DHQ: Digital Humanities Quarterly

Preview
2025
Volume 19 Number 1

Unjust Readings: Against the New New Criticism

Paul Barrett <barrettp_at_uoguelph_dot_ca>, University of Guelph https://orcid.org/0009-0000-7667-8705

Abstract

Unjust Readings: Against the New New Criticism" offers a theoretical and methodological defence of the use of digital humanities methods for literary interpretation. I argue that extant critiques of DH from Fish, Da, Eyers and others depend on an unexamined notion of the appropriate work of the humanities and, in particular, of literary interpretation. Their claim, that critics should simply "just read" obscures the manner in which literary interpretation is never simply 'just reading.' I argue that DH not only raises interpretive possibilities that would be impossible without digital tools but also foregrounds the methodological choices and theoretical paradigms that so often are unstated, or implicit, in traditional humanities work. Inherent to the interpretive act that moves between the digital and the humanities is a need to state how the critic works between the two, thereby making the interpretive frame explicit. I then demonstrate a number of examples, from my research and the work of others, that demonstrate this productive capacity of DH in order to further refute that critics should simply 'just read' the texts.

Unjust Readings: Against the New New Criticism

"I had no wish to read more and no need to do so."

Augustine, *Confessions*

1 Nan Z. Da's (2019) "The Computational Case Against Computational Literary Study" is a major critique of Computational Literary Studies that attempts to challenge it at both the methodological and theoretical levels. Her essay "works at the empirical level" to identify "technical problems, logical fallacies, and conceptual flaws" as well as methodological inconsistencies and questionable results of a number of CLS projects. She asserts that for these projects, "what is robust is obvious … and what is not obvious is not robust" [Da 2019].

2 Da's argument is, by now, well known and has been thoroughly examined, challenged, and defended in a number of venues; the goal here is not to rehash the debates of the past few years. Rather, in what follows, I examine the interpretive implications of Da's argument, shifting the grounds from the so-called "empirical level" to examine the humanistic foundation of her critique and the implications of sliding from her challenge to CLS [1] to the broader critique of the digital humanities made by many of her subsequent supporters. I argue that Da's critique of CLS, and the subsequent debates concerning her work, open up paradigms of reading and, in doing so, tell us a great deal about the general state of the humanities, and the attendant discourse of humanism that undergirds a number of critiques of digital humanities.

3 Of the numerous responses to Da's work, Stanley Fish's (2019) "Afterword" is perhaps the most controversial and least surprising. After first acknowledging his lack of "real credentials in the field," Fish then asserts that this lack of expertise has absolutely no bearing on his "pronouncing on the Digital Humanities because my [his] objections to it are lodged on a theoretical level in relation to which actual statistical work in the field is beside the point." He jokes that while his daughter is a statistician, he understood hardly twenty percent of her recent lecture on "some issue in bio-medical statistics"; he comprehends so little of the topic, he cannot identify it. Yet where this mere twenty percent of understanding (presumably this measurement is a statistical Dad joke on his part) impedes his grasp on his daughter's lecture, this is not the case with digital humanities. Fish needn't follow the methods or mathematical reasoning by which digital humanities scholars make their arguments because he doesn't "care what form these analyses take. I know in advance that they will fail." As he sees it, his ignorance has no effect on his ability to assess this field.

4 Fish's "Afterword"is his latest in a series of arguments against Computational Literary Studies and Digital Humanities. His central critique, throughout these complaints, is that digital projects "crank up a huge amount of machinery in order to produce something that was obvious from the get go" [2] and that "they just dress up garden variety literary intuition in numbers"[Fish 2019]. He goes on to insist that "the interpretive conclusions they draw from the assembled data are entirely arbitrary, without motivation except the motivation to have their labors yield something, yield anything. Either their herculean efforts do nothing or when something is done with them, it is entirely illegitimate" [Fish 2019]. This critique echoes Fish's past arguments where he describes DH as an "antimethdology that refuses closure" [Fish 2012] while also arguing that digital forms of interpretation are meaningless "because the data, just sitting there in all its empty bulk, can be made to support anything" [Fish 2018]. He elsewhere insists that "The desire to generate insight into human expression by 'scientific' means is futile," [Fish 2019b] thereby leading to an irreconcilable difference between "real interpretation" and "corpus linguistic analysis" [Fish 2018].

5 Da works "at the empirical level" to challenge the novelty and conclusions of CLS whereas Fish's critique works at "the theoretical level" to challenge the paradigms of reading and interpretation upon which (he believes) DH depends. In this vague and ill-conceived division, both critics draw on a false dichotomy. As Katherine Bode's recent "What's the Matter with Computational Literary Studies? "argues, there is a "fundamental agreement between critics and proponents of CLS: that computation is separate from literary phenomena" [Bode 2023]. Bode calls for a 'performative CLS' that is "Attuned to the coconstitution of computational methods and objects – with each other, and with literary subjectivities and textualities" [Bode 2023]. I extend Bode's argument to demonstrate that Da and Fish's illusory splitting of the interpretive act inadvertently bolsters the claims of the digital humanities by offering a fresh critique of the humanities more generally.

6 Yet, to return to Fish's argument, what fields and methods is he assessing? While Fish uses DH and CLS interchangeably, Da is explicitly discussing Computational Literary Studies: "Digital humanities … is not the object of my [her] critique" [Da 2019]. Does Fish's slip from CLS to DH throughout his numerous critiques indicate that his lack of understanding extends beyond 'the empirical'? While the distinctions between the two are unclear and also shifting (as Katherine Bode points out in her response to Da's article), the terms cannot be used interchangeably as Fish does. [3] Is this just a careless mistake or does Fish's slip — or is it a move — from CLS to DH indicate his desire to broaden Da's case against a narrow subset of CLS to a critique against the larger project of DH? Given the pattern of repetition in Fish's work, one might ask whether this most recent iteration is an original argument aimed specifically at DH or merely a recycling of his past critiques of stylistics refashioned to suit his new target? Indeed, to what degree does the existence of a throughline in his arguments indicate that Fish is actively transposing his criticism of stylistics onto the digital humanities in order to draw a false

equivalency between the two?

As I hope to show, these are not idle questions. Critics of DH cloak traditional articulations of humanities scholarship within *methodological* criticisms of DH. Their attack on computational modes of analysis depends upon the defense of a reified vision of "the humanities, as it has been traditionally understood" [Fish 2012]. This traditional vision of the humanities, what Jamie "Skye" Bianco [Bianco 2021] terms "retro-humanism," is anti-theoretical and ahistorical in that it imagines that conceptions of humanities work and scholarship are settled rather than the terrain of ongoing struggle. In contrast to Said's assertion that "Criticism … is always situated; it is skeptical, secular, reflectively open to its own failings" [Said 1975], [4] these critics offer unexamined assertions of the "optimal utility" [Da 2019] of humanities work or plea for a return to some prelapsarian "humanist sensitivity." [5] [Eyers 2013] Their expressions of retro-humanism circumvent the combined methodological-theoretical questions that are, in fact, one of DH's most significant contributions to humanities scholarship. This retro-humanism, indicates that the attacks on DH constitute an idealized, unsituated criticism that articulate a narrow conception of the proper questions, methods and objects of analysis for the humanities. [6] Yet, in doing so, they inadvertently raise the more important questions of what it is we do when we read, what we mean by the 'empirical' and 'theoretical' levels of interpretation, and, more generally, what we mean by humanistic inquiry. Fish stumbles into this realization when he worries that the "digital humanities completely change our understanding of what a humanities goal (and work in the humanities) might be" [Fish 2012b]. Where most DH scholars would respond to Fish's worry with a celebratory, 'Yes!', Fish, Da, Eyers and others instead set themselves the task of defending a largely unexamined notion of retro-humanism. As such, his ongoing attack on DH constitutes perhaps the clearest instance of this desire to redefine the humanities according to this retro model and therefore merits sustained attention. 7

One method of assessing the true target of Fish's critique is via the computational literary methods that he and Da attack. A quick analysis of his "Afterword" reveals that it is 630 words long with no paragraph breaks. Fish spends 280 words, 44% of the reply, asserting his own lack of expertise in the field and his position that this lack of expertise doesn't impede his assessment. Another 84 words comprise quotes from Da's article, thus leaving a mere 266 words, or 39% of the piece, for Fish's actual argument. 8

While this is clearly a banal and overly simplistic example, the use of basic calculations to determine that a mere 40% of the "Afterword" actually asserts an argument tells us something about Fish's most recent intervention. Our quick statistical analysis leads us to a number of research questions relevant to Fish's argument: does this piece mark a decline or increase in the amount of actual original argumentation compared to his previous pieces? Do the numbers suggest that Fish is running out of things to say, or is he happy to just bolster Da's critique? 9

In order to develop this CLS approach to Fish's argument, we might follow Fish's gloss on his own critical methodology: "first the interpretive hypothesis and then the formal pattern, which attains the status of noticeability only because an interpretation already in place is picking it out" [Fish 2019]. We might therefore go to a dataset of Fish's arguments "armed with a hypothesis" [Fish 2019] about the development, or lack thereof, of Fish's understanding and critique of digital humanities. By measuring the quantity of self-citation in his arguments (defined as the number of words he quotes from his own work) along with the quantity of quotes from others one could calculate the rate of change of Fish's (un)originality. 10

Yet, pursuing such a line of interpretation first requires distinguishing between argument, context, and citation in a far more systematic fashion. Can one always identify a given sentence as distinctly a citation or part of an original argument? How might we justify such a taxonomy? How do we formalize the process by which we move from "the interpretive hypothesis" to "the formal pattern" and, finally, to "the status of noticeability? "Indeed, doesn't Fish's citation of Da and his own self-citation constitute a component of his argument, and shouldn't it therefore should be counted within our measure of his original argumentation? 11

The results of such an analysis might not be wholly surprising and would likely be guilty of the charge Da lays at CLS: "what is robust is obvious … and what is not obvious is not robust" [Fish 2019]. Yet what *is* interesting about this hypothetical analysis is that it demonstrates how, even in such an apparently simplistic numerical analysis of a small number of texts, decisions are required that formally structure input and method, thereby requiring a precise definition of terms and a complex theorizing of the relationship between data and interpretation at the outset of such a project. Questions of method mutate into questions of the theoretical, exegetical, and heuristic bases of the project. To map the percentage of argument, repetition, and citation requires that we establish meaningful linguistic and computational categories for these terms. Questions we would have to ask might include: What are the histories of these terms and how do we account for changing definitions in our computational analysis? Can we clearly distinguish between Fish's shifting targets of stylistics, DH, and CLS? How do particular terms or phrases within the Fish corpus signal that he is arguing, quoting, or paraphrasing and, as our analysis progresses and we are inevitably confronted by text that exceeds any of our definitions, how do we theorize iteratively, restructuring our terms and computational analysis in ways that better reflect the texts we encounter? 12

This iterative grappling with methodological questions is the key dimension of CLS and DH work that Da and Fish overlook: DH scholarship requires a self-reflexive attention to methodology and theory that both refines theoretical conceptions of the relationship between the digital and the humanities while also reframing humanities inquiry more generally. As Alan Liu (2013) argues, "digital humanities method … consists in repeatedly coadjusting human concepts and machine technologies until … the two stabilize each other in temporary postures of truth that neither by itself could sustain" [Liu 2013]. Indeed, counter to Tom Eyers's (2013) argument that DH scholars fail "to consider the crucial conflict between the methodology employed and the wider, catholic form of interpretation argued for," [Eyers 2013] DH scholarship is replete with critics who make the engagement with that so-called conflict a guiding methodological concern. Jim Egan, for instance, explains, 13

"DH appeals to me for precisely the same reason as theory … DH and theory each ask those interested in the humanities to ask themselves why we do what we do the way we do it. What do we learn when we close-read a literary text? What assumptions about our goals, aims, and values are embedded within the methods of close-reading? What relationship does history bear to literature — what, after all, is the difference between the categories of history and literature, if any, and what ends do these distinctions serve? Indeed, why do we have literature departments at all?" [Egan 2016]. 14

The widening scope of questions that Egan traces is familiar to DH scholars who find that their digital projects lead them towards complex questions concerning the broader implications of their work. Rosanne G. Potter, *writing in 1988*, describes the paradigmatic problem as "Literary Criticism and Literary Computing: The Difficulties of a Synthesis." She concludes that we need "moderation in all things, computational and critical" [Potter 1988] and that the key to digital humanities work is "Knowing when to go to quantitative methodologies and when to walk away from them" [Potter 1988]. Potter's point is that the synthesis remains difficult, if not impossible, but that wrestling with that difficulty remains worthwhile. 15

This productive conflict between humanistic understanding and quantitative measurement informs Johanna Drucker's (2011) argument that "we reconceive of all data as capta," particularly as "capta is 'taken' actively while data is assumed to be a 'given'" [Drucker 2011]. Drucker's (2011) insistence on the taken, textual quality of capta "acknowledges the situated, partial, and constitutive character of knowledge production, the recognition that knowledge is constructed, taken, and not simply given as a natural representation of preexisting fact" [Drucker 2011].[7] For Liu (2013), the "meaning problem" of digital humanities arises because "It is not clear epistemologically, cognitively, or socially how human beings can take a signal discovered by a machine and develop an interpretation leading to a humanly understandable concept" [Liu 2013, 414]. For scholars such as Drucker, Liu, Andrew Piper, Tanya Clement, and Susan Brown, working in the conflict or gaps between the computational and the literary, between signal and interpretation, enables new research questions and forms of collaboration while also foregrounding methodological questions that often remain implicit or unremarked upon within traditional humanities scholarship. 16

Where Fish is content to assume that his readers will inherently understand terms like "garden variety literary intuition," agree on what constitutes "the status of noticeability" or consent to his definition of "intentional," [8] DH and CLS scholars must define their computational and humanities terms far more carefully both as they are represented in 17

software models and employed as part of an argument. These definitions require precision not only due to the intense scrutiny that CLS and DH work is under but also because of the implicit difficulty of thinking through the relation between the literary and the computational. Franco Moretti (2013) describes this as "operationalizing," the process wherein concepts of textual interpretation are *operationalized* in software: "building a bridge from concepts to measurement, and then to the world … from the concepts of literary theory, through some form of quantification, to literary texts" [Moretti 2013]. Piper, in his (2019) articulation of the "theory gap" and "self-reflexive gap" of cultural analytics, writes that literary "Computation forces us to rethink our current disciplinary practices in the humanities from the ground up. What counts as evidence? What is the relationship between theory and practice? How do we account for the technological mediations of our critique?" [Piper 2019].

18 For Clement (2019), the situating of "digital humanities within a humanist epistemological framework must also entail an explicit articulation of our methodological perspectives, or how our techniques are tied to theory" [Clement 2019]. I would go a step further to say (drawing on Alan Galey and Stan Ruecker's (2010) examination of "How a prototype argues") that our techniques *are* theory. Clement explains the benefits of this methodological articulation, writing that it "gives us an opportunity to explain why we do what we do, which in turn allows us to argue for the specific contributions of our findings to ourselves, to other humanists, to those possible collaborators in other disciplines who rely on methodology as a signpost, and to the world." To theorize the relationship between the digital and the textual, Clement adapts Marjorie Perloff's (2004) notion of "differential reading" as the dialogical movement between close and distant reading.[9] Notably, where Perloff's notion of differential reading remains largely implicit throughout her argument in *Differentials* (2004), Clement's adaptation of the concept is more fully developed. Where Perloff, like Fish, is content to let her concepts unfold as part of her poetic interpretation, thus relegating method to the background of the interpretive act, Clement's attempt to situate the digital in relation to the humanities, by operationalizing differential reading, requires a more explicit methodological framework.

19 It is telling that the struggle with methodological questions has become such a prominent aspect of DH scholarship, particularly as practitioners are required to develop novel methods for transposing humanities questions into computational spaces. Brown (2011) describes this, perhaps paradigmatic, DH question as the 'gap' between the digital and the humanities:

20 "Working at the gap between humanities research questions and digital humanities development allows digital tools and research results to emerge from a dialectical relationship, allowing the research process to change in concert with the production of new modes of engaging in research. Scholars must make explicit the priorities and categories that inform their work" [Brown 2011].

21 Brown's articulation of the methodological gap is borne out of her extensive experience theorizing, developing, adjusting, and revising major digital humanities projects including the Orlando Project, the Canadian Writing Research Collaboratory, and the Linked Infrastructure for Networked Cultural Scholarship Program. While the terms of Brown's, Clement's and Piper's methods for working in the gap or reading differentially might seem abstract, that is partially the point: their method emerges from the challenge of particular projects, not predetermined by the expectations of computational or humanities modes of analysis. Indeed, as Roopika Risam (2021) argues, "The relationship between theory and praxis is integral to the digital humanities" [Risam et al. 2021] and critical DH takes up the challenge of theorizing that relationship as a core dimension of its practice.

22 Fish's, Da's, and Eyers's critiques of DH and CLS fail to account for the theoretically and methodologically productive challenges of working in the gap. For Fish and Da the space of the gap is not a space of productive possibility but one of incommensurability and lack. Fish (2019) is clear in his condemnation: "CLS or Digital Humanities is a project dedicated to irresponsibility masked by diagrams and massive data mining" [Fish 2019].[10] The digital and the humanities are, in Fish's view, only made to appear compatible through a rhetorical sleight of hand that employs indecipherable diagrams, illegible charts, and anti-theoretical data mining. While more careful in her final condemnation, Da (2019) essentially agrees, concluding her article with the suggestion that because the gap has not been fully theorized or the results of dialectically moving between the digital and the humanities are not fully developed, the entire CLS project is doomed to fail. She writes:

23 "The basic criteria should always be to not confuse what happens mechanically with insight, to not needlessly use statistical tools for far simpler operations, to present inferences that are both statistically sound and argumentatively meaningful, and to make sure that functional operations would not be far faster and more accurate if someone just read the texts. It may be the case that computational textual analysis has a threshold of optimal utility, and literature — in particular, reading literature well — is that cut-off point" [Da 2019].

24 Da's argument presumes that notions of "statistically sound and argumentatively meaningful" [Da 2019b] scholarship are clear, unchanging over time, and that CLS does not, and will not, contribute to such work. Yet, as her acknowledgment of the numerous errors in her original article (2019b) demonstrate, these concepts were unclear to her at the time of her writing and, indeed, are not settled facts. Statisticians disagree over what counts as "statistically sound"[11] just as literary scholars debate what constitutes an "argumentatively meaningful" observation.

25 Yet these outright terminological and argumentative errors are minor compared to the bigger problems in both Fish's and Da's critiques, namely the manner in which their attacks on DH attempt to conceal the gap of their own interpretive practices. Invoking the language of "optimal utility" or the "functional operation" of particular critical frameworks and contrasting DH with an unexamined notion of "reading literature well" sutures the productive, conflictual space of the gap in which criticism reflects on its own activity. This is evident in Fish's (2019) paraphrase of Da's argument at the end of his "Afterword": "The antidote to the whole puffed-up thing is nicely identified by Professor Da in her final paragraph: 'just read the texts'" [Fish 2019].

26 In contrast with careful theorizing, wrestling with difficult "operationalizing" questions, interpreting, and "minding the gap" between the computational and the humanities, Fish and Da attempt to close the gap of their own critical practice and smuggle in their own retro-humanist methodology in their call to "just read the texts." This is not an insignificant move, particularly as it asserts that one can, in fact, "just read" or, in Da's naive formulation, read "literature well." The methodological laziness of this final section of Da's piece would be surprising given the intense and unforgiving scrutiny to which she subjects CLS methods until one recognizes that this is not mere sloppiness but a strategic move that asserts the vision of reading and criticism that both she and Fish contrast with DH.

27 To debunk such simplified, unexamined notions of interpretation, one critic has lucidly demonstrated how notions of "just reading" circumvents criticism to conceal its inner logic, particularly as it constructs the very objects it purports to describe:

28 "Strictly speaking, getting "back-to-the-text" is not a move one can perform, because the text one gets back to will be the text demanded by some other interpretation and that interpretation will be presiding over its production. This is not to say, however, that the "back-to-the-text" move is ineffectual. The fact that it is not something one can do in no way diminishes the effectiveness of claiming to do it. As a rhetorical ploy, the announcement that one is returning to the text will be powerful so long as the assumption that criticism is secondary to the text and must not be allowed to overwhelm it remains unchallenged" [Fish 1982].

29 When the Fish of 1982 identifies the imperative to "just read the text" as a "rhetorical ploy," he warns us against the Fish of 2019 whose imperative to "just read" is precisely such a rhetorical move aimed at circumventing the critical possibilities of digital humanities as well as the "worldliness" (Said) of criticism more generally. Throughout "Is There A Text in This Class?" (1982) Fish challenges unexamined notions of "just reading" by investigating whether the reader, the text, or the interpretive community is the "source of meaning." He engages in a sustained attack on New Criticism by attending to the dialogical relationship that emerges out of the gap between methodology and textual meaning. We cannot just read the text, Fish argues, because we constitute the text through our acts of reading and our responses to the existing critical paradigms by which we come to experience and know the text. In this sense, Fish demonstrates the manner in which criticism occurs temporally: the text is an organizing centre around which "communities of readers" respond to other communities and form a range of interpretations over time. [12]

In a kind of *Looper*-esqe turn, the temporal unfolding of Fish's criticism has resulted in his becoming the very New Critic whose naive assertion of "just reading" he once sought to expose. Yet this New(er) Criticism 2.0 that claims to 'just read the texts' retains the same problems as Wimsatt and Beardsley's original vision. As Jonathan Culler (1981) explains, "New Criticism's dream of a self-contained encounter between innocent reader and autonomous text is a bizarre fiction. To read is always to read in relation to other texts, in relation to the codes that are the products of these texts and go to make up a culture" [Culler 1981]. New Criticism purports to close the gap of interpretation, imagining that the critic has unmediated access to the text. In place of a criticism that assesses the grounds of its own articulation and theorizes the terms of its own practice, Fish and Da follow their New Critical forebears by attempting to delimit the act of criticism to the act of reading. For Culler, however the problem is worse than merely *how* critics read: "the most important and insidious legacy of the New Criticism is the widespread and unquestioning acceptance of the notion that the critic's job is to interpret literary works" [Culler 1981, 5]. The call to 'just read' is misleading because it delimits critical reflection on the task of criticism itself by refusing to acknowledge the worldliness of the text and critic. 30

Again, Fish (1982) is instructive in his elucidations of the inescapable, and necessary, dimensions of criticism to reflect on its own task, particularly as criticism can debunk innocent notions of "reading literature well": 31

"It is often assumed that literary theory presents a set of problems whose shape remains unchanging and in relation to which our critical procedures are found to be more or less adequate; that is, the field of inquiry stands always ready to be interrogated by questions it itself constrains. It seems to me, however, that the relationship is exactly the reverse: the field of inquiry is *constituted* by the questions we are able to ask because the entities that populate it come into being as the presuppositions — they are discourse-specific entities — of those questions" [Fish 1982]. 32

The field of inquiry, what we might mean by "reading literature well," is not predetermined by a series of hallowed, Arcadian principles of criticism but, rather, is *constituted* by the questions we are able to ask." Fish is thus in agreement with Brown in her (2011) assertion that "Working at the gap between humanities research questions and digital humanities development allows digital tools and research results to emerge from a dialectical relationship, allowing the research process to change in concert with the production of new modes of engaging in research" [Brown 2011, 218]. Fish's observation remains true today: if we conceive of CLS or DH scholarship as generating a set of questions that cannot be asked by traditional methods of literary scholarship then we see the manner in which this work reconstitutes the field in new ways, requiring critics to iteratively theorize the terms and methods of their work. [13] Indeed, this is what Fish and Da primarily miss in their methodological critique of DH and CLS: these methods enable not "just" new forms of asking the same questions but, expand the "field of inquiry" of the humanities by the "questions we are able to ask" using these methods. 33

In what follows, I will turn from the theoretical to the practical, and discuss two projects that raise new questions and address a number of Fish's and Da's concerns, including the claims that DH results are typically obvious, non-robust, or always over-promised and underdeveloped. These examples are representative of a critical digital humanities that expand the field of humanities inquiry into digital spaces while also reflecting critically on the exclusion or silencing of particular voices within traditional conceptions of the humanities. Furthermore, these projects demonstrate that DH work is not singularly playful or hypothesis-generating but can also answer meaningful research questions, generate plausible new interpretations of texts, and productively situate texts within broader social discourses. Yet, equally important, these cases demonstrate that it through a critical dialogue between the digital humanities and its analogue counterpart that these projects did not merely refine their own method but, in grappling with the relation between the digital and the humanities, also developed a richer sense of humanistic inquiry more generally. These interpretations would have been impossible by "just reading the texts" and instead work in the gap between the digital and the humanities in order to force the humanities to contend with its own silences and structural exclusions. 34

The first example comes from the University of British Columbia in the late 1960s when an upstart graduate student, Sandra Djwa, was completing her doctoral dissertation. The subject of Djwa's thesis, a study of the continuity of poetic style in Canadian poetry from its earliest moments to its manifestation in the 1960s, was viewed as uninteresting and marginal by her department, where Canadian poetry was regarded as a relatively minor and uninteresting area of study. [14] Djwa would go on to be a major figure in Canadian literature in the latter half of the twentieth century. 35

Djwa set herself the enormous task of disagreeing with a number of Northrop Frye's arguments in his infamous conclusion to Carl Klinck's *Literary History of Canada* (1965). Djwa was writing in the shadow of the *Literary History*, an ur-text of Canadian literature that attempted to marshall together scattered pockets of Canadian literary scholarship. Frye's "Conclusion" was the final statement of the *Literary History*, a closing gesture that organized a variegated and uneven jumble of texts and histories into a cohesive articulation of national literature via a thematic mode of criticism. In the *Literary History* and elsewhere, Frye argues that Canadian literature evinces a "garrison mentality" wherein the Canadian writer imagines themselves fortified against indifferent, external forces. Frye's "Conclusion" attempted to marshal together the diverse and uneven chapters in the *Literary History* and to do he claims that Canadians struggle to survive in the face of the harsh elements. Frye's work set the tone for Canadian Literature for years; one of Djwa's central goals was to develop a method to disagree with Frye's thesis. 36

Making her project even more contentious, Djwa elected to use computational literary studies as a component of her research. While writing her dissertation, Djwa received a grant from the newly established UBC Computing Centre to use their IBM 7044 mainframe computer to develop a "Computational Concordance" of Canadian poetry. This concordance took seven years to complete and accompanied her dissertation as a thematic guide for fourteen Canadian poets, ranging from Isabella Valancy Crawford to Irving Layton. As she explains in her article, "Canadian Poetry and the Computer" (1970): 37

"The procedure followed was the same in all cases. Each poet's published books ... were key-punched on computer cards at the rate of one typographical line per computer card. The ... cards containing the poet's canon were then fed into an IBM 7044 computer for printout. Following [manual] proofreading and necessary corrections, the computer drew up a word frequency count. This is an alphabetical index listing every word that a poet uses and indicating its frequency of appearance. On the basis of the critic's understanding of a poet's work, and taking into consideration both the frequency of occurrence of particular words and the apparent collocations or associations of clusters of words, a selected list of words under the heading of thematic categories was then drawn up by hand" [Djwa 1971]. 38

Djwa happily notes, in the handout for her presentation at "The Learned Societies, ACCUTE, Winnipeg, June 1970," (1970) that this "convenient" process produced approximately 300,000 computer cards which were then used to create a "selective, associative thesaurus" of poetic terms. Djwa employs Brown's method of "minding the gap" between the digital and the humanities: reading and proofreading punch cards in order to compare the "word frequency count" against "the critic's understanding of a poet's work" and the "apparent collocations or associations of clusters of words." From this, Djwa develops a "selected list of words under the heading of thematic categories " [Djwa 1971]. 39

Djwa's work is not merely notable for its historical significance as an early, largely unknown DH project by a woman, but also for the manner in which her turn to digital methods required that she develop new paradigms for engaging in humanities research. She is asking questions that are only partially formed while simultaneously inventing, on the go, a method for working through them. She wrestled with familiar questions in DH: which words to exclude (stopwords), how to contend with words that are very similar but with different suffixes (stemming), how to treat multiple editions of a poem, and how to "read" this computational concordance alongside her more traditional dissertation. Furthermore, she had to define, far more accurately than Frye, what she meant by "unity" in a poetic tradition, thematicism, and cluster. 40

Djwa and Frye were, in many respects, beginning from the same research question: 'Is there a thematic or formal continuity between Canadian writers that enables critics to identify a distinct Canadian literature?' Djwa responded to Frye's inductive approach with her own deductive, digital method that enriches our understandings of theme, image, and national literature. It is in the exchange between these two visions of humanistic inquiry that Djwa developed her analysis. 41

The history of Djwa's work also reveals the manner in which marginalized and emerging voices use new, digital methods to challenge convention, transform scholarly debates, and pose new questions. Indeed, the influence of her concordance became particularly complex when poet P.K. Page, one of the subjects of Djwa's study, wrote to her 42

requesting to know the word clusters and themes in her poetry. Djwa employed digital methods to challenge the authority of the male, established, central-Canadian dominance of Klinck, Frye, and others, and to reconstitute the field of inquiry by asking new questions enabled by her DH project. [15] Her digital work enables her to directly challenge Frye's cruel north thesis: "the isolation of [the] cold north hypothesis is an over-simplification when discussing the development of Canadian poetry, as it represents a concept which does not, in fact, appear to emerge in the earliest poets"[Djwa 1964]. Her work thus employs digital methods to offer a new conception of national poetic continuity and to foreground authors who were otherwise marginalized from the national canon.

Lauren F. Klein's (2020) "Dimensions of Scale: Invisible Labor, Editorial Work, and the Future of Quantitative Literary Studies" offers a compelling second example of the use of digital humanities methods to reassess modes of reading, labour, and humanities research. Klein's project employs the distant reading method of topic modeling to read the corpora of a collection of abolitionist newspapers. Topic modeling is a statistical method of distant reading wherein a topic modeling algorithm attempts to iteratively group together related words, called topics, across a large corpus [16] in order to identify topics, that would be invisible to an individual reader. Klein writes, "Framed in this way, topic modeling becomes a meaningful analytical tool indeed: it not only enables a view from a distance but also helps bring to light certain invisible aspects of knowledge production" [Klein 2020]. Klein builds on the work of Lisa Rhoady, Rachel Buurma, and others who have used topic modeling to identify subtle trends in large corpora. 43

Klein begins with the observation that two female editors of her collection of abolitionist publications, Mary Ann Shadd and Lydia Maria Child, engaged in a great deal of invisible labour in their efforts to keep the publications afloat, fill the publications with material, and advocate on behalf of the abolitionist cause. She argues that 44

"Shadd's editorial work exemplifies … invisible labor, a term that has come to encompass the various forms of labor that are literally invisible because they take place out of sight, or economically invisible because they take place away from the marketplace. … The project of infusing value and credit into invisible labor … is a feminist one because, among other reasons, the primary example of invisible labor is unpaid domestic work, which has historically been performed by women" [Klein 2020]. 45

Klein's intuition is that topic modeling can provide a broad and unique view of her corpus that can unearth Shadd's and Child's invisible labour. She employs digital methods to "consider how a topic model of a set of abolitionist newspapers can be used to better understand Child's strategy of editorial *copia*. … And … Shadd's similarly invisible editorial work" [Klein 2020]. 46

Klein compares her topic model of the collection of abolitionist newspapers to a similar model of *Frederick Douglass' Paper* ("the title that Douglass would adopt when [Douglass's] *The North Star* merged with another abolitionist title" [Klein 2020] and shows how the papers edited by Shadd and Child were far more concerned with quotidian experience and reflections on nature, foreign affairs, and family life than Douglass's paper. Klein demonstrates that Child's and Shadd's presence as editors employed depictions of family and daily life, including recipes, songs, and local news, in order to draw readers to the abolitionist cause. Furthermore, Klein argues, the topic models of the newspapers "crystallizes just how intent Shadd was on expanding her readers' sense of the possibilities of black life" [Klein 2020] by representing Black quotidian experience in her papers. More broadly, Klein argues that the breadth of topics identified in Shadd's editorial work demonstrates how, in Frances Smith Foster's (2005) terms, "people of African descent used their print culture to help reinvent themselves as African Americans and to construct African America" [Foster 2005]. 47

Klein uses her distant reading methods to inform her research into Child's archives, specifically in relation to a letter in which Child explains suffering under a "flood" of labour and correspondence connected to her invisible editorial duties. Klein convincingly argues that, 48

"In Child's letter is found, on the one hand, an additional justification for a quantitative approach to analyzing the *Standard*. … the letter provides evidence of a form of intellectual labor that cannot be precisely located by any literary research method. Child's own arguments — the "three editorials" that she claims she would have written had she not been consumed by her editorial work — never made it out of her head. For this reason, we do not have the text of those editorials to analyze" [Klein 2020]. 49

Klein uses Clement's differential reading to move between close analysis of Child and Shadd's writing and distant analysis of their archives to foreground the invisible labour of these female abolitionists. Topic modelling is a "meaningful analytical tool" for Klein because it brings "to light certain invisible aspects of knowledge production" [Klein 2020]. Klein's topic modeling of Child's archives, for instance, demonstrates a "fairly event split between political topics" concerned with abolition and "and the 'miscellaneous material' Child deployed as a ruse" to draw an apolitical or uncommitted readership to the abolitionist cause. She is able to conclude, from these topics, that Child effectively blended her political agenda with the miscellany in order to further her abolitionist goals. It is as a result of her topic modeling work (alongside her archival research and reading of Child's correspondence) that Klein is able to argue that acknowledge "the full range of labor — the various forms it entailed and the degrees of effort it involved — that Child contributed to the abolitionist cause" [Klein 2020]. 50

To return to Brown's formulation, both Klein and Djwa's projects represent moments of minding the gap between the digital and the humanities, identifying the particular ways in which digital projects require a renewed consideration of humanities work. Djwa's development of her computational concordances soon give rise to questions of what actually constitutes a national poetic tradition. Klein's topic modeling reflects both on the meaning of a topic, attendant as it is to both the implicit and explicit content of the papers she analyzes, and the forms of unrecognized labour that Black women engage in as part of their projects of freedom making. Yet beyond these practical, methodological concerns, both examples employ the digital in order to challenge the received orthodoxy of their respective fields. Djwa's thematic concordance of Canadian poets describes a counter-tradition that identifies a number of thematic clusters of Canadian poetry that challenge Frye's cruel north thesis. Klein's analysis demonstrates how digital methods can provide insight into Black women's invisible work in their writing. 51

Examples such as these are countless. [17] The Orlando Project and the Canadian Writing Research Collaboratory are two projects that make women's writing and feminist epistemologies the basis for digital humanities research. The Early Modern Map of London project brings together DH methods of textual analysis, GIS mapping, and natural language processing to identify heretofore-invisible networks of relationships in London. The Women's Writers project employs TEI methods to understand the transatlantic reception, circulation, and readership of women's writing. The Linked Infrastructure for Networked Cultural Scholarship (LINCS) project employs linked, open data and the semantic web to connect disparate and bespoke humanities project, working from the intuition that linked datasets will reveal new insights about their shared materials. 52

Fish's and Da's attacks on CLS and DH neglect the manner in which these digital methods challenge retro-humanism as well as the hegemony of particular voices within traditional conceptions of humanities work. By restricting their criticism to the textual analytics subset of DH, Fish and Da offer a narrow conception of the field and of its possibilities to interrogate power as a component of humanities work. Indeed, Klein (2020) identifies the manner in which the retro-humanist critique of DH excludes those who use digital tools to recover overlooked texts, compile new datasets, and preserve fragile archives" in order to challenge the hegemony of the "individualistic, masculinist mode of statistical criticism" and offer a competing vision of the humanities. Their critiques cannot account for the exciting and invigorating ways in which "the black digital humanities promotes a system of changes," particularly as "a mechanism for deregulating the tendency of technological tools, when employed in the digital humanities, to deemphasize questions about humanity itself" [Gallon 2016]. Similarly, their retro-humanist vision excludes the manner in which "black digital practice is the interface by which black freedom struggles challenge reproduction of black death and commodification" [Johnson 2018]. Indeed, DH scholars "argue for positioning queerness as a central element of DH methodologies"[Ruberg et al. 2018], for the way they insist that DH "investigations must incorporate race from the outset, understanding and theorizing its function as a ghost in the digital machine" [McPherson 2012], and for the manner in which DH work must be informed by "critical race and ethnic studies; feminist, gender, queer studies; postcolonial, transnational, diaspora; disability studies; DIY (Add your own!)" [Risam 2015]. In place of this worldly, critical DH, Fish and Da offer the naive conception of "reading literature well" as a subtle retro-humanism that falsely "represents *a fundamental opposition in thinking* between humanities theorists and deliberately anti-theoretical DH 'builders'" [Nowviskie 2014]. 53

Digital humanities work is not merely important because it brings humanities work to bear on the digital technologies, texts, and modes of being that have become increasingly 54

important in our lives. It is also important because working in the space of the gap crucially requires that we re-envision what we mean by the humanities. Advocates of retro-humanism know full well that the humanities have always been a site of struggle and they conceal that struggle in their call to a return to past principles of "optimal utility," "humanist sensitivity," or "the task of interpretation as traditionally conceived." At a time when the very value of the humanities is under siege, DH offers opportunities to transform narrow visions of the humanities' 'value' into humanities-based interrogations of the "value of value" [Butler 2014]. The challenge for digital humanities now is not "choose between the philosophical, cultural, and computational," [Bianco 2021] or to demonstrate how DH accords with past visions of humanities work. Rather, our challenge is to respond to Diana Brydon's (2011) call that "the humanities need a new humanism" and to dwell in the gap between the digital and the humanities in order to investigate humanism's source code and write it anew.

Notes

[1] She claims to be analyzing a subfield "variously known as cultural analytics, literary data mining, quantitative formalism, literary text mining, computational textual analysis, computational criticism, algorithmic literary studies, social computing for literary studies, and computational literary studies" [Da 2019].

[2] This self-citation borrows, in content and form, from his own 1973 essay, "What Is Stylistics and Why Are They Saying Such Terrible Things About It" (Fish 1973). In this critique of Louis Milic's *A Quantitative Approach to the Style of Jonathan Swift*, Fish (1982) asserts that "there is nothing in the machinery that Milic cranks up to authorize the leap (from the data to a specification of their value) he makes" [Fish 1982]. In his more recent "The Interpretive Poverty of Data" (2018) (in which he dredges up the case of Milic once again) he recycles the phrasing further: "More often than not, the mountainous machinery it usually cranks up labors to produce something less even than a mouse; you wade through a whole lot of charts, distribution patterns, selection patterns, contiguity patterns and find waiting for you at the other end something that would have been obvious from the get-go to a ten year old" [Fish 2018].

[3] Generally speaking, CLS can be understood as a textual subset of DH. The authors of *Digital_Humanities* argue that "Digital Humanities projects can be described by sketching their structure at several levels" [Burdick et al 2012] including, but not limited to: design, computation, processing, digitization, classification, description, metadata, organization, navigation, curation, analysis, editing, modeling, prototyping. See also *Defining Digital Humanities: A Reader* for a number of definitions. Katherine Bode suggests that "Da's idiosyncratic definition of CLS is partly a product of problematic divisions within digital literary study" but also insists that Da's definition "omits what I'd call digital literary scholarship: philological, curatorial, and media archaeological approaches to digital collections and data" [Bode 2019].

[4] The work of Sylvia Wynter [Wynter 1987], for instance, demonstrates the relationship between the "Overrepresentation "of "Man"as an epistemic category and methods of reading. She insists upon "'Minority' Literary Criticism" "In order to introduce and integrate … several 'new objects of knowledge'" which "call equally for the construction of new conceptual tools and theoretical foundations, which this time go beyond *not* only the hegemonic paradigms of literary criticism but also beyond the grounding analogic of the episteme … of which our present practice of literary criticism … is an inter-connected component" [Wynter 1987].

[5] Da asserts that "It may be the case that computational textual analysis has a threshold of optimal utility" [Da 2019] with no reflection on whether "utility" is an appropriate measure for modes of reading or what kind of utility she is asserting. Similarly, Tom Eyers's critique "laments the loss of humanist sensitivity" [Eyers 2013] that comes with digital humanities should rankle any critic with a cursory understanding of postcolonial, Black, diasporic, feminist, or queer criticisms and theories, all of which have shown the serious limitations of conceiving of traditional forms of "humanist sensitivity" [Eyers 2013]. Eyers also misunderstands the function of exegesis throughout his article, arguing that DH scholarship fails "to consider the crucial conflict between the methodology employed and the wider, catholic form of interpretation argued for" [Eyers 2013]. While simultaneously arguing that DH practitioners fall prey to the "alluring transparency afforded by the sharp technological lenses," he contradictorily also states that DH practitioners, "while acknowledging the fundamental discrepancy between the act of computation itself and the subsequent act of critical interpretation, nonetheless considers the gap easily and unproblematically surmountable" [Eyers 2013]. Eyers's argument is not only internally contradictory, it demonstrates a shocking lack of familiarity with the numerous DH critics who, as I will show, have spent a large portion of their careers theorizing "the gap" between the digital and the humanities.

[6] This is evident even in a critique like "Neoliberal Tools (and Archives): A Political History of the Digital Humanities" [Allington et al. 2016] in which the authors draw a stark division between scholarship and denigrated service work (which, as Lauren Klein notes, are "performed disproportionally by women and people of color" [Klein 2019] while offering a singular historical genesis of DH via the University of Virginia. They also strangely dismiss Johanna Drucker as "an eclectic scholar and artist with an idiosyncratic relationship to the humanities" [Allington et al. 2016].

[7] She writes that "humanistic inquiry" of digital and visual modes of representation "requires first and foremost that we reconceive all data as capta. Differences in the etymological roots of the terms data and capta make the distinction between constructivist and realist approaches clear. Capta is 'taken' actively while data is assumed to be a 'given' able to be recorded and observed. From this distinction, a world of differences arises" [Drucker 2011].

[8] For Fish, intentionality is a key aspect of literary interpretation insofar as an observed textual pattern must correlate with author intentionality in order for a reading to be coherent. Yet he relies on a colloquial, implicit understanding of intent that forecloses certain readings. Said (1975), for instance, conceives of intent as "the link between the idiosyncratic view and the communal concern" and as a "notion that includes everything that later develops out of it, no matter how eccentric the development or inconsistent the result" [Said 1975].

[9] Clement (2019) interprets four central aspects of Perloff's differential reading: "As rhetoric or practical criticism … As philosophy … As art of a unique aesthetic construct … [and] As cultural production" [Clement 2019].

[10] Ironically, while Fish mischaracterizes the field, treating a small subset of DH work as representative of the whole enterprise, he finds himself, here, in agreement with a number of DH scholars. Drucker (2011), for instance, has demonstrated the misuse of diagrams and graphical display in the visualization of data and calls for "a new approach that uses humanities principles to constitute capta and display" [Drucker 2011] as well for "imaginative action and intellectual engagement with the challenge of rethinking digital tools for visualization on the basic principles of the humanities" [Drucker 2011]. "Niels Kerssens" (2019) has stressed the constructedness of data, arguing that "data has no ground of existence independent of the human imagination of data" [Kerssens 2019].

[11] See, Wasserstein and Lazar (2016) and, Diettrich and Kong (1995).

[12] Fish's (1982) argument is mirrored in the form of his collection, as he reveals how his criticism is part of a temporal unfolding that is only possible as a response to Wimsatt and Beardsley. He writes, "The fact that I was making such an argument was a direct consequence of the fact that it had already been made, and the position I proceeded to take was dictated by the position that had already been taken … To the degree that this argument was influential … it constrained in advance the form any counterargument might take" [Fish 1982].

[13] How, then, do Da and Fish conceive of "reading well" or "just reading" the texts? To answer such a question, we might turn again to CLS in an effort to understand what Da (2019) means by "just reading." Da uses the word "just" twenty-four times throughout her article, most of which are to comment on the relative insignificance of an aspect of CLS scholarship. These uses of the term are characterized by statements such as: "CLS claims that literary critics will no longer make unsupported claims about whole periods of literary history using just a few texts""corpus 'entropy,' ... is just another way of saying 'two words that appear together'""'narrative events' are just 3-gram length subject+verb+object sequences""all the things that appear in CLS — network analysis, digital mapping, linear and nonlinear regressions, topic modeling, topology, entropy — are just fancier ways of talking about word frequency changes" [Da 2019]. Throughout her article, Da uses "just" liberally and rhetorically in order to smooth over false equivalencies (topic modeling is not a fancier way of "talking about word frequency changes") and to undermine or misrepresent the claims of CLS scholars (Algee-Hewitt's arguments about "corpus entropy" are not just about "two words that appear together). Her use of the term "just" is, as Fish warns, a "rhetorical ploy" designed to minimize the complexity of CLS arguments in order to dismiss them. In these instances, she uses "just" to assert critical expertise that she may not, in fact, possess, while also to conceal the complexity of a number of CLS projects with false simplicity. Da also uses "just" to signify a rational, no-nonsense approach to literary scholarship that contrasts effectively with what she argues is CLS's overwrought method of sound and fury. She writes: "If the authors wanted to nonarbitrarily study the change in topics covered in journal articles over time, they could have just saved time by looking at journal abstracts"[Da 2019]. "Couldn't someone trained in poetry just find, read, and classify [all the short poems that exist in the world]?" [Da 2019] "Functional operations would not be far faster and more accurate if someone just read the texts" [Da 2019]. Again, Da's use of "just" represents a complex CLS procedure (topic modeling the entirety of a corpus of literary journals or training an algorithm to identify a poem as a haiku) as an overly-complex version of a far more straightforward form of interpretation ('just' read every abstract of thousands of articles in journals, 'just' read every short poem in the world).

[14] As she describes it in our recent correspondence: "My colleagues saw no use whatever for computer concordances and would not give me any academic credit for the work I had done in this area."

[15] Djwa (1973) worries that critics might dismiss her entire project "as simply vague transcendental aspiration, the Canadian backwash of Victorian romanticism" [Djwa 1971]. Yet, she persists: "granted that the

common terms of diction are also very probably inherited, a more helpful approach might be the question of whether or not our poets did something unique with their particular inheritance. Did they construct a particular myth or cosmology from the common terms of romantic diction; and, if so, was there any continuance of myth or diction?" [Djwa 1971].Djwa shows that Charles G.D. Roberts "consistently uses the word 'dream' and that it most commonly collocates with 'sleep,' 'vision,' 'spirit,' and 'mystic'" all in order to demonstrate how "the 'dream' emerges primarily as a description of the poet's aspiration towards 'the Spirit of Beauty' beyond nature" [Djwa 1971]. She then demonstrates how "Archibald Lampman adopts Roberts' dream metaphor and with it much of his poetic myth". After moving through a number of observations of the concordance in dialogue with close readings of the poems, she concludes that "there was, in fact, a very close relationship between the major poet of the 1880s, Sir Charles G. D. Roberts, and the major poets of the 1920's, E.J. Pratt - a bend in the stream of Canadian poetry rather than the sharp break suggested by present critical comment. Further, it is possible that A.J.M. Smith, D.C. Scott, A.M. Klein, although busy carving out new provinces for poetry, were also fully aware of the work done by their predecessors and contemporaries" [Djwa 1971].

[16] For a more detailed discussion of topic modeling see Blei (2012), Brett (2012), Underwood (2012), Barrett (2016), Churchill and Singh (2022).

[17] For recent examples, see Roopika Risam and Kelly Baker Joseph's "The Digital Black Atlantic "(2021), particularly Sayan Bhattacharyya's (2021) "Text Analysis for Thought in the Black Atlantic" and my own (2021) discussion of using distant reading methods to analyze Austin Clarke's literary corpus. See also Richard Jean So's "Redlining Culture: A Data History of Racial Inequality and Postwar Fiction" (2020) which employs DH to demonstrate the bias towards white authors in postwar American publishing. See also Mark Algee-Hewitt, J.D. Porter, and Hannah Walser's (2020) "Representing Race and Ethnicity in American Fiction, 1789-1920" which uses digital methods to analyze racial discourse in 18,000 novels published between 1789 and 1920.

Works Cited

Algee-Hewitt et al 2020 Algee-Hewitt, M. et al. (2020) "Representing race and ethnicity in American fiction, 1789-1920",*Journal of Cultural Analytics*, 5(2). Available at: https://culturalanalytics.org/article/18509-representing-race-and-ethnicity-in-american-fiction-1789-1920 (Accessed 20 February 2024).

Allington et al. 2016 Allington, D. et al. (2016) "Neoliberal Tools (and Archives): A Political History of Digital Humanities", *Los Angeles Review of Books.* Available at: lhttps://lareviewofbooks.org/article/neoliberal-tools-archives-political-history-digital-humanities/ (Accessed 25 June 2019).

Augustine, of Hippo, Saint 1940 Augustine, of Hippo, Saint (1940) *The confessions of Saint Augustine*. New York: Peter Pauper Press.

Barrett 2016 Barrett, P. (2016) "Paraphrasing the oaraphrase or what I learned from reading every issue of Canadian Literature & SCL / ELC",*Canadian Literature*, 228-9, pp. 208-225.

Barrett 2021 Barrett, P. (2021) "Austin Clarke's digital crossings", in Roopika Risam and Kelly Baker Josephs (ed.) *The Digital Black Atlantic.* Minneapolis: Minnesota Press, pp. 84-94.

Bhattacharyya 2021 Bhattacharyya, S. (2021) "Text analysis for thought in the Black Atlantic", in Roopika Risam and Kelly Baker Josephs (eds.) *The Digital Black Atlantic*. Minneapolis: University of Minnesota Press, pp. 77-83.

Bianco 2021 Bianco, J. "S." (2012) "This digital humanities which is not ene" in Matthew K. Gold (ed.) *Debates in the Digital Humanities.* Minneapolis: University of Minnesota Press, 96-112.

Blei 2012 Blei, D. (2012) "Probabilistic topic models", *Communications of the ACM* 55(4), pp. 77-84.

Bode 2019 Bode, K. (2019) "Computational iterary studies: Participant forum responses, Day 3", *In the Moment*, 3 April 2019. Available at: https://critinq.wordpress.com/2019/04/03/computational-literary-studies-participant-forum-responses-day-3-5/

Bode 2023 Bode, K. (2023) "What's the matter with computational literary studies", *Critical Inquiry*, 49(4), pp. 507-529.

Brett 2022 Brett, M. R. (2022) "Topic modeling: A basic introduction", *Journal of Digital Humanities*, 2(1). Available at: https://journalofdigitalhumanities.org/2-1/topic-modeling-a-basic-introduction-by-megan-r-brett/. (Accessed 10 March 2024).

Brown 2011 Brown, S. (2011) "Don't mind the gap: Evolving models of scholarly production across the digital-humanities divide", in Daniel Coleman and Smaro Kamboureli (eds.) Retooling the humanities: The Culture of research in Canadian universities. Edmonton: University of Alberta Press, pp. 203-232.

Brydon 2011 Brydon, D. (2011) "Do the humanities need a new humanism?", in Daniel Coleman and Smaro Kamboureli (eds.) *Retooling the humanities: The culture of research in Canadian universities*. Edmonton: University of Alberta Press, pp. 233-262.

Burdick et al 2012 Burdick, A. et al. (2012) *Digitial humanities.* Cambridge: MIT Press.

Butler 2014 Butler, J. (2014) "Ordinary, incredulous", in Peter Brooks and Hilary Jewett (eds.) "The humanities and public life". New York: Fordham University Press, pp. 15-39.

Churchill et al. 2022 Churchill, R. and Singh, L. (2022) "The evolution of topic modeling", *ACM Computing Surveys*, 54(10s), pp. 1-25.

Clement 2019 Clement, T. (2019) "Text analysis, data mining, and visualizations in literary scholarship"", *Literary Studies in the Digital Age: An Evolving Anthology*. Available at: https://dlsanthology.mla.hcommons.org/text-analysis-data-mining-and-visualizations-in-literary-scholarship/. (Accessed 25 June 2019).

Culler 1981 Culler, J. D. (1981) *The pursuit of signs: Semiotics, literature, deconstruction*. Ithaca: Cornell University Press.

Da 2019 Da, N.Z. (2019) "The computational case against computational literary studies", *Critical Inquiry*, 45(3), pp. 601–39.

Da 2019b Da, N.Z. (2019b) "Errors", in *In the moment*. 2 April 2019. Available at: https://critinq.wordpress.com/2019/04/03/computational-literary-studies-participant-forum-responses-day-3-5/. (Accessed 10 June 2019).

Dietterich et al. 1995 Dietterich, T. G. and Kong, E.B. (1995) "Machine earning bias, statistical bias, and statistical variance of decision tree algorithms". Available at: http://www.cems.uwe.ac.uk/~irjohnso/coursenotes/uqc832/tr-bias.pdf. (Accessed 18 June 2019).

Dimensions of Scale 2020 No author (2020) "Dimensions of scale: Invisible labor, editorial work, and the future of quantitative literary studies", *PMLA*, 135(1), pp. 23-39.

Djwa 1964 Djwa, S. (1964) *Metaphor, world view and the continuity of Canadian poetry: A study of the major English Canadian poets with a computer concordance to metaphor.* University of British Columbia, PhD dissertation.

Djwa 1971 Dwja, S. (1971) "Canadian poetry and the computer", *Canadian Literature*, 46, pp. 43-54.

Drucker 2011 Drucker, J. (2011) "Humanities approaches to graphical display", *Digital Humanities Quarterly*, 005(1). Available at: https://www.digitalhumanities.org/dhq/vol/5/1/000091/000091.html. (Accessed 10 May 2022).

Egan 2016 Egan, J. (2016) "Literary data mining: A review of Matthew Jockers, Macroanalysis: Digital methods and literary history.", *Digital Humanities Quarterly*, 10(3). Avalaible at: http://www.digitalhumanities.org/dhqdev/vol/10/3/000266/000266.html#:~:text=Matthew%20Jockers'%20Macroanalysis%20asks%20us,data%20mining%20for%20studying%20literature. (Available 5 June 2022).

Eyers 2013 Eyers, T. (2013 "The perils of the 'digital humanities': New positivisms and the fate of literary theory", *Postmodern Culture*, 23(2). Available at: https://www.pomoculture.org/2015/07/08/the-perils-of-the-digital-humanities-new-positivisms-and-the-fate-of-literary-theory/. (Accessed 20 February 2022).

Fanon 1961 Fanon, F. (1961) *The wretched of the earth*, trans. Richard Philcox. New York: Grove Press.

Fee 1981 Fee, M. (1981) *English-Canadian literary criticism, 1890 – 1950: Defining and establishing a national literature*. University of Toronto, PhD dissertation.

Fish 1982 Fish, S. (1982) *Is there a text in this class? The authority of interpretive communities*. Cambridge: Harvard University Press.

Fish 2012 Fish, S. (2012) “Mind your p’s and b’s: The digital humanities and interpretation”, *Opinionator*. Available at: https://opinionator.blogs.nytimes.com/2012/01/23/mind-your-ps-and-bs-the-digital-humanities-and-interpretation/. (Accessed 20 May 2019).

Fish 2012b Fish, S. (2012b) “The digital humanities and the transcending of mortality”, *Opinionator*, 9 January 2012. Available at: https://opinionator.blogs.nytimes.com/2012/01/09/the-digital-humanities-and-the-transcending-of-mortality/. (Accessed 20 May 2019).

Fish 2018 Fish, S. (2018) “The interpretive poverty of data”, *Balkanization*. Available at: https://balkin.blogspot.com/2018/03/the-interpretive-poverty-of-data.html. (Accessed 25 May 2019).

Fish 2019 Fish, S. (2019) “Afterword: Computational literary studies: Participant forum responses, day 3”, *In the Moment*. Available at: https://critinq.wordpress.com/2019/04/03/computational-literary-studies-participant-forum-responses-day-3-5/. (Accessed 10 June 2019).

Fish 2019b Fish, S. (2019b) “If you count it, they will come”, *New York Journal of Law and Liberty*, 12(2), pp. 333-351.

Foster 2005 Foster, F.S. (2005) “A narrative of the interesting origins and (somewhat) surprising developments of African-American print culture” *American Literary History*, 17(4), pp. 714-40.

Galey et al. 2010 Galey, A. and Ruecker, S. (2010) “How a prototype argues”, *Library and Linguistic Computing*, 25(4), pp. 405-424.

Gallon 2016 Gallon, K. (2016) “Making a case for the Black digital humanities”, in Matthew F. Gold & Lauren Klein (eds.) *Debates in the Digital Humanities 2016*. Minneapolis: University of Minnesota Press, pp. 42-49.

Gilroy 1993 Gillroy, P. (1993) *The Black Atlantic: Modernity and double-consciousness*. Cambridge: Harvard University Press.

Johnson 2018 Johnson, J.M. (2018) “Markup bodies: Black [life] studies and slavery [death] studies at the digital crossroads”, *Social Text*, 36(4), pp. 57-79.

Keith 2006 Keith, WJ. (2006) *Canadian literature in English, volume 2*. Erin, ON: The Porcupine's Quill Press.

Kerssens 2019 Kerssens, N. (2019) “De-agentializing data practices: The shifting power of metaphor in 1990s discourses on data mining”, *CA: Journal of Cultural Analytics*, 1(1). Available at: http://culturalanalytics.org/2019/05/de-agentializing-data-practices-the-shifting-power-of-metaphor-in-1990s-discourses-on-data-mining/. (Accessed 10 June 2020).

Klein 2019 Klein, L.F. (2019) “Computational literary studies: Participant forum responses, Day 3”, *In the Moment*. Available at: https://critinq.wordpress.com/2019/04/03/computational-literary-studies-participant-forum-responses-day-3/. (Accessed 10 December 2020).

Klein 2020 Klein, L.F. (2020) “Dimensions of scale: Invisible labor, Editorial Work, and the Future of Quantitative Literary Studies”

Liu 2013 Liu, A. (2013) “The meaning of the digital humanities”, *PMLA*, 128(2), pp. 409-423.

McPherson 2012 McPherson, T. (2012) “Why are the digital humanities so white? or thinking the histories of race and computing”, in Matthew K. Gold (ed.) *Debates in the Digital Humanities*. Minneapolis: University of Minnesota Press, pp. 139-160.

Moretti 2013 Moretti, F. (2013) “'Operationalizing': or, the function of measurement in modern literary theory”, *Literary Lab*. Available at: https://litlab.stanford.edu/LiteraryLabPamphlet6.pdf. (Accessed 12 December 2020).

Nowviskie 2014 Nowviskie, B. (2014) “On the origin of ‘hack’ and ‘yack’”, *Bethany Nowviskie*. Available at: https://nowviskie.org/2014/on-the-origin-of-hack-and-yack/ . (Accessed 14 June 2019).

Perloff 2004 Perloff, M. (2004) *Differentials: Poetry, poetics, pedagog*. Tuscaloosa: University of Alabama Press.

Piper 2019 Piper, A. (2019) “There will be numbers”, *CA: Journal of Cultural Analytics*, 1(1). Available at: https://culturalanalytics.org/article/11062-there-will-be-numbers. (Accessed 25 June 2019).

Potter 1988 Potter, R. (1988) “Literary criticism and literary computing: The difficulties of a synthesis”, *Computers and the Humanities*, 22(2), pp. 91-97.

Risam 2015 Risam, R. (2015) “Beyond the margins: Intersectionality and the digital humanities”, *Digital Humanities Quarterly*, 0009(2). Available at: https://digitalhumanities.org/dhq/vol/9/2/000208/000208.html. (Accessed 20 June 2020).

Risam et al. 2021 Risam, R. and Josephs, K.B. (2021) *The ditgial Black Atlantic*. Minneapolis: University of Minnesota Press.

Ruberg et al. 2018 Ruberg, B., Boyd, J., and Howe, J. (2018) “Toward a Queer digital humanities”, in Elizabeth Losh and Jacqueline Wernimont (eds.) *Bodies of Information: Intersectional Feminism and Digital Humanities*. Minneapolis: The University of Minnesota Press, pp. 108-127.

Said 1975 Said, E.W. (1975) *Beginnings: Intention and method*. New York: Columbia University Press.

So 2020 So, R.J. (2020) *Redlining culture: A data history of racial inequality and postwar fiction*. New York: Columbia University Press.

The Computational Case against Computational Literary Studies No author (2019) “The computational case against computational literary studies”, *Critical Inquiry*, 45(3), pp. 601-39.

The Text, the World, the Critic 1975b No author (1975b) *The bulletin of the midwest modern language association*, 8(2), pp. 1-23.

Underwood 2012 Underwood, T. (2012) “Topic modeling made just simple enough”, *The Stone and the Shell*. Available at: https://tedunderwood.com/2012/04/07/topic-modeling-made-just-simple-enough/. (Accessed 25 June 2019).

Wasserstein 2016 Wasserstein, R. L. and Lazer, N. A. (2016) “Editorial”, *The American Statistician*, 70(2), pp. 129-33.

Wynter 1987 Wynter, S. (1987) “On disenchanting discourse: ‘Minority’ literary criticism and beyond”, *Cultural Critique*, 7, pp. 204-244.