Research in the Conservatoire

Exploring the Middle Ground

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Our contribution on the status and content of research in conservatoires has two parts. The first part addresses three questions: (1) How should research be integrated into a conservatoire curriculum? (2) What kind of music research are we talking about? (3) What research skills should be covered at the bachelors, masters and third-cycle levels, and what kinds of research can be done by teaching staff? The second part examines the content and organisation of research in masters programmes for musicians, illustrated by three case examples.

WHY ARE WE ON EARTH?

A brief survey of the mission statements of some European conservatoires gives an idea of the importance they attach to a research attitude on the part of musicians. The Paris Conservatoire, for instance, seeks «to form inquiring, knowledgeable and open-minded artists», and the Royal College of Music in Stockholm is «an excellent place to develop your talent and ability, deepen your understanding, and explore fresh fields of knowledge». London's Royal College of Music aims at «enabling students to develop musical skills, knowledge, understanding and resourcefulness». And the Conservatory of Amsterdam is a place where «students learn to approach their profession in an independent, reflective and responsible way (...) and acquire an innovative attitude that corresponds to the demands of musical life».

The training of musicians thus involves cultivating talent, artistry, personality, skills, craft and expertise. It develops insights, knowledge and understanding, along with curiosity, open-mindedness, reflection, responsibility, inquisitiveness, and a research attitude. In a word, the musicians' training focuses on their artistic development into what Donald Schön has called «reflective practitioners». That is the rationale of a conservatoire study program.

Conservatoire curricula are programmed to stimulate this artistic development. Obviously the primary focus of the training is on a student's principal study – voice, instrument,

composition, conducting - alongside which students often (alas, increasingly only sometimes) have the opportunity to do a secondary study. Students may also participate in ensembles, orchestral studies, or other modules related to their principal study. An important part of the course is devoted to what we might call «musical literacy»: music theory and analysis (including ear training and sight-singing) and music history. Music education modules are offered to prepare musicians to teach music if they so choose as part of their later careers. Finally, there are modules for stage training, studio technique and other skills, which may be part of an electives programme. The question that now presents itself is: should a separate module for «research» or «research training» be added to this overcrowded degree programme? The answer is «no». After all, the degree course as a whole is already designed to promote the artistic development of musicians into reflective practitioners. All the course components together serve this purpose. If the focus on reflection, understanding and inquisitiveness were to be parked away into a separate module, that would defeat the purpose of the research training and cause unwanted fragmentation.

One of the oft-noted, and often resurfacing, problems with curriculum design in conservatoires is the lack of equilibrium and integration between theory and practice. The danger of fragmentation and compartmentalisation is familiar to anyone who works in a conservatoire. The practice-theory divide is not just experienced between the practice of playing or composing and the technical music theory know-how as learnt in subjects like harmony or sight-singing. It also makes itself felt between the whole sphere of training in artistic techniques and the deeper reflection on music, music-making, musicianship and musical life at large. As a rule it is difficult to verify the success of attempts such as linking music analysis or musical aesthetics to performance practice. If, for the rest, the learning of reflective abilities and the cultivation of inquisitive attitudes are activities performed in isolation from the students' artistic and musical development, then that puts the cart before the horse, and in some sense it may even deepen the gulf between practice and theory. As long as we stay

imprisoned in the dualism between theory and practice, any attempt to bridge the gap or bring the two together will bear limited fruit. It is more useful to start from the perception that forms of knowing, understanding and insight are embodied within the musical practice itself - in music-making, composing, conducting - and that a certain «knowledge» lies enclosed in the musical experience, a knowledge that is not always, or perhaps cannot be, made explicit as such. The focus of research in the conservatoire should be on these forms of reflection and understanding - forms that are bound up with musical practice. Research is therefore not an isolated subject or separate module. Reflection and research are integral to the artistic development of musicians as well as to the development of music and musical life. It is therefore wise to integrate them into the entire conservatoire programme, with a student's principal study as the point of departure.

RESEARCH BETWEEN THE INFORMAL AND THE DISCIPLINED

Many people, not least artists, think of «research» as a self-contained domain of human endeavour, governed by rules that are, if anything, totally at odds with artistic practice. Their point of reference is an institutional one: research as a discipline taught at universities and representing such values as rationality, truth, knowledge and progress – «academic research» for short. On the other hand, they may be familiar with an informal notion of research in the context of artistic creation. In this context, doing research is preparing the ground for meaningful action.

It is perhaps less important for such research to proceed in accordance with academic-style practices than to be of immediate concern to the artist and the field in which she is working. However, research can only thrive if it can be shared. In this regard, the academic species has set an example that should not be entirely ignored. Academic research is done in virtual communities; it can lead to an intensive exchange of ideas - as well as to fierce competition, it is fair to say boosting the wheel of discovery. Specialized knowledge and professional jargon aside (no strangers in the art world either), it distinguishes itself mostly by a certain conformity imposed on the acts of proposing, executing, reporting and criticizing. But the nature of this conformity differs from field to field. For a perhaps all-too obvious example, what qualifies as explanation in Physics may not help the historian understand the past. Furthermore, the norms of academia are frequently called into question by its own inhabitants - for example, when it is felt that they limit their perspectives, or even serve as instruments of power in the production and transmission of knowledge.

Academic research exists in many varieties. If all these varieties still hold something in common, the research undertaken by artists may well share it with them. In every domain of knowledge or practice, research serves as a medium of informed and productive conversation, and it has to obey

the rules that help prolong that conversation for the sake of new ideas. These are basically rules (a «canon», if you will) of collaborative behaviour, of «citizenship» in speech and writing. No more, no less.

In short: an artistic branch of research need not be developed from scratch; nor does research as such contradict the nature of art. When we talk about integrating research into the artistic domain, we should think not so much of bringing new practices to that domain as of supporting and channelling energies that already linger there. In so doing, we will be creating a middle ground between the artistic disciplines, in which research proceeds informally, and research-as-a-discipline. To put it differently, we try to confer some discipline on the informal.

INTEGRATION: HOW?

The introduction of research into the conservatoire has an impact on three areas: the curriculum, the staffing policies and the institutional infrastructure.

If we assume that reflection and research are integral to artistic development and ought to be integrated throughout the degree course, then that will have its consequences for the curriculum, the admission of students and their supervision and assessment. In the admission process, especially to the masters and third-cycle programmes, attention will need to be paid to the candidates' abilities and readiness to engage in reflection and research. Both inside and outside the conservatoire, students will no longer be judged solely on their musical abilities. Prospective artists must be capable of contextualising and positioning their work, taking part in the discourse on their field of endeavour and manifesting a certain curiosity about the different ways of viewing it. During their studies, they need to be facilitated in further developing such capabilities, and that requires particular skills on the part of teachers, both of theoretical and of practical subjects. The final assessment of the students' artistic development will focus not just on their artistic abilities, but also on their understanding of the profession, of musicianship and of the musical world in its broader context.

All this implies that the teachers, too, must show willingness and capabilities to reflect on their own professional discipline. That is by no means obvious to all of them, and some even oppose the idea. Such resistance is understandable to an extent. The implicit knowledge and often tacit understanding that is part of music-making often seems to resist explicit articulation. We simply know more than we can tell. Yet it is a misapprehension to think that all knowledge and understanding must necessarily be made explicit in verbal discourse. More than anything, research in music is research in and through the making and playing of music. Implicit and explicit knowledge and understanding meet here, without the one being reduced to the other. The conservatoire teachers of the 21st century are reflective practitioners in their own right. The recruitment of new teachers should therefore focus

(just as it does for students) more explicitly than before on reflective abilities and the readiness to perform research. And as is common in other higher education disciplines, conservatoire teachers, or at least some selected groups of them, should be enabled to design and conduct their own research projects as part of their jobs.

Research in the conservatoire will not truly come to life until it is sustained by a culture in which dialogue, critical reflection and engagement are intrinsic, and until it is supported by an infrastructure that both facilitates and invites to research. Such an infrastructure implies ready access to research resources (including digital databases and journal collections), the regular organisation of seminars and lecture series, an adequate number of workspaces equipped with essential facilities such as computers, and – not least – sufficient financial resources to facilitate staff research, produce publications and convene special gatherings such as symposia.

WHAT KIND OF MUSIC RESEARCH?

In the debate on research in the arts, a distinction is often made between research *into* art practice, research *for* art practice and research *in and through* art practice.

Research *into* musical practice involves interpretive, historical, sociological or culturally critical academic research on music, such as that conducted in musicology or in social science studies on music and music practice. Research on music education or music therapy also fits this category. This is research that sheds a certain light on music, musical practice or music life.

Research *for* musical practice should be understood as a type of applied research, whose findings can be put to use in musical practice. This category includes research on materials, musical instruments, or their design and construction, and research on music theory or technology (from acoustics to software development). This is research whose application fosters musical practice.

The type of research most closely intertwined with artistic practice and with the artistic development of prospective musicians is research *in and through* music-making and music performance. Increasingly, this type of research is referred to in the international discourse as «artistic research» (künstlerische Forschung). It stands apart from other fields of academic research in two ways: (1) musical practice is an integral part of the research (the «methodological criterion»); and (2) the research outcomes themselves are, in part, musical practices or musical products, such as performances or compositions – «in part» because some kind of discursive framing of the research is generally required to contextualise it and position it in relation to academic discourse. This is research that is fostered by musical practice.

In our view, all three research types now have their place in conservatoires. We therefore argue for «methodological pluralism». Research inspired by musicology or social science, research aimed at innovation of techniques, materials and

instruments, and research intertwined with performance, composition, or improvisation all have a natural home in the conservatoire. It is important to note that artistic research is most at home in the third cycle, in doctoral programmes at conservatoires. Doctoral research in the humanities or social sciences, like technical and applied doctoral research, can, of course, be conducted quite well in the more traditional settings at technical or research universities.

STUDENT RESEARCH AND STAFF RESEARCH

Research at conservatoires is focused on, and inseparably intertwined with, artistic development. (In that sense, it can be seen as a form of «practice-based research».) That is not to say that fundamental knowledge and understanding plays no part in music research. But in music research, this sometimes tacit, sometimes non-conceptual but nonetheless fundamental understanding is developed in interplay with the practice of music-making. The intimate bond between research and musical development must therefore be safeguarded in the music curriculum. This is why integration with a student's principal study is crucial. Students learn to do research in the interest of their own artistic development; that, in turn, will contribute to the development of the discipline.

The same is true of the research conducted by conservatoire teachers, but in their case a second aim is important too. Staff research is often instrumental in further developing the education and training provided by the conservatoire. Cutting-edge insights obtained in staff research are fed back into the curriculum in one-to-one tuition, in the range of available student specialisations and in performance and composition practice. Figure 1 depicts the mutual influences between research, education and artistic development at the conservatoire.

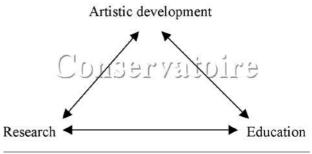


Figure 1

Up to now, the state of the art in musical practice has been directly translated by teachers into educational and training activities at the conservatoires. They brought their experiences and insights with them, as it were, into the classroom. Yet as research is increasingly introduced into the conservatoires, opportunities now arise to communicate those experiences and understandings to the students in more articulated and reflective ways. This creates room (not only figuratively, but also in terms of concrete task descriptions) for reflection

and for the integration of artistic insights into the training programmes. Much is therefore to be said for embedding this scope for research into the staff structure by pursuing differentiated human resources policies, and thereby enabling the appointment of teacher-artist-researchers.

BACHELORS, MASTERS AND THIRD-CYCLE PROGRAMMES

When we speak of «research» in the curriculum, we are actually talking about research training - the learning of research skills by future musicians which they can later apply towards permanent innovation and enrichment in their musicianship and their profession. At the bachelors level, research training roughly involves learning at least four fundamental academic skills that are prerequisites for doing research: the skills of argumentation, formulating questions, working with information, and presentation. These thinking, writing, information and presentation skills, applied to a student's principal study, may come together and be subject to assessment at the final stage of the bachelors degree, possibly in the form of a practice-based project that integrates theory and practice, thinking and doing. As we shall see in the second part of this article, the masters programme would involve a stronger focus on the artistic specialism.

The postgraduate or third-cycle training at the conservatoires concentrates primarily on carrying out artistic research – research in and through musical practice. This would be based on research questions that issue from a student's own musical practice and that are also relevant for others. Such research is practice-led – for example, new insights and experiences may be articulated in and through the playing or composing of music. The research outcomes will be performances, improvisations, compositions or installations, which make up the artistic component of the doctoral thesis. Some time ago, the third-cycle working group of the European Association of Conservatoires (AEC) published recommendations on how to structure programmes such as this artistic third cycle; for a detailed discussion we refer to that report (AEC 2007).

RESEARCH TRAINING AND EVALUATION CRITERIA

Although research may not be new to the artistic domain, research training is still a relatively unfamiliar activity in a conservatoire setting. It is a necessary activity if we wish to «confer some discipline on the informal». However, «discipline» can be a Jekyll-and-Hyde type of concept, connoting «regulation», but also «regimen» and – worse even – «punishment». What kind of discipline is involved here, and what purpose does it serve? To answer the latter question first, the purpose is to make artistic research explicit, visible, and shareable, in accordance with the function assigned to it earlier in this article, i.e. to stir productive debate and reflection. In a nutshell, this is the «credo» of the Master Research Programme at the Conservatory of Amsterdam, to which we

shall now turn for a look into practice. The following criteria are central to the evaluation approach at the Conservatory of Amsterdam, where projects are presented at an annual fiveday research symposium:

- the research should aim to contribute something «new» to the professional field in which the student is working, something that did not exist before, be it new knowledge, new instruments, new techniques, new methods, or new ranges of artistic expression. (Originality)
- students should relate the research to the current state of the field, taking into account prior accomplishments of others. (Orientation)
- the research process should be carefully documented, so as to provide instructive insight, and allow constructive criticism. (Responsibility)

These are very general criteria. They do not exclude any type of research. What types are pursued depends on the knowledge, interests and skills of the students, and these are manifold. We do not want to confine the students in their choice, nor do we want to create unnecessary barriers between research practices – scientific, scholarly, or artistic. However, it is obvious that a conservatory builds, first and foremost, on the expertise that the student has developed as a musician. This expertise, then, is the true basis for a valuable research project, more so than a disconnected research curriculum.

CASE EXAMPLES

Now we will briefly present the research projects of three students who graduated in 2009, and relate these projects to the afore-mentioned criteria, the first and second in particular. The projects were chosen by the students themselves. Two students actually didn't need the research programme to realize these projects. They were working on them already, and would have completed them anyway. Perhaps, they would not have written about them, or otherwise have shared their research experiences with an audience – but they welcomed the opportunity to do so.

1. Juggling electronic music

The composer Arthur Wagenaar devised a set-up for live-electronic music, in which the act of juggling serves as an interface. A skilled juggler himself, Arthur presented his project in the form of a research lecture with demonstrations. Figure 2 is a kind of score, but it is not in the first place a musical score. It represents a juggling pattern. A, b, c, and d are objects; L and R signify the right and left hands, respectively. Each column is a beat, and each number represents the number of beats during which an object is in the air. From Newton's law of gravity we can infer that this number is also an indication of the height the object reaches. The numbers are derived from «Site swap», a notational system that was developed in 1985, and is commonly used by jugglers since.

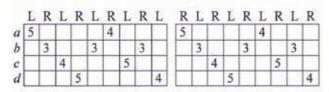


Figure 2 (Wagenaar 2009, 13)

By using systems for video tracking and image processing, Arthur was able to translate colours, forms and movements – all traditional ingredients of a juggling act – into sound parameters. In other words, he could turn the juggler into a musical performer, whose actions generate a sequence of musical events in real time. This was a novel idea and a technological achievement in itself, fitting in with our first evaluation criterion (originality). But most importantly for us, it responded to a problem that Arthur himself stated as follows:

In a concert of well-known acoustical instruments, the audience easily understands the relationship between the visual and the auditive – that is, between the physical actions of the performer on an instrument and the sound result thereof –, but in an electronic concert this relationship often remains unclear. Thus, a performance of electronic music is often difficult to comprehend on an analytical level, and, while fascinating to listen to, sometimes plainly boring to look at ... the audience might feel puzzled about the roles of electronic devices, speakers and persons present on stage. Even if this puzzlement is totally unconscious, it will still lessen the concentration to the music itself and therefore makes this music harder to appreciate. Wagenaar 2009, 1

A research project often begins with the observation of a problem, a lacuna, a need, or a possibility in a particular field of interest. In other words, it presents itself with respect to the state of the art, satisfying our second criterion (orientation). The problem that Arthur raised was the relative lack of performativity in live-electronic music, for which juggling was meant to make up. Did he succeed? At the time of the presentation of this project, there was not yet much interesting music to listen to – just a couple of experiments. In our view, however, this did not detract from the value of the project, which brought into unusually sharp focus a major issue of contemporary musical life.

2. Basso continuo realization on the cello and viol

The baroque-cellist and viola da gambist Robert Smith investigated shreds of historical evidence for the practice of basso continuo realization on the cello or viola da gamba alone, and explored the techniques this practice may have involved. This project was presented as a workshop for cellists.

Figure 3 shows a number of realizations, on the cello, of a C-major chord. In the music of the Baroque, the realization of chords from a single bass note – like, in this instance, the C – is usually assigned to the player of harmonic instruments, like a harpsichord, organ, or lute. Inspired by the studies of Valerie Walden (1998) and David Watkin (1996), who had found indications for a practice of harmonic accompaniment on the

cello in the late seventeenth and early eighteenth centuries, Robert probed ways in which cellists from this period may have added extra notes to a bass line. What was possible, and what would have been desirable in specific contexts?



Figure 3 (Smith 2009, 46)

Robert's project tied in with existing historical research, thus giving evidence of orientation in the field of historically informed performance. However, it was in essence an experimental project. In view of the lack of contemporary treatises or tutors, he could only judge the results of his explorations with his own ears. And it had a pedagogical side, too, since it enabled him to teach harmonic improvisation on his own instrument. As a supplement to his research paper, he turned in an instruction book for those «wishing to realize basso continuo on the cello and viol» (Smith 2009, 8).

The project was original in that it moved beyond the historical evidence at the surface of which so much interpretation has stopped dead. And while exploring the realm of the imaginable rather than that of the knowable, Robert could still exercise musical judgement:

I have found that doubling the melody with the highest notes of a chord is never good. Although doubling can work with a plucked instrument such as the harpsichord, I think the nature of the cello as a sustaining instrument prevents it from doubling successfully. Since it accompanies other sustaining instruments, the result of doubling is something like a sonorific clash. Smith 2009, 41

Such reasoning satisfies the third of our evaluation criteria (responsibility). The point cannot be proven; but it can be argued, inviting readers to go and check this out for themselves.

3. New saxophone etudes

The saxophonist Adrian Tully wrote a series of studies, or «etudes», in preparation for the major works of the saxophone repertoire. He presented his project in the form of a lecturerecital.

The etude shown in Figure 4 is based on ideas from Claude Debussy's *Rhapsodie* for Saxophone and Orchestra (1901-1908). Adrian wrote similar etudes referring to other works, like Glazounov's *Concerto in E-flat major*, op. 109 (1934), and Jacques Ibert's *Concertino da Camera* (1935). He had observed a gap between the common pedagogical repertoire for saxophone and the more demanding concert pieces which he wanted these etudes to fill.

Etude after Debussy's Rhapsodie for Alto Saxophone for Alto Saxophone for Alto Saxophone for Alto Saxophone

Figure 4 (Tully 2009, 2)

In the process of composing, Adrian asked himself what makes a good etude. These are a few of his ideas:

- it must be concise and no longer than a page or two;
- it should be initially very difficult for the student, certainly not sight-readable;
- it should focus on only a select few issues if the etude works on too many problem areas at once, it loses impact;
- it should have a certain amount of repetition, allowing the student to practice effectively. Tully 2009, 7

Furthermore, he analysed the difficulties with which each chosen concert piece confronted the player. These difficulties should then be addressed in the corresponding etude. In Debussy's *Rhapsodie*, for example, «the tone is never fully established and semi-quaver passages are often sudden». (Tully 2009, 8) The brief and fast excursions in the «altissimo» register in the same piece also pose a considerable hurdle for the saxophonist. Adrian replicated a particularly difficult passage in his etude – but in a lower octave, «in order to familiarize the student with the intonation of the line». (Tully 2009, 10)

Apart from adding a number of such «satellite etudes» to the saxophone repertoire, Adrian examined existing collections of saxophone studies, such as Eugene Bozza's Études-Caprices and Jean-Marie Londeix's Nouvelles Études Variées. He also examined similar collections for violin (Kreutzer, Rode). Thus, he was able to argue the need for a collection like his own, and to reflect on the etude as a genre. Additionally, his project was an interesting example of a research resulting in actual music – an example apt to be followed in other areas of instrumental or vocal performance.

CONCLUSION

The implementation of research in the setting of an artistic Master's programme has not gone uncriticized. One of the main objections is that students are required to perform tasks for which they lack education or experience. There should be no basis for such criticism. Rather than an extensive training in research methodology, artistic research requires an intimate knowledge of one's art, plus a sense of the wider perspectives in which it can be placed. These are reasonable requirements

to impose on students who proceed to the masters level, since both qualities must have been developed as part of the preceding Bachelor's programme. Consequently, our focus should not be on what these students lack, but on what they can bring to the research programme.

However, although research may take place in close connection with artistic practice, it is not identical to it. It should contribute to an ongoing discussion that sheds light on this practice while at the same time nourishing it. Among other things, this involves taking position with respect to the state of the art, presenting new ideas and arguing their merits, and explaining the methods used to develop and implement these ideas. Therefore, artistic research will, at least partially, take on a discursive shape.

Research training, to the extent that it differs from advanced training in any of the creative and performing arts, should stimulate an inquisitive attitude and discursive openness. But it would fare best when integrated in the student's principal study – in line with the informal ways in which artistic research has evolved most successfully so far.

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