Echoes in the Desert: Digging Out the Disappeared in the Digital Age

Irina R. Troconis
Cornell University

Abstract

This article explores the relationship between new media, memory, and materiality, through an analysis that focuses on three digital projects: Marco Williams's *The Map of the Undocumented,* Ivonne Ramírez's *Ellas tienen nombre* ("They have a name"), and John Craig Freeman's *Border Memorial: Frontera de los Muertos*. These projects were developed in response to the migration crisis at the US/Mexico border and Ciudad Juárez's feminicide. Taking advantage of the possibilities offered by "thick mapping" and augmented reality, they locate and give visibility to the migrants who have died while crossing the Arizona desert (*The Map of the Undocumented* and *Border Memorial*), and to the hundreds of girls and women who have been murdered in Ciudad Juárez since 1985 (*Ellas tienen nombre*). Drawing from the works of Gabriel Giorgi, Judith Butler, Doreen Massey, and Avery Gordon, this article argues that the three projects store, mobilize, and memorialize "digital remains" that produce a form of spatial and temporal disorientation, complicating distinctions between presence and absence, materiality and immateriality, and proximity and distance. Through operations of haunting and re-membering, these remains make users "lose their grounding" and, in the process, become affected by others who, though anonymous, physically distant, missing and/or dead, feel familiar, proximate, and urgent. They thus shed light on new cartographic practices that productively reconfigure our understanding of memory, space, and global ethics, and that invite us to consider what a "geography of care and responsibility" could look like.

Keywords

memory, digital mapping, haunting, re-membering, feminicide, migration

Introduction

In *Rupture of the Virtual*, John W. Kim argues that the emphasis on the virtual in media research has occluded insights into the status of the material, and that it is imperative that we rethink "the origin of computing interfaces with an emphasis not on their construction as a virtual window, but on enhancing knowledge of those things in one's immediate physical environment" (3). He proposes that, rather than seeing the material as subject to colonization by informational processes, what is needed instead is "an analysis that recognizes with more complexity our interaction with the material" (Kim 86). This article purports to develop such an analysis through an exploration of three digital projects where the virtual and the material engage in complex, unexpected, and subversive ways: Marco Williams's *The Map of the Undocumented* (2013), John Craig Freeman's AR project *Border Memorial: Frontera de los Muertos* (2012), and Ivonne Ramírez's digital map *Ellas tienen nombre* ("They have a name") (2015).

Williams's *The Map of the Undocumented* is part of the website theundocumented.com, which also includes Williams' documentary *The Undocumented* (2013) and the single-player simulation game *The Migrant Trail* (2014). Together, these resources draw attention to the more than two thousand corpses and skeletal remains of undocumented border crossers that, since 1998, have been found in the desert in southern Arizona. *The Map of the Undocumented* shows the location of the remains, identified by black crosses (see fig. 1) that appear on the map and that, if clicked on, reveal available information regarding the deceased and, in some cases, also images of personal effects and objects found with the remains. Using the data

collected by the grassroots organization Coalición de Derechos Humanos—which, in turn, uses

data from the Tucson Medical Examiner Office[1]—the virtual cemetery "stores" remains found

between 1981 and 2020, and continues to add crosses as new remains are discovered every
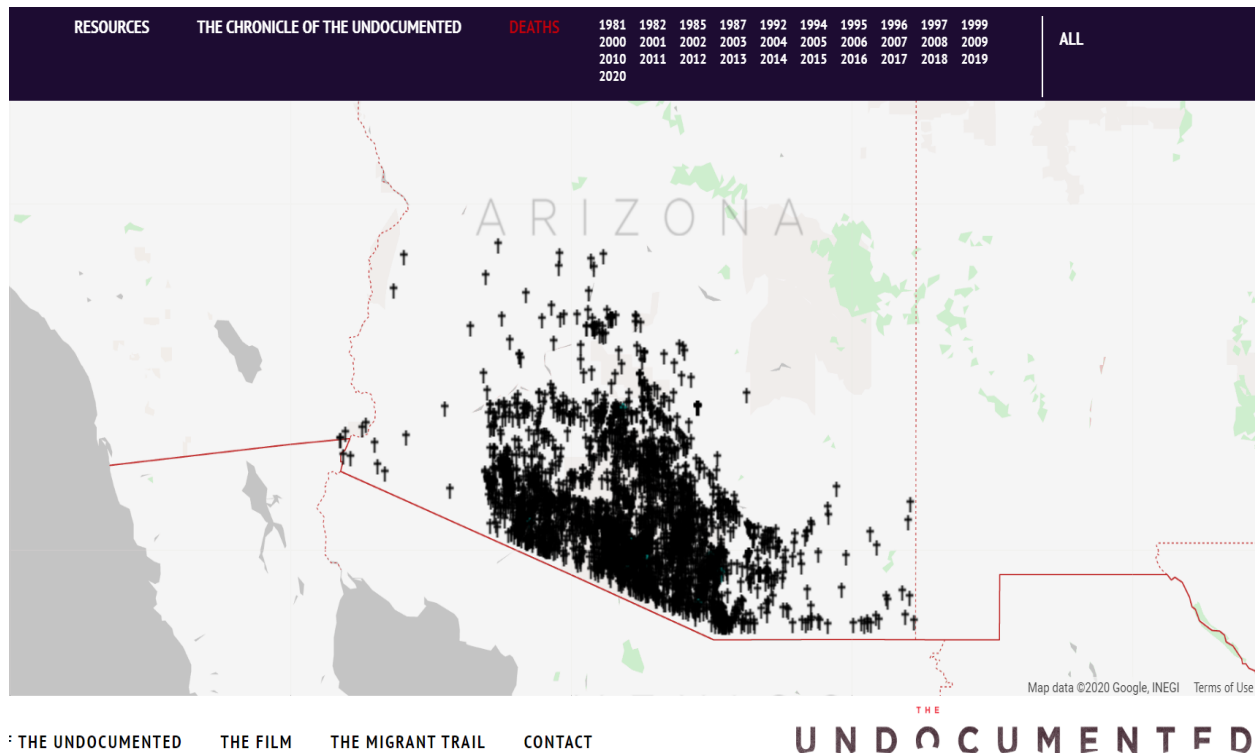
day.

Fig. 1. *The Map of the Undocumented* by Marco Williams, http://theundocumented.com/, created by Operation CMYK, 2013. Accessed October 12, 2020. Published with permission of Marco Williams.

Similarly, Freeman's *Border Memorial: Frontera de los Muertos* is an Augmented

Reality public art project and memorial dedicated to the migrant workers who have died along

the US/Mexico border. The project includes an application for mobile devices that, once

downloaded, uses geolocation software to allow the visualization of each place where human

remains have been recovered. To mark the location, Freeman uses a virtual augmentation of a

calaca: a skeleton used in commemoration of lost loved ones during Mexico's Día de los Muertos (see fig. 2). The calacas appear on the screen of the phone "floating" above the desert: digital ghosts that, at once visible and invisible, "haunt" the users with whom they share the space.

Fig. 2. *Border Memorial: Frontera de los Muertos*, augmented reality public art, Lukeville AZ, John Craig Freeman, 2012. Courtesy of the artist.

Lastly, *Ellas tienen nombre* is a digital map created by Mexican activist Ivonne Ramírez in 2015, where red dots mark the location of women murdered in Mexico's Ciudad Juárez since 1985 (see fig. 3). On the website, the map is described as a "digital cartography of feminicide."[2] Under "Enlaces Relacionados," it provides links to similar maps created in other Mexican cities and in other countries. Unlike *The Map of the Undocumented*, clicking on the dots not only informs the users of the name, cause of death, and location details of the victim,

but it also includes the exact date and day of the week when the body was found, whether

anybody has been held accountable for the crime, a photo of the location, and a "descripción."

This description reads as a narrative that turns the facts provided into a story that, in some

cases, includes details about the victim's life and about the perpetrator.

Fig. 3. Screenshot of digital map *Ellas tienen nombre*, 2015. https://www.ellastienennombre.org/mapa.html. Accessed October 12, 2020. Published with permission of Ivonne Ramírez.

In these three projects, material environments are mediated and complicated by the

digital platforms that make it possible to perceive the lingering *presence of absences* that

impinge upon us. The platforms destabilize not only our sense of space—where we are and

whom we are with—but also our sense of self, and the responsibility we have towards "others"

who, though long gone, we feel near and urgently present. As we perceive their presence, a

question arises: what do we owe to them?

The possibility of asking this question and the burden that, once formulated, it places on the users who engage with the three projects from their computer and cellphone screens invite us to consider these projects in connection with questions of memory and, more specifically, with Andreas Huyssen's suggestion that we think of the past as "memory without borders rather than national history within borders" (4). This "memory without borders" arises partly in response to the development of new technologies that blur geographical boundaries and create a sense of proximity with others. The ubiquity of these types of interactive communication technologies, as Andrew Hoskins argues, make this generation "the most accountable generation in history" (3).

In what follows, I argue that these three projects effectively create a "memory without borders" where remembrance is not (only) connected to acts of commemoration but operates through the production of "digital remains." These digital remains dislocate time and defamiliarize space, challenging not only how we perceive and engage with the materiality of space—to go back to Kim's argument—but also how we engage with the devices such as computers and cellphones that, as Jason Farman points out, have become "so commonplace that [we] rarely take notice of them" (5), let alone of the systems of violence that enable their production. As they link remembrance to a digitally enabled form of disorientation that, I propose, creates a virtual community of the living and the dead, these projects ultimately offer us a point of departure to think of what it would mean to be part of what Doreen Massey calls a "geography of care and responsibility" (201). To begin our exploration of these projects' approach to memory, we will start by examining a more traditional memorial, and the challenges it faces when the bodies it aims to memorialize are "more or less dead."

More or Less Dead

Though sculptures and monuments have doubtlessly played a key role in the memorialization of victims of tragedies spanning centuries, it is worth asking whether an object that is presumed stable and permanent can accurately represent the reality of the Ciudad Juárez ongoing feminicide,[3] or of the ever-growing number of migrants who die trying to cross the US/Mexico border. This question in fact frames current discussions about the "Flor de arena" ("Sand Flower") memorial, created by Chilean artist Verónica Leiton and located in Ciudad Juárez's Campo Algodonero, where the bodies of eight women were found on November 6, 2001. The discovery of these bodies made international headlines and led the Inter-American Court of Human Rights to find the Mexican state guilty of denying justice to the victims and their families in November 2009. The Court ordered the Mexican government to build a memorial for the victims of feminicide in Ciudad Juárez, and for the memorial to be inaugurated as part of the ceremony where the state would publicly acknowledge its responsibility for the killings. The inauguration took place in 2011, two years after the Court's sentence; in those two years, over three hundred women were killed, and many more have continued to die since, and not just in Ciudad Juárez. In fact, it is estimated that from 2015 to June 2019, over three thousand women have been murdered in Mexico (Hernández).

The memorial—a bronze sculpture[4] of a young woman looking up at the sky and emerging from the petals of a desert rose bearing the names of fifteen hundred women—was criticized by a number of relatives of the victims, who chanted, "We don't want a monument, we want our daughters. They were taken alive, we want them back alive," a cry that revealed their outrage at the use of state funding to build a memorial rather than to open new investigations and search for the missing women. The current state of the memorial appears to validate their claim; an article published in the Mexican newspaper *La silla rota* on October

2019 argued that the memorial seemed to have failed in its efforts to preserve the memory of the victims of feminicide ("Borran memorial"). Not only does it look abandoned and unkempt, but it rarely receives any visitors. It thus serves as a distraction from the state's refusal to acknowledge and actively take responsibility for the ongoing disappearances, which, according to the article, is also evinced in the fact that the posters for the missing women that the families print and place all over the city are quickly taken down, the illusion of normality protected and preserved. There is thus an act of erasure and invisibilization that occurs in the act of remembrance staged by the memorial—and by the state that funded it—and that evokes "the politics of the corpse" (Giorgi 199).

According to Gabriel Giorgi, at the center of systems of power that claim to defend and protect life, there is a "politics of the corpse" dictating which corpses are memorialized and which are destroyed so that they lose their ties to the community and become "something" like an object or an animal. The former are thus considered "persons": lives that not only deserve protection but that also deserve to be remembered as being part of a community. The latter, the "non-persons," refer to lives whose deaths are insignificant to the community and who do not enter the realm of collective memory. Among the examples of "non-persons" that Giorgi analyzes are the women murdered in Ciudad Juárez and the representation of their deaths in Roberto Bolaño's posthumous novel *2666* (2004). Looking at "La parte de los crímenes"—a chapter that describes in detail the discovery of 109 corpses of women in the fictional town of Santa Teresa[5]—Giorgi proposes that Bolaño's narrative illuminates the abandonment in which the women find themselves, in a space "that does not offer them shelter or protection, nor inscription or location: an empty social space, stripped of institutions and symbolic belonging" (216). In that space—the desert of Santa Teresa/Ciudad Juárez—the bodies of the women are

often confused with street dogs and found in the trash, their status as "non-persons" thus

confirmed by their "thingness," which ultimately prevents them from becoming the subjects of

rituals of memorialization that would render their ties to the community visible, meaningful,

and lasting.

Giorgi's conceptualization of "non-persons" underscores not only the gender-based

precariousness that women in Mexico endure,[6] but also the particular kind of vulnerability that

characterizes migrating bodies working in and moving across border areas such as Ciudad

Juárez[7] and the Arizona desert. The desert is, after all, a space of debilitating exposure: an arid

land of unbearable heat that offers no shelter and no sense of belonging. This is particularly the

case in the context of the border, where the desert becomes the stage for a form of national "in-

betweenness." In that stage, migrating bodies become "figures passing through" or, as Giorgi

points out, "anonymous or semi-anonymous bodies" who have lost their connection to their

families, communities, and home countries: "floating bodies, 'loose' in the border" (my trans.;

215). The death of these bodies leaves behind corpses that are often never found and/or never

claimed, and that are thus "swallowed" by the desert, condemned to being, as Bolaño proposes,

"más o menos muertos" ("more or less dead") (779-780).

In fact, the vastness of Arizona's border with Mexico makes it impossible to find a

substantial percentage of the remains of the migrants who have attempted to illegally cross it

and died in the process. Furthermore, even when remains are found, there is no guarantee that

they will be identified, or that someone will claim them and give them a proper burial.[8] It is

also worth noting that, unless there are relatives looking for their loved ones, the task of

combing the desert to find the bodies of missing migrants falls exclusively on non-profit

organizations like Águilas del Desierto and the search operations that they organize every

month in the areas of Arizona, Texas, and California. Reflecting on the experience of routinely finding bodies, Pedro Fajardo, one of the volunteers of the Águilas, describes the desert as "a gigantic cemetery" and notes that, if "[they] went looking for bodies every day, [they] would find them" (my trans.; King).

Fajardo's categorization of the desert as a cemetery is both illuminating and inaccurate. It productively transforms what, from a spatial as well as conceptual distance, appears to be an empty, homogenous surface into a layered and uneven territory that becomes uncanny both because it contains human remains in various states of decomposition and because those remains can "appear" unexpectedly. The inaccuracy of the comparison lies in the fact that, in the context of cemeteries, to be buried means to be part of a ritual of memorialization that recognizes that a life has been lost and honors it by giving it a proper place to rest. In the desert, however, being buried does not equate to being remembered; as Fajardo points out, there are hundreds of bodies that will never be found, and hundreds of rescued bodies whose identity will never be known. Similarly, in the context of the Ciudad Juárez feminicide, there are families that will never find the bodies of their loved ones, and bodies that will be found but will never be claimed. Both the immigration crisis at the US/Mexico border and the Ciudad Juárez feminicide thus produce dead without bodies, bodies without names, and bodies out of place: the "more or less dead" that are simultaneously present and absent, remembered and forgotten, and that therefore resist the stabilizing power and closure monuments and memorials offer.

The question thus becomes: how should we remember the "more or less dead"? More specifically, how do we memorialize the victims of two tragedies that are ongoing, and that are both local and global?

Haunted Spaces

In order to remember the "more or less dead" and to engage with the presence of absence, aesthetic strategies are needed that stage "an alternative form of temporality that emerges from the corpse, and that cannot be reduced to the temporality of mourning or to the biological time of the body" (my trans.; Giorgi 203-204). In this alternative temporality, human remains oscillate between organic and inorganic matter, the body and the thing, and various forms of inscription and signification.

This alternative temporality of remembering is expressed in the two digital maps and in Freeman's *Border Memorial.* In fact, we could argue that all three projects share the goal of ensuring that remains *remain*: that they stay in the place where they were found *even after* they have been taken to the morgue and delivered to their families. The crosses in *The Map of the Undocumented*, the skeletons in *Border Memorial*, and the red dots in *Ellas tienen nombre* thus transform the space of the Arizona desert and of Ciudad Juárez into a space of echoes. The body stays and creates a void with a presence that is registered in the digital maps. Yet, the body also moves, and not only across spaces—as when it is taken to the morgue or buried by its loved ones elsewhere—but also across times, thanks to the stories told in the platform of *Ellas tienen nombre*, which, whenever possible, include biographical details: who the woman was and how her death affected and will affect those around her. Many bodies also move outside both human and nonhuman times for, though suspended in the limbo of their anonymity, in these projects, unidentified remains are still given a place where they can stay and demand to be acknowledged.

The projects thus transform human remains into "digital remains" that occupy a space of temporal and spatial in-betweenness. They are there—as proven by the geographical

coordinates provided in all three projects—but they are also elsewhere; they are unforgettable but also uncontainable by rituals of burial and gravestones that would give closure to their deaths; they are corporeal but also virtual. As such, they introduce an element of chaos and disruption into the space of the desert that resonates with Doreen Massey's conceptualization of space in terms of the unexpected and unpredictable:

> [The] relationality of space together with its openness means that space also always contains a degree of the unexpected, the unpredictable. As well as loose ends then, space also always contains an element of "chaos" (of the not already prescribed by the system). It is a "chaos" which results from those happenstance juxtapositions, those accidental separations, the often paradoxical character of geographical configurations in which, precisely, a number of distinct trajectories interweave and, sometimes, interact. Space, in other words, is inherently "disrupted." (315)

This unpredictability defines the interactions that occur with the remains both in the Arizona desert and in Ciudad Juárez, where the bodies are found unexpectedly, surprising even those who are purposefully looking for them. The disruption, however, is short-lived; the quantity of the bodies and the frequency with which they appear gives an illusion of normalcy to the unpredictable that ultimately makes the bodies quietly vanish into the barely visible cracks of the status quo. Freeman's project and the digital maps, however, reactivate the unpredictable nature of space by registering not only the remains themselves but also the way they move across time and across space, which turns the latter uncanny in a way that forces us to challenge our certainty regarding what we can and cannot see, what (and who) is and is not there, and, more broadly, the value we place on visibility. In other words, the three projects represent the Arizona desert and Ciudad Juárez as *haunted*.

Haunted places are not exceptional. In fact, Michel de Certeau argues that "[h]aunted places are the only ones people can live in …" (108). Similarly, María del Pilar Blanco and Esther Peeren remind us that "places are simultaneously living and spectral, containing the experience of the actual moment as well as the many times that have already transpired and become silent—though not necessarily imperceptible—to the present" (395). To emphasize their point, del Pilar Blanco and Peeren turn to Toni Morrison's *Beloved* (1987), quoting Sethe's insistence that "places are still there," and her warning to her daughter Denver that "if you go there and stand in the place where it was, it will happen again; it will be there for you, waiting for you" (395). In the work of these authors, the knowledge that "places are still there" is mostly affective: silent but not imperceptible, it becomes an intuition that succeeds at disorienting without having to visibly and objectively manifest itself. However, "thick mapping" initiatives take this knowledge one step further, mobilizing digital technologies to re-present space as temporally layered.

In *HyperCities: Thick Mapping in the Digital Humanities*, Todd Presner, David Shepard, and Yoh Kawano ask: "What if the many, competing pasts saturated in a single place could be mapped onto and along streets, neighborhoods, and territories? What if, following Edward Casey, culture was reconnected to place and the movement of bodies in space and through time?" (53). These questions arise in response to the spatial turn in the humanities, a turn they trace to the publication of Edward Said's *Culture and Imperialism* in 1993, when cultural criticism started to "affirm both the primacy of geography and an ideology about the control of territory" (Presner et al. 78) in order to fully appreciate and critique the intersecting forces of nationalism, imperialism, and colonialism. Though this turn has led to many approaches analyzing and mapping the imbrication of culture, power, and space, Presner,

Shepard, and Kawano point out that only recently has there been a fundamental rethinking of the *medium* used to theoretically trace and display such imbrication due to the possibilities offered by new technologies and, specifically, by "thick mapping." They define "thick mapping" as "the processes of collecting, aggregating, and visualizing ever more layers of geographic or place-specific data" (17). Thick maps embody temporal and historical dynamics "through a multiplicity of layered narratives, sources, and even representational practices" (17) and, as such, operate by temporal and spatial simultaneity and juxtaposition.

The layered interface of thick maps gives visibility to places "erased" by the passage of time and proposes a way of experiencing space through personal narratives. A similar interface is used to visibly saturate the space of the Arizona desert and Ciudad Juárez with the digital remains of bodies who have disappeared, were killed, or died as they traversed the precarious land of the border in the three digital projects that concern us. The result of this digitally enabled haunting is the transformation of the maps from "expertly produced, measured representations … conventionally taken to be stable, accurate, indisputable mirrors of reality" (Bissen) into tools that invite us to question reality and doubt what we can perceive and what we consider meaningful.

It is in this sense that the two digital maps and Freeman's *Border Memorial* may produce the uncanny: as at once an absence and a repetition and return of the same (Freud 11). The three projects assign the same figure—a skeleton, a cross, and a red spot—to each of the bodies found, thus creating an overwhelming "crowd" of the digital dead that produces a sense of disorientation where the familiar is no longer so and where repetition is not comforting (see fig. 4). Consulting the maps and using Freeman's application thus end up being less about identifying the exact location of the remains—though this is still a key function of the

projects—and more about producing a way of experiencing reality "not as cold knowledge, but as transformative recognition" (Gordon 8).

Fig. 4. *Border Memorial: Frontera de los Muertos*, data visualization, John Craig Freeman, 2010. Courtesy of the artist.

This "transformative recognition" is what Avery Gordon argues is the meaning of being haunted. In *Ghostly Matters*, she proposes haunting as resisting a certain postmodern hypervisibility that reduces individuals "to a mere sequence of instantaneous experiences which leave no trace, or rather whose trace is hated as irrational, superfluous, and 'overtaken'" (20). As a social figure, the ghost meddles with taken-for-granted realities, revealing what hides in society's blind spots. Similarly, the skeletons, red dots, and crosses in the three digital projects are not just signs indicating the loss of a dead or missing person. As digital remains, they become the shapes of an absence that point us to something that is there and not there at the same time, and that, as such, becomes a ghostly trace that enables the past to spill into the

present, destabilizing spatial and temporal boundaries. This is best exemplified in Freeman's

Border Memorial, which makes the user who navigates the Arizona desert both see and un-see

the bodies of the dead migrants.

Fig. 5. *Border Memorial: Frontera de los Muertos,* screenshot series, Southern Arizona, John. Craig Freeman, 2012. Courtesy of the artist.

Holding the phone with Freeman's application at eye-level, the user finds herself

surrounded by floating skeletons (see fig. 5); without the phone, the desert reappears as an

empty, undisturbed space. What changes in the process of seeing and un-seeing, then, is our

way of reading space: what we see is not always what is there, what is there is not always

visible, and what is invisible is rarely insignificant. This leads, as Gordon points out, to a

transformative recognition that ultimately invites us to ask not only where we are, but also—

most importantly—where do we fit in this space, and what does this space mean to us? The

possibility of asking these questions engages the users of these maps in acts of re-membrance.

Re-membering

In *The Location of Culture*, Homi Bhabha notes that remembering "is never a quiet act of

introspection or retrospection. It is a painful re-membering, a putting together of the

dismembered past to make sense of the trauma of the present" (63). Bhabha's

conceptualization recalls the violence that tears bodies apart psychologically, emotionally, and

physically. The "dismembered" past he speaks of has a bodily quality that vividly evokes the

violence endured by the murdered women and girls from Ciudad Juárez—many of whom were

decapitated or had other parts of their bodies torn off—and by the migrants crossing the

Arizona desert, whose remains are often found incomplete. The digital maps and Freeman's

memorial acknowledge this state of dismemberment and make re-membering, as Bhabha

conceives it, central to their operations.

In Freeman's *Border Memorial,* the remains are transformed into life sized, three-

dimensional models of a skeleton, which rotates and floats off into the sky when viewed with a

mobile device. These calacas serve to both render the body "complete" in medical terms—

every bone is accounted for—and to insert it in the tradition of the Mexican Day of the Dead,

thus making it part of a community and of a ritual of commemoration. *The Map of the*

Undocumented "buries" each body in a virtual grave represented by a black cross, which, if

clicked on, informs the users of the name of the deceased—if they have been identified—and

cause of death. This information constitutes an effort to give the remains back their identity,

thus making it easier for families to claim their dead and honor their memory. Lastly, *Ellas*

tienen nombre uses the section titled "description" to put together, whenever possible, the

pieces that constitute the life that the woman had before she was killed (see fig. 6). Recovering

the body and providing the basic information that would make it identifiable is not enough; the

user must not only know that a life was lost but also recognize that it was, as Judith Butler
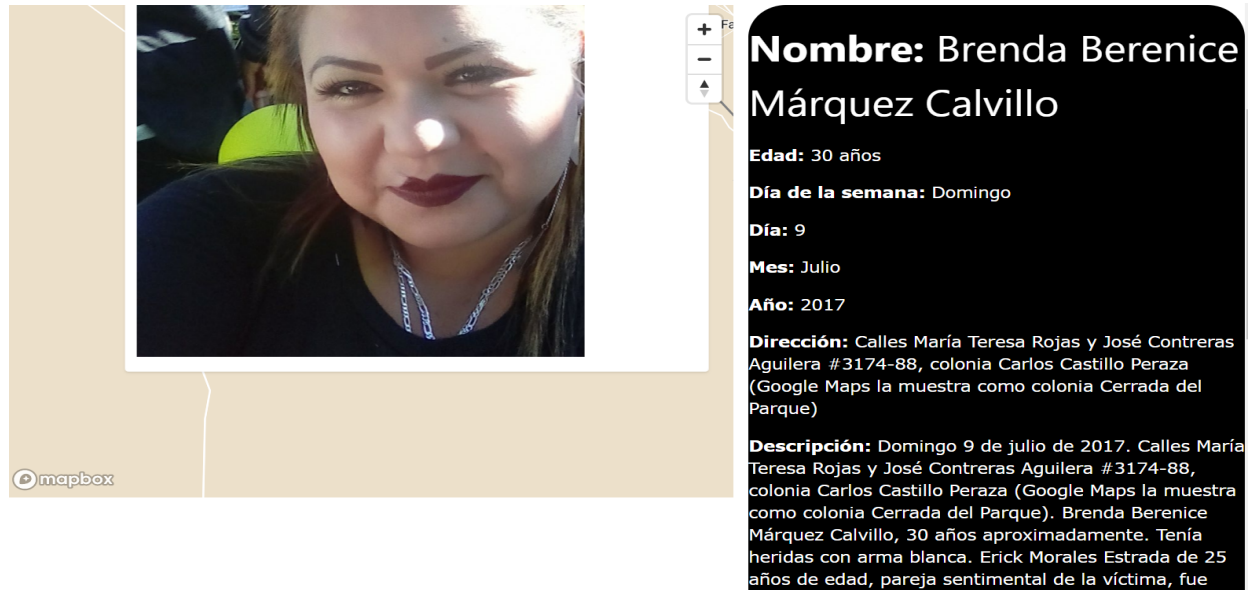
would say, a "grievable life."[9]

Fig. 6. Screenshot of digital map *Ellas tienen nombre*, 2015. https://www.ellastienennombre.org/mapa.html. Accessed October 12, 2020. Published with permission of Ivonne Ramírez.

There is, however, another way of thinking about remembering that resonates with

Butler's conceptualization of precariousness as implying "living socially, that is, the fact that

one's life is always in some sense in the hands of the other. It implies exposure both to those

we know and to those we do not know; a dependency on people we know, or barely know, or

know not at all." This dependency is reaffirmed when we think of *re-membering* in terms of

membership, belonging, and becoming (Hedtke and Winslade). As Lorraine Hedtke and John

Winsdale argue, re-membering incorporates the idea of membership, and the possibility of

becoming a member of a community that is brought together by a feeling of loss and that, in

encouraging imaginary interactions with the deceased, enables people "to stand against the

dominant discourses" (96) that dismiss them. While they refer to these imaginary interactions

in the context of practices that help patients grieve, they nevertheless resonate with the sort of

interactions the three digital projects enable.

Their goal is not only to honor the memory of the dead but also to enable interactions

that include both the living and the dead, the analogue and the digital world, and that

ultimately shed light on the connections that exist between seemingly disconnected bodies,

spaces, and realities. Freeman does this by creating proximity between bodies (alive *and* dead)

that, without the platform he developed, would never be able to stand next to each other. As

the person holding the phone discovers the calacas that surround her, she wonders not *if* she is

connected to them but rather what that connection that is revealed as being *already there*

demands from her. *The Map of the Undocumented* re-presents the state of Arizona as a

cemetery, challenging the dominant narrative that the bodies of the migrants belong "over

there," on the other side of the US/Mexico border. Virtually buried in US soil (see fig. 7), the

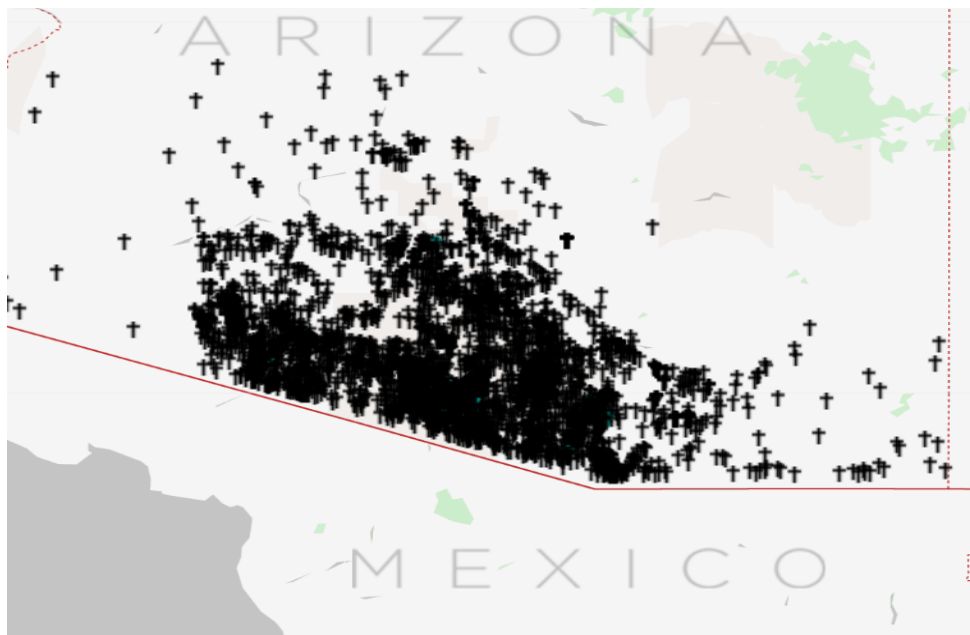map places the burden of grief and responsibility "over here," making "their" dead our dead

too[10].

Fig. 7. *The Map of the Undocumented* by Marco Williams, http://theundocumented.com/, created
by Operation CMYK, 2013. Accessed October 12, 2020. Published with permission of Marco
Williams.

Lastly, *Ellas tienen nombre* has a section titled "Enlaces Relacionados" with links to maps and similar digital and interactive initiatives that register acts of feminicide all over the world. The message behind this network is simple: "we are not alone." It is also twofold: it denounces the systemic nature of the feminicide while also creating a space for an ever-growing international community that honors and fights for lives that it recognizes and re-presents as indisputably grievable, regardless of whether they are known or unknown, near or far. The three projects thus re-member: they create a virtual space where users become members of a community that is defined not in terms of culture, language, or nationality, but in terms of their shared precariousness. Put differently, the two digital maps and Freeman's project intertwine space and narrative, the virtual and the material, the living and the dead, in efforts to show that we are—that we have always been—in each other hands, or, as Butler would say, "impinged upon by the exposure and dependency of others, most of whom remain anonymous."

Conclusion

"There is a kind of accepted understanding that we care first for and have our first responsibilities towards those nearest in. Yet in an age of globalization, and in the light of the way of imagining space and place that I have been talking about, could we not open up that set of nested boxes? Could we not consider a different geography of care and responsibility?" (Massey 201). The answer Massey's question seeks is self-evident: yes, we could. How could we not? As Jeremy Rifken points out, thanks to the phenomena and sensations of living closer and closer to what once was geospatially and culturally distant, "[we are] brought together in an ever-closer embrace and are increasingly exposed to each other in ways that are without precedent" (425). Yet what remains unclear is *how*? How exactly do we begin to care for those

who are far (yet virtually near)? How do we turn the "sensation of living closer and closer" into acts that have transformative potential?

I have proposed that *Border Memorial: Frontera de los muertos, Ellas tienen nombre,* and *The Map of the Undocumented* present us with an answer that frames the act of caring for the "distant other" within an act of memory that operates through a form of productive disorientation that changes how we perceive certain spaces and our relationship to them. The digital remains that populate the maps perform this disorientation through an act of haunting that changes our perception, making us conscious of the echoes that are as part of a space as that which is comfortably visible and legible. This change in our perception is compelling because it, too, lingers; it invites us to see not just the space of the Arizona desert or the Ciudad Juárez desert differently, but also *any space,* all spaces thus becoming chaotic—to go back to Massey—because of the yet-to-be-established connections with the yet-to-be-acknowledged absent presences.

As our way of looking at a space changes, our sense of self does too. The three projects not only show the "distant other" as near, but as someone we are connected to, someone with whom we are in a community of re-membrance that continues to grow and that is grounded on the realization that we are "in each other's hands." It is thus in losing our grasp of where we are and in un-knowing who is around us that we grasp those who are not near. We begin to care not because we intimately know the person who died, but because *we are with them*, in the constructed intimacy of the spatio-temporal dislocation these three projects stage. They thus show us the contours of a possible geography of care, one that gives visibility to a virtual and dynamic community that incorporates both the living and the dead, and where memory escapes the confines of national borders.

Acknowledging our belonging to that community not only complicates our understanding of whom we must remember and how, but also our relationship with devices such as computers and cellphones that have become so familiar that we rarely take notice of them or even think of how they came to be in our hands. As we see them transform into tombstones for the faraway dead—as we "hold" the dead in our hands, as we "touch" them on our screens—we are forced to think of the fact that our fingertips are brushing against a screen or a keyboard, the manufacturing of which could have contributed to creating the conditions that framed the death of many women in Ciudad Juárez who worked in *maquiladoras*[11] where those devices could have been assembled.[12] Similarly, the projects' reliance on software that enables a technological enhancement of vision (the ability to see what or who is hidden) invites us to consider how similar programs have been and continue to be used by the United States Border Patrol and the Immigration and Customs Enforcement agents in their search for undocumented immigrants (Funk) and the dehumanizing effect they produce as they transform them—their bodies, their lives, their history—into erasable data. The devices thus become "defamiliarized," and we hold them with less ease as we realize that seeing ourselves in the geography of care that these three digital projects construct means also acknowledging the various—and often subtle—ways in which we are implicated in the violence that seeks to erase the possibility itself of caring for a distant, unknown other. After all, as Massey points out, it is not only a geography of care that we must consider and work towards but also one of *responsibility*.

Notes

[1] The Tucson Medical Examiner Office and the Tohono O'odham tribe Police Department are responsible for the collection of human remains in the Tucson Sector of the US-Mexico border.

[2] Ramirez's work joins a growing body of maps that, in recent years, have been created by activists in Latin America with the purpose of denouncing the violence of feminicide and demanding social change. See Suárez Val et al.

[3] In this article, my use of the term "feminicide" (as opposed to "femicide") follows the conceptualization developed by Rosa-Linda Fregoso and Cynthia Bejarano in their edited volume *Terrorizing Women: Feminicide in the Americas*, where they propose that "feminicide" enables an analysis of the murder of women that underscores power structures and the inequalities created by social, political, and cultural institutions. They argue that "the level and extreme nature of violence against women requires a new concept such as *feminicide*, which can work as a conceptual tool not only for antiviolence advocacy but to further a feminist analytics on gender-based violence" (7).

[4] See Fregoso, "For the Women of Ciudad Juárez."

[5] This chapter is the fictional recount of Sergio González Rodríguez's *Huesos en el desierto* (2002), a chronicle of the feminicide in Ciudad Juárez from the 1990s to the 2000s.

[6] This gender-based precariousness is tied to a culture of machismo that confines women to certain societal roles and punishes them when they deviate from them. See Driver's chapter on "Feminicide and Memory Creation."

[7] Many of the women who have been killed in Ciudad Juárez were immigrants who had moved from other Mexican cities and other countries looking for work in the maquiladora industry (see Monárrez Fragoso).

[8] According to the non-profit corporation Humane Borders, as of December 31, 2018, over 1000 decedents remained unidentified ("Migrant Death Mapping").

[9] See Butler: "In other words, 'this will be a life that will have been lived' is the presupposition of a grievable life, which means that this will be a life that can be regarded as a life, and be sustained by that regard. Without grievability, there is no life, or, rather, there is something living that is other than life."

[10] In an email exchange with Marco Williams, he proposed the following question: "Since the deaths are a result in no small part of the United States policy, should the U.S. Government be charged as a perpetrator in these migrant deaths?" While the legal aspect of this question exceeds the scope of this article, Williams's observation compellingly invites us to consider how we define "responsibility," and how the act of feeling the loss of the distant "other" might not be the

point of arrival but rather the point of departure from which political, social, and legal demands must be acknowledged and addressed.

[11] The introduction of NAFTA in 1994 allowed for multinational corporations from the United States to use maquiladoras (foreign assembly plants), which are primarily located in the Northern area of Mexico. The role the industry of the maquiladoras has played in creating conditions that have caused and/or intensified the various forms of violence against women—and the deaths resulting from them—is analyzed in detail in Sergio González Ramírez's *The Femicide Machine*.

[12] According to CorpWatch, Hewlett Packard, Motorola, Phillips, and IBM are among the companies that have maquiladoras in Mexico.

Works Cited

Bhabha, Homi. *The Location of Culture*. Routledge, 1994.

Bissen, Matthew. "Walking the Everyday." *New American Notes Online,* November 2014,

   https://www.nanocrit.com/issues/issue6/walking-everyday Accessed 4 June 2020.

Bolaño, Roberto. *2666.* London, Picador, 2009.

"Borran memorial sobre feminicidios en Ciudad Juárez." *La silla rota,* 6 October 2019,

   https://lasillarota.com/estados/borran-memorial-sobre-feminicidios-en-ciudad-juarez-

   chihuahua-ciudad-juarez-feminicidios/323698. Accessed 4 June 2020.

Butler, Judith. "Precariousness and Grievability—When Is Life Grievable?" *Verso,* 16

   November 2015, https://www.versobooks.com/blogs/2339-judith-butler-precariousness-

   and-grievability-when-is-life-grievable. Accessed 4 June 2020.

de Certeau, Michel. *The Practice of Everyday Life*. University of California Press, 1984.

CorpWatch. "Maquiladoras at a Glance." *CorpWatch*. 30 June 1999,

   https://corpwatch.org/article/maquiladoras-glance. Accessed 12 September 2020.

Del Pilar Blanco, María, and Esther Peeren. "Possessions: Spectral Places/Introduction." *The Spectralities Reader: Ghosts and Haunting in Contemporary Cultural Theory*, edited by María del Pilar Blanco and Esther Peeren, Bloomsbury, 2013, pp. 395-401.

Driver, Alice. *More or Less Dead: Feminicide, Haunting, and the Ethics of Representation in Mexico.* University of Arizona Press, 2015.

Farman, Jason. "Site-specificity, pervasive computing, and the reading interface." *Mobile Story: Narrative Practices with Locative Technologies,* edited by Jason Farman, Routledge, 2014, pp. 3-16.

Freeman, John Craig. *Border Memorial: Frontera de los Muertos.* 2012, https://johncraigfreeman.wordpress.com/border-memorial-frontera-de-los-muertos/. Accessed 4 June 2020.

Fregoso, Rosa-Linda. "For the Women of Ciudad Juárez." *The Feminist Wire,* 3 December 2012, https://thefeministwire.com/2012/12/for-the-women-of-ciudad-juarez/. Accessed 4 June 2020.

---, and Cynthia Bejarano, eds. *Terrorizing Women: Feminicide in the Americas*. Duke University Press, 2010.

Freud, Sigmund. "The Uncanny." 1919. https://web.mit.edu/allanmc/www/freud1.pdf. Accessed 4 June 2020

Funk, McKenzie. "How ICE Picks Its Targets in the Surveillance Age." *The New York Times,* 3 October 2019, https://www.nytimes.com/2019/10/02/magazine/ice-surveillance-deportation.html. Accessed 12 September 2020.

Giorgi, Gabriel. *Formas comunes: Animalidad, cultura, biopolítica.* Buenos Aires, Eterna Cadencia, 2014.

González Rodríguez, Sergio. *The femicide machine*. Los Angeles, Semiotext(e), 2012.

Gordon, Avery. *Ghostly Matters: Haunting and the Sociological Imagination.* University of

   Minnesota Press, 2008.

Hedtke, Lorraine, and John Winslade. *The Crafting of Grief*. Routledge, 2017.

Hernández, Anabel. "Against the current: Femicide in Mexico on the rise and growing more

   brutal." *Deutsche Welle.* 21 August 2019, https://www.dw.com/en/against-the-current-

   femicide-in-mexico-on-the-rise-and-growing-more-brutal/a-50119043. Accessed 4 June

   2020.

Hoskins, Andrew, ed. *Digital Memory Studies: Media Pasts in Transition.* Routledge, 2018.

Huyssen, Andreas. *Present Pasts: Urban Palimpsests and the Politics of Memory.* Standford

   University Press, 2003.

Kim, John W. "Rupture of the Virtual." *Books.* Book 1.

   http://digitalcommons.macalester.edu/books/1

King, Alexandra. "No Olvidado: estos estadounidenses encuentran y sepultan a los inmigrantes

   que mueren en el desierto." *CNN,* 27 December 2019.

   https://cnnespanol.cnn.com/2019/12/27/no-olvidado-estos-estadounidenses-encuentran-

   y-sepultan-a-los-inmigrantes-que-mueren-en-el-desierto/. Accessed 4 June 2020.

Massey, Doreen, et al. *The Doreen Massey Reader*. Agenda Publishing, 2018.

"Migrant Death Mapping." *Humane Borders*, https://humaneborders.org/migrant-death-

   mapping/. Accessed 6 Oct 2020.

Monárrez Fragoso, Julia Estela. "La cultura del feminicidio en Juárez, 1993-1999." *Frontera

   norte* [online], vol. 12, no. 23, 2000, pp. 87-117.

Presner, Todd, David Shepard, and Yoh Kawano. *HyperCities: Thick Mapping in the Digital*

   Humanities. Harvard University Press, 2014.

Ramírez, Ivonne. *Ellas tienen nombre.* 2015, https://www.ellastienennombre.org/mapa.html.

   Accessed 4 June 2020.

Rifken, Jeremy. *The Empathic Civilization: The Race to Global Consciousness in a World in*

   Crisis. Penguin, 2009.

Said, Edward. *Culture and Imperialism*, Vintage Books, 1994.

Suárez Val, Helena, Sonia Madrigal, Ivonne Ramírez, and María Salguero. "Monitoring,

   recording, and mapping feminicide: Experiences from Mexico and Uruguay." *Femicide*

   Volume XII: Living Victims of Femicide, ACUNS, 2019, pp. 67–73.

Williams, Marco. *The Map of the Undocumented*. 2013, http://theundocumented.com/.

   Accessed 12 October 2020.

Irina R. Troconis is Assistant Professor of Latin American Studies in the Department of Romance Studies at Cornell University. She holds a PhD in Spanish and Portuguese Languages and Literatures from New York University, and an MPhil Degree in Latin American Studies from the University of Cambridge (UK). Her areas of specialization include: Memory Studies, Venezuelan Studies, Politics and Performance, Twenty-First Century Populism, and Digital Humanities. She is the editor of *Deborah Castillo: Radical Disobedience* (HemiPress, 2019). Her current book project, *Spectral Remains: Memory, Magic, and the State in the Afterglow of Hugo Chávez's Bolivarian Revolution*, explores through the lens of spectrality the memory narratives and practices developed around the figure of Hugo Chávez in the six years following his death. She is also working on two new research projects: one that examines the performance work of Venezuelan artists Deborah Castillo and Violette Bule, and one that explores practices and narratives of digital memory in Latin America. Email: irt23@cornell.edu.