expliquer de manière plus subtile les propos de certains observateurs dans la presse au XIXᵉ siècle qui plaignaient les bigames aux prises avec deux épouses et deux belles-mères. Les débats intellectuels évoqués au chapitre cinq auraient aussi bénéficié d'un éclairage genré, puisqu'il ressort des propos des jurisconsultes, des ecclésiastiques et des quelques féministes prises en compte dans l'analyse que la bigamie était largement perçue comme un phénomène masculin. C'est d'ailleurs le seul endroit du livre où le sort des enfants est évoqué, la bigamie étant traitée jusque-là comme relative au couple plutôt qu'à la famille. Le dernier chapitre se penche sur les peines que la justice a fait subir aux bigames dans la longue période étudiée. Lorsque la volonté de commettre le crime de bigamie était prouvée, les individus tombaient sous le coup de la justice criminelle, très sévère du XVIᵉ au XIXᵉ siècle en France et ailleurs en Europe, à quelques exceptions près. Cette sévérité se relâcha vers la fin du XIXᵉ siècle, au moment des discussions sur la loi Naquet restaurant la possibilité du divorce, pour tendre vers l'indulgence aux XXᵉ et XXIᵉ siècles. L'auteur passe sous silence les procédures en justice civile et les accords notariés qui ont permis à certaines affaires de passer sous le radar, territoire de recherche immense et encore vierge.

Au total, ce livre d'une lecture agréable saura contenter les amateurs éclairés, même si l'ouvrage laisse plusieurs questions en suspens. Bien entendu, limiter le propos au crime de bigamie, avec son rapport étroit au mariage, a fermé certaines pistes de réflexion. Si la pratique du concubinage fait effectivement reculer la répression de la bigamie (pas de mariage, pas de crime), cela ne veut pas dire que le modèle monogame soit pour autant affaibli dans la société française. D'autres approches, sociologiques et anthropologiques, et d'autres sources seront nécessaires pour comprendre les motivations des individus qui sortent du chemin de la monogamie dans les sociétés où ce modèle est dominant.

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GRAHAM, Shawn, Ian MILLIGAN, and Scott WEINGART – *Exploring Big Historical Data: The Historian's Macroscope.* London: Imperial College Press, 2016. Pp. 282.

Digitally enabled projects are now helping transform the central components of historical scholarship, from research and teaching to engagement with the larger society. Shawn Graham, Ian Milligan, and Scott Weingart compellingly demonstrate this transformation by focusing on data as the common *sine qua non* of these activities. As evidence about the past becomes increasingly digitized or is born digital, historians are now exploring how the move from print culture to digital infrastructure both facilitates well-established approaches and offers unprecedented opportunities for themselves and for students. Moreover, scholars

are now embracing new approaches to scholarly communication that redefine not only access but also production.

In this context, Graham, Milligan, and Weingart seek to accelerate current developments by helping scholars and students develop conceptual and methodological competencies in understanding and using data. Their focus is on the size and complexity of historical data that are now available to historians. To take advantage of this ever-increasing big data, the authors offer researchers a "macroscope," defined as both a tool and perspective. As such, a macroscope is a "tool for looking at the very big" (p. xvi) to gain insight into the past. The volume is divided into seven chapters that are thematically organized and sequenced from introductory to more advanced. The result is a timely, engaging, and rich contribution that deserves a wide readership in undergraduate and graduate courses. Those interested in the theory and practice of digital scholarship will also find much to engage with. Indeed, even for historians with considerable experience, the volume offers a great deal both theoretically and practically.

The book includes three sections that first describe ways of thinking about the current state of digital history and then introduce specific research approaches for studying text. The opening chapter situates the emergence and development of digital history in the larger context of changing perspectives on the past and the technological developments since the 1950s. The authors perceive three waves of digitally enabled research beginning with demographic and socioeconomic studies often inspired by new "bottom-up" analyses of transformative historical change associated with *Annales* scholars such as Ferdinand Braudel. Such studies joined new efforts by literary scholars to expedite the study of text by mechanizing the production of concordances and other well-established methods for studying large volumes of written expression. Such research efforts combined by the 1960s to support a new journal, *Computers and the Humanities,* as well as other initiatives that viewed digital technologies as offering faster ways to complete research tasks that had been done manually. Almost immediately, however, such work unleashed heated scholarly debate, with competing claims about history as a discipline in the humanities or social sciences, with the result that digitally enabled historical research developed slowly on the professional margins until the 1990s.

The authors describe the second wave of computational history in terms of leadership by humanities scholars who took advantage of personal computers as well as nascent digital communication technologies to begin rethinking historical practice on campus and beyond. This wave did not change the disciplinary marginal place of digitally enabled historical scholarship, but it did begin posing many of the profound questions at the heart of mainstream history today. Preliminary efforts to address these questions inspired closer contact with scholars in literature, philosophy, and such related emerging fields as new media studies. Enabled by increasingly powerful digital technologies, this contact set the stage for the third wave that is now widely recognized as digital history, and is now taking a central place within the discipline as well as within the larger field of digital humanities.

By historiographically situating their description of a macroscope, the authors emphasize the epistemological and metaphysical issues inherent in the use of digital

tools in historical scholarship. It is in this way that the book introduces readers to the field while also inviting them to contribute to current debate and practice regardless of their status or credentials. This ambition means that the chapters of the second section that focus on helping researchers learn digital tools for textual analysis offer both detailed practical guidance and critical commentary on the conceptual implications of such tools. Similarly, the book's third section makes clear that no tool is benign by illustrating the possibilities of multivariate analysis with visualization through network analysis. Students may struggle to reap the full benefit of these sections while more experienced researchers will appreciate their graduated sophistication and challenge. While some of the instructions for using specific digital tools are, as would be expected, beginning to become outdated, the authors' emphasis on the macroscope as a way of thinking ensures the enduring importance of the book's practice-focused chapters. This emphasis is especially important in their depiction of computational analysis as way to think through historical evidence rather than as an objectivist method to prove hypotheses.

The volume complements a robust website where readers can follow up on specific topics and themes. Moreover, the authors actually wrote the book publicly in real time, as they virtually collaborated from campuses at Carleton University, the University of Waterloo, and Indiana University. By posting draft texts as the book took shape, they invited critical commentary as well as suggestions for additional material. Graham, Milligan, and Weingart explain this approach to launch an ongoing reflection throughout the book on the changing relationships between authors and readers as well as between authors and organizations, including the publishing industry. Along the way, readers will engage with many complex topics that continue to attract debate and discussion, such as open access, team projects, and evaluation criteria.

The volume opens and closes with a fictional portrayal of a historian with strong digital literacies undertaking research on photocopied eighteenth-century court proceedings, and then openly sharing insights as well as data with a view toward continuing scholarly discussion among specialists and non-specialists. This portrayal succinctly captures what the authors see as the emerging and rapidly developing practice of digital history within a new integrated paradigm of digital scholarship. While often pointing to continuities with past historical thinking and approaches, the authors explicitly hope that, equipped with the perspective and tools represented by a macroscope, researchers ranging from students to established historians will be able to go far beyond what was possible in print culture. This important book will certainly help facilitate pursuit of this ambition.

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