Videographic Scholarship and/as Digital Humanities

Steve F. Anderson

For cinema and media studies scholars, the emergence of two areas of scholarly practice—namely videographic scholarship and the Digital Humanities (DH)—has created opportunities for new forms of argumentation, analysis and research, as well as new venues for the dissemination of scholarly output related to the study of the moving image. While videographic scholarship and DH overlap in many ways, they also remain distinct, with few scholar-practitioners actively working in both realms. How can we understand this separation and begin to imagine a more productive relationship between them? Key to our understanding of both videographic scholarship and DH is the ongoing cultural contestation between images and data, bearing important implications for the ways each practice stakes claims about its access to new ways of knowing, researching and presenting information. I explore here some of those distinctions and overlaps, and suggest that the primarily image-based practice of videographic scholarship would benefit from adapting a process of serial review and revision derived from early experiments with data-based digital scholarship. Adapting these protocols to the specific needs of videographic scholarship would better support the scholarly benefits of process, evaluation and collaboration.

The center of gravity in today's understanding of DH lies with large-scale, computational analysis of machine-readable data (think of text-encoding initiatives in which vast collections of literary works are converted into searchable data). The "digital" in this understanding of DH offers one way

to bring computation into partnership with humanistic inquiry. However, this is not the only possible framework for recognizing the potential contributions of computation to the humanities. As demonstrated by scholars such as Steven E. Jones, Tara McPherson and Johanna Drucker, the historical lineage of what is now termed the Digital Humanities may be seen to follow alternative trajectories that value the capacity for digital scholarship to be richly mediated and visualized—as is the case with videographic scholarship—as much as for it to be driven by computation.[1]

According video essays the same degree of respect currently enjoyed by Digital Humanities—even the capitalization schemes for these terms suggests a persistent hierarchy!—is necessary to ensure the continued flourishing of the practice. At stake are the usual components of an academic economy: tenure and promotion, faculty lines, publication venues, curriculum, and of course, funding. Why is there no "Office of Videographic Scholarship" down the hall from the Office of Digital Humanities at the NEH?[2] Key scholars who now count video essays among their academic output have worked to clarify the definition of videographic scholarship not just in the interests of claiming greater institutional respect but in order to sharpen the critical discourse of the field. Having moved beyond the goal of validation, what is the extent of the intervention marked by video essays? And perhaps more pointedly, why do videographic scholars seem more eager to be embraced by the Digital Humanities than the other way around?

I would argue that, while videographic scholars have much to learn from the methodologies established by the Digital Humanities, the reverse is equally true. Setting aside the received hierarchy that values computation over mediation, video essays represent an evolved scholarly vernacular that uniquely serves critical goals in terms of both research and publication. We are now well past the point where videographic scholarship needs to demonstrate its contributions to the field or justify claims to academic legitimacy. Although skepticism undoubtedly lingers in some sectors, the time has come to examine the value proposition of the scholarly video essay on its own terms and to ask whether the mechanisms of validation that were awkwardly retrofitted from the world of print publication—i.e., peer review—might now be productively reconsidered. While strengthening connections between videographic scholarship and the Digital Humanities offers some solutions, fundamental disjunctions between these two make this a less inviting path than might be expected.

The question of whether video essays may be productively regarded as a subset of the Digital Humanities hinges, in part, on the boundaries one is prepared to draw around DH and the value

propositions presumed to exist inside it. Two revealing origin myths for DH are symbolized by projects created more or less concurrently under the patronage of the computer manufacturer International Business Machines (IBM) in the 1950s: Fr. Roberto Busa's *Index Thomisticus*[3] and Charles and Ray Eames's *Glimpses of America*.[4] The bifurcation of the domains of data and images represented by these two projects midway through the previous century continues to structure much contemporary discourse in the Digital Humanities. Whereas Busa's work sought a comprehensive, automated concordance for every word published by Saint Thomas Aquinas in the 13th century, the Eames's work was devoted to audio-visual spectacles designed to appeal broadly to audiences on topics of historical, social or scientific significance. Their large-scale, multi-screen, synchronized projection *Glimpses of America* was installed in a Buckminster Fuller-designed dome at the Moscow World's Fair in 1959, making it a landmark in the history of both audio-visual display and Cold War propaganda. IBM's 1959 pavilion represented a stark juxtaposition of the competing regimes of data and images, celebrating American capitalism as manifested through data processing and screen-based entertainment respectively. Even today, DH scholars may feel pressured to align themselves with one of these historical traditions or another and it is a rare instance of Digital Humanities scholarship that genuinely excels at both computational analysis and audio-visual argumentation.
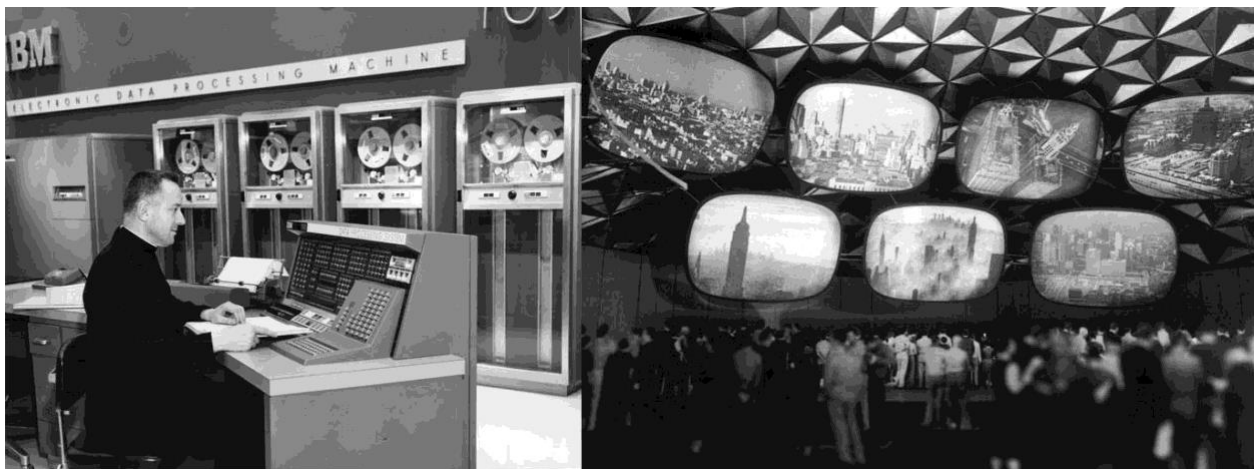
Two origin myths for the Digital Humanities: at left, Father Roberto Busa poses with the IBM 705 data processing system used in 1958 for the *Index Thomisticus*; at right is Charles and Ray Eames's *Glimpses of America* multimedia display featured in the IBM pavilion at the 1959 Moscow World's Fair.

At the end of the DH spectrum that aligns methodologically with computational analysis and quantitative social sciences, video essays may not even enter the conversation at all. In her book *Digital Humanities and Film Studies*, for example, film archivist Adelheid Heftberger offers a

rigorous account of a wide range of analytical efforts that have been directed at the works of Dziga Vertov. Although visual, compositional and time-based elements (such as close-ups, camera angles, editing patterns, transitions, camera movement, etc.) constitute a major part of her research, there is nothing resembling the type of videographic scholarship published by *[in]Transition*. Heftberger, in fact, locates the intersection of DH and film studies closer to statistical analysis than even the most algorithmically-driven video essay, writing, "The basic tendency within the digital humanities, to grasp the object of research, among other things, as quantifiable, analysable and visualisable elements of data, would appear to contribute to the impetus of the new discipline."[5] From this perspective, the role of the visual extends only as far as the type of high-density, Cultural Analytics visualizations associated with Software Studies. While it's true that commonly used Cultural Analytics platforms such as ImageJ—an image-processing tool used for spatializing image sequences that was originally developed for the health sciences—have been used to create video essays, these examples remain the exception rather than the rule.

One example is Kevin Ferguson's video essay "*Volumetric Cinema*" published in *[in]Transition* in 2015, in which ImageJ is used to demonstrate the ways camera movement contributes to the articulation of cinematic spaces. Having captured several sequences of 2D images and used ImageJ to convert them into 3D volumes, Ferguson analyzes the relationship between space and time within iconic scenes from films including *Citizen Kane, Breathless* and *Vertigo*. Remapped in volumetric form, these images largely lose their mimetic function—and with it their connection to cinephilic pleasure—and are instead converted to pixel-data that serves to define the spaces of the scene. I would speculate that the reason such techniques have not gained broader acceptance among video essayists is not the technical complexity of the software, but its failure to preserve the integrity—or even the recognizability—of cinema's traditional unit of analysis: the frame. Compared with either the analytical volumes rendered by ImageJ or the statistical analyses found in the quantitative social sciences, even the most algorithmically-determined instances of videographic scholarship still look more like documentary films or close textual analyses than visualized databases.

A scene from Alfred Hitchcock's *Vertigo* is transformed from representational 2D images of a circular camera move (right) to pixel-data describing a 3D volume (left) using the software ImageJ in Kevin Ferguson's video essay, "Volumetric Cinema" (2015).

So how can we understand the relationship between videographic scholarship and the Digital Humanities? One path is to look for examples of video essays that adopt computational or algorithmic structures. This is the strategy adopted by Jason Mittell when he advocates for the value of algorithmically "deformed" modes of criticism not just as a mode of production but of research. In his 2019 contribution to *Debates in the Digital Humanities*, "Videographic Criticism as a Digital Humanities Method," Mittell argues persuasively for the unique contributions of video essays—and especially the *process* of constructing video essays—to media studies research. Mittell emphasizes the methodology underlying certain forms of videographic scholarship as being more about the journey than the destination: "Too often, the humanities frames 'research' as the finished products of scholarship: the book, the essay, the lecture. But research and its associated methodologies are not limited to the final product of scholarship: rather, the processes of discovery and experimentation are often the more exciting and insightful parts of scholarly endeavors."[6] This sentiment is echoed by Catherine Grant in her essay, "The shudder of a cinephiliac idea?" when she focuses on "less the finished forms of the emerging range of videographic film studies" and more on the "audiovisual research processes involved in their production."[7] Mittell and Grant, both founding co-editors (along with Christian Keathley) of the SCMS-affiliated journal *[in]Transition: Journal of Videographic Film & Moving Image Studies* (hereafter *[in]Transition*), cite examples that expand the boundaries

of video essays in the direction of algorithmic structures (Mittell) and poetic forms (Grant), which have indeed enlivened and enriched the field of videographic scholarship.[8]

Another strategy is to eschew the default mode of close reading for which video essays seem to be ideally suited, in favor of work that approximates the Digital Humanities trope of distant reading. The concept of "distant reading" originated with literary scholar Franco Moretti in his 2005 book *Graphs, Maps, Trees: Abstract Models for Literary History*. Moretti advocated broadening the scope of literary analysis beyond a relatively small number of mostly canonical works that an individual scholar may be able to analyze. With the aid of computational tools such as text encoding, a literary scholar might investigate patterns discovered across a massive array of original works as the starting point for further research. Similarly, in videographic scholarship, one might emulate the obsessive fan practice of the supercut, starting by collecting a multitude of examples of a particular gesture, frame composition or other formal technique. Unlike the standard operating procedure within DH research, this collection of media will probably never be incorporated into a literal database before being placed in temporal or spatial juxtaposition in order to emphasize their shared characteristics. For videographic scholars, the "distant reading" of tropes that emerge across large categories of media, such as a film genre or a multi-season run of a television series, may be understood as a form of data visualization. These scholarly supercuts, in turn, may be compared to the practice developed by Lev Manovich's Software Studies initiative known as "Cultural Analytics." While Manovich's team aspires to bring quantitative analysis to the visual realm, Cultural Analytics remains sternly focused on computationally legible characteristics that are almost exclusively formal (color, line, movement, composition, shot length, etc.). Video essays, in contrast, are more apt to preserve the pleasures of viewing, even when the ultimate goal is a critically distant reading. Allison de Fren has written perceptively about video essayists such as Kogonada, who is well known for works that are at once sweeping collections of imagery *and* extraordinarily pleasurable viewing experiences. For de Fren, Kogonada represents a figure who operates successfully across the once unbridgeable divide separating YouTube from academia in his development of virtuosic elaborations on the supercut.[9]

As suggested by Kogonada's remarkable body of work, which ranges from research for a doctoral dissertation to feature film directing, one of the clear benefits of videographic scholarship is its capacity to broaden the audience for cinema and media studies beyond what exists for text-based scholarship. In certain respects, the affordances of these two models of DH scholarship are indeed

inversely related. The more one relies on large-scale computation of abstract data, the less broadly accessible one's research is likely to be; likewise, the more care one devotes to crafting a cinematic experience that is viscerally, aesthetically, affectively (etc.) appealing, the less comprehensive and encyclopedic the scope of one's research can reasonably be. Still, I would argue that these endeavors are two sides of the same coin, both using the affordances of digital technology to enhance scholarly insight and critical interpretation. Although my current focus is on computational media, the strand of DH with which I have been long associated descends most clearly from the multimedia display work of the Eameses, and it is on this tradition that I draw most heavily when advocating for videographic scholarship's vital contributions to the Digital Humanities.

So, how can we understand the value of video essays that are algorithmically "deformed," either as part of the research process or for the purposes of final presentation? Examples of videographic scholarship that use computational structures include Mittell's own experiments with equalized shot lengths, in which the duration of every shot in a film is equalized to that film's average shot length, or the reordering of a film in ascending order of shot lengths. The results of these—often entertaining—"deformations" offer a visceral experience of editing rhythms from which one might generate new insights about the original work.[10] Likewise, in emphasizing the poetic, creative and affective potentials of video essays, Grant's work invites viewers to re-view the formal qualities of familiar works, often making subtle or inferred connections with theoretical texts or perspectives beyond the cinematic frame. Like Mittell, Grant has emerged as one of the leading practitioners of the mode she theorizes, single-handedly producing many dozens of video essays that collectively model a mode of creative-critical practice that is more suggestive than pedagogical. My own conjoined background in experimental film and computational media predisposes me to embrace both of these evolving modes of videographic scholarship. I am also in favor of creating opportunities for media scholars to experiment with the affordances of media-based scholarship and to expand the expressive and affective range of their work. The benefits of these strategies have been well-established within the branch of DH devoted to multimodal expression, and works by Grant and Mittell both exemplify and articulate aspects of the unique contributions of videographic scholarship to this realm.

The fundamental difference between algorithmically deformed or process-oriented works of videographic scholarship and Digital Humanities methods lies in the extent to which analytical tools

and media sources are open and available to a scholarly *community* as part of the finished work. Mittell is clear and convincing when describing the benefits that are afforded to *individuals* who engage in the process of videographic research-as-process:

> once a film is imported into video-editing software, it becomes something else: an archive of sounds and moving images. Importing a film into editing software enables a conceptual transformation that allows critics to see and hear it differently. Just as DH methods like text mining, distant reading, and cultural analytics allow scholars to see patterns across works, videographic criticism enables us to break the seal that binds a film as a finished work and then engage with its component parts.[11]

Mittell's description will certainly resonate with media scholars who have experienced the transition from writing *about* media to writing *with* media and a skilled video essayist may successfully invite viewers to experience a version of their conceptual transformation. By contrast, a Digital Humanities research platform might aggregate and redistribute a data set within an analytical framework that is interactive or reconfigurable according to the interests of its users. In theory, this can dramatically amplify the potential for a community of researchers to discover new patterns, derive new arguments or ask new questions. The conjoined tools and methods of DH do not just provide multiple interpretive lenses on a given object of analysis the way multiple video essayists might take different approaches to analysis of the same film; they model a variable range of critical paradigms that may be directed at multiple collections of source materials.

When Digital Humanists do their job correctly, original data sets remain open and accessible and can be shared across multiple databases; metadata schemes are standardized to facilitate annotation, comparison and aggregation, which in turn supports access and preservation. Although DH ideals that value access, extensibility and interoperability are admittedly not always realized in practice, it seems clear that video essays—which allow neither access to nor reconfiguration of their raw materials—belong to another tradition altogether. For videographic scholarship to be broadly recognized as part of the Digital Humanities, video essayists need to explore opportunities to more consistently expose their processes and reflect on systems of analysis. This *could* mean aspiring to DH ideals of sharing data sets, open sourcing tools and developing information architectures that work across multiple platforms and contexts, but this is not the only possible route. Rather than encourage video essayists to emulate computational forms or force the ill-fitting metaphor of open data onto media sources, I believe we can learn from previous experiments with multimodal scholarship to develop strategies that ensure scholarly rigor, while preserving the process of iteration and revision that has long been central to post-production workflow.

A revealing historical example may be found in Marsha Kinder's pioneering work with the Labyrinth project at USC's Annenberg Center beginning in the late 1990s. Known for its insistence on elaborately designed interfaces indexing richly mediated databases, Kinder's work directly inspired the electronic journal *Vectors* and a generation of media scholars whose work continues to straddle the realms of design and computation. The downfall of both Labyrinth, which moved from (now obsolete) hard media formats (CD ROM and DVD ROM) to the web, and early *Vectors* projects that were designed using the (now obsolete) Adobe Flash software, was technological obsolescence and lack of interoperability. The databases that provide content to [Labyrinth](#)'s "interactive database narratives" and *Vectors'* elegantly designed Flash interfaces were isolated and inert, unable even to be indexed by search engines. If video essays merely fail to support DH ideals of data access, Flash actively prevents it. Although the end product resisted remix or citation, in terms of process, the *Vectors* editorial workflow modeled an effective, two-stage peer review intended to prevent scholar-designer teams from committing to expensive and time-consuming design paths that might not serve the critical goals of the project. The first-stage "design review" was triggered when a project's primary interface had been prototyped and a development plan was in place but primary coding had not yet begun. A secondary "content review" by a domain expert was undertaken when the project was nearly complete but before it was too late to make substantive changes if needed.

Received by some as variations on documentary film and by others as part of the legacy of essayistic film and video, videographic scholarship offers many of the aesthetic pleasures of cinema, with none of the open source ethos or data sharing of DH scholarship. A video essay is a closed ecosystem that resists quotation, citation or revision, and does not allow direct access to source materials. Resource sharing has long been a vexing problem for media scholars who too readily internalize the zero-tolerance for file sharing promoted by the copyright industries' anti-piracy campaigns. The public media archive [Critical Commons](#) was— perhaps uniquely—created to address this need, and the platform has remained in operation for well over a decade, hosting more than 10,000 unlicensed, copyrighted media files on the open internet without ever taking down a piece of media in response to a legal challenge. I have written about Critical Commons elsewhere as a platform specifically devoted to supporting "researching-in-public" for media scholars, whether their final output is a video essay or richly mediated electronic publication.[12] However, unlike the practice of writing-in-public that enjoyed a certain popularity throughout the 2000s, often beginning as networked books that are open to public comment or "blog-based peer review," allowing authors to incorporate input

from an online community, the videographic form—even if shared online as a work-in-progress—does not lend itself to comment and revision.[13]

As a result, work that is published in a peer-reviewed venue such as *[In]Transition* is necessarily located on the side of the line separating finished "publication" from ongoing "research." To their credit, the editors of *[In]Transition* have implemented a system of open peer-review that exposes the comments by each project's peer-reviewer along with an author's statement, providing a rich, paratextual frame for each published video essay. Although the pre-publication review process at *[in]Transition* allows reviewers to request revisions or edits, the commentary associated with a published video most commonly takes the form of a public-facing review that highlights a project's strengths or poses questions and challenges for viewers to consider. Likewise, the instructions to peer reviewers for *[in]Transition* acknowledge that reviews may focus attention on whether the video essay achieves its goals "effectively, imaginatively or rigorously through its audio-visual form" *or* on its capacity to "generate or articulate significant new knowledge or understanding about its subject."[14] Although the goal is clearly to support work that achieves success in both regards, reviewers are not necessarily expected to respond to both equally. My impression from reading a great many of the accompanying texts by reviewers is that reviews of published works often provide a critical reframing as opposed to requiring an author to perform extensive re-editing or re-writing. In some cases, rather than making modifications to the video essays themselves, authors may choose to respond to a critical review by making revisions to their own text statement rather than to the video essay itself. The real value of the peer review process and each video's accompanying paratexts, then, is additive and contextual rather than strictly editorial.

Although it is admittedly cumbersome and time-consuming, the kind of two-stage review process implemented by the *Vectors* journal may be precisely what is needed to maximize the benefits offered by peer review to videographic scholarship that is more process-oriented. Rather than split a simultaneous review along the lines of content and form, the first stage of a serial review process might take place at or near the rough-cut stage, when a project's argument has been largely articulated and a majority of the media content already incorporated, but no finishing touches (precise editing, transitions, titles, sound mixing, music, F/X, etc.) have yet been made. The rhetoric of incompleteness that attends a project at the rough cut stage opens the project to more fundamental critiques, challenges, or redirections from a reviewer. For authors, the temptation—and ability—to

conceal gaps in logic or digressions from one's argument would be greatly reduced, and substantive feedback would be easier to accept and incorporate during the next stage of editing/writing. A subsequent review at the stage of fine cut or picture lock would also be needed, of course, at which point the work would be evaluated for its ultimate suitability for publication or need for further revision.

Having edited an electronic journal for many years and served as a reviewer, in various contexts, on many dozens of works of electronic scholarship, I recognize the challenges of modifying the tried-and-true practices of peer review, as well as undertaking strategies for rendering videographic scholarship more compatible with systems for annotation, revision or citation. Even if a protocol existed for sharing source media and project files that preserved the separation of audio, video, text and F/X (etc.) layers, the multitude of software platforms and versions would render this immediately impractical. In this sense, the challenges of interoperable software and data formats in DH research parallels the inaccessibility and non-reconfigurability of media sources in works videographic scholarship. The partial solution of excerpting and uploading source clips to a fair use-friendly repository like Critical Commons is a step in the direction of "shared data," but this represents a significant burden on video essayists who are understandably more concerned with the outcome of their own analysis than creating opportunities for others to access their raw materials. Of course, the ideal scenario is to do both at once—a practice that is familiar to archival historians who develop resources for accessing newly discovered or underutilized collections—but this is not an option for many scholars in the absence of institutional or technical support.

For me, the value of videographic scholarship lies in the bidirectional process of disassembling certain critical conventions (e.g., textual primacy) while reassembling others (e.g., complex strategies of visual argumentation). I suspect that anyone who has completed a video essay that is not based on a previously existing text argument—that is, one that evolves dynamically through a conjoined process of writing and video editing—will agree that this process has benefits that differ substantively from writing a conventional text essay. In the end, these aspects of the process of evolving an argument *about* video *through* video are simultaneously the most exciting and transformative, and also the most resistant to iteration and response once a work has been completed. While the peer review structure inherited from text publication remains antithetical to the most productive workflow for creating scholarly video essays, a two-stage (rough cut/fine cut) review

schedule is consistent with standard post-production workflows in the creative industries. Attending to earlier stages in the editorial timeline also resonates organically with the process-oriented focus advocated by Mittell and Grant, and with it the conjoined processes of research-as-investigation and authorship-as-discovery. Although this is undoubtedly a more cumbersome process for all involved, the title of the field's flagship journal—*[in]Transition*—might thus be rendered doubly prescient. In addition to signifying a moment of disruption and transformation for the field of cinema and media studies, a shift in emphasis from completed work to research-in-progress may be exactly the transition the field needs, and with it a more convincing validation of process over product.

Steve F. Anderson is Professor and Interim Chair of the department of Film, TV & Digital Media at UCLA. He is the founder of the public media archive *Critical Commons*, co-editor of the journal *Vectors,* and author of *Technologies of Vision: The War Between Data and Images* (MIT Press 2017).

1. See Steven E. Jones, *The Emergence of the Digital Humanities* (Routledge, 2014); Johanna Drucker, "Humanities Approaches to Graphical Display" in *DHQ: Digital Humanities Quarterly* (2011) Volume 5 Number 1; Tara McPherson, *Feminist in a Software Lab: Difference + Design*. (Harvard University Press) 2018.

2. To be fair, grant programs in the NEH's Office of Digital Humanities have actively supported videographic criticism, including the three years of summer workshops held at Middlebury College from 2015-2018.

3. For an insightful history of Busa's work on the *Index Thomisticus*, see Steven E. Jones, *Roberto Busa, S. J., and the Emergence of Humanities Computing: The Priest and the Punched Cards* (Routledge, 2016).

4. For a detailed account of the Eames's contribution to the Moscow World's Fair exhibit, see Beatriz Colomina's "Enclosed by Images: The Eameses' Multimedia Architecture" in *Grey Room* 2 (3) January 2001: 6-29.

5. Adelheid Heftberger, *Digital Humanities and Film Studies* (Springer, 2018) 21.

6. Jason Mittell, "Videographic Criticism as a Digital Humanities Method," in Matthew K. Gold and Lauren F. Klein, eds., *Debates in the Digital Humanities* (2019). https://dhdebates.gc.cuny.edu/read/4805e692-0823-4073-b431-5a684250a82d/section/b6dea70a-9940-497e-b7c5-930126fbd180#en176

7. Catherine Grant, "The shudder of a cinephiliac idea? Videographic film studies practice as material thinking," in *ANIKI: Portuguese Journal of the Moving Image,* 1 (1). (2014) 50.

8. Here I would also briefly note my preference for the term "videographic scholarship," which emphasizes connections to research and scholarly practice, over "videographic criticism," which suggests an extension of "film criticism" that is more popular than academic.

9. Allison de Fren, "From the Essay Film to the Video Essay: Between the Critical and the Popular" in *Reclaiming Popular Documentary*, Christie Milliken and Steve F. Anderson, eds. Indiana University Press, forthcoming, July 2021.

10. For a thoughtful reading of deformed humanities beyond the videographic form, see Mark Sample's "Notes towards a Deformed Humanities," posted on his blog @samplereality May 2, 2012. https://www.samplereality.com/2012/05/02/notes-towards-a-deformed-humanities/

11. Mittell, https://dhdebates.gc.cuny.edu/read/4805e692-0823-4073-b431-5a684250a82d/section/b6dea70a-9940-497e-b7c5-930126fbd180#en176r

12. See Steve Anderson, "Critical Interfaces and Digital Making" in *Visible Language* issue 49.3 "Critical Making: Design and the Digital Humanities" (December 2015).

13. These are exemplified by McKenzie Wark's *GAM3R 7H30RY* (2006), https://www.futureofthebook.org/gamertheory/index.html, Noah Wardrip-Fruins's *Expressive Processing: Digital Fictions, Computer Games, and Software Studies* (Cambridge: MIT Press 2008), and Kathleen Fitzpatrick's *Planned Obsolescence: Publishing, Technology, and the Future of the Academy* (New York: NYU Press 2011).

14. These quotations are taken from the instructions delivered to peer reviewers for *[in]Transition*.