

Book Proposal

The Astrologers of Emperor Maximilian I: Nature, Knowledge and Politics in the Holy Roman Empire

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General outline

In the Renaissance, astrology provided a compelling explanation of human and natural phenomena. Through an elaborate system of correspondences, humans and their social world were connected to the movements of the heavens and especially the motions of the planets. This general worldview was shared by people across all registers of society, from the illiterate peasant to the Renaissance prince. Astrologers interpreted these correspondences to gain insight into the personalities and health of their contemporaries and to capitalize on beneficial planetary conjunctions or to mitigate or avoid adverse influences. Because astrology provided the tools to interpret the relationship between the heavens and the earth, it offered a coherent system of knowledge that was practical and functional. Astrology was, however, a complex and sophisticated practice, grounded in the technical training provided by a university education. Astrologers formed a body of experts who offered their services to Renaissance princes, interpreting celestial phenomena and forecasting the outcomes of future events. Princes recognized the immediate use of such knowledge for their political agendas and often consulted astrologers to help them confront political and dynastic challenges.

The Astrologers of Emperor Maximilian I argues that astrology played a central role in imperial politics at the Habsburg court, one of the most important courts in Renaissance Europe. On the one hand, Emperor Maximilian I used astrology to guide political actions. He turned to astrologers and their predictions to find the most propitious times to sign treaties or marriage contracts. On the other hand, the emperor deployed astrology as a political tool to gain support for his political reforms, and to establish his own legitimacy as well as that of the Habsburg dynasty. For example, in 1495 when he struggled with the German princes at the Diet of Worms, Maximilian enjoyed the support of pro-Habsburg humanist-astrologers who published astrological prognostications endorsing the emperor's reforms. Later, in his depiction of the ideal prince, Maximilian emphasized both his own knowledge of astrology and his generous support for astrologers. Throughout his reign Maximilian consistently turned to his coterie of astrological counselors who offered advice on a wide range of pressing issues. *The Astrologers of Emperor Maximilian I* offers the first in-depth study of these astrologers and their roles at the Holy Roman Court. By showing how and why Maximilian relied on astrologers and their astrological advice, my book offers a rich understanding of the importance of astrology in Renaissance Europe and its role in the exercise of political power.

My book draws on extensive printed and manuscript sources, many of which have not received much scholarly attention. These sources are located in archives across northern and central Europe—from Poland and Germany to France and England—and the United States. *The Astrologers of Maximilian I* is built around a core group of actors: the emperor himself and his close circle of astrological advisors. It is organized in concentric spheres emanating out from the emperor. Beginning with the emperor's autobiographical works, chapter one locates astrology in Maximilian's own image making. From there, chapter two concentrates on how astrologers at the imperial court used astrology, both to further their own careers and to advance Habsburg policies. Chapter three examines printed astrological instruments produced for emperor and his court in order to recover how they functioned as learned propaganda to bolster the emperor's image as both patron and practitioner. Chapter four looks at the University of Vienna and how Maximilian's efforts to revitalize it influenced the astrological curriculum and tradition there. The remaining three chapters move out from these rarified spheres into increasingly popular ones. Chapter five explores the role of almanacs and ephemerides in the Habsburg policies. Chapter six focuses on cheap, ephemeral broadsheet wall calendars and annual *judicia* in order to follow Habsburg politics into the broadest audiences. Finally, chapter seven analyzes some of the occasional prognostications written by pro-Habsburg astrologers in response to prodigious celestial phenomenon.

The boundaries separating these spheres were permeable. Maximilian's expectations guaranteed that his astrologers would move between spheres or straddle two of them. Further, the audiences were neither homogeneous nor discrete—skilled astrologers were as likely to read complex university texts as to read cheap, ephemeral prognostications. Another major contribution of *The Astrologers of Emperor Maximilian I* is to show how readily astrologers moved between these spheres and how heterogeneous the audiences were. It was precisely the fluidity that made astrology such a useful tool for Emperor Maximilian I.

Significance

The Astrologers of Emperor Maximilian I breaks new ground in how it approaches astrology. Typically, histories of astrology bifurcate their subject, separating the astrologers from their patrons. The resulting studies tell rich stories about what astrologers thought and argued, but without explaining why their politically powerful patrons were interested in those arguments. In order to understand astrology and the political structures that supported it, the priorities of its patrons and audiences have to be accounted for alongside those of the astrologers themselves. By focusing on a discrete political context and set of actors, my book recovers astrology's multiple levels of meaning, from the perspective of the emperor, at one end of the spectrum, to the broad, scarcely literate public at the other end.

Much work remains to be done before scholars understand the role of astrology in political praxis, especially in the fifteenth and sixteenth century. The Habsburg family itself had a long history of consulting astrologers for political and dynastic ends, ranging from when to engage in military ventures or to sign treaties to when to celebrate marriages and conceive children.¹ Their actions were part of the

1. Helmuth Grössing and Franz Stuhlhofer, "Versuch einer Deutung der Rolle der Astrologie in den persönlichen Entscheidungen einiger Habsburger des Spätmittelalters," *Anzeiger der phil.-hist. Klasse der*

broader practice in which rulers consulted astrologers to guide their decisions, to legitimate their action, and to reinforce their authority.² In the *Realpolitik* of Renaissance Europe princes enlisted a range of political counselors, including political prophecy and other mantic practices. Understanding when and why a prince chose astrology to complement or to replace other forms of counsel reveals the complex ways that political practice and astrological discourse interacted.

Astrologers recognized their value to the prince and their potential political role. At the same time, astrologers also realized that they competed with other advisors—both other astrologers and other types of political counselors—for the prince’s attention and patronage. Consequently, astrologers deployed various rhetorical tools to argue for the nobility, antiquity, and utility of their discipline. They also strove to justify their “science” on the grounds that through its rigorous interpretation of the natural world astrology could offer more reliable predictions. By balancing how and why Maximilian turned to astrology with how astrologers applied their “science” to the immediate political opportunities and demands, *The Astrologers of Emperor Maximilian I* provides a rich understanding of the concrete practices of astrology at the Holy Roman Court. As a result, my book also offers a new perspective on Maximilian’s efforts to establish the House of Habsburg as one of the most important political dynasties in early-modern Europe.

Österreichischen Akademie der Wissenschaften 117 (1980): 267–83; Michael Shank, “Academic Consulting in 15th-Century Vienna: The Case of Astrology,” in *Texts and Contexts in Ancient and Medieval Science. Studies on the Occasion of John E. Murdoch’s Seventieth Birthday*, ed. Edith Sylla and Michael McVaugh (Leiden: Brill, 1997), 245–70.

2. In the Hungarian context, see Darin Hayton, “Expertise *Ex Stellis*: Comets, Horoscopes, and Politics in Renaissance Hungary,” *Osiris* 25 (2010): 27–46; Jean-Patrice Boudet and Darin Hayton, “Matthias Corvin, János Vitéz et l’horoscope de la fondation de l’Université de Pozsony en 1467,” in *Matthias Corvin, les bibliothèques princières et la genèse de l’état moderne*, ed. Jean-François Maillard, Istvan Monok, and Donatella Nebbiai (Budapest: Országos Széchényi Könyvtár, 2009). For Italian examples, see Monica Azzolini, “Reading Health in the Stars: Politics and Medical Astrology in Renaissance Milan,” in *Horoscopes and Public Spheres. Essays on the History of Astrology*, ed. Günther Oestmann, H. Darrel Rutkin, and Kocku von Stuckrad, *Religion and Society*, vol. 42 (Berlin: Walter de Gruyter, 2005), 183–205; Monica Azzolini, “The Politics of Prognostication: Astrology, Political Conspiracy and Murder in Fifteenth-Century Milan,” *History of Universities* 22 (2008): 6–34; Monica Azzolini, “The Political Uses of Astrology: Predicting the Illness and Death of Princes, Kings and Popes in the Italian Renaissance,” *Studies in History and Philosophy of Biological and Biomedical Sciences* 41, no. 2 (2010): 135–45. For England, see Hilary M. Carey, *Courting Disaster. Astrology at the English Court and University in the Later Middle Ages* (New York: St. Martin’s Press, 1992).esp. chaps. 7-9

Related research

The Astrologers of Emperor Maximilian I builds on two historiographic traditions: histories of Maximilian I and histories of Renaissance science.

Emperor Maximilian I was one of the most important Renaissance princes. His diplomatic and dynastic efforts established the House of Habsburg and laid foundation for the universal Habsburg empire under Emperor Charles V. Much scholarship on Maximilian's reign has assessed his effectiveness as a political actor on the European stage and as an agent of political change. The emperor is alternately viewed as regressive and an impediment to the formation of a German state, or as progressive and a stimulus for constitutional reform and the development of a multi-national empire.³ Along with these political histories, a rich body of scholarship has examined the emperor's efforts to construct and disseminate his image through literary and artistic works.⁴ Studies have shown how Maximilian used visual and literary arts to memorialize the emperor himself, to justify his claim to the imperial title, and to elevate the Habsburg dynasty. Despite this considerable interest in Maximilian's reign, little effort has been made, in

3. The classic statement of the first position is found in Ulmann's biography: Heinrich Ulmann, *Kaiser Maximilian I. Auf urkundlicher Grundlage dargestellt*, 2 vols. (Stuttgart: Cotta, 1884).. More recent work on Maximilian, mostly under the direction of Hermann Wiesflecker, has rehabilitated the emperor's image. See Wiesflecker's monumental five-volume biography, Hermann Wiesflecker, *Kaiser Maximilian I. Das Reich, Österreich und Europa an der Wende zur Neuzeit*, 5 vols. (Munich: R. Oldenbourg Verlag, 1971–1986).. Wiesflecker's many students have contributed to our understanding of the details of Maximilian's reign. For a list of dissertations and books produced under Wiesflecker's guidance, see Walter Höflechner, Helmut J. Mezler-Andelberg, and Othmar Pickl, eds., *Domus Austriae. Eine Festgabe Hermann Wiesflecker zum 70. Geburtstag* (Graz: Akademische Druck- und Verlagsanstalt, 1983), xxxii–xxxiv.

4. Important scholars in these areas are the art historian Larry Silver and the literary scholar Jan-Dirk Müller. Their interpretations have shaped much of the recent scholarship on Maximilian. See, for example, Larry Silver, *Marketing Maximilian. The Visual Ideology of a Holy Roman Emperor* (Princeton, NJ: Princeton University Press, 2008); Jan-Dirk Müller, *Gedechtnus. Literatur und Hofgesellschaft um Maximilian I.* (Munich: Wilhelm Fink Verlag, 1982). Maximilian and his patronage of art continues to attract the attention of art historians. See the recent dissertations by Heather Kathryn Suzanne Madar, "History Made Visible: Visual Strategies in the Memorial Project of Maximilian I" (PhD University of California, 2003); Gregory Todd Harwell, "Aurea condet saecula (per arva saturno quondam). Imperial Habsburg Medals from the Coronation of Frederick III (1452) until the Succession of Maximilian I (1494). Art and Legitimacy between Feudalism and Absolutism" (PhD Dissertation., Princeton, 2005). See also Suzanne Karr Schmidt, "Art. A User's Guide: Interactive and Sculptural Printmaking in the Renaissance" (PhD Yale University, 2006).passim

any language, to investigate the scientific culture, specifically the astrological culture, at Maximilian's court.⁵

The second historiographic tradition focuses on Renaissance "science."⁶ Much of the early scholarship was interested in how Renaissance "science" contributed to or inhibited the developments associated with the Scientific Revolution.⁷ By the 1970s historians of science who had been influenced by social and cultural history turned their attention to occult and religious aspects of the Renaissance science.⁸ Recent work on the history of alchemy has shown how fruitful such studies can be. From the early 1980s historians of alchemy have made remarkable contributions to the history of science, arguing for alchemy's central role in the developments of both the practice of science—the techniques, the quantitative goals, and the use of precision instruments—as well as its content—the mechanical

5. One chapter of Wiesflecker's biography treats Maximilian's intellectual activities, {Hermann Wiesflecker, *Kaiser Maximilian I. Das Reich, Österreich und Europa an der Wende zur Neuzeit*, 5 vols., vol. 5: *Der Kaiser und seine Umwelt. Hof, Staat, Wirtschaft, Gesellschaft und Kultur* (Munich: R. Oldenbourg Verlag, 1986), PAGES–PAGES. This chapter draws substantially from a dissertation covering much of the same material, see Andrea Baltl, "Maximilians I. Beziehungen zur Wissenschaft und Kunst" (PhD dissertation., Universität Graz, 1967)..

6. As Pamela Smith has pointed out in her recent essay, the term "science" is anachronistic when applied to the early-modern period and fails to capture the range of activities historians of science might study. However, there is no obvious replacement for it. Moreover, it can still function as a useful, if imprecise, catch-all term. See Pamela H. Smith, "Science on the Move: Recent Trends in the History of Early Modern Science," *Renaissance Quarterly* 62 (2009), 345, /esp. note 1/.

7. Smith, Pamela H. "Science on the Move: Recent Trends in the History of Early Modern Science." *Renaissance Quarterly* 62 (2009): 345–75.

8. See for example Allen Debus, *The English Paracelsians* (New York: F. Watts, 1965); Allen Debus, *The Chemical Philosophy: Paracelsian Science and Medicine in the Sixteenth and Seventeenth Centuries*, 2 vols. (New York: Science History Publications, 1977); Charles Webster, *The Great Instauration: Science, Medicine, and Reform, 1626-1660* (London: Duckworth, 1975). Charles Webster, *From Paracelsus to Newton: Magic and the Making of Modern Science* (Cambridge: Cambridge University Press, 1982).

philosophy, Newton's theory of gravity, atoms and corpuscles.⁹ Some recent scholarship notwithstanding, the history of astrology, the other wretched subject, has yet to enjoy its rehabilitation.¹⁰

The history of astrology suffers from modern astrology's tenuous relationship to astronomy. Often considered the quintessential pseudo-science or superstition, astrology and its history have long been relegated to the margins of historical research.¹¹ Despite some excellent early studies on astrology's importance for understanding European history, mainly by art historians and classicists, historians of science are just beginning to come to terms with astrology's historical importance.¹² Studies have begun

9. The literature on alchemy continues to grow. Some foundational studies include: Betty Jo Teeter Dobbs, *The Foundations of Newton's Alchemy: Or, "The Hunting of the Greene Lyon"* (Cambridge: Cambridge University Press, 1975); Betty Jo Teeter Dobbs, "The Janus Faces of Genius: The Role of Alchemy in Newton's Thought," (1991); William R. Newman, "Atoms and Alchemy. Chymistry and the Experimental Origins of the Scientific Revolution," (2006); William R. Newman, *Promethean Ambitions. Alchemy and the Quest to Perfect Nature* (Chicago: University of Chicago Press, 2004); William R. Newman and Lawrence M. Principe, *Alchemy Tried in the Fire. Starkey, Boyle, and the Fate of Helmontian Chymistry* (Chicago: University of Chicago Press, 2002); Pamela H. Smith, *The Business of Alchemy: Science and Culture in the Holy Roman Empire* (Princeton, NJ: Princeton University Press, 1994); Tara Nummedal, *Alchemy and Authority in the Holy Roman Empire* (Chicago: University of Chicago Press, 2007). Pamela Smith offers a nice overview of these developments in her review essay, Smith, "Science on the Move," 353–56.

10. More than a decade ago Liba Taub remarked that "[t]oday, few historians of science would question the claim that the history of astrology, as part of the scientific enterprise, is a worthwhile subject for study." Nevertheless, few historians have focused on the history of astrology. See {taub wretched@75}

The disparity between scholarly focus on the history of alchemy and the history of astrology can be seen in Smith's review. Whereas she spends three pages reviewing recent scholarship on the history of alchemy, pointing to dozens of monographs and articles, Smith devotes only a paragraph to the history of astrology. This reflects the depth of the two fields rather than any selection bias by Smith. See Ibid. esp. 353–57

11. *Secrets of Nature. Astrology and Alchemy in Early Modern Europe* (Cambridge, MA: MIT Press, 2001).introduction

12. Certainly the most influential of this early material was the work by Aby Warburg and Fritz Saxl. See, for example, Aby Warburg, "Italian Art and International Astrology in the Palazzo Schifanoia, Ferrara," "On Images of Planetary Deities in the Low German Almanac of 1519," and "Pagan-Antique Prophecy in Words and Images in the Age of Luther," all in Aby Warburg, *The Renewal of Pagan Antiquity*, trans. David Britt (Los Angeles: Getty Research Institute for the History of Art and the Humanities, 1999), 732–757; 758–759; 760–775. See also Saxl's magisterial *Verzeichnis astrologischer und mythologischer illustrierter Handschriften des lateinischen Mittelalters*, vols. 1 and 2 (Heidelberg: C. Winter, 1915, 1927) and

to illustrate astrology's central place in shaping how early-modern Europeans understood the relationship between humans and the cosmos and how astrologers applied their science.¹³ Still, considerable work remains, especially in elucidating astrology's role in politics. Studies that have examined the relationship between astrology and politics complement my book: Alfred Schmid, *Augustus und die Macht der Sterne*, Anthony Parel *Machiavellian Cosmos*, Ann Geneva *Astrology and the Seventeenth-Century Mind*, and Brendan Dooley, *Morandi's Last Prophecy and the End of Renaissance Politics*, Monica Azzolini's recent articles as well as her book manuscript "The Duke and the Stars: Medicine, Astrology and Politics in Renaissance Milan, 1450-1499."¹⁴ While some recent scholarship on

Catalogue of Astrological and Mythological Illuminated Manuscripts of the Latin Middle Ages, vols. 3 and 4 (London: Warburg Institute, 1953–66) as well as his lectures, especially "The Revival of Late Antique Astrology" and "The Belief in Stars in the Twelfth Century," in Fritz Saxl, *Lectures* (London: Warburg Institute, 1957). Franz Cumont's and Franz Boll's many studies of ancient astrology were also important early work.

See Grafton's perceptive comments in his recent review: Anthony Grafton, "Starry Messengers: Recent Work in the History of Western Astrology," *Perspectives on Science* 8, no. 1 (2000): 70–83.

13. Some recent book-length studies include Anthony Grafton, *Cardano's Cosmos. The Worlds and Works of a Renaissance Astrologer* (Cambridge, MA: Harvard University Press, 1999); Lauren Kassell, *Medicine & Magic in Elizabethan London. Simon Forman: Astrologer, Alchemist, & Physician* (Oxford: Clarendon Press, 2005); Laura Ackerman Smoller, *History, Prophecy, and the Stars. The Christian Astrology of Pierre d'Ailly, 1350-1420* (Princeton, NJ: Princeton University Press, 1994); Steven Vanden Broecke, *The Limits of Influence: Pico, Louvain, and the Crisis of Renaissance Astrology* (Leiden: Brill, 2003); Günther Oestmann, *Heinrich Rantzau und die Astrologie*, vol. 2, *Disquisitiones Historiae Scientiarum*. Braunschweiger Beiträge zur Wissenschaftsgeschichte (Braunschweig: Braunschweigisches Landesmuseum, 2004); Günther Oestmann, H. Darrel Rutkin, and Kocku von Stuckrad, eds., *Horoscopes and Public Spheres. Essays on the History of Astrology*, vol. 42, Religion and Society (Berlin: Walter de Gruyter, 2005); Carey, *Courting Disaster*; Jean-Patrice Boudet, *Entre science et nigromance : Astrologie, divination et magie dans l'Occident médiéval (XIIe-Xve siècle)* (Paris: Publications de la Sorbonne, 2006); Claudia Brosseder, *Im Bann der Sterne. Caspar Peucer, Philipp Melanchthon und andere Wittenberger Astrologen* (Berlin: Akademie Verlag, 2004); Reiner Reisinger, *Historische Horoskopie. Das iudicium magnum des Johannes Carion für Albrecht Dürers Patenkind* (Wiesbaden: Harrassowitz, 1997).

14. Alfred Schmid, *Augustus und die Macht der Sterne. Antike Astrologie und die Etablierung der Monarchie in Rom* (Cologne: Böhlau, 2005). Ann Geneva, *Astrology and the Seventeenth-Century Mind: William Lilly and the Language of the Stars* (Manchester: Manchester University Press, 1995); Brendan Dooley, *Morandi's Last Prophecy and the End of Renaissance Politics* (Princeton, NJ: Princeton University Press, 2002). Azzolini, "Reading Health in the Stars: Politics and Medical Astrology in Renaissance Milan."; Azzolini, "The Politics of Prognostication."; Azzolini, "The Political Uses of Astrology."

See also, my own articles Darin Hayton, "Martin Bylica at the Court of Matthias Corvinus: Astrology and Politics in Renaissance Hungary," *Centaurus* 49 (2007): 185–198; Hayton, "Expertise *Ex Stellis*";

the history of astrology in the Germanies confronts explicitly the relationship between astrology and politics—often in the context of the planetary conjunctions in 1524—other studies have only implicitly raised questions about the role of astrology in politics, concentrating instead on astrology’s intellectual contexts.¹⁵

Sources

The Astrologers of Maximilian I is based on extensive manuscript and early printed materials. Manuscript sources include letters and canons written explicitly for the emperor, pedagogical texts written for university students, students’ lecture notes, and correspondence between individual astrologers. Printed materials range from technical treatises and university textbooks, at one end of the spectrum, through annual almanacs and ephemerides, to cheap ephemeral pamphlets, wall calendars and broadsheets at the other end. In addition to printed textual sources, my book analyzes paper astrological instruments and related visual material. Considering these sources a coherent body of material helps me reconstruct how the astrologers themselves understood these texts and images and the relationships between them. It also allows me to trace the lines of influence between the astrologers and between the astrologers and the court, and to recover some of the concrete mechanisms that Maximilian used to disseminate his agenda through the various levels of society.

Audience

The Astrologers of Emperor Maximilian I will appeal first to historians of science. My book makes a significant contribution to important themes in the history of science: courtly science and the patronage of scientific experts; prince practitioners and the exercise of princely expertise; science in the early university, scientific instruments and material culture; and science and print culture. My book is the first to take seriously the role of science at Emperor Maximilian I’s court, arguably the most important court in early-sixteenth-century Europe. Maximilian exploited the power of print, relied on expert astrologers,

Darin Hayton, “Astrology as Political Propaganda: Humanist Responses to the Turkish Threat in Early-Sixteenth-Century Vienna,” *Austrian History Yearbook* 38 (2007): 61–91.

15. Oestmann, *Heinrich Rantzau und die Astrologie*; Reisinger, *Historische Horoskopie*. For example, see the work by Helmuth Grössing and Franz Graf-Stuhlhofer on astrology in Vienna: Grössing and Stuhlhofer, “Versuch einer Deutung der Rolle der Astrologie.” In addition to the work that Helmuth Grössing, *Humanistische Naturwissenschaft: Zur Geschichte der Wiener mathematischen Schulen des 15. und 16. Jahrhunderts* (Baden-Baden: Valentin Koerner, 1983). Franz Graf-Stuhlhofer, “Zu den Hofastronomen Kaiser Maximilians. Über das jahrzehntelange Fortwirken historischer Irrtümer,” *Bibliothèque d’Humanisme et Renaissance* 60, no. 2 (1998): 413–9; Franz Graf-Stuhlhofer, *Humanismus zwischen Hof und Universität. Georg Tannstetter (Collimitius) und sein wissenschaftliches Umfeld im Wien des frühen 16. Jahrhunderts* (Vienna: WUV-Universitätsverlag, 1996). See also the work on Brosseder on astrology in the Wittemberg context, Brosseder, *Im Bann der Sterne*; Claudia Brosseder, “The Writing in the Wittemberg Sky: Astrology in Sixteenth-Century Germany,” *Journal of the History of Ideas* 66 (2005): 557–76.

asserted his own astrological expertise, deployed astrological instruments, and revitalized the University of Vienna in his efforts to establish and extend his authority. Historians of science interested in any of these areas will want to read my book.

Beyond historians of science, audiences for my book include cultural historians and historians of early modern Europe. My book is one of the few books in English to offer a history of this fascinating emperor. Maximilian is universally recognized as wildly ambitious and credited with having established the Habsburg dynasty as a leading world power. Despite Maximilian's significance for subsequent European history, there is only one biography of Maximilian in English.¹⁶ *The Astrologers of Emperor Maximilian I* will provide historians of early-modern Europe a sustained and detailed study of how one of the most important political figures used astrology to guide, justify, and legitimate his political program.

Science studies and historians of modern science will have considerable interest in my book. The broader issue underlying my study is the relationship between political authority and scientific expertise. Maximilian's use of astrology along with its various technologies underscores the enduring connections between science and politics, illuminating the political benefits of controlling scientific production and the political agendas inherent in scientific work. Both central themes in science studies.

The Astrologers of Emperor Maximilian I is intended first and foremost for scholars and graduate students. Advanced undergraduate students will also profit from reading my book. More broadly, it will find readers in the educated and interested public audience. Aware of the fact that history of science continues to attract readers while histories and studies of astrology often find ready audiences, I have tried to write a book that will appeal to the non-specialist.

Length and schedule

The manuscript is approximately 120,000 words, divided into seven main chapters, a preface, an introduction and a conclusion. I hope to include a number half-tone illustrations. To date I have completed six chapters and am revising the final chapter and the conclusion. I will then write an introduction. I expect to have completed the entire manuscript by February 2011.

Chapter outlines

Maximilian's use of astrology played itself out against the backdrop of the domestic and international conflicts that characterized Maximilian's reign. The introduction surveys the political context of Maximilian's reign. Within the empire, Maximilian struggled to assert his authority over the recalcitrant German princes who were trying to seize more control over the governance of the empire. His efforts to centralize the instruments of statecraft were continually rebuked by the electors who feared an increasingly strong Habsburg dynasty. The conflicts between the emperor and the princes regularly flared

16. Gerhard Benecke, *Maximilian I, 1459-1519. An Analytical Biography* (London-Boston: Routledge & Kegan Paul, 1982). Recently this work was joined by Larry Silver's masterful study of Maximilian's efforts to portray himself in art. See {silver marketing maximilian}

up at the imperial diets and whenever the emperor intervened in local struggles between princes. These domestic struggles had wide-reaching effects on the international stage. Without the princes' financial and military contributions, Maximilian's hopes of assembling an army to drive the Ottoman forces from Europe's eastern borders remained unrealized. Ambiguous princely support also hampered and ultimately thwarted the emperor's efforts to be crowned by the Pope in Rome and hobbled Maximilian's campaigns against both the French and the Italians. In responding to these political crises Maximilian harnessed the social and intellectual authority of astrology in an effort to accomplish his goals.

Emperor Maximilian I was a master of propaganda and self-aggrandizement. From the earliest years of his reign until his death he consistently shaped and reshaped his image. Chapter one argues that astrology was central to the emperor's efforts to fashion the ideal, "modern" prince. Throughout his autobiographical works, Maximilian underscored the importance of astrology—he used it to narrate his birth and to reveal key aspects of his personality and reign, he emphasized his efforts to master the art of stargazing to improve his diplomatic efforts, and he demonstrated his importance by successfully attracting the skilled astrologers to his court. Maximilian crafted his memorial in both words and images, which were at once idealized monuments shaping how contemporaries viewed him and normative portraits offering a model for his Habsburg successors. For Maximilian, the ideal prince exploited the science of astrology in all facets of politics through personal knowledge and expertise and through privileged access to expert astrologers who were credible sources of knowledge.

The coherent system of predictive and explanatory knowledge proffered by astrologers became a cornerstone in Maximilian's courtly politics. Chapter two examines the work efforts by pro-Habsburg astrologers to align their predictions with the emperor's goals, both to promote the emperor's agenda and to advance their own careers. In the 1490s Sebastian Brant produced a number of broadsheets supporting Maximilian's war against the French and his efforts to establish a centralized military. In 1497 he composed a new chapter for the latest edition of his wildly successful *Ship of Fools*. Drawing on an astrologico-historical analysis Brant argued that the German princes had to submit to the emperor's authority or risk ruining the empire. At the same time, the ambitious young humanist Joseph Grünpeck used his astrological explanation of the French Disease both to argue for Maximilian's social reforms and to secure a position at the court. Once there, Grünpeck continued to produce pro-Habsburg astrological pamphlets timed to coincide with important moments or struggles throughout Maximilian's reign. These examples reveal how astrology supported the imperial propaganda in the face of opposition from the German princes.

Chapter three focuses on the astrological instruments produced for Maximilian and his court. For Maximilian, printed astrological instruments helped guide his political actions and portray him as an accomplished patron and practitioner of astrology. In 1506 Andreas Stiborius developed a particular astrological instrument—the *Clipeus Austriae*—for use in and around Vienna that facilitated the calculation of propitious moments. Maximilian used this instrument in concluding peace negotiations with the Hungarian forces just east of the city in July of that year. During the last decade of Maximilian's reign the imperial historian Johannes Stabius produced ornate printed astrological instruments along

with his work on the imperial genealogies and Maximilian's *Ehrenpforte*. Stabius dedicated these instruments to Maximilian and important members of his court. These printed instruments were designed to be used, enabling the emperor determine opportune moments to undertake different political actions such as triumphal entries. They complemented Maximilian's other refined propaganda. These elaborate prints were sent as gifts to princes and important members of the emerging administrative class of lower nobility, imperial free knights, and upper bourgeoisie. These case studies illuminate how Maximilian used astrology to guide political decisions, to bolster his authority amongst the growing bureaucratic class, and to disseminate his image as a patron and student of astrology to rival courts.

Chapter four illustrates how Maximilian relied on the University of Vienna both as a source from which to draw astrologers into his court and as a body of experts who could be tapped for advice and intellectual support in his political endeavors. The emperor's reputation was enhanced through his direct access to expert astrologers. Moreover, he recognized that their expertise could provide a framework for political decisions. This chapter details Maximilian's efforts to revitalize the university and to fund a series of institutional developments intended to re-establish the University of Vienna as an important center for teaching astrology and astronomy. It also connects the university, as a corporate body of experts, to the imperial court, showing how Maximilian developed patronage practices that extended beyond the narrow confines of the court. This chapter relies on university lectures, printed textbooks, university statutes and the acts to reconstruct both the place of astrology in the university's curriculum and the lines of influence connecting the imperial court to the university.

Chapters five, six, and seven follow Maximilian's efforts to disseminate his political message through more popular texts. Capitalizing on the ubiquity of astrology, Maximilian exploited the power of print to publicize his political agenda to a broad audience from which, astonishingly, no level of society was to be excluded. *Flugblätter*, pamphlets, broadsheets, and advertisements were posted on notice boards, read out in town-hall meetings, sold in the markets, becoming indispensable vehicles for communicating Habsburg and imperial interests. That Maximilian hoped these ephemeral texts would permeate all ranks in society is suggested in an early advertisement, which was sent to "electors, spiritual and worldly, prelates, counts, freemen, gentlemen, knights, servants, captains, magistrates, guardians, administrators, officials, village mayors, lord mayors, judges, councillors, citizens and parishioners, and otherwise all others of our and the empire's subjects and followers of whatever dignity, rank and occupation, who come forward or are shown this our royal letter or copy thereof to see or read, our every grace and good."¹⁷ Maximilian transformed cheap ephemeral print into an important instrument of governance and broadcast his political message through it.

17. Quoted in Stephan Füßel, *Gutenberg and the Impact of Printing*, trans. Douglas Martin (Aldershot: Ashgate, 2005), 155.

The emperor enlisted the astrologers at his court and the university in his propaganda campaign to promulgate a pro-Habsburg agenda to audiences beyond the narrow confines of elite society. Maximilian's coterie of astrologers used a variety of astrological genres to spread the emperor's message. Chapter five focuses on the career of Andreas Perlach, who for more than a decade produced astrological almanacs and ephemerides that supported the Habsburg political agenda. By the late 1510s Perlach was a master at the University of Vienna and an advisor to the Habsburg court in Vienna. He later became *Leibarzt* to Archduke Ferdinand and a master in the medical faculty at the university. His use of almanacs and ephemerides as a vehicle for Habsburg politics reveals how the Habsburg court relied on academic experts, especially astrological experts, to strengthen its political agenda and how Maximilian and Archduke Ferdinand rewarded those experts.

In his efforts to enlist the broadest possible support for his imperial reforms and political agenda, Maximilian capitalized on the ubiquity and social authority of astrology at all levels of society. Chapter six argues that astrological wall calendars and the *judicia* and *practica* that complemented them became important instruments in Habsburg politics. These texts, which drew on a visual vocabulary and used images along with words to convey their content, were wildly popular in the late fifteenth and early sixteenth centuries. When Maximilian revitalized the University of Vienna, he charged the faculty with producing astrological calendars and *practica*. For more than two decades Georg Tannstetter, who was *Leibartz* and advisor to Maximilian and Archduke Ferdinand as well as a professor at the university in both the arts and medical faculties, produced these texts. Analyzing his wall calendars and *judicia* within the context of Tannstetter's career at both the court and the university indicates how Tannstetter was able to publicize the Habsburg political and social programs to a popular audience.

Prognostications composed in response to particular celestial phenomena were another popular astrological genre. Unusual events such as the appearance of a comet or significant conjunctions of planets attracted wide-spread public attention and offered astrologers further opportunities to interpret the natural world. Chapter seven details how astrologers at the Habsburg court seized on these prodigious events as evidence of Maximilian's preordained right to rule and justification for Habsburg authority within the empire. Further, the astrologers used them to argue that German princes had to support Habsburg political and military reforms in order to confront and vanquish the Ottoman army threatening to invade Europe. Three case studies stand at the center of this chapter: Johannes Stabius's *Pronosticon* on the planetary conjunction in 1503/1504, Tannstetter's *Libellus consolatorius* on the series of planetary conjunctions in 1524, and Perlach's *Des Cometen und ander Erscheinung in den Lüfften*, his tract on the comet in 1531.

The body of *The Astrologers of Emperor Maximilian I* illuminates Emperor Maximilian I's continued reliance on astrology as a systematic body of predictive knowledge about the natural world and the political nature of that knowledge. The conclusion looks beyond Maximilian's reign to his legacy for the Habsburg dynasty and the broad relationship between science and politics in early-modern Europe. The importance Maximilian attached to scientific knowledge became a key component of Habsburg politics,

which found its most mature expression a century later at the court of Emperor Rudolf II.¹⁸ Maximilian's efforts to establish patronage networks that linked individual experts as well as institutions to the court emerged as a central characteristic of early-modern politics, especially in the Germanies where princes increasingly viewed local universities as corporate bodies of academic experts to be consulted in political affairs. Similarly, Maximilian's representation of himself as both a skilled practitioner and generous patron of the sciences prefigured the German prince-practitioners later in the sixteenth century.

Finally, examining Maximilian's use of astrology in light of his efforts to enlist all levels of society in his political program reveals an expanding role for scientific knowledge in politics and in shaping public opinion. Astrology, which was a traditional and academically respected body of knowledge and was embedded in popular and elite culture, gave Maximilian a tool that purported to use unassailable nature as evidence, guide, and justification for political actions. Within a century princes across Europe were using scientific knowledge and the expert purveyors of that knowledge to shape public opinion and advance their own political agendas. *The Astrologers of Emperor Maximilian I* is the first book-length study of Emperor Maximilian I's efforts to develop patronage networks of scientific experts, to exploit the reflected credibility of those experts, and to use astrology's predictive and explanatory techniques in his political and dynastic programs.

18. Rudolf and his court have received considerable scholarly attention. The fundamental study remains R. J. W. Evans, *Rudolf II and His World. A Study in Intellectual History, 1576-1612* (Oxford: Oxford University Press, 1973). For more recent work, see Thomas Da Costa Kaufmann, "Astronomy, Technology, Humanism, and Art at the Entry of Rudolf II into Vienna, 1577: The Role of Paulus Fabritius," in *The Mastery of Nature. Aspects of Art, Science, and Humanism in the Renaissance*, ed. Thomas Da Costa Kaufmann (Princeton, NJ: Princeton University Press, 1993), 136–150; Thomas Da Costa Kaufmann, "From Mastery of the World to Mastery of Nature: The *Kunstammer*, Politics, and Science," in *The Mastery of Nature. Aspects of Art, Science, and Humanism in the Renaissance*, ed. Thomas Da Costa Kaufmann (Princeton, NJ: Princeton University Press, 1993), 174–194; Eliška Fučíková, "The Collection of Rudolf II at Prague: Cabinet of Curiosity or Scientific Museum?," in *The Origins of Museums. The Cabinet of Curiosities in Sixteenth- and Seventeenth-Century Europe*, ed. Oliver Impey and Arthur MacGregor (Oxford: Clarendon Press, 1985), 47–53; Eliška Fučíková, ed., *Rudolf II and Prague. The Court and the City* (London: Thames and Hudson, 1997).