

Standal, Ø. F., Aggerholm, K. (2016). Habits, skills and embodied experiences: a contribution to philosophy of physical education. *Sport, Ethics and Philosophy*, 10, 269-282.

Dette er siste tekst-versjon av artikkelen, og den kan inneholde små forskjeller fra forlagets pdf-versjon. Forlagets pdf-versjon finner du på tandfonline.com: <http://dx.doi.org/10.1080/17511321.2016.1220972>

This is the final text version of the article, and it may contain minor differences from the journal's pdf version. The original publication is available at tandfonline.com: <http://dx.doi.org/10.1080/17511321.2016.1220972>

Habits, skills and embodied experiences

1 *This is the Author's Accepted Manuscript of an article published in Sport, Ethics and*
2 *Philosophy, available online:*
3 <http://www.tandfonline.com/doi/full/10.1080/17511321.2016.1220972>

4

5

HABITS, SKILLS AND EMBODIED EXPERIENCES:

6

A contribution to philosophy of physical education

7

8

Øyvind F. Standal

9

Department of physical education,

10

Norwegian School of Sport Sciences,

11

Oslo, Norway

12

Faculty of Public Health,

13

Hedmark University of Applied Sciences College,

14

Elverum, Norway

15

&

16

Kenneth Aggerholm

17

Department of physical education,

18

Norwegian School of Sport Sciences,

19

Oslo, Norway

20

Corresponding author:

21

Øyvind Førland Standal,

22

Norwegian School of Sport Sciences,

23

Postboks 4014, Ullevål Stadion,

24

0806 OSLO

25

Norway

26

Phone: +47 416 54 936

27

oyvind.standal@nih.no

Habits, skills and embodied experiences

1 **Abstract**

2 One of the main topics in philosophical work dealing with physical education is if and how
3 the subject can justify its educational value. Acquisition of practical knowledge in the form of
4 skills and the provision of positive and meaningful embodied experiences are central to the
5 justification of physical education. The purpose of this article is to explore the relationship
6 between skill and embodied experience in physical education through the notion and concept
7 of habit. The literature on phenomenology of skill acquisition is first considered. In particular,
8 we draw on Merleau-Ponty's notion of habit. Further, we introduce pragmatist philosophy and
9 in particular the work of John Dewey as a useful complement to the phenomenological
10 perspective. It is in particular Dewey's emphasis on habits, experience and education that are
11 found to be useful in our exploration of the relationship between the two justifications under
12 consideration, because it allows us to point out the importance of habits of attentiveness.

13 *Key words:* physical education, habit, skill, experience, pragmatism, phenomenology

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22

**HABITS, SKILLS AND EMBODIED EXPERIENCES:
contributions to philosophy of physical education**

Introduction

One important – if not *the* most important – topic in philosophical work on physical education is the justification of the place of the school subject in the curriculum. This topic is laid out by for instance Mike McNamee (2005) and Steven Stolz (2014), so we will not repeat the details here. Suffice is to say that the debate over the educational value of physical education has taken off from the influential work of philosopher of education Richard Peters from the 60ties (McNamee, 2005). Briefly put, Peters’ thesis was that education was concerned with the initiation the intrinsically worthwhile forms of knowledge that were constitutive of rational minds. The consequence was, as McNamee (2005) has formulated it: ‘[Peters’] thesis cast physical education well and truly into the educational hinterland’ (p. 2). Thus, researchers in physical education had their work cut out in order to come up with arguments for the educational value of the subject. One line of reasoning has been to argue for the educational value of practical knowledge in the form of skills that characterizes physical education. Whereas Peters’ view of education favored theoretical, propositional knowledge, physical education researchers argued that also the acquisition of practical knowledge is educationally valuable (see e.g. Arnold, 1979; Reid, 1998).

A second – and related – line of argumentation has been to say that Peters’ thesis was based on a dualist perspective on human beings. It gave priority to the mind to the exclusion of the body. Stolz (2014) has recently argued that such a dualistic position, which celebrates

Habits, skills and embodied experiences

1 the disembodied mind, has a long history that found its expression in Peters' view of
2 education. Thus, contra this disembodied understanding of education, it has been argued that
3 physical education as a body-linked subject provides students with opportunities to learn
4 about one self as an embodied being, and that such learning is educationally valuable (see e.g.
5 Stolz, 2014; Whitehead, 2001).

6 Our aim is not to assess the successfulness of those arguments. We simply note that
7 *acquisition of practical knowledge in the form of skills* and the *provision of positive and*
8 *meaningful embodied experiences* are central to the justification of physical education¹. Given
9 the emphasis put on acquisition of skills and embodied experiences, the purpose of this article
10 is to explore the relationship between skill and embodied experience in physical education
11 from a philosophical perspective through the notion of *habit*.

12 **Skills and habits: phenomenological approaches**

13 Largely speaking, the work on justification of physical education has been situated in the
14 analytical tradition of philosophy ([McNamee, 2005](#)). To a lesser extent, some authors have
15 relied on Continental philosophy, especially the phenomenological tradition (e.g. Arnold,
16 1979; [Connolly, 1995](#); [Standal, 2015](#); [Stolz, 2014](#); Whitehead, 2001). Those authors have
17 argued that the phenomenological understanding of the constitution of the lived body could be
18 relevant to the study of human movement. Since phenomenology is the study of lived
19 experience, phenomenology of skill acquisition appears to be a suitable starting point for
20 understanding the relationships between skill acquisition and embodied experiences.

¹ There are also other justifications such as for example health, moral development and preparation for active leisure. We will not go into that here, but see Stolz (2013) for an overview and discussion.

Habits, skills and embodied experiences

1 *The Skill Model: Application and Critique.*

2 Philosophers of sport have taken up an interest in the phenomenology of skill acquisition
3 (e.g. [Breivik, 2008](#); [Breivik, 2010, 2013](#); [Eriksen, 2010](#); [Moe, 2005, 2007](#)). [Moe \(2005\)](#), for
4 example, has criticized the information-processing theory that underlies the cognitivist
5 perspective on skilled motor behavior. The alternative posited by Moe was based on
6 philosophical theories of Hubert Dreyfus and John Searle. The work of Dreyfus and the
7 phenomenological philosophy he has advanced has become a particularly influential paradigm
8 for understanding the phenomenology of skilled sports performances ([Breivik, 2007](#); [Sutton,](#)
9 [McIlwain, Christensen, & Geeves, 2011](#)). Although a survey of this literature would be
10 valuable, it is for our purpose more relevant to engage with the underlying ideas of the Skill
11 model proposed by Dreyfus and Dreyfus (e.g. [Dreyfus, 2002](#); [Dreyfus & Dreyfus, 1986](#)) and
12 its perspective on phenomenology of skill acquisition

13 The Skill model describes a five-step progression in skill acquisition, from novice to
14 expert². This is a process in which the learner gradually advances from being dependent on
15 decontextualized and explicit rules and instructions through an intermediate phase in which
16 she becomes increasingly involved in the situation, but still dependent on detached rule-
17 following for coping with the learning situation. As the learner becomes more proficient, her
18 ‘theory of the skill, as represented by rules and principles, will [...] gradually be replaced by
19 situational discriminations accompanied by associated responses’ (Dreyfus, 2002, p. 370). In
20 other words, experience, the right forms of feedback, and personal involvement in the

² In one text, Dreyfus (Dreyfus, 2001) has added two extra steps in the model. However, these steps are omitted in later texts (e.g. Dreyfus, 2002).

Habits, skills and embodied experiences

1 learning situation can gradually free the learner to perform a skill without having to follow
2 explicit rules.

3 The work of Dreyfus and its application to sport has helped expel the intellectualist idea
4 that thinking comes before acting. It has also installed the human body as not only an object
5 of knowledge, controlled by the mind. The body is also the subject of knowing. This point is
6 important for physical education because it shows the closely embodied relationship between
7 the knowledge objects (the actions, activities and practices of movement) and the student as
8 an embodied, knowing subject ([Standal, 2015](#)). Although influential, the Skill model of
9 Dreyfus and Dreyfus has also received criticism. Two particular points are relevant in relation
10 to our purpose here, namely the prejudice against teaching and a problem with experience
11 inherent in the model.

12 The first critique is that there is a prejudice against teaching built into the model. One
13 feature of the Skill model is that teaching takes place at the first three stages, in which the
14 learners rely on rules and maxims provided by a teacher. At the higher levels, the teacher or
15 coach simply disappears and the learner is thought to develop through a feedback loop
16 referred to as the intentional arc. [Selinger and Crease \(2002\)](#) find this disappearance
17 problematic, because ‘a lived, embodied subject lacks an objective purchase on its own
18 performing process’ and is therefore open to ‘being better disclosed to outsiders, whose
19 intercessions may then help the subject to perform better’ (p. 260). In other words, an outsider
20 perspective on performance could be helpful.

21 Further, the Skill model mischaracterizes teaching. The role of the teacher in the Skill
22 model is merely to provide rules and maxims. Effective teaching, says Selinger and Crease

Habits, skills and embodied experiences

1 ‘involves modeling and demonstration and is addressed to the specific performances of
2 specific embodied learners. Since these performances differ from body to body, the
3 knowledge embodied in [teaching] cannot be reduced to rules of thumb’ (ibid.). Clearly, it
4 would be problematic for physical education to rely on a theoretical perspective that
5 undermines the role of the teacher. As such, the critique of Selinger and Crease shows some
6 limitation with applying ideas of phenomenology of skill acquisition to the school subject
7 physical education. This limitation pertains both to practical purposes about how to teach skill
8 acquisition, but also limitations for those who want to justify the educational value of the
9 subject in terms of practical knowledge.

10 The second critique of the Skill model is its relation to embodied experiences. Gunnar
11 Breivik (2013) has criticized the model for painting a picture of expert performances as being
12 zombie-like. According to Breivik, Dreyfus and others go too far in their portrayal of the role
13 of absorbed coping in athletic performance. Breivik (2013) sees them as describing the expert
14 performer as a passenger subjectivity that merely reacts to stimuli in the environment in an
15 almost behavioristic manner. Given the non-dualistic basis of phenomenology, this seems
16 paradoxical. In a similar critique, Zahavi (2013) goes even further by suggesting that ‘it is
17 hard to see why Dreyfus’s account [of absorbed coping] should merit the label
18 “phenomenology”’ (p. 334). Zahavi reads Dreyfus as claiming that absorbed coping takes
19 place non-consciously, for instance when Dreyfus likens Olympic swimmers to sleepwalkers
20 (a view also criticized by Breivik, 2013). The argument of Zahavi is then that without
21 conscious experience there can be no phenomenological access to expert performance.

Habits, skills and embodied experiences

1 Dreyfus' notion of absorbed coping is not alone in viewing mindedness as antithetical to
2 skill acquisition. More traditional, cognitive approaches share this perspective in positing that
3 the aim of the learning process is automatization, a level that transcends reflection and
4 thinking. In both cases, what Jean Lave (1996) calls the telos of learning seems to be to ignore
5 the body. If one of the values of physical education is the provision of embodied experiences,
6 this view is therefore problematic.

7 It is important to point out that to equate the phenomenology of skill acquisition in
8 philosophy of sport with the Skill model would be to erect a straw man. Put differently,
9 philosophy of sport has a wider perspective on the phenomenology of skill acquisition than
10 what we find in the Skill model. As already mentioned, Breivik (2013) has argued that elite
11 athletes are much more in hand with what they are doing than the Skill model suggests: 'After
12 all, [the athletes] have a clear notion of what they are involved in, what it is about and what
13 needs to be done. They are not passengers in their bodies, but instead are agents' (p. 103-104).
14 Along the same lines, Ilundáin-Agurruza (2014a) has suggested a phenomenology of skillful
15 fluency, as an alternative to the absorbed coping paradigm developed by the Dreyfus brothers.
16 Furthermore, drawing on existential phenomenology Aggerholm (2015a, p. 39-40) has
17 described the engagement of athletes as a kind of 'phenomenological circle', understood as a
18 back-and-forth movement between a wakeful and pre-reflective relation to one's situation.

19 From a physical education perspective, however, a problem with the philosophy of sport
20 literature on skill acquisition and skilled motor performance is that it examines athletic
21 excellence and expertise. The subjects under consideration in this literature are, as Ilundáin-
22 Agurruza (2014a) points out 'not just proficient, or even experts, rather they stand on a

Habits, skills and embodied experiences

1 category of their own' (p. 402). Physical education does not aim – or could ever envisage – to
2 develop that kind of expertise. In this sense, physical education is very different from sport,
3 because teachers deal more with what Ilundáin-Agurruza (2014a) calls phenomenology of
4 average performers³, which differs from the phenomenology of expert performers. A further
5 point of nuance can be made by saying that philosophy of sport literature is not particularly
6 interested in the learning process: both Breivik and Ilundáin-Agurruza are interested in those
7 who are at the expert level of the Skill model. How they became experts is rarely investigated.
8 Aggerholm (2015a) states this more generally by saying that philosophy of sport has been
9 more concerned with development *through* sport than development *in* sport.

10 *Habits and embodiment in the phenomenological philosophy of Merleau-Ponty*

11 The Skill model presented above is based on the phenomenology of Maurice Merleau-
12 Ponty. As Standal (2015) has pointed out, Dreyfus consistently uses the terms skills or
13 absorbed coping rather than habit. However, in the *Phenomenology of perception*, Merleau-
14 Ponty (2002) uses the French term *habitude*, which is translated into habit. For Dreyfus, habit
15 is not an appropriate term, because it connotes 'rigid behavior' (Dreyfus, 2005, p. 145) and
16 thus the term habit destroys the original meaning of Merleau-Ponty's use of *habitude*.
17 According to Dreyfus, Merleau-Ponty uses of the word *habitude* rather than *habilité* (which is
18 French for skills) because he wanted to stress that our skills are embodied, in the sense that
19 'we *have* our skills' and that this points to skills as 'flexible and situation-sensitive' (Dreyfus,
20 2005, p. 145).

³ Indeed, it could even be questioned whether it is correct to talk about students as 'performers'.

Habits, skills and embodied experiences

1 Understanding habit as rigid behavior is, however, to rely on a restricted notion of habit
2 (Crossley, 2001). It is also possible to understand habits as a situation-sensitive, flexible and
3 adjustable ability to act (Aggerholm, 2015a, 64-74; Crossley, 2001; [Ostrow, 1990](#)). Habits
4 give us both restrictions and possibilities. Merleau-Ponty described that: “Habit expresses our
5 power of dilating our being-in-the-world, or changing our existence” (Merleau-Ponty, 2002,
6 p. 166). As such, seeing habit as rigid behavior is a one-sided perspective. For Merleau-Ponty
7 (2002) the phenomenal body, which he also referred to as the ‘habit-body’, was a form of
8 practical knowledge. Therefore, there are good reasons to turn to Merleau-Ponty’s
9 conceptualization of habit as an embodied, context-sensitive form of practical knowledge.

10 In the *Phenomenology of perception*, Merleau-Ponty takes an interest in movement and
11 motor habits. His intention with this interest is not primarily due to movement and sports, but
12 because movement – and pathological cases of movement difficulties – can illuminate the
13 primacy of the body in our lives. For Merleau-Ponty, embodiment is the intertwining of body,
14 space and time in experience: The body is not, according to Merleau-Ponty *in* space and time,
15 “it inhabits space and time” (p. XXX).

16 Habit is for Merleau-Ponty an expression of this intertwining of body and world. In the
17 *Phenomenology of perception*, Merleau-Ponty discusses this further by using motor habits as
18 examples. Following his strategy of pointing out the errors of both empiricism and
19 intellectualism, Merleau-Ponty shows that habit is not a result of a stimulus-response learning
20 process. Neither is it an outcome of an intellectual synthesis. Merleau-Ponty rejects both the
21 idea of mental representations and the conditioned reflex as explanations for our embodied
22 habits: ‘Habit has its abode neither in thought nor in the objective body, but in the body as

Habits, skills and embodied experiences

1 mediator of the world' ([Merleau-Ponty, 2002](#), p 167). Drawing on Husserl, Merleau-Ponty
2 holds that movement is not primarily a matter of *I think*, but of *I can*. This *I can* is acquired
3 through efforts, in which habitual strategies are developed by the body-subject to deal with its
4 environment ([Dillon, 1997](#)). To learn a new habit, Merleau-Ponty states, is 'the motor
5 grasping of motor meaning significance' (Merleau-Ponty, 2002, p. 165).

6 In the course of his work, from *The structure of behavior* to *The visible and the invisible*,
7 Merleau-Ponty sought to develop a non-dualistic ontology ([Dillon, 1997](#)). In this ontology,
8 Merleau-Ponty points out the importance of embodiment for our human existence. This could
9 function as a justification for physical education as a body-linked subject ([Stolz, 2014](#)). There
10 is also a specific and relevant epistemological aspect of Merleau-Ponty's phenomenology.
11 Habits are, as he stated 'knowledge in the hands, which is forthcoming only when bodily
12 effort is made, and cannot be formulated in detachment from that effort' (Merleau-Ponty,
13 2002, p. 166). Thus, to recapitulate his phenomenological point, habits are a form of situated,
14 practical and embodied knowledge.

15 Richard Shusterman (2005) criticizes Merleau-Ponty for creating 'a polarization of "lived
16 experience" versus "representations" that neglects the fruitful option of "lived corporeal
17 reflection", that is, concrete but representational and reflective body consciousness' (p. 165).
18 This criticism is not a rejection of the phenomenological perspective on habit. Rather, it
19 points to need for a complementary perspective, one that can give put the work of
20 phenomenologists such as Merleau-Ponty into an educational context, without subverting its
21 non-dualistic ontology and practical epistemology. Following Shusterman, we suggest that
22 John Dewey's pragmatist philosophy can do so.

Habits, skills and embodied experiences

1 **A Pragmatist Slant to Skills and Experience**

2 In this section, we will turn to pragmatism. First, we will motivate this by arguing for why a
3 turn to pragmatism is useful for the discussing the relationship between skills and embodied
4 experiences. This entails shifting the language from skill to habit. We will argue that this shift
5 in language is not merely semantic. More substantially, speaking about habits rather than
6 skills aligns with pragmatism, without abandoning the phenomenological perspective already
7 introduced. Further, it is helpful in connecting the two justifications for physical education
8 that we are concerned with here. Indeed, we will argue that the pragmatic slant we provide
9 here is relevant for understanding and working with practical knowledge and embodied
10 experiences in PE.

11 One might argue that introducing pragmatist philosophy alongside the phenomenological
12 perspective entails a shift in perspective that begs questions over different ontological and
13 epistemological assumptions. In general terms, Bernstein (2010) has argued that
14 phenomenologists and pragmatist are motivated by ‘a similar problematic’ (p. 19), such as
15 problems with Cartesianism and problems with the spectator theory of knowledge. Although
16 there are differences in the philosophies of phenomenologists and pragmatists⁴, there are also
17 some deep similarities. More specifically related to habit, Ostrow (1990) points out that both
18 Dewey and Merleau-Ponty opposed the behaviouristic conception of habit as reflexes or
19 automatic and programmed tendencies to repeat certain responses. Habit, for both of them, ‘is
20 the embodied sensitivity to a sensible world, and in this respect it provides for a field of

⁴ It is also important to point out that just as much as there are differences *between* phenomenology and pragmatism, there are also differences *within* phenomenology and pragmatism respectively.

Habits, skills and embodied experiences

1 behavioral possibilities in experience' (p. 10). Standal (2015) has juxtaposed Merleau-Ponty's
2 account of embodied learning with Dewey's essay about the reflex arc in psychology: In this
3 essay, Dewey, much like Merleau-Ponty (1963) did in the *Structure of behavior*, criticized the
4 stimulus-response ideas of behaviourism. The shared criticism that both Dewey and Merleau-
5 Ponty pointed out was the problems of dualistic and mechanistic thinking: 'They both saw
6 that the human body does not passively await external stimuli. Rather, the body, or as Dewey
7 called it, the body–mind matrix, must be attuned to a situation in order to perceive
8 stimulations as cues to action' (Standal, 2015, p. XXX).

9 One of the relevant insights from John Dewey is that he connects habit to experience:

10 The basic characteristic of habit is that every experience enacted and undergone modifies
11 the one who acts and undergoes, while this modification affects, whether we wish it or
12 not, the quality of subsequent experiences. For it is a somewhat different person who
13 enters into them. *The principle of habit so understood obviously goes deeper than the*
14 *ordinary conception of a habit as a more or less fixed way of doing things, although it*
15 *includes the latter as one of its special cases.* It covers the formation of attitudes, attitudes
16 that are emotional and intellectual; it covers our basic sensitivities and ways of meeting
17 and responding to all the conditions which we meet in living (1938, p. 35. Italics added).

18 Thus, by drawing on the work of John Dewey, pragmatism provide us the opportunity to
19 relate the two justifications for physical education mentioned above, acquisition of practical
20 knowledge and provision of embodied experiences. In other words, the pragmatism of Dewey
21 addresses the problems identified above in the literature on phenomenology of skill in that it
22 highlights the educational responsibility and role of the teacher. Also, Dewey's work

Habits, skills and embodied experiences

1 preserves the importance of experience, thus making embodied experiences educationally
2 productive..

3 *Outline of Dewey's Theory of Education*

4 For Dewey, habit, experience and education were intimately related. Experiences have
5 both an active and a passive part ([Dewey, 1938](#)). On the passive side, experience is something
6 the subject undergoes in the sense that what happens is to some extent beyond the control of
7 the subject. On the active part, the subject actively takes or grasps the experience. This active
8 process is what Dewey referred to as inquiry or reflective thinking. Thus, experience is not to
9 be understood as a one-way traffic, either from the environment to the subject (as in
10 behaviourism) or from the individual to the environment (as in intellectualism). Experience is
11 rather an interaction, or transaction as Dewey would call it in his later works. In this sense,
12 Dewey's position is similar to Merleau-Ponty's, when he criticized both the behaviourist /
13 empiricist and the intellectualist points of view. Merleau-Ponty's argument was that 'neither
14 can grasp consciousness in the act of learning' (2002, p. 33), because they do not (fully) take
15 into account the interaction part of experience.

16 Not all experiences are educative, however. As a consequence of undergoing and
17 grasping experiences, the subject of experience develops physically, intellectually and/or
18 morally. However, for Dewey truly educative experiences are directed towards growth. That
19 is, experiences must be directed towards a desirable end, the value of which 'can be judged
20 only on the grounds of what it moves toward and into' (Dewey, 1938, p. 38).

21 Dewey distinguished two central criteria for educational experiences, namely continuity
22 and interaction. Continuity means that every experience takes up something from previous

Habits, skills and embodied experiences

1 experiences and in turn modifies the quality of later experiences. This means that we can only
2 make sense of our current experience in light of previous ones. In educational terms, a
3 consequence of the principle of continuity is that education should be defined as the
4 ‘reconstruction or reorganization of experience which adds to the meaning of experience, and
5 which increases ability to direct the course of subsequent experience’ (Dewey, 1916, p. 61).

6 The principle of interaction implies that in experience a transaction between an individual
7 and the environment takes place. This is referred to as an interaction between the objective
8 conditions that constitute the environment and the internal conditions of the subject,
9 understood as the needs, desires, purposes and capacities of the individual. In their interaction,
10 these two aspects form a situation⁵ (Dewey, 1938). The duty of the educator, Dewey observes,
11 is to ‘determine that environment which will interact with the existing capacities and needs of
12 those taught to create a worth-while experience’ (Dewey, 1938, p. 45). This means that it is
13 the obligation of the teacher to construct an environment by manipulating the objective
14 conditions so that the learner can have experiences, which match his or her capacities and
15 desires. Failure to construct such an environment, both in terms of adaptation of the material
16 and the “total social set-up of the situation” (ibid.), leads to mis-educative experiences. This
17 highlights the educational responsibility of the teacher.

18 It might seem to be a conflict between habit and Dewey’s educational theory. Whereas
19 one can say that habit is what keeps us going, education, conceived as inquiry in Dewey’s

⁵ This subject-object distinction might be seen as problematic from a phenomenological perspective. Merleau-Ponty for instance held that ‘Inside and outside are inseparable. The world is wholly inside and I am wholly outside myself’ (Merleau-Ponty, 2002, p. 474). Whereas pragmatism might help bring an educational perspective to Merleau-Ponty’s phenomenology, this is perhaps one instance where phenomenology can help Dewey’s pragmatism to maintain its non-dualistic ontology.

Habits, skills and embodied experiences

1 understanding, makes us stop and think. In other words, habits could be seen as concerned
2 with doing, and even more so a doing which is a repetition of previous acts. Education, on the
3 other hand, is a form of critical thinking, the formation of something new. However, this
4 would be a misunderstanding of Dewey's fundamental way of reasoning in general and in
5 particular a misunderstanding of his conception of habit.

6 First, that line of reasoning sets up an artificial separation between doing and thinking. As
7 is well known, Dewey is often connected to the proverb 'learning by doing'. It is correct that
8 Dewey thought that educational experiences must contain some activity, a form of doing. But,
9 it is one-sided and wrong to think that one learns just by doing. Reflection on the experience,
10 and more specifically, the felt difficulties of experience, is a important for Dewey's
11 educational philosophy. However, it is similarly one-sided to think of reflection on experience
12 as the hallmark of education. Dewey always looked to 'expose a tacit hierarchy in the terms in
13 which people conventionally think... We think we know in order to do; Dewey taught that
14 doing is why there is knowing' (Menand, 2001, p. 330).

15 Second, as already mentioned, Dewey did not think about habit as mindless activity.
16 Rather, habit was for Dewey an expression for a pre-disposition, not to act in a particular way,
17 but to certain modes of responses. As Noddings (2010) points out, the educational process
18 described by Dewey seeks to develop habits of mind. In other words, thinking is itself a habit,
19 something Crossley (2001) refers to as habit-busting habits. The notion of habit of mind,
20 however, can be thought to have an intellectualist basis prioritizing thinking, but such an
21 interpretation would be a far cry from Dewey's position, since he stressed the inseparability of
22 thought and action for education.

Habits, skills and embodied experiences

1 This presentation of Dewey's pragmatist, educational philosophy puts us in a position to
2 discuss in more detail the concept of habit in relation to acquisition of practical knowledge
3 and provision of embodied experiences.

4 **Habits and Physical Education**

5 As mentioned in the introduction, there are a myriad of justifications for physical education
6 (Stolz, 2014). However, the literature on physical education expresses a doubt about whether
7 physical education as a school subject is delivering its promises. Indeed, some argues that the
8 subject is in a state of crisis ([Kirk & Macdonald, 1998](#)). David Kirk (2010) attributes this
9 crisis – at least partly – to what he sees as a narrow and restricted educational practice in the
10 subject. In this regard, Bailey and co-workers, (2009) suggest that physical education is
11 “organised around short taught ‘blocks’ of a limited range of physical activities, particularly
12 team games, which are not necessarily lifelong activities” (p. 8). Kirk (2010) refers to this as
13 ‘physical education-as-sport-techniques’. By this, he means that it is the teaching and learning
14 of various sport techniques that are central to the way physical education is currently
15 practiced. A part of his argument is the distinction between technique and skill. Whereas
16 techniques are decontextualized aspects of a sport or an activity, such as the dig in volleyball
17 or the lay-up in basketball, skills are basically the same movements, but performed in context.

18 A related way of framing this critique of physical education is Kretchmar's (2006)
19 account of the ‘easy street’ approaches to physical education. The easy street approaches seek
20 to *introduce* students to a wide range of activities in the hope that they will find something
21 they enjoy enough to make it a life-time activity. They *inform* students about the health-
22 benefits of physical activity, but typically, it turns out to be no deeper than New Year's

Habits, skills and embodied experiences

1 resolutions. Easy-street approaches to physical education also *entertain* students. Although
2 there is nothing wrong with being entertained and enjoying physical education, Kretchmar's
3 point is that this approach rests on diversion rather than discipline. More generally, easy
4 streets consist of

5 a brief review of rules, a quick survey of basic skills, very little practice and feedback,
6 and perhaps a little play in only a simplified game form (perhaps, a larger ball, fewer
7 players) so that a lack of skill does not get in the way of having some fun. But skills are
8 not practiced diligently; *old habits are never relinquished; new habits are not developed;*
9 attitudes are not changed (p. 349. Italics added).

10 These brief reflections contextualize our explorations of habits in physical education. The
11 development of habit is difficult when the educational practice is characterized as wide-
12 ranging and shallow in its content.

13 The first point we will take up is implied in Kretchmar's reasoning about the information
14 aspect in the easy street approaches, i.e. that physical education can serve a health promotion
15 function. In Kretchmar's view, however, merely informing about the benefits of physical
16 activity is too shallow. It is worth mentioning that the idea that physical education can serve
17 as a tool for health promotion is widely criticized. Tinning (2010) warns about healthism, i.e.
18 an ideological view that assumes that physical education can contribute to better health
19 'because exercise = fitness = health' (p. 116). Of particular relevance in the context of this
20 article is the argument that an emphasis on health in physical education serves to objectify the
21 students' bodies in manners that are harmful to their well-being (ibid.). The body becomes
22 objectified as a thing that must be exercised and physical activities become technocratic tools

Habits, skills and embodied experiences

1 to achieve fitness and health. This goes against the justification of the subject where it is
2 thought that physical education should provide students with positive, embodied experiences.

3 We would argue that turning attention to habit in the pragmatist understanding would
4 help to circumvent the problems of merely informing about health benefits and hazards on the
5 one hand, and harmful objectifications on the other hand. If one accepts that an educational
6 value of physical education is to develop habits that support a healthy life, then the
7 educational philosophy of Dewey might give some direction on how physical education
8 should be practiced. One important feature of Dewey's philosophy was that educational
9 experiences must connect with the previous experiences of the students. In other words, a
10 one-size fits all approach to health promotion in physical education must be substituted with a
11 first-person approach where students are encouraged to draw on their own experiences.

12 Thorburn and MacAllister (2013) highlight the importance of experiential learning and
13 reflection on experience for a physical education curriculum, which connects with the lives of
14 the students in order to promote the development of well-being:

15 If such a first person perspective on learning was adopted, then experiential learning
16 could dovetail with the acquisition of knowledge (of skills, fitness, training, and healthy
17 living) in ways that equip students with the habits, skills and values to make coherent
18 well-being decisions in future years (p. 465)

19 Thus, a focus on development of habits through an educational process help us overcome the
20 shallowness of a curriculum which merely informs about the value of living a healthy life, and
21 that potentially informs in a way that objectifies both the students' bodies and the physical
22 activities they engage in.

Habits, skills and embodied experiences

1 The considerations here point to an apparent need for a conceptual analysis: what are the
2 differences between technique, skill, habit and other concepts that are employed to describe
3 the knowledge objects of physical education? For a more stringent analysis of skill, know-
4 how and practical knowledge, see Gunnar Breivik's contribution to this special issue. Clearly,
5 such an analysis should be applied to the physical education context. An important point in
6 this regard is Kirk's (2010) argument that although there is much talk about skill teaching, it
7 should more aptly be termed technique, because what is taught in physical education is to a
8 large extent de-contextualized and not practiced in game-like situations.

9 The development of healthy habits can be considered an important part of physical
10 education, but this kind of development must also be subjected to an ethical analysis of how
11 and why such habits should be developed. Aggerholm (2015b) connects Aristotelean virtue
12 ethics with the development of good habits in physical education. The ethical perspective is
13 also important in Dewey's educational philosophy. Recall here that educational experiences
14 should lead to growth, otherwise they would be mis-educative. A virtue ethical discussion of
15 the habits aimed at developing in physical education warrants further studies, which we
16 cannot pursue further here. However, it leads us to a related issue concerning habits, namely
17 whether habits can help provide embodied experiences.

18 Carlisle (2014) refers to the 'double law of habit': on the one hand, habit makes our
19 actions more precise and effective, but on the other hand, habit leads to a dulling of sensation:

20 In habit, both pleasure and pain are reduced, and even brought to a point of neutrality.

21 Because actions are strengthened by repetition, habit increases the efficiency and

Habits, skills and embodied experiences

1 accuracy of our movements – but this strengthening can be a problem when we want to
2 change habits that have become deeply entrenched (p. 31).

3 This is the *pharmakon* nature of habit: our actions become securer, but our sensations and
4 experiences become weakened. In this regard, it seems that the two justification under
5 consideration here are at odds: acquiring practical knowledge in the form of habits lead to a
6 weakening of the embodied experience of moving. (Recall here the criticism of Dreyfus' skill
7 model from Breivik and Zahavi respectively).

8 For a further illustration of the importance of teaching students to attend to their own
9 experiences of moving, consider the difference between two drinkers: the drunkard and the
10 connoisseur⁶ (Carlisle, 2014). For the former, repetitive drinking leads to less and less taste.
11 On the other hand, the repetition involved in drinking leads the connoisseur to a heightened
12 sense of taste and a refinement of the activity. Thus, the effect of repetition may not
13 necessarily be merely a dulling or weakening of sensation, but rather an increased
14 attentiveness⁷. We could use the same analogy in relation to movement activities in physical
15 education. When skills – or what Kirk (2010) refers to as techniques – are learned, they may
16 become habits that reduce the students' attentiveness to their own bodies. Even more so, one
17 can imagine that habits are cultivated that leads to compulsive exercise addiction, where there
18 is no attention directed to what it is like to move. This is therefore the point where the concept

⁶ Carlisle (2014) develops this point with reference to Felix Ravaisson's study of habit *D l'habitude*.

⁷ At this point in her argumentation, Carlisle (2014) wonders whether the habit of attentiveness that characterizes the connoisseur can indeed be called habit? She refers to William James who held that habit by definition leads to sensations not attended to. On that basis, she thinks that perhaps 'practice', which 'involves attentiveness, and perhaps also choice, effort, and perseverance' (p. 82) is more apt (note here the similarity to the *practising* perspective developed by Aggerholm (Aggerholm, 2015a, 2016)). However, Carlisle (2014) concludes by saying that 'practice should be regarded as an elevation of habit rather than a departure from it).

Habits, skills and embodied experiences

1 of habit is more appropriate than that of skill. With this broader notion of habit of
2 attentiveness we get an experiential and educational perspective that is not present in
3 discussions about skill or technique.

4 Furthermore, Dewey did not oppose habit to reason and control. Rather, the real
5 opposition for Dewey were between two kinds of habits, ‘between “routine”, unintelligent
6 habit and “intelligent and artistic habit” that “is fused with thought and feeling”’ (Shusterman,
7 2008, p. 205). There is, however, no denying that we have habits that are routine and are
8 performed without conscious monitoring. Walking, for instance, is deeply habitual: we do not
9 consider the mechanical process of walking. Walking is as such an example of an unreflective
10 habit that spontaneously performs our will⁸. However, the habit of walking takes place in a
11 situation: with or without shoes, on different grounds and for different purposes. Thus, it
12 supports other habits. One of the main points of Dewey’s educational philosophy was that
13 students must be able to attend to their experiences in order to notice when they come up
14 against a problematic situation, i.e. situations where their habitual way of responding to a
15 situation is not adequate (Rodgers, 2002). So, when Carlisle (2014) in the above quote calls
16 attention to the problem of changing entrenched, bad habits, Dewey’s saw the need for
17 developing habits of embodied attentiveness (Shusterman, 2008). Were we dualists, this
18 embodied attentiveness would be the parallel to the habits of mind referred to earlier
19 (Noddings, 2010). However, Dewey’s emphasis on the body-mind (Dewey, 1938) rejects this

⁸ The relationship between habit and will is an interesting one. Dewey proclaimed that habits are will: ‘Willing cannot be a disembodied act because it requires some sense of deploying the available means or affordances of the environmental context of action, which includes our bodily resources’ (Shusterman, 2008, p. 190). Again, this shows Dewey’s knack at turning traditional ways of thinking upside-down: willing does not come before doing, but there is willing because there already is doing.

Habits, skills and embodied experiences

1 kind of dualistic thinking. Instead, ‘we must rely on reflective feelings and habits – because
2 we can’t reflect on everything and because such unreflective feelings and habits always
3 ground our very efforts of reflection’ (Shusterman, 2008, p. 212).

4 If physical education truly is to be a body-linked subject ([Stolz, 2014](#)), then one of its
5 primary tasks must be the cultivations of habits of embodied attentiveness. In this sense, the
6 repetition that is needed to cultivate habits (both motor-habits and habits of thinking) is not a
7 blind repetition that leads to automatization, but an active and dynamic process of repeating
8 towards new, different and more refined aspects of movement (Aggerholm 2015a, p. 170 ff).
9 As Dewey (1938, p. 48) pointed out ‘the most important attitude that can be formed is that of
10 desire to go on learning’.

11 **Conclusion**

12 The purpose of this article has been to explore the relationship between skill and embodied
13 experience in physical education from a philosophical perspective through the notion and
14 concept of *habit*. For that purpose, we have drawn on phenomenological perspectives, in
15 particular the work of Maurice Merleau-Ponty. This has allowed us to understand habits as an
16 embodied, context-sensitive form of practical knowledge. Furthermore, we have pointed out
17 that in the context of school physical education, an educational perspective that focuses on the
18 development of habits is needed. By drawing on John Dewey’s educational philosophy we
19 have sought to give the phenomenological perspective a pragmatic slant that emphasize the
20 development of habits of attentiveness. This implies that students in physical education are
21 not subjected to mindless drilling or blind repetition of (sport) techniques or skills, but that
22 they are rather encouraged and allowed to be attentive. We propose that exploring habit from

Habits, skills and embodied experiences

1 a philosophical perspective can help us understand the relationship between two of the central
2 justification to physical education, namely the learning of practical knowledge and the
3 provision of embodied experiences. Speaking about habits rather than skills aligns with
4 pragmatism, without abandoning the phenomenological perspective. This raises the need for
5 further conceptual analysis: what are the differences between technique, skill, habit and other
6 concepts that are employed to describe the knowledge objects of physical education? Our
7 modest hope is that this article goes some way in clarifying the potential value of paying more
8 attention to the role of habits, raising new questions for philosophy of physical education.

9

10

11

12

13

1 References

- 2 [Aggerholm, K. \(2015a\). *Talent Development, Existential Philosophy and Sport: On Becoming*](#)
3 [an Elite Athlete](#). Abingdon: Routledge.
- 4 [Aggerholm, K. \(2015b\). *Kroppsoøvingssfagets indhold i et dydsetisk perspektiv \[The content*](#)
5 [of physical education in a virtue ethic perspective](#). Paper presented at the annual
6 physical education conference, Norwegian School of Sport Sciences, Oslo, June 2015.
- 7 [Aggerholm, K. \(2016\). On practising in sport: towards an ascetological understanding of](#)
8 [sport](#). *Journal of the Philosophy of Sport*, 1-15. doi:10.1080/00948705.2016.1159917
- 9 [Arnold, P. J. \(1979\). *Meaning in movement, sport and physical education*](#). London, UK:
10 Heinemann.
- 11 [Bailey, R., Armour, K., Kirk, D., Jess, M., Pickup, I., Sandford, R., & BERA Physical](#)
12 [Education and Sport Pedagogy Special Interest Group, \(2009\). The educational](#)
13 [benefits claimed for physical education and school sport: an academic review](#).
14 *Research papers in education*, 24(1), 1-27.
- 15 [Breivik, G. \(2007\). Skillful coping in everyday life and in sport: A critical examination of the](#)
16 [views of Heidegger and Dreyfus](#). *Journal of the Philosophy of Sport*, 34(2), 116-134.
- 17 [Breivik, G. \(2008\). Bodily movement - the fundamental dimensions](#). *Sport, Ethics and*
18 [Philosophy, 2\(3\), 337-352.](#)
- 19 [Breivik, G. \(2010\). Being-in-the-void: A Heideggerian analysis of skydiving](#). *Journal of the*
20 [Philosophy of Sport, 37\(1\), 29-46.](#)
- 21 [Breivik, G. \(2013\). Zombie-like or superconscious? A phenomenological and conceptual](#)
22 [analysis of consciousness in elite sport](#). *Journal of the Philosophy of Sport*, 40(1), 85-
23 106.
- 24
- 25 [Carlisle, C. \(2014\). *On habit*](#). Oxon, UK: Routledge.
- 26 [Connolly, M. \(1995\). Phenomenology, Physical Education, and Special Populations](#). *Human*
27 [Studies, 18, 25-40.](#)
- 28 [Crossley, N. \(2001\). *The social body. Habit, identity and desire*](#). London, UK: Sage
29 Publications.
- 30 [Dewey, J. \(1916\). *Democracy and education*](#). Middlesex: The Echo Library
- 31 [Dewey, J. \(1938\). *Experience and education*](#). New York: Kappa Delta Pi
- 32 [Dillon, M. C. \(1997\). *Merleau-Ponty's ontology* \(2 ed.\)](#). Evanston, Ill: Northwestern
33 University Press
- 34 [Dreyfus, H. L. \(2001\). *On the Internet*](#). London, UK: Routledge.
- 35 [Dreyfus, H. L. \(2002\). Intelligence without representation – Merleau-Ponty's critique of](#)
36 [mental representation](#). *Phenomenology and the Cognitive Sciences*, 1, 367-383.
- 37 [Dreyfus, H. L. \(2005\). Merleau-Ponty and recent cognitive science](#). In T. Carman & M. B. N.
38 Hansen (Eds.), *The Cambridge companion to Merleau-Ponty* (pp. 129-150).
39 Cambridge, UK: Cambridge University Press. (Reprinted from: Not in File).
- 40 [Dreyfus, H. L., & Dreyfus, S. E. \(1986\). *Mind over machine. The power of intuition and*](#)
41 [expertise in the era of the computer](#). New York, NY: The Free Press.
- 42 [Eriksen, J. W. \(2010\). Mindless coping in competitive sport: Some implications and](#)
43 [consequences](#). *Sport, Ethics and Philosophy*, 4(1), 66-86.

Habits, skills and embodied experiences

- 1 Ilundáin-Agurruza, J. (2014). 7—Riding The Wind—Consummate Performance,
2 Phenomenology, and Skillful Fluency. *Sport, Ethics and Philosophy*, 8(4), 374-419.
3 doi:10.1080/17511321.2015.1026630
- 4 Kirk, D. (2010). *Physical education futures*. London, UK: Routledge
- 5 Kirk, D., & Macdonald, D. (1998). Situated learning in physical education. *Journal of*
6 *Teaching in Physical Education*, 17, 376-387.
- 7 Kretchmar, R. S. (2006). Life on easy street: The persistent need for embodied hopes and
8 down-to-earth games. *Quest*, 58(3), 344-354.
- 9 Lave, J. (1996). Teaching, as learning, in practice. *Mind, Culture and Activity*, 3(3), 149-
10 164.
- 11 McNamee, M. (2005). The nature and values of physical education. In K. Green & K.
12 Hardman (Eds.), *Physical education. Essential issues* (pp. 1-20). London, UK: Sage
13 Publications. (Reprinted from: Not in File).
- 14 Menand, L. (2001). *The metaphysical club*: New York, NY: Farrar, Straus and Giroux
- 15 Merleau-Ponty, M. (1963). *The structure of behavior*. Pittsburg, PN: Duquesne University
16 Press
- 17 Merleau-Ponty, M. (2002). *Phenomenology of Perception*. London: Routledge.
- 18 Moe, V. F. (2005). A philosophical critique of classical cognitivism in sport: From
19 information processing to bodily background knowledge. *Journal of the Philosophy of*
20 *Sport*, 32, 155-183.
- 21 Moe, V. F. (2007). *Understanding intentional movement in sport. A philosophical inquiry into*
22 *skilled motor behavior*. Oslo, Norway: The Norwegian School of Sport Sciences.
- 23 Noddings, N. (2010). Dewey's philosophy of education: a critique from the perspective of
24 care theory. In M. Cochrane (Ed.), *The Cambridge companion to Dewey* (pp. 265-
25 287). Cambridge, UK: Cambridge University Press.
- 26 Ostrow, J. M. (1990). *Social sensitivity. A study of habit and experience*. Albany, NY: SUNY
27 Press.
- 28 Reid, A. (1998). The value of education. *Journal of Philosophy of Education*, 32(3), 319-331.
- 29 Rodgers, C. (2002). Defining reflection: Another look at John Dewey and reflective thinking.
30 *Teachers College Record*, 104(4), 842-866.
- 31 Selinger, E. M., & Crease, R. P. (2002). Dreyfus on expertise: The limits of
32 phenomenological analysis. *Continental Philosophy Review*, 35(3), 245-279.
- 33 Shusterman, R. (2005). The silent limping body of philosophy. In T. Carman & M. B. N.
34 Hansen (Eds.), *The Cambridge companion to Merleau-Ponty* (pp. 151-180).
35 Cambridge, UK: Cambridge University Press
- 36 Shusterman, R. (2008). *Body consciousness. A philosophy of mindfulness and somaesthetics*.
37 Cambridge, UK: Cambridge University Press.
- 38 Standal, Ø. F. (2015). *Phenomenology and pedagogy in physical education*. Oxon, UK:
39 Routledge.
- 40 Stolz, S. (2014). *The philosophy of physical education. A new perspective*. London, UK:
41 Routledge.
- 42 Sutton, J., McIlwain, D., Christensen, W., & Geeves, A. (2011). Applying intelligence to the
43 reflexes: Embodied skills and habits between Dreyfus and Descartes. *Journal of the*

Habits, skills and embodied experiences

- 1 *British Society for Phenomenology*, 42:1, 78-103, DOI:
2 10.1080/00071773.2011.11006732
- 3 Thorburn, M., & MacAllister, J. (2013). Dewey, interest, and well-being: Prospects for
4 improving the educational value of Physical Education. *Quest*, 65(4), 458-468.
- 5 Tinning, R. (2010). *Pedagogy and human movement. Theory, practice, research*. London,
6 UK: Routledge.
- 7 Whitehead, M. (2001). The concept of physical literacy. *European Journal of Physical*
8 *Education*, 6(2), 127-138.
- 9 Zahavi, D. (2013). Mindedness, mindlessness and first-person authority. In J. Schear (ed.),
10 *Mind, reason and being-in-the-world: The McDowell-Dreyfus debate* (pp. 320-343).
11 London: UK
- 12
- 13