

This article appeared in Harvard Design Magazine, Winter/Spring 1999, Number 7. To order this issue or a subscription, visit the HDM homepage at <<http://mitpress.mit.edu/HDM>>.

© 2001 by the President and Fellows of Harvard College and The MIT Press. Not to be reproduced without the permission of the publisher

Less for Less Yet

On Architecture's Value(s) in the Marketplace, by **Michael Benedikt**

WHY ASK ABOUT architecture's values or the value of architecture? Are we in any doubt about either? Certainly, architectural monthlies and the major newspapers find no shortage of sharp new buildings to show. Recondite history and theory books continue to be published, enough to satisfy a generation of junior faculty (and then some), and all serve to substantiate our positive opinion of architecture's heritage and importance. Lectures and exhibitions and professional meetings abound. We give and get design awards. And for the more retiring among us there is always *Architectural Digest* (covertly examined), travel to the villas and gardens of Europe, and new books with reassuring titles like *The Architectural Photograph*.

Indeed, it is possible for architects to live entirely inside this World of Architecture, which is a state of mind, without ever leaving it. It is possible for architects to drive through the overturned garbage can that is a large part of the American built environment, tisk-tisking about the average-ness of other architects and the rapacity of developers, without ever

thinking that the condition of the modern world is due at least *partially* to what the "best" and most prominent architects have done, have allowed, and have come earnestly to believe over the past fifty years. This is why we should ask about architectural values.

And what do we, or they—the "best" architects—believe? I shall keep the list short and deliberately conventional: that architecture is for people; that integrity and honesty of expression is a virtue; that form follows function; that simplicity is beautiful; that cheap doesn't necessarily mean bad or ugly; that creativity is the architect's chief gift to society; that indoors and outdoors should be melded; that shaping or manipulating space is the essence of what architects do; that the grid is rational; that the world is "speeding up" and architecture should/must follow (corollary: that advances in technology offer possibilities for architecture that should not be passed up); that together with our consultants we understand completely what a building is and does. Every one of these essentially

Modernist beliefs, held as a value, is problematic for architecture's value. Every one of them (except, perhaps, the first) has caused more harm than good to the environment and to our profession.

Consider the idea that creativity is the our chief gift to society.¹ The first thing to challenge, even if one accepts the proposition, is whether architects are indeed all that creative. Look around and decide. Consider too that several other fields can claim as much creativity as we do, from artists on the one hand to politicians on the other. But these are easy shots. More subtle and far-reaching is the dilemma that basing our personal and professional reputations on creativity greatly weakens our negotiating power when all the parties that have a say in the design of the environment are sitting around the same table. Imagine, for instance, that an impasse has arisen. Here is the engineer; here is the owner; here are the contractor, the city official, the neighborhood group representative, the financier, and the architect. Someone has to give. Who will have to be "flexible?" Who will have to go back to the drawing board because she is "so creative"? You guessed it.

Consider another situation: a client comes to an architect with a tight budget and an ambitious project. The architect believes (as he was taught at school) that cheap doesn't necessarily mean bad or ugly, that creativity is his gift to society, and that if he doesn't take the job, some lesser architect will. Rare is the architect—and then only in the best of economic times—who will politely show the client the door, informing him that a Mercedes for the price of a Volkswagen *can't be had*. Most architects would rather give it a go; do *something*! Is he not creative? Cannot cheap things be beautiful? Is this not a democracy where even the modestly well off can get to have (my) Good Design? And later, when the project has fallen apart logistically or pieces are lopped off or finishes are downgraded or fees are not paid be-

cause the budget is being overshot, who does the architect *really* blame, despite what he tells others? Himself, of course. He wasn't "creative" enough.

Creativity is probably the single worst idea(l) with which architects could associate themselves. And yet "the chance to be creative" is today the foremost reason students give for wanting to become architects. No teacher will discourage this goal or disabuse them of this value—or at least replace it with other values, such as the achievement of excellence or knowledge or dignity or power—not just because "being creative" has become tantamount in our time to a human right, but because the ideal of material design creativity, of redemption through the combination of art and engineering, goes back to the very *raison d'être* of Modern architecture and its promise to humanity. Choose against creativity and we are condemned to make buildings unequal to the challenges of the Modern World. Or so we children of the Bauhaus were told.

I am writing this essay in a three-hundred-year-old building; the light is wonderful and the electricity courses through my computer just fine and the phone is at hand and the toilet flushes like a dream. The argument that to build "the old way" was to build inadequately for the Challenges of the Modern World was just so much rhetoric, serving best those who stood to profit from increasing urban land values and decreasing per-square-foot construction costs, from wringing out more rent, building highways, and receiving architectural commissions from newly monied industrialists.

In Germany, as everywhere in western Europe in the late 19th century, the countryside was emptying into the cities as the basis for economic development changed from agriculture to industry. Workers needed to be (ware)housed, factories built and manned. The physical destruction caused by the First World War, along

with the financial crises that followed,² allowed the prewar aims of the *Werkbund*—that is, rationalized construction as conceived under the banner of Modernity—to take hold, and take over. By 1945, at the end of the Second World War, Modernism, the architecture of crisis and of recovery, had become the only game in town, a second-growth species that would not go away. In America, undamaged by war and now home to Walter Gropius and Ludwig Mies van der Rohe, civilian construction accounted for 11 percent of the gross national product in 1950. By 1990 its share had dropped to 7.9 percent. The rate of building production over the same period increased from 600 million to 3,500 million square feet per annum. Thus a 600 percent increase in construction volume was achieved with a 25 percent decrease in GNP expenditure. Efficiency? Envious "returns to scale"? This is the viewpoint of the economist, and also of those who do not see that the product itself has changed. Clearly, we are progressively directing relatively less of our total wealth and effort to infrastructural and architectural quality. This reflects our national values directly. Over the same period, the share of GNP represented by the banking, real estate, entertainment, and communication sectors of the economy grew in precisely the opposite direction. The conclusion? Our environment has become ever more commodified, ever more the subject of short-term investment, income generation, and resale, rather than of life-long dwelling or long-term city making.³

But we cannot blame "the market." Most of the "nice old buildings" that ordinary people like and that we say we can no longer afford to build—with their high ceilings, operable windows, well-defined rooms, solid walls, pleasing decoration, and dignified demeanor—were built in a market context and were not cheap. Indeed, they were more expensive for their owners to build and finance in their own day than they would be to build

and finance again in ours. What *has* changed is the national will to direct attention, labor, and resources to architecture specifically and the built environment generally, be it through markets or governments. And one reason for this change has been the relinquishment by architects of their role—indeed duty—in upholding standards and modes of discourses about design that ordinary people can understand and that produce buildings that people *want* to live and work in for reasons other than the fact that they are new.

In societies at peace that can maintain free markets, people can get what they want; what they want depends on how successfully their needs and values are addressed by competing producers. With a modicum of prosperity, people have choices. This is the context in which architecture, as an industry, broadly conceived, has become less and less able to deliver a superior, evolving, and popularly engaging product that can compete with other, more successful products—with cars, music, movies, sports, and travel, to name a few. And the less successfully architecture has competed with these diverse “growth industries,” the less architects have been entrusted with time and money to perform work on a scale and with a quality that could, perhaps, turn things around.

I say “perhaps,” because it is far from certain that the knowledge architects currently have and the values architects currently subscribe to could build a world people really wanted, given *any* amount of time and money. Many people are afraid of hiring architects, especially those well-known by other architects. Now *that* is a sobering thought; and if there were no exceptions to it, we would all have to pack it in. But let us not use these exceptions as a screen between ourselves and the world—that is, between what we sometimes do well and what remains to be done, which becomes evident if we will only look out of the window.

It is ironic, yet somehow predictable, that Modernism—fruit of the economic ruin of Europe by two world wars, enemy of aristocratic privilege, champion of efficiency over sentiment—should finally, with the Neo-Modernism of today, become the prestige style of the rich even as much of America struggles to ignore its consequences: windowless suburban high

Architecture, as an industry, broadly conceived, has become less and less able to deliver a superior, evolving, and popularly engaging product that can compete with other, more successful products—with cars, music, movies, sports, and travel, to name a few.

schools hardly more comfortable than minimum-security prisons; a despoiled landscape of shopping malls, billboards, and deserted reminders of obsolete manufacturing prowess; wire-crossed skies; housing “projects”; weedy lots called parks; and, for relief, gigantic blocks of mirrored clouds floating on lawns hiding acres of Wonder-thin office space, fed by interstates thundering through canyons, around hills, and over and past tinder-box cottages nuzzled by broken cars or too-perfect *Truman Show*-esque enclaves of refugees and retirees.

No wonder people go to the movies, where they can see what happens when someone takes days to get the light right.

Take another value-cum-credo. *Form follows function*. Functionalism was a poison pill, swallowed first by well-meaning architectural writers drawing (mistakenly) on the “design” intentions of nature (which is, in fact, profigately rococo); second by ambitious architects with an eye to getting more work from businessmen using social Darwinism (“survival of the fittest”) as an operating principle; and third by ordinary persons, who hardly needed convincing that Progress depended upon the power of machines to be ruthlessly focused in purpose.⁴ Instead of inspiring investigation into what buildings do, which is as delicate and

multifarious and easy to misunderstand as nature’s real complexity, functionalism helped eliminate all aspects of architecture for which a robust health-and-safety or cost-saving rationale could not be mustered and forced across the desk of an impassive banker.

I am certainly not the first to decry functionalism. The Postmodern

movement in architecture—1965-1985, R.I.P.—exhausted itself in rebuking the form-follows-function dictum, or at least in desperate reinterpretation of it. But it was too late. The ceiling of expectations as to what architecture could and should and would achieve was already lowered, ratcheted down by decades of efficiency-talk and rationality-talk on the consumer end, and, on the production end, by the failure to develop fresh technology that could lower construction costs fast enough to free up money for a round of ambitious and complex design. Those small economies that could be technologically effected (lightweight structural and wall systems, for example) were quickly hijacked by rentiers and financiers, and by clients with better things to do with their money. Thus the economic ceiling lowered another notch. Every architect who, through estimable creativity and self-application, found a cheaper way to build, became an example, willing or not, of what the next architect should be able to “achieve” too. With project budgeting thus cast as an exercise in starving-the-building (if not the architect), it was no wonder that all that earnest architectural effort—all the travel-to-Europe-to-sketch-Rome in the 1970s, all the poring over Palladio and breast-beating about Gropius and Mies (who misled us!), the reading of Venturi and

Blake and looking for complexity and contradiction in old plans and then simulating it in ours—should have resulted largely in commercial co-optation, pastiche, academicism, and another round of despair about architecture’s uses.

What has been our latest answer? So far, three (major) movements in little more than a decade, overlapping of course. First Deconstruction, then computerization, and now the return to Modernism in one of two forms:

The complex and delicate experience of joy-in-inhabitation, to which we all have a right, comes from a thousand subtleties of position and color and view and touch located in the DNA, so to speak, of traditional city making. Where to plant a tree, how to make a terrace, how to shape and open a window . . . these manifest a complexity that can only be evolved; it cannot be simulated, represented, transformed, or produced *ab initio* by formal games and explorations.

the elite, art-world form of Minimalism, or the brash, fuck-you form of Undecorated Garage with Large Glass. None of these movements is likely to enable architects to transform the cynical mess that is the postwar environment into a place where everyone is pleased to be a native envied by a tourist, including, when he is at home, the tourist.

Consider Deconstruction. As practiced by Zaha Hadid, Peter Eisenman, Daniel Libeskind, or Frank Gehry, it will continue to get press. But what these architects do does not follow Kant’s “categorical imperative”: to work according to principles that others can work according to as well. Their architecture is premised on crashingly obvious exceptionalism, and this cannot be a way of making cities. The complex and delicate experience of *joy-in-inhabitation*, to which we all have a right, comes from a thousand subtleties of position and color and view and touch located in the DNA, so to speak, of traditional city making. This kind of complexity—the visual and spatial equivalent of a composition

by Chopin, say—was still known, at some level, by the notable pre-Modern architects of both Europe and America, but was largely extinct by 1945. Where to plant a tree, how to make a terrace, how to shape and open a window . . . these manifest a complexity that can only be evolved; it cannot be simulated, represented, transformed, or produced *ab initio* by formal games and explorations, no matter how elaborate, literate, or “logical.” Schoenberg cannot be a model for architects. Nor can Derrida as he is currently

read. Computerization is not a style, of course, but it is a new way of conceiving buildings, and almost imperceptibly it leads architects to make value judgments they might not otherwise make. This happens even as—indeed precisely *because*—architects protest that CAD is “just a new drafting tool” enabling them to “offer better service.” To their credit, the architects mentioned above use the computer to permit greater complexity of form and depth of design exploration as well as to attempt greater precision and ambition in construction.⁵ But the computer is not being used so skillfully by the majority of architects responsible for what you see on the drive to the mall. The computer is being used as conventionally used in business: to increase productivity, i.e., to stimulate more output per unit of labor input. A building that ten years ago would have taken ten draftsmen one year to draw, might now take three draftsmen eight months to draw. Once digitized, details from old projects can be seamlessly incorporated into new projects.⁶

Documents can easily be updated as construction progresses and further economies are found. And so on.

The efficiencies that computers afford raise a critical question: who is benefiting from the increased productivity and the time saved? I would venture that it is not the architect. I would venture that intense market competition between architects, focused on service-for-fee and the ability to control costs, has passed these productivity-won savings cleanly along to clients, and that architects have not, with these savings, bought one minute more of their own time to spend on the design or refinement of their buildings. Indeed, so seductive is the computer’s capacity to copy files hither and thither and to render “space(s)” in no time at all, that I would venture that *less* time is being spent in design, profession-wide, than ever before. Moreover, the design being done is done more and more on the computer—I have yet to meet a practicing architect under fifty who is not proud of this recent accomplishment—despite the plain-as-day fact that the compositional tools provided by CAD software cannot match the fluidity and serendipity and delicacy of hand-guided pencil on molecularly noisy paper, let alone the capacity of this “old” medium for recording the accumulation of thought over time. Add to this CAD’s inherent reluctance to represent land forms fluidly—the curves and cuts and twisted surfaces, the plants, the wildness and color.

And so the economizing continues, round after round, the average architect delivering less and so being asked to deliver less for less yet: three-dimensional shadows of real buildings.

And Modernism? Modern architecture rode to the rescue in Germany and France after the First World War, remobilizing idled factories from the production of munitions to the production of light bulbs and sinks and awning windows for the sanitary housing of the struggling lower classes. Modernism delivered again at mid-

© 2001 by the President and Fellows of Harvard College and The MIT Press. Not to be reproduced without the permission of the publisher

century, transmogrified into the International Style. By then it had become the architectural recipe for sending clearinghouses of money and trade mushrooming skyward in every nation, for housing thousands of people at once in great gulps of construction (the concrete frame, the glass and steel, the “plaza”). And this occurred not just in New York and Stuttgart, but also in Montevideo, Johannesburg, Athens, Tel Aviv, Hong Kong, Moscow, Mexico City . . . cities all over the world whose postwar architectural character to this day amounts to poured-in-place graph paper with occasional awnings, roaring with the sound of exhaust pipes.

Can Modernism now rescue us from having earlier been rescued by Modernism? Does it have within its genes—within its doctrines and methods and pleasures—permutations as yet unexplored? Perhaps. But two developments (at least) are required for such discoveries to make a perceptible difference to the environment of more than a handful of connoisseurs. First, another quantum leap “forward” in the technology of construction, in terms of cost and speed. Such a development accounted for the widespread adoption of Modernism in the first place, initially in promise (1900–1927), then in reality (1930–present).⁷ Modernist buildings are simply more “cost-efficient,” especially when land is expensive. But small and steady cost reductions will not do. The savings that these generate (and there are many if you look carefully) are abducted by developers as fast as they can be devised. Only the faster-than-expected adoption of a radically cheaper way to design and build will allow architects to capture and invest the savings in better design and new stylistic maneuvers. The risk is that if these maneuvers do not soon produce a kind of building that appeals strongly to the public on other than economic grounds, then competitive market “forces”—reflecting nothing more sinister, really, than people’s decision to (continue to) spend their money else-

where—will siphon off everything “unnecessary.” Construction budget-setters will prevail once more, leaving architects in the long run worse off than before, with even fewer means with which to pursue their art.

The second required development is another round of propaganda to convince the public once again that (even) Less is More⁸: less materiality, frou-frou, and landscaping; thinner doors and walls and veneers; fewer surfaces that need waxing, polishing, or painting; less cloth and textile, less print and pattern, fewer things that fold or move; less trim; tighter lots; less contact with ground, air, and climate. As with diets and weight loss and health foods, people must be convinced of the merits of further leanness and purity, that the white-on-white emptiness of the art museum *sans the art* represents an ideal place in which to live and work, that the bride stripped bare is more comely than the bride. (Offering them folds and shards of nothingness, or great white whale-like spaces, will only rub in the vacuity of the whole exercise.)

Of course, the trouble here is that, in architecture as in fashion, minimalism yields pleasure in proportion to its expense, requiring great precision in construction, high levels of finish quality, and carefully controlled lighting (not to say a certain attitude from the user) in order to be valuable. But it is not likely that this value will be achieved; it is more likely that the present embrace of luxo-minimalism by elites will culturally legitimate minimalism of a more virulent, ersatz sort. For soon (if not already) building developers and furniture designers and fixture makers will have the “permission” of a Pawson or Gucci to consign even more of the desirable complexities, comforts, solidities, and physical amenities of buildings to the category of “bell” or “whistle.”

Architecture as a T-shirt for living in? Will this sell? Maybe, but for all the wrong reasons, and certainly with sorry results.

Earlier I said that in market societies, people get what they want. This is not quite right. They get what they want *most*. People who shop at Wal-Mart do not want to kill off their old downtown; they want to save a few dollars, have a wider choice of goods, and so forth. Who can blame them? People want cheap energy and low taxes. Who doesn’t? But in pursuit of what we want we get dead rivers, cracked sidewalks, dumb kids, and crime. Individually rational market decisions can have collective outcomes that few, including those who make such decisions, are happy about. (Let the *other* person send the kids to a school that needs help, let *them* shop at the corner store, let *them* stay off the road at peak traffic times. . . .) Social scientists are at a loss to recommend how to resolve these difficulties without limiting people’s freedom or democratic rights.⁹

When it comes to architecture, we are confronted with this dynamic writ large. Move among ordinary people and you will find that still, after decades of publicity and Pritzker Prizes (“the what prize?”), almost nobody likes “modern architecture.” Sure, people are grateful for air conditioning and good plumbing, but they have disliked everything else about modern buildings and the modern city for sixty years! And yet they are paying for them, living in them, working in them by the millions, dispirited to be doing so, and, when not merely resigned, they are blaming everyone but themselves: developers, politicians, builders, city officials, and, not the least, architects.

But as with Wal-Mart, the truth is more complicated. With every dollar and every vote, and with myriad individual market and political decisions, ordinary people have passed up the goods that architecture has been able to offer. Passed them up with an occasional sigh, of course, but passed them up nonetheless for the more compelling seductions of movies and TV, on the one hand, and for more urgent needs, like health and freedom and jobs, on the other. No one *wants* to see

nice buildings and parks and streets disappear, but each of us wants the *other* guy (or his taxes or profits) to build something nice for us all.

It is said that market forces are impersonal, but the upshot is that, in the marketplace at least, architects have been outflanked and outmaneuvered by the purveyors of stronger medicines with better stories. Architects have not fought back effectively, but instead continue to sacrifice themselves on an altar of their own making in loyalty (or is it submission?) to the religion that still, albeit with increasing difficulty and infighting, organizes their schools. I refer, of course, to Modernism, Post and Neo.

To find answers to the question of architecture's value, answers adequate to any hoped-for revaluation of the architectural enterprise in the next century, we will need to go beyond the essentially art-historical scholarship

Minimalism yields pleasure in proportion to its expense, requiring great precision in construction, high levels of finish quality, and carefully controlled lighting. But it is not likely that this value will be achieved; it is more likely that the present embrace of luxo-minimalism by elites will culturally legitimate minimalism of a more virulent, ersatz sort.

that has been our steady diet for so many years now and take up a whole new kind of theorizing and explaining.

Such new theory should explore the circle route from architecture through cosmology, thermodynamics, and complex systems, through biology and evolutionary theory, through social psychology and psychology, through economics and economic history and back again to architecture, to show that the activities of designing and making buildings and of organizing and forming and planting the land are so deeply rooted in the doings of the universe that they must elaborate themselves alongside all other human activities, not self-simplify and flatten, if we are to be happy on this planet. Life, whose increase is called *value*,

peeks out of a thousand masks, each of which grows in complexity and in organization. One of them is architecture.

New theory must trace the lines of money and information and influence that coalesce to form first a single building, and then buildings of different kinds (equivalent to the birth of new organisms, call it architectural embryology). Further, the case must be made that a national dedication to environmental health, urban vitality, and fine architecture will contribute to the continued economic growth and development of this country and others in the 21st century. What better use is there for our prosperity? What better organizer of social purposes and generator of further wealth? What better legacy for our children?

New theory must crisscross the parched fields of environment-and-behavior and environmental design research, thirty years' worth gone

unnoticed by architects, in search of new approaches that will stand up to use. It must find powerful new or forgotten ways of talking about the intimate connections between people and places, perhaps by rereading Bachelard and Borges, Freud and Proust—familiar territory, to be sure, but trodden firm.

What *needs* does architecture serve? I wager that the reader cannot make a list both useful and satisfying.

New theory must model the larger implications of architecture's digitization beyond the potential for creating extraordinary form.¹⁰ For soon those who commission architecture, and even those who "consume" it, will wake up fully to the reality that most buildings, within a type, have no in-

herent reason to differ from other buildings, from place to place. The architect's already tenuous status as a custom tailor, based on the flattery of supposing that every building is properly a "unique response" to a unique site and program, will surely be challenged if not ridiculed once computers guide machinery directly from "drawings," which can themselves be parameterized and, if necessary, modularized and commoditized and traded to make buildings that will never be seen next to each other. Recombinant architecture? Why not? Think of what digital sampling has done to (for?) the production of music.

New theory must make detailed surveys of what architecture has discarded in the wholesale handing over of everything remotely scientific and quantitative to consulting engineers. Acoustics, light, lighting, air quality and air movement, heating, cooling . . . what engineers know and do about these things (I exempt structural engineers from this critique) has become so narrow and formulaic that their expertises together can be said to form a chain of islands separated from each other, and from the mainland of design, by oceans of ignorance about architectural phenomena. These phenomena were once the chief source of architecture's value and were attended to "automatically," with, as it were, the DNA of traditional models. Today few architects know about such things. Evaluating the glare from a window, assessing the resilience of a floor, modeling the coherence of interior air flow or the balance of radiant to ambient heat, simulating the pattern of sound reflections down the halls and in the rooms of an ordinary building (not a concert hall or auditorium), analyzing patterns of privacy and exposure, and understanding how these factors work together to create good quality in a place, value in architecture: these are activities that do not currently form the stuff of architectural practice (let alone produce design fame), and they are taught hurriedly (if at all) by the least design-adept teach-

ers at school. This is not a call for empiricism per se. This is not about “creating a body of architectural knowledge.” This is about raising a submerged Atlantis of architectural sensibility, a realm of facts and insights that can support popular connoisseurship of the qualities of buildings equal to that devoted to the valuation of music, cars, and movies. To take this material seriously, technically *and* poetically, will help us to make a powerful case that architecture matters at all, and can produce genuine effects that people will notice, appreciate, measure, value, and ultimately demand.

So begins but does not end a list of projects to accomplish architecture’s revaluation. If you have been persuaded that work on them must start, then the mission of this article has been achieved.

Notes

1. A variant on this belief, 1970s vintage: architects are “problem solvers.”
2. Germany’s predicament was exacerbated by American foreign policy. Presidents Wilson, Coolidge, and Hoover insisted that war debt owed to the U.S. by the allied victors be paid regardless of whether these countries—chiefly England, France, Belgium, Italy—received or forgave Germany its debt to them in war reparations. With no choice but to insist on repayments, the allies ensured that Germany would remain economically crippled and spiritually humiliated for more than a decade, which germinated extremist social ideologies of all kinds.
3. Patricia Mainardi in *The End of the Salon* (New York: Cambridge University Press, 1993) provides an excellent analysis of the importance of economic and market considerations in accounting for the origins of Modernism in art—art, for better or worse, as commodity.
4. The phrase “form follows function” has an interesting provenance. Begun as an Enlightenment idea espoused by 18th-century Italian philosophers Lodoli and Milizia and informing Boullée and Ledoux in the 19th century, the phrase enters the mind of Italophile American Horace Greenough, whence it circulates in the Chicago School of the 1890s with Louis Sullivan and young Frank Lloyd Wright, and forms the watchword of the Chicago Exposition of

- 1893, which is visited by Adolf Loos (who also meets with Sullivan), whence it returns to Europe with Loos and combines (in the mind of young Le Corbusier, for one, who meets with Loos on the latter’s return) with the teachings of English socialist William Morris as filtered and transformed by critics Herman Muthesius and Karl Scheffler, who were influential in the prewar Werkbund in Germany (actually founded by Muthesius) and who followed closely the career and thought of Peter Behrens, architect to the industrialist AEG. It then establishes itself as the unquestioned truth and unquestionable motivation, dominating all others, of European Modernism, and then, with the help of Wright, two world wars, and an army of bow-tied polemicists, of modernism, small m or large, everywhere since. It’s a tragedy of some proportion that “form follows function” is true neither of nature nor of economic development.
5. I believe that they are after the *wrong* sort of complexity, but that is another matter.
6. Indeed, I predict a market in digital construction details, perhaps whole building pieces like auditoria or staircases, traded between firms, or perhaps marketed by McGraw-Hill.
7. These dates are very rough, of course. I consider the Wiessenhofseidlung in Stuttgart in 1927 to be the watershed event. Others might consider the International Werkbund Exhibition in Berlin in 1931.
8. I don’t necessarily mean less interior *space* per person or household, at least not in North America, where new tract houses anyway are getting larger and plainer (with better appliances).
9. See for example Mancur Olson, *The Logic of Collective Action* (Cambridge: Harvard University Press, 1971) or Thomas Schelling, *Micromotives and Macrobehavior* (New York: Norton, 1978); and see Douglas Heckathorn, “The dynamics and dilemmas of collective action,” *American Sociological Review*, April 1996, vol. 61, No. 2, 250-278, for a recent, I think breakthrough, analysis of how Prisoner’s Dilemmas, Tragedy of the Commons, and other strategic patterns of behavior challenge any strong belief in the fairness, or even desirability, of the outcomes of the market order.
10. Which is *not* to say that extraordinary form will not turn out to be an important contributor to architecture’s revaluation. Here I look to the recent work of Frank Gehry, of course, but also to Marcos Novak of UCLA and Kas Oosterhuis from the Netherlands, Neil Denari at SCI-Arc,

and others.

Michael Benedikt is Roessner Professor of Architecture and Director of the Center for American Architecture and Design at the University of Texas at Austin. He is editor of the book series CENTER. His book, *Value: Economics, Psychology, Life*, is forthcoming from the University of Chicago Press.