

THE WHOLE CONTROLS THE DETAILS

In a great deal of modern architecture, the details control the whole. For example, when a person makes a building out of pre-formed components, he first lays out his design, roughly, and then tries to find an arrangement of these components, which gives him approximately the design he is looking for.

For example, in one architectural office I know, where they design many schools, as soon as they have a rough idea of the plan for the school, they lay the plan down over a 10 foot grid, because they know they are going to build it using 10 foot modular components, and then distort and stretch the plan until it fits the ten foot grid.

This is the very opposite of what happens in nature. In nature, a form gets laid down, globally, and then the details follow, get squeezed in afterwards. It is because of this that no two branches of a tree are the same, and that the bark of the trunk is a little different at every place. Each part of it gets its form from the rules governing its own order, interacting with the constraints imposed from above by the global relationships.

This difference is the keystone of organic architecture. You cannot make an organic thing, if the components are worked out ahead of time - the components, at each level, must be constrained by the global decisions higher up.

ORGANICNESS

I have said, earlier, that the sequential nature of a language does no harm to the wholeness of the designs which it produces, provided that the sequence of the patterns are in morphological order.

I shall now argue, much more strongly, that the order of the language, far from being a disadvantage, is the very well-spring of the organic quality which arises in the buildings that are made with it.

Lets start, once again, with nature: the growth of an embryo or a plant. At every level, certain broad patterns get laid down: and the details are squeezed into position to conform to the structure of these broader patterns. Of course, under these circumstances, the details are always slightly different, since they get distorted as they are squeezed into the larger structure already laid down. In a design of this type, one naturally senses that the global patterns are more important than the details, because they dominate the design. Each pattern is given the importance and control over the whole which it deserves in the hierarchy of patterns.

It is possible to build buildings in exactly the same way. I recently built a wooden terrace onto the outside of my house, about 6 feet above the ground, at the same level as my living room. I decided to use an old pine tree as one corner post of the extension, and I was trying to decide how to place the other columns. The considerations which governed the choices were:

- a. The left hand post was as far as it could be to the left, so as to catch a corner of sunshine that repeatedly falls on that spot during the day.
- b. I decided to place two other posts, not one, so that there would be two corner spaces created, each a ~~single~~ ^{useful} social space, with a diameter of ~~the order of~~ ^{about} 5 feet. One column would have split the thing, and made no spaces anywhere, since the corners would be too large. (Columns at the corners of social spaces).
- c. The total corner to corner dimension was 14 feet. Should the ^hrythm of the posts be 6-2-6, 5½-3-5½, 5-4-5, or 4½-5-4½, 4-6-4. I wanted the corners to be large enough to function as social spaces, and therefore larger than the center span. On the other hand, since these columns would define the positions of intermediate beams, I wanted to make the central span as large as it could be - and not waste it by making it too narrow. As a result of these deliberation I finally settled on 5½-3-5½. This particular rhythm is perfectly balanced to this situation.

The same thing happens at the next level down. The tree happens to slant outwards, and has a rough bark. At each step, the broad pattern is determined by large relationships - and dimensions of details are moulded to fit into them.

Suppose I had been trying to build this terrace out of modular components which had a fixed dimension, like this:

Then I might have had to miss the sunlight in the corner, destroy the corner spaces, or make a wasteful span; and I would not have been able to tie into the tree because it slants.

The pattern of modules would have had a superficial order - but they would have been just slightly wrong, at every point, and the whole design would have been spoiled, because the details were tyrannising the larger design, and forcing it to an arrangement which was unnatural, and inappropriate.

As it is, the terrace is organically related to the land around it, because the detailed dimensions are determined at every point by the larger patterns.

You may say that my terrace is a small thing, compared with a vast office building. But the principle is the same. Do the details tyrannise the larger design: or does each relationship have its order of importance, and influence the design according to its relative importance.

You will not be able to make an organic design, unless you can first rid yourself of this desire to tyrannise the whole, with the details. Yes, rid yourself of your desire to tyrannise the whole. Many architects are obsessed by something they call "clean" detailing. They want things to work out exactly on the drawing board, it means always having things be equal, and flush, and perfectly lined up.

The tyranny of these very arbitrary rules of thumb, can make it impossible to create a design which simply flows from the patterns that generate it. To produce a design which has this clean quality means endless shuffling around of the details, hours of work at the drawing board - all for what. For nothing. This mania for "cleanliness" is nothing more than a high flown version of the mania which makes a nervous man rearrange the things on every mantel piece, because he can't stand it unless they are perfectly symmetrical.

Once you overcome this mania in yourself, and relax, you will realise that you can always work out the details, within the layout of the larger structure you have laid down, with no more than minor changes in the larger structure, because you are now willing to squash and squeeze the smaller dimensions, and fit them to the larger ones, according to the hierarchy of importance which they have.

And of course, once you have understood this, you will be able to use a language, to design a building in your head, by following the patterns, in the order given. And, when you do this, and relax, the building will have the same quality as any part of nature does - for the good reason that it is made by a process which is essentially the same as the processes which create things in nature.

LOOSE ENOUGH FOR MENTAL HEALTH

1. Details are subservient to the plan, down to the last inch.
2. User has genuine control, not administrator or architect. Even though transient, it is ~~more about what is needed than~~ understood that user knows more about what is needed than anyone else. His word is law.
3. Money is allocated for maintenance; genuine low cost; yearly input.
4. **The buildings is open to the nature of the site and climate around it.** It is always possible to feel the presence of smells, weather, etc. Buildings fitted to the heat.
5. Concern for life of building - grass growing wild, flowers planted by inhabitants, windows placed where they fall.
6. The particulars of the site, the people, the program, etc., are all reflected in the plan; the twists and turns of the form are thus inevitable. Not possible to impose a strict modular scheme on such a plan.

The feeling of universality is achieved by deepest attention to particular realities.

TOO TIGHT FOR MENTAL HEALTH

The regularity of the details is allowed to modify the plan, and the plan becomes subservient to these details.

Decisions are made by architects and administrators - both remote from the day-to-day use of the building. Users are regarded as people who may be consulted about the most basic questions, but who can easily be overruled.

Building conceived as a piece of capital. Money flows in one lump.

The building is sealed, and the realities of the climate, locale, nature, etc. are kept out, or treated like museum pieces. Primary example: Air-conditioned buildings - "liberating the plan".

Concern for the "appearance" overwhelms the living reality - architect works up his elevations, landscaper works up his iceplant ground cover, etc.

The particulars of the situation are shoved and cramped into the "order" of a modular conception. The quirks are eliminated. Premature expression of feeling of universal.

7. **Materials** allow people to modify them - wood, plaster, brick.

Materials do not allow people to modify them - glass, steel, concrete.

8. The building can age, because it can be maintained, painted, and patched gradually during its lifetime.

Building cannot age, because it is built to be pristine. Bricks so hard they do not wear; plaster board which cannot be patched, until it has to be replaced because it is utterly decrepit.