POSSIBILITIES

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ARCHITECTURE

by Robert Geddes

What is architecture? And why are there so many different directions it can take? Because—fortunately—architecture has many different possibilities, and all of them have their origins in living.

Antaeus, a mythological giant of Libya, son of Poseidon (the sea) and Gaea (the earth), was for a long time invincible in wrestling because his strength was magically renewed every time he touched the earth his mother. But Hercules throttled Antaeus and defeated him by holding him up off the ground. Architecture is like Antaeus: it gains its power from its contact with life. Architecture is grounded in human experience, and it celebrates nature and civilization. It is a manifestation of life, a means of promoting life, and ultimately a judgment upon life's quality.

But architects are people like everyone else, so naturally when they feel threatened from one direction or another they can seek to justify themselves by insisting that what they do serves no external purpose, that it is an end in itself to be understood purely on its own terms: art for art's sake. Today's surprisingly widespread fascination with the idea of "autonomous" architecture-an explicit goal of a few contemporary designers, and an implicit or even subconscious goal of perhaps many more-comes from an intellectual tradition which is old and which indeed can be traced back to very respectable sources. Immanuel Kant, for instance, by defining human capability as the three categories of cognitive knowledge, moral conscience, and aesthetic sensibility, left the door open to the possibility of "autonomous" art. This is because in his scheme the true, the good, and the beautiful can be separated from each other and broken asunder. Thus someone like the French writer Théophile Gautier could claim that aesthetics had nothing at all to do with usefulness: "Only those things that are altogether useless can be truly beautiful: anything that is useful is ugly." And an Oscar Wilde could claim that it had nothing to do with morality: "No artist has ethical sympathies. An ethical sympathy is an unpardonable mannerism of style." The notion of "autonomous" architecture similarly assumes that art can be understood only in terms of its aesthetic qualities and structures. As Clive Bell said, "To appreciate a work of art, we need bring with us nothing but a sense of form, color, and a knowledge of three-dimensional space."

The value of this kind of point of view, of course, is considerable, in that it gives strong support to the intrinsic worth, the internal validity, of

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In this article I have borrowed freely from the following works, which I also recommend to those who may be interested in further reading: Robert Gutman, editor, *People and Buildings;* Richard Wollheim, *Art and its Objects;* Dennis Donahue: *The Sovereign Ghosts: Studies in Imagination;* and Roger Scruton, *Art and Imagination.*

the art of architecture. The problem with it, nonetheless, is that it can unfortunately lead to aestheticism and finally to escapism.

Architecture is the home of man, and there is no escape from that. There may be architecture without architects, but not architecture without people—or, for that matter, any very sizeable group of people without architecture. Among the very simplest of peoples whose societies may not even have produced any buildings, there are still boundaries, markers, entrances, paths, centers, and—in short—the makings of a sense of place. In other words, there is architecture. Architecture seems to be a necessary instrument of living. It is a coherent and idealized representation of nature and of ourselves.

For this reason, I believe that there really can be no "autonomous" architecture any more than there can be autonomous life. If architecture is separated from human social experience, it loses its values, it loses its ability to speak. And it loses its source of imagination.

What is imagination? It is the intellectual power that we call on when we try to deal with the randomness and apparent chaos of everything we experience. Imagination is the faculty which seeks coherence and wholeness, and it takes the risk of oppositions by accommodating contradictions within a larger perspective. The creation of architecture occurs at the meeting place between experience and the imagination. The ideal of the imagination is unity. Just as in life the imagination helps us to cope with the complexities and contradictions we experience, so in architecture does it provide us with a sense of coherence.

Coherence provides that a work of art has a harmonious relationship of parts and a sense of the integrity of the whole. This, presumably, is what we are talking about when we talk about "form." Coherence has always been the objective of form-making, though obviously it is something that has been achieved in very many different ways. In the Gothic period, for instance, the achievement of luminosity within a building was of the highest interest. By contrast, in the nineteenthcentury stylistic revivals, ethical or romantic association with other times and places was sought. The weighting and emphasis given to different aspects of architecture is not a matter of architecture's own internal logic and necessity, but of the priorities of the people who make it. And so it very obviously follows that there can be no one kind. The particular mix of emphases at any one point is influenced by the arrangements that serve users and their social institutions (in other words, by life) and by the arrangements that have so far been tried out (by historical precedents). Architecture, that is, is influenced by necessity and association.

Traditional "functionalism" does not adequately account for the complexities of architecture, although, of course, it does have some sense of truth about it. But there is a difference between the truth and the whole truth. Primary "functions" are those that the functionalist tradition most easily recognizes—like being protected from the rain, looking out a window, finding the entrance, seeing another person. But those who seek to understand architecture in terms of its associations and its symbolic values correctly identify still other functions. For example, the Italian critic Umberto Eco wrote that a "Gothic cathedral makes possible several primary functions such as 'gathering together,' but at the same time it communicates a number of 'ideological' values such as 'mystical atmosphere,' 'diffusion of light as a symbol of the divine presence,' or 'concentration,' 'deference,' and so on.'" Eco therefore shows that "function" does not have to be understood in the restricted sense assigned to it by "functionalism."

If traditional "functionalism" won't do, what other possibilities are there? At the outset, let us make it clear that *no one thing* can do. There have, after all, been many attempts to explain architecture, sometimes in unitary terms (such as "architecture as space"), and sometimes in dualities (such as "form and function"), and sometimes in triads (such as "firmness, commodity, and delight," or more recently "task, form, and technics"). In one way or another, all simple explanations fail adequately to express the variety of the experience or the complexity of the production.

I believe that architecture has at least eight different possibilities. All eight coexist. The challenge to the architect is to make all of them—or at least as many of them as possible—coherent and vivid. . .

an, the human animal, is compelled to invent architecture in order to exist. A building intervenes on behalf of the human body—frail, unprotected, and lonely in its natural climate. The built environment is a special kind of micro-climate that meets the body's sensory needs for light, for heat, for sound, for protection, for security, and for orientation. Architecture creates a sense of place for the senses.

Architecture is the body's "third skin." That is, the body comes covered with its own skin as standard equipment; as added equipment, one chooses clothing, hats, gloves, and sweaters to suit the climate and occasion, creating a second skin. A building is a third skin, the kind of environmental cover that the body requires for living, for working, for acting, for

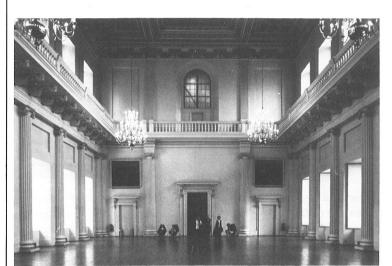


performing, and for being a social animal.

A building is a permeable filter, a selective barrier that can be opened or closed, so that environmental forces can be controlled. The membrane between inside and outside is architecture's. Architecture is the capturing of light. For the religious mind, the illumination and luminosity of architecture is a metaphor for divine light. For the secular mind, luminosity is the most noble experience of nature.







rchitecture controls the physical environment so that people, as individuals and groups, can live, work, and be together. The milieu that buildings create is a shared place for social interaction, for face-to-face meetings, for small group activities, for twosomes and threesomes and foursomes—a group domain. At the same time, the social milieu of building creates many personal places, a room of one's own, a corner or niche, a table and chair which make a territory with some privacy. Personal spaces and group spaces are part of the continuous realm of common-sense territories in everyday life. Ar-



chitecture is the means of accommodating and expressing the spaces for social living.

Some spaces are able to encourage people to meet, drawing them together, enabling group activities, increasing face-to-face contacts, and enhancing social life. These places have a sense of a group domain, of public territory. Look for these characteristics in the lobby of a dormitory, or the entrance to a dining hall, or a family's living room, or on a well designed sidewalk plaza.

Other spaces have characteristics which discourage the public life, making face-to-face relations more difficult, and giving little encouragement to a shared territory: look at many bus terminals and subway stations, or the ground levels of some high-density highrise housing.

A covered arcade in Jerusalem (top) The Pacific Design Center in Los Angeles (above) The Pantheon in Rome (right) Whitehall Palace Banqueting Hall in London (top) Richard Stockton State College in New Jersey (above) rchitecture is the embodiment of a social institution (the family, the church, the school, the state, or the institutions of commerce and work). A building is the physical form of a social form.

One of the joys of architecture is its ability to create, out of common-sense space of daily life, the settings for rituals. For example, eating together in a shared place is one of the key rituals of social institutions as diverse as the family, the advertising industry, and the university.

For a social institution, architecture is an enabling mechanism, making it possible to house its members and accomplish its rituals. Whether rituals are religious (requiring a sacred place) or secular (requiring a mundane place) the architectural form serves the norms and values of the social institution. The rituals may be





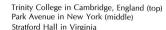


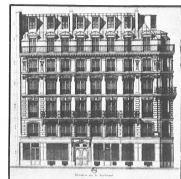
simple, like entering a building: look at the narthex of a church or a lobby of an office building. The rituals may be theatrical: look at an altar, or the podium at a political convention. The rituals may be complex and hierarchically arranged: look at the quadrangle of a college, or at a governmental center. The rituals may be organized temporarily, as a sequence of actions: look at a dining hall or an airline terminal.

The family is a social institution that is profoundly affected by its physical setting. The shape and geometry of household spaces has a strong impact: For example, the size and arrangement of the living room influences whether or not there is an opportunity for genuine interaction and social contact. A key problem of family relationships—privacy vs. community—is something that architects can deal with in the spatial organization of the house.

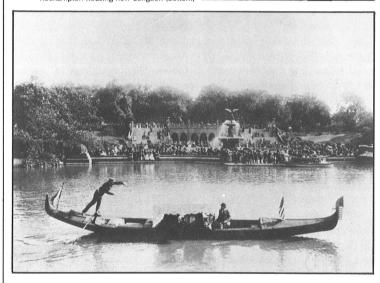
Architecture is a major investment of an institution's resources. It is an instrument of development. The decision to support, for example, housing and community facilities, is a key to the priorities of a society; similarly, for colleges or corporations, the decision to build a research laboratory or an office building is linked to an over-all strategy for institutional development. It is possible to learn a lot about institutions by reading their buildings as well as their public reports.

Buildings are symbols of our important values and goals; they relate to ideas and operations in the social realm. Since these values and practices are given their formal structure by social institutions, it is most helpful for architects to see institutions as the bridge, the mediator, the connection between their concerns for physical form and society-atlarge's concerns for social form.





A facade in Haussmann's Paris (right) Boating in Central Park in New York Wright's Larkin Building in Buffalo Roehampton housing new Longdon (bottom)



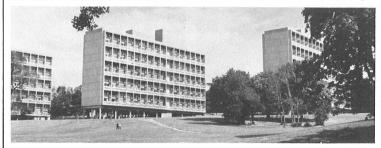
rchitecture is a means for the improvement of society. The physical environment generally, and the built environment specifically, influence the quality of life for all members of society. The distribution and availability of sunlight, or of open space, for example, is a matter of spatial justice. If a depressed condition of life is one result of a bad environment—overcrowded, unsafe, confused, dirty, unhealthy,



and ugly—then the amelioration of life can be aided by a truly better environment. The rebuilding of the slums, the renewal of old districts, and the helpful building of new towns are examples of architecture that improves the fabric of society itself.

Some ideas are shared almost equally by architects and social scientists, each feeling that the concept is fundamentally theirs. Such a tug-of-war exists around the most pervasive proposal for improving the quality of life in cities, "the neighborhood concept." As both a physical and a social form, the neighborhood is a vivid example of the expectation that architecture can improve the life of a community.

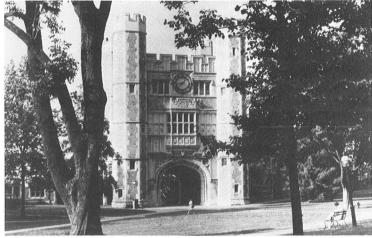
Architecture builds the city of man. The physical setting of the social community is the embodiment of political ideas such as equity and fairness, order and harmony, liberty and justice, an open society or a closed society.



TO COMMUNICATE EMOTION

rchitecture has a moral influence on people, and therefore architecture can be a means for moral improvement. A building can be an embodiment of a moral quality. The sense of unity, for instance, is both aesthetic and moral. A building can encourage and speak out on behalf of virtues, such as courage, or temperance, or honesty, or fairness. The idea of "good proportion" is an aesthetic as well as a moral concept, and a building which has a harmonious sense of wholeness is a vivid example of right action. Architecture creates a sense of understanding of other people, a special kind of empathy, an insight into other lives that is profoundly moral in its effect. When you observe and understand what a building is, you also are gaining insight into what its users are, what their social role

is, and what they are saying about their place in society. If an increase in social empathy is morally good, then architecture contributes to an improvement of the moral life of society. Both Ralph Adams Cram's Gothic and Claude-Nicolas Ledoux's Classical architecture reveal moral intentions. Ledoux, for example, designed "a house devoted to the moral virtues," and proposed a building in the form of a cube because it is "the symbol of immutability." At Princeton, Cram's 1928 Gothic chapel is a building which was designed to offer moral instruction. John Ruskin wrote on architecture that "great works reflect the moral character of the men who make them and the society in which they are made; in turn, they wield a potent influence."





A gothic gate at Princeton The Rotunda at the University of Virginia (bottom)





rchitecture is a means to communicate feeling, an expression of emotion. In this way, architecture is concerned with the making of expressive forms that are the symbols of feeling.

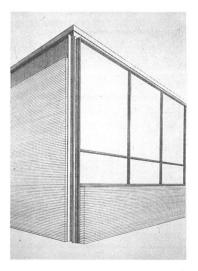
In Feeling and Form Suzanne Langer argues that "art is the creation of forms symbolic of human feeling. The making of this expressive form is the creative process that enlists a man's utmost technical skill in the service of his utmost conceptual power, imagination." Brutal or civil, crude or delicate, serious or gay, noble or frivolous, magnanimous or selfish, sincere or insincere, harmonious or discordant, orderly or chaotic, calm or hectic, aloof or friendly-these are emotional qualities that are expressed by architecture.

In the broadest sense, architecture creates the image not just of material but also of intangible cul-



ture, and it expresses social feelings. Architecture's expression of culture is most evident in the buildings of social institutions—a house for a family, a church for a congregation, a college for a community of scholars and students, a capitol for a state.

In more personal terms, architecture can express the feelings of the architect or the inhabitant. Perhaps, like musical delight, the pleasure of fine architecture derives its joys from both.



A house by Le Corbusier (top) A house in Peru, Vermont Details by Mies (above) Details of a facade in London (left)

rchitecture refers to other architecture, and to other places, times, and institutions. A building is more than a representation of itself. By reference, reflection, and even imitation of another reality, a building encourages our understanding of other things.

Sometimes operational factors are overwhelming influences, leading to the emergence of a building "type" such as the contemporary office block. The similarity to Lever House of office buildings in Addis Ababa is at first glance more a matter of functional type than of association. But is it the whole truth? Is there not also operating a kind of pride of identification with "modernization," with the progressive institutions of commerce and with the Western world? Rightly or wrongly, architecture expresses this association.

Sometimes, deliberate reference to another time is the dominant influence on an institution or architect. The "collegiate Gothic" style, as well as being a very adaptable building and planning system, was a conscious attempt to associate with the medieval origins of the universities of Oxford and Cambridge; similarly the use of neo-Roman style was advocated by Thomas Jefferson for the new American democracy, and the Girard Trust Company in Philadelphia, designed by McKim Mead and White, was an obvious attempt to be associated with the permanence and cosmic significance of the Roman Pantheon.

Sometimes, a building refers not to another building, but to ourselves, our human bodies. In order to construct space, we take our bodies as an instrument of order and measurement, a source of what the mathematician Henri Poincaré called an "instinctive geometry," which is neither pure abstraction nor a simple representation of our bodies. We rarely see



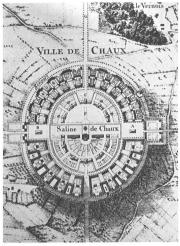
a whole building which is an actual representation of a body, but look at the plan of a Gothic cathedral, or the Temple Dedicated to Love proposed by Ledoux. And we often experience buildings which are organized like the body (for example, symmetrical from side to side, but not symmetrical from top to bottom; having a vertical axis; having a head).

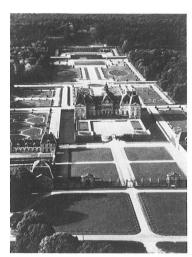
Sometimes, a building refers to nature, especially to the habitat that has cradled civilization: the meeting place of forest and grassland. A building can have columnar halls and arcades (like a forest) and cloistered courtyards (like a clearing in a forest). Look at the lefferson concept of the University of Virginia as an example of an imitation of pastoral nature. Architecture draws prototypes from nature.





TO ASSOCIATE WITH IDEALS







Irchitecture can be the image of an ideal, such as an ideal nature, or an ideal society, or an ideal cosmos, or the myth of a golden age.

The tower and the dome are two of the most powerful forms of reference to an idealized nature and cosmos. The tower not only marks a place, but also refers to the axis of the world; the dome not only encloses a space, but also refers to the cosmic cover of the heavens.

The myth of a golden age exerts a powerful influence on architecture, with references to ancient Athens, or to the medieval community, or, more parochially, to a heroic period of architecture's own development, like the 1920s.

The ideal of democracy was a stimulus to Louis Sullivan and Frank Lloyd Wright; they sought to make architecture the embodiment of liberty, the expression of justice, the image of a democratic community.

The ideal community has been framed by many architects, such as the "House of Communal Life" by Ledoux, for sixteen families who would live together in harmony and peace, and in Ledoux's words, "surrounded only by virtue ... would know nothing of evil."

The idealized institution is often a matter of some choice: we have colleges that are Gothic because of references to medieval scholasticism; or Georgian Renaissance because of references to classical academy. Similarly, we have town halls that are Gothic because of an idealized notion of the medieval urban community, and town halls that are Greek or Roman because of an idealized notion about the roots of democracy. Perhaps the most permanent example of an idealized institution is embodied in the concept of the quadrangle, the cloistered courtyard, or the plaza, which serves as the functional and symbolic center of a community.



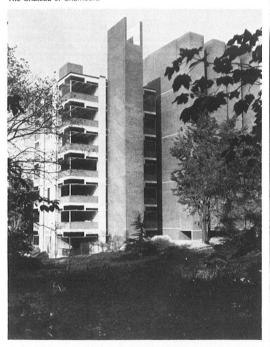
A weekend house in Scandanavia (top) A gate at Gonville and Caius College in Cambridge Details of a house by Antonio Gaudí (above)

The town of Chaux in France (top left) A French chateau: the idea of "horizontal" (top right)

The World Trade Center: "tower" and "two-ness"

COMPLEXITY AND COHERENCE

Kahn's Richards Labs in Philadelphia The Chateau of Chambord



Since architecture originates in human experience, it has the possibility of being many different things. I have tried to show eight of the possibilities, all of which coexist. There are certainly more, plus a dazzling array of other possibilities for combining them all. The challenge is to admit them all and confront them, trying to include as many as possible, and bringing them coherently together with compositional skills.

Architecture is, in fact, a composition, and the architect is like a composer. The composition may pursue many different themes—static or dynamic, clear or ambiguous, open or closed, simple or complicated. The relationship between the parts of the composition, as well as the parts themselves, needs to be developed with logic and with a sure sense of what is required. But the ultimate goal is still more than this: it is to create a whole thing out of all of the parts—a vivid unity with an identity and an integrity of its own. The goal, that is, is to create a sense of coherence. And in doing this the architect makes his or her most valuable social as well as aesthetic contribution. In doing this the architect creates form.

Consider a prairie house by Frank Lloyd Wright. In it you will find not only a wonderful place to live, a shelter, and a stage for family life. You will also find a rich organization of vertical and horizontal planes, a fine choreography of solids and voids. You will find a varied orchestration of light and shade and of smooth and rough. And all of these phenomena will be a part of a still coherent composition.

To me the prairie house shows the coexistence of the social and the aesthetic, and in my own work I have found this to be the key to architecture, the most likely departure gate on the long journey to all of architecture's possibilities. From my own point of view, the proper connections between social form and physical form are the central issues, and I believe that an understanding of the nature of social institutions, their values, their norms of behavior, and their rituals, is the most helpful way for an architect to get started.

Nonetheless there can be no single formula. We can only bring our own experience and knowledge optimistically before the light of our imagination—that inventive faculty which receives many possibilities, the poetic sense that balances and reconciles discordances, the producer of vivid images, and the creator of coherence, the creator of form.

The task is to give form to all of the possibilities of architecture. Though societies and cultures change, and emphases shift, all of the possibilities do coexist, opening up prospects of great richness. As Lewis Mumford once said of our time and of the future, "I am pessimistic about the probabilities and optimistic about the possibilities."

