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Whose Science? A Preliminary Study on *Kevâkib-i Seb'a* and the Scholar's Rhetoric

Kimin İlmi? *Kevâkib-i Seb'a* ve Alim Retoriği Üzerine Bir Deneme

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ABSTRACT

The primary aim of this article is to date the treatise known as *Kevâkib-i Seb'a*, which describes the Ottoman sciences for a French audience, to 1739 by examining the letters of Charles de Peyssonnel, secretary to the French ambassador in Istanbul, Marquis de Villeneuve. It also draws attention to a remark by the anonymous author of the treatise on the science of geometry and geography. In order to interpret it, the present study seeks to understand how the author of the treatise presents "ilm", i.e. science/knowledge, and argues that the remark constitutes a contradictory statement to his previous descriptions and reasoning. It comes to the conclusion that this remark can be regarded as a strategy by the author to defend the imagined prestige of the Ottoman Muslim identity.

Keywords: Kevâkib-i Seb'a, 18th century, Ottomans' perception of the Europeans, Ottoman/Muslim self-perception, science/knowledge

ÖZ

Bu makalenin öncelikli amacı *Kevâkib-i Seb'a* olarak bilinen ve Osmanlı'da öğretilen ilimleri tanıtmak amacıyla Fransa'ya yollanmak için yazılan eseri, dönemin Fransız elçisi Villeneuve'ün sekreteri Charles de Peyssonnel'in mektuplarını inceleyerek 1739 yılına tarihlendirmektir. Makalenin diğer amacı ise yazar tarafından geometri ve coğrafya üzerine yapılan ilginç yoruma dikkat çekmektir. Makale, bu yorumu anlamak için önce eser içindeki "ilm" anlayışını aydınlatmaya çalışır ve yazarın genel anlatısı ile çelişkiye düştüğü görülen bu yorumun, varsayılan Osmanlı Müslüman kimliğinin prestijini korumak için yazar tarafından yapılan bir hamle olduğunu savunur..

Anahtar sözcükler: Kevâkib-i Seb'a, 18. yüzyıl, Osmanlıların Avrupa algısı, Osmanlı/Müslüman algısı, ilm/bilgi

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Introduction

In a letter dated 24 January 1739, Charles de Peyssonnel, the secretary of the French ambassador in Istanbul, Marquis de Villeneuve, informed Marquis de Caumont in Avignon,[1] who was interested in knowing more about Turkish arts and sciences, about his recent acquaintance with an Ottoman *effendi* during the peace conferences in Istanbul following the Austro-Turkish War and leading to the Treaty of Belgrade: "[...] il est comme le gouverneur des enfants du Beys-effendy ou chancelier de l'[...] et c'est a luy que j'ai demandai un etat des differentes sciences auxquelles les turcs s'appliquent".[2] In the letters he sent to Marquis de Caumont, he referred to this text as a "dissertation", "dissertation sur la litterature turque" or a "livre sur les sciences des turcs",[3] and the author as "codgea". Less than a month later, in mid-February of the same year, Peyssonnel wrote that he had been informed about the completed text.[4] So, the time required for its completion was rather short, especially in comparison to the time it took Peyssonnel to send it to France. The aforementioned chancellor of the grand vizier was *reîsülküttâb* Mustafa Efendi. According to Peyssonnel, he turned this work into an affair of the state by having the *hoca* add a dedicatory passage to the introduction for the French ambassador. However, he did not like it sufficiently to approve it, so the book was not sent for translation immediately.[5] In July 1739, Peyssonnel spoke of having previously informed the marquis on the catastrophe that befell the dissertation but did not mention what it was about.[6] A few months later, after the peace treaty had been signed, Peyssonnel was able to take advantage of the hour of good humor and have the chancellor release the book. Thus , in October, Peyssonnel had the book in his pocket and informed the marquis that they would soon start on its translation.[7] In late January 1740, he informed the marquis that Monsieur Galland had taken on the responsibility for it.[8] However, almost ten months later, this promise was still not realized as the book had not yet been translated.[9] This book was

1 Bibliothèque nationale de France/Département des Manuscrits/ NAF 6834: "Lettres autographes du marquis de Villeneuve, ambassadeur de France à Constantinople, et de son secrétaire, M. de Peyssonel, adressées au marquis de Caumont à Avignon (1729−1742)." https://archivesetmanuscrits.bnf.fr/ark:/12148/cc41360f [Henceforth *Lettres*].

2 "He is like the governor of the children of the Beyefendi or chancellor of [...] and it is to him that I asked for a state [description] of the different [various] sciences which the Turks follow." *Lettres*, 90v. (24 January 1739).

3 "dissertation on Turkish literature"; "book on the sciences of the Turks".

4 *Lettres,* 97v. (17 February 1739)

5 *Lettres,* 103v. (10 May 1739)

6 *Lettres*, 117r. (9 July 1739) I could not detect any information concerning this in the earlier letters that are kept in the compilation.

7 *Lettres*, 120r. (9 October 1739), 122r. (9 October 1739)

8 *Lettres*, 130v. (26 January 1740)

9 *Lettres*, 132v. (3 October 1740)

obviously *Kevâkib-i Seb'a*[10] and Marquis de Caumont sent it to the Bibliothèque du Roi in November 1742.[11]

The author of the book introduces himself as the teacher of Ebûbekir Efendi, *reîsülküttâb*'s son-in-law,[12] who is referred to as a *müderris* in the secondary literature. [13] He willingly assumed the task claiming that he had been pondering such an undertaking anyway, especially so that he could prove that the scholars of Islam were not ignorant as Christian "nations" claim.[14] In addition to Mustafa Efendi's intervention mentioned above, this treatise can thus be regarded as reflecting an "officially sanctioned" sort of perspective about knowledge and science.[15] But it is not known who this *müderris* was, and the only extant manuscript does not contain a colophon.[16] The author himself outlines the content of his treatise, which follows Ottoman literary convention. It consists of a *mukaddime,* where he explains his aims and discusses what to understand from the concept of *ilm*.[17] Then two *bâb*s - literally doors, but corresponding to chapters - follow. Under the first, each science is introduced,[18] while the second describes how these are learnt in the Ottoman empire.[19] As

10 The manuscript is catalogued at the Bibliothèque nationale de France, Département des Manuscrits, as Supplément turc 196. It is entitled "Précis encyclopédique scientifique, en turc, rédigé sur les ordres du raïs el-kouttab Moustafa Efendi, sans titre, ni nom d'auteur." It is available online at https://gallica.bnf.fr .
Nasuhi Karaarslan, who published the transcription thought that the treatise may have been composed in 1741. Nasuhi Ünal Karaarslan, "Ön Söz" to *XVIII. Asrın Ortalarına kadar Türkiye'de İlim ve İlmiyeye Dâir bir Eser: Kevâkib-i Seb'a Risâlesi*, ed. and trans., idem (Ankara: Türk Tarih Kurumu, 2015), xvi. Likewise, Cevat İzgi wrote that it dated from 1741. Cevat İzgi, *Osmanlı Medreselerinde İlim* (Istanbul: İz, 1997), 1: 69. It is explicitly stated in the French letters attached to the manuscript that it could not be translated properly although a significant amount of time had passed after its completion. These letters mention a certain Monsieur Barouth who translated and briefly annotated the subtitles within the treatise. See the attached note to the manuscript on "vue 15-folio 2v" and the attached letter by Peyssonnel from July 1741 on "vue 5" of the scanned-file at https://gallica.bnf.fr.

11 See the attached note to the manuscript on "vue 15-folio 2v" of the scanned-file at https://gallica.bnf.fr.

12 Karaarslan, "Ön Söz," xv−xvi. For the books that the author must have read, see, ibid., xviii−xx. Nasuhi Ünal Karaarslan edited and transcribed the manuscript: *XVIII. Asrın Ortalarına kadar Türkiye'de İlim ve İlmiyeye Dâir bir Eser: Kevâkib-i Seb'a Risâlesi* (Ankara: Türk Tarih Kurumu, 2015). For the textual references here Karaarslan's edition is used. [Henceforth *Kevâkib-i Seb'a*]

13 Şükran Fazlıoğlu, "Ta'lîm ile İrşâd Arasında: Erzurumlu İbrahim Hakkı'nın Medrese Ders Müfredatı," *Dîvân İlmî Araştırmalar* 18, 1 (2005): 116. Even if he was not in office as a *müderris* himself, he must have possessed a *medrese* education and indeed it sounds like he taught at a *medrese*. It is based on the secondary literature, and the detailed information he provided concerning the curriculum and the stages of learning that the anonymous author is considered a *müderris* (rather than highlighting his professional title, understood here as a teaching scholar). His treatise is usually consulted to reconstruct the Ottoman *medrese* education. See and cf., *op. cit*.; İzgi, *Osmanlı Medreselerinde İlim*, 1: 69–77.

14 *Kevâkib-i Seb'a*, 2−4 [2b–3b].

15 See and cf. Gottfried Hagen, "The Order of Knowledge, the Knowledge of Order: Intellectual Life," in *The Cambridge History of Turkey Vol. 2: The Ottoman Empire as a World Power 1453–1603*, eds. Suraiya N. Faroqhi and Kate Fleet (Cambridge, et al.: Cambridge University Press, 2013), 408.

16 Karaarslan, "Ön Söz," xv−xvi.

17 It is a typical epistemological, complicated and technical discussion on *ilm*'s various definitions, classifications, objects, aims, and benefits. *Kevâkib-i Seb'a*, 5−12 [4a–9b].

18 *Kevâkib-i Seb'a*, 12−68 [9b–48b].

19 *Kevâkib-i Seb'a*, 66−107 [48b–79a].

far as the first *bâb* is concerned, Karaarslan has identified Taşköprüzâde's *Miftâhu's-sa'âde ve misbâhu's-siyâde* as the source on which the author greatly relied.[20] In the *hâtime-i risâle*, or epilogue, the author's actual "missionary" purpose is revealed.[21] So, *Kevâkib-i Seb'a* is essentially a treatise consisting of an encyclopaedic hierarchical classification of sciences, and the Sufi sciences constitute its zenith. It also contains a description of what was taught at Ottoman *medrese*s, which the author presents as the only educational institutions, for he does not talk about the other options. The treatise also describes how these subjects were taught, and finally, it argues for a cosmic contextualization of *ilm* and religion to prove the truth of Muhammad.

There are several possible methodological and interrogative starting points to contextualize *Kevâkib-i Seb'a*. These include epistemological, ontological, intellectual, and theological starting points which are all in relation to the contemporary scientific/scholarly treatises and developments encountered in scholarly interactions with Europeans.[22] One could perhaps even add a political category here considering the mark confessionalization[23] had upon the early modern era. Since the author knew that his intended audience were strangers to what he had learnt, namely, Islamic law and theology, my approach to and view of the treatise is as an "immediate pronouncement". Since it wants to present and convince, I view this text as a "missionary" monologue which might also partially be viewed as a dialogue as suggested by certain apologetic propositions therein. Such propositions could easily find themselves a place within certain sets of discourses, perhaps as topoi, especially within scholastic traditions. The rhetoric surrounding the Ottoman Muslim identity vis-à-vis the European Christian identity counts among these discourses. The peculiar remark on geometry and geography by the author, to which my whole discussion leads, reflects this "tension" between identities.[24] Moreover, it immediately recalls a passage in Ebû Sehl Numân Efendi's famous

20 Karaarslan, "Ön Söz," xviii.

21 *Kevâkib-i Seb'a*, 108−137 [79a–101b].

22 For the seventeenth and eighteenth centuries, see e.g., Natalia Bachour, *Oswaldus Crollius und Daniel Sennert im frühneuzeitlichen Istanbul: Studien zur Rezeption des Paracelsismus im Werk des osmanischen Arztes Ṣāliḥ b. Naṣrullāh Ibn Sallūm al-Ḥalabī* (Herbolzheim: Centaurus Verlag & Media, 2012); Sonja Brentjes, "Patchwork – The Norm of Mapmaking Practices for Western Asia in Catholic and Protestant Europe As Well As in Istanbul Between 1550 and 1750?," in *Science between Europe and Asia: Historical Studies on the Transmission, Adoption and Adaptation of Knowledge*, eds. Feza Günergun and Dhruv Raina (Heidelberg, et al.: Springer, 2011), 77−101; Harun Küçük, *Science without Leisure: Practical Naturalism in Istanbul, 1660-1732* (Pittsburgh: University of Pittsburgh Press, 2020); Miri Shefer-Mossensohn, *Science among the Ottomans: The Cultural Creation and Exchange of Knowledge* (Austin: University of Texas Press, 2015); Akif Ercihan Yerlioğlu, "'May Those Who Understand What I Wrote Remember This Humble One': Paratextual Elements in Eighteenth-Century Ottoman Medical Manuscripts," *YILLIK: Annual of Istanbul Studies* 2 (2020): 35−51.

23 On the issue, see e.g., Tijana Krstić and Derin Terzioğlu, eds., *Historicizing Sunni Islam in the Ottoman Empire c. 1450−c. 1750* (Leiden, Boston: Brill, 2020).

24 There are some other contradictory statements within the treatise too, but they do not involve explicit mentions of religious identities.

account of the course of events during the drawing of borders between the Ottomans and the Austrians in 1741 following the Treaty of Belgrade which had been concluded in 1739.[25] I bring Ebû Sehl Numân Efendi's account into my discussion for a comparison only to indicate that the anonymous author's strategy reflects a tendency and points to a shared repertoire of arguments deployed vis-à-vis Europeans. As is well known, there are numerous studies which focus on Ottoman self-perception in various historical and thematical settings, and there are numerous Ottoman accounts that can be consulted in this regard.[26] This article does not compare *Kevâkib-i Seb'a* with them or offer a necessarily new interpretation. It is only a preliminary study on *Kevâkib-i Seb'a* conducted to interpret this one aforementioned remark. Indeed, it took the Ottomans more than a century to incorporate the Cartesian coordinate system and the other Cartesian and ensuing developments via translations into the repertoires of their teaching and learning system.[27] The sciences "hendese/misâha", i.e. geometry/geodesy and, in an expanded and/or derived sense, mathematics and architecture (and perhaps geography), continued to be fields where a significant number of Ottoman expressions of inferiority were still articulated in the nineteenth century.[28] This article cannot answer where and when this feeling or realization of inferiority began nor if and why we can truly call it an "inferiority" and, if so, in what respects, to what extent and with what

25 There is a transcribed edition of the treatise which was probably completed in 1753 and consists of an introduction, three accounts arranged chronologically (the first one concerns Ebû Sehl Numân Efendi's days in the Crimea at the court of Mengli Giray in 1737, the second one deals with the mentioned drawing of borders, the third one concerns his journey to Hamadan with the deputation sent to Nâdir Shah in 1747), and a conclusion: Ebû Sehl Nu'mân Efendi, *Tedbîrât-ı Pesendîde*, ed. and transcr. Ali İbrahim Savaş (Ankara: Türk Tarih Kurumu, 1999) [Henceforth, Nu'mân Efendi, *Tedbîrât-ı Pesendîde*]. There exists a German translation of the second account: *Molla und Diplomat: Der Bericht des Ebû Sehil Nu'mân Efendi über die österreichisch-osmanische Grenzziehung nach dem Belgrader Frieden 1740/1741*, ed. and trans. Erich Prokosch (Graz, Vienna, Cologne: Styria, 1972).
In addition to the introduction by Prokosch, Henning Sievert's studies can be consulted for addressing, among others, the image of the "other" in *Tedbîrât-ı Pesendîde*. E.g., Henning Sievert, "Ebū Sehl Nu'mān Efendis Treffliche Maßnahmen gegen die Arglist der Anderen und die Torheit der Vorgesetzten in Iran und an der Donau," in *Deutsch-türkische Begegnungen. Alman-Türk Tesadüfleri: Festschrift für Kemal Beydilli - Kemal Beydilliye Armağan*, eds. H. Reindl-Kiel and S. Kenan (Berlin: EB-Verlag, 2013), 366–401.

26 See e.g., Fatma Müge Göçek, *East Meets West: France and the Ottoman Empire in the Eighteenth Century* (New York, Oxford: Oxford University Press, 1987); İbrahim Şirin, *Osmanlı İmgeleminde Avrupa* (Ankara: Lotus Yayınevi, 2006); Suraiya Faroqhi, „Materielle Kultur und −zuweilen− gesellschaftliche Werte: Das Europabild in den Berichten osmanischer Gesandter des XVIII. Jahrhunderts," in *Strukturelle Zwänge - persönliche Freiheiten: Osmanen, Türken, Muslime: Reflexionen zu gesellschaftlichen Umbrüchen (Gedenkband zu Ehren Petra Kapperts),* ed. Hendrik Frenz (Berlin, et al.: de Gruyter, 2009), 81−104.

27 See and cf. Semiha Betül Takıcak, "Osmanlılar'da Analitik Geometri: Hendese-i Halliyye ve Hendese-i Tahlîliyye" (Ph.D. diss., Ankara Üniversitesi, 2017); Mahdi Mohamed Abdeljaouad, "Teaching European Mathematics in the Ottoman Empire during the Eighteenth and Nineteenth Centuries: Between Admiration and Rejection," *ZDM Mathematics Education* 44 (2012): 483–498; Mustafa Kaçar, "Tersâne Hendesehânesi'nden Bahriye Mektebi'ne Mühendishâne-i Bahrî-i Hümâyûn," *Osmanlı Bilimi Araştırmaları* 9, 1−2 (2007−2008): 51−77; Atilla Polat and Halime Mücella Demirhan Çavuşoğlu, „Mehmed Said Efendi'nin Misâha Risâlesi," *Osmanlı Bilim Araştırmaları/ Studies in Ottoman Science* 21, 2 (2020): 249–270.

28 See and cf. e.g., Göksun Akyürek, *Bilgiyi Yeniden İnşa Etmek: Tanzimat Döneminde Mimarlık, Bilgi ve İktidar* (İstanbul: Tarih Vakfı Yurt Yayınları, 2011).

consequences. Neither can this article discuss how other contemporary scholarly/scientific discussions can shed more light on the issue, whose agency and what sorts of encounters played a role in its realization, how it was dealt with, and what it meant, for instance, within the context of Ottoman educational reforms. Broader studies should re-consider this treatise in respect to such and other questions in relation to other primary and secondary sources.

Some Notes on *Reîsülküttâb* Mustafa Efendi

El-Hâcc Mustafa Efendi (1689–1749) was a diplomat and the author of a *Viyana Sefâretnâmesi*, an embassy account on Vienna. Two well-known high-ranking bureaucrats from the eighteenth century were his sons-in-law: Ahmed Resmî Efendi, and Râsim Ebûbekir Efendi, later a pasha. Mustafa Efendi was in office as *reîsülküttâb*[29] between December 1736 and February 1741, namely until when he was exiled to Kastamonu,[30] and again between April 1744 and October 1747.[31] He was known to have fostered good relations with the French ambassador to Istanbul, Louis-Sauveur de Villeneuve. He also had relations with the Phanariots.[32]

Mustafa Efendi was raised in Istanbul by his uncle who was the *mektupçu* of the grand vizier Kastamonulu Elmâs Mehmed Paşa. Via another *sadrazam mektupçusu* from Kastamonu, he could join the courtly entourage and administration. Mustafa Efendi was known for his interest in learning, was highly proficient in Arabic and Persian, and was made a member of the Translation Commission by Damat İbrahim Paşa in 1725. In 1730, he was promoted to the office of *mukâtaacılık-ı evvel* and thereby joined the *Dîvân-ı Hümâyun hâcegân*. To celebrate and report on the ascension to the throne of Mahmud I, he was sent to Vienna to the Court of Karl IV in November/ December 1730. His mission was considered successful, and indeed, he not only got promoted to higher offices later, but also became one of the most important names in the empire's diplomatic and foreign relations especially with

29 The chancellor of the grand vizier. Occupying this highest bureaucratic position meant that one would be very influential in matters of administration by deputizing for the grand-vizier and standing in charge for him in matters of distribution of offices and the income related to these, and from the eighteenth century onwards in matters of diplomatic relations, negotiations and creating intelligence. Henning Sievert, *Zwischen arabischer Provinz und Hoher Pforte: Beziehungen, Bildung und Politik des osmanischen Büroktaten Rāġıb Meḥmed Paşa (st. 1763)* (Würzburg: Ergon, 2008), 99–101.

30 Sievert, *Zwischen arabischer Provinz*, 134.

31 In the meantime, to be precise in 1742, he went on a pilgrimage to Mecca and on the road enjoyed the company of and/or made contact with many Arabic-speaking scholars, erudite men, who were learned especially in religious and Sufi sciences, as well as local dignitaries. Sievert has revealed these relations by examining Mustafa Efendi's letter-collection. Henning Sievert, "'Die Sehnsucht des ausgedörrten Landes nach einem Regenguß': Der Istanbuler Beamte el-Ḥācc Muṣṭafā Efendi (st. 1749) und seine Kontakte in die arabischen Provinzen des Reiches," in *Studia Eurasiatica: Kieler Festschrift für Hermann Kulke zum 65. Geburtstag*, eds. J. Kusber and S. Conermann (Schenefeld: EB-Verlag, 2003), 441–469. Also see, idem, *Zwischen arabischer Provinz*, 134−135.

32 Sievert, *Zwischen arabischer Provinz*, 134, 143.

the Persian delegation sent to Istanbul by Nâdir Shah,[33] the Austrians, the Russians, and the French. He was sent to Belgrade to conclude the Peace Treaty with the Austrians. In fact, the wars with the Persians and the Austrians, followed by peace negotiations in 1739, marked particularly significant periods in the lives and careers of Mustafa Efendi and his successor Râgıb Efendi, later pasha and *reîsülküttâb,* between 1741 and 1744.[34]

A study on Mustafa Efendi of the sort Sievert conducted to reveal the "network" of Râgıb Paşa is evidently necessary when seeking to identify the author of the *Kevâkib-i Seb'a*. One could consult Sievert's monograph to decide where one could start, for Mustafa Efendi belonged to Râgıb Paşa's network and shared with him an intellectual background, at least to some extent.[35] Sievert highlights Husayn Mîmîzâde al-Basrî, a Naqshbandi shaykh and an *âlim* from southern Iraq, as the private tutor of Mustafa Efendi's family and as belonging to his household from 1739 until his death in late 1748. However, his son-in-law Ebûbekir Efendi (d. 1762/3) was apparently not a student of this shaykh.[36] The probability that he could have influenced or had correspondence with the author of the *Kevâkib-i Seb'a* treatise should not yet be ruled out . After all, Peyssonnel mentioned a certain "usseïn effendy" in one of his letters, but if his handwriting has been correctly understood, he mentioned him as another learned man to whom he posed the same question on the sciences of the Turks.[37] However , this is too small a detail to make a definite statement for or against his acquaintance with the anonymous author.

Some Notes on the Author's Intellectual Orientation

When one reads the whole text one can recognize an Avicennian cosmological outlook that is blended with a Sufi ideal streaming beneath it, although the author himself does not

33 For an overview of the conference and negotiations that took place in the summer of 1736 between the Ottomans and the Persian delegation, and Nâdir Shah's religious policies, see, e. g., Sievert, *Zwischen arabischer Provinz*, 102–122. The Ottoman delegation was composed of *reîsülküttâb* Kastamonulu İsmâ'il Efendi, *beğlikci* Mustafa Efendi, and Râgıb Efendi who did not occupy an office at the time. They were accompanied by some high ranking *ulemâ*. The latter two names were known for their proficiency in *adab*, i.e. they were able to communicate the state policies and represent the state via a language that reasoned from mainly the Arabic and Persian poetry and literary traditions to form an effective rhetoric, which was especially important for diplomatic relations with the eastern neighbors of the empire. Ibid., 109.

34 Cf. Sievert, *Zwischen arabischer Provinz*, 76–170.

35 Sievert, *Zwischen arabischer Provinz*, passim, esp. 137, 155

36 Sievert, *Zwischen arabischer Provinz*, 138–140, 520.

37 "je ne puis avoir l'ouvrage du codgea du Beys-effendy. j'ay taché d'y suppleer, par un petit discours que m'a donné sur le meme sujet, usseïn-effendy, homme d'ed [...] et de merite, qui est toujours avec nos jeunes de langue qui a voulû etre de ce voyage, pour connaitre toujours le genie des françois, il veut meme apprendre la langue, pour voyager quelque jour en france en plus d'utilité." *Lettres*, 103v. (12 June 1739) "I cannot get the work of the hoca of *Bey effendi*. I tried to supplement it by a little speech given to me on the same subject by Hüseyin *effendi*, a man of ed [...] and of merit, who is always with our young boys of language, and who wanted to be on this trip to discover the genius of the French people. He even wants to learn the language, so that he can travel to France some day and benefit from his travel more."

mention Avicenna's name or allude to him. There are some hints that indicate his embracing certain Avicennian ideas, at least his using some of them to "rationalize" his arguments concerning the appearance of the religion of Islam. The classification in *Kevâkib-i Seb'a* can be compared with Muhammed Akkirmânî's (d. 1760) *Ta'rîfâtü'l-fünûn ve menâkıbü'l-musannifîn*. In her short article on the latter work, Toksöz underlines that the author must have favored Avicennian views. Drawing on her examination, it is seen that Akkirmânî's classification corresponded to the hierarchy which was opted for in *Kevâkib-i Seb'a*, but it excluded the Sufi sciences as a level in itself unlike the latter.[38] Both of these texts are in accordance with Taşköprüzâde's classification and his positive stance on philosophy, which Reichmuth regards as representative of the learned elite.[39] The blend of Sufi monism with the cosmology of Avicenna, who continued to be a significant, influential and recurring name in Ottoman intellectual pursuits, and Illuminationism,[40] was not a rarity. On the contrary, it appears to be a somewhat common inclination.[41]

In fact, Bekiryazıcı argues that Ottoman *ulemâ* regarded Avicenna and Suhrawardî as following the same line of thought.[42] Uluç argues that by the sixteenth century, especially concerning the Ottoman-Turkish classifications of sciences, the boundaries between the philosophical, *tasavvufî* and *kelâmî* perspectives were already blurred.[43] And last but not least, Ghazâlîan method of categorization,[44] i.e. classifying "sciences" and knowledge on the basis of their relation to one's salvation, also remained influential, albeit to varying degrees, and was subject to the more-often-than-not eclectic approach of the individual authors. One can find expressions in the treatise that could be related to Avicennian, Ghazâlîan, Illuminationist,

38 Hatice Toksöz, "Muhammed Akkirmânî'nin *Ta'rîfâtü'l-fünûn ve menâkıbü'l-musannifîn* Adlı Eserinde Felsefî İlimler Algısı," *Osmanlı Araştırmaları/The Journal of Ottoman Studies* 42 (2013): 177–205.

39 Stefan Reichmuth, "Bildungskanon und Bildungsreform aus der Sicht eines islamischen Gelehrten der anatolischen Provinz: Muḥammad al-Sājaqlī (Saçaqli-zāde, gest. um 1145/1733 und sein Tartīb al-'Ulūm," in *Words, Texts and Concepts Cruising the Mediterranean Sea: Studies on the Sources, Contents and Influences of Islamic Civilization and Arabic Philosophy and Science Dedicated to Gerhard Endress on his Sixty-Fifth Birthday,* eds. R. Arnzen and J. Thielmann (Leuven, Paris, Dudley: Peeters Publishers & Department of Oriental Studies, 2004), 516–519.

40 It should be noted here that the Illuminationist school of thought subordinated knowledge gained via rational means to knowledge gained via spiritual means. See e.g., Gottfried Hagen and Tilman Seidensticker, "Reinhard Schulzes Hypothese einer islamischen Aufklärung. Kritik einer historiographischen Kritik," *Zeitschrift der Deutschen Morgenländischen Gesellschaft* 148, 1 (1998): 101.

41 See and cf., Ayşe Başaran, "Erzurumlu İbrahim Hakkı's Ma'rifetnâme (1757): A Case Study in the Ottoman Reception of Modern Science" (M.A. thesis, Boğaziçi University, 2005), 99–100, 108; Khaled El-Rouayheb, *Islamic Intellectual History in the Seventeenth Century: Scholarly Currents in the Ottoman Empire and the Maghreb* (New York: Cambridge University Press, 2015), 189; Tahir Uluç, "Kınalızâde Ali Efendi'nin Nefis Görüşü," *Necmettin Erbakan Üniversitesi İlahiyat Fakültesi Dergisi* 35 (2013): 7–28.

42 Eyüp Bekiryazıcı, "İbn Sînâ Düşüncesi İşrâkîliğe Zemin Hazırlamış Mıdır?," *Diyanet İlmî Dergi* 50, 1 (2014): 136.

43 Uluç, "Kınalızâde," 12.

44 Didar Ayşe Akbulut, "The Classification of the Sciences in Nev'ī Efendi's Netāyicü'l Fünun: An Attempt at Contextualization" (M.A. thesis, Boğaziçi University, 2014), 7.

and Sufi schools of thought. It requires a keen and trained eye for the terminologies and epistemologies specific to each of them to judge to what extent this treatise reveals which outlook.

One of the hints pointing towards Avicennian influence, which could have taken effect either directly or via an intermediary or intermediaries, is the way the author chose to name his treatise. The stars, i.e. the planets, are referred to in the treatise as entities with conscious spirits. The idea that the celestial bodies possessed souls was ancient and intertwined with philosophical questions.[45] The hierarchical arrangement of the sciences in conjunction with the celestial reference calls to mind the cosmology of Avicenna.[46]

> According to Avicenna's *Metaphysics*, everything that existed in the world was an emanation from God as a necessary consequence of his self-knowledge. God himself was the necessary existent, and his self-knowledge as the eternal and necessary being gave rise to the first intellect, which, in contemplation of itself and of God, conceived the possibility of self-knowledge, which gave rise to the outermost sphere of the heavens. The dialectical process of the intellects trickled down to the earth through the planets, themselves intellects, and the final link in the chains is the active intellect, also known as the Giver of Forms, which was the cause of all change in the terrestrial world.[47]

The existence of the lower heavenly intellect depended on the immediately higher one,[48] so there existed a hierarchy among the spheres cum planets. As will be shown, for the author of *Kevâkib-i Seb'a*, the Moon in the cosmological context is key to recognizing the truth of the prophet of Islam. It also acts in Avicenna's cosmology as a threshold:

> Out of the less pure the next heaven was formed, and the process continued until in the heaven of the Moon most of the purity was exhausted, and gravity and opaqueness (*kathāfah*) and impurity (*kudūrah*) became dominant so that the body could no longer accept a heavenly form but became the world of generation and corruption. […] The progressive 'coagulation' of the Universal Element terminates with extreme differentiation,

45 See, e.g., Harry A. Wolfson, "The Problem of the Souls of the Spheres from the Byzantine Commentaries on Aristotle through the Arabs and St. Thomas to Kepler," *Dumbarton Oaks Papers* 16 (1962): 65–93.
One can speak for the survival of other theories voiced by some early Muslims which saw the origins of science in the stars. See, f. ex., Roshdi Rashed, "Greek into Arabic: Transmission and Translation," in *Arabic Theology, Arabic Philosophy: From Many to the One: Essays in Celebration of Richard M. Frank*, eds. Richard M. Frank, James E. Montgomery, Roshdi Rashed (Leuven, Paris, Dudley: Peeters, 2006), 165.

46 And the scheme of emanation was first formulated by al-Fârâbî in the Islamic(ate) world. Eva Orthmann, "Himmelssphären und Elemente: Zur Übernahme vorislamischer Vorstellungen vom Aufbau der Welt in die islamische Tradition" in *Entre Orient et Occident: La Philosophie et la Science greco-romaines dans le Monde arabe. Vandoeuvres - Genève, 22 - 27 août 2010; Huit Exposés suivis de Discussions*, ed. Peter Adamson et al. (Geneva: Foundation Hardt, 2011), 267.

47 Bekir Harun Küçük, "Early Enlightenment in Istanbul" (Ph.D. diss. University of California, San Diago, 2012), 84–85 (Footnote 20).

48 Seyyed Hossein Nasr, *An Introduction to Islamic Cosmological Doctrines: Conceptions of Nature and Methods Used for its Study by the Ikhwān al-Ṣafā', Al-Bīrūnī, and Ibn Sīnā*, 2nd ed. (Bath: Thames and Hudson, 1978), 204.

> and the process of emanation, or effusion (*faiḍ*), reaches its terminal point. Henceforth the movement is no longer a drawing away from the principle but a return to it, not a *faiḍ* but an *'ishq*, or love, by which all things are attracted to the source of all Being. […] The end of the whole cosmic process is Pure Being itself where all things began. Creation therefore comes from God and returns to Him.[49]

Although the author does not explicitly make a similar remark or reference, and the Moon in Avicenna is not a millennial ruler, he may have thought of this connection, while choosing the star-metaphor to build his treatise upon. I am inclined to think so due to the name of the treatise, the author's narrative of the cosmic ages and the rulership of the stars/planets, and the Sufi zenith of his classification. Sufi knowledge, to which the concept of *ishq* is central, is presented as the highest form of knowledge in the treatise. And according to this schema, the sublunar realm is the place where the ascension back to the origin begins thanks to *ishq*. So, relating the last prophet to the (end-)millennium of the Moon, thus creating the prerequisite for "a journey-back-home", serves the author well, since he himself is inclined towards Sufism. This may be the reason why he repeats the relationship between a planet and a prophet in the passage where he explains why it is "'aklen sabit", or rationally fixed, that Muhammad is a true prophet, and the last one for that matter.[50] It is, however, not possible to assert that the author thoroughly adhered to the Avicennian theories, because the controversial theory of emanation and intellection[51] is not woven into the narrative of the creation. The planets are referred to as "teachers", but they are not explicitly portrayed in relation to God and the Active Intellect.[52]

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49 Ibid., 204–207. See also the comparable Illuminationist and Sufi stances, Bekiryazıcı, "İbn Sînâ Düşüncesi," 131–132; Başaran, "Erzurumlu İbrahim Hakkı," 106–107; Manfred Götz, "Der 'vollkommene Scheich' (Mürşid-i Kāmil) nach dem İrşādnāme von Ḥaqīqī," *Archivum Ottomanicum* 20 (2002): 219–220. The Sufi stance could involve the teaching of the Zodiac of the Orient as corresponding to the divine name *Jemal* (friendliness) and the Zodiac of the Occident as corresponding to the divine name *Jelal* (majesty), while the Orient and the Occident here do not denote the horizontal, geographical orientation but a vertical, cosmic one. It was the "people of the Zodiac of the Orient" under whose *hüküm* they would be able to get inspirations from the angelic realms or led by the angels in a blessed way to attain eternal felicity by adhering to their "perfect shaykh" and by "annihilating" their human nature. See and cf., ibid., 221–223. The anonymous author of *Kevâkib-i Seb'a* does not offer such a narrative.

50 *Kevâkib-i Seb'a*, 124 [91b]. The narrative in *Kevâkib-i Seb'a* does not thoroughly correspond to Sufi narratives concerning the creation and Muhammad, in which he is regarded as *the* reason for the creation and in which the truth of him must be acknowledged and realized by the individual if they want to attain salvation. See, e.g., Götz, "Der 'vollkommene Scheich'," *op. cit*. However, its teleological structure leading to "proving" why Muhammad is a prophet, and the rich star-metaphor (shaykhs would be likened to the stars and stars were perceived as guides) can be regarded as data which would speak for the author's Sufi inclination or Sufi familiarity.

51 On the issue, see, e.g., Reichmuth, "Bildungskanon," 511. Reichmuth's article makes it clear that Saçaklızâde would have not composed his treatise -and as a matter of fact he did not- the way the anonymous author did. Saçaklızâde employed a Ghazâlîan terminology and outlook. Cf. *op. cit.*

52 In ancient and Muslim Peripatetic philosophers' discourses, the process of intellection and cognition had an important and emphasized place. They spoke of an "active intellect" that was universal and was not corporeal, the existence of which was the reason why one could speak of consistent and correct understandings of necessaries and intelligibles. Al-Fârâbî and Avicenna were of the opinion that intellection could happen when

The second hint can be found in the way the author refers to God. Except for the prayer in the beginning where a few other divine names are mentioned, the author frequently refers to God with the divine name *Bârî* throughout his treatise - to underline that God created everything and everyone in a perfect and harmonious way. So, the author relates *ilm* directly to the divine creation. But the other frequent name used for God in the treatise is *Vâjib al-Vujûd*, meaning the divine First Cause as the first Necessary Being. This conceptual attribute was formulated under the influence of the demonstrative method and coined by Avicenna, hence it has a philosophical and rational connotation regarding the perception of God.[53] So, by choosing to use this designation when referring to God, the author places *ulûm* in a context of creation that could be contemplated upon with rational and intellectual faculties.[54]

I referred to the sources that the anonymous author most likely directly or indirectly utilized whenever I could identify them. These are the esoteric-*hurûfî* scholar and Sufi Abd al-Rahman al Bistâmî's (d. 1454) *Kitâb-ı Fevâ' ihu'l-Miskiyye fi'l-Fevatihi'l-Mekkiyye* and Nevî Efendi's *Netâyic el-Fünûn* which is related to the former.[55] The anonymous author's classification of sciences is based on Taşköprüzâde's seven-partite classification in *Miftâhu's-sa'âde ve misbâhu's-siyâde*. Taşköprüzâde's categorical terminology itself is based on Avicenna's formulations.[56] Avicennian influence via Taşköprüzâde is indeed discernible in the studied period.

Knowledge and Science in *Kevâkib-i Seb'a*

Immediately after the prayer where he praises God and the Prophet, the author speaks

the human intellective or rational soul was prepared to receive from "the active intellect". Averroes argued that it was the human brains -where not the intellect but psychological faculties were found- that functioned basically as "receivers" but in this case on demand, and what one individual could understand depended on the quality of their psychological faculties, i.e. memory, imagination, and cognition. See and cf., Peter Adamson, "Aristotle in the Arabic Commentary Tradition," in *The Oxford Handbook of Aristotle*, ed. Christopher Shields (Oxford, et al.: Oxford University Press, 2012), 654–655. One can find useful and clear explanations in the following article, too. Dag Nikolaus Hasse, "Das Lehrstück von den vier Intellekten in der Scholastik: Von den arabischen Quellen bis zu Albertus Magnus," *Recherches de Théologie et Philosophie médiévales* 66, 1 (1999): 28–40. The fact that Avicenna argued for "the active intellect" as the highest intellect not possessed by the humans, i.e. it was an external intellect, allowed freedom for giving voice to "intuition" -for which the recipient was ready to receive from "the active intellect" through perfecting their intellection- in relation to the theory of intellects. Cf. ibid. It should also be noted that Avicenna spoke of being enlightened by the Active Intellect. See, Bekiryazıcı, "İbn Sînâ Düşüncesi," 131.

53 This perception of God could be shared by the Sufis, too. So, it cannot be assumed that its appearance must lead to an Avicennian orientation, but its frequent deployment is noteworthy. See e.g., Götz, "Der 'vollkommene Scheich'," 216.

54 On *vujûd* and *vâjib al-vujûd* see, Peter Adamson, "From the Necessary Existent to God," in *Interpreting Avicenna*, ed. idem (Cambridge: Cambridge University Press, 2013), 170–189; idem, "Existence in Philosophy and Theology," *Encyclopaedia of Islam*, Three, eds. by Kate Fleet, et al. Brill online, 2017; O. N. H. Leaman and H. Landolt, "Wudjūd," in *Encylopaedia of Islam*, Second Edition, eds. P. Bearman, et al. Brill online, 2012; Nasr, *An Introduction*, 201–202.

55 Akbulut, "Classification of the Sciences," 6–7.

56 Hagen, "The Order of Knowledge," 409–410.

to the readers, again following a conventional path, with the request that they should know upon which "axiom" he builds:

> […] ma'lûm ola ki çün insân-ı kerâmet-nişân nefs-i beşeriyyesini tekmîl ve rezâil-i nefsâniyyesin kemâlât-ı rûhâniyyeye tebdîle muhtâc olub lâkin bu kemâl-i selâmet-meâli tahsîl, hakâik-i eşyâya ıttılâ' ve Kitâb-ı Bârî ve Sünnet-i Resûl'e 'ilm-i tâmm-ile ittibâ'a tavakkuf itdiğinden akrab-ı vesîle-i matlûb-i hakîkî olan 'ilm-i hâli ihrâz ve hilâf-ı'illet-i gâiyye ile tevaggülden ihtirâz içün ibtidâ' cemî'-i 'ulûmu bi-envâ'ihâ ta'allüm ve vesâilini dahî bi-esnâfihâ tefehhüm vâcib oldu.[57]

Thus , the author begins with identifying human beings. In the beginning, they are human souls prone to doing outrageous things or to possessing outrageous traits. They must grow mature and transform for the better. For this reason, they have to learn the truth of things and adhere to the book of the creator and the sunnah of the Prophet. The ultimate goal is described as the attainment of religious knowledge which can be achieved through an accumulation of numerous other types of knowledge. And in order to find the easiest way leading to it, they need to have a presentation of *ulûm* before them. The author then specifies the Qur'an as the book wherein all *ulûm* are gathered and contained. He also specifies Arabic in this context as the language which is beautiful and clear and in which *ulûm* are given expressions and conceptions corresponding precisely to God's will. Since the ultimate goal is to understand these expressions and conceptions, the scholars of Islam, too, wrote books on *ulûm* in this language.[58] Although Arabic itself is not identified as the divine language, its knowledge is identified as a prerequisite for attaining divine knowledge.[59] So, the Christian "nations" [60] do not know about, and cannot acknowledge, the sciences and knowledge concerning the Divine and religion, or *ulûm-i ledünniyye-i ilâhiyye*, because they do not understand Arabic. And, as has just been explained, such knowledge is *essential* for the author of the treatise. Indeed, it is essential for the worldview of which he is a representative, as far as could be studied here and as far as the rhetorical level is concerned.[61] Besides, the Christian "nations" think that Muslims are ignorant.[62] So, since he wants to prove this notion wrong, and given that he

57 *Kevâkib-i Seb'a*, 1 [1b].

58 Ibid., 2 [2a].

59 Ibid., 2 [2b]. This constitutes an aspect of the imagined "authority" of an Ottoman Muslim scholar: He has access to religious knowledge because he knows the language. So, language forms part of his identity. Language proficiency was perhaps more of significance when the language in question was not the mother-tongue, when the existence of diglossia was omnipresent, and the written high language's association with religion was strong. On language and diglossia, see e.g., Einar Wigen, "Ottoman Concepts of Empire," *Contributions to the History of Concepts* 8, 1 (2013): 61.

60 More specifically those Christians living in or near Christian states, so, primarily the European states must be meant here. "Ammâ bilâd-ı milel-i uhrâ, husûsan nevâhiy-i düvel-i Nasârâ mahrûsa-i bilâd-ı islâmiyyeden ba'îd ve o cihetden Lisân-ı 'Arab'ı ta'allüm ile behre-yâb ve mantûk-i kütüb-i 'arabiyyeden hisse-yâb olmayub [...]" *Kevâkib-i Seb'a*, 2 [2b].

61 Ibid.

62 Ibid., 3 [2b].

considers France a benevolent friend of the Ottoman state, he believes that the French should be lent a hand in this regard and be introduced to these sciences.[63] Thus, *ilm*, for him carries the meaning of some sort of a "missionary" zeal.[64]

In accordance with Islamic tradition, after his brief presentation the author speaks about *ilm*, its different definitions, subjects, objectives, purposes, justifications and motivations according to some, or *bazıları*, who are then specified as the *hükemâ*, *mütekellimîn*, and the *Sûfiyye*.[65] For him, *ilm* means understanding that which corresponds to the object known or the knowable.[66] The author himself entitles his treatise *Kevâkib-i Seb'a*[67] and divides *ulûm* into seven groups. Each group matches one of the seven stars, i.e. planets, based on differentiations between, and combinations among, religious, rational, philosophical, theoretical and practical aspects, epistemologies and methodologies. Overall, three hundred and sixty sciences are enumerated. On the one hand, these numbers are chosen consciously to present the Muslim conception of knowledge and science as true to the spherical and cosmic order.[68] So, an *ilm* is imagined as first being connected to other fellow *ilm*s by being subject to the rulership of a star, then, as connected to the whole, because the seven stars/planets

63 Ibid., 3 [2b–3a].

64 When Lamiî arrives at speaking about the mausoleum of Osman in Bursa, he says: "Bu deyr-i zulmet-i âbâdı idüp nûr/ Manastır merkadından oldı ma'mûr" Lâmiî (Lâmi'î) Çelebi, *Bursa Şehrengizi*, eds. Mustafa İsen and Hamit Bilen Burmaoğlu (Bursa: Bursa Kültür A.Ş., 2011), 70. This is one of the few places where a juxtaposition of the Christian and the Muslim is found in the poem. It cannot be a coincidence that the "darkness" is named as the attribute of the monastery where Christian teaching and learning was taking place. This is indeed interesting, because it seems to be a convention to talk about Christianity in regard to religious and theological learning in this way, and it does deserve an in-depth analysis in another study. Here, at the moment, I can refer to the following example only: In his translation of Ahmed Taşköprüzâde's *Şekâ'iku'n-Nu'mâniyye fî 'Ulemâ'i'd-Devleti'l-'Osmaniyye*, Mecdî Mehmed Efendi ascribes to the establishment of the *sahn-ı semân medrese*s by Mehmed II a specific significance: "Merhum ve mağfurun leh [Alâaddin Ali-i Tûsî] Sultan Cennetmekan yani Sultan Mehmed Hazretleri mahruse-yi Konstantiniyye'yi fethidüb şemşir-i cihangir ile teshir eylediği zamanda eyyam-ı salifeden beri mabid-i küffar-ı haksar olan kenais-i naüstüvardan sekiz aded keniseleri medrese idüb demdeme-yi demame-yi küfrü ders eyledi." Mecdî Mehmed Efendi, *Hadaiku'ş-Şakaik*, ed. Abdülkadir Özcan (Istanbul: Çağrı, 1989), 117.We can at least speak of a paralleling here where such a perception of Christianity is manifest in relation to teaching and learning, and of an architectural site which is seen as a representation for this religion and what it can mean in juxtaposition to a represented Islam.

65 Ibid., 5–7 [4a, 6b]. The vocabulary of the author demonstrates the longevity of the influence of the early Islamic reception and translation of the concepts and terms of ancient Greek philosophy. See ibid., 5–8 [4a–7a], et passim. For an overview of the Arabic translations from the Greek terms and concepts and for the process of "making" Arabic philosophical, see Gerhard Endress, "Die Wissenschaftliche Literatur," in *Grundriß der arabischen Philologie, Bd. III: Supplement*, ed. Wolfdietrich Fischer (Wiesbaden: Dr. Ludwig Reichert, 1992), 3–23.

66 "Hâsılı, lafz-ı 'ilmin ma'nâ-yı hakîkîsi idrâkdir. Ve bu idrâkin müte'allakı var ki, ma'lûmdur." *Kevâkib-i Seb'a,* 6 [5a]. Elsewhere he also relates *ilm* to competency: "Zîrâ meleke 'ilmin 'aynıdır." *Kevâkib-i Seb'a,* 120 [88b].

67 *Kevâkib-i Seb'a*, 9 [8a].

68 Cf. Karaarslan, "Ön Söz", xvi–xvii, xx; *Kevâkib-i Seb'a*, 8–9 [7a–7b].
A similar concern can also be thought to be present in Nevî Efendi's *Netâyic el-Fünûn*, but the author did not elaborate on the issue like the anonymous author did. See the edition and transliteration by Ömer Tolgay, *İlimlerin Özü: Netâyic el-Fünûn* (İstanbul: İnsan Yayınları, 1995), 73. [Henceforth, Nev'î Efendi*, Netâyic el-Fünûn*]

represent a(n) (inter)connected whole themselves. On the other hand, the classification of the sciences according to the planets is further ascribable to their metaphysical significance. *Ilm*s are associated with the planets not only so that they fit into the framework of the cosmic order but also due to the role they played in the seven eras, each of which lasted a thousand years and which occurred in the constellation of Virgo. This only becomes clear in the second part of the second *bâb*, where the narrative of the creation in relation to the cosmic ages is placed. The author briefly narrates that the cyclical journey of the *Arş-ı âzam*, or the highest sphere (cum the Divine Throne), began in the constellation of Libra[69] due to its relation to justice, but he does not explain what justice necessarily has to do with creation.[70] According to the author, when the time arrived in the constellation of Virgo, humans were given bodies because, and here he quotes the famous hadith, God wanted to reveal the secret treasure that He Himself was and how He was to be known.[71] An honorable and glorious individual was given physical form in every transition period between the millennia which were divided among the planets and their rule, *hüküm*. The millennia were subject to degradation, so prophets were sent in every millennium for the purpose of restoration. The first millennium was associated with Adam and the planet Saturn; the second with Idris and Jupiter; the third with Noah and Mars; the fourth with Abraham and the Sun; the fifth with Moses and Venus; the sixth with Jesus and Mercury; and finally, the seventh with Muhammad and the Moon.[72]

69 From the geocentric perspective. See and cf. İlhan Kutluer, "Devir," *TDV İslam Ansiklopedisi* (Istanbul: Türkiye Diyanet Vakfı, 1994), 9: 234–234; idem, "Felek," *TDV İslam Ansiklopedisi* (Istanbul: Türkiye Diyanet Vakfı, 1995), 12: 303–306.

70 *Kitâb-ı Fevâ' ihu'l-Miskiyye fi'l- Fevatihi'l-Mekkiyye,* which Bistâmî wrote in Arabic and dedicated to the Ottoman Sultan Murad II in 1440, should have been among the sources utilized by the author of the treatise. It was translated into Turkish in 1570. This narrative of creation is also found in this work. There is a remark concerning Libra which, at least in the Turkish version, begins with a "bilgil ki", hence axiomatized and without a reference to a previous work. According to it, when time finishes its journey through Virgo, it will ingress into Libra basically to reach the end of its journey. The Islamic Day of Judgement will take place when time arrives here, and humans will be judged, there will be scales of justice to determine who is allowed to enter Heaven and who is condemned to Hell. Could the author's omission be related to the irrelevance of the planets or stars at the end of time, then? For the transliteration of the only existing Turkish translation of the mentioned work, see, Ömer Yağmur, "Terceme-i Kitâb-ı Fevâ'ihü'l-Miskiyye fi'l-Fevâtihi'l-Mekkiyye (Metin-Sözlük- Şahıs, Yer, Eser, Tarikat ve Kabile Adları İndeksi)" (M.A. thesis, Istanbul Üniversitesi, 2007). Concerning the remark on Libra, ibid., 37; concerning the narrative of creation which is scattered throughout the work, ibid., 20–21, 27, 37–39, et passim.

71 A derivative of the root *'-r-f* , and not *'-l-m*, is used in the hadith. *Kevâkib-i Seb'a*, 83 [62a]. This hadith was cherished by the Sufis. See e.g., Götz, "Der 'vollkommene Scheich'," 218–219.

72 *Kevâkib-i Seb'a,* 83–88 [62a–65a]. Also cf. ibid., 124 [91b]. He gives his second explicit "rational" explanation for Muhammad's being the last prophet in his portrayal of him as representing the combination of *hikmet-i ameliyye*, which Moses represented, and *hikmet-i ilmiyye,* which Jesus represented. Ibid., 124–125 [92a–92b]. The chapter on the science of history in *Netâyic el-Fünûn* begins with the same narrative of creation and the cosmic ages, too. Yet, it does not speak of the *hüküm* of the planets, or the degeneration and restoration as a reason to end an era and begin a new one. Nev'î Efendi, *Netâyic el-Fünûn*, 86–90. Nevî does name his references: Sadruddîn Konevî, who was a student of Ibn Arâbî, and Abdurrahman Bistâmî. According to Veysel Kaya, Bistâmî tried to reconcile philosophy with religion, and vice versa, and was an adherent of the Brethren of Purity. Veysel Kaya, "XV. Yüzyıl Ansiklopedisti Abdurrahman Bistâmî'nin Felsefe-Kelâm İlişkisine Bakışı" in *Osmanlı'da İlm-i Kelâm: Âlimler, Eserler, Meseleler*, eds. Osman Demir et al. (Istanbul:

There had been many other prophets in every millennium, but after Muhammad, it was *ulemâ* and *fuzelâ*, or the erudite and the virtuous,[73] who would be likened to them.[74] So, not only *ilm* but also an *alîm* is a "missionary" continuing to assume the cosmic task the prophets had undertaken in the earlier millennia and contributing to the manifest realization of the very reason of creation. After a passage on the companions of the Prophet, the transmission of hadith and some mainly confidential *ulûm*, the author focuses solely on the prerequisite knowledge and competency with which one can undertake an exegesis, and makes brief remarks on the famous exegeses of the Qur'an.[75] Once again it becomes clear that when he is asked about "the sciences among the Turks", he thinks of knowledge of, and knowledge within, the religious scripture, to which the trajectory of the narrative leads from the outset.

As far as the planets' appearance in the introduction and the first *bâb* is concerned, for him planets are "nâzır-ı düvel ve mürebbiy-i milel",[76] i.e. the custodians of the states and teachers of the "nations". In accordance with this metaphysical scheme, it is possible to think that the author of the treatise related *ulûm* to the planets because these were considered as parts of the intellectual chain descending down to the sublunar realm. But other than the implicit remarks above, an explicit remark that would speak of the planets as the supervisors of *ulûm* is absent in the treatise.

Furthermore, the author goes beyond the number of the degrees of the ecliptic path, 360, and the planets by suggesting the probable number of *ulûm* to be at least 310,800, a number obtained by multiplying the number of words in the Qur'an by four. To each word he assigns four layers of meaning based on the external, internal, starting and delimitating/limiting/defining qualities[77] which, as he says at the end of the treatise , are to be further multiplied by seven , for each layer has its own seven layers.[78] Many of these *ulûm* are only known by the prophets, and not by *ulemâ*, while many are known only by the angels, and still

ISAR, 2016), 301–314. In contrast to the author of *Kevâkib-i Seb'a*, Nevî does not state that Muhammad's prophethood can be concluded rationally because it is due to his line in this cosmic consequence. The second "rational reason" he gives, though, is found in *Netâyic el-Fünûn* in the chapter of *ilm-i kelâm* as an evidence offered this time by a shaykh. Nev'î Efendi, *Netâyic el-Fünûn*, 164. The "rationalization" of the cosmic ages is also absent in Bistâmî's work mentioned above, but Bistâmî does mention the *hüküm* of the planets according to the millennium.

73 *Ulemâ* and *fuzelâ* designate the same group here, namely the scholars. *Fâzıl*, meaning virtuous/superior, is usually used as an attribute of an *âlim*.

74 *Kevâkib-i Seb'a,* 87–88 [65a–65b]. A hadith is quoted which states that the Muslim scholars are like the prophets of the people of Israel. It is also cited in the prologues of the *Şakâ'ik Zeyl*s, too. Also, in the treatises which deal with an *ilm*, one usually finds a reference to this hadith. So, this (self-)perception was usually repeated.

75 *Kevâkib-i Seb'a*, 88–106 [65b–78a].

76 Ibid., 8 [7a].

77 "Ve her kelimenin zahr-u batn ve matla'-u haddi vardır. Ya'nî bu dört vecihle her kelimede ma'nâ vardır." *Kevâkib-i Seb'a*, 9 [7b].

78 Ibid., 119 [88a].

many others are known by God alone .[79] By his enumeration, then, he implies the intelligible ones continue to remain within the framework of the cosmic order based on 7 and 360.[80] Yet, the author repeats that he is aware of the fact that the number of *ulûm*, even of those which can be known by humans, is actually bigger. The reason he cannot include at least some of the rest is because those *ulemâ* who knew them wrote no books on them, or even if they did , their books were burnt, lost, destroyed, neglected or unpreserved with the passage of time.[81] So, as a side remark, it can be deduced here, that the author, in fact, acknowledges the crucial and central role of books as the medium of transmission of knowledge. Indeed , he elevates some subjects that could and would be covered under certain *ilm*s to self-standing *ilm*s especially if books dedicated solely to these subjects were written. When this is the case, he informs that a particular science is actually part of another science, and justifies the separate enumeration usually with the statement, "lâkin mustakillen hakkında kütüb tasnîf ve te'lîf itdiler", i.e. but they sorted and authored books only on this particular subject.[82] Although the author does not acknowledge and name *ilm*s just because books are written on them, he still gives the impression that, without someone's having previously written a book on it, a subject's status as an *ilm* remains questionable.[83] However, this excludes the knowledge/sciences which are accessible only to perfect individuals, and the non-existence of books in this case is regarded as natural and is not used in a critical sense.[84]

The author begins his enumeration with the sciences that have to do with writing and with subjects considered as sciences in themselves, namely Arabic philology, etymology, lexicology, orthography, poetry, eloquence and rhetoric. This is in line with the tradition that considered correct language to be the foundation for all the *ilmî* pursuits.[85] These disciplines

79 Ibid.

80 On the number seven and the Islamic cosmic order, see e.g., Feray Coşkun, "A Medieval Islamic Cosmography in an Ottoman Context: A study of Mahmud El-Hatib's Translation of the Kharidat Al-'Aja'ib" (M.A. thesis, Boğaziçi University, 2007), Chapter II "Islamic Cosmology," 13–34.

81 *Kevâkib-i Seb'a,* 9 [7b].

82 Cf., e.g., ibid. 22–23, [17b–18b]. This does not mean that he was the first one to refer to these subjects as *ilm*s in themselves.

83 Cf., e.g., the entries concerning some occult sciences in *Kevâkib-i Seb'a,* 34–35 [26b–27a].

84 See and cf., e.g., *Kevâkib-i Seb'a*, 63 [47a], 65 [48a–48b].

85 See and cf., Michael G. Carter, "Adam and the Technical Terms of Medieval Islam," in *Words, Texts, and Concepts Cruising the Mediterranean Sea, op. cit.*, 439–454; Hans Hinrich Biesterfeldt, "Arabisch-islamische Enzyklopädien: Formen und Funktionen," in *Die Enzyklopädie im Wandel vom Hochmittelalter bis zur Frühen Neuzeit*, ed. Christel Meier (Munich: Wilhelm Fink, 2002), 65; Gerhard Endress, "'Der erste Lehrer': Der arabische Aristoteles und das Konzept der Philosophie im Islam," in *Gottes ist der Orient. Gottes ist der Okzident: Festschrift for Abdoldjavad Falaturi zum 65. Geburtstag*, ed. Udo Tworuschka (Cologne and Vienna: Böhlau, 1991), 160; idem, "Reading Avicenna in the Madrasa: Intellectual Genealogies and Chains of Transmission of Philosophy and the Sciences in the Islamic East," in *Arabic Theology, Arabic Philosophy: From the Many to the One: Essays in Celebration of Richard M. Frank* (Leuven, et al.: Peeters Publishers, 2006), 374; Şükran Fazlıoğlu, "Manzûme fî Tertîb el-Kutub fî el-Ulûm ve Osmanlı Medreselerindeki Ders Kitapları," *Değerler Eğitimi Dergisi* 1 (2003): 107–108; Sonja Brentjes, *Teaching and Learning the Sciences in Islamicate Societies (800–1700)* (Turnhout: Brepols, 2018), 180, 205; Akbulut, "Classification of the

along with a few others such as dialectic and logic are named and briefly explained under the first three stars, while the author himself, following Taşköprüzâde,[86] classifies the sciences based on their ontologies or epistemologies. Thus , he names the ones under the first star as the written sciences; the ones under the second star as those concerning speech; those under the third as concerning or existing in the mind.[87] The content assigned to the fourth star comprises a great number of physical, mathematical, practical, mechanical, and occult sciences, some of which are medicine, ophthalmology, surgery, zoology, botany, geography, engineering, time-keeping, meteorology, astrology, magic, interpretation of dreams and omens, physiognomy, chemistry, alchemy, arithmetic, geometry, astronomy, and music,[88] which correspond to what would be enumerated under the heading of natural philosophy, theoretical philosophy, and/ or mathematical sciences in the classical classifications.[89] The author calls them "a'yâna müte'allika olan 'ilm," i.e. knowledge and/or science which corresponds to an external -physical or metaphysical- reality. These he divides into two: the first consisting of *hikemî* or *aklî ulûm*, and the second of *şerî ulûm* including *hikmet-i ameliyye*, or practical philosophy.[90]

The author repeats the Aristotelian trifold division of the theoretical sciences (metaphysics, mathematics, physics) without any mention of the philosopher, yet explicitly associates it with the philosophical knowledge/science, "[b]u 'ulûm-i selâse [*'ilm-i ilâhî, 'ilm-i sânî or 'ilm-i riyâzi, and 'ilm-i tabî'î*] usûl-i ilm-i hikemiyyedir."[91] Again correspondingly, under *ulûm-i riyâziyye* he counts the quadrivium as the overarching *ilm*s.[92] And among the quadrivium, he emphasizes geometry's place with the following words:

Sciences," 53–54; also El-Rouayheb, *Islamic Intellectual History*, 120–125.
In fact, at the end of the treatise, the author states that the "other nations" do not regard words as possessing numerous layers of meaning as Muslims do, because the languages their books are written in do not contain *icâz*, i.e. terseness, like Arabic does. *Icâz* was not of the sort of philological sciences as they are listed here, it was deemed a religious science. Nonetheless, viewing language as a tool to discover "the truth", or truths, did obviously play a significant role in elevating the status and prestige of all the sciences related to language. Cf. *Kevâkib-i Seb'a*, 119–120 [88b].

86 Cf. Selime Çınar, "Fârâbî'den Taşköprîzâde'ye: İslam Medeniyetinde İlimler Tasnifinin Gelişimi" (M.A. thesis, Fatih Sultan Mehmet Vakıf Üniversitesi, 2014), 63–80.

87 *Kevâkib-i Seb'a,* 12–25 [10a–19b].

88 Ibid., 25–46 [19b–35a]. Interestingly enough, he also lists sleight as an *ilm*, "'ilmü'ş-şa'beze ve't-tahyyîlât". Ibid., 35 [27a].

89 See and cf. Brentjes, *Teaching and Learning*, Chapter 7 "Encyclopaedias and Classifications of the Sciences," 187–221; Amos Bertolacci, "Ibn Sīnā (d. 428/ 1037): Metaphysics of the Shifā'," in *The Oxford Handbook of Islamic Philosophy*, eds. Khaled el-Rouayheb and Sabine Schmidtke (New York: Oxford University Press, 2017), 146–147; Erzurumlu İbrahim Hakkı, *Tertîb el-'ulûm*, ed. and transcr. Şükran Fazlıoğlu, in eadem, "Ta'lîm ile İrşâd Arasında: Erzurumlu İbrahim Hakkı'nın Medrese Ders Müfredatı," *Dîvân İlmî Araştırmalar* no. 18 (2005): 128.

90 *Kevâkib-i Seb'a*, 25 [19b].

91 *Kevâkib-i Seb'a,* 26 [20a]. Elsewhere, namely in the epilogue of his treatise, he acknowledges the Greek origin of these sciences and all the rational sciences, "cemî'-i ulûm-i 'akliyye", though. Ibid., 113 [83b].

92 Ibid., 35– 36 [27b].

> İttifâk itdiler ki burhân cihetinden akvâ-yı 'ulûm 'ilm-i hendesedir. Cümle-i menâfi'indendir cehl-i mürekkebe ânınla 'ilâc olunmak. Zirâ 'ilm-i yakîndir. Vehmin dahli yokdur. Binâen 'aleyh, zihin yakîn tahsîline i'tibâr ider. Cehl-i mürekkeb ise değil, illâ vehmin 'akıl üzerine galebesinden iktizâ ider.[93]

For the purpose of this study three points are worth of special attention here. First, the fact that a consensus is present adds to the prestige of this *ilm*. Second, doubt is regarded as a contaminant, and demonstration triumphs over it. Third, ignorance is friendly to doubt, but hostile to reason. It is also interesting that a juxtaposition occurs between the personifications of reason and ignorance which is regarded as a disease to be healed.[94] Vis-à-vis its opponents, ignorance and doubt, reason is loaded with a decisively positive meaning .

The sciences listed under the fifth star concern politics, administration, and advice for princes and military men, and hence they belong to the category of practical philosophy or *adab*.[95] Under the sixth star religious sciences are treated,[96] as is *tıbb-ı nebevî*, or Prophetic medicine, since it is based on the hadith.[97]

The author might have forgotten to introduce the last sciences with the opening phrase "kevkeb-i n" which is always present in his other introductions . But he might have intentionally left out such an introduction, for he speaks of secrets. If he really did not forget the usual introduction, then, with "the seven stars", the author may also be alluding to the Pleiades which consists of seven stars, six of which are visible but one of which is rarely visible to the naked eye. And there is a famous hadith known as "the Pleiades hadith" concerning knowledge, faith, and the Persians. It underlines the possible difficulty of attaining faith and knowledge by positing them as high and as far as this star cluster.[98] Taking

93 Ibid., 36 [27b–28a].

94 Another source the anonymous author could have consulted may be Ali Çelebi Kınalızâde's *Ahlâk-i Alâî*, for a similar remark is made there concerning a similar discipline of knowledge which is based on proofs. Hagen has paraphrased that passage: "In a list of the 'diseases of the soul', the philosopher Kınalızade Ali (d. 1572) lists, together with all other vices, two kinds of ignorance: simple ignorance (*cehl-i basit*), which is ignorance aware of its ignorance, and complex ignorance (*cehl-i mürekkeb*). Since cognizance of ignorance is the beginning of every quest for knowledge, simple ignorance is not even reprehensible initially. It can be healed by recognising the unique position of human beings among all animals, distinct through the gift of speech - and thus capable of preserving and transmitting knowledge. The other kind of ignorance, however, is not even to be cured by Jesus, who can heal the deaf and the blind. When encountering such a person, the only cure a wise man may undertake is to teach him mathematics, so as to awaken in him the desire for definite proof, and then lead him on to other knowledge to which he will apply himself with the same desire." Hagen, "The Order of Knowledge," 407.

95 *Kevâkib-i Seb'a,* 46–48 [35a–36b].

96 Ibid., 48–64 [36b–48a].

97 Ibid., 57 [43b].

98 It is worth mentioning that stars would often be ascribed a guiding quality. P. Kunitzsch, and J. Knappert, "al-Nud̲jūm," in *Encyclopaedia of Islam*, Second Edition, eds. P. Bearman, et al. Brill online: 2012. It should perhaps also be noted that there existed a serious interest in Persian intellectual life among some influential mid-18th century Ottoman literati. See e.g., "Eavesdropping on the Pasha's Salon: Usual and Unusual Readings of an Eighteenth-Century Ottoman Bureaucrat," *Osmanlı Araştırmaları / The Journal of Ottoman Studies* 41 (2013): 159 –195.

his emphasis on terse and figurative language and his concern not only to prove something to the French but also teach them about his faith at the same time, it is possible that he may have wanted to integrate the Pleiades as sort of a riddle into his narrative. In any case, the seventh, hence the highest-positioned, star is reserved for the mystical, i.e. Sufi, sciences. The discussion of these sciences takes place in a strikingly special way. This section includes a brief juxtaposition at the beginning, then a long statement concerning the unknowability of the Sufi sciences, which is not necessarily an explanation why, and a list of the first level of these sciences.[99]

In the second *bâb*, the author briefly mentions that some *ilm*s are either useless or harmful, *muzır*. However, this labeling does not equate to tabooing them. In fact, he argues that all *ilm*s, be they religiously sound or problematic, can be studied, at least in theory.[100] Taking his treatise as a whole into consideration, what he means could be that one has to be aware of what one does with knowledge or science that is of the "problematic" sort and where one places it within the hierarchy, so that one is not further led by its guidance, which is eventually a misguidance, and one's salvation is not threatened.[101] Then, the author goes on to describe how teaching and learning take place at *medrese*s by first making the statement that the knowledge/science of *ulemâ* of Islam involves examination, investigation, or *tedkîk*, and verification, or *tahkîk*,[102] and not mere description, explanation or narration, or *terceme*, of singular terms and concepts.[103] It is the Qur'an towards which all learning - to be precise, all religious learning - is directed. It is the ultimate book to which the student seeks access through acquiring *ilm*s step by step.[104] And these steps are taken by meeting five days a week with their *üstâd*, or master, presenting him with the result of their individual preparation at their *hücre*s, looking at the textual learning material for about eight or nine hours of the day before their meeting, so that the topic is discussed, investigated, and verified with the master

99 *Kevâkib-i Seb'a*, 64–66 [48a–48b].

100 See and cf. also the quotation on philosophical sciences from the Moroccan theologian and logician al-Ḥasan al-Yūsī (d. 1691) quoted in El-Rouayheb, *Islamic Intellectual History*, 214.

101 *Kevâkib-i Seb'a*, 66–67 [49a–50a].

102 "The term *taḥqīq* is a central concept in Islamic scholarly culture. Its importance is attested as early as the tenth and eleventh centuries. Early Islamic theologians of that period often used the verbal noun *taḥqīq* to denote the rational demonstration of the truth of the Islamic creed, as opposed to *taqlīd*, that is, acceptance of the creed based on uncritical acceptance of what on has been told by elders, peers, and teachers. A very similar understanding is to be found in the writings of the philosopher Avicenna (d. 1037), who also contrasted *taqlīd*, that is, the uncritical acceptance of received philosophical views, with *taḥqīq*, that is, the independent logical demonstration of the truth of such views. The dictionaries of technical terms by 'Abd al-Ra'ūf al-Munāwī (d. 1622) and Ebū l-Beḳā Kefevī (d. 1684) both explained that *taḥqīq* is 'to establish the proof of a scholarly question' […]. In practical terms, a scholar who was not a *muḥaqqiq* would confine himself to reiterating received views and perhaps also clarifying them for his students or readers. A *muḥaqqiq*, on the other hand, would critically assess received views." El-Rouayheb, *Islamic Intellectual History*, 28.

103 *Kevâkib-i Seb'a*, 67–68 [50a].

104 Ibid., 68 [50b].

and the fellow students.[105] This way "their minds open with progress" and begin to find meaning.[106] The author explains in detail that the textbooks the students study are sorted and assigned according to their levels.[107] He recounts which books are specifically to be read at which levels and for which *ilm.* He also outlines in which order these *ilm*s would be studied until the students obtain *icâzetnâme*s.[108] The verbs he uses to describe how the students would learn from and approach books are usually those which involve reading, looking, carefully considering, completing, proceeding (often indicating progress from one level to the next, as the level depended on the books one studied), (analytical, critical) "deep-reading", investigating, verifying, memorizing, and copying,[109] all of which not only highlight the role of the books, which are more or less canonic, but also the students' active engagement with them. However, the author also emphasizes the importance of human masters as sources of knowledge. He advises that the student should expand his knowledge whenever he meets someone of *ilmin ehli*, the people of *ilm* in which he lacks acquaintance or competence.[110] In contrast, he does not speak of coming across books or searching the libraries for the same purpose. This is significant, because he does identify being at least acquainted with every science as a scholarly goal.[111] It might perhaps be bold to state that the relation with the books depended on the human agency or a master's instruction only on the basis of this treatise.[112] Yet, the quest explicitly directed after *ehl-i ilm,* and not the books in themselves, could be telling. When one considers the increased number of public libraries both in the capital and in the outlying provinces in the eighteenth century, reflecting a trend that had begun in the preceding century,[113] it would be reasonable to expect the author to integrate the libraries and the books preserved there in his presentation concerning the quest for knowledge, and to give a certain emphasis to this . But the human agency obviously continued to be more important for him.

105 Ibid., 68 [50b–51a].
106 Ibid., 68 [51a].
107 Ibid., 69–70 [51b–52a].
108 Ibid., 71–80 [53a–59b].
109 See and cf. ibid., 71–80 [53a–59b].
110 Ibid., 80 [60a].
111 Ibid., 80–81 [60a–60b]. But eventually the student would recognize that there is no end to *ilm*, precisely when it concerns understanding the Qur'an, and acquiring Sufic knowledge is advised as a remedy that could offer a way out of "superficiality". Ibid., 81 [60b].
112 Drawing on El-Rouayheb, it seems that the "books of the Persians" to which the seventeenth-century Ottoman scholars referred to were introduced by and studied with the expatriate scholars. El-Rouayheb, *Islamic Intellectual History*, 29–30, 32. Furthermore, El-Rouayheb analyzes the two widely read pedagogical treatises from the thirteenth century, where he addresses the instructions in these which are in favor of acquiring knowledge from scholars and against trying to master books alone. See and cf. ibid., 102–105; the discussion on the audience and reception of Ibn Arabî, ibid., 241–242.
113 Cf. Sievert, *Zwischen arabischer Provinz*, 404–408; Yavuz Sezer, "The Architecture of Bibliophilia: Eighteenth-Century Ottoman Libraries" (Ph.D. diss., Massachusetts Institute of Technology, 2016), https://dspace.mit.edu/handle/1721.1/107311.

The section where the author presents the rules the students should follow directly begins with guidelines attributed to Socrates:

> Sokrât'dan nakl olunur ki: Şâbb ola, fâriğu'l-kalbi 'ani'ş-şevâgil ola. Dünyâya mültefit olmaya. Sahîhu'l-mizâc ola. 'İlim üzerine bir şey tercîh itmemek üzere 'ilmi seve, sadûk ve bi't-tab' munsif ola. Mütedeyyin ve emîn ola. Vazâif-i şer'iyye ve a'mâl-i dîniyyei âlim ola. Şâri'in vâcib itdiği ile 'amel eyliye. Harâm itdiğinden ictinâb eyliye. Rusûm ve 'âdâtda cumhûra muvâfık ola. Kalbi pek ve seyyiu'l-huluk olmaya. Ve ekûl olmaya. Ve mütehettik olmaya. Mevtden korkmaya. Kadr-i hâcetden ziyâde mâl cem'-itmeye. Zirâ esbâb-ı ma'îşete tevaggül 'ilm-i şerîfden alıkor.[114]

Here Socrates is deployed as an authoritative source of reference, as the portrait of an ideal scholar.[115] That the student should not fear death can perhaps make the special reference to Socrates more meaningful. Clearly, "Socrates" speaks from and to an Ottoman language and reasoning,[116] and there is nothing in the terms used here that is not contemporaneous or that would call to mind a distant and foreign past or worldview. He is a "recycled" Socrates; he is "remolded" to correspond to, and also to serve, the rhetorical and discursive image of the ideal Ottoman scholar.

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114 *Kevâkib-i Seb'a*, 70 [52b].

115 The appreciation of the ancient philosophers/scholars as historical heroes of wisdom and scholarship was, of course, not an Ottoman peculiarity, but a feature of their incorporation into the Islamicate intellectual discourse. See and cf. e.g., Eva Hoffman, "The Emergence of Illustration in Arabic Manuscripts: Classical Legacy and Islamic Transformation" (Ph.D. diss., Harvard University, 1982), 278–284, 290–291; Oya Pancaroğlu, "Socializing Medicine: Illustrations of the Kitab al-Diryaq." *Muqarnas* 18 (2001): 157; Doris Behrens- Abouseif, "The Image of the Physician, Arab Biographies of the Post-Classical Age," *Der Islam* 66 (1989): 335, 338.

In *Netâyic el-Fünûn*, citing a hadith, Nevî Efendi writes that Plato, whom he calls Eflâtun-ı İlâhî, i.e. Plato the divine, was a prophet. He was most likely not the first person to claim this, and this does not matter for the purpose of this study. What is interesting is that he places the ancient Greek philosophers in a relation of *silsile* to each other by defining each of them as the *şâkird*, i.e. disciple, of the earlier one. He also speaks of Plato's giving the *icâzet* to Aristotle. Furthermore, he informs that *ulemâ* and *hükemâ* consider Plato's master Socrates a prophet, too. In fact, he writes the *silsile* of Socrates reaches back to Lokmân who was a friend of David. Nev'î Efendi, *Netâyic el-Fünûn*, 123–127. Creating a *silsile* was obviously meaningful in regard to establishing authority; being linked in the form of a chain increased the prestige of the individual participant. Cf. William A. Graham, "Traditionalism in Islam: An Essay Interpretation," *The Journal of Interdisciplinary History* 23, 3 (1993): 510.

Cf. also the following portrayal of Plato by Bistâmî: According to him, Plato accused the people of Israel of hating geometry and therefore being punished by God with the plague, when the advice he took from one of their prophets did not work. He himself gave the advice of engaging with geometry, philosophy, and arithmetic, while saying that the philosophical sciences were valued by God. İhsan Fazlıoğlu, "İlk Dönem Osmanlı İlim ve Kültür Hayatında İhvânu's- Safâ ve Abdurrahmân Bistâmî," *Divan: Disiplinlerarası Çalışmalar Dergisi* 2 (1996): 232–233. To my knowledge, the deployment of the ancient sages as role models in the Islamicate discourses has not been dealt with in a detailed study so far. But in an article, Oliver Overwien talks about Hippocrates' being deployed as an ethical role model and as a true king in two medieval Arabic gnomologia. Oliver Overwien, "Hippocrates of Cos in Arabic Gnomologia," in *Philosophy and Medicine in the Formative Period of Islam*, eds. Peter Adamson and Peter E. Pormann (London: The Warburg Institute, 2017), 34–47.

116 See and cf. the instructions in *Ta'līm al-muta'allim ṭuruq al-ta'allum* by the Central Asian jurist Burhān al-Dīn al-Zarnūjī (fl. 1203) which had been very popular in the Ottoman Empire, as the number of its copies at the manuscript libraries demonstrate. El-Rouayheb lists some of these instructions in his monograph. See, El-Rouayheb, *Islamic Intellectual History*, 100–101.

The last chapter of this treatise abounds yet further with notions which associate *ilm* with authorities - human, cosmic and religious, i.e. the revealed law, alike. This time they do not represent the *ipse-dixit* approach. Instead, the author implicitly relates peoples' acknowledging a particular authority or particular authorities, or simply their being subject to their nature or celestial influence, to the nature of knowledge they possess. The first figure of authority one encounters here is the letters. Again, with a "ma'lûm ola ki", i.e. it shall be known, the author informs the readers that a human is not an animal because he can think and understand,[117] and *ulûm* and *sanâyi*, or crafts, are born of these two faculties. In order for people to be able to use these faculties, letters were created in various shapes, which eventually came to correspond to various languages and led to diverse *ilm*s.[118] An expansive "philosophical" discussion on the role of the letters would have been interesting, but the author says only this much. However, in the passage where he argues that the religious sciences are particular to the Islamic community, he highlights Qur'anic Arabic as a miraculous language, capable of meticulously bearing many meanings, truths, and divine truths for that matter. In contrast, the other books cannot train the mind to discover such meanings, because they are too simple, so argues the author.[119] The second figure of authority is the divine scriptures vis-à-vis *akıl*, i.e. reason.[120] In fact, *akıl* is loaded with a pejorative sense when it is juxtaposed with the authority of divine scripture. Those who followed the scripture found true guidance, whereas those who acted in accordance with their *akıl*, like the Sophists and the philosophers, *felâsife tâifesi*, remained in darkness.[121] The Sabeans were close to the philosophers who followed their reason and ignored all the prophets after Idris. The Zoroastrians, the Jews, and the Christians did better in this regard, but ignored Muhammad.[122] Apart from sorting peoples on the basis of their different beliefs, peoples can be thought of as representing two groups with regard to *ilm*: There are the people of Egypt, the Rûm, the Indian, the Persian, the Chaldean, the Greek, the Hebrew, and the Arab, all of whom cared for *ilm*. The greatest of them are specified by the author as the Arab, the Persian, the Rûm, and the Indian. And there is the rest like, among others, the Chinese and the Turk who did not care for *ilm*.[123] The author associates a special competency in matters concerning spirituality and spiritual understanding with the Indian, whose intellect and mind he further describes as having been

117 An idea which can be found expressed in Avicenna's treatise on the soul. See Gérard Jéhamy, "La terminologie des sciences humaines dans le patrimoine arabo-islamique," in *Words, Texts and Concepts Cruising the Mediterranean Sea*, *op. cit*., 488.

118 *Kevâkib-i Seb'a*, 109–110 [79b–80a].

119 Cf. ibid., 118–120 [87a–88b].
"Milel-i uhrânın ellerine olan kütübde i'câz maksûd olmadığından ma'âniy-i kesîre mu'tebere olmayup zâhiren ve bâhiren bir ma'nâ maksûd olmağla tasarrufat ile zikr olunan melekeyi tahsîl içün ânlara sa'y-iktizâ itmediğinden o meleke kendülerde hâsıl olmadı." Ibid., 120 [88b].

120 Ibid., 110 [81a].

121 Ibid., 110 [81a–81b].

122 Ibid., 110–111 [81b].

123 Ibid., 111 [81b].

formed under the influence of Mercury,[124] and the Arab, while specifying matters concerning the physical as of special interest for the Persian and the Rûm.[125] In his explanations concerning the languages of these peoples and the sciences in which they are principally interested (and those for which they had no talent),[126] the author still speaks of the scholars, whose religions he makes known each time and which are obviously not Islam, as *ulemâ* and *havâs*, meaning erudite people possessing special, often confidential knowledge.[127] Obviously, then, these identities were not exclusively reserved for Muslim scholars, and they could be assigned and claimed universally. When he speaks of the people of Egypt, he mentions Idris being one of the ancients of them, who cared for various *ulûm*, and bearing the appellation *Hermesu'l-Herâmise*.[128] As far as Arabs are concerned, the author marks the period of translation under the caliph al-Mansur as the second turning point after the revelation:

> Hattâ hulefâ-i 'abbâsiyyeden Ebû Ca'fer el-Mansûr 'ulûm-i şerâyi'de cümleye fâik olduktan sonra 'ilm-i felsefe ve nücûma dahî i'tibâr ve i'tinâ eyledi. Ba'dehu hulefâ-i 'abbâsiyyenin yedincisi 'Abdu'llâh el-Me'mûnu'bnu'r-Reşîd ceddinin bed'-itdiğini tetmîm idüb cemi'-i 'ulûmun erbâbını cem' ve kuvvet-i nefs-i şerîfe ve 'uluvv-i himmet-i münîfesiyle etrâf-ı memâlikde olan Eflâtûn ve Aristo ve Bukrât ve Câlînûs ve Öklîdîs ve Batlamyus ve sâirlerinin kütbünü cem' eyledi. Ve mehere-i mütercimîni dahî ihzâr idüp kemâ-yenbegî terceme itdiler. Ba'dehu kırâetine tevaggül idüb tahkîk ve tedkîkinde ifrât ile mâ-tekaddemi fersah fersah tekaddüm itdiler. Zirâ 'ulemâ'-i İslâm'ın mu'ciz olan Kur'ân'ı derke sa'y-ı belîgî olub o vecihle zihni hakâik ve dakâik derkinde meleke-i tâmme tahsîl itdiğinden her kankı fenne nazar eylese elbette ânın derki Kur'ân derkinden âsândır. Zirâ ândan güç olsa i'câz-ı Kur'ân mürtefi' olur. O ise muhâlâtdandır. Pes ma'lûm oldu ki 'ulemâ'-i İslâm cemî'-i 'ulûmda milel-i uhrâya iştirâkinden tefevvuku dahî emr-i mukarrardır. Milel-i uhrânın 'ulûm-i akliyyeden bildiği 'ulûm 'ulemâ'-ı hamse-i mezkûre ki Eflâtûn ve Aristo ve Bukrât ve Calînûs ve Oklîdîs ve Batlamyûs'un kütübünde olan 'ulûmdur. O 'ulûm bi-envâ'ihâ 'ulemâ-i İslâm'ın sudûr ve sutûrunda mestûrdur.[129]

124 Due to this association with Mercury, the author states that the Indians do (well) in the *ilm*s of arithmetic, geometry, calculation, medicine, stars, physics and metaphysics. Ibid., 111 [82a]. So, yet another reference to the planets which demonstrates that the author portrays the planets as cosmic *ilmî* authorities. This can be interpreted as a strategy to claim transcendental dimension for *ilm*. Cf. e.g., Carter's following remark: "Why would anyone say that Adam had been taught the grammar of Sībawayhi in heaven, unless to claim a transcendental dimension for that science?" Carter, "Adam and the Technical," 451.

125 *Kevâkib-i Seb'a*, 111 [82a].

126 Ibid., 111–117 [82a–86b]. See, e.g., speaking of the Arabs before Islam "Lâkin 'ilm-i felsefeye tabâyi'leri mâil değil idi; illâ nâdiren." Ibid., 115 [85b].

127 See ibid., 112–113 [82b–84a]. E.g., "Ve 'ulemâsı felâsife-i ilâhiyyûn deyû resmiye olunurdu", "Ve feylesûf dahî ânların [tâife-i Yûnân] 'ulemâsındandır." Ibid., 113 [83b]. He also employs *hükemâ* in the passage devoted to the Greek "nation". Ibid., 113–114 [84a].

128 Ibid., 114 [84b]. In *Netâyic el-Fünûn*, Nevî Efendi speaks of Hermes as the first philosopher who introduced the science of astrology after he came back from the planet Saturn, and does not identify him as Idris or as a prophet, but as one of the greatest and most ancient *hükemâ*. Nev'î Efendi, *Netâyic el-Fünûn*, 123.

129 *Kevâkib-i Seb'a*, 116–117 [86a–86b]. One could contrast this passage with Saçaklızâde's opinion on Muslims' engagement with philosophy. For him, they had been punished for engaging with philosophy and the sciences of the "heathen". Reichmuth, "Bildungskanon," 513. For the anonymous author, though, the philosophical sciences could be easily understood, incorporated, and actually "naturalized" by Muslims.

The Question of Geometry

In the passage above, *ulemâ* of Islam are described as being "the gatherers of all knowledge" owing to their authoritative source, the Qur'an, which is also regarded as "the gatherer of all knowledge" by making every knowledge essentially knowable through the way it trains the mind on the path to "truths". The gathering, i.e. claiming, applies explicitly to *ulûm-i akliyye*, *ulûm* of the other "nations". A rivalry is implied between *ulemâ* of Islam and *ulemâ* of the other "nations", and a juxtaposition is certainly made between *the* source and the authorities of the other "nations", which elevates the status of the latter, too. Mastering *ulûm* of the other "nations" took some time for *ulemâ* of Islam, but eventually they became part of what they know, whereas the other "nations" could only know these and not more. The sciences of the other "nations" are portrayed as limited and conquerable, hence inferior. Yet, the way he continues this passage with contradictions to what he has been recounting all along and giving the impression of writing in a hurry, and the use of the expression "egerçe" ('although'), may actually hint at a perceived problem and its relative novelty. The following sounds like a reassurance:

> Egerçe coğrâfîyâ ve hendeseye tevagülleri tâmdır. Amma coğrâfyâ ve hendese 'ulûm değildir. Zira 'ilm, hayvânâtdan fârik olan derk-i külliyâtdan 'ibâretdir. Bu iki 'ilim ise sanâyi' ve ma'ârifdir. Zirâ hayvânâtdan fârik olmayan cüz'iyyâtı görüb müşahede itmeden 'ibâretdir. O öyle iken edille-i hendeseyi serd iktizâ itse müdekkikîn-i İslâm'ın tefavvuk itmesinde kat'â şübhe yoktur.[130]

This emphasis on the competency of the scholars of Islam in the rational sciences is quite interesting, especially if one recalls the author's awareness of the opinion that Christian "nations" had of Muslims as ignorant. The explanation for this labeling is actually found at the end of the treatise. The author says that Christians consider Muslims as ignorant because they cannot grasp the Trinity.[131] The treatise is not a polemical text arguing mainly on the basis

130 *Kevâkib-i Seb'a*, 117 [86b].

131 *Kevâkib-i Seb'a,* 135 [100a]. "Söylesem anlamazsın deyû 'ilmi kendülere ve cehli bana nisbet iderler." The Trinity had always been a much debated and frequently addressed issue in texts which show an apologetic character. Since the author of *Kevâkib-i Seb'a* emphasized the role of language as a tool to uncover truths and attain knowledge, Manuel II Palaiologos' *Dialogues with a Muterizes* can be considered by way of comparison. This is because, for the emperor, too, the knowledge of language, in his case Greek, played a major role in determining one's capacity to grasp truths, among others the truth of the Trinity. In his work, it is possible to detect his emphasis on the Greek language's beauty, old age, authority, and imperial aspect, all of which render it capable of expressing divine truths to the degree that it is possible with the human tongue. The author of the Ottoman treatise states that the "other nations" cannot uncover the true meaning even of their own scriptures, i.e. the revealed books other than the Qur'an, because they do not possess *ulûm* which is required for religious hermeneutics. For him, the Trinity is explicitly a result of misunderstanding and misinterpretation of the language of the scriptures. See and cf. *Kevâkib-i Seb'a*, 117–137 [86b–101b], esp. 120, 125, 133–137 [88b, 92b, 98a–101b]; Manuel II. Palaiologos, *Dialoge mit einem Muslim, vol. I*, ed. and trans. Karl Förstel (Würzburg and Altenberge: Echter, 1993), 19, 21; Manuel II. Palaiologos, *Dialoge mit einem Muslim, vol. II*, ed. and trans. Karl Förstel (Würzburg and Altenberge: Echter, 1995), 27, 35, 41, 43, 47, 71, 83; Manuel II.

of philology and comparing verses from the religious scriptures, etc. Its main objective is to defend and argue for the truth of the Muslim faith via demonstrating its *ilmî* strength. Accordingly, for the anonymous author, the denial of the Trinity could well be the sole explanation for the opinion that Christians held since Muslims clearly cannot be called ignorant in relation to the other fields of knowledge. But precisely why does he attempt to deny geography and geometry the *ilmî* status? Why does he imply that the scholars of Islam would easily be successful in proving geometry's principles, had this deserved their attention? Why does he need to underline that *ulemâ* of Islam could thoroughly understand geometry and to the highest level, i.e. the level of proof? In theory, almost any other *ilm* mentioned within the book could count as an "art", like geometry or geography, which the author now claims to be art. The competency of the scholars of Islam, the Ottoman *ulemâ* for that matter, in geography and geometry must have been detected and explicitly addressed as lacking. Although the author is silent about an explicit statement from "the other" in this regard, he feels the need to defend the *ulemâ* of Islam, which necessitates, hence indicates, the presence of an attack. His strategy of defense basically consists of suddenly contracting and using the concept of *ilm* as a shield and degrading geography and geometry to trivialities: *Ilm* belongs with the Muslim *ulemâ*, it cannot be denied to them.

I now return to Ebû Sehl Numân Efendi's account mentioned at the very beginning as strongly indicating this vulnerable part of the Ottoman self-construction/imagination/representation. After his mission by the Danube, Ebû Sehl Numân Efendi was in office as *nâib* of Tokat. In 1742, he spent some time in Istanbul groveling to *Şeyhülislam* to be officiated as *müderris*.[132] Numân Efendi had received a considerably good education, first from his mother and then at *medrese*s in Sivas and Diyarbakır. He occupied some *ilmiyye* offices, taught as a *müderris*, and became *kadı* of Manisa at the end of his life in 1753.[133] He composed his *Tedbîrât-ı Pesendîde* in this city in the same year.[134] His experience with the Austrians led him to write a book on *mesâha*, i.e. geodesy, in Turkish, called *Tebyînü A'mâli'l-Misâha*.[135]

Palaiologos, *Dialoge mit einem Muslim, vol. III*, ed. and trans. K. Förstel (Würzburg and Altenberge: Echter, 1996), 9, 15, 19. In fact, Ottoman religion, i.e. Islam, and Ottoman governance, i.e. "Oriental despotism", constitute a major component of the French discourse on the Ottomans, and they were often given as reasons for the "Ottoman ignorance". So, with the term "ignorance" the French did not always refer to the lack of scientific, artistic, or military competencies, but often also addressed religious and political beliefs, practices, preferences, etc. Furthermore, this "ignorance" was later instrumentalized to depict the French as "the saviors" in the colonial rhetoric. See and cf., e.g., Aksan, "Breaking the Spell," 255–256, 260–261; Ferenc Tóth, "Égypte. La double Mission du Baron de Tott à la Fin de l'Ancien Régime," *Africa: Rivista trimestrale di studi e documentazione dell'Istituto italiano per l'Africa e l'Oriente* 57, no. 2 (2002): 149–150, 155, 169. Also see and cf. the image of the Turk in Jean-Antoine Guer, *Les Moeurs et Usages des Turcs, leur Religion, leur Gouvernement civil, militaire et politique,* 2 vols. (Paris, 1746–47).

132 Sievert, "Ebū Sehl Nu'mān," 369.

133 Prokosch, "Einleitung."

134 Sievert, "Ebū Sehl Nu'mān," 372–373.

135 Nu'mân Efendi, *Tedbîrât-ı Pesendîde*, 90; Atilla Polat, Halime Mücella Demirhan Çavuşoğlu, "Mehmed Said Efendi'nin Misâha Risâlesi," *Osmanlı Bilim Araştırmaları/ Studies in Ottoman Science* 21, 2 (2020): 96–97; Savaş, "Önsöz" in *Ebû Sehl Nu'mân Efendi*, x–xi.

The Ottoman emissary to whom the task of presiding over the drawing of borders was assigned was *mevkufatî* El-Hâcc Mehmed Efendi, the future grand vizier. Numân Efendi, who was then a *mülâzım*,[136] was assigned as *sınır mollası*, the notary to attest and accredit the procedure of border-drawing and its outcome, and thus he was among the members of the deputation. In addition to the difficulties caused by the topography of the Danube region, i.e. from east of Orşova to Wallachia, the drawing of borders turned out to be arduous due to mutual mistrust.[137] In the relevant account in *Tedbîrât-ı Pesendîde*, which is consulted here, the person who has to obey the higher official is the good, smart, clever, intelligent, knowledgeable, considerate and wise "savior" . This higher official is Mehmed Efendi, who is not good, smart, clever, etc.[138] So, Numân Efendi has to bear with him in a way, which is a reason for his occasional self-pitying. He is not given the positions he has been asking for even if he obviously deserves better, while people, who are not only less capable but also unwise, occupy higher and more important offices which they by implication do not deserve.

The relevant passage in Ebû Sehl Numân Efendi's work for this study is his account on the measuring, land surveying, and mapping of the region. When the interpreter translating for both sides informs the Ottoman emissary that the Austrian architects and engineers would begin work and the Ottoman architects and engineers were expected to do the same so that the results could be compared and accredited, Mehmed Efendi shares his serious concerns with Ebû Sehl Numân Efendi. These include his concern that the Ottoman architect had no idea of what *mesâha* was and that he was a gaunt and helpless man addicted to opium. No engineer like those of the Austrians, and no equipment like those of the Austrians, were to be found in Istanbul. So, what was he to do? Ebû Sehl Numân Efendi came up with the idea of declaring his trust in the Austrian engineers and architects, so that he would be able to carefully observe them conducting their surveys. He thought he would be able to figure out how they work, for he has "ilm-i mesâha ve hendesede birazca el", i.e. some skills in geodesy and geometry.[139] But the Austrians would not let him observe the way they worked and learn this precious new trigonometrical method of measuring they had learnt from the French, who themselves had learnt it from the English. It was namely an English *hakîm* and *râhib*[140] who had invented this method.[141] However, with his spyglass, Numân Efendi did observe the Austrians and try to grasp the method and how the equipment was constructed.[142] With a bit

136 Sievert, "Ebū Sehl Nu'mān," 368.
137 Ibid., 368–369.
138 Sievert sights a portrayal of the superior as a foolish/unwise stubborn man. Sievert, "Ebū Sehl Nu'mān," 389.
139 Nu'mân Efendi, *Tedbîrât-ı Pesendîde*, 65–66.
140 Isaac Newton comes to mind.
141 Nu'mân Efendi, *Tedbîrât-ı Pesendîde*, 66.
142 "Nu'mân Efendi'nin Avusturyalılardan gözlemleyerek yaptığı bu alet *Tebyînü A'mâli'l-Misâha*'da 'tabla' adı ile tanımlanan bilimsel literatürde 'plançete' olarak bilinen alet olup en basit anlamı ile bir çizim masasından ibarettir. Arazinin eğimine göre ayarlanabilen bu çizim masası sepe adı verilen bir üç ayak üzerine yerleştirilerek kullanılmakta, alidat ve pusula ile iş görmektedir. Üçgen benzerliği ilkesi ile arazi üzerindeki

of luck and his Odysseus-like cleverness, he managed to learn this measuring method and construct some equipment which the Austrians laughed at when they saw it.[143] The Austrians got suspicious and tried to find out who had taught this method to the Ottomans, because the knowledge on how to build and use the equipment was strictly forbidden to share. Numân Efendi's reply is significant. He proclaimed that it was , of course, thanks to no "other" but to the knowledge the Ottomans possessed that they could work with this method. True, they may have neglected this science, but they had the "source". As for the *rahîb* and *hakîm*, who was claimed to be the inventor of this science, he owed it to the books that got into Christian hands after Cordoba was taken by Christians.[144]

So, although Numân Efendi does not deny geometry and geodesy *ilmî* status, a similar strategy of defense is present: "You" shall not deny "us" knowledge, but "we" can recognize some minor faults that there may be and "we" can overcome these alone. The "you" vs. "us" and "us" vs. "you" paradigm in the narrative of this work is also constructed on the basis of religious identities.[145]

The Ottoman incompetency in contemporary land surveying and measuring techniques could have been a recently debated topic in the social circle of the author of *Kevâkib-i Seb'a*. It cannot be that his remark concerning geography and geometry was related to the acute situation the Ottomans faced from "the enemy" outlined above, for the treatise had been completed two years earlier. When exactly this realization happened remains a question, but it is likely that a similar encounter could have taken place within the context of and during the war with the Austrians.

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uzaklıkların ölçülmesini temin eden alet, modern haritacılık tekniğinin ilk aletlerindendir." Halime Mücella Demirhan Çavuşoğlu, "Osmanlı Mesâha Literatürüne Genel Bir Bakış ve Bu Literatür İçerisinde Eğinli Nu'mân Efendi'nin Tebyînü A'mâli'l-Misâha İsimli Eserinin Yeri," *Dört Öge* no. 17 (2020): 99.

143 Nu'mân Efendi, *Tedbîrât-ı Pesendide*, 65–67, 83, 86–88.

144 Ibid., 89. Nevertheless, Polat and Çavuşoğlu inform that, in the introduction to his treatise, Numân Efendi claims to have written a book on geometry/measurement techniques that has never been seen before in the Islamic world: "Nu'mân Efendi, tabla aleti ile ilgili edindiği tecrübeleri, aletin yapım ve kullanımını, kullanımının dayandığı geometrik prensipleri *Tebyînü A'mâli'l-Misâha* ile kaleme almış böylelikle daha önce Nu'mân Efendi'nin ifadesi ile İslam diyarlarında hiç yapılmadığı şekilde mesâha uygulamalarının ilmini kitaplaştırmıştır (*Tebyînü A'mâli'l-Misâha*, vr.7a)." Polat and Demirhan Çavuşoğlu, "Mehmed Said Efendi'nin Misâha Risâlesi," 99.

145 Klaus Kreiser discusses this text and the passage on the Ottoman encounter with the European geodetical methods therein from this point of concern, and he offers such a reading too. Klaus Kreiser, "Wissenschaftswandel im Osmanischen Reich des 18. Jahrhunderts?" in *Europa und die Türkei im 18. Jahrhundert / Europe and Turkey in the 18th Century*, ed. Barbara Schmidt-Haberkamp (Göttingen: V & R Unipress, Bonn University Press), 433−446. And such line of orthogenetic arguing can also be found in the nineteenth century among the Ottoman intellectuals such as Namık Kemal and Ahmet Cevdet (though Neumann underlines his stance as not regarding the Islamic civilization as the source of all), see Christoph K. Neumann, *Araç Tarih Amaç Tanzimat: Tarih-i Cevdet'in Siyasi Anlamı*, trans. Meltem Arun (Istanbul: Tarih Vakfı Yurt Yayınları, 2000), 148−150. Neumann also refers to the eighteenth-century Egyptian historian Al-Jabartî within the same passage as another example. Ibid.

Concluding Remarks

We know that the Ottomans compared themselves with Europeans in new(er) terms and through new(er) lenses mainly to address the Ottoman stagnation from the beginning of the eighteenth century on,[146] and that the Ottomans, sometimes explicitly and sometimes implicitly, admired the scientific, technological and organizational competency of the Europeans.[147] It is clear that by the mid-eighteenth century one already knew that "such engineers" with "such engineering equipment" did not exist at the Ottoman capital. Similar observations and/or complaints continued to be verbalized in the following decades.[148] The author of *Kevâkib-i Seb'a* regarded *ilm* as a concept that formed his identity. Although his discourse is highly religious and relates knowledge to salvation, the part where he discusses the translation movement and the incorporation of non-Islamic sciences into Islamic scholarship, and the peculiar remark on geography and geometry, demonstrate his recognition that *ilm* was in fact not possible to be reduced to religion alone. Yet, the Ottoman discourse on knowledge was generally highly religious, i.e. woven with and into religious contextualizations, assumptions and interpretations. And since he associated his religion with all knowledge that existed, the status of Muslims as not-knowing was, for the author, unacceptable. Knowledge was a discursive and rhetorical concept which would usually be approached from a religiously and scholastically charged point of view, and which also shaped discourses on science(s). So, when the Ottoman deficiency in these sciences surfaced, the anonymous author tried to defend a religious identity that claimed to be the gatherer of all knowledge. Moreover, taking Ebu Sehl Numân Efendi's comment into consideration, the anonymous author's remark should not be taken as reflecting a conservative standpoint.[149] It is rather a result of an assertive rhetorical superiority's being woven into the representational narrative[150] in which claiming science/knowledge played an irreplaceable role. And it mattered a lot to whom the treatise or speech was addressed. The Ottomans would more easily and more often admit to each other the skills and knowledge which they lacked, and they would express their admiration for the Europeans at varying levels among each other.[151] This, however, was not the case when the addressee was a non-Ottoman.

146 Cf. Einar Wigen, *Turkey and the Concept of Europe: A Conceptual History* (Saarbrücken: VDM, 2010), 36−43; Göçek, *East Meets West*, 81.

147 Cf. e.g., Göçek, *East Meets West*, 57−60, et passim.

148 Cf. Virginia Aksan, "Ottoman Sources of Information on Europe in the Eighteenth Century," *Archivum Ottomanicum* 11 (1986): 5–16. "Geographical information was available through a number of channels: maps, translations of European atlases, and embassy reports. […] There is a very large map drawn on silk housed in the Archeology Museum Library, dated 1768, by 'Enderunlu Ressam Mustafa, on the staff of the Grand Vizier'. […] As part of a descriptive paragraph on one edge of the map, the cartographer notes 'Even though the area of the region known as Europe is small, it is worthy of respect because of the skill of its population in various arts and sciences (*funun* and *ulum*), especially in the science of geography, which ranks first." Ibid., 7.

149 On Ebu Sehl, cf. Faroqhi, "Materielle Kultur," 90.

150 We could perhaps speak of the "Ottoman pride" too. See and cf. Göçek, *East Meets West*, 10; Sievert, "Ebū Sehl Nu'mān," 398−401.

151 See and cf. Göçek, *East Meets West*, op. cit.

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