

Losing Ground in the “Run Towards Science”: The Liberal Arts and
Social Sciences in Kinesiology*

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Abstract:

Since the inception of physical education as a professional field and scholarly discipline in the late 1800s, the liberal arts and social sciences constituted key components of a holistic vision of the human being and education through/about the physical. In the late 1960s and early 1970s, partly in response to a rising research culture in the field, a number of “artsy” sub-fields arose within physical education, including sport philosophy, sport history, sport sociology and the comparative study of physical education and sport. At the same time, physical education morphed into “kinesiology” and undergraduate degree programs moved towards granting degrees in science (BScKin), Recreation/Sport Studies, and Physical Education (as teacher preparation). Within the last two decades, physical education teacher preparation largely moved over to teacher’s colleges, and faculties of kinesiology rushed towards the “hard sciences” like exercise physiology, ergonomics and sport/exercise psychology. This poster considers the recent history of the liberal arts and social sciences in the field of physical education/kinesiology, and the losses resulting from a “scientization” of physical education. It also reports on a survey of humanities/social science course offerings at the undergraduate level within randomly selected Kinesiology faculties across Canada.

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Physical education professionalized as a discipline in the late 1800s. While biomedical, scientific and teaching-oriented perspectives have always dominated the field, the liberal arts and social sciences always constituted key components of a holistic vision of the human and education through/about the physical (Park, 1981). Early concerns included such things as aesthetics and classical philosophy, and physical educators of the early 20th century turned to/wrote histories of various systems of physical education and training in a bid to justify the existence and guide the development of the emerging field. From the late 1960s through early 1980s, humanities and social science sub-disciplines developed in physical education, including sport history, sport philosophy and sport sociology. After a period of growth and strength, these sub-disciplines appear to have declined in status within the wider area of what is now termed “kinesiology.” This paper briefly tracks the history of the humanities and social sciences within physical education (kinesiology), and contextualizes this decline within recent historical developments such as the “run towards science.”

Professionalization and Early Concerns

Concerns for health, fitness and education through physical activity date back to ancient societies (a fact exploited by writers of early histories of physical education, who sought to justify physical education as an academic discipline). From the 1700s to the mid 1800s, some physicians and health promoters of various backgrounds promoted programs of “physical education” for the health and well-being of the population (Park, 1976, 1987). Competing systems of gymnastics developed in places such as Germany, Sweden, Denmark and Britain. These served as national systems of physical education, and influenced developments in North

America so much that one of the first debates in the new professional field of physical education in the late 1800s was known as the “battle of the systems” (Lee & Bennett, 1960).

Similar to other fields such as medicine, physical education professionalized in the late 1800s with the rise of professional associations, a new journal (the *American Physical Education Review* in 1896) and attempts at setting a standard curriculum for the preparation of teachers and instructors (Mechicoff & Estes, 2006; Park 1989). Many of the earliest physical educators, especially leaders in the field, possessed medical degrees. This led to a focus on biomedical and scientific perspectives, which realistically have dominated since then (Lee & Bennett, 1960; Mechicoff & Estes, 2006). However, association meetings demonstrated much diversity, with papers ranging from the very scientific to the very practical, and papers on history frequently appearing on the program of national conferences (Park, 1981). Recommendations for the “minimum curriculum” by the American Academy for the Advancement of Physical Education in 1901 included 100 hours on history (Park, 1990). The first two decades of the profession were marked by growing interests in psychological and sociological issues, with social and moral development ranking among the major justifications for the field’s existence (Park, 1989; Sage, Dyreson & Kretchmar, 2005).

In the late 1800s (USA) and early 1900s (Canada), apprehensions over the health and fitness of urban children and the rise of child psychology led to the “playground movement,” which established recreational spaces and children’s programs in many towns and cities, and greatly influenced the wider field of physical education (Mechicoff & Estes, 2006; Morrow & Wamsley, 2010). Mental and moral development began to be highlighted in books about the field (for example, Welpton, 1913). By the 1920s, the “new physical education” took the amelioration of ethical and social concerns as a central focus (see figure 1 for a schematic timeline of major

trends and influences in physical education/kinesiology). Most physical educators were far more content to evangelize about physical education's benefits for society than systematically investigate them, but clear links to philosophy and the social sciences existed (Park, 2005; Sage, Dyreson, & Kretchmar, 2005).

In the 1930s, athletics (sport) came into the curriculum, and slowly grew to a position of dominance that arguably still exists. Sport popularized in the early 1900s in schools and universities in largely separate athletic departments, and what historians call the "golden age of sport" occurred in the late 1920s and 1930s (Kidd, 1996; Mechicoff & Estes, 2006). Physical educators incorporated athletics into the curriculum as a means to popularize PE and to ensure the educational value of athletics (Swanson & Massengale, 1997; Park, 2005). The focus for many colleges and universities became teacher-preparation to meet the demands for teachers, coaches and other sport-related professionals (Park, 1981, 1989).

Growing Humanities and Social Science Perspectives

From the early 20th century until the 1950s, an educational philosophy perspective dominated the humanities disciplines within physical education. Most of those who could be described as "doing philosophy" sought to describe the individual, moral benefits received under supervised PE programs (Kretchmar, 1997). Similarly, most histories of sport and physical education sought links to ancient (mostly Greek) sports and activities in a bid to demonstrate the field's utility (Park, 1989; Struna, 1997). Histories typically tended to be wide-ranging chronologies covering developments up to the present (see, for example, Ainsworth, 1930; Leonard, 1923). To be fair, this was all history and philosophy "from within," written by physical educators themselves since few trained historians and social

scientists took sport, recreation, play or games as topics worthy of their attention, a situation that remained until the late decades of the 20th century.

In the 1930s, a number of efforts to promote scientific research in physical education occurred (Lucas, 2006), including the splitting of the *American Physical Education Review* into two publications in 1930, the practitioner-oriented *Journal of Health and Physical Education* and the *Research Quarterly*. The *Research Quarterly* always remained open to research from across the spectrum of fields associated with physical education, but primarily published studies based on scientific, quantitative methodologies (Park, 2005; Sage, Dyreson & Kretchmar, 2005). Internationally, sports medicine developed from the 1920s in the pursuit of athletic training and performance (Berryman, 1996; Park, 2000). Both of the World Wars led to a surge in physical training and increasing interests in fitness research, due to the high number of volunteers and recruits in poor physical condition (Jable, 2006; Morrow & Wamsley, 2010). Most of the expanding research base focused on scientific measurement, but history, at least, occupied a niche (Sage, Dyreson & Kretchmar, 2005), and the first monograph on research methods in 1949 from the American Alliance for Health, Physical Education and Recreation included chapters on history and philosophy (AAHPER, cited in Park, 1981).

By the 1960s, several significant individuals and groups attempted to organize and describe the knowledge base for physical education. Leading physical educator Franklin W. Henry (1964) discussed how physical education was *cross-disciplinary*, “constituted of certain portions of such diverse fields as anatomy, physics and physiology, cultural anthropology, history and sociology, as well as psychology” (p.32). The Big Ten Body of Knowledge Symposium Project nominated 6 different areas in 1966, including “sociology and sport education” and “history and philosophy of physical education and sport” (Park, 1981).

The academic discipline of physical education entered a “crisis of identity” in the 1960s, partly as a result of wider cultural changes, and partly because North American universities overall began to move more towards a research focus. This spurred assessment of physical education’s fit, given its focus on teacher preparation. One particularly pointed criticism came from James Bryant Conant, who surveyed American education systems: “I was far from impressed by what I have heard and read about graduate work in the field of physical education. If I wished to portray the education of teachers in the worst terms, I should quote from the descriptions of some graduate courses in physical education. To my mind, universities should cancel graduate programs in this area” (p. 201). Conant’s criticisms have long been seen as *the* catalyst for physical education’s development of a research base, although some, like Struna (1997) argue that Conant’s criticism came when scholars in the field like Henry were already advancing significant research agendas.

The Sub-discipline Era

Part of the response to the call for more research was a move towards new sub-disciplines. Several arts/humanities/social science disciplines were firmly established in the field, using “sport” as a catch-all term for interests in recreation, leisure, the body, physical activity, etc. These included the history of sport, the sociology of sport, comparative studies (literally comparing development across regions and nations) and sport philosophy. Calls for a “proper” sociology of sport appeared as early as 1965 (Kenyon & Loy, 1965), although it would be the mid-70s before any professional associations appeared (Sage, 1997).¹ The College Physical Education Association created a history section in 1960, and the North American Society for Sport History (NASSH) was established in 1970 (Struna, 1997). Sport philosophy also moved from being an underlying assumption to a separate field of academic endeavor with early texts in

the mid 1960s (such as Ziegler, 1964), associations and a journal in the early 1970s (Kretchmar, 1997). The establishment and growth of the humanities and social science sub-disciplines between the late 1960s and 1980s is demonstrated in the creation of devoted journals. See table 1 for a list of relevant journals and their year of establishment. That this also impacted back on physical education is evidenced by physical education texts like Hellison's *Humanistic Physical Education* (1973), focused on psychological, sociological and "humanistic" goals in education, and Bucher's edited collection *Dimensions of Physical Education* (1974), which included large sections on philosophy, historical concepts of physical education, and sociological foundations.

From the 1970s to the early 1990s, in part spurred by a wider growth in universities and colleges in North America, a number of sub-disciplines firmly established themselves as part of the wider field. Sport sociology, sport history, and sport philosophy all developed a strong academic base. It would require too much space to describe all the sub-disciplines, so the trajectory of sport history will be taken as an illustration.

A scholarly sport history began to appear in the late 1960s in places such as the University of Alberta and Pennsylvania State University. Initial work took the character of "first-order studies," or as some have described, "one damn fact after another histories" (Morrow, 1983). Since few historians paid any attention to sport, recreation and leisure, early sport historians made a conscious efforts at providing narrative, "ground-clearing" studies (for examples, see Cosentino & Howell, 1971; Howell & Howell, 1969). Scholars in the sub-discipline quickly tapped into wider currents in the "parent discipline" of social history, and began producing methodologically-nuanced, more interpretive, and theoretical works (Park, 1981; Struna, 1997). National and international scholarly organizations devoted to the history of physical education and sport arose in the United Kingdom, Australia, Germany and North

America, and four separate journals devoted to sport history came into existence by the mid 1980s (again, see Table 1). By the 1990s, historiographical trends within sport history itself could be identified, such as influences from Giddens, Gramsci, British cultural studies, and feminist theorizing (Struna, 2000). Similar stories of expansion and growth around a core community of scholars and specialized journals could be told for sport sociology and sport philosophy. For assessments at various times, see Loy (1980), Ingham & Donnelly (1997), and Sage, Dyreson and Kretchmar (2005).

Losing Ground in the “Run Toward Science”

Within the last two decades, physical education teacher preparation largely transferred to teacher’s colleges. Physical education moved towards the “hard” sciences like exercise physiology, ergonomics and sport/exercise psychology. This was reflected in the change of the name of most “Physical Education” departments to “Kinesiology,” “Human Kinetics” or “Sport Sciences” (Park, 1981, 1989). Renaming is always a political act, designed to break with ways of doing things in the past, and indicate future directions. In the case of physical education becoming ‘kinesiology,’ it represented a move away from teacher preparation as a focus, to a more research-oriented and “scientific” culture. As Kretchmar (1997) describes, this “science-adulating perspective” or “hard-nosed empirical attitude” (p. 197) led to a sense in physical education that things that cannot be measured are not worth attention, which fed into the current curriculum heavy in the empirical sciences at the expense of the socio-cultural sub-disciplines in most places.

The diversity of fields under kinesiology led to fragmentation (Park, 1989), and in a climate of lessening resources, a certain amount of in-fighting. The sheer difference of humanities and socio-cultural disciplines from the sciences leads to misunderstandings. The

more critical work in philosophy and sociology, which questions the value and place of sport and various physical activities in society, is often taken by scientific colleagues and undergraduates as biased and paradoxical in their relationship to the wider field of kinesiology (Sage, 1997).

Within each of the socio-cultural sub-disciplines, there is internal strength. For example, the North American Society for the Sociology of Sport annual conference runs 7 concurrent sessions over four days, and regularly attracts more than 80 graduate students. An irony exists in that sport, recreation and leisure have been taken as topics of serious academic interest by scholars outside of kinesiology, at the same time that the sub-disciplines within kinesiology that study them from socio-cultural perspectives have gone into relative decline, or at least lost ground in what I term “the run towards science.”

The decline in the status of the humanities and social science sub-disciplines in the last two decades are shown by their marginal place in the requirements for certification of programs for CCUPEKA (The Canadian Council of University Physical Education and Kinesiology Administrators), the Canadian regulatory board for certified programs in kinesiology and physical education. CCUPEKA represents 35 institutions that have undergraduate programs in “kinesiology.” For certification, programs must have at minimum “two courses in social science and/or humanities area” (CCUPEKA, 2010), versus 6 in scientific disciplines, and 4 with attached laboratory components. That provides a fairly clear picture of the areas stressed.

Minimum courses, of course, do not indicate the true presence of the sub-disciplines, as there may be electives not reflected in the CCUPEKA standards. To get a better picture, a small handful of programs were selected from the CCUPEKA list, and their academic calendars were consulted to determine the mix of required and elective courses. These programs were

purposely chosen to offer a range of institutions from across the country, and programs of varying sizes number of students. Results are displayed in Figure 2.

The programs included vary, with half of them (Queen's, York, the University of New Brunswick and St. Francis Xavier) offering multiple electives beyond the required minimums. The other programs are more troubling. Lakehead only appears to offer the 2 required by CCUPEKA, while Saskatchewan meets that requirement with non-specialized courses taken outside the faculty. Both McMaster and Simon Fraser University have dispelled with even the minimum required courses, threatening to forego CCUPEKA certification in their embrace of more science-oriented courses.² It is notable that the programs that have more extensive electives have more than one scholar working in the arts and social science disciplines, while the converse is true of those that do not.

The humanities and social sciences in general have faced a decline within higher education, part of the reason for the focus of this conference. Beyond that, and the basic fragmentation of an already diverse field, there are a number of potential explanations or contributors to the decline in the status of the humanities and social sciences within kinesiology. Feeding the “run toward science,” there are visible funding differences between scientific and humanities/social science sub-disciplines within Kinesiology. Due to the expense of purchasing equipment and running a laboratory, grants for scientific research from similar national bodies greatly outweigh those for the other disciplines in kinesiology. In a university environment that increasingly values competitive research funding, the dollar difference takes on significance.

As is occurring with the wider liberal arts and social sciences, students are increasingly oriented towards disciplines that have clear career paths rather than those tied to traditional visions of a university education (Côté & Allahar, 2007). “Kinesiology” is now a certified health

care profession in some states and provinces, and definitions of the field are becoming increasingly narrower, to mean just that certified profession. With this trend, topics and courses which contribute to the general education of the undergraduate, but do not fit the prescribed certification, lose ground to those that do.

Some of the decline must be placed at the feet of scholars in the sub-disciplines themselves. Over the last 20 years or so, scholars in the humanities and social science disciplines within kinesiology have oriented themselves towards the “parent disciplines,” both for their development and for the gaining of legitimacy. In his acceptance speech for a lifetime contribution award at the NASSH conference in Lake Placid in 2006, Earl Ziegler noted that “somehow, poor old physical education got left behind.” Silos of academic endeavor make sense in light of building a knowledge base and establishing status within the academy (Kretchmar, 2008). However, more engagement with the parent discipline may mean less engagement with, and possibly more marginalization within, the mainstream of kinesiology itself. This very worry has been expressed by scholars throughout the sub-disciplinary period (Kretchmar, 2008; Park, 1981, 1989, 1991; Sage 1997).

Humanities and social science concerns have been core issues for physical education since it professionalized as a field in the late 1800s. From the late 1960s on, scholarly sub-disciplines such as sport history, sport philosophy and sport sociology grew into strong sub-fields that offer important visions of sport, physical activity and the human body. However, in the last two decades, kinesiology has engaged in a “run towards science,” a trend where scientific fields are stressed and humanistic perspectives are pushed to the margins. This is reflected in the change of the wider field’s name from physical “education” to “kinesiology,” and in the few humanities and social science course offerings at the undergraduate level in many programs.

There have, of course, been calls for greater integration across the sub-disciplines of kinesiology (see, for example, Ennis, 2010; Gill, 2007, 2010; Rikli, 2006). Some have even called for an unseating of the relationship in kinesiology, arguing for a “physical cultural studies” where the humanities and social sciences dominate, in part as a counterpoint to the situation as it currently stands (Andrews, 2008; Ingham, 1997). Yet, it appears that the run towards science will continue in the foreseeable future, driven by changes in the academy and labor markets. In many ways, this is unfortunate since, as the prolific historian of physical education Roberta Park has said, physical education is one of the few academic fields that ever considered the human being in its totality (Park, 1991). In the movement towards ever-increasing science at the expense of other traditional perspectives, much more is at stake for kinesiology than the ground between its sub-disciplines.

Figure 1. Timeline for the Development of Physical Education

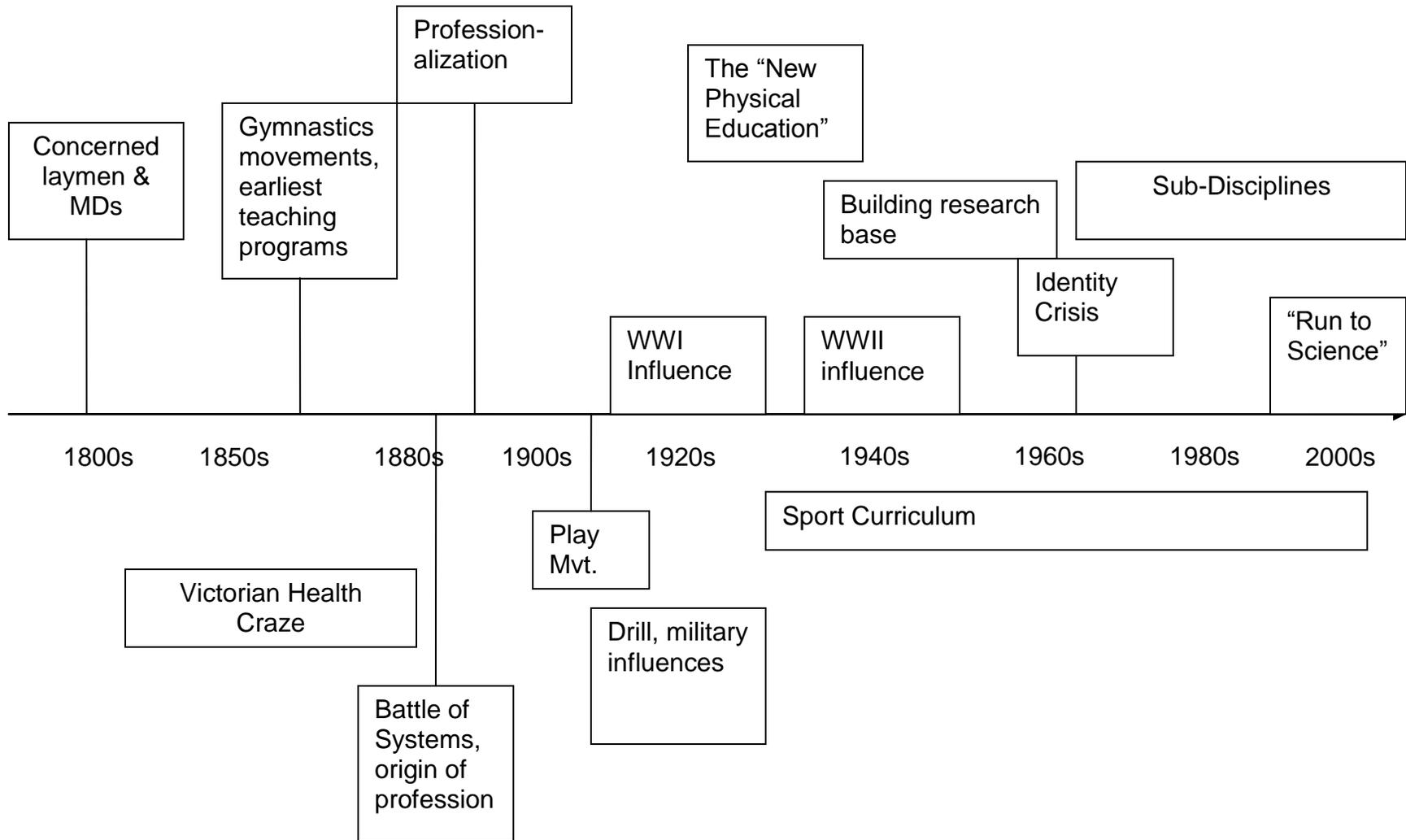


Figure 2. Sample of Kinesiology/Physical Education Internal Course Requirements and Electives across Canada

Institution/ Program	Required Arts/Social Science Courses	Elective Courses within Departments			
		Philosophy	History	Sociology	Other
Queen's BScKin/BPE	2		1	2	4 ^a
UNB BScKin/BRSS	2/3	4 ^b	1	2	3
York BA/BSc In Kin	2	2	6	3	2
St. FX BA/BScKin		2 ^c	2	2	1
Lakehead BKIN	2				
U of Sask BScKin	2 ^d				1
McMaster BScKin		1	1 ^e	2	
Simon Fraser BScKin					1 ^f

a: "Other" in this case are socio-cultural "Health Studies" courses

b: electives are shared across both programs

c: minimum 2 courses required from among the 7 electives

d: 1 ethics course + choice of sociology or history

e: 4 electives listed; only 1 history course offered in 2010

f: a course on "Food and Society"

Table 1

Major Journals in Physical Education (Current Titles) and Year Established

Journal Title	Year Established
<i>International Review for the Sociology of Sport</i>	1966
<i>Sport History Review</i>	1970
<i>Journal of the Philosophy of Sport</i>	1974
<i>Journal of Sport History</i>	1974
<i>Journal of Sport and Social Issues</i>	1977
<i>The Sport Historian</i>	1980
<i>Sporting Traditions</i>	1984
<i>Sociology of Sport Journal</i>	1984
<i>International Journal of the History of Sport</i>	1984
<i>Aethlon: The Journal of Sport Literature</i>	1984

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Notes

¹ Histories of various sub-disciplines within kinesiology can be found in Massengale and Swanson's (1997) edited collection on *The History of Sport and Exercise Sciences*. Particularly relevant to the topic here are chapters by Sage (sociology), Struna (history) and Kretchmar (philosophy).

² This is admittedly an "unscientific" sample, but it demonstrates important trends.