



Article

Digital Humanities' Shakespeare Problem

Laura Estill®

Department of English, St. Francis Xavier University; P.O. Box 5000, Antigonish, NS B2G 2W5, Canada; lestill@stfx.ca

Received: 28 January 2019; Accepted: 23 February 2019; Published: 4 March 2019



Abstract: Digital humanities has a Shakespeare problem; or, to frame it more broadly, a canon problem. This essay begins by demonstrating why we need to consider Shakespeare's position in the digital landscape, recognizing that Shakespeare's prominence in digital sources stems from his cultural prominence. I describe the Shakespeare / not Shakespeare divide in digital humanities projects and then turn to digital editions to demonstrate how Shakespeare's texts are treated differently from his contemporaries—and often isolated by virtue of being placed alone on their pedestal. In the final section, I explore the implications of Shakespeare's popularity to digital humanities projects, some of which exist solely because of Shakespeare's status. Shakespeare's centrality to the canon of digital humanities reflects his reputation in wider spheres such as education and the arts. No digital project will offer a complete, unmediated view of the past, or, indeed, the present. Ultimately, each project implies an argument about the status of Shakespeare, and we—as Shakespeareans, early modernists, digital humanists, humanists, and scholars—must determine what arguments we find persuasive and what arguments we want to make with the new projects we design and implement.

Keywords: digital humanities; Shakespeare; early modern drama; literary canon; English literature; Renaissance

1. Introduction

Digital humanities has a Shakespeare problem; or, to frame it more broadly, a canon problem. Too many digital projects and sites focus on Shakespeare alone. Some sites highlight Shakespeare to the exclusion of other writers; other projects set their bounds at Shakespeare and "not Shakespeare". Digital humanities' Shakespeare problem both stems from and reifies Shakespeare's centrality to the canon of English literature. While this problem is, indeed, a digital humanities problem, it is also a problem in the arts and humanities more generally. Shakespeare is one of the few writers regularly featured in single-author undergraduate courses (alongside, perhaps, Chaucer, Milton, and Austen, albeit to a lesser extent). Shakespeare's works are so often produced on the twenty-first century stage that *American Theatre* excludes Shakespeare from their annual list of top-produced American plays in order to "make more room on our list for everyone and everything else" (Tran 2018). Digital humanities has often been heralded as the solution to the canonicity problem, but that is a great burden that it cannot bear alone.

This essay begins by demonstrating why we need to consider Shakespeare's position in the digital landscape, recognizing that Shakespeare's prominence in digital sources stems from his cultural prominence. I describe the Shakespeare/not Shakespeare divide in digital humanities projects and then turn to digital editions to demonstrate how Shakespeare's texts are treated differently from his contemporaries—and often isolated by virtue of being placed alone on their pedestal. In the final section, I explore the implications of Shakespeare's popularity to digital humanities projects, some of which exist solely because of Shakespeare's status. Shakespeare's centrality to the canon of digital humanities reflects his reputation in wider spheres such as education and the arts. No digital project will offer a complete, unmediated view of the past, or, indeed, the present. Ultimately, each digital

humanities project presents an argument about the status of Shakespeare, and we—as Shakespeareans, early modernists, digital humanists, humanists, and scholars—must determine what arguments we find persuasive and what arguments we want to make with the new projects we design and implement.

Although the definition of digital humanities (and perhaps even the definition of Shakespeare) is subject to disagreement, for this essay, I limit my scope to digital humanities resources for pedagogy and research. This excludes games such as Richard III Attacks! (P. 2015), online performances such as Such Tweet Sorrow (Silbert 2010), and social media hashtags like #ShakespeareSunday. Cultural studies often informs New Media Shakespeare scholarship to show Shakespeare's continued prominence online (see O'Neill 2015 for an overview): consider recent issues of Shakespeare Quarterly (Rowe 2010) and Borrowers and Lenders (Calbi and O'Neill 2016) on this topic. Stephen O'Neill (2018), drawing on Douglas Lanier's notion of "Shakespearean rhizomatics" (Lanier 2014), equates "Our contemporary Shakespeares" to "digital Shakespeares", describing both as "fully rhizomatic in their extraordinary and seemingly endless flow of relations." Christy Desmet suggests that we need to encounter all digital Shakespeares (both digital humanities and new media) through the lens of Ian Bogost's "alien phenomenology" (Bogost 2012), considering "material objects and networks as models for posthuman relations" (Desmet 2017, p. 5). Although Digital Humanities and New Media are often paired, for the purpose of this essay it is useful to differentiate the two: new media endeavors that participate in or create digital culture versus digital humanities projects that announce themselves as contributing to our general and scholarly knowledge. This article focuses on digital humanities projects for two reasons: first, as one way of limiting the scope of the "seemingly endless flow of relations" in Digital Shakespeares, and second, because the majority of digital humanities projects exist primarily to educate rather than to entertain.

Digital humanities projects provide the resources we use to study and teach the early modern period: digital editions, bibliographies, digitizations, catalogs, and more. Often, digital humanities projects are expanded from earlier print resources: consider, for instance, the online English Short Title Catalogue (British Library 2006) and its print antecedents, the short-title catalogs by Pollard and Redgrave (1926) and Donald Goddard Wing (1945). Nondigital scholarly resources frequently skew towards Shakespeare; even the library catalogs we use to access archival resources are not neutral and emphasize Shakespeare above his contemporaries (Estill 2019a). Many digital humanities resources replicate this Shakespeare-centric focus, and, as such, misrepresent the materials they provide or offer a skewed perspective on early modern literature, theatre, and culture. Biased sources can only lead to biased scholarship; and while some professors will be able to see the biases of the sites they visit, many students will not. This is particularly problematic because, as Christie Carson and Peter Kirwan explain, "Students are some of the key 'users' of digital Shakespeare" (Carson and Kirwan 2014a, p. 244).

It has been well-documented that major digital literary studies projects often focus on canonical authors. There is excellent work on the biases of digital humanities projects, particularly in relation to the status of women writers (see, for instance, Wernimont and Flanders 2010; Mandell 2015; Bergenmar and Leppänen 2017) and the canon of American literature (Earhart 2012; Price 2009), yet comparatively few scholars have critiqued how digital humanities overrepresents perhaps the most canonical figure in all of English literature: Shakespeare. "Shakespeare and Digital Humanities" has been and continues to be a fruitful area of research, with special issues of *Shakespeare* (Galey and Siemens 2008), the Shakespearean International Yearbook (Hirsch and Craig 2014), *RiDE: Research in Drama Education* (Bell et al., forthcoming), and this issue of *Humanities*. The prevalence of digital humanities tools in Shakespeare teaching and research leads Carson and Kirwan to wonder, "are all Shakespeares digital now?" (Carson and Kirwan 2014a, p. 240). The questions less often asked are: when we focus on Shakespeare(s) in our digital projects, what is excluded by our Shakespeare-centrism? And how does that shape how we access and understand early modern drama? Digital Shakespeare studies often focuses on Shakespeare's place in the digital world, without questioning why he is given such primacy and the ramifications of his continued canonization.

A decade ago, Matthew Steggle (2008) showcased how digital projects were "developing a canon" of early modern literature. Building on the "interrelated cycles" that Gary Taylor identified as supporting Shakespeare's centrality to textual studies, Brett Greatley-Hirsch describes "the long shadows cast by the cultural, scholarly, and economic investments in Shakespeare" (Hirsch 2011, p. 569), specifically as it pertains to digital editions of early modern plays. This essay furthers the work by Steggle, Greatley-Hirsch, and others by arguing that we must continually assess the landscape of digital projects available for teaching and researching the early modern period in order to understand and shape the future of the field.

As the argument goes, traditional anthologies and resources are constricted by page counts and other limited resources, unlike digital projects, which can be democratizing due to their lack of—or, more realistically, different—limitations. In that vein, Neil Fraistat, Steven E. Jones, and Carl Stahmer (Fraistat et al. 1998, p. 2) suggest that "one of the strengths of Web publishing is that it facilitates—even favors—the production of editions of texts and resources of so-called non-canonical authors and works." Earhart (2015, esp. chp. 3), however, traces the familiar pattern of discovery then loss for noncanonical writers: their work is digitized, declared as recuperated, and then the site disappears. Another way digital humanities has been announced to recover noncanonical writers is by projects that digitize on a large scale. Julia Flanders (2009) explains:

It is now easier, in some contexts, to digitize an entire library collection than to pick through and choose what should be included and what should not: in other words, storage is cheaper than decision-making. The result is that the rare, the lesser known, the overlooked, the neglected, and the downright excluded are now likely to make their way into digital library collections, even if only by accident.

Indeed, it is the decision-making where Shakespeare too often gets pulled artificially to the fore: sometimes even in the foundational decisions about project scope. The next section of the essay explores how single authors are represented in small-scale digital resources versus large-scale digital resources, thinking about them in terms of labor, funding, and project scope.

2. The Shakespeare/Not Shakespeare Divide in Digital Humanities Resources

There is a lopsidedness to early modern online resources: some, such as the English Short Title Catalog (ESTC; British Library 2006) and the Database of Early English Playbooks (DEEP; Lesser and Farmer 2007) deliver breadth of coverage that is, due to their large scope, necessarily shallow; others, such as The Shakespeare Quartos Archive (Bodleian Library 2009) or MIT's Global Shakespeares (Donaldson 2009), provide deep coverage of a much narrower topic. Both approaches are needed to support different avenues of early modern scholarship, but, the latter, I contend, too often begins and ends with Shakespeare.

The logistical reasons for these very different kinds of projects (broad coverage versus deep coverage) are readily apparent. The notion of "Shakespeare" offers a convenient scope and bounds for a given project. Many projects that include detailed metadata, extensive editorial annotation or encoding, expensive-to-create facsimiles, or streaming media center on the work of a single author. The Pulter Project (Knight and Wall 2018), for instance, is an example of a new project that focuses on a single author, and, indeed, a single manuscript, in order to offer a hypertext edition with multiple layers of editorial intervention, linked related texts, and comparative viewing options. The Digital Cavendish Project (Moore and Tootalian 2013) offers a range of ways to interact with Margaret Cavendish's life and texts: site visitors can explore Margaret Cavendish's social network, search the bibliography-in-progress of Cavendish scholarship, and make use of reference works such as a list of Cavendish's printers and booksellers and a spreadsheet locating all known copies of Cavendish's early publications. We can imagine extending these projects by adding another analysis section, another manuscript, or even another individual author. However, to extend these projects by any order of magnitude, by say, covering all seventeenth-century women writers or all previously unpublished

Humanities 2019, 8, 45 4 of 16

manuscript poetry would be to undertake significant amounts of labor and would require both time and money.

These single-author projects are the fruits of detailed scholarly attention: they are "boutique" digital projects. In their discussion of archival practices, Mark A. Greene and Dennis Meissner position "boutique digitization" at the far end of the continuum from "'Googlization' (ultra-mass digitization)" (Greene and Meissner 2005, p. 196). The former, boutique projects, require "extraordinary attention to the unique properties of each artifact" (Conway 2010, p. 76). While Greene, Meissner, and Conway focus on archival digitization projects, the continuum also applies to digital humanities projects, many of which include digitized elements alongside other interventions: transcriptions, editorial apparatus, bibliographic resources, and so forth. The Shakespeare Quartos Archive (Bodleian Library 2009) is an example of extraordinary attention to primary sources: the site's goal is to "reproduce at least one copy of every edition of William Shakespeare's plays printed in quarto before the theatres closed in 1642." Where possible, however, they include digitizations of as many copies of each Shakespeare quartos as possible. Their prototype offers thirty-two quartos of *Hamlet* (from Q1–Q5), carefully digitized and painstakingly encoded.¹

With their attention to primary sources, the Shakespeare Quartos Archive project argues that scholars must pay attention to copy-specific details. The Shakespeare Quartos Archive text encoding highlights different marginalia in each copy, the binding, and even the library ownership stamps. While the Shakespeare Quartos Archive can be used as an exemplar of a "boutique" project, it is not the labor of a single scholar. This project emerged from the collaboration of multiple major institutions, including, most notably, the Bodleian Library of the University of Oxford, the British Library, the University of Edinburgh Library, the Folger Shakespeare Library, the Huntington Library, and the National Library of Scotland. The project was made possible by major grant funding from the United States's National Endowment for the Humanities (NEH) and the United Kingdom's Joint Information Systems Committee (JISC).

The well-supported Shakespeare Quartos Archive raises another reason for author-centric approaches, namely, existing funding models. As Jamie "Skye" Bianco (2012) explains, "digital humanities is directly linked to the institutional funding that privileges canonical literary and historiographic objects and narratives" (see also Price 2009). In her review, Desmet unpacks the project's "rationale for a focus on Shakespeare's quartos" (Desmet 2014, p. 143): the rarity and fragility of the material objects; their locations in libraries around the world; and the lack of Shakespearean manuscript texts. This rationale, while a compelling argument for why we need to digitize and encode all early modern play quartos, hardly touches on why Shakespeare is the focus of the project. We lack authorial manuscripts of many plays by many playwrights. The Shakespearean focus of the Shakespeare Quartos Archive is taken for granted.

It is hard to imagine the Ford Quartos Archive receiving much enthusiasm from funders, despite the fact that John Ford's plays are still edited, anthologized, taught, and performed today. There are many ongoing editorial projects focused on individual early modern playwrights, such as Oxford University Press's *The Complete Works of John Marston* (Butler and Steggle, forthcoming); yet to imagine digitizing and encoding all known early printings of Marston's work for a Marston Quartos Archives seems far-fetched, and the notion of turning to even less canonical playwright—say, the Glapthorne Quartos Archive—hardly bears thinking about. Shakespeare sells. Shakespeare's name is itself a valuable commodity (Hodgdon 1998; McLuskie and Rumbold 2014; Olive 2015). Digital project

Just as Digital Humanities has a Shakespeare problem, Shakespeare studies has a *Hamlet* problem, although the prominence of *Hamlet* in Shakespeare studies, both digital and otherwise, is a topic for another essay. For evidence of *Hamlet*'s prominence, see Bernice W. Kliman et al.'s HamletWorks (Kliman et al. 2004) and Estill, Klyve, and Bridal (Estill et al. 2015).

The Shakespeare Quartos Archive uses the Text Encoding Initiative (TEI) for their XML (eXtensible Markup Language), which includes elements such as hand <a href=

funders and creators recognize its value as much as academic publishers who push for Shakespeare's name in book titles.

Martin Mueller pointed to tenure and promotion part of the reason for the scholarly focus on major, canonical plays. He asked, "You can see why professional scholars stay away from minor plays, unless they explicitly deal with hot topics. A play may interest them, but how will an entry about it look on a c.v.?" (Mueller 2014). While there is a wealth of valuable scholarship on minor plays, as Mueller points out, "the annual number of publications about Shakespeare dwarfs—by at least an order of magnitude—the number of publications about his contemporaries." Before scholars can achieve tenure and promotion, they must first land that tenure-track job, which, in many cases, means demonstrating that they can teach the single-author undergraduate Shakespeare course(s). Just as work on noncanonical playwrights can be met with institutional skepticism, digital humanities publication has tended to be undervalued by tenure and promotion committees, prompting scholarly bodies such as the Modern Language Association (MLA) to publish interventions like "Guidelines for Authors of Digital Resources" and "Guidelines for Evaluating Work in Digital Humanities and Digital Media" (MLA Committee on Information Technology 2012a, 2012b). For scholars creating digital projects, both funding and institutional structures of tenure and promotion can offer disincentives to go beyond Shakespeare.

Shakespeare is so privileged in early modern digital humanities projects that some projects market themselves as a corrective. Mueller's now-defunct Shakespeare His Contemporaries (Mueller 2016) described itself as "a project devoted to the collaborative curation of non-Shakespearean plays from Shakespeare's world." Despite offering a digital humanities project that recognizes and pushes back against Shakespeare's centrality to early modern drama studies, Shakespeare His Contemporaries's self-definition ("non-Shakespearean"), title (Shakespeare His Contemporaries), and scope ("Shakespeare's world") all gravitate around Shakespeare. This is hardly unique. Similarly, the "Beyond Shakespeare" project (a podcast and blog) has a twitter bio announces their interest in "anything but the Bard", just as their handle, @BeyondShakes, and the project title evokes his name (Crighton 2013).

Andy Kesson, Lucy Munro, and Callan Davies's "Before Shakespeare" reveals valuable insights about mid-sixteenth century London theatres. In their article, "DH and Non-Shakespearean Theatre History", Davies and Kesson (forthcoming) explain how the digital components of their project are an integral part of their outreach mission:

The digital presence of "Before Shakespeare" is centered around showcasing various media at once: archives, discussion, videos, images, performance, and song—from Soundcloud to YouTube—to increase the visibility of non-Shakespearean drama and diversify its availability and appeal beyond printed editions and text.

Despite their non-Shakespearean focus, or, indeed, perhaps because of it, their project title, URL (beforeshakespeare.com), "About" description, and Twitter account similarly centralize Shakespeare in the literary canon, even while resisting this positioning. The "About" page explains, "Before Shakespeare is also the first project to take seriously the mid-century beginnings of those playhouses, seeing them as mid-Tudor and early Elizabethan phenomena rather than becoming distracted by the second generation of people working in the playhouses, the most famous of whom is William Shakespeare himself" (Kesson et al. 2016, "About"). Their Twitter avatar (@B4Shakes, as of January 2019) is a picture of Shakespeare himself, though with the word "before" covering his eyes and with his mouth silenced by a series of decorative fleurons. There hardly seems to be an elegant solution

Shakespeare His Contemporaries can be accessed on the Internet Archive's Wayback Machine by inserting its former URL, http://shakespearehiscontemporaries.northwestern.edu/shc. The Shakespeare His Contemporaries XML—itself created by improving the encoding provided by the Early English Books Online Text Creation Partnership, or EEBO-TCP—is preserved in the Folger's Digital Anthology of Early Modern English Drama (Brown et al. 2016).

Humanities 2019, 8, 45 6 of 16

for digital projects designed to push attention away from Shakespeare. As the most recognizable literary figure from his day, it could be argued that a site designed to appeal to the general public would be remiss to avoid naming him: there is no need to turn him into he-who-must-not-be-named, giving the name of Shakespeare even more power. Furthermore, for a project aiming to reach "wider audiences within and beyond scholarship", name-dropping Shakespeare can be an effective way to attract people to their site and social media, which will then offer "a powerful advertisement for the force and fascination of currently 'non-canonical' plays" (Davies and Kesson, forthcoming).

Despite the potential for democratization or canon expansion, digital projects too often reify canon, even when they attempt to subvert it. Emma Smith (2017) describes how this effect is not limited to the digital: drawing on examples from scholarship, culture, and online, she shows how "attempts to decentre Shakespeare are thus often self-defeating." She continues, "Do we privilege Shakespeare above other writers? Self-evidently and self-fulfillingly so." Smith contends that "Shakespeare studies have begun to reflect on the conditions and consequences of their own cultural supremacy"; this article contributes to these ongoing reflections. Although Smith acknowledges the "cultural, theatrical and educational disadvantages of Shakespeare-centrism," she concludes by positioning Shakespeare as "the apex predator in a cultural ecosystem where he has no rivals, only prey," suggesting our focus on Shakespeare is somehow required for the metaphoric ecosystems of culture and scholarship. Digital projects, however, have the potential to go beyond this status quo, by, for instance, positioning Shakespeare alongside his contemporaries or by highlighting the historical moments that led to Shakespeare's current position as cultural touchstone.

3. Digital Editions and the Privileging of Shakespeare's Text

When we turn to digital editions, those digital humanities stalwarts, we see the same "not Shakespeare" construction of projects as detailed above. For instance, Greatley-Hirsch's Digital Renaissance Editions was "inspired by the *Internet Shakespeare Editions*" (Greatley-Hirsch 2015, homepage). That is to say, an online edition of Shakespeare's works inspired a site whose aim is to offer "electronic scholarly editions of early English drama and texts of related interest, from late medieval moralities and Tudor interludes, occasional entertainments and civic pageants, academic and closet drama, and the plays of the commercial London theaters, through to the drama of the Civil War and Interregnum" for all authors, except Shakespeare (Greatley-Hirsch 2015, homepage). These sibling projects only reinforce the divide between Shakespeare and not-Shakespeare. Shakespeare's central position in the canon becomes exceptional: he no longer falls under the umbrella of "Renaissance" or "early English drama." By excluding Shakespeare, Digital Renaissance Editions follows the tradition of printed non-Shakespearean anthologies, such as Arthur F. Kinney's *Renaissance Drama* (1999) and David Bevington's *English Renaissance Drama* (2002).

With digital editions, however, this Shakespeare-not Shakespeare gulf can be bridged, for instance, with a federated search interface. It would be wonderful to see, in the future, a new way to access Digital Renaissance Editions, the Internet Shakespeare Editions (Jenstad 2018), and the Queen's Men Editions (Ostovich 2006), all of which are built on the same platform, where users can easily compare content from across all three sites, perhaps searching for keywords across plays from all three. There is, of course, a value to maintaining each site separately: each project makes an argument about how we need to approach early modern drama. The Internet Shakespeare Editions includes much non-Shakespearean content, such as the full text and facsimiles of the play *A Yorkshire Tragedy*; however, the non-Shakespearean content is provided as context for our understanding of Shakespeare. *A Yorkshire Tragedy* is included in the Internet Shakespeare Editions because of its status as "almost Shakespeare": although now accepted as apocryphal, it was once attributed to Shakespeare Editions includes an extract from Robert Greene's *Selimus*, because Jessica Slights deemed Greene's play a valuable intertext for her edition of *Othello* (Slights 2017). *A Yorkshire Tragedy*, *Selimus*, and other non-Shakespearean works on the site are categorized as "resources" (the last option from the top menu)

whereas Shakespeare's plays and poems are the "texts" the Internet Shakespeare Editions foregrounds (the first option from the top menu). The Internet Shakespeare Editions guides users to approach all non-Shakespearean content through the lens of Shakespeare, first and foremost. The argument of Digital Renaissance Editions emerges to counter this overreliance on Shakespeare, yet ends up making Shakespeare conspicuous in his absence. As a digital edition based on the plays performed by a single playing company, the Queen's Men Editions argues for the value of performance and the importance of repertory-based studies not defined by authorship (Ostovich 2006, "The QME brand").

As Scott McMillin and Sally-Beth MacLean (McMillin and MacLean 1998), Lucy Munro (2009), and others have demonstrated, repertory studies is a valuable field that could be bolstered with even further digital editions organized by theatre company or playing space. At this point, the ISE, DRE, and QME offer three sites, three goals, and three uneven slices of early modern drama. While "maintaining the integrity of [the] sites" and "eliminat[ing] confusion" about their roles and boundaries (Ostovich 2006) is important, there is still a place for a federated search that would allow users to approach the content on all three sites at once. Although this imagined federated search would, at this moment, be far from a universal view of early modern English drama, it could offer a more comprehensive overview than each site currently provides as they stand alone, connected for users only with the occasional hyperlinks. Diane K. Jakacki's thoughtful description of the Internet Shakespeare Editions tagset, relation to its sibling sites, and the potential of linked open data insightfully considers the potential of "acts of editorial disruption" to "allow us to move forward toward infinity while maintaining editorial stability across digital projects" (Jakacki 2018, p. 158). As digital editions of early modern drama "move forward toward infinity", we must assess if we want Shakespeare to be the default number one.

The Folger Shakespeare Library has also published digital projects defined by the presence or lack of Shakespeare: Folger Digital Texts (Mowat et al. 2012) and the Digital Anthology of Early Modern English Drama Anthology (Brown et al. 2016). However, unlike the Internet Shakespeare Editions and their sister sites the Folger sites provided edited texts without critical introductions or notes. Folger Digital Texts offers editions of Shakespeare; the Digital Anthology includes editions and bibliographic information about, as their homepage announces, "other plays from Shakespeare's time" (emphasis in the original). The Digital Anthology Frequently Asked Questions page anticipates that users will want to know "Where is Shakespeare? And how does this relate to him?" Their response runs, in full:

William Shakespeare's plays are not part of EMED, for a simple reason: EMED was conceived as a way of showcasing all of the other playwrights writing in England's early modern era.

By bringing together their plays, however, EMED recreates the theater world that made possible Shakespeare's career and influenced his work. Shakespeare knew many of the earlier plays as an actor or audience member. He also collaborated and competed with some of the playwrights. He directly influenced others. To read Shakespeare's works, we recommend another Folger resource: the Folger Digital Texts.

Some of the plays in EMED have historically been attributed to Shakespeare, including *The London Prodigal, Sir John Oldcastle, and The Yorkshire Tragedy*. These are currently regarded as "Shakespeare Apocrypha" and are no longer attributed to Shakespeare. For an xplanation of how The London Prodigal fits (or does not fit) into Shakespeare's corpus, see Peter Kirwan's article in Shakespeare Documented. (Hyperlinks removed from original.)

Even as they undertake important work on early modern drama beyond Shakespeare, the Digital Anthology repeatedly presents the non-Shakespearean plays at the center of their project as "other". They assert that their site is valuable because it adds to our knowledge of Shakespeare. Their anticipated users don't care about Sir John Suckling or even Christopher Marlowe. They highlight the value of their site's "almost Shakespeare" apocryphal content. The Digital Anthology links to two Folger projects focusing entirely on Shakespeare: the Folger Digital Texts and Shakespeare Documented, both examples of "deep" digital humanities projects with a focus on Shakespeare.

Even if we consider the Digital Anthology of Early Modern Drama and Folger Digital Texts as twinned projects, they are not identical, but fraternal twins. The interfaces for both sites are quite different; one of the most notable differences is that the Folger Digital Texts Shakespeare editions are presented in modern spelling, whereas the rest of the early modern drama corpus is not. This is because the Folger Digital Texts are based on the Folger's print series, edited by Paul Werstine and Barbara Mowat, which means they have a different level of editorial intervention. The Folger digital projects do not neatly fit into the "deep" and "broad" categories: rather, they exist to serve different audiences. A nonspecialist will have an easier time navigating Shakespeare's texts on Folger Digital Texts than the plays on the Digital Anthology of Early Modern English Drama. Conversely, the Digital Anthology appeals to scholars by offering extensive links existing resources, such as DEEP and the ESTC, as well as the additional data about early performance and publication that offers easy comparison across the corpus. The artificial divide the Folger sites erect between Shakespeare and not Shakespeare, then, is only compounded when, for instance, a scholar wants to know plays first performed in 1599 and returns a list of eleven plays, which, based on the Digital Anthology's scope, excludes Shakespeare's Julius Caesar, Henry V, and As You Like It. (A similar search in DEEP will include all results, but with multiple entries for each play that has more than one pre-1660 publication.) This is to say, the Folger's Digital Anthology of Early Modern English Drama is a digital project both with breadth (including bibliographic data about 403 plays) and depth (offering full texts of twenty-nine plays), yet it is the project's very exclusion of Shakespeare that warps the search results to offer an unrepresentative view of early modern drama and instead presents results with a Shakespeare-sized hole at their center. Indeed, the work of other writers is also omitted with the Shakespearean: for instance, Fletcher's work in Henry VIII is cut out from the corpus simply because it is a collaboration with Shakespeare.

Even in digital editions ostensibly focused on non-Shakespearean early modern drama, Shakespeare's shadow looms. The Queen's Men Editions currently provides performance editions of nine plays from the Queen's Men repertory—and four of these nine plays (Famous Victories of Henry V, King Leir, Troublesome Reign of King John, and True Tragedy of Richard III) have Shakespearean counterparts. The repertory of the Queen's Men Company did not comprise 44% of plays directly related to Shakespeare (McMillin and MacLean 1998, esp. appendix A); yet this digital project has begun by privileging those texts. The Folger's Digital Anthology of Early Modern English Drama similarly offers an edition of The True Chronicle of King Leir, as well as the apocrypha they highlight in their FAQ. Some of the same apocryphal plays (including The London Prodigal) appear in both the "resources" section of the Internet Shakespeare Edition and the Digital Anthology of Early Modern Drama. Just having proximity to Shakespeare means these works get more editorial attention than other plays.

Richard Brome Online (Cave 2010) remains remarkable in the history of open-access online editions of early modern drama. Greatley-Hirsch notes, "Until the launch of Richard Brome Online in 2010, there were no electronic critical editions of non-Shakespearean Renaissance drama available" (Hirsch 2011, p. 574). Today, it still stands alone in the landscape of digital humanities projects as the only non-Shakespearean author-based online edition. (The Cambridge Edition of the Works of Ben Jonson Online (Butler 2014), which expands and supplements their printed play editions, is paywalled.) Richard Brome Online argues for the value of considering the works of a single playwright as an oeuvre—an approach often taken to Shakespeare. Like repertory-based editions, there is the idea that if we could expand this model to every author or every repertory, we would have a complete representation of the plays of the period. The realities of early modern collaborative playwriting and anonymous works, however, will complicate future author-based online editions, although author-based editions will certainly have their place in digital humanities projects; I, for one, look forward to Christopher Marlowe Online or John Webster Online.

⁴ See Hirsch (2010) for an insightful and extended review of this project.

Let us take Webster's *The Duchess of Malfi* as an exemplar of the status of non-Shakespearean plays online. The Duchess of Malfi is not Shakespearean apocrypha, nor is it a source or adaptation of one of Shakespeare's plays. (Webster's play, however, was performed by the King's Men, Shakespeare's company.) Despite having only marginal Shakespearean ties, The Duchess of Malfi is of continued scholarly interest and has an ongoing performance history, including a 2018 Royal Shakespeare Company production directed by Maria Aberg (Aberg 2018). Although currently Shakespeare's plays are performed at much higher rates than those by his contemporaries, performance and scholarship about performance offers one opportunity to effectively decenter Shakespeare. Even though The Duchess of Malfi is a relatively popular early modern play, it does not currently appear in any of the digital editions discussed in this essay so far (The Internet Shakespeare Editions, Queen's Men Editions, Digital Renaissance Editions, Folger Digital Texts, Early Modern Anthology of Early Modern English Drama)—it does, however, appear in both printed anthologies mentioned (Kinney 1999; Bevington 2002). In future expansions, it could fall into the scope of Digital Renaissance Editions and the Digital Anthology. Yet today, in 2019, it can only be found freely available online in out-of-copyright editions (on HathiTrust (Furlough 2008), Google Books (Google 2004), and the Internet Archive (Kahle 1996)), in its Early English Books Online-Text Creation Partnership (Early English Books Online-Text Creation Partnership EEBO-TCP) transcription and derivatives, and in a single digital edition. The archived version on Renascence Editions (Moncrief-Spittle 2001) offers a transcription of William Hazlitt's 1857 edition; the 1910 Harvard Classics edition, edited by Charles W. Eliot, is available on Bartleby.com: Great Books Online (1993), Project Gutenberg (Hart 1971), and the ebooks@Adelaide (Thomas 2015) sites—though not all of these sites are transparent about their sourcetexts. St John's College Digital Archive offers an unannotated, undated facsimile of a typewritten Duchess of Malfi text (King William Players 1947), with no clue as to its origins except that it is posted in the "Playbills and Programs" digital collection, many of which are "from productions by The King William Players, the St. John's student theater troupe".5

The only online scholarly edition of *The Duchess of Malfi* less than a hundred years old is Larry Avis Brown's 2010 edition (last updated 2018), which includes glosses, commentary on each scene, and photos from a 1998 production at Lipscomb University in Nashville (Brown 2010). Brown's useful edition, however, exists separately from most of the sphere of early modern English drama online: it is a boutique project that stands alone, without links to and from many scholarly resources. Brown links to The Internet Shakespeare Editions, noting that his edition won their "swan" award in 2003, yet in the ISE rebuild, all mentions of Brown's site (still findable in their site search) now result in "Page Not Found" errors. The usefulness of Brown's Duchess of Malfi edition, then, is hampered by its lack of findability. I admit I only stumbled upon this edition because it is linked from the Wikipedia page for The Duchess of Malfi. "Boutique" editions created by individual scholars, particularly when peer-reviewed, have the potential to democratize our access to early modern plays—but this access must include findability. As Jakacki notes, however, "the ambition of a network of linked sources has significant implications for the editorial processes of not one, but all of the resources involved" (Jakacki 2018, p. 165). Previously, Early Modern Literary Studies (Steggle 2004) and Renascence Editions (Bear 1994) made efforts to host boutique editions of early modern literature edited to varying degrees, however these attempts seem to have been largely abandoned.

Shakespeare is separated from the other playwrights and poets of his day by our current scholarly digital editions. Greatley-Hirsch quantified the disproportionate number of digital editions of Shakespeare compared to his contemporaries (Hirsch 2011); this analysis suggests that the disparity extends beyond the amount of Shakespearean texts online to the very ways the texts are made

The St. John's College Catalogue for 1947–1948 reveals that the King William Players produced *The Duchess of Malfi* in their 1946–47 season (St. John's College in Annapolis 1948).

accessible. As Katherine Rowe (2014) argues, scholars need to assess if digital Shakespeare texts are "good enough" for the purposes we wish to apply them, including digital analysis.⁶ Furthermore, I assert that we need to bring this awareness to our use of digital projects about early modern drama more generally: what questions do we bring to the projects? What are our goals as users?⁷

4. Proliferating Shakespeares

Shakespeare's cultural prominence accounts for many of the factors discussed thus far: funders' pro-Shakespeare predilections, appeals to general audiences, and the "non-Shakespeare" project backlash. Shakespeare's preeminence itself also leads to the development and shape of digital humanities projects themselves. Peter Donaldson's Global Shakespeares highlights Shakespeare's cross-cultural appeal and offers site visitors evidence of how Shakespeare's plays are adapted and performed around the world. The nature of the Global Shakespeares site (and similar sites such as Shakespeare in Taiwan or Shakespeare in Spain) is only possible because Shakespeare is a global commodity.⁸ A Global Peeles site would have precious little content, because George Peele's works are not as frequently rewritten and staged. Global Shakespeares does not strive to be comprehensive: it is not a repository of full-length filmed productions, nor is it a record of all international Shakespeare production. Rather, it is a gathering of curated videos, taken from a wealth of global Shakespeare materials; it is the very wealth of materials that makes the project possible.

Other examples abound of digital projects that exist precisely because of Shakespeare's cultural prominence. The four hundredth anniversary of Shakespeare's death in 2016 led to the reimagining or launch of multiple new digital projects, many of which are devoted to Shakespeare's legacy. Shakespeare & The Players (Rusche and Shaw 2016), for instance, is a collection of nearly 1000 postcards of Shakespearean performances from 1880–1914. The Victorian Illustrated Shakespeare Archive (Goodman 2016) offers a repository of illustrations of Shakespeare's works by four Victorian illustrators. Performance Shakespeare 2016 (Massai and Bennett 2016) captured a database of those productions that were performed in honor of the quadricentennial anniversary. Exploring Shakespeare's ongoing and changing cultural impact is an important part of Shakespeare studies, which naturally lends itself to the creation of resources that, in turn, highlight Shakespeare's prominence.

It is not then surprising that Shakespeare is overrepresented in scholarship about the early modern period. Shakespeare's prominence in digital humanities now contributes to this cycle: scholars write about Shakespeare because they can research him in innovative ways (easily comparing, for instance, early printed texts on the Shakespeare Quartos Archive, or watching a production on the Global Shakespeares site); the interest in Shakespeare, in turn, generates more Shakespeare-centric sites, often specifically designed for teaching and research. The World Shakespeare Bibliography Online (Estill 2019b) serves as a record of this research and as another element of the self-reinforcing cycle of Shakespeare publication. The World Shakespeare Bibliography is a database of performances of and publications about Shakespeare, which ultimately shapes how and what we research. The boundaries of the World Shakespeare Bibliography (it includes only works that focus on Shakespeare), means that scholars using the WSB will not be able to find related work about early modern literature or the professional Elizabethan stage more broadly, unless that scholarship includes a sustained focus on Shakespeare. Users of any other author-focused bibliography, such as the *Marlowe Bibliography Online*

See also the discussion, cited by Rowe, on the open review for Andrew Murphy's "Shakespeare Goes Digital" (Murphy 2010) about how Shakespeareans use digital texts.

See The Shakespeare User: Critical and Creative Appropriations in a Networked Culture, edited by Valerie M. Fazel and Louise Geddes (Fazel and Geddes 2017), particularly the chapter by Eric Johnson (2017).

For a thoughtful discussion of the strengths and weaknesses of the Global Shakespeares project, as well as a consideration of the opportunities for and threats to the project, see Diana Henderson (2018). Henderson positions her in-depth analysis as "a case study that may assist others wrestling with the challenging, changing digital/Shakespeares studies landscape" (p. 70). For additional reflections on Global Shakespeares, including by its editors, see Henderson's citations.

For a history of the World Shakespeare Bibliography and its move online, see (Estill 2014).

(McInnis and Allan 2019) or the *Margaret Cavendish Bibliography Initiative* (Siegfried 2019), will face similar limitations; however, the sheer scope of the World Shakespeare Bibliography (currently over 126,000 records) can lead scholars to forget about the world of scholarship beyond its scope, whereas the limits of smaller, boutique bibliographies are more readily apparent.

The bibliography with breadth to complement the World Shakespeare Bibliography's depth is the MLA International Bibliography (MLA International Bibliography 2018). The World Shakespeare Bibliography, of course, covers much material outside the scope of the MLAIB, such as professional productions, podcasts, digital projects, and reviews. The World Shakespeare Bibliography's depth of scope leads to multiple benefits, including having descriptive annotations and cross-referencing between items (for instance, a journal article about film adaptations of Hamlet would be cross-referenced to entries for each post-1960 film discussed, which in turn would have an annotation describing the cast as well as a list of reviews and other scholarly works that had discussed the film). Yet, even where their scopes are the same, the Shakespeare-centric focus of the World Shakespeare Bibliography means that there are items in the WSB that should appear in the MLAIB but simply aren't included. Books offer the most striking disparity: only 14% of the books published after 1960 annotated in the World Shakespeare Bibliography are indexed in the MLA International Bibliography. 10 Despite being the MLA International Bibliography (emphasis added), it is too often the global, non-English contributions that are among the thousands of overlooked texts. As such, perhaps counterintuitively, it is the World Shakespeare Bibliography's specificity of focus that leads to its greater inclusivity of global materials.

The digital projects that reflect Shakespeare's cultural prominence, in turn, reinforce his position in our scholarship by opening new avenues for research, often focused entirely on Shakespeare and his legacy. Indeed, digital humanities' Shakespeare problem extends beyond the framing and focus of existing and in-progress digital projects (what we study) by affecting the kinds of research we can undertake (how we study). For instance, Shakespeare, and the consideration of what is Shakespearean or not, has been central to stylometry, an area of study that now uses primarily digital methodologies. Shakespeare has long been the testing ground and often bellwether for new approaches to both literary criticism and textual studies (Parvini 2012; Machan 2000); new digital humanities approaches are no exception, and often turn to Shakespeare as a first case study. The cycle that reinforces Shakespeare's centrality continues into the digital: online projects about Shakespeare beget new research questions that are, in turn, focused on Shakespeare. The boundaries of Shakespeare-centric projects affect the very questions we can bring to our research and teaching and the new questions we are conditioned to develop.

5. Conclusions

If we could imagine an early modern digital project with both depth and breadth that positions Shakespeare in his changing historical contexts, the rise of bardolatry over time would mean reflecting Shakespeare's rising cultural prominence over the past centuries. A synchronic project might choose to focus only on Shakespeare's lifetime or only on the heyday of Elizabethan and/or Jacobean professional theatre, yet such a digital project would not capture Shakespeare's legacy. Even if we could conceptualize (let alone realize) the most idealized, unbiased digital project, we would certainly not be able to navigate or query it without bringing in our conditioned, canonical biases.

This figure was based on searches undertaken in January 2019. Choosing "book collection" and "book monograph" as document types in the World Shakespeare Bibliography yielded 28,706 entries, compared to 4416 results in the MLA International Bibliography, limited from 1960–2019 and by document type "book," "translation," and "edition," searching with the keyword "Shakespeare."

Too frequently, we protest that we are "Shakespeareans" or "early modernists" first and digital scholars second¹¹; yet, in order to be effective scholars, we must train ourselves and future generations about digital research methods, including how to determine scope and functionality. To make the most of those valuable early modern digital projects we have, scholars must understand what questions these resources can effectively answer. As John Lavagnino (2014) has observed, today, all humanists undertake research with digital tools, whether they consider themselves digital humanists or not. In both building and using tools about the early modern period, we need to create and reference transparent and detailed project descriptions and guidelines. The future of early modern studies will be shaped by the digital tools that will change the way we research. The potential of linked open data or other digital advances, however, will not be realized if scholars do not critically analyze each digital project as we would a monograph, an edition, a performance, or a bibliography. This essay's critical engagement of digital projects both individually and in their online ecosystem demonstrates that digital humanities has a Shakespeare problem. As these projects evolve and depreciate and as new projects are built, we will have to continue our assessments. How we choose to respond to these early modern digital resources and how we design our future projects will, in turn, shape how we understand the literary canon.

Funding: This research was made possible by funding from the Canada Research Chair program.

Acknowledgments: I would like to thank Heidi Craig for her thoughtful feedback on this article. Thanks also to the *Humanities* blind peer reviewers and guest editor, Stephen O'Neill, for their constructive suggestions.

Conflicts of Interest: The author declares no conflicts of interest.

References

Directed by Maria Aberg. 2018, *The Duchess of Malfi*. Stratford-upon-Avon: The Royal Shakespeare Company. Bartleby.com: Great Books Online. 1993. Available online: www.bartleby.com/hc/ (accessed on 20 November 2018). Bear, Risa Stephanie. 1994. Renascence Editions. Archived 2018. Available online: https://scholarsbank.uoregon.edu/xmlui/handle/1794/507 (accessed on 28 February 2019).

Bell, Henry, Amy Borsuk, and Christie Carson, eds. Forthcoming. *RiDE: Research in Drama Education: The Journal of Applied Theatre and Performance*. Shakespeare and Digital Pedagogy (Themed Issue). Available online: ridejournal.net/articles/5a79ae7c193311f3060d4ff4 (accessed on 10 December 2018).

Bergenmar, Jenny, and Katarina Leppänen. 2017. Gender and Vernaculars in Digital Humanities and World Literature. *NORA: Nordic Journal of Feminist and Gender Research* 25: 232–46. [CrossRef]

Bevington, David. 2002. English Renaissance Drama: A Norton Anthology. New York: Norton.

Bianco, Jamie "Skye". 2012. This Digital Humanities Which Is Not One. In *Debates in the Digital Humanities*. Edited by Matthew K. Gold. Minneapolis: University of Minnesota Press. Available online: debates/text/9 (accessed on 15 December 2018).

Bodleian Library. 2009. Shakespeare Quartos Archive. Available online: quartos.org (accessed on 18 December 2018). Bogost, Ian. 2012. *Alien Phenomenology: Or, What It's Like to Be a Thing*. Minneapolis: University of Minnesota Press. British Library. 2006. English Short Title Catalogue. Available online: estc.bl.uk (accessed on 18 December 2018). Brown, Larry Avis, ed. 2010. The Duchess of Malfi: The Complete Texts with Notes and Commentary. Available online: larryavisbrown.com/duchess-of-malfi/ (accessed on 27 January 2019).

Brown, Meaghan, Michael Poston, and Elizabeth Williamson, eds. 2016. A Digital Anthology of Early Modern English Drama. Folger Shakespeare Library. Available online: emed.folger.edu (accessed on 27 January 2019). Butler, Martin, ed. 2014. *The Cambridge Edition of the Works of Ben Jonson Online*. Cambridge: Cambridge University Press. Available online: http://universitypublishingonline.org/cambridge/benjonson/ (accessed on 29 January 2019).

See, for instance, the proud claim in the introduction to Shakespeare and the Digital World that "this is a collection that does not come of out the vanguard of digital humanities specialists, but from the trial-and-error approaches of committed Shakespearean professionals working within an evolving field" (Carson and Kirwan 2014b, pp. 3–4). This claim suggests that a scholar cannot be both a digital humanities specialist and a Shakespearean professional.

Butler, Martin, and Matthew Steggle. Forthcoming. *The Complete Works of John Marston*. Oxford: Oxford University Press. Available online: johnmarston.leeds.ac.uk (accessed on 15 January 2019).

- Calbi, Maurizio, and Stephen O'Neill. 2016. Shakespeare and Social Media (special issue). *Borrowers and Lenders: The Journal of Shakespeare and Appropriation* 10. Available online: borrowers.uga.edu/29/toc (accessed on 25 January 2019).
- Carson, Christie, and Peter Kirwan. 2014a. Conclusion: Digital Dreaming. In *Shakespeare and the Digital World*. Edited by Christie Carson and Peter Kirwan. Cambridge: Cambridge University Press, pp. 238–57.
- Carson, Christie, and Peter Kirwan. 2014b. Shakespeare and the Digital World: Introduction. In *Shakespeare and the Digital World*. Edited by Christie Carson and Peter Kirwan. Cambridge: Cambridge University Press, pp. 1–7.
- Cave, Richard, ed. 2010. Richard Brome Online. Available online: https://www.dhi.ac.uk/brome (accessed on 28 January 2019).
- Conway, Paul. 2010. Preservation in the Age of Google: Digitization, Digital Preservation, and Dilemmas. *Library Quarterly* 80: 61–79. Available online: hdl.handle.net/2027.42/85223 (accessed on 25 January 2019). [CrossRef]
- Crighton, Robert. 2013. Beyond Shakespeare. Available online: beyondshakespeare.blogspot.com (accessed on 27 January 2019).
- Davies, Callan, and Andy Kesson. Forthcoming. DH and Non-Shakespearean Theatre History. Shakespeare Newsletter
- Desmet, Christy. 2014. The Shakespeare Quartos Archive. Shakespearean International Yearbook 14: 143-54.
- Desmet, Christy. 2017. Alien Shakespeares 2.0. In *Shakespeare après Shakespeare/Shakespeare after Shakespeare*. Edited by Anne-Valérie Dulac and Laetitia Sansonetti. Société Française Shakespeare. Available online: https://journals.openedition.org/shakespeare/3877 (accessed on 19 February 2019).
- Donaldson, Peter S. 2009. Global Shakespeares: Video and Performance Archive. Available online: globalshakespeares.mit.edu/about/ (accessed on 25 January 2019).
- Earhart, Amy. 2012. Can Information Be Unfettered? Race and the New Digital Humanities Canon. In *Debates in the Digital Humanities*. Edited by Matthew K. Gold. Minneapolis: University of Minnesota Press. Available online: dhdebates.gc.cuny.edu/debates/text/16 (accessed on 15 December 2018).
- Earhart, Amy. 2015. Traces of the Old, Uses of the New: The Emergence of Digital Literary Studies. Ann Arbor: University of Michigan Press.
- Early English Books Online-Text Creation Partnership (EEBO-TCP). 2009. Available online: quod.lib.umich.edu/e/eebogroup/ (accessed on 25 January 2019).
- Estill, Laura. 2014. Digital Bibliography and Global Shakespeare. *Scholarly and Research Communication* 5. Available online: doi.org/10.22230/src.2014v5n4a187 (accessed on 27 January 2019).
- Estill, Laura. 2019a. Shakespearean Extracts and the Misrepresentation of the Archive. In *Rethinking Theatrical Documents in Shakespeare's England*. Edited by Tiffany Stern. London: Bloomsbury.
- Estill, Laura, ed. 2019b. World Shakespeare Bibliography. Created by Sidney Thomas, 1950. Moved online by James L. Harner, 2011. Available online: worldshakesbib.org (accessed on 27 January 2019).
- Estill, Laura, Dominic Klyve, and Kate Bridal. 2015. "Spare your arithmetic, never count the turns": A Statistical Analysis of Writing about Shakespeare, 1960–2010. Shakespeare Quarterly 66: 1–28. [CrossRef]
- Fazel, Valerie M., and Louise Geddes. 2017. *The Shakespeare User: Critical and Creative Appropriations in a Networked Culture.* Cham: Palgrave Macmillan.
- Flanders, Julia. 2009. The Productive Unease of 21st-Century Digital Scholarship. *Digital Humanities Quarterly* 3. Available online: digitalhumanities.org/dhq/vol/3/3/000055/000055.html (accessed on 15 January 2019).
- Fraistat, Neil, Steven E. Jones, and Carl Stahmer. 1998. The Canon, the Web, and the Digitization of Romanticism. *Romanticism on the Net* 10. Available online: http://www.erudit.org/revue/ron/1998/v/n10/005801ar.html (accessed on 29 January 2019). [CrossRef]
- Furlough, Michael. 2008. HathiTrust Digital Library. Available online: hathitrust.org (accessed on 27 January 2019).
- Galey, Alan, and Ray Siemens, eds. 2008. Reinventing Shakespeare in the Digital Humanities (special issue). *Shakespeare* 4: 201–207. [CrossRef]
- Goodman, John Michael. 2016. Victorian Illustrated Shakespeare Archive. Available online: https://shakespeareillustration.org (accessed on 20 November 2018).
- Google. 2004. GoogleBooks. Available online: books.google.com (accessed on 27 January 2019).

Greatley-Hirsch, Brett, ed. 2015. Digital Renaissance Editions. Available online: digitalrenaissance.uvic.ca (accessed on 27 January 2019).

- Greene, Mark A., and Dennis Meissner. 2005. More Product, Less Process: Revamping Traditional Archival Processing. *The American Archivist* 68: 208–63. [CrossRef]
- Hart, Michael. 1971. Project Gutenberg. Available online: gutenberg.org (accessed on 27 January 2019).
- Henderson, Diana. 2018. This Distracted Globe, This Brave New World: Learning from the MIT Global Shakespeares' Twenty-First Century. In *Broadcast Your Shakespeare: Continuity and Change Across Media*. Edited by Stephen O'Neill. London: Bloomsbury Arden Shakespeare, pp. 67–86.
- Hirsch [now Greatley-Hirsch], Brett. 2010. Bringing Richard Brome Online. Early Theatre 13: 137–53.
- Hirsch [now Greatley-Hirsch], Brett. 2011. The Kingdom Has Been Digitized: Electronic Editions of Renaissance Drama and the Long Shadows of Shakespeare and Print. *Literature Compass* 8: 568–91. [CrossRef]
- Hirsch [now Greatley-Hirsch], Brett, and Hugh Craig. 2014. Digital Shakespeares (special section). *Shakespearean International Yearbook* 14.
- Hodgdon, Barbara. 1998. *The Shakespeare Trade: Performances and Appropriations*. Philadelphia: University of Pennsylvania Press.
- Jakacki, Diane K. 2018. Internet Shakespeare Editions and the Infinite Editorial Others: Support Critical Tagsets for Linked Data. In *Shakespeare's Language in Digital Media: Old Words, New Tools*. Edited by Janelle Jenstad, Mark Kaethler and Jennifer Roberts-Smith. London and New York: Routledge, pp. 157–71.
- Jenstad, Janelle, ed. 2018. Internet Shakespeare Editions. Created by Michael Best, 1996. Available online: ise.uvic.ca (accessed on 17 January 2019).
- Johnson, Eric. 2017. Opening Shakespeare from the Margins. In *The Shakespeare User: Critical and Creative Appropriations in a Networked Culture*. Edited by Valerie M. Fazel and Louise Geddes. Cham: Palgrave Macmillan, pp. 187–206.
- Kahle, Brewster. 1996. The Internet Archive. Available online: archive.org (accessed on 27 January 2019).
- Kesson, Andy, Lucy Munro, and Callan Davies. 2016. Before Shakespeare. Available online: beforeshakespeare. com (accessed on 20 January 2019).
- King William Players. 1947. The Duchess of Malfi. St. John's College Digital Archives. Available online: digitalarchives.sjc.edu/items/show/1261 (accessed on 9 January 2019).
- Kinney, Arthur F. 1999. Renaissance Drama: Anthology of Plays and Entertainments. Malden: Blackwell.
- Kliman, Bernice W., Frank Nicholas Clary, Hardin Aasand, Eric Rasmussen, Laury Magnus, and Marvin Hunt, eds. 2004. HamletWorks. Available online: hamletworks.org (accessed on 10 December 2018).
- Knight, Leah, and Wendy Wall. 2018. The Pulter Project. Available online: pulterproject.northwestern.edu/(accessed on 7 January 2019).
- Lanier, Douglas. 2014. Shakespearean Rhizomatics: Adaptation, Ethics, Value. In *Shakespeare and the Ethics of Appropriation*. Edited by Alexa Huang [now Joubin] and Elizabeth Rivlin. New York: Palgrave, pp. 21–40.
- Lavagnino, John. 2014. Shakespeare in the Digital Humanities. In *Shakespeare and the Digital World*. Edited by Christie Carson and Peter Kirwan. Cambridge: Cambridge University Press, pp. 238–57.
- Lesser, Zachary, and Alan Farmer. 2007. Database of Early English Playbooks. Available online: deep.sas.upenn. edu (accessed on 2 December 2018).
- Machan, Tim William. 2000. 'I Endowed Thy Purposes': Shakespeare, Editing, and Middle English Literature. *Text* 13: 9–25.
- Mandell, Laura. 2015. Gendering Digital Literary History: What Counts for Digital Humanities. In *A New Companion to Digital Humanities*. Edited by Susan Schreibman, Raymond G. Siemens and John Unsworth. Malden: Wiley-Blackwell, pp. 511–23.
- Massai, Sonia, and Susan Bennett, eds. 2016. Performance Shakespeare 2016. Available online: performanceshakespeare2016.org (accessed on 28 February 2019).
- McInnis, David, and Gayle Allan. 2019. The Marlowe Bibliography Online. Marlowe Society of America Release 2017.1. Available online: marlowesocietyofamerica.org/mbo/ (accessed on 20 January 2019).
- McLuskie, Kate, and Kate Rumbold. 2014. *Cultural Value in Twenty-First Century England: The Case of Shakespeare*. Manchester: University of Manchester Press.
- McMillin, Scott, and Sally-Beth MacLean. 1998. *The Queen's Men and Their Plays*. Cambridge: Cambridge University Press.

MLA Committee on Information Technology. 2012a. Guidelines for Authors of Digital Resources. Available online: mla.org/About-Us/Governance/Committees/Committee-Listings/Professional-Issues/Committee-on-Information-Technology/Guidelines-for-Authors-of-Digital-Resources (accessed on 15 November 2018).

- MLA Committee on Information Technology. 2012b. Guidelines for Evaluating Work in Digital Humanities and Digital Media. Available online: mla.org/About-Us/Governance/Committees/Committee-Listings/Professional-Issues/Committee-on-Information-Technology/Guidelines-for-Evaluating-Work-in-Digital-Humanities-and-Digital-Media (accessed on 15 November 2018).
- MLA International Bibliography. 2018. Available online by Subscription. Available online: https://www.mla.org/ Publications/MLA-International-Bibliography/About-the-MLA-International-Bibliography (accessed on 27 January 2019). First Published 1922.
- Moncrief-Spittle, Malcolm, trans. 2001. The Duchess of Malfi. By John Webster. Hazlitt, William, ed. Renascence Editions. Available online: scholarsbank.uoregon.edu/xmlui/handle/1794/776 (accessed on 27 January 2019).
- Moore, Shawn, and Jacob Tootalian, directors. 2013. The Digital Cavendish Project. Available online: digitalcavendish.org (accessed on 15 January 2019).
- Mowat, Barbara, Paul Werstine, Michael Poston, and Rebecca Niles, eds. 2012. Folger Digital Texts. Folger Shakespeare Library: Available online: folgerdigitaltexts.org (accessed on 19 December 2018).
- Mueller, Martin. 2014. Shakespeare His Contemporaries: Collaborative Curation and Exploration of Early Modern Drama in a Digital Environment. *Digital Humanities Quarterly* 8. Available online: digitalhumanities.org/dhq/vol/8/3/000183/000183.html (accessed on 17 January 2019).
- Mueller, Martin. 2016. Shakespeare His Contemporaries. Now Defunct. Available online: web.archive.org/web/*/http://shakespearehiscontemporaries.northwestern.edu/shc/home.html (accessed on 23 January 2019).
- Munro, Lucy. 2009. Children of the Queen's Revels: A Jacobean Theatre Repertory. Cambridge: Cambridge University Press. Murphy, Andrew. 2010. Shakespeare Goes Digital: Three Open Internet Editions. Shakespeare Quarterly 61: 401–14. Available online: mcpress.media-commons.org/ShakespeareQuarterly_NewMedia/shakespeare-remediated/murphy-shakespeare-goes-digital/ (accessed on 19 February 2019). [CrossRef]
- O'Neill, Stephen. 2015. Shakespeare and Social Media. Literature Compass 12: 274-85. [CrossRef]
- O'Neill, Stephen. 2018. Shakespeare's Digital Flow: Humans, Technologies and the Possibilities of Intercultural Exchange. *Shakespeare Studies* 46: 120–33.
- Olive, Sarah. 2015. Shakespeare Valued: Education Policy and Pedagogy 1989–2009. Bristol and Chicago: Intellect.
- Ostovich, Helen, ed. 2006. The Queen's Men Editions. Available online: qme.internetshakespeare.uvic.ca (accessed on 27 January 2019).
- P., Cildas. 2015. Richard III Attacks! Playfool.net; Thomas Jolly, La Piccola Familia. Available online: lapiccolafamilia.fr/richard-iii-attacks/ (accessed on 20 November 2018).
- Parvini, Neema. 2012. *Shakespeare and Contemporary Theory: New Historicism and Cultural Materialism.* New York: Bloomsbury.
- Pollard, Alfred W., and Gilbert Richard Redgrave. 1926. A Short-Title Catalogue of Books Printed in England, Scotland & Ireland, and of English Books Printed Abroad, 1475–1640. London: Bibliographical Society.
- Price, Kenneth M. 2009. Digital Scholarship, Economics, and the American Literary Canon. *Literature Compass* 6: 274–90. [CrossRef]
- Rowe, Katherine, ed. 2010. Shakespeare and New Media (special issue). Shakespeare Quarterly 61.
- Rowe, Katherine. 2014. Living with Digital Incunables, or a 'Good-Enough' Shakespeare Text. In *Shakespeare and the Digital World*. Edited by Christie Carson and Peter Kirwan. Cambridge: Cambridge University Press, pp. 144–159.
- Rusche, Harry, and Justin Shaw. 2016. Shakespeare & The Players. Available online: shakespeare.emory.edu/(accessed on 20 November 2018).
- Siegfried, Brandie. 2019. Margaret Cavendish Bibliography Initiative. *Digital Cavendish Project*. Available online: digitalcavendish.org/resources/margaret-cavendish-bibliography-initiative/ (accessed on 10 December 2018).
- Silbert, Roxana, director. 2010. *Such Tweet Sorrow*. Story grid by Beth Marlow and Tim Wright. Stratford-upon-Avon and Sheffield: Royal Shakespeare Company and Mudlark Production Company.
- Slights, Jessica, ed. 2017. *Othello*. Internet Shakespeare Editions: Available online: http://internetshakespeare. uvic.ca/Library/Texts/Oth/ (accessed on 27 January 2019).

Smith, Emma. 2017. Shakespeare: The Apex Predator. *TLS: Times Literary Supplement*. May 4. Available online: https://www.the-tls.co.uk/articles/public/shakespeare-apex-predator/ (accessed on 19 February 2019).

St. John's College in Annapolis. 1948. St John's College Catalogue 1947–1948. St. John's College Digital Archives. Available online: digitalarchives.sjc.edu/items/show/181 (accessed on 9 January 2019).

Steggle, Matthew, ed. 2004. *Early Modern Literary Studies*. Hosted Resources: Available online: https://extra.shu.ac.uk/emls/iemls/resources.html (accessed on 28 January 2019).

Steggle, Matthew. 2008. "Knowledge Will Be Multiplied": Digital Literary Studies and Early Modern Literature. In *A Companion to Digital Literary Studies*. Edited by Ray Siemens and Susan Schriebman. Malden: Blackwell. Thomas, Steve. 2015. Ebooks@Adelaide. Available online: ebooks.adelaide.edu.au (accessed on 27 January 2019).

Tran, Diep. 2018. The Top 10* Most Produced Plays of the 2018–2019 Season. *American Theatre*. September 20. Available online: americantheatre.org/2018/09/20/the-top-10-most-produced-plays-of-the-2018-19-season/ (accessed on 27 January 2019).

Wernimont, Jacqueline, and Julia Flanders. 2010. Feminism in the Age of Digital Archives: The Women Writer's Project. *Tulsa Studies in Women's Language and Literature* 29: 425–35.

Wing, Donald. 1945. A Short-Title Catalogue of Books Printed in England, Scotland & Ireland, and of English Books Printed Abroad, 1641–1700. New York: Columbia University Press.



© 2019 by the author. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (http://creativecommons.org/licenses/by/4.0/).