

Learning experiences of Expert Western Drummers: A cultural psychology perspective

Bill Bruford

Introduction

This chapter explores the perceptions of the formative music learning experiences of a subset of expert popular music instrumentalists – drummers – and how the effects play out in the subsequent creative actions of the participants. It starts from the presumption that the experience of musical learning undergone by individuals who later develop as internationally recognized performers might warrant examination by virtue of the proven success of its outcomes. Most studies that focus on musical learning have done so within the context of Western classical music (Barrett 2011a, 265) and within that of student or early-career practitioners on pitched instruments. The learning experiences of high-level, peak-career experts on unpitched instruments in non-classical traditions have been much less examined, and it is the perceptions of such a group that provide the setting for this analysis.

Evidence provided here will help demonstrate that a) informal learning may be more productive in some areas of music practice than formal learning; b) calls for the refocusing of the notion of practice to accommodate something more than solitary confinement with the instrument should not go unheeded; c) the somewhat under-sung value of non-deliberate practice demands equivalency with the acknowledged value of deliberate practice; and that d) parental involvement in learning may have both negative and positive impacts. Elements of action theory¹ are used to situate learning in the context of drummers' "community of practice" (Wenger 1998), itself embedded in a cultural system characterized in part by the unpitched nature of the instrument (Boesch 1987, Cole 1996). The community both shapes practitioners' engagement and colours perceptions of action-choices.

Methodology

The methodological approach was framed within a constructivist, interpretivist epistemology and an ontology in which reality is not external or objective; rather it is just the sense we make of things. Sense-making is a core activity shared by researcher and participant: in a double hermeneutic approach the researcher attempts to make sense of the participant making sense of his or her perception (Smith et al. 2009). A common qualitative sampling strategy was adopted, that of studying a relatively small number of special cases of expert practitioners – a good source of learned lessons. Semi-structured research interviews

¹ An action-theoretical perspective takes action as intentional and goal-oriented. It relates the mind to the cultural setting and links the individual to the situated context; here, the drummer to the drum culture. Through action, the individual transforms and is transformed.

were conducted in the expectation that a focus on experience rather than career might encourage a high level of forthrightness and disclosure. Nine participants, selected to achieve a broad representation of contemporary practice, were identified as experts by virtue of their having (a) extensive international-level collaborative performance experience with acknowledged popular music ‘stars’ or leaders; (b) led a music ensemble of any size in the performance of their own music; (c) directed the production of at least one commercially available recording that embodied their own performances. One exception to these criteria was permitted in the interest of covering the broadest possible range of practice; Ralph Salmins eschewed the nurturing of a parallel solo career in the interest of his development as a studio drummer. Peter Erskine, Cindy Blackman Santana, Mark Guiliana, and Chad Wackerman are North American. Martin France, Dylan Howe, Ralph Salmins, Asaf Sirkis, and Thomas Strønen are European. The participants are, by permission, referred to throughout by first name.

The interview data illuminated participants’ perceptions and experiences of creativity, some of which described earliest memories of engagement with music at a point where learning and creativity were closely allied. The current paradigm emphasises the development of music expertise as residing in benign environmental conditions and appropriate education “critiqued and monitored by an expert other” (Barrett 2011b, 13). While undoubtedly that may hold good in some cases, my research suggests that expertise is also achievable within less stable learning and in less than benign conditions, a scenario characterized by engagement and struggle with the haphazard, the stochastic, the partial, the muddled and the interrupted, in an ever-present overcoming of obstacles to progress.

Cultural psychology in action

Cultural psychology is the study of the human mind through studying its cultural products. It is concerned with what Bruner calls the "meaning-making process" which plays a central role in all human action and experience. Drumming is a cultural artefact with, arguably, different meanings for, for example, Chinese and Western practitioners. In the Western culture, old associations of the pitch of an instrument with music and beauty and the absence of definite pitch with noise and ugliness not only persist (Brennan 2013), they continue to be heavily promoted to children globally through, for example, Roger Hargreaves’ “Mr. Men” series of books, in which “Mr. Noisy: The Musician” (Hargreaves 2014) is, somehow inevitably, a drummer. While I do not intend to examine the multiple causes of this, the pitched/unpitched distinction remains one dimension of the culture of instrumental practice and one aspect of the cultural psychology that in part determines the actions of Western kit drummers. Viewed through an action-theoretical lens, learning is both experienced and assigned meaning through goal-oriented action in context (Bruford 2018). To summarize, the essence of this principle is that the human mind comes to exist, develops, and can only be understood within the context of meaningful, goal-orientated and socially determined interaction between human beings and their material environment (Vygotsky 1974; Boesch 1987; Cole 1996). Action is the means by which we understand the individual in culture: we are what we do, and what we do is embedded in a complex social matrix of people and artefacts.

Theorizing drummer action from this perspective, the cultural tool (music) is mediated by the action (learning) of the agent (learner) using the mediational means of the Western drum kit (Boesch 1987, 1991; Wertsch 1998). Tools and their use may be psychological or physical; adopted, learned, adapted, or invented from scratch and passed on to succeeding generations. For participants in this research, tools exist at the physical level (drums, cymbals, electronic processing devices, multiple types of strikers); at the skill level (stick control, sight reading, metrical, and temporal skills) and at the conceptual/ideational level (for instance, in research participant Dylan's case "to help or to express the intangible idea") and are acquired through learning. Their use is permitted, predetermined and/or constrained to varying degrees by the extenuating parameters of the situation, and mediated by multiple ethical, aesthetic and philosophical considerations. Tools may pre-exist the users or be originated by them as their conscious or subconscious selves may dictate. Skills are developed to use the tools, acquired at some effort, wisely and appropriately, in pursuit of significant cultural action. They are developed in relation to the particular mediational means from the level of competence, through proficiency, to mastery. Drummers acquire more or less haphazardly a generic set of tools sufficient to play to a standard; the more creative go on to devise their own tools in pursuit of significant cultural action (Bruford 2018).

The dominant discourse around acquiring the tools and skills to achieve expressive performance addresses experiences of formal and informal learning and training. The formal aspect of a drummer's education typically resides in regular or occasional drum lessons from more or less qualified instructors with variable outcomes, following which the student is generally expected to practice a certain amount alone until the next lesson. Informal practices, by contrast, might include 'learning by doing' (Schank et al. 2012) and 'hanging out' – one way of becoming a "cultural being" through enculturation (Cole 1996, 109). Boundaries between formal/informal and practising/playing/working tend to be perceived as fluid and blurred. Karin Johansson refers to Yrjö Engeström's argument that theories of learning often presuppose the learning content to be stable, and as such are consequently inadequate for explaining "transformative processes in which the learning content is not yet known or defined" (Johansson 2012, 221). Notwithstanding the instability of the learning content in drumming, and the variable quality of instruction received by those within the research group, all participants recognized the need for 'deliberate practice', a focused set of activities designed to improve performance in some skill (Ericsson et al. 1993, 367). This was deemed crucial to the development of the information embodied in their formal lessons or acquired informally.

Analysis

Tool acquisition through informal learning

Research participants' early listening habits tended to be formed by the music taste groups

(Mulder et al. 2007) associated with their localized versions of the popular music of the day. Mark, for example, was influenced by the North American popular music of the early to mid-90s (Soundgarden, Nirvana, the Red Hot Chili Peppers); Cindy by the grand masters of her African-American rhythmic heritage (Art Blakey, Tony Williams, “Philly Joe” Jones). Asaf listened to “a lot of Balkan music, a lot of Middle-Eastern music, a lot of classical music, a lot of rock music: I heard a lot of Yemenite music when I was a kid”. Instrumental in the development of a more directed listening were teachers (Chad, Mark and Peter), friends and other musicians (Thomas) and parents and family (Dylan, Chad, Cindy and Peter), with Chad, Cindy and Peter benefitting from exceptionally pro-active family members. These people directed young ears to community “movers and shakers” in classic patterns of knowledge transmission within ‘communities of practice’ (Wenger 1998).

Invaluable knowledge was further gained by the musicians’ quintessential informal learning technique of hanging out, described by Thomas:

I was always playing with older people, I was learning a lot. People from that mini big-band that I played in were much more established on the music scene[...] I was given advice all the time. (*They were giving you advice ... you were learning about music from those guys (yes) not from a drum teacher?*) Not from a drum teacher (*fine*). These guys were giving me loads of records, and I would sit at home and listen [...] I would try to copy it.

In a similar manner Cindy’s enculturation by an informal learning circle of internationally-known community elders exemplifies the transmission from community senior to junior of what Glăveanu calls a ‘culturally impregnated’ resource²: “Art Blakey used to tell me stories about him hanging out with Chick Webb ...” Hanging out provided ‘confidence’ (Mark), ‘inspiration’ (Martin), “a way of being unique or being special or developing your own sound” (Asaf), a bridge into creative music (Cindy) and a perspective from outside the domain. As Asaf observes, an individual’s listening history is always unique because “no one will have the same influences ... of these millions of different experienced moments”.

Parental involvement

Recent research on exceptional musicians within the classical tradition identifies no cases of individuals reaching very high standards of performance without substantial support and encouragement from family (Howe 1990). Michael Howe has pointed to a large body of empirical evidence that testifies to the value of early stimulation and parental encouragement to learn (Howe 1999, 435). From this he concludes that there is a close relationship between “the way youngsters experience the activities that make them unusually competent and their family backgrounds” (1999, 433). Participants saw tool acquisition as reliably and invariably facilitated by positive parental involvement, thus buttressing existing evidence. The skill resides in the effective application of the tool. The skill is in turn informed and constrained by experience, by what Peter characterizes as “a seasoning, of knowing maybe the best option, a note-to-self, don’t try that one again”.

² Glăveanu identifies such resources as the “symbolic resources (signs and tools from a Vygotskian perspective) used in creative acts” (Glăveanu 2010, 11).

Once committed to the idea, most parents gave generous support to the young drummers, at least in the beginning. Most participants were from musical families, loosely conceived as one or more parents or siblings playing an instrument at amateur level or above, so the rigours of being a parent in such a household were not entirely unknown. Chad states that his parents were “100 percent supportive”; he and his father, a music teacher and drummer, even shared the same teacher. Parental involvement included but was not confined to spending long hours arranging and transporting the student to and from concerts, lessons, and auditions sometimes hundreds of miles away (Martin, Peter, Chad, Ralph), altering the garage to make soundproof space (Chad) and providing financial support towards early equipment purchase (Asaf, Ralph and Peter). With music on both sides of her family, the support Cindy received was central to her development of a set of moral values which “certainly helps you keep your focus and stay true to your core”. Dylan’s less than perfect experience of parental support may well have been coloured by his father’s position as a celebrated rock guitarist: “They did try to take me to a couple of teachers”, he said, but they were hesitant about ‘grooming’ him for success. While perceptions of the quality and consistency of family support were variable, participants testified to its high importance in their development as expert performers.

Parental involvement, however, may transmit conflicting, unhelpful or regressive messages. In the eyes of some parents, drums, for example, may not be a ‘proper’ instrument, nor music school a ‘proper’ education, nor music a ‘proper’ occupation. One of the first obstacles to overcome was to persuade parents to look favourably upon early musical endeavour and, if not actively support it, at least not wilfully obstruct it. Young Thomas demonstrated a remarkable level of determination at age five in insisting to his mother that getting him a drum he had seen in a shop window was “the right thing to do”. He had never mentioned drums before. He did, however, suffer overt parental obstruction for a period before he left home:

I tried to get into *Musikkhøgskole*³ but my father, who was in the Marines, wouldn’t let me. He said I have to have a proper education.

Having begun at the same age on the violin, Ralph was compelled to strike a Faustian bargain with his parents when he proposed a move to drum kit. They insisted that “you need to learn a proper instrument, with music ... but they weren’t sort of denigrating the drums ... that’s how they perceived it”. Such episodes appear typical of the rather grudging engagement with unpitched instruments, seen as in some way insufficient or incomplete and, as such, unlikely to provide employment. This attitude could be explicitly endorsed by the drummers themselves. In Ralph’s case “My parents said you’ve got to study other things first before you do drums, very wisely”. A prejudice in favour of pitched instruments may thus be embedded in the informal learning methods by which knowledge is transmitted within and outside the community.

³ At age 15 Thomas wanted to transfer from regular high school to one with a specialist music programme but was denied.

A relationship might be hypothesized between the perceived shortcomings of the unpitched instrument and the adoption and practice of a pitched instrument. It was almost uniformly suggested that developing participants should simultaneously study a second (pitched) instrument, the latter being seen as helpful in support of a career on the former. All did so to some degree. Understanding his drum kit as inherently limited and limiting, Dylan taught himself rudimentary piano, in part because he feels “the drums and piano are just kind of an extension of each other”. Britons Ralph and Martin had an early start at primary school with piano and/or violin, in an educational system that allowed that to drop away at secondary level.⁴ In comparison, the mid-twentieth century North American educational system (at the time these drummers were beginners) offered less formal music education at primary level (although it could, of course, be purchased privately) with good percussion instruction more available more at college level.

Turning points

Having spent some time acquiring and using tools in a rudimentary fashion, participants typically reported one or more moments of awareness about the creative potential of music, the action of drumming and the potential for change. Windows of perception opened, however briefly, and precipitated abrupt change in their respective approaches to learning. All participants experienced one or more pivotal moments in their development as performers. These included hearing the playing of a critical other at the right time for his or her own development, someone who “gave me the confidence to start thinking like...everything is fair game” (Mark); the imparting and receiving of critical technical information from an older practitioner “that just opened me up and the more I got into creative music” (Cindy), or an unforgettable teacher assessment of capabilities after a disappointing test result at nine years of age (Thomas). These turning points were further seen as being beyond individual control. Numerous incidents were perceived as having a fortunate or lucky outcome: Chad and Martin were ‘lucky’ to play with creative bands and leaders; Cindy was ‘blessed’ to have been taken under the wing of elders like Art Blakey and allowed to ‘sit in’ with his band; Thomas was ‘very fortunate’ to have played ‘loads of concerts’ at a young age; Mark ‘got lucky’ with a ‘really inspiring’ nationally renowned drum teacher. What links these examples is that all were assigned meaning as powerful agents of change, as pivotal events on the path to achieving expertise in music performance.

Tool acquisition through formal learning

A cultural divide: availability and quality of instruction

⁴ Limited opportunities for music creation in UK secondary schools have been noted in successive Ofsted reports (Cook 2012, 387). The Office for Standards in Education (Ofsted) is the statutory body that oversees education in English schools.

Accounts of formal learning experiences evidenced an unexpected division along geographical and cultural lines, falling either side of a surprisingly deep gulf between North American and European participants. Broadly conceived, the former drew more from a greater availability and a higher quality of formal instruction than the latter.⁵ While effective instruction was facilitated by supportive and stimulating parents in both groups, it was taken to be more available, particularly in the early years, in North America. Peter, for example, had his first drum lesson at five years old, was ferried hundreds of miles to jazz band camps, and performed with a national jazz orchestra at age seven. Emerging from a fife and drum corps background, Cindy was similarly immersed at a young age:

I think I was about 11 or 12 [...] We had to play them [the rudiments] at every speed from dirge to lightning fast [...] and we had to be able to control everything that we played.

Chad appears to have had the sort of educational development more typically associated with elite classical musicians; that is, the maximization and careful monitoring of deliberate practice with “the explicit goal of improving some aspect of performance” (Krampe and Ericsson 1995, 86). The son of a music-teacher father, himself a drummer, Chad was a keen and disciplined student capable of handling a stiff practice regime at an early age. He was tutored by excellent nationally-known teachers who had taught previous generations of emblematic creatives. Together with supportive parents and siblings, these elements reduce the chances of failure. This atypical level of attention to his development was appreciated:

I loved it (*mmm*). I loved it, and especially when I... especially with the private teachers (*yeah*), it was so focused and so methodical.

These experiences contrast sharply with the variable quality of the formal instruction undergone by some of the European participants. Dylan’s development in the UK was somewhat arrested by insufficient and/or poor guidance (‘neutral encouragement’) from teachers and parents (“they did try to take me to a couple of teachers”) and fewer opportunities for collaborative learning. While Martin and Thomas both had to navigate degrees of domestic friction as parental encouragement waxed and waned, a substantial hurdle for Asaf was the long weekly bus trip for instruction in the only drum school at the time in his native Israel. Similar obstacles were far less evident within the North American group.

Prioritizing the informal over the formal, the European cohort tended to highlight that aspect of informal learning known as ‘learning by doing’. By this is meant, broadly, the

⁵ Only recently have British conservatories undertaken the teaching of drum kit. A majority (75 percent) of North American participants and a minority (40 percent) of European participants studied some form of percussion at college or conservatory level.

fostering of skill development in the situated context of its use (Schank et al. 2012, Custodero 2012). This group preferred to be out playing with others, learning by doing it on the job, and tended to denigrate those who have a more focused application to practising alone. Martin, for instance, knows musicians who “have their little routine and they can sit at home for hours and work through it, but I can’t do that”. More than their North American colleagues, the Europeans conveyed a sense that if you had a gig there was less need to practice. Ralph “wasn’t really a super-hard worker” *because* he was playing in his teacher’s rehearsal band. As a young professional, Martin was playing so much at that time, “you could literally...I mean, not *not* practise, but it did feel like you were playing all the time, particularly as some of the situations it was almost like experimenting and practising at the same time (*yeah*) as doing a gig”. This seemingly cavalier treatment of someone else’s musical situation (‘practising on the gig’) appears to be more indicative of the European approach to informal learning than the North American and may have its roots in the high value accorded to learning by doing with others. Important aspects of performance such as style and appropriateness are seen as acquired at least as effectively on the bandstand or in the rehearsal room as the classroom.

More tools in the box: deliberate practice

Reports revealed a linear relationship between the quality and amount of formal drum instruction and focused individual practice; the greater the availability of quality instruction, the longer the hours spent in deliberate practice. Having already noted lower levels of the former in the European cohort, a concomitant level of engagement with the latter was not unexpected. European participants indeed all showed, at least initially, an indifferent attitude to practice. On his own admission, Ralph was “lazy”. As a beginner, Martin didn’t practise very much: “maybe fifteen minutes in a day or something. (*Now and then after school?*) Exactly”. In striving to *avoid* sounding like another particularly successful drummer, Thomas maintained that “I thought if I practised a lot I would end up sounding like that. That was actually something I believed at that stage”. Presumably that approach informed his attitude to deliberate practice: “I wasn’t practising anything er ... systematic at all ... I was just playing”. Reflecting on his early years as a young musician, Thomas described the difficulty of life without a sufficient skill level. Ultimately his ideas were still-born:

I think I had an understanding of music, but not skills to, you know... (*execute it?*)

Yeah ... I had loads of ideas but I couldn’t fulfil them.

Sparked into belated action by an eventual realisation of the centrality of practice to the achievement of proficiency or mastery, the Europeans all subsequently stepped up the time spent in that area of their development. At the relatively late age of twenty, Thomas “started rehearsing never less than six hours a day, seven days a week ...making a plan of what to rehearse”.⁶ Sharp words from Dylan’s teacher eventually brought home to him the need for

⁶ Thomas, a native Norwegian speaker, uses the word ‘rehearse’ and its derivatives to mean both collective and individual practice, as opposed to the more generally used and separate ideas of ‘practice’ as individual and ‘rehearsal’ as collective endeavour.

action: “That actually kick-started my whole approach to obsessive... like... having to practice in a timetable, and split hours up, and then exercise into this and then into warming up”.

The Europeans, then, downplayed the importance of overt effort in the acquisition of tools and skills, adopting a more consistent, focused approach to deliberate practice only much later on in their development than the North Americans. The latter group, by contrast, characterized the deliberate practice v. performance issue not as an ‘either/or’ but rather as a ‘both/and’ binary, assigning equal importance to both. This was inculcated at an early age and developed within the framework of a more disciplined approach to learning:

Chad: Yeah, but ... (*two hours a day on top of your schoolwork?*) Yeah, you did an hour in the morning before school and an hour after - it’s not that much (*okay*). So one lesson I came in and I didn’t do enough and he could tell right away, then the conversation was like “so why are you wasting my time” and then he offered to fire me as a student.

Cindy: I love playing drums so practising for me is a joy; I love to practise. [...] It’s not a chore to play my drums.

Other participants joined Cindy in strongly associating the experience of drumming with fun and pleasure for themselves and others: “I looked at the drummer and thought *this looks fun*”. The strong emphasis on these last three words of Ralph Salmins’ youthful observation indicates a bottom-line appraisal of how drumming should be for both practitioner and listener – an aspect of performance that should be present as much of the time as possible. Fun is identified as an attraction to the art of drumming in the first place, as inherent in the action of drumming, both alone and in the company of others, and as attached to various dimensions of drumming, such as its unpredictability and capacity for surprise. Fun is frequently associated with the primary processes of acquiring the tools for creative performance; namely, drum lessons and practice sessions. Ralph’s early teacher “used to sit down and play “Lady Be Good” ... get me to jam along with him, which was fun”. Describing how he spends his time with a few precious hours in a quiet house, Thomas will “compose music just whenever I want to, as long as I want to, and I will play the drums. That’s what I love to do. I might not talk to any people ... I would just do that”. Mark’s radical change of both instrument and approach to his practice sessions only made practice more fun: “It was the most fun I’d had in a long time, actually, at the drums [...] and it was bringing out new ideas, and I was able to play more fluently and more quietly”. The clear linkage developing here between having fun and being creative is underscored by Peter Erskine. If Peter is not having fun, there is little likelihood of a creative outcome. Referring to the preparation of some new music, he is:

having as much fun or more playing it in the solitude of my studio than I anticipate I’ll have ... [...] I mean it is just part of the gig, I have to do it. I’m having more fun just kind of working on it.

It is commonly accepted that to become expert in any field, one is going to have to learn from mistakes, failures and errors. The few early disappointments that arose in part from poor or non-existent teaching appear to have had little permanent effect upon participants' creativity, as evidenced by the measure of success in evoking the phenomenon in later life. The North American cohort had few complaints in this area; all spoke of the consistently high quality of the instruction they received, frequently from nationally known teachers or older musicians.

All interviewees stated that they had undergone the lengthy period of knowledge and skill acquisition without which some propose that no one can make contributions to a domain,⁷ even if they had done so by paths differentiated by culture and geography. However, the very idea of deliberate practice was seen as in some need of amendment to accommodate something more than solitary confinement with the instrument. Peter calculated the number of hours in terms of his overall practice as well as his professional playing time, and claimed that "the person who has put in the time has a much better chance of succeeding". This pragmatic approach was mirrored by other participants, who saw deliberate practice as but one component of skill development, two more being rehearsing and performing with others in a musical situation. Mark felt that he also had probably clocked 10,000 hours alone, but:

I was always much more excited about being in musical situations and I felt like I would always grow much more in those environments than I would just practising alone. So, if those hours would count, then I certainly hit that number.

Deliberate practice was perceived as a means to reduce or minimize the time between the thought and its expression, thus allowing concentration on something other than the mechanics of drum performance. In Peter's perception, it also gives you "a lot more in your toolbox". Ralph evokes notions of the psychological Flow state⁸ when he tells his students: "Look, I'm not thinking about anything to do with the drums when I'm playing music, at all. I'm just playing". Practice has been elaborated by Weisberg in contrast to two other activities: work and play. Work, identified as involving "performance or competition for external reward" tends to preclude deliberate practice. "Indeed, problematic aspects of the skill would probably be actively avoided at such times" (Weisberg 1999, 233). An activity may start out as play, but change to practice as the practitioner becomes more serious about a career in the discipline. Both the European and North American sets of drummers recognized the need for deliberate practice and its purpose and potential benefits, principal among which were:

1. to economize and enhance the functionality of physical movement on the drum kit:
2. to afford greater choices and options
3. to have a better chance of succeeding

⁷ The 'ten-year rule' has been investigated by Hayes (1989) and popularised by Gladwell (2008) as the '10,000-hour rule'. The majority of participants considered that they had indeed completed 10,000 hours or more of deliberate practice.

⁸ As identified most notably by Csikszentmihalyi (1990) and Hytönen-Ng (2013).

4. to facilitate the communication of creativity on stage
5. to enhance versatility and unfetter expression
6. to facilitate a smooth-flowing execution of choice-decisions and thus effective delivery of the expressive idea

Three caveats concerning the quantity of deliberate practice emerged from participant responses. First, excessive time spent alone at the drum kit (generally taken to be an instrument of accompaniment and usually played with others) might have a negative effect on collaborative performance. Peter evidenced those musicians who practise:

so much alone that they don't know how to open themselves up through the collaborative or interactive experience. So, let's redefine the 10,000 hours. If that doesn't include a healthy combination of performance experience and collaborative experience (*absolutely*) then ... If he wants to be another Segovia, great; 10,000 hours in the practice shed will be terrific.

Second, some participants touched on a suspicion that a “natural feeling” for the instrument would be lost in the face of too much practice or “academic exercise”:

Dylan: Whereas if I had had that [drummer] Tony Williams type of thing “I'm going to practise eight hours a day as a teenager and just appear”, then who knows? But maybe it might have stymied a kind of natural feeling for the drums instead of seeing it as a kind of academic exercise.

The consequent delayed start to serious study may be related to the lack of self-esteem and considerable self-consciousness reported throughout Dylan's narrative. The suspicion that deliberate practice might have a detrimental effect on one's ‘natural’ abilities was exclusive to the European cohort and chimes with my experience as an educator. Third, overt dexterity should not be an object of attention, but concealed and employed invisibly, lest the manner of its use distract from the communication of the thought. A high skill level is widely considered among experts to be best employed in the service of the music rather than in any overt display for either its own sake or the aggrandisement of the practitioner. In this view, the art is to conceal the art. Peter's understated approach finds creative expression in his own minimalist trios where “every single cymbal pulse starts to carry a lot of meaning”. Everywhere implied although not explicitly examined is the unstated axiom that the music should not exist to serve the musician, but rather, the musician should exist to serve the music.

What emerges here is a sharp distinction between, on the one hand, the classical music tradition of instrumental development, which sees a clear demarcation between deliberate practice and performance; and on the other, a purposeful blurring of borders between work, play and practice in popular music performance. All musicians play (in the sense of generating music with their instruments) when they go to work, but expert

drummers tend to do more playing (in the sense of toying with something) at work than their classical counterparts. Creativity theorists (and expert drummers) might argue precisely that the problematic aspects of any skill should be engaged by toying with them, pulling them apart and playing with them *in performance*, contrary to Weisberg's formulation (above). When Thomas is practising nothing "systematic at all" and he is "just playing", he is thus indulging in a non-deliberate version of practice that may have equal potential to improve performance as the deliberate equivalent.

Findings

Approaches to and experiences of learning among the research group tended to divide along cultural lines. North American participants were considerably closer than their European counterparts to the benign environmental conditions and appropriate educational approaches that support Barrett's (2011b) somewhat idealized modelling of music expertise development noted earlier. Such conditions were only sporadically available to the European cohort in particular, who made do with whatever mode of learning they could locate in the development of their expertise. The two foremost objections given to any deliberate practice were (a) "it'll make me sound like everyone else" and (b) "it'll prevent me from being 'natural'". These two questionable premises underpinned the perceptions of several European participants, while their North American counterparts appeared entirely unaware of them and their potentially corrosive effect.

The slow development of formal learning in the popular music tradition may have heightened dependence upon informal learning actions, such as hanging out and learning by doing. 'Perfect-world' views such as those of Barrett have necessarily less to say about the imperfect world of scrabbling and scratching that is the lot of many drummers whose learning is of necessity driven to the informal with moments of enlightenment as likely to come from hanging out with significant others as from any kind of drum instruction. The data suggest that the experiences of the two sets were qualitatively different in five key respects:

1. Effective formal instruction was generally more available to North American participants than European.
2. A level of commitment comparable to that of the classical conservatory was expected of those who studied with nationally-known North American instructors. A lower level was expected from European instructors.
3. The North American cohort experienced failure in performance less frequently than the European. This was ascribed to better preparation for performance.
4. The European experts downplayed the importance of overt effort in the acquisition of tools and skills, adopting a more focused approach to deliberate practice only much later on in their development than the North American group.
5. The North American cohort seemed to enjoy and benefit from formal study which in turn reinforced deliberate practice. In contrast, those Europeans with little capacity for focused application and lacking effective formal instruction to counteract any

negative consequences, tended to valorize informal learning over any formal instruction.

A further group of observations emerged from the data set across both cohorts:

1. There is a linear connection between the availability of quality instruction and the hours spent in deliberate practice.
2. Findings supported evidence from the literature connecting the learning of popular music to Flow, fun and enjoyment (Csikszentmihalyi 1990, Hytönen-Ng 2013).
3. Expert drummers continue to teach and learn from others in the community of practice throughout their lengthy careers, exemplifying a ‘growth mindset’ (Dweck 2006).
4. Tool acquisition is facilitated by positive parental involvement. While seen within the academy as central to expert development, the engagement of friends, family or teachers may have negative consequences unique to the drum community.
5. A pitched instrument prejudice renders an unpitched musical instrument insufficient or incomplete in some way.
6. Some aspects of performance are better acquired through informal rather than formal learning.
7. Expert drummers tend to evaluate the stochastic incidents in the development of learning as positive turning points.
8. While the value of deliberate practice within formal learning is acknowledged, the somewhat unsung value of non-deliberate practice within informal learning demands equivalency.
9. Reports suggest that some amendment to ideas surrounding the quality and quantity of deliberate practice might be necessary. The notion of practice itself might be refocused to accommodate something more than solitary confinement with the instrument.

Concluding remarks

The context of the original research from which this chapter has drawn was creative performance among mature performers rather than the manner in which we educate students. Those experts’ experiences of learning have been carefully drawn upon to cast light on how we educate. Formal/informal learning should not, perhaps, be regarded as a dichotomy, but rather as the two poles of a continuum. Both these aspects are in various degrees present and interacting in most learning situations (Folkestad 2006; Green, 2002). Evidence in this chapter supports that position, with some aspects of effective performance, such as matters of style and appropriateness, better acquired through informal rather than formal learning. Within the drum culture, the balance between the two thus becomes critical to effective learning. Institutionalized education tends to privilege formal music learning over its informal counterpart; whether that is because the outcomes of the former are more easily quantified

than those of the latter is beyond the scope of this chapter. The research here strongly indicates that skill development through the interaction and ‘interthinking’ (Mercer 1995) associated with informal learning must combine with tool acquisition through the high quality instruction associated with formal learning, to produce the balanced combination that is crucial for expert performance. From this one might propose that a greater appreciation of what it means and feels like to collaborate musically should be inculcated within popular music education: too heavily geared to the acquisition of technical ability as a creative tool, too little geared to the acquisition of the collaborative skills without which that tool is rendered far less potent.

References

Barrett, Margaret S. 2011a. “On Being and Becoming a Cathedral Chorister: a Cultural Psychology Account of the Acquisition of Early Musical Expertise.” In *A Cultural Psychology of Music Education*, edited by Margaret S. Barrett, 259-288. Oxford: Oxford University Press.

----- 2011b. “Towards a Cultural Psychology of Music Education.” In *A Cultural Psychology of Music Education*, edited by Margaret S. Barrett, 1-15. Oxford: Oxford University Press.

Boesch, Ernst E. 1987. “Cultural Psychology in Action-Theoretical Perspective.” In *Growth and Progress in Cultural Psychology*, edited by Çiğdem Kağitçibaşı, 41-51. Lisse: Swetts & Zeitlinger.

----- 1991. *Symbolic Action Theory and Cultural Psychology*. Berlin, Heidelberg, New York: Springer-Verlag.

Brennan, Matthew. 2013. “‘Instruments of a Lower Order’: Historicizing the Double Status of the Drum Kit and Drummers.” Paper presented at the 17th Biennial Global Conference, International Association for the Study of Popular Music, University of Oviedo, Spain, June 24-28.

Bruford, Bill. 2018. *Uncharted: Creativity and the Expert Drummer*. Ann Arbor, MI: University of Michigan Press.

Cole, Michael. 1996. *Cultural Psychology: A Once and Future Discipline*. Cambridge, MA: Harvard University Press.

Cook, Nicholas. 2012. “Beyond Creativity?” In *Musical imaginations: Multidisciplinary perspectives on creativity, performance and perception*, edited by David J. Hargreaves, Dorothy Miell, and Raymond MacDonald, 451–59. New York: Oxford University Press.

Csikszentmihalyi, Mihaly. 1990. *Flow: The Psychology of Optimal Experience*. New York: Harper and Row.

Custodero, Lori A. 2012. “The Call to Create: Flow Experience in Music Learning and Teaching.” In *Musical Imaginations: Multidisciplinary Perspectives on Creativity, Performance, and Perception*, edited by David J. Hargreaves, Dorothy Miell, and Raymond MacDonald, 369-384. New York: Oxford University Press.

Davidson, Jane W., Michael J.A. Howe, Derek G. Moore, and John A. Sloboda. 1996. “The Role of Parental Influences in the Development of Musical Performance.” *British Journal of Developmental Psychology* 14(4): 399-412.

Dweck, Carol. 2006. *Mindset: How You Can Fulfil Your Potential*. New York: Random House.

- Ericsson, K. Anders, Ralf T. Krampe, and Clemens Tesch-Römer. 1993. "The Role of Deliberate Practice in the Acquisition of Expert Performance." *Psychological review* 100(3): 363-406.
- Folkestad, Göran. 2006. "Formal and Informal Learning Situations or Practices vs Formal and Informal Ways of Learning." *British Journal of Music Education* 23(02): 135-145.
- Gladwell, Malcolm. 2008. *Outliers: The Story of Success*. Lebanon, USA: Little, Brown and Company.
- Glăveanu, Vlad Petre. 2010. "Paradigms in the study of creativity: Introducing the perspective of cultural psychology." *New ideas in psychology* 28.1 (2010): 79-93.
- Green, Lucy. 2002. *How popular musicians learn: a way ahead for music education*. Aldershot: Ashgate Publishing Limited.
- Hargreaves, Roger. 2014. *Mr. Noisy: The Musician*. Paris: Hachette Livre.
- Hayes, John R. 1989. "Cognitive Processes in Creativity." In *Handbook of creativity*, edited by Glover, John A., Royce R. Ronning, and Cecil Reynolds, 135-145. Springer US.
- Howe, Michael J. A. 1990. *The Origins of Exceptional Abilities*. Oxford: Blackwell.
- 1999. "Prodigies and Creativity." In *Handbook of Creativity*, edited by Robert J. Sternberg, 431-446. New York: Cambridge University Press.
- Hytönen-Ng, Elina. 2013. *Experiencing 'Flow' in Jazz Performance*. Farnham: Ashgate.
- Johansson, Karin. 2012. "Organ Improvisation: Edition, Extemporization, Expansion, and Instant Composition." In *Musical Imaginations: Multidisciplinary Perspectives on Creativity, Performance, and Perception*, edited by David J. Hargreaves, Dorothy Miell, and Raymond MacDonald, 220-231. New York: Oxford University Press.
- Krampe, Ralf Th., and Karl A. Ericsson. 1995. "Deliberate Practice and Elite Musical Performance." In *The Practice of Performance: Studies in Musical Interpretation*, edited by John Rink, 84-102. Cambridge: Cambridge University Press.
- Mercer, Neil. 1995. *The Guided Construction of Knowledge: Talk amongst Teachers and Learners*. Multilingual matters. Clevedon, UK.
- Mulder, Juul., ter Bogt, Tom., Raaijmakers, Q., Wilma Vollebergh, W. 2007. "Music Taste Groups and Problem Behavior". *Journal of Youth and Adolescence*. April 2007, Volume 36, Issue 3, pp 313–324.
- Schank, Roger C., Tamara R. Berman, and Kimberli A. Macpherson. 1999. "Learning by Doing." In *Instructional-Design Theories and Models: A New Paradigm of Instructional Theory 2*, edited by Charles M. Reigeluth, 161-181. New Jersey: Lawrence Erlbaum Associates.
- Smith, Jonathan A., Paul Flowers and Michael Larkin. 2009. *Interpretative Phenomenological Analysis: Theory, Method and Research*. London: Sage Publications.
- Vygotsky, Lev S. 2012 (1974). *Thought and Language*. Edited and translated by Eugenia Hanfmann and Gertrude Vakar. Cambridge MA: MIT Press.

----- 1980. *Mind in Society: The Development of Higher Psychological Processes*. Cambridge MA: Harvard University Press.

Weisberg, Robert W. 1999. "Creativity and Knowledge: a Challenge to Theories." In *Handbook of Creativity*, edited by Robert J. Sternberg, 226-250. Cambridge: Cambridge University Press

Welch, Graham. 2012. "Musical Creativity, Biography, Genre, and Learning." In *Musical Imaginations: Multidisciplinary Perspectives on Creativity, Performance, and Perception*, edited by David J. Hargreaves, Dorothy Miell, and Raymond MacDonald, 385-398. New York: Oxford University Press.

Wenger, Etienne. 1998. *Communities of Practice: Learning, Meaning, and Identity*. New York: Cambridge University Press.

Wertsch, James V. 1998. *Mind as Action*. New York: Oxford University Press.