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Chapter 9

The Weekday Chemist: The Training of Aleksandr Borodin

Michael D. Gordin

On 3 July 1877 (N.S.), Aleksandr Porfir'evich Borodin (1833–1887), chemistry professor at the Medico-Surgical Academy in St. Petersburg, found himself on a scientific trip near Weimar, Germany, and wanted to pay homage to a great mentor he had never met. The object of his aspirations was not the local chemistry doyen, but Franz Liszt (1811–1886), piano virtuoso and mainstay of avant-garde musical composition. He managed to locate Liszt's house with some difficulty, and while waiting a few hours to be received he wandered around the local monuments to German cultural supremacy: the domiciles of Goethe, Schiller, and Herder. He was finally ushered in to see the Hungarian-born master, and his reception exceeded his wildest fantasies:

The majestic lively figure of the old man, with an energetic, attractive face, moved before me and spoke unceasingly, tossing questions at me. The conversation was now in French, now in German, skipping from one to the other each minute. When I told Liszt that I am properly a *Sonntagsmusiker* [Sunday musician], he even quipped: [*“aber Sonntag ist immer ein Feiertag”*] [but Sunday is always a holiday], and that “you have a complete right to ‘*Feiern*’”, i.e., to celebrate.¹

This episode quickly became legend. Borodin came to the master of modern composition (for the Russians scorned the alternative, Richard Wagner),

Abbreviations: *BorP*: A. P. Borodin, *Pis'ma: Polnoe sobranie, kriticheski sverennoe s podlinnymi tekstami*, ed. S. A. Dianin, 4 v. (Moscow: Gos. izd. muzykal'nyi sektor, 1927–1950); *TsGIASPB*: Central State Historical Archive of St. Petersburg. All dates are given in the old style Julian calendar, which lags 12 days behind the new-style Gregorian calendar in the nineteenth century. Exceptions are indicated by (N.S.). Transliterations follow a modification of the standard Library of Congress format, with the exception of Cui. All unattributed translations are mine. I would like to thank Michael S. Mahoney, Caryl Emerson, and Simon Morrison for valuable comments on an earlier draft of this essay.

¹ Borodin to E. S. Borodina, 3 July [1877] (N.S.), *BorP*, II, 133.

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confessed his amateur status, and was welcomed.² For the remainder of his life, Liszt was an active supporter of the so-called "New Russian School" of music, arranging for concerts of the work of Borodin and his like-minded peers across Western Europe. Propagandist for Russian art Vladimir Vasil'evich Stasov (1824–1906) insisted that Borodin take precious time away from composition and write up his encounter for a Russian journal.³ This was the stuff of mythmaking, and Stasov was not about to let it slip.

Several features of the Borodin-Liszt encounter have made it a mainstay of the collective hagiography of Borodin, especially the enthusiastic reception of Russian music by elite foreigners and Borodin's casual attitude towards his craft. One might just as well stress other features of the encounter: that Borodin was abroad on a chemist's errand; the profusion of foreign languages and the play of national identity, central for the Hungarian-born and French-educated composer of German ancestry ("He speaks both languages [French and German] excellently, loudly, in lively fashion, with excitement, quickly, and a great deal;—one might think that he is a Frenchman")⁴; and the vital role of Vladimir Stasov in shaping the account. What follows does not pretend to be a comprehensive biography; it is, rather, a focused depiction of the central role of *training* as a category to reformulate the central dilemma that has perpetually obsessed writers on Borodin: how does one reconcile the fact that he was both a scientist and an artist, a chemist and a composer? A profusion of articles, primarily in medical and chemical journals, portray Borodin's life as a problem of "double vocation": his biographers must decide which career—chemistry or music—was the "true" one, and which merely a distraction.⁵

² Liszt was the undisputed leader of the avant-garde in the 1850s, but the torch passed quite decisively to Wagner a decade later. See Alan Walker, *Franz Liszt: The Weimar Years, 1848–1861* (Ithaca: Cornell University Press, 1989), 336.

³ Borodin wrote the first draft of the piece as "Moi vospominaniia o Liste" in June–July 1878, reproduced in *BorP*, III, 13 ff. It was printed in *Iskusstvo* in 1882 as "List u sebia v Veimare (iz lichnykh voospominanii A. P. Borodina)," reprinted in *BorP*, IV, 14 ff. On Stasov's role, see Stasov to Borodin, 6 February [18]78, reproduced in S. A. Dianin, *Borodin: Zhizneopisanie, materialy i dokumenty* (Moscow: Gosudarstvennoe muzykal'noe izd, 1960), 212. See also David Lloyd-Jones, "Borodin on Liszt," *Music and Letters* 42 (1961): 117–126; Alfred Habets, *Borodin and Liszt*, tr. Rosa Newmarch, 2d. ed. (London: Digby, Long & Co., [1895]); and Louise Cruppi, "Borodin and Liszt," *The Living Age* 312 (11 March 1922): 600–605. For Liszt's musical influence on the "New Russian School," see Gerald E. H. Abraham, *On Russian Music* (New York: Charles Scribner's Sons, 1939), Chapter 7.

⁴ Borodin to E. S. Borodina, 3 July [1877] (N.S.), *BorP*, II, 135.

⁵ All of the medical and chemical articles on Borodin, even the best, consist to at least some degree of read-write evidence: an author reads a story in the secondary literature and promptly writes it down without trying to check its veracity against the historical evidence. A selection of the historiography, in no particular order, is: "A. P. Borodin (1834–1887)," *Nature* 134 (1934): 727; "Professor Borodin," *Lancet* (19 March 1887): 601; F. William Sunderman, "Alexander Porfir'evich Borodin: Physician, Chemist and Composer," *Annals of Medical History* 10 N.S. (1938): 445–453; Torstein Vik, "Aleksandr Borodin—lege, kjemiker, vitenskapsmann, lærer og komponist," *Tidsskrift for Den norske lægeförening* 30 (1998): 4693–4696; Peter J. Davies, "Alexander Porfir'evich Borodin (1833–1887): Composer, Chemist, Physician,

By the end of this account I propose to explain *why* this particular question dominates the literature. The root cause of this skewed focus on this single issue can be laid at the door of Vladimir Stasov. For Stasov, Borodin was above all the composer of two symphonies, twelve songs, a symphonic poem, two string quartets, and an unfinished opera, *Prince Igor*—the last of which accounts for the bulk of his reputation both in Russia and in the West (where his music formed the score of the hit musical *Kismet*, which won the Tony Award in 1954). For Stasov, and for historians since, the main issue to be resolved is why Borodin wrote so little, why he sacrificed his "true vocation" of music to his chemistry. But a glance at his chemical productivity also shows a paucity of publications, with a grand total of about 20 works, almost all pre-dating 1872, leaving the last fifteen years of his life unfettered by chemistry. The problem here stems from essentializing the notion of "vocation," as if there were some

and Social Reformer," *Journal of Medical Biography* 3 (1995): 207–217; Igor E. Konstantinov, "The Life and Death of Professor Alexander P. Borodin: Surgeon, Chemist, and Great Musician," *Surgery* 123 (1998): 606–616; E. Lee Strohl, Robert W. Jamieson, and W. G. Dieffenbaugh, "Physician-Musicians," *Perspectives in Biology and Medicine* 17 (Winter 1974): 267–285; George Sarton, "Borodin (1833–1887)," *Osiris* 7 (1939): 225–260; K. N. Zelenin and N. I. Liashenko, "Aleksandr Porfir'evich Borodin (K 150-letiiu so dnia rozhdeniia)," *Voenno-meditsinskii zhurnal* 11 (1983): 66–69; Iu. V. Ionov and A. Iu. Ionov, "A. P. Borodin—vrach, khimik, pedagog (K 150-letiiu so dnia rozhdeniia)," *Sovetskoe zdryavookhranenie*, 1 (1984): 61–64; Clive B. Hunt, "Aleksandr Borodin: Chemist and Composer," *Chemistry in Britain* 23(6) (1987): 547–550; Walter Kwasnik, "Der Komponist Alexander Borodin (1834–1887) als Chemiker: Zur Wiederkehr seines Todestages am 28.2.1967," *Chemiker-Zeitung/Chemische Apparatur* 91 (1967): 312–313; George B. Kauffman, "Syntheses and Symphonies," *The World & I* 3 (January 1988): 206–211; idem, "Russia's Aleksandr Borodin: Many Gifts, Many Callings," *Industrial Chemist* 8(1) (1987): 40–43; George B. Kauffman, Yurii Ivanovich Solov'ev, and Charlene Steinberg, "Aleksandr Porfir'evich Borodin (1833–1887)," *Education in Chemistry* 24 (September 1987): 138–140; Martin Sherwood, "A Russian of Many Octaves," *New Scientist* 100 (10 November 1983): 424; Jan Smaczny, "Alexander Borodin," *BBC Music Magazine* 5 (May 1998): 46–49; Maurice Schofield, "Borodin—Chemist and Composer," *Chemistry* 49(8) (October 1976): 13–14; Desmond O'Neill, "... aber Sonntag ist immer ein Feiertag: Alexander Borodin, MD, 1833–1887," *Journal of the Royal Society of Medicine* 81 (October 1988): 591–593; Charlene Steinberg, "The Scientific Activities of Aleksandr Borodin," *CHEM TECH* 1 (August 1971): 473–475; Hope Stoddard, "Borodin, Genius in Double Harness," *Musical Opinion* 57 (1934): 502–503; Edmund Yochum, "Symphonies and Syntheses," *The Science Counselor* 7 (1942): 42–43, 59–60; A. D. White, "Alexander Borodin: Full-Time Chemist, Part-Time Musician," *Journal of Chemical Education* 64 (April 1987): 326–327; Erica Kidson, "Alexander Borodin, 1833–1887," *Canon* (June 1955): 423–426; Jerzy Chodokowski, "Aleksander Borodin jako chemik," *Wiadomości Chemiczne* 8 (1954): 369–373; James C. Cole, "Alexander Borodin, the Scientist, the Musician, the Man," *Journal of the American Medical Association* 208(1) (7 April 1969): 129–130; Frederick H. Getman, "Alexander Borodin—Chemist and Musician," *Journal of Chemical Education* 8(9) (1931): 1763–1780; Susan E. Harman, "Alexander Borodin: Medical Educator, Chemist, Composer," *Maryland Medical Journal* 36 (1987): 445–450; Harold B. Friedman, "Alexander Borodin—Musician and Chemist," *Journal of Chemical Education* 18 (1941): 521–525; and William B. Ober, "Alexander Borodin, M.D. (1833–1887): Physician, Chemist, and Composer," *New York State Journal of Medicine* 67 (15 March 1967): 836–845.

kind of mark of Cain on Borodin's forehead that could have told him what his true career was. Borodin was employed as a chemist, taught at a medical school, wrote music, organized women's medical education, and in general partook of the vibrant intellectual life of post-Great Reforms Petersburg. Instead of accepting the categories established in Borodin's obituary by Stasov, we should return to his voluminous and beautifully styled correspondence to observe how he self-consciously understood his unusual life.⁶ Borodin's tubercular wife spent her winters in Moscow while her husband worked in Petersburg, and he wrote to her several times a week chronicling his activities. These letters form an amazing panorama of the musical, scientific, and other cultural spheres in which the man moved—and one in which he steadfastly refused to make precisely the “vocational” distinctions Stasov later imposed on him. Instead, one finds the leitmotif of *training*—the process which creates vocations—as a way of understanding Borodin's cultural peregrinations.

9.1 The Random Walk from Chemistry to Music

Borodin's life was colorfully atypical from the moment of his birth. He was born on 31 October 1833, in St. Petersburg, a royal bastard. His father, Luka Stepanovich Gedianov (1772–1843), was an Imeretian prince from Transcaucasia, suitably Russified and living in the center of Petersburg, who sired young Aleksandr with his maid, Avdot'ia Konstantinovna Antonova, a soldier's daughter from Narva who was 24 at the time. In order to establish legitimacy, Borodin was registered as the son of Gedianov's valet, Porfirii Ionovich Borodin, and his wife Tat'iana Girgor'evna Borodina—which technically meant that the boy was a serf. His biological mother—whom he called “auntie (*tetushka*)” for the rest of her life—took charge of his education at home, having him tutored in German (by Fräulein Luischen, a housekeeper), French (by Béguin, who taught at the Lycee), and in English (by John Roper, who served as a governor at a commercial school).⁷ He was registered as a free serf on 3 November 1849, and the next year, at age 17, his mother attempted to register him as a student at St. Petersburg University. This proved abortive, but she managed to enroll him as a student at the Medico-Surgical Academy on the Vyborg Side of Petersburg—largely because her current beau, F. A. Fedorov, knew the inspector, Il'inskii, who directed admissions there. Antonova, married

⁶ The original Borodin template essay is V. Stasov, “Aleksandr Porfir'evich Borodin,” *Istoricheskii Vestnik* 28 (1887): 137–168; reprinted in V. Stasov, *Izbrannye sochineniia*, 3 v. (Moscow: Iskusstvo, 1952), 329–365. All quotations come from the original published article. Stasov had already begun to shape the story in the days after Borodin's death with a brief obituary in a newspaper: V. Stasov, “Aleksandr Porfir'evich Borodin: Nekrolog,” *Novoe Vremia*, 17 February (1 March) 1887, #3940: 3. Many later biographies betray explicitly or through their footnotes that they are entirely derived from this one ur-source for biographical information.

⁷ This information is heavily emphasized by Stasov in “Aleksandr Porfir'evich Borodin,” 138–139.

as of Spring 1839 to retired physician Kh. I. Kleineke, moved her family to Aleksandr's new neighborhood.⁸

The Medico-Surgical Academy turned out to be a propitious choice. It was, primarily, a military medical school, and this is the training Borodin received. The Academy was founded by Imperial charter on 18 December 1798, under the reign of Tsar Paul, and in its early years it mostly enrolled the children of foreigners. It continued in a kind of administrative limbo, shuttling between the Ministry of Internal Affairs, the Ministry of Popular Enlightenment, and the Army (its final home), during its first half century.⁹ In 1854 construction began on a new chemistry laboratory to be stocked with imported instruments. There were still a great many foreigners at the moment when Borodin enrolled. According to his half-brother, in an account he gave to Stasov, Borodin's “closest comrades [at the Academy] were, for the most part, all German students, which was especially strongly facilitated by the antipathy of our mother to Russians, whom she (although also Russian, but originally from Narva) did not approve of ‘for the rudeness of [their] manners.’”¹⁰

Certainly the most significant move Borodin made at the Academy was to approach his chemistry professor, Nikolai N. Zinin, and ask to perform experiments in his laboratory as training for a career in chemistry. Zinin's imprint on the young man—from taking him in, directing his specialization in precisely the same areas of experimental organic chemistry he himself studied, sending him off to Heidelberg for further study, and even apparently controlling issues of his personal toilet—is hard to overemphasize.¹¹ The role of Zinin was so prominent that several psychobiographers since have cast Zinin as the first of a series of “father figures” by which Borodin sought to replace his biological father—absent by death, illegitimacy, and his mother's dominance.¹²

⁸ The biographical particulars here and in what follows are drawn from the most reliable Soviet-era biographies of Borodin: N. A. Figurovskii and Yu. I. Solov'ev, *Aleksandr Porfir'evich Borodin: A Chemist's Biography*, tr. Charlene Steinberg and George B. Kauffman (New York: Springer-Verlag, 1988); Dianin, *Borodin*; A. P. Zorina, *Aleksandr Porfir'evich Borodin* (Moscow: Muzyka, 1987). On issues of interpretation, however, all these sources follow the basic structure offered by Stasov. A recent Dutch dissertation has attempted to fill in many of these lacunae: Willem Vijvers, “Alexander Borodin: een biografische studie” (Ph.D. dissertation, University of Amsterdam, 2007).

⁹ G. Skorichenko, “Mediko-Khirurgicheskaiia Akademiia, v vedenii Meditsinskoi kollegii i Ministerstva Vnutrennikh Del, ot osnovaniia do vvedeniia pervago ustava eia, 1798–1808 g.,” in Ivanovskii, ed., *Istoriia Imperatorskoi Voenno-Meditsinskoi (byvshei Mediko-Khirurgicheskoi) Akademii za sto let, 1798–1898* (St. Petersburg: Tip. Ministerstva Vnutrennikh Del, 1898): 41–154.

¹⁰ Quoted in Stasov, “Aleksandr Porfir'evich Borodin,” 142.

¹¹ On the micromanagement of Borodin's personal life, see A. P. Dianin, “Aleksandr Porfir'evich Borodin: Biograficheskii ocherk i vospominanii,” *Zhurnal Russkogo Fiziko-Khimicheskogo Obshchestva* 20, khim. ch. (1888): 367–379, on 369.

¹² A. Sokhor, *Aleksandr Porfir'evich Borodin: Zhizn', deiatel'nost', muzykal'noe tvorchestvo* (Moscow: Muzyka, 1965), 45; Bärbel Zaddach-Dudek, “A. P. Borodin—russischer Musiker und Naturwissenschaftler im 19. Jahrhundert,” in Aloys Henning and Jutta Petersdorf, eds.,

According to an account which is presented only by Stasov, and appears nowhere else in Borodin's writings—including a lengthy obituary for Zinin that he penned in 1880—Zinin once tried to dissuade Borodin from his musical activities, encouraging him to focus on his chemical studies, declaring: "Mr. Borodin, busy yourself less with [musical] romances—I am placing all my hopes in you, that you will be my deputy, and you all the time think about music and two hares [i.e., try to catch two hares simultaneously and you will end up with neither—MG]."¹³ Absolutely no contemporary refers to this anecdote in any context except by citing Stasov, and therefore it is highly likely that this is an apocryphal embellishment—a supposition also suggested by Stasov's use of the unusual idiomatic expression in his correspondence.¹⁴ This quotation is the sole source of evidence for the claim that chemists disapproved of Borodin's musical activities. On no other occasion did any chemist—either to Borodin or to a third party—suggest he give up his music or any of his other activities. They were, of course, enthusiastic about Borodin's chemical research, and lamented that he did not complete more of it.

Borodin graduated on 25 March 1856 and served briefly as a physician at the Second Infantry Hospital (where he happened across Modest Musorgskii as an army officer, an inconsequential encounter at the time that was later exaggerated by Stasov), but he preferred to pursue a career in chemistry and not medicine. Borodin returned to work with Zinin, and defended his dissertation—the first in the history of the Academy written and defended in Russian (not Latin)—"On the Analogy of Arenous Acid with Phosphoric Acid in Its Chemical and Toxicological Relations," on 3 May 1858. (He later would obtain a master's in chemistry from St. Petersburg University while working in Zinin's lab at the Medico-Surgical Academy.)¹⁵ Borodin had already been abroad once, escorting the distinguished oculist Ivan Ivanovich Kabat to an international ophthalmological congress in Brussels, and which he used to visit

Wissenschaftsgeschichte in Osteuropa: Europa literarum artiumque scientiam communicans (Wiesbaden: Harrassowitz, 1998), 87–100; and R. P. LaCombe's theory as reported in George B. Kauffman and Kathryn Bumpass, "An Apparent Conflict between Art and Science: The Case of Aleksandr Porfir'evich Borodin (1833–1887)," *Leonardo* 21 (1988): 429–436, on 434. Stasov stoked these flames: "[Zinin] considered [Borodin] his spiritual son, and Borodin from his side considered him a second father." Stasov, "Aleksandr Porfir'evich Borodin," 149.

¹³ Quoted in Stasov, "Aleksandr Porfir'evich Borodin," 144.

¹⁴ In a discussion of César Cui, Stasov snapped: "Go after two hares—and you won't catch one." Stasov to Balakirev, 3 September 1886, in M. A. Balakirev and V. V. Stasov, *Perepiska*, 2 v., ed. A. S. Liapunova (Moscow: Muzyka, 1970–1971), II, 88.

¹⁵ See the correspondence regarding permission to take his master's exam: A. Borodin to rector of St. Petersburg University Aleksandr Pletnev, 23 March 1859, TsGIASPB f. 14, op. 1, d. 5983, l. 1; Pletnev to Dean of Physico-Mathematical Faculty of St. Petersburg University Emilian Khristianovich Lenz, 29 May 1859, TsGIASPB f. 14, op. 3, d. 14709, ll. 51–51ob.

chemistry laboratories (such as Marcellin Berthelot's) in Paris.¹⁶ Zinin believed that a postdoctoral trip to study abroad would be beneficial for the development of young Borodin's chemical career, and he arranged for him to embark on a subsidized three-year stay in Heidelberg (and incidentally also in Paris and Pisa).¹⁷ Upon his return a position at the Medico-Surgical Academy quickly materialized. Borodin was appointed an adjunct at the Academy in October 1862 and was already promoted to adjunct professor on 8 December 1862, and to full professor on 15 April 1864. There he remained until his death twenty-three years later.

The account above portrays a career that is primarily chemical. What about the music? One does not, of course, become a renowned composer overnight, and Borodin had—according to reliable evidence beyond Stasov's obituary—plenty of exposure to music in his youth. He learned how to play piano quite young, at the insistence of his mother, and by 1850 he and his close friend in all things musical, Mikhail Shchiglev, were brought by a violinist friend, Petr Ivanovich Vasil'ev, into amateur chamber musician I. I. Gavrushevich's circle.¹⁸ Borodin's musical activities, essentially confined to romances—some of them published, probably through a family friend, in 1849—and halting ventures into chamber music, continued into his stay at Heidelberg. He even wrote four songs while a student at the Academy from 1852 to 1855. Much of this juvenilia remains unpublished and Borodin himself almost never referred to these pieces.

His musical career began at a chance meeting at a *kruzhok* (discussion circle) of his colleague at the Medico-Surgical Academy, Sergei Petrovich Botkin, soon to become one of the most distinguished Russian clinical physicians of the second half of the nineteenth century. In late November or early December 1862, at one of the regular Saturday night meetings around 9 pm, Borodin met Milli Alekseevich Balakirev (1836–1910), a local amateur musician who was also a rather hypochondriac patient of Botkin's.¹⁹ Balakirev would form the fulcrum around which Borodin pivoted into the musical world, and it is to this world that we now follow him (although it behooves us to keep in mind that this connection was made by virtue of the Medico-Surgical Academy).

Borodin entered Balakirev's circle at a time of tremendous ferment in musical Petersburg, developments that were intimately tied to the liberalization and

¹⁶ Borodin to his mother (Avdot'ia Konstantinovna Kleineke), 15 August 1857, *BorP*, I, 27–28; Dianin, *Borodin*, 40.

¹⁷ For more on the circle of Russian chemists in Heidelberg, see Michael D. Gordin, "The Heidelberg Circle: German Influences on the Professionalization of Russian Chemistry in the 1860s," *Osiris* 23 (2008): 23–49.

¹⁸ Zorina, *Aleksandr Porfir'evich Borodin*, 23.

¹⁹ Balakirev thought very highly of Botkin, and mentioned him in his correspondence with Stasov on several occasions. (He did not, however, remark on meeting Borodin there; the Botkin historiography maintains a similar silence on the matter.) See Balakirev to Stasov, 31 March 1862 and 29 April 1862, in Balakirev and Stasov, *Perepiska*, I, 184–185.

professionalization that characterized the Great Reforms.²⁰ In the 1850s there were two opera companies in Petersburg and several concert series, most of them administered by the Imperial Theater Directorate, a department in the Ministry of the Imperial Court, which had held the official monopoly on public entertainment in the winter season since Alexander I instituted the system in 1803 (it was abolished in 1882 by Alexander III). The central feature of the Petersburg music scene in the 1850s was the dominance of foreign musicians and musical instructors, mostly Italians (vocal) and Germans (piano).²¹ In 1859, pianist and composer Anton Rubinstein (of Jewish heritage but a baptized Orthodox Christian) formed the Russian Musical Society with several associates. Rubinstein's goals were threefold: an annual concert series; civil status to be granted to musicians under the "free artists" clause of the Table of Ranks; and a Western-style conservatory in St. Petersburg. These goals might seem uncontroversial from our perspective, but they were all positions that called for the establishment of music as a *profession* in Petersburg molded on the prevailing German standards of the musical world, and thus drew fire from self-styled amateur composers: first from the Wagnerian Aleksandr Serov (1820–1871), and then from the circle surrounding Balakirev, dubbed the "New Russian School" and somewhat ironically as the "Mighty Little Heap (*moguchaia kuchka*)" at home and the "Mighty Five" abroad, terms which I shall use interchangeably.²²

²⁰ Much of what follows is drawn from the excellent studies: Robert C. Ridenour, *Nationalism, Modernism and Personal Rivalry in Nineteenth-Century Russian Music* (Ann Arbor: UMI Research Press, 1981); Richard Taruskin, *Defining Russia Musically: Historical and Hermeneutical Essays* (Princeton: Princeton University Press, 1997); idem, *Opera and Drama in Russia: As Preached and Practiced in the 1860s* (Rochester, New York: University of Rochester Press, 1993 [1981]); Sigrid Neef, *Die Russischen Fünf: Balakirew—Borodin—Cui—Musorgskii—Rimski-Korsakow: Monographien—Dokumente—Briefe—Programme—Werke* (Berlin: Ernst Kuhn, 1992); and A. Gozenpud, *Russkii opernyi teatr XIX veka (1857–1872)* (Leningrad: Muzyka, 1971).

²¹ This foreign dependence persisted into the 1860s, as noted by music critic G. A. Larosh: "Musical Russia even now is nothing but a colony of Germany: all our musical activity, with the exception of the most insignificant in volume—composition—is in the hands of Germans; our pianists, a class of musicians predominant in our times, are almost exclusively Germans; kappelmeisters, teachers, finally instrumental masters and sellers of notes are again Germans, seizing among us all the steps of the musical hierarchy from brilliant virtuosity to humble craftsmanship. However, it is more influential than one usually thinks. Germans don't only materially control our music, but they morally influence it in terms of its national character." Larosh, "Glinka i ego znachenie v istorii muzyki (1867–1868)," in Larosh, *Izbrannye stat'i*, 4 v. (Leningrad: Muzyka, 1974–1977), I, 33.

²² On Rubinstein's stance toward professionalism and its casting by his opponents as sycophancy to the Germans, see Taruskin, *Defining Russia Musically*, 123. For a sympathetic interpretation of Serov, see Taruskin, *Opera and Drama in Russia*.

The Mighty Five defined the first decade of Borodin's musical life, a decade centered on the person of Mili Balakirev.²³ Balakirev had moved to St. Petersburg from his native Nizhnii Novgorod in 1855, not yet nineteen years old and by training a mathematician. The following year he met the Stasov brothers, Vladimir and Dmitrii, and the three of them formed a *kruzhok* that centered around their shared passion for the music of Mikhail Glinka (1804–1857). They were soon joined by César Cui (1835–1918; of French and Lithuanian parentage), a fortification engineer and composer who in 1857 brought a young military officer—Modest Musorgskii (1839–1881)—into the fold, whom he had in turn met at the house of Glinka's *Doppelgänger* in Russian musical composition, Aleksandr Dargomyzhskii (1813–1869). In November 1861 a piano teacher introduced his student, a naval cadet named Nikolai Rimskii-Korsakov (1844–1908), to Balakirev for further training. They were joined by Aleksandr Borodin in 1862, the oldest by far at the ripe age of 28. This was a group built around the institutions of the *kruzhok*, and was characterized by the fact that all of the members initially earned their livings from careers other than music. By the mid-1870s, the only members of the rapidly dissolving Five who were still engaged in "double careers" were Cui and Borodin—the latter often marked by his career among the group through references to him as "the alchemist," "the chemical gentleman," and "the chemical brigand."²⁴

Musical relations among the group were far from equal. Balakirev was clearly the leader, treated by all as the undisputed authority on issues of orchestral music, while Cui was deemed the master of opera.²⁵ Stasov—the only close member of the group who did not compose original music—assumed the role of chief ideologue, having already shaped many of Balakirev's views, although the public dissemination of those views devolved to Cui, who served as the music critic for the *St. Petersburg News*. (It was only after Cui ceased to perform this role in the mid-1870s that Stasov assumed the mantle).²⁶ The content of the group's musical ideology has long been a subject of some dispute. Officially, it was couched in the language of "nationalism"—although that

²³ On Balakirev, see E. Frid, "Mili Alekseevich Balakirev (1837–1910)," in E. L. Frid, ed., *Mili Alekseevich Balakirev: Issledovaniia i stat'i* (Leningrad: Gos. muzykal'noe izd., 1961), 5–75; Edward Garden, *Balakirev: A Critical Study of His Life and Music* (London: Faber and Faber, 1967); and Evgenii Gippius, "M. Balakirev—sobiratel' russkikh narodnykh pesen [I–II]," *Sovetskaia muzyka*, 4 (1953): 69–76; 5 (1953): 61–67.

²⁴ See, respectively, V. V. Stasov, *Pis'ma k rodnym*, 3 v. (Moscow: Gos. muzykal'noe izd., 1954–1962), I(ii), 78; and Modest Petrovich Musorgskii, *Literaturnoe nasledie*, eds. A. A. Orlova and M. S. Pekelis (Moscow: Muzyka, 1971), 101 and 118.

²⁵ The infantilization of the other three was deeply resented by Rimskii-Korsakov in his highly subjective account, *Letopis' moei muzykal'noi zhizni (1844–1906)*, 3d. ed. (Moscow: Gos. izd. muzykal'nyi sektor, 1926), 79.

²⁶ A. K. Lebedev and A. V. Solodovnikov, *Vladimir Vasil'evich Stasov: Zhizn' i tvorchestvo* (Moscow: Iskusstvo, 1966), 39. Borodin stepped in thrice and wrote anonymous concert reviews in the late 1860s in Cui's stead. These are reprinted in A. P. Borodin, *Kriticheskie stat'i*, 2d. rev. ed. (Moscow: Muzyka, 1982).

would seem to preclude Cui's position on the side of the angels and the placement of Petr Il'ich Chaikovskii (1840–1893) on the Rubinstein side.²⁷ The Five ostensibly based their music on folk tunes, but so did Chaikovskii; meanwhile they waxed enthusiastic for Franz Liszt or Hector Berlioz.²⁸ I will postpone the problem of teasing out the content of the ideology for now, to return to it later in one specific aspect which reflects many of its other features: the issue of musical training.

Training was in fact a central feature of the public institution associated with the Five (much as the Russian Musical Society was associated with Rubinstein); the Free Music School, created by Balakirev and his associate Gavriil Lomakin on 18 March 1862. Lomakin had originally managed to constrain Balakirev's propagandistic use of the School, but ended up retiring on 28 January 1868. This left Balakirev in charge of almost all non-state musical events in the capital. For on 16 July 1867 Rubinstein, due to conflicts with the Musical Society's primary patron, Grand Duchess Elena Pavlovna, resigned as director of the Society's concert series, and Balakirev—his arch-nemesis—was appointed in his stead. Balakirev's reign over both the Free Music School and the Russian Musical Society did not last long (he was dismissed in 1869). From 1872 to 1877 Balakirev withdrew into increasingly archaic religiosity, cutting off contact with all of his former musical friends, with the partial exception of Borodin.

Borodin saw this dissolution of the Five to be a natural process. In the beginning, he recalled, when they were all "in the position of eggs under a brood hen (I mean under Balakirev), we were all more or less close."²⁹ Writing to reassure a friend, he argued that the separation of the group was more an expression of the success of the initial group than its complete disintegration:

We do not understand the words "the collapse of the circle" entirely identically. After all, you also find among us great differences, and you even say that the works of each of the circle's members are so different and varied in character and spirit, and so on, but isn't this what the fact of "collapse" expresses[?]. . . And if I find such a collapse to be natural, then that is only because this is how it always happens in all areas of human activity. In the degree of the development of activity, individuality begins to take

²⁷ Cui would not always be considered fully of the group. After the collapse of the Five, Borodin would write of him: "Tell the truth, for all his advantages, he is still not a *Russian* person and not a *Russian* composer; he doesn't understand properly *Russian* music, he likes it only insofar as it is *good* music in general; he doesn't at all feel, value, or understand the national streak." Borodin to E. S. Borodina, 20 November 1886, *BorP*, IV, 217. Emphasis in original. For more on the rise and fall of Cui—certainly the most obscure member of the group to concert-goers today, although perhaps the most visible and popular of them in terms of opera composition in the 1860s, see Taruskin, *Opera and Drama in Russia*, Chapter 6. On the peculiarity of excluding Chaikovskii, see Vladimir Fédorov, "Čajkovskij, Musicien Type du XIXe siècle?" *Acta Musicologica* 42 (1970): 59–70; and Georg Knepler, "Čajkovskij, Musicien Type du XIXe siècle?" *Acta Musicologica* 43 (1971): 205–235.

²⁸ These issues are usefully discussed in Ridenour, *Nationalism, Modernism, and Personal Rivalry in Nineteenth-Century Russian Music*.

²⁹ Borodin to Liubov' Ivanovna Karmalina, 15 April 1875, *BorP*, II, 89.

precedence over the school, over what a person inherited from others. *Eggs which a hen carries all resemble each other; the chickens which come forth from the eggs are already less similar, and they grow up, such that they don't at all resemble each other—from one emerges an impassioned black rooster, from another a peaceful white hen. Same thing here. The general musical stamp, the general manners, proper to the circle remained, as in the above example the general generic and visible signs of the species of chickens remains, and then each of us, as every grown-up rooster or hen, has his own personal character, his individuality. And thank God!*³⁰

To put it another way, their training was complete.

How he used that training was another issue entirely. Issues of both the quantity and the quality of Borodin's musical writing were live ones for his contemporaries, as they have been for scholars since. Borodin's few compositions were across the map in terms of genre, but in each genre—particularly the string quartet and the symphony—Borodin clung doggedly to old models, such as the sonata form of symphonic structure. In terms of innovations in both structure and music theory—strong points for Russian music in general—Borodin was (in all but his musical politics) among the conservatives.³¹ While his friends may have looked askance at the lack of novelty in his compositions, they were quick to defend him in terms of quantity. Less, they claimed, was certainly more for the New Russian School. The less Russian composers wrote—and Borodin was their prime example—the better each individual work was.³²

While Borodin left quite a limited legacy, it was essentially all of high quality.³³ The quantity, however, was meager, and this was attributed to lack of time. Borodin himself lamented the scarcity of time for composition: "In winter I can only write music when I am so ill that I don't give lectures, don't go to the laboratory, yet all the same can work a little. For this reason my musical friends, contrary to universal custom, always wish me not health, but sickness."³⁴ That said, he undertook no efforts to rearrange his commitments to allow more time for composition. It remained something he did when the occasion presented itself. What resulted were brief ventures in almost every

³⁰ Borodin to Liubov' Ivanovna Karmalina, 1 June 1876, *BorP*, II, 107–108. Ellipses added; emphasis in original.

³¹ M. Ivanov, "Muzykal'nye nabroski," *Novoe Vremia*, 23 February (7 March) 1887, #3946: 2. On innovation in theory, see Gordon D. McQuere, *Russian Theoretical Thought in Music* (Ann Arbor: UMI Research Press, 1983).

³² Cui, "A. P. Borodin," *Nedelia*, 1 March 1887, #9: 287–293, on 289.

³³ Understandably, most biographies of Borodin emphasize his music. The best of these are the two produced for the Grove Dictionary: Gerald Abraham and David Lloyd-Jones, "Alexander Borodin," in *The New Grove Russian Masters 1* (New York: Macmillan, 1986): 43–74; and the extremely thorough and authoritative Robert William Oldani, "Borodin, Aleksandr Porfir'evich," *Grove Music Online*, ed. L. Macy (Accessed 5 December 2003), <<http://www.grovemusic.com>>. See also Igor' Belza, *A. P. Borodin* (Moscow: Muzgiz, 1944); and Iv. Remezov, *A. P. Borodin: K 125-letiiu so dnia rozhdeniia* (Moscow: Gos. muzykal'noe izd., 1958).

³⁴ Borodin to Liubov' Ivanovna Karmalina, 1 June 1876, *BorP*, II, 108.

genre of music explored by the New Russian School. His most numerous works are his twelve mature songs, six of whose words he composed himself, and eight of which were published in his lifetime.³⁵ Much more widely known are his two symphonies—in E-flat (composed 1862–1867) and in B (1869–1876)—accompanied by a third symphony (in A), only two movements of which were completed at his death and were later orchestrated by Glazunov.³⁶ Borodin, alone of the Five, took chamber music seriously even in his mature period, and composed two string quartets (in A [1874–1879] and D [1881]), the second of which is still widely played in repertoires both in Russia and abroad.³⁷ Of his orchestral music, however, the most widely appreciated—both at the time and since—is his symphonic poem, “The Steppes of Central Asia,” with its peaceful musical confrontation and synthesis of both Russian folk themes with Oriental ones. This piece was one of twelve commissioned to accompany a production of tableaux vivants celebrating a quarter century of Tsar Alexander II’s reign in 1880.³⁸

By far Borodin’s most famous composition, and the one that has drawn the greatest amount of attention from musicologists, is his posthumous opera, *Prince Igor*, in particular the Polovtsian Dances drawn from it.³⁹ The idea for turning the unique twelfth-century poetic epic *Tale of Igor’s Campaign*—which chronicles the defeat in battle of Russian troops against Polovtsian forces—into an opera, as well as a plan of scenes, clearly lay with Stasov. Borodin’s only worry was his competence to undertake the project: “Will I have the strength for

³⁵ For discussion, see César Cui, *Russkii romans: Ocherk ego razvitiia* (St. Petersburg: N. F. Findeizen, 1896), 69–76; Gerald Abraham, “Borodin’s Songs,” *Musical Times* 75 (November 1934): 983–985; Terence Kelly, “The Songs of Aleksandr Borodin,” *Journal of Singing* 524 (March–April 1996): 3–12.

³⁶ See Gerald Abraham, “Borodin as a Symphonist,” *Music & Letters* 11 (1930): 352–359.

³⁷ See Albrecht Gaub and Melanie Unseld, *Ein Fürst, zwei Prinzessinnen und vier Spieler. Anmerkungen zum Werk Aleksandr Borodins* (Berlin: Ernst Kuhn, 1994), 109–111; and Edward Garden, “The ‘Programme’ of Borodin’s Second Quartet,” *Musical Times* 128 (1728) (February 1987): 76–78.

³⁸ For discussion of these pieces, as well as their “program” of a meeting of caravans in the desert, see Oldani, “Borodin”; and Neef, *Die Russischen Fünf*, 88. The issue of Borodin’s Orientalism is a vast one. See Gerald Abraham, “Arab Melodies in Rimsky-Korsakov and Borodin,” *Music and Letters* 56 (1975): 313–318; idem, *On Russian Music*, Chapter 6; and Willi Kahl-Köln, “Die russischen Novatoren und Borodin,” *Die Musik* 15(1923): 733–738, on 737.

³⁹ On the composition of the opera, see: Harlow Robinson, “If You’re Afraid of Wolves, Don’t Go into the Forest”: On the History of Borodin’s *Prince Igor*,” *Opera Quarterly* 7 (1990/1991): 1–12; Marek Bobéth, *Borodin und seine Oper “Fürst Igor”: Geschichte—Analyse—Konsequenzen* (Munich: Musikverlag Emil Katzschler, 1982); Gerald E. H. Abraham, *On Russian Music* (New York: Charles Scribner’s Sons, 1939), Chapter 12; “Borodin, Alexander Porfir’yevich,” *The New Grove Dictionary of Opera*, ed. Stanley Sadie (4 vol.) (New York: Macmillan Press, 1992): I, 560–561; and Ludolf Müller, “Fürst Igor im altrussischen Heldenlied und in der Oper Borodins,” in Ernst Kuhn, ed. *Alexander Borodin: Sein Leben, seine Musik, seine Schriften* (Berlin: Verlag Ernst Kuhn, 1992), 414–422.

it? I don’t know. If you are afraid of wolves, don’t go into the forest. I’ll try.”⁴⁰ Almost immediately, Borodin began researching the history of twelfth-century Russia so he would be able to draw from what he considered appropriate present-day folk music, historical costumes, and scenery.⁴¹ Borodin would, over the years, rewrite the libretto entirely, removing much of the coherence that had made Stasov’s version attractive.⁴² The lack of a complete libretto before beginning composition was more responsible than any other factor for the delay of the opera from its genesis in 1869 until Borodin’s death in 1887—making it the gold standard for disorganized operatic composition by which other fiascos are measured.⁴³

Borodin spent as much time deciding to quit the opera as actually writing it. His first demurrer came in March 1870, when he wrote his wife that he had hardly the time and the patience to deal with all the little details, that the public would not like the story due to lack of drama, that “it is no joke to make a libretto which satisfies both the musical and the scenic demands,” that he has no experience for it, that he was drawn to symphonic forms, and, in the end, that “opera (not dramatic in the strict sense) seems to me an unnatural thing.”⁴⁴ In short, whatever excuse came most handy. Intriguingly, an interview with a former medical student, V. A. Shonorov, who lamented the abandonment of the opera, triggered Borodin to get back to work on it. When Borodin told Stasov about his return to *Igor* in 1874, the latter was positively ecstatic.⁴⁵ Of all his associates—even more than Stasov—Rimskii-Korsakov was constantly agitated that the opera was still so far from completion, a point he reiterated not just to Borodin (“Write more, using the summer, write as abbreviated, as dirty as possible, but only more quickly”), but to a large number of his correspondents and visitors.⁴⁶ Rimskii-Korsakov also volunteered to assist Borodin with orchestration, editing, and copying out parts.

⁴⁰ Borodin to Stasov, [20 April 1869], *BorP*, I, 142. On the limited links between the *Igor Tale* itself and Borodin’s libretto, see Zsuzsa Domokos, “The Epic Dimension in Borodin’s *Prince Igor*,” *Studia Musicologica Academiae Scientiarum Hungaricae* 33 (1991): 131–149; and T. Cherednichenko, “Borodin kak poet,” *Sovetskaiia muzyka* (8) (1978): 94–100.

⁴¹ V. V. Mainov reported to Borodin in the mid-1870s that he had contacted the famous Hungarian traveler Hunfalvi to find out information about the Polovtsy tribes and their possible connection to the Magyars and Pechenegs. See letters reproduced in Dianin, *Borodin*, 200 and 338; and Gerald E. H. Abraham, *Studies in Russian Music* (New York: Charles Scribner’s Sons, 1936), Chapter 7.

⁴² Kathryn Bumpass and George B. Kauffman, “Nationalism and Realism in Nineteenth-Century Russian Music: ‘The Five’ and Borodin’s *Prince Igor*,” *Music Review* 48 (1988): 43–51, on 48; and Taruskin, *Defining Russia Musically*, 154.

⁴³ David Brown, *Mikhail Glinka: A Biographical and Critical Study* (London: Oxford University Press, 1974), 110; and Abraham and Lloyd-Jones, “Alexander Borodin,” 69.

⁴⁴ Borodin to E. S. Borodina, 4 March 1870, *BorP*, I, 200.

⁴⁵ Stasov to D. V. Stasov, 18 October 1874, in Stasov, *Pis’ma k rodnym*, I(ii), 222.

⁴⁶ Quotation from Rimskii-Korsakov to Borodin, 10 August [1879], reproduced in Dianin, *Borodin*, 231. See also Rimskii-Korsakov, *Letopis’ moei muzykal’noi zhizni*, 217, 223–224;

After Borodin's death, *Prince Igor* was further delayed both because it was unfinished and due to legal battles over authorship rights following the death of Borodin's wife a few months after his own.⁴⁷ Given the repeated foot-dragging Borodin had displayed for over a decade on the completion of the opera, his musical allies already had contingency plans prepared. As Rimskii-Korsakov had noted to a mutual friend in 1884: "Borodin is somehow more and more approaching a collapse in general; there can't even be any talk of composition; when he hears music, then he sleeps; he has completely dropped behind in musical affairs; he uselessly participates in an innumerable quantity of committees. If I survive him, I'll finish 'Igor.'" ⁴⁸ It is clear that the notion that Borodin abandoned chemistry so he could work on music, or vice versa, rings hollow. Borodin simply was not completing *anything*. Rimskii-Korsakov ended up having to make good on his pledge. He went with Stasov to Borodin's apartment immediately after hearing of the latter's death and seized all his musical manuscripts, and finally completed the opera together with A. K. Glazunov.⁴⁹ Borodin's most famous work was thus not, strictly speaking, his.

9.2 Conservatories, Conservatives, and Consternation

The specifics of Borodin's life seem to demand a reckoning. What was he: a composer or a chemist? Why did he shift from one topic and mentor to the next so readily? His music is now considered to be among the greatest produced in Russia, so surely his chemistry must have been equally promising? This last question is one that has occupied a large number of those who write on Borodin. The intrinsic oddities of Borodin's case have prompted many to argue that his status as a chemist was equal to those of his more well-known countrymen—such as D. I. Mendeleev (of the periodic system of chemical elements) and A. M. Butlerov (of the structure theory of organic compounds)—but that foreigners stole all his credit, or that perhaps his musical activities "distracted"

Rimskii-Korsakov to S. N. Kruglikov, letters of 12 August 1879, 23 September 1880, and 28 March 1882, in idem, *Polnoe sobranie sochinenii*, v. 8a (Moscow: Muzyka, 1981), 20, 50, 87, and M. M. Kurbanoff, "A Few Reminiscences of Borodin (1884–1887)," tr. Alfred J. Swan, *Chesterian* 16 (1933): 96–99, on 98. Stasov and Balakirev repeatedly bemoaned Borodin's lack of progress: Balakirev to Stasov, 10 August 1882, and Stasov to Balakirev, 20 June 1884, in Balakirev and Stasov, *Perepiska*, II, 44 and 63.

⁴⁷ On the legal dispute, see Stasov to Balakirev, 20 August 1887, in Balakirev and Stasov, *Perepiska*, II, 120.

⁴⁸ Rimskii-Korsakov to Kruglikov, 23 February 1884, in Rimskii-Korsakov, *Polnoe sobranie sochinenii*, 130.

⁴⁹ Rimskii-Korsakov, *Letopis' moei muzykal'noi zhizni*, 281. For an enumeration of precisely which features of the opera were created from scratch and which were original with Borodin, see Glazunov's account published as V. Stasov, "Redaktsiia 'Kniazia Igoria' Borodina," *Russkaia muzykal'naiia gazeta* 3(2) (1896): 153–160.

him from pursuing what *could have been* a career of the same grandeur as his illustrious peers. Both of these approaches are supported by the evidence either weakly or not at all. Although Borodin began the 1860s as one of the more promising young chemists of his generation, for a variety of reasons his research programs petered out largely on their own, not because of subterfuge by foreigners. Borodin seems to have left active chemical research due to a diminution of interest and an increasing desire to devote his time to other issues. As I have described elsewhere, the claims for Borodin's titanic status as a chemist end not with a bang, but a whimper.⁵⁰

Instead of trying to shoehorn Borodin into the role of original chemist, we should recognize that this was not a laurel he coveted for himself. He was happy to devote the last decade-and-a-half of his life not to the production of science, but to the production of *scientists*. The vast majority of Borodin's attention to science concerned not the content of the material but the issue of how to properly *train* practitioners. (He was particularly devoted to the topic of higher education for women, a major effort of the Russian intelligentsia that would occupy too much space to treat satisfactorily here.)⁵¹ It is only by stepping back from Borodin's completed works that one begins to see a larger pattern in which the two separate strands become to cohere; instead of looking at chemistry and music, one should look at *chemists* and *musicians*, and specifically the process by which those two types creatures are consciously formed. It is in the necessity of formalized training of the former and the vital importance of *not* training the latter, for Borodin, that provides a strong link between the Mighty Five, the Russian Chemical Society, and the generalized anxiety about training in the professionalizing and modernizing culture of post-Reforms Petersburg.

Anxieties about the training of musicians abounded in virtually every activity of the Balakirev *kruzhok*. Each member came to the group with another career already underway, and they worked cooperatively to try to develop each other's talents and capabilities so that they could produce mature "Russian" compositions. In fact, the mania for realism among members of the Five was a sign of their dilettante status; one of the main charms of realism for the autodidact is that it proclaims as useless foppery precisely those aspects of counterpoint technique that were the hallmark of formal training.⁵² Not having any formal training himself, Balakirev's teaching methods were unorthodox.

⁵⁰ Borodin's chemical researches are discussed in Michael D. Gordin, "Facing the Music: How Original Was Borodin's Chemistry?," *Journal of Chemical Education* 83 (2006): 561–566. See also Ian D. Rae, "The Research in Organic Chemistry of Aleksandr Borodin (1833–1887)," *Ambix* 36 (1989): 121–137.

⁵¹ On this important topic, see Christine Johanson, *Women's Struggle for Higher Education in Russia* (Kingston, ON: McGill-Queen's University Press, 1987); and Richard Stites, *The Women's Liberation Movement in Russia: Feminism, Nihilism, and Bolshevism, 1860–1930* (Princeton: Princeton University Press, 1978). Unfortunately, no secondary literature yet treats Borodin's role in this movement satisfactorily.

⁵² Richard Taruskin, "Realism as Preached and Practiced: The Russian Opera Dialogue," *Musical Quarterly* 56 (1970): 431–454, on 436.

When the *kruzhok* of musicians met, each would bring a piece that he had been working on, and then it was publicly performed for the group and communally criticized—with Cui, Balakirev, and Stasov most prominent in suggesting changes.⁵³ Stasov encouraged Balakirev's anti-academic stance, urging him "to learn directly in practice, directly in action, and not from textbooks, the entire system of *Russian* music, church and popular, just as you have up till now learned without textbooks one of its members, one of its scales. This learning (*uznavanie*) is truer and more stable than what you would get from [Adolph] Marx's book or any other."⁵⁴ Balakirev made a point teaching other members of the Five and his auxiliary students without textbooks.⁵⁵

Of course, not everyone was pleased with Balakirev's teaching methods. Most of the prominent critics of the New Russian School—with the exception of the equally autodidact Aleksandr Serov—felt that the fault of this cadre of musicians was not their lack of talent, but the inferiority of their training. Not surprisingly, many of these contrary voices, such as music critic G. A. Larosh, were conservatory trained, and thus became in turn prime targets for the wrath of Cui and Stasov.⁵⁶ The "junior" members of the Five—including the eldest, Borodin—also found some of Balakirev's strictures to be too severe, and one of the most common criticisms of his teachings, and a central reason why the *kuchka* fell apart by the 1870s, was the widespread perception among them that Balakirev was simply too "despotic" to bear.⁵⁷ They did not crave the academicism of professionals, but rather a kinder, gentler Balakirev patterned on Franz Liszt. Liszt, like Hector Berlioz, was strongly opposed to what he saw as pedantry and academicism.⁵⁸ This glorification of Liszt's anti-academicism was somewhat overstated, since the first thing Liszt did when he arrived in Paris from Budapest for the first time as a piano prodigy was to attempt to enroll in the Paris Conservatory. He was turned away because the institution

⁵³ Stasov, "Modest Petrovich Musorgskii: Biograficheskii ocherk (1883)," in *Izbrannye sochineniia*, II, 184.

⁵⁴ Stasov to Balakirev, 20 August 1860, in Balakirev and Stasov, *Perepiska*, I, 115. Emphasis in original.

⁵⁵ Garden, *Balakirev*, 61.

⁵⁶ As Larosh put it: "With us, in Russia, where the public is small, where traditions are not established, where specialists are very few, it is especially easy to fall into that *kruzhok* manner, to take a half-dozen of one's friends for the Russian people, an anthill for the globe, and examples of such sad confusions in our tiny musical world as more common and usual than in any other." From his "[*'Demon'* A. Rubinshteina] (1877)," in Larosh, *Izbrannye stat'i*, III, 227.

⁵⁷ See, for example, Cui to M. S. Kerzina, 23 May [1910], in Cui, *Izbrannye pis'ma*, ed. I. L. Gusin (Leningrad: Gos. muzykal'noe izd., 1955), 404; Rimskii-Korsakov, *Letopis' moei muzykal'noi zhizni*, 283; and, as Borodin wrote to his wife in October 1871: "[Balakirev] is such a despot by nature, that he demands complete subservience up to the tiniest infinitesimals. He can in no way understand and recognize freedom and equal rights. . . . He wants to impose his yoke on everyone and everything." Letter of [24–25 October 1871], *BorP*, I, 311. Ellipses added.

⁵⁸ Alan Walker, *Franz Liszt: The Virtuoso Years, 1811–1847*, rev. ed. (Ithaca: Cornell University Press, 1988 [1983]), 182.

excluded foreigners, but he quickly found other teachers in their stead.⁵⁹ As a private teacher of piano, however, he had essentially no teaching method, eschewing an analytic approach in favor of allowing students to play freely, and only intervening with minor and gentle suggestions. As Borodin observed during his visit to Liszt: "In general between him and his students relations are terribly simple, familiar, and heartfelt, not at all reminiscent of the relations of students to a professor, but more like children to a father, or grandchildren to a grandfather."⁶⁰

This model was self-consciously designed as an alternative to the Conservatory, which was erected under the auspices of the Russian Musical Society by Rubinstein. By the late 1850s, Russia was the only major European country that had no dedicated musical educational establishment, and scattered comments in various newspapers and journals began to call for such an organization. In December 1859 the Russian Musical Society began preparatory courses, and in Spring 1860 courses were offered (some for a fee, others at no cost). On 17 October 1861, the "Musical Academy (*Uchilishche*)" was opened, renamed the St. Petersburg Conservatory in 1866. A Moscow Conservatory followed, quickly supplanting the virtual forest of piano and voice schools in the two metropolises.⁶¹ Rubinstein's goal, as mentioned earlier, was to establish civil status and formal training for musicians on the German model precisely to *eliminate* dependence on Germans for the future of music in Russia. Rubinstein was concerned with establishing music in Russia, not Russian music. Music was international, much like science, and formal training was needed in both.⁶²

Stasov would have none of this. At precisely this moment, he was encountering hostility from the Academy of Arts in St. Petersburg against the brand of realist painting he most favored—that of the Wanderers (*Peredvizhniki*)—and he felt that any art-training institute would always be compromised by its connection to the state, *by virtue of being an institution*, from truly supporting original Russian art.⁶³ The Conservatory would inevitably generate two undesirable features: "German-ness" and "craft"—the former was a nationalist nightmare that would perpetuate perceived German dominance, the latter was the related routinization of musical education and a stifling of creativity. Stasov decried the Conservatory as a bastion of ungifted elites, even twenty-five years after its creation:

⁵⁹ Paul Metzner, *Crescendo of the Virtuoso: Spectacle, Skill, and Self-Promotion in Paris during the Age of Revolution* (Berkeley: University of California Press, 1998), 138.

⁶⁰ Borodin to E. S. Borodina, 12 July 1877 (N.S.), *BorP*, II, 146. See Alan Walker, *Franz Liszt: The Final Years, 1861–1886* (Ithaca: Cornell University Press, 1996), 228.

⁶¹ L. Z. Korabel'nikova, "Muzykal'noe obrazovanie," In Iu. V. Keldysh, et al., eds., *Istoriia russkoi muzyki*, v. 6 (Moscow: Muzyka, 1989): 134–187.

⁶² For Rubinstein's clearest expression of his case, see his article, "The State of Music in Russia (1861)," as translated in Stuart Campbell, ed. and tr., *Russians on Russian Music, 1830–1880: An Anthology* (Cambridge: Cambridge University Press, 1994), 65–73.

⁶³ Lebedev and Solodovnikov, *Vladimir Vasil'evich Stasov*, 66.

[The Conservatory] wanted only to plant among us German musical routine and the parochial craft stamp; it haughtily ignored Russian music and with scorn looked at Russian composers, whom they all labeled without exception "dilettantes." The new conservatory fully justified its name: it was in the highest degree conservative, more than anything it recognized only the generally accepted "classics" and didn't want to know anything new.⁶⁴

One issue was that the study of formal counterpoint and harmony would turn individuals into pseudo-Germans; another was the very real fact that most of the instructors of music were in fact German and that the language of instruction (certainly for the first decade of the St. Petersburg Conservatory) was German—points criticized even by generally satisfied graduates of the institution like Larosh.⁶⁵ Of course, neither Cui nor Stasov thought that one could become a composer with absolutely no training (e.g., the ability to read notes); they objected instead to slavish devotion to a specific body of knowledge—which Borodin himself ridiculed in the case of Nikolai Zarembo's classes at the Conservatory.⁶⁶

Stasov et al.'s hostility to formal training was not merely a characteristic of a group that also happened to be vociferously advocating a self-consciously "national" form of art music; it was constitutive of what they thought "Russian music" meant: the more you were trained, the less Russian your music. As Carl Dahlhaus has noted in his landmark study of "neo-Romanticism" in late-nineteenth-century music, nationalism can best be interpreted not as an issue of music's substance, but of the music's function.⁶⁷ That is, composers' claims to "nationalism" and "national styles" of music should not be sought—or not sought exclusively—in the tropes and techniques they employed, their acknowledged influences, and so on; rather, one should look at those claims in the context of the entire spectrum of musical politics, such as local personal conflicts, attitudes to foreign music, and instantiations of pedagogy. In the case of

⁶⁴ Stasov, "Dvadsatipiatiletie Besplatnoi muzykal'noi shkoly (1887)," in *Izbrannye sochineniia*, III, 79. Cui also lamented the "craft (*remeslo*)" of Conservatory-trained musicians like Chaikovskii in Cui to Stasov, 3 May [1880], in Cui, *Izbrannye pis'ma*, 102. This emphasis on the Conservatory was the central feature of the Five's critique of Chaikovskii. For his part, it was precisely the *lack* of training that Chaikovskii lamented in Borodin, whom he saw as possessed of "talent, a very great talent which, however, has come to nothing for want of teaching. . . ." Quoted in Victor I. Seroff, *The Mighty Five: The Cradle of Russian National Music* (Freeport, NY: Books for Libraries Press, 1970 [1948]), 206. Ellipses added.

⁶⁵ Larosh, "Muzykal'nye pis'ma iz Peterburga: Pis'mo pervoe (1871)," in Larosh, *Izbrannye stat'i*, III, 65.

⁶⁶ See, for example, V. Stasov, "Nasha muzyka na posledniia 25 let," *Vestnik Evropy* 5 (October 1883): 561–623, on 565; and Borodin to E. S. Borodina, [21 September 1871], *BorP*, I, 294.

⁶⁷ Carl Dahlhaus, *Between Romanticism and Modernism: Four Studies in Music of the Later Nineteenth Century*, tr. Mary Whittall (Berkeley: University of California Press, 1980), 80–81 and 91. For a comparable instance, see Michael Beckerman, "In Search of Czechness in Music," *19th-Century Music* 10 (1986): 61–73.

the New Russian School, these positions were all conflated, as in this (ironically polyglot) letter from Musorgskii to Rimskii-Korsakov in 1868:

Now again about *symphonic development*. For you it's as if it's frightening that you write like Korsakov and not like Schumann. And I tell you (you scorn fear—*vous êtes brave*), that *okroshka* [Russian bread soup] is horrible for a German, but we eat it with pleasure (*point de comparaison, s'il vous plait, comparaison n'est pas raison*). German *Milchsuppe* or *Kirschensuppe* is horrible for us, and a German is in raptures from it. *Bref, symphonic development, technically understood*, is worked out by a German like his philosophy—at present destroyed by English psychology and our own [M. M.] Troitskii. A German, when he thinks, first *reconnoiters*, and then *proves*, our brother first *proves*, and then pacifies himself with *reconnaissance*. . . .⁶⁸

Musorgskii took national character as primary, and then constructed differences around it, from taste in soup to symphonic composition. A less essentialist tack would consider the concatenation of tastes as primary and then look at them as *constitutive* of national character. One of the most prominent features of the "Russian" musical style was precisely this failure to obtain adequate training before undertaking composition.

This impulsiveness—or, to use a term its proponents would prefer, spontaneity—was central in shaping reactions to the music of the Five both at home and abroad. For Borodin in particular, his qualities as a *national* composer were rarely spoken of without in the same breath dealing with his qualities as an *untrained* composer. For his critics, such as Larosh, "Borodin, entirely infected with dilettantism, never suffered from *unmusicality*. On the contrary, with him everything is interesting; the interest which attracts [one] to his works comprises at the same time their Achilles's heel. They are *only* interesting. . . they are not balanced out by any simplicity. . . ."⁶⁹ The fault here was that Borodin's education was too weak to balance the deleterious influence of the *kruzhok's* training. Lack of training was both the consequence and the cause of its national qualities. There is an undercurrent in the elitist self-representation of the Balakirev circle and its supporters that while the musicians did not in fact need training to be national, the audiences in Russia *did* need to be trained so they could more appropriately mimic German audiences. As Glinka's sister, L. N. Shestakova, wrote to Borodin after a performance of one of his symphonies was greeted with scorn:

You see, they didn't understand [Glinka's opera] "Ruslan [and Liudmila]," exactly as they didn't understand your glorious symphony, and I don't at all think that it was an agreed-upon booing, it seems to me simply that they didn't understand and were naughty; their ears are not grown up enough for this symphony, they are such a brilliant piece of jackassery (*osliatina*). . . . Before and even during the performance itself, the public makes noise and disperses. After all it is only possible to do this in Russia. They should try to pull a similar prank in Germany. . . .⁷⁰

⁶⁸ Letter of 15 August 1868, reprinted in Musorgskii, *Literaturnoe nasledie*, 106–107. Emphasis in original. Ellipses added.

⁶⁹ Larosh, "Muzykal'naia khronika," *Russkii Vestnik* (10) (1887): 823–854, on 850. Emphasis in original. Ellipses added.

⁷⁰ Letter of 27 February [1877], reproduced in Dianin, *Borodin*, 208. Ellipses added.

Germans were ideal audiences for music; they should just refrain from composition.

Proof of the suitability of Western European audiences for supposedly "purely national" music was evident abroad, particularly in Belgium, where—due largely to the good offices of the Countess Louisa de Mercy-Argenta—Borodin soon became the most prominent of the New Russian School in foreign climes.⁷¹ Even in the heart of the beast, musical Germany, the results were encouraging, as Borodin wrote to Balakirev after a very well-received performance of his second symphony in Baden-Baden: "It is especially pleasing to me personally that this thing had success precisely in Germany. . . ."⁷² Truly, for Borodin to be recognized by the Germans on their home soil was the nationalist victory the group as a whole savored in Petersburg—and was substantially more important than the enthusiasm his quartets received in Buffalo.⁷³ Even domestically, although Stasov would later claim that Borodin had never been appreciated in his own country, he was lauded by large numbers of music aficionados. In 1879, for example, he traveled on business to Odessa and was greeted on arrival as a famous composer.⁷⁴ And while it was true that Borodin received substantial criticism in the musical press, it was not the case—as Stasov reported after Borodin's death—that the first symphony had been poorly received, as Balakirev hastened to correct.⁷⁵ And all of this without the slavish devotion to training that former Conservatory students like Chaikovskii insisted upon.

Interestingly, it was exactly such a devotion that Borodin himself was trying to establish for chemical education in the predominantly medical Academy. The Medico-Surgical Academy in the 1860s underwent deep transformations in its attitude towards the rigors of medical pedagogy under the presidency of P. A. Dubovitskii (1857–1867). Nikolai Zinin in particular, as Secretary of the Academy during the first eight years of this period, was Dubovitskii's central aide in grounding science more deeply in the medical curriculum, primarily through building a Natural History Institute (in 1863, with a grant of 45,000 rubles to start and 2,000 more annually) and traveling abroad under Dubovitskii's direction to import foreign teaching methods. The natural science chairs were expanded from two (chemistry, physics, and mineralogy on the one

⁷¹ On the Countess's very colorful life, see Carlo Bronne, *La Comtesse de Mercy-Argenta*, 2d. ed. (Liège: Soledis, 1945), esp. 65–74 on Borodin. Borodin and the Countess corresponded often, and she translated the lyrics for several of his works into French. See the letters of October 1884 in *BorP*, IV, 92 and 105.

⁷² Borodin to Balakirev, 17 May 1880, *BorP*, III, 99. This was also true in Paris. Borodin wrote to A. P. Dianin on 6 November 1877 that he had heard from Turgenev that the second symphony was a tremendous success there: *BorP*, II, 191.

⁷³ Borodin to E. S. Borodina, 30 November 1885, *BorP*, IV, 99.

⁷⁴ See Sokhor, *Aleksandr Porfir'evich Borodin*, 282.

⁷⁵ Balakirev to Stasov, 8 December 1888, in Balakirev and Stasov, *Perepiska*, II, 141.

hand; and natural science on the other) to five (chemistry; physics, geography, and climatology; zoology and comparative anatomy; botany; and geology, mineralogy, and paleontology).⁷⁶ Borodin later recalled Zinin's three fundamental transformations as the introduction of fresh new teachers, establishing facilities for applied medical and scientific work, and building an "Institute for Young Doctors."⁷⁷ These transformations continued after Zinin formally resigned his chair in 1874 to move full-time to the Imperial Academy of Sciences, and Borodin was promoted from Zinin's apprentice to spearheading his own set of academic changes at the Medico-Surgical Academy.⁷⁸

Borodin was already thinking of his brief time abroad at Heidelberg, Paris, and Pisa primarily in terms of pedagogical reform as early as 1863:

Filled with the conviction that only a scientist who is completely possessed by this subject can be a really good teacher, I tried above all to develop myself from this point of view. This is accomplished first: by mastering what was done by others, and second: by independent research, helping the advancement of science. Without these conditions it is impossible to obtain an accurate, critical outlook in science and to stand at the level of contemporary direction. But this is still not enough for the activity of a teacher: it is necessary to be able to teach others; it is necessary to be able to transmit science to audiences, conforming to their degree of development and to their future purpose. This is achieved, on the one hand, by the study of different methods of teaching others, and on the other hand, by independent training.⁷⁹

Borodin's reforms of chemical pedagogy were perhaps the most time-consuming of his many activities of the 1870s, along with his involvement in committees for higher education for women (themselves emblematic of his concern for proper training). As he wrote to his wife in early September 1869: "I am busy up to here with the construction of the laboratory, the receipt of things, and the organizing of laboratory property." There was no gas or running water in the laboratory buildings yet, and they were filthy.⁸⁰ Defending his delay in finishing *Prince Igor* to Liubov' Karmalina, Borodin wrote in 1876—after he had ceased to publish scientific papers—in defense of his expenditure of time on pedagogy: "I love my work, and my science, and the Academy, and my students; my science is practical in the character of the studies, and thus consumes a great deal of time; my male and female students are close to me

⁷⁶ P. Belogorskii, "Preobrazovaniia shestidesiatykh godov," in Ivanovskii, ed., *Istoriia Imperatorskoi Voenno-Meditsinskoi (byvshei Mediko-Khirurgicheskoi) Akademii za sto let* (1898), 523–579.

⁷⁷ Borodin's funeral oration for Zinin, 9 February 1880, reproduced in *BorP*, III, 87–88.

⁷⁸ On these later transformations, including the change of name to the Military-Medical Academy, see D. Kodorotov, "Perekhodnoe vremia," in Ivanovskii, ed., *Istoriia Imperatorskoi Voenno-Meditsinskoi (byvshei Mediko-Khirurgicheskoi) Akademii za sto let* (1898), 581–683; and N. Kul'bin, "Imperatorskaia Voenno-meditsinskaia akademiia, 1881–1898 g.," in *ibid.*: 685–828.

⁷⁹ Borodin's final report on his trip abroad, dated 31 January 1863, reproduced in Figurovskii and Solov'ev, *Aleksandr Porfir'evich Borodin*, 143.

⁸⁰ Borodin to E. S. Borodina, [8 September 1869], *BorP*, I, 147.

even in other respects than as studying youth, which doesn't limit itself to listening to my lectures, but also needs practical exercises, etc. The interests of the Academy are dear to me."⁸¹

Assembling the remnants of proper instruction out of the mess he inherited was the task of the next several years. His son-in-law and eventual successor, A. P. Dianin, saw 1874 as the watershed of Borodin's work at the Academy. With Zinin's retirement, Borodin made practical laboratory instruction a requirement in the chemical education of physicians. Since the medical students had different schedules, Borodin had to keep the laboratory open almost all day, every day, so that 300–400 students could conduct experiments.⁸² The point of these efforts, as Borodin had articulated in an essay review on pharmacy as early as 1863, was to show students who only dealt with the applied sciences (such as medicine and pharmacy) the kind of strict logic that is possible in the "pure sciences."⁸³ Here, therefore, unlike in the Balakirev circle, Borodin was adamant about the importance of proper (read: formal) instruction. Guidance under the hands of a master like Balakirev without routine would just be insufficient for the sciences.

The connection and juxtaposition between formal training in the sciences and informal training in the arts (particularly music) was noted by members of the Five as being almost constitutive of the difference between these two domains of human activity. As Balakirev wrote to Stasov, referring to the property dispute at the Medico-Surgical Academy over the disposition of the Borodins' estate, in August 1887:

All that you have written me concerning the ridiculous orders, concerning the property of the late Borodins, confirms my opinion of the fact that so-called specialists of sciences, especially medical sciences, are very stupid folk, of the sort like teachers of harmony, cobblers, and other workmen. The exceptions are only representatives of the humanities or such luminaries as, for example, Botkin. To the rest all of life appears in the narrow little confines of pedestrian concepts about the elevation or reduction of temperature, diarrhea, constipation, etc., and for the rest, no matter how important, they don't care, but their self-confidence is so high, that in another specialized affair, such as the arranging of spiritual testament, he is not afraid to consider himself competent, believing in his supposedly "bright head."⁸⁴

Arrogance—that was the fundamental problem of a formal education, and it led to mistaking one's competence in one area with talent in another. The Conservatory merely perpetuated this when dealing with the fragile flower of creativity. Stasov had already mooted this point in his initial response to Rubinstein's call for conservatories:

It is possible that Rubinstein is not aware of the opinion now deep-rooted in the greater part of Europe that holds that academies and conservatories serve only as breeding

⁸¹ Letter of 1 June 1876, *BorP*, II, 109.

⁸² Dianin, "Aleksandr Porfir'evich Borodin," 373.

⁸³ A. Borodin, "Referat ob uspekakh farmatsii v 1861 godu [I-III]," *Voenna-Meditsinskii Zhurnal* 88(10–11) (1863): 220–234, 289–306, 371–403, on 220–221.

⁸⁴ Letter of 22 August 1887, in Balakirev and Stasov, *Perepiska*, II, 122.

grounds for tasteless people and aid in the establishment of harmful ideas and tastes. Therefore the best minds search in the sphere of artistic education for means of doing without *higher* educational establishments. *Higher* educational establishments for art are a completely different thing from their counterparts in the sciences, and the two categories should never be confused. There is a vast gulf between the two types. A university and a conservatoire are completely different things. The former communicates only *knowledge*; the latter is not content to do just that and interferes in the most dangerous way with the *creative process* of the artist in training, and extends a despotic power (from which nothing can protect him) over the shape and form of his works. . . .⁸⁵

Along these lines, Balakirev was not entirely pleased with the way his pedagogy was portrayed in Stasov's Borodin biography. As he wrote to Stasov in a comment on the draft:

You wrote that Borodin, thanks to his acquaintance with me, understood that one must relate to authorities critically, that they are not infallible, etc. I could have influence on him only in the *specifically musical* sphere. The question about authorities you touch on is not a specific question but a general intellectual one, and in this sphere Borodin, being not only excellently educated (*obrazovannym*), but even a scientist, had no need to be enlightened by me, who had received only a boy's schooling.⁸⁶

What differentiated Borodin from Balakirev was formal education—but only in the sense that one was a scientist and the other not. In music, all were equal before the Russian spirit.

Training seems so essential to Borodin's self-conception, that one might wonder at how much excavation and pruning of the historiography had to be undertaken to document this connection. Why, indeed, has the importance of training as not only a bridge between the two cultures of Borodin's world, but as a means of denying any direct homology between the two, been left out of the standard account? There are two main strands to this "sidetracking" of the Borodin legacy: the first the shaping of Borodin by Stasov into a posthumous spokesman for the greatness of Russian (read: anti-German) music; and the cooptation by historically-interested chemists of the man in attempt to transcend the debate about the "two cultures." In the process, both traditions only inscribe that divide more deeply.

9.3 Conclusion: Vladimir Stasov and the Two Cultures

Aleksandr Borodin died at an Academy fancy-dress party celebrating carnival at 11:40 PM, 15 February 1887. He was immediately enveloped by his physician colleagues who attempted to revive him, but the heart attack proved fatal. Almost instantly, Vladimir Stasov began to collect his letters and unfinished

⁸⁵ Stasov, "Conservatories in Russia: Comments on Mr. Rubinstein's Article (1861)," in Campbell, *Russians on Russian Music*, 78. Emphasis in original. Ellipses added.

⁸⁶ Balakirev to Stasov, 22 February 1887, in Balakirev and Stasov, *Perepiska*, II, 102. Emphasis in original.

musical manuscripts, solicit reminiscences from his friends, and write obituaries for him that hit the same notes central to the Mighty Five's message: Borodin was a *composer*, at best distracted by chemistry; he was resolutely *nationalist*, and the central tragedy of his brief life is that he was not given enough *time* to devote to finishing his opera. All three of these points are generally accepted by writers on Borodin both at the time and since, and all three of them are equivocal, to say the least. The first point (his status as a composer) assumes some kind of Platonic "vocation" which is imprinted on the soul of an individual and defines the essence of his or her life. The second point (his nationalism) was certainly a factor in his thought, but nowhere near as central as his emphasis on proper forms of training. The third point (time), is the most problematic, since often Borodin did have the time but *chose* to spend it on other matters. Just because Stasov and Rimskii-Korsakov wanted *Prince Igor* to be Borodin's highest priority does not mean that Borodin himself did. Recall that when he died, he had essentially no reputation as an opera composer at all, having only displayed some extracts of *Igor* to the public. The grand reputation Borodin developed was posthumous, and the credit for it lies not only with the composer but with his unbidden publicist—Stasov.

I have mentioned Stasov's imprint so frequently because it is literally inescapable. Stasov, more than any other individual, shaped how people both at the time and since interpreted Borodin, and since Stasov clearly had a very articulate partisan agenda, one needs to be intensely critical of the nuances he imposed on his subject.⁸⁷ In his writings on Borodin, Stasov emphasized three narrative points: that he had been a cosmopolitan as a child, speaking a great many languages, who later became a nationalist; that the meeting with Balakirev was the decisive shift in his life; and that while he had worked in chemistry and music simultaneously for most of his life, it was really in music where he fulfilled his destiny.⁸⁸ Stasov left a very strong impression with this final point that Borodin was always a genius *manqué*, a promise deferred because of too many alternative commitments. One could always defend Stasov by pointing out that he was there and therefore knew the state of affairs. But, as Sigrid Neef has recently pointed out, the discrepancies between Stasov's version and the surviving historical record best call to mind the common Russian proverb: "He lies like an eyewitness."⁸⁹

⁸⁷ For Stasov's biography, see Vlad. Karenin, *Vladimir Stasov: Oчерk ego zhizni i deiatel'nosti*, 2 v. (Leningrad: Mysl', [1927]); and E. G. Salita and E. I. Suvorova, *Stasov v Peterburge* (Leningrad: Lenizdat, 1971).

⁸⁸ Cui held the same line in his obituary for Borodin: his science is "fruitful and distinguished; but his musical, compositional activity has a still greater, perfectly outstanding significance." Cui, "A. P. Borodin," 288.

⁸⁹ Sigrid Neef, "Wladimir Stasow und das Mächtige Häuflein," in Wladimir Stasow, *Meine Freunde Alexander Borodin und Modest Mussorgski: Die Biographien*, ed. Ernst Kuhn (Berlin: Verlag Ernst Kuhn, 1993), 11–24.

Stasov, of course, did not devote his myth-making attention exclusively to Borodin. In fact, he wrote biographical essays, monographs, or compilations of source material on *all* major Russian composers—including the prior generation of Dargomyzhskii and Glinka—with the exception of Chaikovskii and Balakirev. Borodin simply happened to be the second of the Mighty Five to die, following the more dramatic case of historiographical manipulation he bestowed on Modest Musorgskii—recast by Stasov as a radical populist driven to an alcoholic death spiral by a repressive world. (The historiographical distortion there has been well noted and corrected.⁹⁰) Stasov wanted to build up a legend of the New Russian School, and Borodin and Musorgskii were apposite means to that end.⁹¹ He often had to defend his rush into biographical print, thus consciously shaping the historical memory of the figure in question: "And, in the main, [my critics say] it would have been better if I hadn't written, but someone else. And what? Twenty years have passed—but not a single soul has thought, not a single hand has written since then a single letter. It was exactly the same with Musorgskii, Repin, with Borodin and with everyone, everyone about whom I happened to write. Balakirev rebuked me for Musorgskii, Turgenev for Repin, various others for Borodin."⁹² In a sense, Stasov has needed little defense since, since with limited exceptions, like Musorgskii's, most commentators have endorsed his evaluations—both within the Soviet Union, where he fit with the dominant trend to identify Soviet patriotism with Great Russian nationalism, and by anti-Soviet Russian nationalists abroad.⁹³

⁹⁰ Stasov, "Modest Petrovich Musorgskii: Biograficheskii oчерk (1881)," in Stasov, *Izbrannye sochineniia*, II: 161–213. For the revision, see Richard Taruskin, *Musorgsky: Eight Essays and an Epilogue* (Princeton: Princeton University Press, 1993); Caryl Emerson, *The Life of Musorgsky* (Cambridge: Cambridge University Press, 1999); and Francis Maes, "Modern Historiography of Russian Music: When Will Two Schools of Thought Meet?" *International Journal of Musicology* 6 (1997): 377–394. For more general revisions, see idem, *A History of Russian Music: From Kamarinskaya to Babi Yar*, tr. Arnold J. Pomerans and Erica Pomerans (Berkeley: University of California Press, 2002 [1996]); and Richard Taruskin, "Some Thoughts on the History and Historiography of Russian Music," *Journal of Musicology* 3 (1984): 321–339.

⁹¹ This perhaps explains the intense interest in trying to find parallels between the two composers: Igor Glebow, "Borodin und Mussorgski (Versuch einer Parallele) (1930)," in Kuhn, *Alexander Borodin* (1992): 342–347; and Kremlev, *A. P. Borodin*, 24 and 83.

⁹² Stasov to V. D. Komarova, 25 August 1899, in Stasov, *Pis'ma k rodnym*, III(i), 316.

⁹³ For a selection of Stasov's writings on music in English, see Vladimir Vasilevich Stasov, *Selected Essays on Music*, tr. Florence Jonas (New York: Da Capo Press, 1980). For an anti-Soviet attempt to rescue Stasov's historiography from Soviet clutches for the greater glory of the Russian nation, see Yuri Olkhovsky, *Vladimir Stasov and Russian National Culture* (Ann Arbor: UMI Research Press, 1983). For other Western, essentially Stasovian interpretations of Russian music, see Donald N. Ferguson, *A History of Musical Thought*, 2d. ed. (New York: Appleton-Century-Crofts, Inc., 1948); Gerald R. Seaman, *History of Russian Music: From Its Origins to Dargomyzhsky*, v. 1 (Oxford: Basil Blackwell, 1967); Richard Anthony Leonard, *A History of Russian Music* (New York: Macmillan, 1957); James Bakst, *A History of Russian-Soviet Music* (New York: Dodd, Mead & Company, 1966 [1962]); Seroff,

Take, for example, the narrow issue of vocation, since it is here that Stasov's argument lays its foundation, and it is also here that the most vital echo of Stasov's Borodin—that propounded by professional chemists—takes its point of departure. If one is looking for it, one can find many references in Borodin's correspondence that his music and his chemistry were engaged in a zero-sum battle for his time.⁹⁴ If one values the music more than the chemistry, therefore, it is easy to claim that the music suffered because Borodin neglected his obligation to it. Borodin himself was aware of this particular narrative, and even at times subscribed to it, writing to an admirer in the year before his death: "I would ask that you not restrict my biography to the musical part alone, since my scientific and teaching activity serves as an explanation why I became a composer late and wrote so little music."⁹⁵ For Stasov, as one gleans from his correspondence, the issue of a "vocation" as the fulfillment of one's destiny was quite a serious one, and it explains why he took his program for the autonomy and equality (if not primacy) of Russian art as a mission. He declared to Balakirev as early as 1858, when the constellation of views that he would later mobilize were just beginning to cohere, that one could only be truly happy when following one's true vocation: "I already tried and became convinced that *there is no other happiness* than doing that which each of us is capable of, regardless of whether this will be a grand affair or the tiniest. We are all born only in order to *birth* from ourselves new creations, new thoughts, new life—as women are born in order to birth new people."⁹⁶ My goal is not to malign Stasov's views of the history and historical function of art, but to show that they are indeed partisan views. Stasov articulated a world of actors who succeeded or failed based on how deeply they held to their vocation. From today's perspective, where destiny is less of a category, there is no necessity to subscribe to his framework.

And, in fact, most of the brief articles written on Borodin today—the vast majority of them by practicing chemists—do not focus on vocation for the same reasons that Stasov did, although they still use the evidence packaged in his

The Mighty Five; M. Montagu-Nathan, *A History of Russian Music* (New York: Charles Scribner's Sons, [1914]); Rosa Newmarch, *The Russian Opera* (New York: E. P. Dutton & Co., [1914]); Alfred Bruneau, *Musiques de Russie et Musiciens de France* (Paris: Bibliothèque Charpentier, 1903); Albert Soubies, *Histoire de la Musique en Russie* (Paris: Société Française d'Éditions d'Art, 1898); and the more recent and thorough Dorothea Redepenning, *Geschichte der russischen und der sowjetischen Musik. Band I. Das 19. Jahrhundert* (Laaber: Laaber-Verlag, 1994). For a friendlier account of Stasov's esthetics, see G. A. Obraztsov, *Estetika V. V. Stasova i razvitie russkogo natsional'no-realistskogo iskusstva* (Leningrad: Izd. Leningradskogo universiteta, 1975); and the excellent T. Livanova, *Stasov i russkaia klassicheskaia opera* (Moscow: Gos. muzkhal'noe izd., 1957).

⁹⁴ For example: "There is as yet no time to work in the laboratory, to work on my music even less" (Borodin to E. S. Borodina, 17 October 1870 [sic: 1871], *BorP*, I, 307).

⁹⁵ Borodin to Ol'ga Akimovna Kochetova, [February–December 1886], *BorP*, IV, 179.

⁹⁶ Stasov to Balakirev, 24 June 1858, in Balakirev and Stasov, *Perepiska*, I, 61. Emphasis in original.

original pieces and speak of Borodin in almost identical terms. Many have observed that numerous scientists seem to have strong interests in classical music as opposed to the other arts, although to date there has been little persuasive explanation of it. Yet, despite these possible connections and well-documented instances of historical links between science and music, the case of Borodin has drawn the lion's share of the attention from both within and outside the scientific community.⁹⁷ The chemical biographies of Borodin cited at the beginning of this essay generally accept all the terms of Stasov's presentation of Borodin, but instead of viewing Borodin's work in chemistry as a distraction from his true vocation of music, they interpret the fact that Borodin spent so much time on it to argue that the man himself valued his chemistry first and his music second—accepting Stasov's parameters and relabeling the polarities of the terms.

One gets a sense of the underlying moral of the Borodin story from the chemists' perspective in the very first biography of the man in a chemical journal, his obituary by his son-in-law in the *Journal of the Russian Physico-Chemical Society*: "[T]he person of A. P. [Borodin] serves as a most obvious example (among a few others) that in a richly gifted nature analytic, strictly scientific work does not at all exclude the possibility of free, purely artistic creativity and vice versa."⁹⁸ Thus, this opposition was already being formed long before C. P. Snow would formulate the classic opposition between the sciences and the humanities (although most prominently literature) in his Rede Lecture of 1959—forever after known as the Two Cultures.⁹⁹ As Lionel Trilling has pointed out, however, the common reading of Snow as pointing merely to a failure to communicate between two equal (and equally useful) cultures is quite misleading. Quite the contrary, Snow clearly declared the scientists as the team to bet on, and the literary intellectuals and other humanists as the slow coach that had missed its chance to join the race.¹⁰⁰

⁹⁷ These other cases generally display greater propensity to be generalized, while Borodin's case remains highly idiosyncratic. See, for example, Myles W. Jackson, "Harmonious Investigators of Nature: Music and the Persona of the German *Naturforscher* in the Nineteenth Century," *Science in Context* 16 (2003): 121–145; Erwin Hiebert and Elfrieda Hiebert, "Musical Thought and Practice: Links to Helmholtz's *Tonempfindungen*," in Lorenz Krüger, ed., *Universalgenie Helmholtz: Rückblick nach 100 Jahren* (Berlin: Akademie Verlag, 1994): 295–311; "Chemist-Composers: An Explosive Combination," *Chemical Heritage* 15, no. 1 (Fall 1997): 35; and Martin D. Kamen, "On Creativity of Eye and Ear: A Commentary on the Career of T. W. Engelmann," *Proceedings of the American Philosophical Society* 130 (1986): 232–246.

⁹⁸ Dianin, "Aleksandr Porfir'evich Borodin," 376

⁹⁹ C. P. Snow, *The Two Cultures* (Cambridge: Cambridge University Press, 1998 [1959]).

¹⁰⁰ Lionel Trilling, "The Leavis-Snow Controversy (1962)," in Lionel Trilling, *The Moral Obligation to Be Intelligent: Selected Essays*, ed. Leon Wieseltier (New York: Farrar, Straus, and Giroux, 2000): 402–426.

This illuminates the underlying current of the chemists' consistent championing of Borodin: they do not wish to show that it is possible for a chemist to be a member of the artistic world; they hope to demonstrate that Borodin was *at root* scientific, and thus it is possible for scientists to belong to both cultures, while the humanists, parochial and simplistic, are confined to just one. One might be forgiven in thinking that Borodin would view such an agenda—as he would Stasov's—as a failure of proper training.