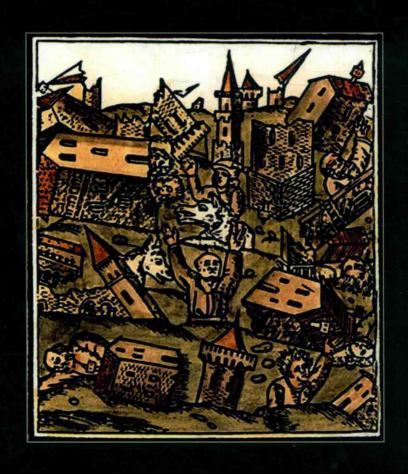
# Natural Disasters in the Ottoman Empire

PLAGUE, FAMINE, AND OTHER MISFORTUNES



YARON AYALON

# Natural Disasters in the Ottoman Empire

Plague, Famine, and Other Misfortunes

YARON AYALON

Ball State University



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### Natural Disasters in the Ottoman Empire

This book explores the history of natural disasters in the Ottoman Empire and the responses to them on the state, communal, and individual levels. Yaron Ayalon argues that religious boundaries between Muslims and non-Muslims were far less significant in Ottoman society than commonly believed. Furthermore, the emphasis on Islamic principles and the presence of Islamic symbols in the public domain were measures the state took to enhance its reputation and political capital – occasional discrimination against non-Muslims was only a by-product of these measures. This study sheds new light on flight and behavioral patterns in response to impending disasters by combining historical evidence with studies in social psychology and sociology. Employing an approach that mixes environmental and social history with the psychology of disasters, this work asserts that the handling of such disasters was crucial to both the rise and the fall of the Ottoman Empire.

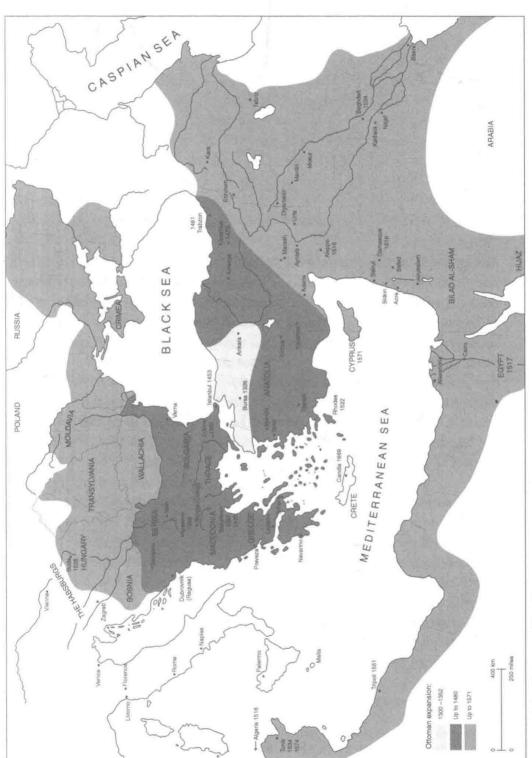
Yaron Ayalon is an Assistant Professor of History at Ball State University. He previously taught at Emory University and the University of Oklahoma. He has published articles on Middle Eastern, Ottoman, and Sephardic history, and is an editor for the *Encyclopedia of Jews in the Islamic World*.

# To Keren

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#### Introduction

In the early afternoon hours of Monday; 20 May 2013, a mighty tornado made landfall in Moore, Oklahoma, a southern suburb of Oklahoma City. Traveling northeast at an estimated 210 miles per hour, the tornado passed just a few miles away from the house my wife and I owned in Norman, ripping through sections of Moore we used to drive by, damaging stores we used to shop at, toppling two schools, and killing more than ninety people, twenty of them children. Entire neighborhoods, one police officer explained, were "just wiped clean." One couple, hiding in a shelter, returned to their destroyed home and found the body of a three-year-old girl whom the storm had carried with it lying in the rubble. "My neighborhood is gone," the shocked woman said, "demolished. The street is gone. The next block over, it's in pieces." I

The 2013 Oklahoma tornado was a grim reminder of humans' vulnerability to the potent forces of nature. As such, it was another link in a chain of massive disasters occurring in the last decade, such as the 2004 Asian tsunami, Hurricanes Katrina and Rita of 2005, the 2008 Sichuan earthquake, and the one in Tohoku in 2011. These have rekindled interest in natural disasters and their implications among scholars, scientists, and the public. Along with other recent calamities, they spurred a host of academic and other publications that discussed society's preparedness for natural disasters, its responses to them, and procedures for recovery.<sup>2</sup>

<sup>&</sup>lt;sup>1</sup> Nick Oxford and Michael Schwirtz, "Milewide tornado strikes Oklahoma; dozens are killed," New York Times 21 May 2013, A1.

<sup>&</sup>lt;sup>2</sup> A partial list includes: Ronald Daniels et al., eds., On Risk and Disaster: Lessons from Hurricane Katrina (Philadelphia: University of Pennsylvania Press, 2006); Danielle Hidalgo and Kristen Barber, eds., Narrating the Storm: Sociological Stories of Hurricane

Social scientists examined individual and collective decision-making under life-threatening conditions. They looked into factors that affect people's resort to protective action, such as racial and ethnic affiliations, financial resources, past experience, and one's personal sense of imminent danger. These events also inspired a probe into the issue of recovery from disasters as a social process. One finding was that while certain communities rebound fast, others take years to recover, or disintegrate altogether. Another was that governments had a major say in the ability of individuals and groups to resume normalcy.<sup>3</sup>

Social scientists have been studying disasters for several decades now, inquiring how and why they occur and seeking ways to reduce their impact. There is another important value in studying disasters: They offer the observer a "natural laboratory" for exploring "aspects of social structures and processes that are hidden in everyday affairs." Evidence gathered during and after disasters, it has been suggested, provides "rich data for addressing basic questions about social organization – its origins,

Katrina (Newcastle: Cambridge Scholars, 2007); Shireen Hyrapiet, Responding to a Tsunami: A Case Study from India (Saarbrücken, Germany: VDM Verlag, 2007); Hillary Potter, ed., Racing the Storm: Racial Implications and Lessons Learned from Hurricane Katrina (Lanham, MD: Lexington Books, 2007); Harry Richardson et al., eds., Natural Disaster Analysis after Hurricane Katrina: Risk Assessment, Economic Impacts and Social Implications (Cheltenham, UK: Edward Elgar, 2008); Philip Steinberg and Rob Shields, eds., What Is a City? Rethinking the Urban after Hurricane Katrina (Athens: University of Georgia Press, 2008); Stanley Weeber, Post-Rita Reflections: A Sociological Journey (Lanham, MD: Hamilton Books, 2009); Rachel Dowty and Barbara Allen, Dynamics of Disaster: Lessons on Risk, Response, and Recovery (Washington, DC: Earthscan, 2010), 159-72; Seiko Sugimoto et al., "Sociocultural frame, religious networks, miracles: Experiences from tsunami disaster management in South India," in Pradyumna Karan et al., eds., The Indian Ocean Tsunami: The Global Response to a Natural Disaster (Lexington: University Press of Kentucky, 2011), 213-35; William Summers, The Great Manchurian Plague of 1910-1911: The Geopolitics of an Epidemic Disease (New Haven, CT: Yale University Press, 2012); Xun Zhou, The Great Famine in China, 1958-1962: A Documentary History (New Haven, CT: Yale University Press, 2012), 26-106; Joshua Miller, Psychosocial Capacity Building in Response to Disasters (New York: Columbia University Press, 2012), 1-31; Elya Tzaneva et al., Disasters and Cultural Stereotypes (Newcastle upon Tyne, UK: Cambridge Scholars, 2012); Katrin Pfeifer, Forces of Nature and Cultural Responses (New York: Springer, 2012); Jennifer Duyne Barenstein and Esther Leemann, Post-Disaster Reconstruction and Change: Communities' Perspectives (Boca Raton, FL: CRC Press, 2013).

<sup>3</sup> See, for example, National Research Council, Facing Hazards and Disasters: Understanding Human Dimensions (Washington, DC: National Academies Press, 2006), 124–68; Pamela Behan, "The first major U.S. urban evacuation: Houston and the social construction of risk," in Hidalgo and Barber, Narrating the Storm, 169–81.

adaptive capacities, and survival." In assessing human conduct under life-threatening conditions and the role of collective institutions in shaping people's responses to them, social scientists often rely on data from past calamities. Historical experience is a cornerstone of disaster studies, and scientific insights are frequently based on testimonies from the near and far past, in one's own as well as other societies. Engaging in this kind of exploration is, thus, equally justified for current and historical cases.

This book explores responses to natural disasters in the Ottoman Empire (see Map 1) from its outset to its fall, with a special focus on one particular segment of this history, the seventeenth and eighteenth centuries. Natural disasters played an important role in the rise and fall of the empire, as well as in shaping the daily routine of individuals and communities living under Ottoman rule. Reactions to disasters on the stateempire, communal, and individual levels, I argue, indicate that religious boundaries - as distinct from religious identity - were less significant in Ottoman society than we used to think. The empire's Islamic identity was important in stirring resistance to external and internal threats, and in rationalizing territorial expansions; but faith in itself was not "the primary organizing principle of ... Ottoman society."6 Historians have long subscribed to an ambivalent view; on one hand, stressing the import of confessional boundaries in the empire, by pointing to representation and registration of dhimmis (non-Muslims) in the shar'i court, to separation of Muslims from non-Muslims in bathhouses, and even to writing, with

<sup>&</sup>lt;sup>4</sup> Robert Stallings, "Weberian political sociology and sociological disaster studies," Sociological Forum 17 (2002), 2:283.

John Hannigan and Rodney Kueneman, "Anticipating flood emergencies: A case study of a Canadian disaster subculture," and Taketoshi Takuma, "Human behavior in the event of earthquakes," in E. L. Quarantelli, ed., Disasters: Theory and Research (London: Sage, 1978), 129–46, 159–72; Beverley Raphael, When Disaster Strikes: How Individuals and Communities Cope with Catastrophe (New York: Basic Books, 1986), 55–77; Thomas Drabek, "Disaster in aisle 13 revisited," Joseph Scanlon, "EMS in Halifax after the 6 December 1917 explosion: Testing Quarantelli's theories with historical data," and Dennis Wenger and Thomas James, "The convergence of volunteers in a consensus crisis: The case of the 1985 Mexico City earthquake," in Russell Dynes and Kathleen Tierney, eds., Disasters, Collective Behavior, and Social Organization (Newark, DE: University of Delaware Press, 1994), 26–44, 99–114, 229–43; Francesco Carloni et al., Catastrofi naturali ed emergenze: Dall'intervento alla prevenzione (Casale Monferrato, Italy: Piemme, 1996), 68–84, 107–28; Anthony Mawson, Mass Panic and Social Attachment: The Dynamics of Human Behavior (Aldershot, UK: Ashgate, 2007), 233–52.

<sup>&</sup>lt;sup>6</sup> M. Şükrü Hanioğlu, A Brief History of the Late Ottoman Empire (Princeton, NJ: Princeton University Press, 2008), 25. For the empire's religious identity, see Kaya Şahin, Empire and Power in the Reign of Süleyman: Narrating the Sixteenth-Century Ottoman World (New York: Cambridge University Press, 2013), 27–8, 41–3, 61–2, 91–2.

authors and their readers usually professing the same faith; and, on the other, showing how Muslims and non-Muslims enjoyed similar opportunities in certain areas. These included forming and maintaining business partnerships, being members of guilds, pursuing a wide range of professions, choosing where to live, and consuming wine publicly, seemingly in violation of Islamic law.<sup>7</sup> The findings presented here on responses to natural disasters help us see this intricate scene more sharply. On the whole, they seem to underscore the porousness of the boundaries between Muslims and non-Muslims.

In this study I also maintain that the Ottoman Empire accentuated religious divisions out of political considerations as often as religious principles. The emphasis on Islamic values, the pronounced presence of Islamic symbols in the public domain, and periodic discrimination against non-Muslims were measures the state took to enhance its stature and gain political capital. Normally, Ottoman subjects did not ask for such divisions nor see a need for them. This popular view was hard to detect in the sea of historical records, which were mostly written by state agents, such as shar'i court registers and other Ottoman archival documents. State officials, who authored the greater share of materials we now have for the empire, did assume differences between Muslims and non-Muslims in decisions and nomenclature, and used Islam as a tool for enhancing public loyalty to the state. But (with few exceptions) only when there was a clear need for it did they stress the dominance of Islam over other traditions. Thus, for example, in rebuilding a city after an earthquake, the state would invariably give the highest priority to restoring the symbols of Islam, such as mosque complexes; but in dispensing help to victims another interest would prevail; demonstrating the sultan's paramount patronage by caring for all of his subjects equally and offering Muslims and non-Muslims identical treatment.

Ottoman officials were not the only ones to ascribe importance to the religious, and hence also social and economic, boundaries between Muslims and non-Muslims. Priests and rabbis sought to maintain them too. A recent study has shown that in the early centuries of Islam, Christian and Jewish communal leaders were more keen on their communities'

Abraham Marcus, The Middle East on the Eve of Modernity: Aleppo in the Eighteenth Century (New York: Columbia University Press, 1989), 41-2; Bruce Masters, Christians and Jews in the Ottoman Arab World: The Roots of Sectarianism (New York: Cambridge University Press, 2001), 26-37; Bruce Masters, The Arabs of the Ottoman Empire 1516-1918 (New York: Cambridge University Press, 2013), 104; Donald Quataert, The Ottoman Empire, 1700-1922 (Cambridge: Cambridge University Press, 2005), 180-4.

segregation than the Muslim authorities because their followers' reliance on the community for most needs increased their dependence on them. In the Ottoman period, so the reactions to disasters reveal, minority leaders still adhered to a segregated-autonomous approach, while for the majority of Ottoman Christian and Jewish subjects – who were mostly concerned with making a living – such a division made little sense. For most members of the non-Muslim communities, integrating into Ottoman society patently outweighed the tendency for seclusion. That was so despite the near-monopoly that the faith-based community had in certain important matters, such issues as the collection and dispensation of charity, and education.

In exploring these questions, I relied on a wide range of sources. In the Ottoman Prime Minister's Archives in Istanbul (Başbakanlık Osmanlı Arşivleri), I consulted documents and registries covering financial, health, and internal matters. In the National Archives in London and the Chambre de Commerce archive in Marseille I examined consular and commercial correspondence from the Levant. Other, mostly published sources included Arab and Turkish chronicles and treatises, European travel accounts, and studies in various branches of the social sciences – most of which have been published. Parts of this study focus on greater *bilad al-sham*, or present-day Syria, Lebanon, and Palestine, as a case study, but the probe addresses itself to other areas of the empire as well.

#### OTTOMAN HISTORY AND HISTORIOGRAPHY

A detailed account of the history of the Ottoman Empire is beyond the scope of this study and quite unnecessary, given the wealth of existing scholarship.<sup>9</sup> But a quick survey of the events that formed the historic framework for the discussion here seems in order. The Ottoman state started as a principality in western Anatolia in the late thirteenth century. Under its first two rulers, Osman I (r. ca. 1299–1326) and Orhan (r. 1326–62), it conquered lands from neighboring principalities and the Byzantines.

<sup>&</sup>lt;sup>8</sup> Uriel Simonsohn, A Common Justice: The Legal Allegiances of Christians and Jews under Early Islam (Philadelphia: University of Pennsylvania Press, 2011).

<sup>&</sup>lt;sup>9</sup> For histories of the Ottoman Empire, see Halil Inalcik and Donald Quataert, eds., An Economic and Social History of the Ottoman Empire, 1300–1914 (Cambridge: Cambridge University Press, 1994); Quataert, The Ottoman Empire; Caroline Finkel, Osman's Dream: The Story of the Ottoman Empire, 1300–1923 (New York: Basic Books, 2006); Colin Imber, The Ottoman Empire, 1300–1650: The Structure of Power (Basingstoke, UK: Palgrave Macmillan, 2009).

In 1326, the Ottomans took Bursa and made it their first capital; in 1365, having crossed into Thrace, they captured Adrianopole (Edirne). The Ottomans continued to invade lands in southeastern Europe and Anatolia throughout the fourteenth century. In 1453 the Byzantine state finally fell, when Ottoman forces under Sultan Mehmet II (r. 1451–81) conquered Constantinople and made it their third and final capital, Istanbul.

During the second half of the fifteenth century, the empire continued to expand into Europe and Anatolia. In 1514, under Selim I (r. 1512–20), Ottoman forces made advances into Safavid (Persian) territories and temporarily captured Tabriz. In 1516, Selim's army turned against the Mamluk sultanate, which governed Syria and Egypt from its capital in Cairo. By January 1517, the Ottomans had put an end to Mamluk rule. Ottoman territorial expansion into Europe, Asia, and North Africa continued under Selim's son, Süleyman I ("the Magnificent," r. 1520–66), including the conquests of Rhodes (1522), Tunis and Baghdad (1534), and Tripoli and the Libyan coast (1551). In 1529, Süleyman's forces captured Buda and went on to lay an unsuccessful siege to Vienna.

, Süleyman's reign had once been viewed as the apogee of Ottoman power, the devastation of its fleet in the Battle of Lepanto (1571) as the beginning of a long decline that lasted until the empire's collapse in World War I. By now, however, most historians have abandoned this "decline" theory and adopted a different reading of Ottoman history. Accordingly, from the early seventeenth century onward, the empire entered a "period of reorientation and consolidation" rather than decline – a time of introversion in lieu of imperial expansion. This was reflected, among other ways, in architectural style's becoming more local than imperial, and establishing of pious foundations in the seventeenth century to address social and economic uncertainties of the period, when great conquests came to be regarded as a matter of the past. One historian has suggested that the seventeenth century launched the "Second Ottoman Empire," characterized by weak sultans and governed de facto by bureaucrats,

The decline thesis is best outlined in Bernard Lewis, The Emergence of Modern Turkey (Oxford: Oxford University Press, 1961), 21-73. For a discussion of the different approaches to Ottoman history since Lewis, see Dana Sajdi, "Decline, its discontents, and Ottoman cultural history: By way of introduction," in Dana Sajdi, ed., Ottoman Tulips, Ottoman Coffee: Leisure and Lifestyle in the Eighteenth Century (London: I. B. Tauris, 2007), 1-40.

Heghnar Watenpaugh, The Image of an Ottoman City: Imperial Architecture and Urban Experience in Aleppo in the 16th and 17th Centuries (Leiden: Brill, 2004), 124, 174 (quotation from 124).

the Janissaries, and the 'ulama.<sup>12</sup> In the Arab lands, the seventeenth and eighteenth centuries saw the rising power of local urban forces that periodically challenged the central government.<sup>13</sup>

The era of Ottoman "reorientation" or "Second Empire" ended with the reforms of the nineteenth century. These started with the unsuccessful attempts of Sultan Selim III (r. 1789–1807) to reform the army. His cousin, Mahmud II (r. 1808–39), continued them more vigorously, introducing innovations in education and the military and destroying the Janissaries in 1826. A period of reorganization, or Tanzimat, followed from 1839 to 1876, during which the empire underwent extensive changes, in administration and the army, communications, education and literacy, treatment of minorities, and more. Additional reforms took place under Abdülhamid II (r. 1876–1909) including, among others, the adoption by the empire of methods for disaster prevention, containment, and relief common in Europe and the United States since midcentury.

Most historians of the Ottoman Empire have primarily focused on political and economic factors when studying its rise, centuries of rule, and fall. In the last two decades, social historians have drawn our attention to other facets of Ottoman realities, exploring issues such as the family and women, food and drink, architecture, literacy, and poverty and charity, to name but a few. Some studies have touched on natural disasters, notably plague epidemics and subsistence crises, to shed light on broader social and economic questions. Few have closely examined natural disasters as such, or used them to penetrate a society that, compared to other civilizations such as Europe and China, left us less written evidence.

The classic work addressing disasters in a Middle Eastern context is, still, Michael Dols's *The Black Death in the Middle East*, published in

<sup>&</sup>lt;sup>12</sup> Baki Tezcan, The Second Ottoman Empire: Political and Social Transformation in the Early Modern World (Cambridge: Cambridge University Press, 2010).

Jane Hathaway, The Arab Lands under Ottoman Rule, 1516-1800 (Harlow, UK: Pearson, 2008), 59-82, 87-94.

See, e.g., Judith E. Tucker, In the House of the Law: Gender and Islamic Law in Ottoman Syria and Palestine (Berkeley: University of California Press, 1998); Suraiya Faroqhi, Subjects of the Sultan: Culture and Daily Life in the Ottoman Empire (London: I.B. Tauris, 2000); Watenpaugh, Image; Frédéric Hitzel, ed. Livres at lecture dans le monde Ottoman: Revue des mondes musulmans et de la Méditerranée 87–8 (1999); Amy Singer, Constructing Ottoman Beneficence: An Imperial Soup Kitchen in Jerusalem (Albany: SUNY, 2002).

<sup>&</sup>lt;sup>15</sup> Marcus, Eve of Modernity; Heath Lowry, Ottoman Bursa in Travel Accounts (Bloomington: Indiana University Press, 2003); Ebru Boyar and Kate Fleet, A Social History of Ottoman Istanbul (Cambridge: Cambridge University Press, 2010).

1977.<sup>16</sup> It provides a solid framework for studying plagues and famines, but it does not cover the Ottoman period. The same is true of Stuart Borsch's comparative study of Black Death effects in Egypt and England, <sup>17</sup> and of Justin Stearns's analysis of plague treatises in medieval Islam. <sup>18</sup> Nancy Gallagher's work on Tunisia, published in 1984, was the first to examine epidemics in an Ottoman context. <sup>19</sup> It was followed by Daniel Panzac's ambitious study of plague in the Ottoman Empire, covering a century and a half of the state's battle with epidemics and other calamities, and looking into demographic, economic, and social implications. <sup>20</sup> More recently, two works by Alan Mikhail and Sam White have incorporated evidence on natural disasters into a wider discussion of the forces of nature and the role they played in Ottoman history. <sup>21</sup> In what follows, I challenge some of the precepts of the existing literature on disasters and Ottoman social history and suggest correctives to our understanding of Ottoman realities.

The reader familiar with recent trends in Ottoman historiography would perhaps wonder about the little sense of change over time this book conveys. Historians have long noted dramatic developments that took place in the empire between the sixteenth and the nineteenth centuries. Examples include adoption of different architectural styles; the transition from the "first" to the "second" empire; the rise of local families of notables to provincial leadership positions, replacing officials sent from Istanbul; the increasing involvement of the state in the internal affairs of guilds; the emergence of popular writing not grounded in the strict rules of the Muslim tradition, and of a new class of writers who were not trained as 'alims (religious scholars).<sup>22</sup> Accordingly, one might

<sup>16</sup> Princeton: Princeton University Press.

<sup>&</sup>lt;sup>17</sup> Stuart Borsch, The Black Death in Egypt and England: A Comparative Study (Austin: University of Texas Press, 2005).

Justin Stearns, Infectious Ideas: Contagion in Premodern Islamic and Christian Thought in the Western Mediterranean (Baltimore: Johns Hopkins University Press, 2011).

<sup>&</sup>lt;sup>19</sup> Nancy Gallagher, Medicine and Power in Tunisia, 1780–1900 (Cambridge: Cambridge University Press, 1984).

Daniel Panzac, La peste dans l'empire Ottoman: 1700-1850 (Leuven, Belgium: Peeters, 1985).

<sup>&</sup>lt;sup>21</sup> The two are Alan Mikhail, Nature and Empire in Ottoman Egypt: An Environmental History (Cambridge: Cambridge University Press, 2011); Sam White, The Climate of Rebellion in the Early Modern Ottoman Empire (New York: Cambridge University Press, 2011).

Watenpaugh, Image; Tezcan, Second Empire; Masters, The Arabs, 82ff; Dana Sajdi, The Barber of Damascus: Nouveau Literacy in the Eighteenth-Century Ottoman Levant (Stanford, CA: Stanford University Press, 2013), 77, 111-17.