certain selections should ideally have been substituted with ones centred on cities and localities that have more compelling links to France and its musical heritage (such as Florence).

Beyond the above, there are also a few minor quibbles arising from this book. First, the organization of chapters is not always optimal, both within sections (e.g. placing Maccavino's contribution between the closely related ones of Carbonnier and Granger) as well as across them (e.g. both Ciliberti's and Smeesters's essays are arguably a better fit with sections immediately preceding the ones within which they appear). Secondly, certain aspects of the book are not as uniform as they perhaps ought to be, for example regarding the chapter lengths (the smallest is nine pages, the largest 35) and certain editorial details (e.g. some chapters use subtitles to divide their mini-sections, others asterisks instead; similarly, some place archival document transcriptions in an appendix, such as on pp. 240–1, whereas many others simply cite these in the main body, even when this entails very long extracts, as on pp. 175-8). Finally, the book might have benefitted from the inclusion of just a few more images to help immerse the reader more fully in the subject matter, especially where reference is actually made to one(s) not reproduced in the text itself (e.g. p. 68 n. 71 and p. 230 n. 60).

Nonetheless, these reservations should in no way detract from the value of this book, whichas we have come to expect from Brepols-is a handsomely produced volume, with a tactile cover, good-quality paper thickness, and stylish text layout. Beyond extending our knowledge of an oft-neglected but essential musical profession in early modern France, this collection indirectly encourages us to ask questions about how church music masters differed in their functions and status from other parts of Europe at this time and across different periods-fields of enquiry that certainly merit further investigation, and for which this book will provide a most useful starting point. In all, this ensures that the present volume will be of interest to scholars working in a wide range of disciplines, not just musicologists or specialists in early modern France.

> ALEXANDER ROBINSON Cambridge University doi:https://doi.org/10.1093/ml/gcab128

© The Author(s) 2022. Published by Oxford University Press. All rights reserved. For permissions, please e-mail: journals.permissions@oup.com Quarrels on Harmonic Theories in the Venetian Enlightenment. By Patrizio Barbieri. Pp. 372. (Libreria Musicale Italiana, Lucca, 2020. ISBN 978-88-5543-022-7, €40.)

Patrizio Barbieri is an Italian musicologist with an impressive record of publications on music theory, musical acoustics, musical instruments, tuning and temperament, and related subjects, most often in a historical context, usually concerning the sixteenth to the eighteenth century and often focusing on Italy. These articles have appeared in the most diverse sources: periodicals, congress volumes, anthologies and so on, most often in Italian, sometimes in English or German. Already several times he has collected his articles in a certain area, revised them, ordered them, and included them in a single book, in English translation, provided with introductions and notes, so that they become more easily available to an international readership. First appeared, in 2008, Enharmonic Instruments and Music 1470–1900: Revised and Translated Studies (Latina, Italy; 616 pages) then, in 2013, Physics of Wind Instruments and Organ Pipes 1100-2010: New and Extended Writings (also Latina: Levante; 568 pages). They read a bit like a reports of the explorations Barbieri has carried out in these fields himself.

Now a third such volume has appeared. Quarrels on Harmonic Theories in the Venetian Enlightenment consists of eleven chapters ('numbered' from A to K), of which ten are based on articles published from 1987 to 2005. These articles are thoroughly revised in addition to being translated where applicable. Chapters A to F (Part I) deal with 'The Theory of Harmony', chapters G to K (Part II) with 'The Theory of Consonance'. As the title of book already suggests, the chapters deal with texts written by authors living in the Veneto region, mostly Venice and Padua, roughly in the century from about 1720 to about 1820. Where useful, however, Barbieri steps outside these confines, both chronologically and geographically, as we will see later on in this review. In many cases the texts discussed gave rise to debates in their own time and these debates are also comprehensively considered, as indeed the title of the book ('Quarrels on ...') already promises.

Part I deals with what can be called the history of music theory or historical music theory. Chapter A describes the harmonic theories proposed by the so-called 'Scuola dei rivolti' (School of Inversions), represented here by the theorist-composers Francescantonio Calegari (1656–1742), Francescantonio Vallotti (1697–1780), and Giordano Riccati (1709–90). They describe chords as a cumulation of thirds up to the thirteenth, which can be inverted at will. Applied to musical compositions, the eleventh and the thirteenth appear as 4 and 6 in continuo figuring, where they are treated as dissonances.

Chapters B to E deal with Tartini's use of the *terzo suono* (third sound; today called combination tone or difference tone) as the basis of the major scale and his questionable geometric derivation of the minor scale. Attention is paid in particular to the debates between Tartini and a number of scholars from whom he sought approval but received, disappointingly, disapproval if not derogation.

Chapter F turns to a slightly different subject: it describes the *affetti* that Giordano Riccati (1709–90) assigned to the various keys when a keyboard is unequally tuned in a variant of what today is often called a 'Vallotti tuning' (a tuning with the fifth between diatonic notes tempered by one sixth of a syntonic comma and the other fifths untempered).

Part II deals with theories of musical consonance. Central in this part is the discussion of ideas and theories proposed by four Italian scholars and scientists (not all of them working in the Veneto region): Giuseppe Pizzati (1732-1803), Alessandro Barca (1741–1814), Andrea Draghetti (1733–1823), and Filippo Foderà (1789–1837). The theories proposed cover the transition from traditional views based on the simple stringlength or frequency ratios of consonances to a more continuous conception of consonance based basically on beats by almost coinciding harmonic partials. Critical responses to the theories proposed are discussed as well. The approach of this part is different from that in Part I by the presence of an introductory chapter that deals with the 'history of consonance' from Antiquity to the eighteenth century and a concluding chapter dealing with the history of consonance from the early nineteenth century to the present day. That means that Part II of Barbieri's book presents a complete history of consonance as a psychoacoustical phenomenon.

Every chapter is provided with an introduction outlining the expositions that follow as well with a summary that repeats the main conclusions. Barbieri did not want to take the risk that the reader would get lost between the many details and points of view offered everywhere. And as a reader I can say the introductions and summaries are indeed at least helpful if not indispensable to navigate through the text. The book also contains a number of original documents—letters and essays—not available in modern print before and now given in full (with or without English translation).

Most of the theorists and theories discussed will be unknown to the reader who opens this book, but interesting they are and now easily accessible thanks to Barbieri's comprehensive explanations. Let us first look at Part I, dealing with the 'Theory of Harmony'. Discussing historical music theory is a fairly straightforward thing to do, but what about the foundation given by the various authors of their statements? Rarely they are really convincing to us, as for example Tartini's 'terzo suono' and Rameau's 'résonnance des corps sonores', both often quoted by Barbieri. Discussing such foundations is a rather ambiguous activity: should one go along with the theorist and accept his expositions (which often are to us unfounded speculations) or should one be critical, which does not seem to make much sense, several centuries *post datum*.

Barbieri most often navigates carefully between contemporary and modern views. But some conclusions I find hard to share. Already at the very beginning it is said that today everyone agrees on the two statements, (1) a chord is harmonically identical with its inversions and (2) the origin of the diatonic scale lies in the triads based on the first, fourth, and fifth degrees (ascribed to Rameau, 1722 and 1737 respectively), that 'mark the birth of modern harmony' (pp. 3–4). Personally, at least, I would endorse neither statement: in musical practice inversions are certainly not interchangeable and the diatonic scale can be found already in antique and medieval music theory, way before the presence of any major (or minor) triad. (And I do not know what exactly 'the birth of modern harmony' is.) Barbieri says that the substance of these statements is already found in works by Caligari, Vallotti, and Riccati earlier than in Rameau's publications but unknown to the public because not published. For me such a comparison is somewhat pointless, considering the quite different contexts in which the ideas are presented. Rameau seems, in fact, to have been some kind of thorn in the side of Italian music theorists of the eighteenth century: several texts discussed by Barbieri contain attempts to show that Rameau's theories were without any value.

But returning to Calegari and his Scuola dei rivolti: however interesting their theories are, they bring little (if anything) that cannot be explained from traditional counterpoint and they come in a time that had less and less need of such sophisticated textures. Nor would I be tempted to say that every composer who uses multiple suspensions does so because of influence of the Scuola dei rivolti.

Riccati's theory of the *affetti* of keys in unequal temperament is called 'the birth of harmonic analysis'. Few if any music theorists would use the expression 'harmonic analysis' for what Riccati described. And also: with the general acceptance of equal temperament in the nineteenth century, analyses of the kind that Riccati proposed had no future at all.

In Part II of Barbieri's book, on the theory of consonances, the status of the theories described is different from those in Part I, in fact much less ambiguous: they deal with a psychoacoustic phenomenon, and, being based on observation and experiment, should have universal value (although I find the word 'universal' somewhat grand here). Historical theories of consonance can be judged from what was known at the time about the acoustics of musical instruments and the physiology of the ear. In these fields, there were, however, numerous misconceptions, which were resolved at various points in history, some of them not before the twentieth century. Actually, any theorizing before Helmholtz's Lehre von den Tonempfindungen (1863) was bound to be erroneous or at least incomplete. This part of Barbieri's book is fascinating in showing the constant change of opinions depending on what was known about the properties of musical instruments and the human ear.

As said earlier, most of the book consists of text translated from Italian. In general, the translation is adequate and reads very well. From time to time one senses an Italian flavour. This is probably hard to avoid and actually not a problem. But every now and then there are minor or less minor defects. Sometimes expressions are used that strike me, even as a non-native English reader, as non-idiomatic, such as the frequent use of the word 'sector' in expressions such as 'in the sector of music theory'; it seems to me that 'field' or 'area' would have been more appropriate. And downright wrong is the systematic translation of 'battuta' by 'beat', where it clearly means 'bar'. Here, one wonders what the copy-editing process was like.

In conclusion, however, Patrizio Barbieri's book is an attractive read for those interested in the history of music theory of the eighteenth and the beginning of the nineteenth century and particularly for those interested in the history of psychoacoustics.

> Rudolf Rasch Utrecht University

doi:https://doi.org/10.1093/ml/gcab131

© The Author(s) 2022. Published by Oxford University Press. All rights reserved. For permissions, please e-mail: journals.permissions@oup.com Piano-Playing Revisited: What Modern Players Can Learn from Period Instruments. By David Breitman. Pp. 228. Eastman Studies in Music. (University of Rochester Press, Rochester, NY, and Woodbridge, 2021. ISBN 978-1-64825-010-1, $\pounds 40.$)

This book is the fruit of David Breitman's thirty vears at Oberlin, the distillation of his methods of introducing students of the modern piano (and its standard repertory) to the subtle and sometimes frustrating delights of its earlier forebears. That his task may not always have been easy is suggested by the text-box headed 'Do I have to?' and by a proliferation of sharply honed analogies: audiences used always to want the latest music, just as now they always want the latest movies; two-part writing is like black-and-white television; did Renaissance artists dream of acrylic paints? (an excellent dismissal of an all too prevalent fallacy); heavy modern dampers are like the brakes of a sports car. This last analogy is later somewhat vitiated by 'fortepianos are like sports cars ... start or stop abruptly ... sharp curves at high speed'-but this is part of an argument in favour of tempo flexibility, for which I would forgive any analogical inconsistency.

The idea of transforming modern piano playing through lessons learned from earlier instruments features in many a thesis: this book puts the concept firmly into practice. It is frankly addressed to good piano students, though older musicians will find it interesting too. Much of it could be summed up in the phrase 'Play what it says', but since the implications of that deceptively simple instruction vary between types of pianos, Breitman has focused his chapters in categories that a modern piano student can relate to: Mozart, Beethoven, Schubert, and Chopin, paying due attention to the variety of different instruments each composer knew.

These chapters, the meat of the book, are put into context by an autobiographical note telling of a familiar epiphany of a suddenly discovered perfect balance in chamber music—the cello loud enough at last!—and two preliminary chapters. The first briefly explains that the piano was not always as it is—increasingly necessary for students of a modern instrument both homogenized and ubiquitous—and continues to a brief history of the ideals of performing style, a topic considered more thoroughly in the book's Epilogue, but here unexpectedly illustrated by a picture of Osborne House.

That great pioneer, Malcolm Bilson, Breitman's teacher, leaves his mark in the very first music example, the opening of Mozart's F major