentation were archaeologist Angus Wainwright,

regional director Merlin Waterson and historic building representative Jeremy Musson. Others thought it should be 'cleared up and the area returned to a wild state' (Wainwright 1995: 2), and the initial architectural survey suggested demolishing over sixty buildings. In Wainwright's view, 'there was no objective reason behind it, it was just this ... desire to be tidy' (personal communication, May 2006). Wainwright and Musson tried to go beyond 'gut reactions' and 'understand Orford Ness on its own terms, to appreciate the order in disorder and the beauty in ugliness' and to capture 'the essence of a landscape' (Wainwright 1996: 198–99).

Part of this essence materialized in the Trust's management plan as the aim to preserve the appearance of 'wilderness where the only moving things are normally birds and the occasional hare' (National Trust 2004: 1). In the Trust's recent 'Sprit of Place' document, Orford Ness is described as 'open, exposed and wild', 'waste yet full of life' (National Trust 2015). This sense of wildness on the expanse of shingle is retained by not allowing anyone on it and practising what The Trust calls controlled ruination, interfering minimally with the structures' natural processes of colonization and decay, and preventing reminders of their ownership of the site through discreetly stencilled path-markers and a lack of external labelling of buildings. As with any British nature reserve, however, the habitats in this wilderness are surveyed, recorded and actively managed. The property manager, Grant Lohoar, was recruited to the Ness from the Trust's most established nature reserve, Wicken Fen. At the Ness, some habitats were re-created and restored using livestock grazing as a management tool, several lagoons and shallow pools have been constructed, and winter flooding of the marshes was provided for wildfowl and summer nesting and feeding areas for other birds (Warrington et al. 2014).

The site's management sits on the border between active control and a recent shift in British nature conservation. Control at nature reserves increased from the 1950s, developing an engineering-like fine-tuning of practices that made British nature reserves among 'the most intensively managed parts of the countryside' (Marren 1994: xviii). Conservationist Peter Taylor describes an ongoing paradigm shift from conservationists protecting a nature perceived as under threat to becoming more proactive, creative and willing to rewild landscapes (Taylor 2005). New habitats are created, old ones are restored, and British conservation is beginning to embrace the importance of natural processes of landscape change – all of which can be seen at Orford Ness. This change also links to a paradigm shift in ecology towards non-equilibrium process rather than a balance of nature, elevating non-intervention to a central, positive purpose of reserves. Rewilding appears not as a nostalgic idea of returning nature to its putatively original state, but rather as boosting ecosystems' inbuilt capacity for regeneration. As with

more-than-representational theory, landscapes are seen as in a constant state of becoming.

Some have also extended the concept of natural rewilding to humans. Taylor criticizes nature conservation's separation of 'what it is to be human and what it is to be natural' (2005: 2), and in British environmental writeractivist George Monbiot's account of the 'rewilding of human life' (2013: 10), he criticizes nature conservation as having tried to 'freeze living systems in time' (2013: 8). The term 'wilderness' has been more often associated with American than British landscapes, through a sense of awe at wild nature, associated with a lack of humans (Woods 2001). Shifting the emphasis to 'wildness' and addressing this romantic separation or otherness of the wild, contemporary writers like Monbiot and nature writer Robert Macfarlane advocate finding wildness in our midst. Macfarlane's *The Wild Places* (2007), for example, maps a circular route beginning at home and ending with a new appreciation of the wild at home, via a long tour in search of it elsewhere.

The Wild Places describes landing on Orford Ness's shore and immediately sensing it was 'in a wild state', in which 'it was impossible to tell where brown desert gave way to brown sea. The horizon was lost, dissolved into a single rolling beige of shingle, sea and sky' (Macfarlane 2007: 256). Many articles on Orford Ness emphasize its wildness through a sense of emptiness, using terms like 'wasteland' (The Guardian Weekend, 24 June 1995), 'barren' (East Anglian Daily Times (EADT), 6 January 1995), 'bleak' (Independent on Sunday, 1993, Orfordness files, National Trust Suffolk Regional Office, Ipswich) or even 'the nearest you can come in England to walking in the desert' (Sunday Telegraph, 18 January 1998). Others describe it as a 'fragile wilderness' (Card 2010) or 'a bleak and desolate wasteland, pounded by waves, lashed by rain, flayed by icy winds, its desolation compounded by the sinister remains of the top-secret military experiments' (Fletcher 2016). Such writing aligns the sense of the wild with a more romantic idea of being separate from humans (Whatmore and Hinchcliffe 2010).

However, in writing like Macfarlane's, the wild Ness is drawn into what has been termed the new nature writing, denoting increasing attention to the wild in British literature in recent decades. Coincidentally, many writers prominent in this loose group are or were based in East Anglia, including Richard Mabey, the late Roger Deakin, Mark Cocker and Helen Macdonald, with whom I took my first trip to Orford Ness. Such writing typically does not set nature apart from culture, seeking to map cultures of nature seen to be as much under threat as the nonhuman world of which they are part (Smith 2013). This type of writing has a distinctly postpastoral approach, attempting not to return nostalgically to a ruralist golden age, but to repudiate such fantasies. A dual idea of wildness is central to the new nature writing, in a postprimitivist combination that recognizes the need for human interfer-

ence in nature even as it believes at some deeper level in the self-regulating capacities of the natural world (Huggan 2016: 163). With this in mind, experiences of wildness at the Ness clearly demand closer inspection.

Loneliness, Absence and Boundaries

Experiences of the wild Ness seem to hinge around a sense of isolation. This feeling relates to a sense of emptiness, signifying a sense of loss or absence, and cultural geographer John Wylie has observed the importance of placing 'absence at the heart of the point of view' (2009: 278). In visitors' descriptions of Orford Ness, the sense of wildness is related to feeling out of place. Commentaries often describe how visitors feel like an 'intruder' (Sunday Telegraph, 18 January 1998) and how it is 'hostile' (EADT, 6 June 1995) or 'both unsettling and strangely calming' (Card 2010). Others describe it as a challenging, uncomfortable place, warning that 'it's not like going for a walk along the beach' (EADT, 6 January 1995). Many writers observe a sense of solitude there, as in Kieren Falconer's (2005) article in The Guardian on this 'eerie wilderness', describing being 'left to your own devices to walk on miles of paths and usually never meeting a soul'. This sense of emptiness also comes through in Macfarlane's writing, as he opens both his book chapter and article in The Guardian on the Ness with the impactful phrase 'Lying just off the Suffolk coast is a desert' (Macfarlane 2007: 241; 2012).

The sense of loneliness goes deeper than simply not seeing many people. When W.G. Sebald explored Orford Ness on his wandering tour of Suffolk a year before the Trust bought it, he found that 'With each step I took, the emptiness within and the emptiness without grew ever greater' and that 'ahead lay nothing but destruction' (Sebald 2002: 234–35). A semi-autobiographical, semi-fictional narration of Sebald's journey was published in 1998 in English as *The Rings of Saturn*, at once a tour of the Suffolk coast and a rumination on memory, the past and, above all, destruction. The disturbing qualities of the Ness that so affected Sebald seem to continue circulating in contemporary descriptions.

In fact, a felt sense of loneliness was encouraged by the Trust's design of the route through the site, notably in the construction of the bridge over to the shingle. Wainwright describes how the original, unstable public access route was at the centre rather than the edge of the AWRE site, creating a view of buildings from left to right that he thought would 'display them to least aesthetic benefit', since 'visitors are likely to fan out in both directions causing maximum disturbance to the shingle and wildlife and maximum visual disturbance' (Wainwright 1996: 208–9). Property manager Lohoar reflected this distaste for too many people, stating: 'We don't want the place to

be inundated by orange kagouls' (cited in Mead 1995: 29). A sense of bleak wildness was therefore partly produced through aesthetically informed decisions that heighten the landscape's potential for eliciting feelings of isolation.

The Trust links isolation to reflective engagement with the site. Wainwright told me how 'my Orford Ness was just me there on my own ... It's an extremely lonely place, and it's so flat and open that you can see any movement of one person miles away' (personal communication, May 2006). The current positioning of the bridge alleviated his worry that 'nobody is going to get the experience that I had of being there on my own', a solitude he feels is necessary 'to appreciate the aesthetics and consider at length the relationship of the structures to the wildness' (personal communication, May 2006). Similarly, the Trust's Spirit of Place document asserts that: 'Lost in the vast scale you can feel liberated but at the same time oppressed and challenged' (National Trust 2015). This sense of challenge certainly seems to have reached some visitors, as in Falconer's (2005) article, where 'Bleakness has a beauty that forces reflection'.

However, as Tim Cole (2010) observed, military landscapes are layered or hybrid landscapes, resisting simple delineations like empty or destroyed. At the Ness, particular absences also affect experiences there. Walking past the gaps between the concrete posts of the AWRE site – a lost boundary no longer linked by its fence - I felt an increasing alertness and guardedness, registered as bodily tensing and scanning. On the shingle, there is no physical boundary preventing visitors from leaving the path, and yet the threat of unexploded ordnance held me strictly to it. The Trust had worried about visitors' behaviour, but it transpired that 'at Orford Ness, mysteriously, people are very well behaved; they never go off the paths, they never climb over fences' (Wainwright, personal communication, May 2006). Macfarlane registered 'warnings not to stray' in the 'military debris' of 'twisted sprays of tank tracking, a shattered concrete block, and an exploded boiler' (2007: 256). For me, this mixture of intriguing structures and feeling gripped to an unbounded path created a felt sense of being untethered. A similar sense is captured in an article describing how 'the eye kept straying' during this 'unsettling' experience (EADT, 6 June 1995).

Disturbance of boundaries multiplies on the huge expanse of shingle, where the sense of exposure combines with the felt sense of the windy weather. As journalist Kieren Falconer (2005) put it: 'It might always be winter here.' The loud noise and physical difficulty of walking on shingle affected my experience, disrupting usual bodily control and contributing to a feeling of disorientation. The boundary between inside and outside is powerfully disturbed in Laboratory 1, with its absent roof and growing interior. Finally, the AWRE laboratories seem to vacillate between characterizations, which for me was influenced by childhood experiences, whereas Andrew

Mead saw them shift from 'concrete hulks' to 'Neolithic burial mounds' and 'primitive temples' (1995: 29).

Amid these disturbed and absent boundaries, visitor experiences at Orford Ness often seem haunted by ideas of its boundedness. Remote and separated from the mainland by the River Ore, it was guarded for decades before the 1960s AWRE, when it was enclosed within a wire mesh and barbed wire fence, and watched over from a police tower with police dogs. As Sebald put it, during the Cold War, it was 'effectively no easier to reach than the Nevada desert or an atoll in the South Seas' (2002: 233). Much of what happened on the Ness is still covered by the Official Secrets Act and many who worked there are either dead, will not talk or operate on a needto-know basis. The Trust also values 'the mystique of secrecy' (National Trust 2004: 1) sustained by unlabelled, unidentifiable structures. The former secrecy of the site is a key piece of information that visitors arrive with and is always prominent in writing on Orford Ness, in which commentators express a thrill in being in an old, secret place. Macfarlane reads secrecy into the structures themselves, describing how 'enigmatic structures ... protrude from the shingle' (2007: 256). An article by journalist Martin Fletcher revels in the continuing mystique, quoting Grant Lohoar as saying: 'Officially there was never any fissile material on Orford Ness, but you pays your money and you takes your choice on that one' (Fletcher 2016). Macfarlane, too, describes how the ferryman once told him that 'The first rule of Orford Ness is never believe anything you're told about it', adding 'I didn't know whether to believe him or not' (Macfarlane 2012). The site's former secrecy seems to haunt experiences there.

The sense of haunting extends to other aspects of the site's militaryscientific past, such that the site's wildness tangles with its militarization. Writing in The Guardian in 1995, David Newnham found Orford Ness 'nothing short of sinister', describing the AWRE labs as 'ruins that haunt the shingle with their glowering presence'. More recently, another journalist felt 'the air is still charged with an undercurrent of Cold War menace' (Watkins 2009), and artist Emily Richardson (2009) found it 'quite otherworldly'. Visitor services warden Duncan Kent wrote about 'the juxtaposition of wild remoteness and fascinating but disturbing history' (Kent 2010). For Macfarlane (2012), 'the site still feels militarised' and disturbed boundaries are evident when he writes of '[a]n eerie and intricate landscape, then, in which the military and the natural combine, collide and confuse'. In The Wild Places, Macfarlane describes the disconcerting realization that he was seeing various aspects of the landscape through a militarized lens, so that 'A hare exploded from a shingle divot' and 'Green and orange lichen camouflaged the concrete of pillboxes' (2007: 257). Militarized perception also comes across in an article by journalist Martin Fletcher, who sees the Cobra Mist building resting 'on stilts in the marshes like a stranded battleship', while elsewhere 'Brambles coil and curl like the barbed wire they replaced' (Fletcher 2016). Experiences of wildness at the Ness are clearly enmeshed with its militarization.

The disrupted boundaries and haunting militarization echo the approach of the new nature writing. There, the wild is bound up with an ecological awareness of the porous boundary between inner and outer worlds; it is associated with a messy, confused, violent and unruly state, recalling primordial states even as it acknowledges the impossibility of restoring or being able to access them. In contrast to a nostalgic view, this is a postpastoral, postprimitivist approach. Krupar saw continued militarization in arsenal-asnature-refuge stories, and Rachel Woodward has described a crater as habitat discourse in military environmentalism, denoting portrayal of coincidence of conservation and military activities. Although a similar process of the militarization of nature is at work at Orford Ness, the sense of haunting there shifts the experience. Wylie (2007b) argues that haunted, spectral places house a circling, transforming temporality. Discussing the spectral places narrated by Sebald – for whom place seems to rely on a sense of dislocation or a sudden uncertainty regarding location – Wylie sees 'a confounding of past, present and presence all witnessed by a troubled, stricken figure' who is haunted by this process (Wylie 2007b: 181). Haunting and destruction are particularly evident in Sebald's descriptions of the 'extra-territorial quality' of Orford Ness (2002: 233). At that time, Orford Ness had not yet come under the Trust's ownership, but its militarized, haunted, circling temporality seems to have survived its transition to a managed heritage site.

Decay, Movement and Destruction

Adding to those features, the decaying structures and slow movements at Orford Ness also shape experiences of this landscape. Although aesthetic appreciation of ruins and decay is not new, there is increasing popular interest in contemporary ruins, which some attribute to the reduced chance of things ageing within turbo-capitalism (Huyssen 2006). Tim Edensor (2005) suggests that industrial ruins offer an escape from excessive order, as marginal spaces in which you can see and feel things you usually cannot. Dylan Trigg (2006) also argues that the porous boundaries of contemporary ruins subvert the familiarity of everyday life. The decay at the Ness works together with the other disrupted boundaries there.

Critics accuse photographers of decay of objectifying empty buildings and accounts of deindustrialization of a creeping nostalgia (Cowie and Heathcott 2003; Strangleman 2013). By contrast, the Ness simultaneously

is and is not an example of economic disinvestment. Although it was abandoned in the 1970s, the National Trust raised the hefty sum of £3.5 million to purchase and endow the site (Heazell 2010: 231). Too much for the Trust alone, this sum was achieved with grants from the Enterprise Neptune Fund, the Department of the Environment's Derelict Land Fund, the National Heritage Memorial Fund, and the County and District Councils. It is a managed ruin. This aspect struck journalist Greg Dickinson (2018), whose discussion of 'ruin porn' used the intentional decay at Orford Ness to describe an 'enriching' place, where 'the innocence of wildlife and the destruction of humans intertwine, which feels like a work of art in itself'. Again, military history combines with the process of decay in the site's affective quality.

The intentional decay at the Ness seems to afford a particular form of temporality. It is a place where processes are valued. As Wainwright told me, 'the actual process was worth preserving, so that you could actually come to Orford Ness and see the process of decay' (personal communication, May 2006). The conservation of built structures usually constrains processes: 'That's what the National Trust does; it decides buildings are important and how they're going to stop them falling down. So it was a pretty difficult conceptual decision to take' (Wainwright, personal communication, May 2006). The Trust's Jeremy Musson stated that these 'modern ruins' are 'as historic and as dramatic in their own way as the twelfth-century castle in Orford village' (Hills 1994: 2), and an article in The Telegraph quoted Duncan Kent as saying: 'The sense of dereliction adds to the atmosphere' (Watkins 2009). These ruins are treated as an 'extraordinarily powerful monument to the Cold War' (Suffolk Life, 16 May 1994), and the AWRE buildings were officially listed as a Scheduled Monument in 2014 following a survey by English Heritage (Cocroft and Alexander 2009; Historic England 2014).

In his history of public monuments, Sergiusz Michalski (1998) describes how from about 1950, designs tended increasingly towards abstract forms and themes of disappearance, using negative or semi-visible forms. Michalski roots this trend in an attempt to deal with the unprecedented scale of death and to redress the feeling that political public monuments have become meaningless. Although many ruins have been preserved as memorials, it is more unusual to invoke the process of decay, which refers more emphatically to disappearance. Laurie Clark (2015) argues that contradictions emerge when ruins are used to commemorate trauma, since they are palimpsests, layered with a multiplicity of satisfactions alongside our condemnation or reflection, and Silke Arnold-de Simine (2015) suggests that when ruins are memorials, they allow not only melancholic reflection, but also actual mourning to take place. Anthropologist Susanne Küchler (1999) argues that monuments referring to their own absence prompt a different form of remembering than memory as a metaphorical connection of a lost present to

a desired future in the image of the past. She describes this other form of remembering as akin to a momentary collapse of the past, future and present into a single point: the present is animated with a sense of the past. Drawing on Küchler, Caitlin DeSilvey discusses ruins as artefacts as process, suggesting that they allow a mode of remembrance to take place 'that is erratic and ephemeral – twined around the past and reaching imperceptibly into what has yet to come' (DeSilvey 2006: 328).

Intentionally allowing the process of decay at Orford Ness resists the nostalgic tendency to imbue the past with the idealized air of a golden age. The continually changing nature of ruins forces them into the present. This sense of constant becoming also corresponds with more-than-representational theories. Wylie refers to the spectral quality of places as ushering in an 'endless process of returning, without ever arriving', making an 'unsettling complication of the linear sequence of past, present, future' (Wylie 2007b: 171). For DeSilvey (2017), Orford Ness is an example that ruination does not have to be associated with failure and neglect, but can be an impulse to ask ourselves what we can learn from the changes. Nadia Bartolini and DeSilvey (2019) have also used film to explore a community archaeology project at the Ness, finding that losses along the coastline emerge as a process of discovery.

In addition to decay, other slow processes influence experiences of the Ness. Visitors read about the constantly changing shape of the spit in the interpretation centre and the slow, incremental growth of the vegetated shingle ridges. Gesturing to these ridges, on top of the Bomb Ballistics Building, Lohoar told my guided tour that we were really seeing a pictorial history of the evolution of the land site. He told this to journalist Martin Fletcher (2016) too, who wrote how each of the long ridges 'was the crest of an ancient beach formed by storms as the Ness stretched southwards - the littoral equivalent of the rings of a tree'. A sense of awe about these ecological timescales also affected Falconer (2005), who felt that: 'Even just stepping on [the shingle] can crush a hundred years of evolution.' The National Trust views this ecological timescale as being in tension with human activity, stating that 'timeless natural processes contrast with the transitory man-made dereliction' (National Trust 2006: 17). A different understanding comes through in Macfarlane's writing, synthesizing various senses of time. On the Bomb Ballistics Building, Macfarlane found the 'landscape's own logic became more apparent', describing the long shingle ridges as 'the Ness's storm-born growth rings' (2007: 257). As with Fletcher, the organic nature of the shingle spit comes to the fore. From this vantage point, the tracks of the bomb disposal unit's vehicles are also clear, cutting across the ridges and the green strips of vegetation along their tops. Whereas Lohoar describes these tracks in terms of destruction, Macfarlane sees these marks of 'the desert's decontamination' differently. He describes how: 'The man-made lines and the storm lines

swooped and arced and intersected with one another, to create a single vast fingerprint of shingle, stretching as far as I could see' (Macfarlane 2007: 257). Exemplifying the new nature writing's refusal to separate nature and culture, different histories of the Ness now appear as part of one whole.

The visitor's own slow movement also affects experiences of this landscape, spread over several hours of walking. For Wainwright, 'only during the long walks between the buildings is their monumental scale appreciated. As they loom larger and larger the anticipation grows; this slow process is one of the attractions of the place' (1996: 206). The Trust's positioning of the bridge onto the shingled area and the marked pathway across the shingle ensure a long, slow approach to the AWRE laboratories. Appreciating the buildings' 'overbearing' scale is important to Wainwright, and works with the exposed landscape such that 'the individual can feel overpowered and reduced in their presence' (Wainwright 1996: 206). He told me that because 'everything went underground' in the Cold War, 'there really isn't anywhere else in the country where you can visit such monumental symbols' (Wainwright, personal communication, May 2006). The Trust presents the structures as emblematic of twentieth-century warfare's 'systematic application of scientific principles to the development of weapons and warfare', which resulted in the possibility of total war (National Trust 2006: 23).

The idea of destruction brings a different meaning to the decay and absences at the Ness. In Wainwright's exhibition notes, 'it is only in the sweeping vistas of the atomic weapons test laboratories that we can feel the awesome destructive power of modern weapons' (The Guardian Weekend, 24 June 1995). This imagined destruction pulls Wainwright's ruins into Trigg's (2006) understanding of contemporary ruins, whereby they are close enough to the present to mirror an alternative past/present/future, the derelict structures both testifying to a failed past and reminding us that the future may end in ruin. Sebald's narrator imagined Orford Ness as a post-apocalyptic landscape: 'The closer I came to these ruins, the more any notion of a mysterious isle of the dead receded, and the more I imagined myself amid the remains of our own civilization after its extinction in some future catastrophe' (Sebald 2002: 237). Although decay and ruins have often been treated as fitting the picturesque tradition (Fassi 2010), Trigg aligns them with a postindustrial sublime, which he sees as inextricably bound up with how ruins challenge the idea of rational progress. Steven High and David Lewis (2007) also coin the term 'deindustrial sublime' for former industrial ruins, interpreting their appeal as going beyond nostalgia to show responses to the huge disruptions of globalization.

In 2004, the National Trust acquired the WE177A atomic bomb now at the site. The bomb stands remarkably free of interpretation, in a room otherwise bare, apart from six photographs. After the slow walk through slowly decaying ruins, the glistening white bomb is one of the few objects not decaying. It can prompt imagining future destruction, which clearly disturbed Falconer (2005): 'The idea that such obliteration can come from such a small piece of metal is unnerving.' The bomb seems to act as a metaphor for the site's own ruin, propelling my imagination to figure the bleak land-scape at Orford Ness as Sebald had: a post-apocalyptic wasteland. The idea of the site's emptiness takes on a new meaning upon encountering the bomb, which works to disrupt nostalgic appreciation of this modern ruin.

Conclusion

Experiences at Orford Ness hinge on a perception of wildness, connected to feeling out of place and to a sense of emptiness. Disturbed boundaries recur at many levels, and Orford Ness seems haunted by ideas of its boundedness. This haunting is linked to the site's continued militarization, encouraging its wildness to be experienced in violent, militarized terms. This combination resonates with the new nature writing's postpastoral, postprimitivist approach to nature rather than a nostalgic approach. The site's spectral qualities also work together with the intentional processes of decay and the slow movements there, creating a circling temporality, which is further destabilized by the encounter with the bomb. Experiences of the site seem redolent with a sense of continual becoming rather than a nostalgic separation, making Orford Ness an intriguing place in which to observe more-than-representational theories' ongoing, performative shaping of self and landscape.

Sophia Davis completed her doctorate at the University of Cambridge on narratives of Englishness and isolation through interweaving twentieth-century histories of militarization, countryside, nature conservation and national heritage, published as *Island Thinking: Suffolk Stories of Landscape, Militarisation and Identity* (2019). She was subsequently a research scholar at the Max Planck Institute of the History of Science, Berlin, and is currently working on a book on somatic therapies and their histories.

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