Unpacking the Universal Library:
Digital Reading and the Recirculation of Economic Value

Mike Edwards

Problems

I began drafting this article by drawing from books tabbed with sticky notes, scraps of ideas dashed on backs of lesson plans, electronic notes taken from e-books on laptop and smartphone, blog posts, marginalia from journals, starred articles from RSS feeds, instant messages, projects from graduate school, notes to myself archived in the networked cloud, and PDFs of other scholarship I'd tagged with database applications: all these I'd aggregated via diverse scribal, print, and digital methods. In re-reading them, I recall the report of Walter Benjamin's desire to compose an essay entirely from quotations, and the account Benjamin offers in "Unpacking My Library" of his emotional attachments to the collected texts he is removing from storage. I was remixing my paper- and screen-based academic ephemera. That sensation—of drawing together a history of reading and remixing that history—is at the

heart of this article, which investigates the line between print and screen in academic reading.

My investigation begins from recent debates over reading in college classrooms. Accounts offered by such authors as Nicholas Carr and David Mikics argue that increasingly overwhelming arrays of digital media are distracting students and interfering with their ability to read carefully. Many of these accounts assert that the abilities required to interact with texts—to read—are no different than they were before access to the Internet became ubiquitous. That twofold story has been taken up in a number of academic circles, to the point where the pedagogies offered in our classrooms are seen as sites where digital technologies interfere with students' abilities to read, write, and think, to pernicious effect. Such accounts represent digital technologies as analogous to the Library of Babel imagined by Jorge Luis Borges, wherein meaning is only to be found in its proliferation and deferral among an infinite corpus of texts. Digital technologies are not only distractions, the argument goes: they are fundamentally altering and harming our students' intellects. Yet these critiques also suggest that in digital environments of pervasive distraction, the mental attributes needed by students to succeed remain unchanged. So two claims: first, that the pedagogical approaches associated with English studies suffer harm from the digital technologies that distract our students and diminish their abilities to engage in the sustained attention required by the texts we ask them to read. Second, that even in such technological and cultural change, what is required of our students remains unchanged, and reading itself remains unchanged.

Both claims are suspect. There are diverse approaches to and purposes for reading in the college English classroom. Those diverse approaches and purposes have evolved. The contradictory positions that reading digitally is not very different from reading print texts, and that today's students are increasingly conditioned by digital technologies to be unable to read well, are mistaken: aspects of reading digitally are quite different from reading print texts, and today's students are developing new forms of literacy to cope with environments of pervasive ambient information. Understanding reading as valuable labor in a diverse economy involving overdetermined relations of print and digital production, distribution, use, and reproduction can help us attend to the value of new literate practices.

In "Unpacking My Library," Benjamin describes opening crates of rare volumes and suggests that a collector bears "a relationship to objects which does not emphasize their functional, utilitarian value. . . but studies and loves them as the scene, the stage, of their fate" (1969: 60). Benjamin's reading—his unpacking of his experience—aggregates past value in its unique history beyond the utility of the books, and carries multiple forms of value. Benjamin's re-encountering his history in text is valuable to him in the distance it sets between his initial experience and his later experiences of those texts, and valuable to us as its written record. Tracing those multiple forms of value can be important in teaching reading, as well.

On the first day of class, I often ask students to take out paper and pen, read a brief

passage, and answer a few questions about their responses to it, to react to the reading and observe their reactions' motivations and describe what they anticipate. Students see only their own answers: they place their answers into envelopes, write their names on the front, seal them, and return the envelopes to me. The envelopes go on the shelf in my office until the final class. The exercise is one in reading one's own ephemeral history and tracing the delta from that experiential moment: the change in meaning and value over time.

This "Envelope Exercise"—both in its first part, as I've described, and in its second part, to come—is not digital. It seeks self-monitoring self-immersion and observes the span of a social and historical traverse. This old media exercise can serve new media ends and encourage students to explore how technologies help histories, labor, and intellectual capital aggregate value over time. Writing itself is an interactive technology, but new media forms of writing often gather attention through new forms of interactivity: in their discussion of reading and new media, Jennifer Bay and Thomas Rickert distinguish "between immersion and interactivity," and note that "immersion is not an outdated or a rhetorical skill, but it is associated with the idea that a reader—a literary reading subject—divorces him or herself from reality to fully experience. . . a piece of literature" (2010: 127). That association with the split from reality into text seems to be what critics of students' use of digital technologies would promote: today's students apparently suffer from an inability to be distracted from the world for sufficient lengths of time.

The perspective offered by Bay and Rickert indicates skills are not so much outdated as they are conditions of history, technology, and context;,overdetermined and coexistent at any given moment. Benjamin suggests a belief in multiple approaches to and valuations of texts, and there are multiple ways of reading that critics of digital technologies overlook. Digital reading is significantly different from the print-based reading of earlier times.

So what are the particulars of the indictment offered against the forms of reading affected by digital technologies? The most easily stated comes from Carr, who declares that as a result of the Web, "the deep reading that used to come naturally has become a struggle" (2008: 57). Writing in the *New York Times*, Mikics (2014) argues that "we need some time away from the hopped-up, glittering online universe; we need solitude and careful thought [and] we need to sound the alarm about reading, to practice shutting out distraction so we can have the time and space we need for books" (2014: n.p.). In rhetoric and composition, Alice Horning (2012) offers a book-length study that seeks in part to demonstrate that "print-based reading forms the basis for any and all work in our increasingly digital world; moreover, the essential awarenesses and skills used by experts are the same in print and digital environments" (2012: 45): reading has changed for the worse, and is yet the same. Horning's study tests eight college students, averaging slightly under 19 years old (67), who fit the more general profile she perceives of "students [who] don't, won't, and can't read… extended nonfiction prose, well or at all" (43), and compares the results of those tests to those

of her other test group of 5 expert readers, averaging 66 years of age, and comprising 3 professors, 1 librarian, and 1 editor. In terms of reading ability, the results of Horning's comparison are unsurprising: Horning's expert readers possess the tested-for skills of "analysis, synthesis, evaluation, and application" (147). Why the eagerness to confirm this apparently unsurprising finding? What are Carr, Mikics, and Horning reacting against?

The skills associated with reading are changing in response to social and technological changes. Wyn Kelley and Henry Jenkins observe that "literacy is no longer read as a set of personal skills; rather, the new media literacies are a set of social skills and cultural competencies, vitally connected to our increasingly public lives online and to the social networks through which we operate" (2013: 48). Johndan Johnson-Eilola's list of what we do with digital texts, diverges from Horning's list of expert behaviors in interesting ways: "filtering, sorting, connecting, synthesizing, sharing" (2010: 48). Stephen Ramsay, observing the computer's propensity for counting, points out that "critical reading practices already contain elements of the algorithmic" (2011: 9). Katie Clinton, Henry Jenkins, and Jenna McWilliams invoke a vision in which "new media literacies could supplement and expand traditional print literacies in ways that enriched our culture and deepened our appreciation of classical stories" (2013: 5). Today's readers respond to an environment of increasingly pervasive ambient information in ways that seem alien to authors like Carr, Mikics, and Horning.

Practices

Borges imagines in "The Library of Babel" reading practices whereby the library inhabitants seek static meanings in an infinite number of insensible books. In response, the philosopher Willard Van Orman Quine imagines a "Universal Library," mathematically reduced to 131,072 two-inch strips of 17 characters of text, and even further to a dot and a dash: the "binary notation" (225) of the digital, wherein readings are in process, recombinant, algorithmic. Digital texts exist as discontinuous quanta of information. Digital techniques discretize and quantize analog phenomena, and so the digital's gaps (between the characters of an alphabet, between ones and zeroes) make it both reproducible and manipulable.

I believe we can read Quine's thought experiment in conjunction with the work of Mariolina Salvatori and Patricia Donahue to see digital reading as an extension of "thinking and activating the thoughts of another" (2012: 201). However, composition courses do not construct reading as a monolithic act. Reading carries a variety of purposes in composition courses, and those purposes are always connected to particular practices. Composition instructors assign reading for such purposes as

- **analysis** (breaking texts into components to examine their workings),
- **apprenticeship** (reading discipline-specific prose),

- **challenge** (engaging difficult texts to develop successful learning capacities),
- **development** (aligning subjectivities in relation to ideas),
- **didactics** (following guidelines and procedures, as in handbooks and rhetorics),
- **discovery** (writing about controversies or questions found in readings),
- **enculturation** (familiarizing with prominent ideas),
- **inquiry** (learning more about topics), and
- **modeling** (emulating approaches encountered in readings).

None of these purposes for reading is exclusive or static, and all are also present in the more digitally-oriented courses associated with computers and writing, a subfield of rhetoric and composition studies.

Just as the diverse purposes for reading influence the practices of reading, so do the practices of reading influence the purposes. These practices and purposes evolve, as a trajectory from Plato to Augustine to Marshall McLuhan to Stanley Fish might suggest. In computers and writing courses, the relative ease of digital reproducibility in conjunction with the increased complexity of software composing tools results in an increased focus on the purposes of didactics (engaging readings that instruct on how to use these complex tools), modeling (seeking to imitate and extend the effects of digital texts), apprenticeship (learning how to be an expert composer and coder), and analysis (looking under the hood to see how these digital texts function, and reproducing or incorporating that functionality into new digital texts). Digital reproducibility also increases the sociality of reading, just as the invention of print did in its time. In some ways, then, courses with an increased focus on the digital are even more oriented toward the production of texts. That productive orientation is an updated instance of the practices Salvatori describes in "Pedagogy: From the Periphery to the Center" (1989):

> to read a text in order to examine, to reconstruct the process, the work *in fieri*, calls attention to the experienced writer's successive phases of evolution and discovery, and makes it possible for a teacher to read an inexperienced writer's writing, and to teach him or her how to read it, as a manifestation of similar struggles with language. (28)

Salvatori later opposes such practices to those that see "reading immobilized within textbooks and reduced therein to sets of disparate simplifying practices that. . . turn into meaningless and arbitrary *exercises*: reading for *the main idea*, for *plot*, for *argument*, for *meaning*, for *message*" (1996a: 184). These, asserts Salvatori, are "practices that restrain students and teachers from asking questions of a text other than the ones the textbooks have already 'gridded'" (184). They shut down discussion and inquiry, and so shut down learning, while an increased digital focus on processes might encourage a more active learning.

Humanities scholars are using digital processes to read large corpuses of texts and investigate how many times certain clusters of theorists cite one another, or how often certain key critical terms show up in articles. In other words, just as technologies of literacy

exteriorized memory thousands of years ago and made possible new ways of perceiving and responding to the world, so today digital technologies are exteriorizing quantizing processes and so making possible new ways of perceiving and responding to the world. Today, digital reproducibility makes it easy for students to put multiple quotations into conversation with one another (recall Benjamin's desire to compose an essay entirely out of quotations) via a simple CTRL-C, CTRL-V combination and thereby heightens social concerns about textual appropriation. Today, as a result of digital technologies' vast increase in the volume of available information, reading is more participatory, distributed, and ambient.

We have new digital tools to help read, manage, and visualize that volume of available information, including syndication of Web site outputs and aggregation of those syndicated feeds that offers higher-level meta-readings, and visualizations of those feeds and other collections of data, as in Derek Mueller's (2012) *Kairos* webtext tracing keyword trends over more than 30 years of Conference on College Composition and Communication chairs' addresses. Franco Moretti, whose method of "distant reading" Mueller employs, argues about literature that "a field this large cannot be understood by stitching together separate bits of knowledge about individual cases, because it *isn't* a sum of individual cases: it's a collective system" (2005: 4). Digital tools and approaches make available heretofore impossible modes of understanding.

Other modes of reading predate the digital, even as Carr and others indict them as somehow characteristic of the digital in their tendency toward distraction. Roland Barthes opens his essay "Writing Reading" (1986b) by asking,

> Has it never happened, as you were reading a book, that you kept stopping as you read, not because you weren't interested, but because you were: because of a flow of ideas, stimuli, associations? . . [S]uch reading [is] at once insolent in that it interrupts the text, and smitten in that it keeps returning to it and feeding on it. (29)

We experience those qualities of being smitten and insolent both in print reading, Barthes's topic, and in digital reading. Consider in comparison to Barthes the exercise Peter Elbow offers in seeing the reading process as subject to revision: Elbow encourages students to write down detailed "movies of the mind" as they progress through a shared reading, and encourages them not to "leave out odd memories and associations" but to write them down in order to discuss and evaluate them in a social context as a form of "meta-discourse" (2001: 314). Distraction in reading is not a uniquely digital phenomenon, and it can be valuable in exploring how readers produce readings.

That exploring, like reading itself, is a gradual process. Salvatori argues against theories of reading that "make it possible to cover over the processes by which knowledge and understanding are produced" (1996a: 185), and so against theories of instantaneous transparency associated with print reading, "where the text is transparent so readers look directly at meaning" (Horning 2012: 168). In fact, while I do not dispute the evidence

Horning uncovers in her admirable study, I believe she may pose questions antithetical to the reading purposes and practices described above, particularly in a study that set as a task for its subjects the reading of Wikipedia entries to summarize and write reports on them. David Bartholomae and Anthony Petrosky criticize reading pedagogies that encourage students to seek a "main idea" or "controlling idea" in a text, noting that such a pedagogy "is not a neutral pedagogy" because once that "controlling idea" or

> 'main idea' is taken to be a *thing* residing in a text… meaning becomes external, something contained in a text (the way a can of peas contains peas) or something that exists out in the world (like a chair or a desk), rather than something that results when a reader or writer finds a language to make the presentation of meaning possible. (1986: 11)

Horning's concern at her novice readers' apparent inability to find the main idea seems subject to the critique offered by Bartholomae and Petrosky. Similarly, the "rules" Mikics offers for slow reading are mostly salutary in their vagueness, telling the novice what to do without offering much on how to do it: it is instructive that his "Rule Nine" is to "Find the Author's Basic Thought" (2013: 127). Print reading involves diverse practices to which ascribing a monolithic set of characteristics is problematic.

Technologies

Digital reading involves similarly diverse practices overdetermined by multiple factors. Given the purposes offered above for academic reading, it may be useful to consider in a digital context Karen Manarin's concern that students "are not necessarily taught to connect text to other texts or content knowledge, a type of content knowledge many academics take for granted as part of reading" (2012: 289): digital reading often juxtaposes old knowledge with new schemata. In another example of the diverse applications of digital reading, Joanne Diaz describes using an online archive to teach close reading and "to analyze the ways in which subtle textual differences create versions of text, rather than one stable, canonical edition" and so to foster "a slow, attentive, flexible reading" (2012: 427, 428): the digital archive requires attentiveness to textual volatility, as Rebecca Wisor's 2009 work on creating a post-eclectic digital archive of Virginia Woolf's texts demonstrates. Contrast these diverse practices of reading to Horning's arguments that "the psycholinguistic processes of meta-reading and writing are essentially the same, on pages and screens" (2012: 165) and insistence on singular reading practices carrying across both print and digital literacies. Technological essentialism (print or screen) interferes with pedagogies that adequately respond to students' diverse literate practices.

Such pedagogies cultivate a material-historical memory that attends to the complex ways processes of reading operate in time. In *Lingua Fracta* (2009), Collin Brooke suggests that "memory is a canon that focuses our attention on the relationship between discourse and

time" (148). I here draw several connections between memory, time, and technology, as they might inform our pedagogical practice. Brooke offers

> two competing models of time that we have inherited from the Greeks: *chronos* and *kairos*. *Chronos* is the artificial patterning of time, its division into equal, measurable segments—the time by which we set our clocks and watches, conduct our classes, and organize our history. *Kairos* is the time sense at the other end of the spectrum, the opportunities that emerge to be seized in a particular situation, unrepeatable and unsystematizable. (149)

Chronos is the discrete linear progression associated with digitizing, and *kairos* is the time-now of continuously unfolding analog experience. Technologies make visible historical change, as the critiques offered by Carr, Horning, and Mikics indicate, and reading and writing—like the digital—are technologies.

Time as *chronos* is the medium in which information operates as process. In the axioms offered about information in his article "The Economy of Ideas," John Perry Barlow asserts that information is not static but "only really exists in the Delta" or space of change and motion: "[s]harks are said to die of suffocation if they stop swimming, and the same is nearly true of information. Information that isn't moving ceases to exist as anything but potential" (1994: n.p.). Information (including reading) has to move through time and between senders and receivers in order to exist. Barthes makes the argument that writing has multiple sources and overlapping points of origin, and those sources come together in a reading that is momentary and contingent and thereby kairotic (1986a: 54): reading is *chronos* become *kairos*.

We might ask students to see their reading and writing as simultaneously in motion and historically situated, drawing attention to its inputs and outputs, and thereby to what it might do or become as it moves through a textual cycle of production, distribution, consumption, and re-production. As Johndan Johnson-Eilola puts it in regard to the emerging capabilities of digital texts, we need to think about reading as something that happens when texts "are not merely *out there*, as objects, but also in motion, gathering other texts around them, responding to their environments in ways both simple and complex, making connections that their authors or readers are participants in, rather than simple agents of—intertextuality with teeth" (2010: 37). If we understand writing as textual production and reading as textual consumption, we can see the cycle described above and implied by Johnson-Eilola as contributing to a diverse economy.

Today, that economy has a significant digital component. In the world of the interactive technologies Johnson-Eilola describes, one study of adolescent reading habits has found that

> [w]hile some teens do report being distracted by digital media, just as many adults are, a number of them are also reporting strategic uses of smart phones and tablets as

reading devices. Using a variety of techniques to select books, skim the news, and engage deeply in various forms of online reading, the teens are not, as some would argue, "too dumb for complex texts" (Hicks 2014: n.p.)[1], but are engaging the social capacities characteristic of networked digital media. Reading digitally can help students make connections among texts and attend to the textual inputs and outputs of the digital economy. The remainder of this article seeks to demonstrate how digital reading as economic process aggregates over time: digital reading practices as *kairos* also operate over time-as-*chronos*, as in Benjamin's essay of quotations.

Processes

Such undertakings, to borrow Horning's words, are attempts to "do things with texts as [one] read[s], among the ideas presented and beyond them" (2012: 136). One characteristic that Horning attributes to expert readers is that they are "meta-readers" (136), and I suggest that meta-reading is enabled by the technological exteriorization of memory. An example: the articles published in the online journal *Kairos* all carry metadata, enabling technologically enhanced reading and search practices. In other online contexts, the radical economy promoted by digital technologies like Twitter has given rise to expert use of metadata like hashtags (#) as topic indicators and handles (@) as forms of the vocative case. Digital technologies enable Jonathan Lethem to "do things with texts as [he] read[s], among the ideas presented and beyond them" (Horning 2012: 136) and to compose "The Ecstasy of Influence" entirely out of quotations, realizing Walter Benjamin's dream. Meta-reading in this sense represents two abilities: to be ambiently aware of multiple pervasive flows of information, and to remix and stitch them together with digital tools. Digital humanist Paul Fyfe asks students to use digital reading tools like those available at the Text Analysis Portal for Research (http://www.tapor.ca/) to "manage, visualize, and analyze a text file of a novel that they have never read before" with the intent of generating "not stable claims about knowledge, but self-conscious reflections about the limits, contingencies, and opportunities of alternative modes of interpretation" (2011: 102). Meta-reading, like memory and cognition, has been exteriorized and distributed, lending itself to our students' newly diverse approaches associated with remixing, mashups, and other forms of engagement.

Our readings and meta-readings are built upon the past efforts of others. Readings aggregate, and such aggregation is in part an economic phenomenon. Today's digital texts and technologies are products of capital, but given that computers (like all technologies) replace labor-intensive practices with capital-intensive practices, we can also see them as being economic in nature even in areas of non-capitalist or alternative capitalist activity or in the increasing amounts of economic activity that are visible outside the market but that still

---

[1] The quoted claim is from Mark Bauerlein's opinion column in *Educational Leadership*.

exchange value, including activity in the classroom.

In capitalist production, labor power as time-metered and digitized commodity is always fused to machines and so becomes an aspect of the circuits of capital. The digital allows that fusion to be managed. The new inputs of economic processes—instead of the old inputs of land, labor, and capital—are material-technological capital (digital devices), intellectual labor (including, as Michael Hardt and Antonio Negri [2001] describe, labor that builds relations of affect and engages in work with digital devices), and intellectual or immaterial capital (including the books and videos and computer programs that constitute intellectual property). Intellectual labor aggregates into intellectual capital and into new digital devices via software applications, and so there are multiple overlapping circuits of value in our digital economies' cycle of production, distribution, use, and re-production, both metered as commodity and experienced as activity.

Marxian critiques of capitalist production assert that labor has two natures: labor power (the time-metered commodity) and labor input (the experiential activity). There is a tension between activity and object—reading as verb and reading as noun—or what compositionists might characterize as process and product. Once labor becomes commodified into capital, so too can the time of labor be commodified into capital. Reading becomes digital because human work with symbols (including the immaterial labor of reading and writing) is digital, sorting and recombining discontinuous items, fusing labor to capital.

Processes of composing and reading, of production and use, are informed as much by writers' and readers' material and historical contexts as by the textual artifacts produced, distributed, used, and reproduced. A reading is both the activity and the experience of a text, to and from which there are specific material and textual inputs and outputs. Value and time-metered labor collapse into capital in what we read: process becomes product. These complex economic links among reading, labor, capital, and technology—and their importance for the classroom—may be partially explained by the ways that mainstream marginalist economics looked not to the calculus of Newton, predicated on the progression of time, but to the calculus of Leibniz, predicated on simultaneity (Varoufakis et al. 2012: 4985).[2] That essentialist reduction is a form of what Austrian economist Joseph Schumpeter characterized as the Ricardian vice, or producing overly simplified models with few variables for the sake of analytical convenience.

Resisting such reduction by investigating the complexities of how the material processes of reading and writing translate to and from the digital offers a more complete understanding of their value as labor and capital. In discussing monolithic constructions of the digital humanities, Jamie Skye Bianco quotes Bruno Latour's "Compositionist

---

[2] The textual location cited is from the e-book available to my on my phone and in any Web browser. Our libraries are increasingly migrating to such ambient digital environments. A Web search reveals the corresponding location in the printed text at page 167.

Manifesto" in order to call attention to Latour's invocation of Schumpeter and his concept of "creative destruction":

> compositionism could stand as an alternative to critique (I don't mean a critique of critique but a reuse of critique; not an even more critical critique but rather critique acquired secondhand—so to speak—and put to a different use)… With critique, you may debunk, reveal, unveil, but only as long as you establish, through this process of creative destruction, a privileged access to the world of reality behind the veils of appearances… By contrast, for compositionism, there is no world of beyond. It is all about immanence. (2012: 107)

Bianco identifies Latour's use of Schumpeter's formulation to move past the ongoing cyclical production of only destructive critique, and wonders "what might happen if this critical impulse, described as 'reuse' (remix) and 'secondhand' (mashup) operated not through creative destruction but creative construction" (107), implicitly attending to the continuing aggregation of diverse texts (in other words, the economic inputs of reading) into processes of production, distribution, use, and re-production. Naming the points of that economic cycle, and identifying the inputs and outputs (intellectual and affective labor, intellectual capital, technological-material capital) at each point in the cycle helps to examine the complex relation between reading and writing over time, especially in digital contexts. Attending to this textual-economic cycle of reading and writing reveals other economic complexities: the aggregation problem, which is the challenge of measuring some values against groups of other values, which we recognize as questions of canonicity; the substitution problem, or how labor changes value depending upon who performs it, which we recognize in the Borges character Pierre Menard, who composes, without copying, a portion of the *Don Quixote* of Miguel de Cervantes, and in our anxieties about plagiarism; and in the transformation problem, or how the labor of reading becomes value as manifested in capital.

Pedagogies

I see the labor of reading becoming value in a course described by Bartholomae and Petrosky that "asks students to pay particular attention to the text (including the text of their own reading, often the text they write)" and focuses on the analytical "distance one can achieve from the very systems that produce one's reading" (1986: 202). Today, such distance includes an awareness of the computer interface and the digital systems of production and reproduction, in addition to the awareness of the practices and contexts in which they are engaged. That awareness, and those systems of production and reproduction, change as one engages them. Derrida, in his discussion of the "picada" or "track," suggests we meditate on "writing as the possibility of the road and of difference, the history of writing and the history of the road, of the rupture, of the *via rupta*, of the path that is broken, beaten, *fracta*, of the space of reversibility and of repetition traced by the opening" (1997: 107). The *via rupta* is the

insolent and smitten remix, the repurposing of a series of readings. When an reader engages an author's re-production of the writing of others, that reading changes from a struggle to move between the ideas of others and one's own into a performance of a dynamic work.

One can be one's own audience, especially when one encounters one's own time-shifted work in relation to the work of another author, as with the "Envelope Exercise" I began to describe earlier. The second half of the exercise happens at the end of the semester, when I redistribute the brief passage of text to which I asked students to respond, and redistribute the envelopes with their first day's written reading reactions, observations about those reactions, and descriptions of what they anticipated. I ask them to write again, reflectively re-reading and evaluating their initial thoughts and experiences over the trajectory of the semester, aggregating their own experience and engaging the critical distance they've worked to gain on that experience and the systems that contributed to it.

Another sort of reading I ask students to engage in using digital technologies involves having them write regular responses to the readings and share these responses online with the other students. At least once every two weeks, we do what I call "Recirculation," working in a collaborative online space. Students read one anothers' shared online reading responses, and then in collaboratively-authored online documents they quote, respond to, and engage those reading responses, in groups of five or six simultaneously authoring and editing a single document into a coherent text that identifies problems and moments of difficulty in their readings and attempts to work through and situate those moments of difficulty.

Readers may see similarities in the "Envelope Exercise" and "Recirculation" to Salvatori's triple-entry journals (1996b) and to Manarin's "three-part writing prompt" requiring students to "repeat, relate, reflect," but with variations: students understand themselves as audiences of other authors (their time-shifted selves, in the case of the "Envelope Exercise," and their classmates, in the case of "Recirculation") re-reading and re-incorporating past pieces of writing (2012: 284). In other words, these exercises highlight for students how the writing they labored to produce in response to another author's writing gets distributed, used, and re-produced as intellectual capital in a cycle that carries value, to be appropriated again at some future point. The assignments ask students to engage in a process of reading and writing based at once in *kairos* (what do this author's words mean to me now, how am I seeing myself and others reading and writing, how does this text distract me and send me in other directions) and in *chronos* (how have the layers of aggregated print and screen technologies contributed to how this text works, how might I take its collective inputs and remix them into outputs for future use and re-production, what can I do in taking this apart and reassembling its components). Such activities of reading and writing foster a more self-conscious form of reading than imagined by some critics and make use of an attitude toward remixing and reproducing more common to students familiar with digital technologies.

Works Cited

Barlow, John Perry. "The Economy of Ideas." *Wired* 2.03 (March 1994). http://www.wired.com/wired/archive/2.03/economy.ideas.html (accessed November 20, 2012).

Barthes, Roland. "Writing Reading," In *The Rustle of Language.* Translated by Richard Howard. Berkeley, CA: University of California Press, 1986. 29–32.

Bartholomae, David, and Anthony Petrosky. *Facts, Artifacts, and Counterfacts*. Portsmouth, NH: Boynton/Cook, 1986.

Bauerlein, Mark. "Too Dumb for Complex Texts?" *Educational Leadership* 68.5 (February 2011). http://www.ascd.org/publications/educational-leadership/feb11/vol68/num05/Too-Dumb-for-Complex-Texts%C2%A2.aspx (accessed January 15, 2014).

Bay, Jennifer, and Thomas Rickert. "Dwelling with New Media." In *Reading and Writing New Media*. Edited by Cheryl Ball and James Kalmbach. Cresskill, NJ: Hampton Press, 2010.

Benjamin, Walter. "Unpacking My Library." In *Illuminations*, Hannah Arendt, ed. New York: Schocken, 1969. Print.

Bianco, Jamie. "This Digital Humanities Which Is Not One." In Matthew Gold, ed. *Debates in the Digital Humanities*. Minneapolis, MN: University of Minnesota Press, 2012. 96–112.

Borges, Jorge Luis. "The Library of Babel." *Ficciones*. New York: Alfred A. Knopf, 1993. 58–66.

Brooke, Collin Gifford. *Lingua Fracta: Toward a Rhetoric of New Media*. Cresskill, NJ: Hampton, 2009.

Carr, Nicholas. "Is Google Making Us Stupid?" *The Atlantic* 302.1 (July/August 2008). 56–63.

Clinton, Katie, Henry Jenkins, and Jenna McWilliams. "New Literacies in an Age of Participatory Culture." In Henry Jenkins and Wyn Kelley, eds., *Reading in a Participatory Culture*. New York: Teachers College Press, 2013. 3–24.

Derrida, Jacques. *Of Grammatology*. Trans. Gayatri Chakravorty Spivak. Baltimore, MD: Johns Hopkins University Press, 1997.

Diaz, Joanne. "The Digital Archive as a Tool for Close Reading in the Undergraduate Literature Course." *Pedagogy* 12.3 (2012): 425–447.

Elbow, Peter. "A Laboratory in the Reading Process." *The Original Text-Wrestling Book*. Ed. Marcia Curtis. Dubuque, IA: Kendall/Hunt, 2001. 313–316.

Fyfe, Paul C. "How to Not Read a Victorian Novel." *Journal of Victorian Culture* 16.1 (Spring 2011): 102-106.

Hardt, Michael, and Antonio Negri. *Empire*. Cambridge, MA: Harvard, 2001.

Hicks, Troy. "Read Like a (Digital) Writer." *Gayle Morris Sweetland Digital Rhetoric*

Collaborative (15 January 2014). http://www.digitalrhetoriccollaborative.org/2014/01/15/read-like-a-digital-writer/ (accessed 15 January 2014).

Horning, Alice S. *Reading, Writing, and Digitizing*. Newcastle Upon Tyne, UK: Cambridge Scholars Publishing, 2012.

Kelley, Wynn, and Henry Jenkins. "Defining Reading: A (Sort of) Historical Perspective." In Henry Jenkins and Wyn Kelley, eds., *Reading in a Participatory Culture*. New York: Teachers College Press, 2013. 43–48.

Johnson-Eilola, Johndan. "Among Texts." In Stuart Selber, ed., *Rhetorics and Technologies: New Directions in Writing and Communication*. Columbia, SC: University of South Carolina Press, 2010.

Lethem, Jonathan. "The Ecstasy of Influence." *Harper's* February 2007: 59–71.

Latour, Bruno. "An Attempt at a 'Compositionist Manifesto.'" *New Literary History* 41.3 (Summer 2010): 471–90.

Manarin, Karen. "Reading Value: Student Choice in Reading Strategies." *Pedagogy* 12.2 (2012): 281–297.

Manguel, Alberto. *A History of Reading.* New York: Penguin, 1996.

Marx, Karl. *Capital: A Critique of Political Economy. Volume I*. London: Penguin, 1976.

Mikics, David. "In Praise of (Offline) Slow Reading." *The New York Times*. January 3, 2014. http://www.nytimes.com/2014/01/04/opinion/in-praise-of-offline-slow-reading.html? (accessed January 11, 2014).

Mikics, David. *Slow Reading in a Hurried Age*. Cambridge, MA: Belknap Press, 2013.

Moretti, Franco. *Graphs, Maps, Trees: Abstract Models for a Literary Theory*. New York: Verso, 2005.

Mueller, Derek N. "Views from a Distance: A Nephological Model of the CCCC Chairs' Addresses, 1977-2011." *Kairos: A Journal of Rhetoric, Technology, and Pedagogy* 16.2 (2012). http://www.technorhetoric.net/16.2/topoi/mueller/ (accessed December 18, 2013).

Quine, Willard Van Orman. "Universal Library." *Quiddities: An Intermittently Philosophical Dictionary*. Cambridge, MA: Belknap, 1989. 223–224.

Ramsay, Stephen. *Reading Machines: Toward an Algorithmic Criticism.* Champaign, IL: University of Illinois Press, 2011.

Salvatori, Mariolina. "The Argument of Reading in the Teaching of Composition." *Argument Revisited: Argument Redefined*. Eds. B. Emmel, P. Resch, and D. Tenney. Thousand Oaks, CA: Sage Publications, 1996. 181–197.

Salvatori, Mariolina. "Conversations with Texts: Reading in the Teaching of Composition." *College English* 58.4 (April 1996): 440–54.

Salvatori, Mariolina. "Pedagogy: From the Periphery to the Center." In Patricia Donahue and Ellen Quandahl, eds., *Reclaiming Pedagogy: The Rhetoric of the Classroom*. Carbondale,

IL: Southern Illinois University Press, 1989. 17–34.

Salvatori, Mariolina Rizzi, and Patricia Donahue. "What Is College English? Stories about Reading: Appearance, Disappearance, Morphing, and Revival." *College English* 75.2 (November 2012).

Varoufakis, Yanis, Joseph Halevi, and Nicholas Theocarakis. *Modern Political Economics: Making Sense of the Post–2008 World*. New York: Taylor & Francis, 2012. (Kindle Edition.)

Wisor, Rebecca. "Versioning Virginia Woolf: Toward a Post-Eclectic Edition of *Three Guineas*." *Modernism/modernity* 16.3 (2009): 497–535.