

The Beginning of the Beginning: Kahn and Architectural Education in Philadelphia



Paul Philippe Cret was one of Penn's greatest teachers and one of the city's greatest architects. Louis I. Kahn, the University's most well-known teacher, was one of Cret's students. Holmes Perkins, educated at Harvard under Walter Gropius, reshaped the School and changed its orientation. The key task of the three architects was to articulate a new understanding of what is specific to the discipline, recreating its professional and intellectual center and orientation. This would not require the replacement or elimination of what had been developed in the preceding years; instead the task was to augment it with a more focused sense of what architecture itself is all about.

By David Leatherbarrow

Education is something which is always on trial because no system can ever capture the real meaning of learning.

Louis I. Kahn, "I love Beginnings" 1972

Questions in class today about where is Architecture going were very easy to answer because it is not going anywhere else than it ever was... But Architecture itself is constantly waiting for a new aspect of it...

Louis I. Kahn, "Architecture" 1972

The basic task of teaching architecture is to instruct in the skills and knowledge that constitute the discipline. Architecture is a specific way of knowing and acting in the world, and this can be taught. Given the discipline's richness, one might think that learning is a life-long process. Educational programs, however, must perforce have limits. Penn's professional program, for example, is three years long. Obviously, a student with a first degree in biology or art history cannot learn all there is to architecture in three years. Because there is so much to learn, teachers must help students prepare themselves for continual learning. This can be done by getting students into the habit of asking primary questions, wondering about key topics, risking action based on untested premises. When students develop in this way they not only continue to learn, but also to express their own thoughts and values, and care for the world in which their work will find its place.

Teachers approach their task from different points of view, based on their own experience, interests, and abilities. Those who emphasize the interrogative aspects of architectural education teach theory and history. Others,

who concentrate on modes of architectural description and representation, instruct in drawing (in its range of techniques). Still others attend to the building's physical realization. These different points of view have different means of instruction suited to their subjects. That diversity is an inevitable consequence of a primary intention to build a foundation for continued learning.

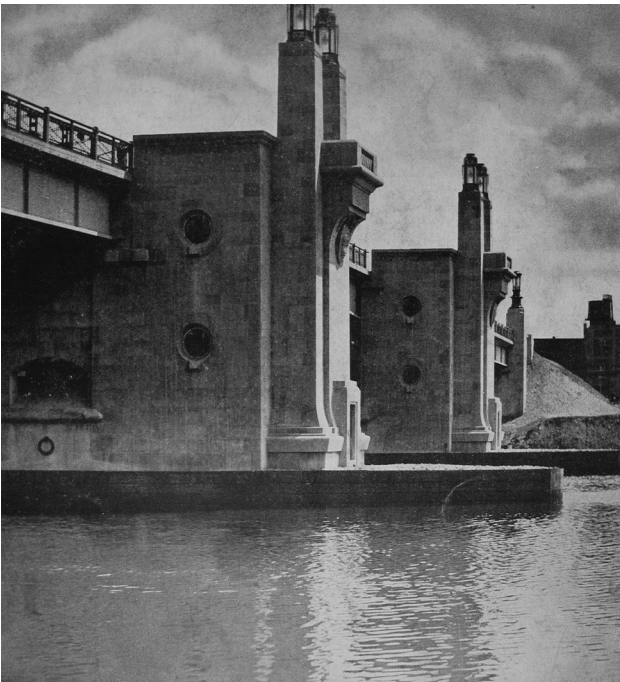
Penn's program in architecture has a long and distinguished history. Yet, in 1984, when I first arrived there, the program did not have a clear direction or orientation in the field. About a decade and a half before, Kahn, Penn's most well-known teacher, had died. With a figure like Kahn on the faculty there is little need for a vision or structure of a curriculum. He was a magnet to students throughout the world. Nor was the need for a core educational program, nor anything like a sequence of studio or theory courses; he was the center of the school. After his death there was an enormous vacuum and a struggle for identity. There were, of course, studios at the various levels, also technology and theory courses. They had been in place since the 1950s, when an incoming dean, G. Holmes Perkins, reshaped the School and changed its orientation.

Holmes Perkins was educated at Harvard under Gropius. After leaving the Bauhaus and spending some time at Harvard, Gropius concluded that universities were far too bookish for architectural education. Architectural knowledge was to be advanced through architectural practice, in the office not the library. Holmes Perkins, despite his awareness and acceptance of Gropius' position, not only remade the School at Penn (to include architecture, landscape architecture, city planning, fine arts, and urban design) but established Ph.D. programs in architecture and city planning—students would learn in the studio and its workshops *plus* the library. The paradox of coupling these divergent orientations was clear from the start: what kind of research and study would help advance architectural creativity? What sort of reflection is internal to action in this field? How could critical thought, disciplined by theoretical and historical study, contribute to design while challenging it? More simply and finally:

< Louis I. Kahn working on the Fisher House, ca. 1960. © Louis I. Kahn Collection, University of Pennsylvania and the Pennsylvania Historical and Museum Commission.



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Figure 1. **G. Holmes Perkins**, House in Brookline, Massachusetts, 1938.

Figure 2. **Paul Philippe Cret**, Rodin Museum, Philadelphia, 1929.

Figure 3. **Paul Philippe Cret**, University Avenue Bridge, Philadelphia, 1930.

in what ways would architecture as a productive activity benefit from scholarly inquiry and research?

The creation of the Ph.D. programs was not an answer to an obvious need. They were (and are) relatively new when compared to programs in other subjects, and those that do exist are relatively few in number. No single or simple reason explains these facts, but their comparative youth and scarcity will be less surprising when one remembers that architectural study at all levels is relatively new to universities. Until a century ago education in architecture occurred in other settings, most often professional offices, ateliers, workshops, or building sites, sometimes academies. Insofar as they were places of professional activity, one might explain architecture's recent arrival to the university as a consequence of the difference between professional and academic knowledge, on the assumption that the first cannot be conveyed through the channels of the second. But the long-standing and important roles of other professional disciplines in the university, law and medicine for example, cast doubt on that explanation. A more useful distinction is one that arose in the early history of Penn's program; namely, the division between research that is *productive* and scholarship that is *descriptive*. Marx's dream for philosophy—to change, not merely interpret the world—is an unremarkable commonplace of architectural thought. Architecture is a form of engagement *par excellence*, aimless if not oriented toward given conditions, intent on their transformation. Obviously there are many "ways of world making," just as there are many media of creative expression. But the particularity of architecture's productive sort of knowledge, that it gets its hands dirty in the actual transformation of the environments in which we live, makes it something of a misfit in universities [figure 1].

Holmes Perkins appointed and retained only those faculty who were and would remain active in both theory and practice; which is to say, all professors—no matter what their subject area—were expected to maintain some involvement in project making and design work. This policy set the stage for a distinguished line of architect/authors within the School: Louis I. Kahn, Aldo van Eyck, and Robert Venturi in architecture, and Garret Eckbo (as a studio critic) and Ian McHarg in landscape architecture, and Denise Scott Brown in urban design. Generally speaking, the guiding premise was that involvement in practice insured awareness of current realities. Thus, professors who taught in studio also taught in seminar and lecture rooms. This is still true at Penn. The idea was that if students could see that their professors observed no distinction between reflection and making, a synthetic view of the discipline would arise in them quite naturally. Over the years, however there have been some problems with

this arrangement. Insofar as the architecture programs are part of a university that contains departments of art history, engineering, and other faculties that have more than a little expertise in the subjects taught in architecture, disagreements have arisen between these groups, particularly with respect to rival claims about depth of knowledge and relevance. Each of the architects listed above discussed matters of architectural history and building technology in their writings, but not exactly in the ways that these subjects were treated by art historians and engineers.

Thus, the School at Penn had a number of unique characteristics; it was comprised of a faculty capable of showing connections between theory and practice, who were not only dedicated to the Modern tradition along humanist lines, but also aligned with colleagues in related disciplines (city planning, landscape architecture, and the fine arts), and were deeply aware of architecture's historical and scholarly traditions [figure 2].

The story of architectural education in Philadelphia does not begin with Holmes Perkins, however; rather, with Paul Philippe Cret, who was not only one of the School's greatest teachers but one of the city's greatest architects. Cret arrived to Philadelphia in 1903, having practiced in Lyon and completed his studies at Paris' *École des Beaux Arts*. He regarded Julien Guadet's *Éléments et Théorie de l'architecture* as the sole "authorized document on the Modern teaching in the *École* in the last fifty years." Yet, he was also the figure who guided the School toward acceptance of Modern architecture—less as a matter of style than in response to wider cultural and political transformations. In a paper from 1933 on the progress of modern architecture he alluded to "barbarism" of certain aspects of contemporary culture.¹ He seems to have been prompted by events in Germany at the time, events that led to a measure of brutality previously unknown in the whole of human history [figure 3].

Looking more narrowly at architecture, he acknowledged the likelihood of doubts about 19th century methods when the facts of modernization were taken into account, and the need for continual questioning. In 1938 he wrote "any complacency we might have had [...] about standards and theories has been rudely shaken during the last ten years." No school could avoid "the conflict rending the profession." It was time to think again about what to teach, to rediscover what was primary in the discipline. In response to teachers and students who urged for a thoroughgoing adoption of modernism and corresponding rejection of traditional methods, he argued instead for a reinterpretation of foundational principles, in anticipation of what he called a "new classicism." Louis I. Kahn was one of his students [figure 4].

Kahn's texts show that he, too, was aware of the productive role of doubt about inherited methods and the need to research into basic principles and methods. Only when the university is "cleaned of the market place," he warned, can it become a site of real research.² "Only the purest kind of thinking [only the kind that] leads the individual mind to its specific way of thinking should be in the university."³ Thought as pure as Kahn intended begins with wonder, the courageous and frank admission of unknowing, of doubt about basic things, such as a room, a wall, or a window. The first impediment to teaching and learning such as this is the notion that study programs are dedicated to solving problems, such as the disorder of American cities in the inter- and post-war years. Kahn maintained that even if clients pay for answers, architectural research depends on questions, as creative design does. A good question, he said, is much more valuable than a brilliant answer. Why? Because questions bridge between what he called architecture's *measurable* and *un-measurable* dimensions. One way to think about this distinction is to couple it with another that was very provocative when he first posed it: the difference between buildings and architecture. Architecture, Kahn said, does not exist; only buildings exist. For this reason architecture must be searched for, as if it has been lost, sought after, as if were out of reach; and not once or twice, but repeatedly. What the philosopher Edmund Husserl said of

himself, that he was a perpetual beginner, can be said of the architect who has a research program. This self-identification also defines the central and simple meaning of design research: its real challenge is that it is a *quest without an object*. This explains Kahn's familiar question: "how am I doing Le Corbusier?"⁴ Kahn, too, was moving *towards an architecture*, in full recognition that one did not exist. At the same time, he felt one can only imagine architecture through specific buildings [figure 5].

Defining education in this way couples it with the issue of beginnings, what Kahn called the search for *volume zero or minus one*. Each problem in the design studio was an opportunity for students and teachers to begin again, to reverse the roles of the clear and the obscure, not to make the second the preamble to the first but to discover what is unclear in what seems so obvious. Moving forward depends on going backward. The target of this kind of inquiry can be called *the beginning of the beginning*. While radically preliminary, this kind of start anticipates its end. For this reason he also called the beginning an "eternal confirmation" that reveals what is natural to man. "I try to look at my work," he said, "with a sense of what is forthcoming," the yet not said and yet not made, for that, he advised, is what "puts the sparks of life into you."⁵ But again, the subject matter is "his work;" which is to say, the set of tasks he was given *in those days, in that city*. There can be no approach toward architecture apart from ex-

Figure 4. **Louis I. Kahn**, Fisher House, Philadelphia, 1967.



plorations of the concrete problems of a particular building—its location, program, kind of construction, and so on. Here, then is the unavoidable paradox: the search for beginnings unfolds in the midst of current conditions. Research finds its foothold in the middle of things, but in that context it seeks beginnings that anticipate ends.

Kahn's sense of unending beginnings allowed him to offer a surprising view of teaching: "as you know," he said, "I am a teacher which means really I am teaching myself and whatever rubs off, the student gets."⁶ The work of teaching "is to present the yet not said[,] the not yet made. It is [a form of] self-inspiring."⁷ The key in both the professional office and the academic studio was questioning, beginning again. Kahn wrote: "Now I wish to tell you what I feel when I enter the classroom. To me the class is a check. I really couldn't practice without it. I consider the students sort of pure in their way, and I consider myself as having to answer to that purity."⁸

In each of the three cases of education at Penn I have briefly described, Cret, Holmes Perkins, and Kahn, the key task was to articulate a new understanding of what is specific to the discipline, recreating its professional and intellectual center and orientation. This would not require the replacement or elimination of what has been developed in the preceding years; instead the task was to augment it with a more focused sense of what architecture itself is all about.

Notes

1. Cret, Paul Philippe, "A Recent Aspect of an Old Conflict," (1938), White, Theo B., *Paul Philippe Cret Architect and Teacher*, Philadelphia: Art Alliance Press, 1973, 83–87.
2. Kahn, Louis I., "The Profession and Education" (1970), Wurman, Richard Saul, *What Will Be Has Always Been*, New York, Rizzoli, 1986, 92.
3. Ibid.
4. Kahn, Louis I., "How'm I Doing, Corbusier," (1972) Latour, Alessandra, ed., *Louis I. Kahn. Writings, Lectures, Interviews*, New York, Rizzoli, 1991, 297–312.
5. Wurman, Richard Saul, *What Will Be Has Always Been*, New York, Rizzoli, 1986, 92, 176, 177.
6. Latour, Alessandra, ed., *Louis I. Kahn. Writings, Lectures, Interviews*, New York, Rizzoli, 1991, 102.
7. Latour, Alessandra, ed., *Louis I. Kahn. Writings, Lectures, Interviews*, New York, Rizzoli, 1991, 309.
8. Wurman, Richard Saul, *What Will Be Has Always Been*, New York, Rizzoli, 1986, 92, 176, 248.

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Figure 5. **Louis I. Kahn**, Yale Center for British Art, New Haven, 1974.

