

Zeitschrift: Werk, Bauen + Wohnen
Herausgeber: Bund Schweizer Architekten
Band: 88 (2001)
Heft: 5: Im Fluss = Fluidité = Flux

Rubrik: English

Nutzungsbedingungen

Die ETH-Bibliothek ist die Anbieterin der digitalisierten Zeitschriften auf E-Periodica. Sie besitzt keine Urheberrechte an den Zeitschriften und ist nicht verantwortlich für deren Inhalte. Die Rechte liegen in der Regel bei den Herausgebern beziehungsweise den externen Rechteinhabern. Das Veröffentlichen von Bildern in Print- und Online-Publikationen sowie auf Social Media-Kanälen oder Webseiten ist nur mit vorheriger Genehmigung der Rechteinhaber erlaubt. [Mehr erfahren](#)

Conditions d'utilisation

L'ETH Library est le fournisseur des revues numérisées. Elle ne détient aucun droit d'auteur sur les revues et n'est pas responsable de leur contenu. En règle générale, les droits sont détenus par les éditeurs ou les détenteurs de droits externes. La reproduction d'images dans des publications imprimées ou en ligne ainsi que sur des canaux de médias sociaux ou des sites web n'est autorisée qu'avec l'accord préalable des détenteurs des droits. [En savoir plus](#)

Terms of use

The ETH Library is the provider of the digitised journals. It does not own any copyrights to the journals and is not responsible for their content. The rights usually lie with the publishers or the external rights holders. Publishing images in print and online publications, as well as on social media channels or websites, is only permitted with the prior consent of the rights holders. [Find out more](#)

Download PDF: 04.07.2025

ETH-Bibliothek Zürich, E-Periodica, <https://www.e-periodica.ch>

English

André Bideau (pages 8–17)

Translation from German: Michael Robinson

Communication as Landscape

Toyo Ito's Mediatheque in Sendai

Sendai, a large but unspectacular town two hours north of Tokyo by train has acquired a truly "spectacular" place in the form of the Mediatheque. A building that is probably one of the most significant in the present day has gone up there, permitting a large number of interpretations: as the poetic form of a kind of communication that has become non-representational, as a space where a leisure society can experience its interaction with a range of cultural activities in its own playful, technology-dominated way. A particularly Japanese form of synthetic public quality is also to be found in the vertical spatial sequence. Public space in Japan has more to do with movement and function diagrams than with the figures and propositions of urban development. The Mediatheque is a building that implements these conditions osmotically on the outside, elastically on the inside.

The spacious street grid on which Sendai was rebuilt after being destroyed in the Second World War is unusual for Japanese cities. But the completely heterogeneous development surrounding the plots of land in which the Mediatheque, opened in 2001, has been erected is typically Japanese. As a public building it has no more important space in front of it than a nearby petrol station, for example. The outside world is filtered as it streams through the glazed volume, which faces in no particular direction, its rich interior life appearing like a vertical slice out of tightly packed urban surroundings. The stack consists of colourful interiors and is held together by a pulsating system of vertical connections: 13 tube-like steel piles of different diameters create a macro-space with large spans, linking the apparently unrelated levels and functions together structurally and spatially. This supporting structure appears figuratively as in a glass vessel in the depths of the Mediatheque. At night the forest of tubes behind the curtain wall can be seen from outside in the street – as a lit medium and a poetic form in the urban space.

Images after Modernism

In his essay "Blurring Architecture", written a few years ago, Toyo Ito discussed "electronic" against the background of "mechanical" Modernism. In the age of increasingly invisible, omnipresent technologies, he enquires about

the meanings they create in defining the public realm and spatial perception. In his attempt to connect up with the radical conceptual content of "old" Modernism, Ito establishes that its themes (repetition, immateriality, communication, transparency etc.) have been culturally and economically "assimilated" by society, and have thus become retrievable and deradicalized as experience values. As the idea of blurring suggests, Ito commits himself to the peripheries that have become unfocused in the discipline of architecture. After this has been confronted and freighted with systems of signification in the seventies, and subsequently with new technologies and modes of perception, he is now concerned to include natural phenomena in architecture in an atmospheric, pictorial or structural way. Here the (classically) Modern topos of the nomadic individual in a continuous space is reactivated. An early example of Ito's Postmodern way of finding images was the "Tower of the Winds" in Yokohama, realized in 1986. The cylindrical object, scattered with glowing diodes, heightens a natural event electronically in the urban space by displaying wind variations in the form of changing colour combinations.

The Sendai Mediatheque's support system wriggles like a carpet of algae in the water. As an institution, the role of a mediatheque is to conduct research into communication and the processes of perception associated with this – a reason for Ito to examine the phenomena of flow in the physical as well as the transferred sense. By treating the spatial content of this public building like water in an aquarium he is referring metaphorically to the primary medium of all life forms, but also to the beginnings of all forms of settlement, trade and communication. Just as settlements once established themselves "naturally" along rivers, Ito now recognizes spatial potential in the limitless linking and availability of information. He is not alone in seeing the modern city as a space for movement, with constantly mutating images and uses. Yet, the investigations that Ito has conducted so far – and now distilled within a single building – are also closely linked with the Japanese context.

From Wachsmann to the department store

At the very beginning of the design process, in the 1995 competition, a sketch by Ito expressed the metaphor of flow: in the view from the street, tube-like structures winding vertically cross the piled floor slabs. The same sketch establishes the organic coincidence of vertical access, daylight provision and technical equipment within the space-containing support structures. These 13 "tubes" also play different parts in relation to the forces acting on the building. Rather like the various shapes of bones in a skeleton, the changing three-dimensional conditions of the flowing structure specialize in different tasks.

And so is it a realization of Konrad Wachsmann's 1953 utopia, when he presented a support system of twisted steel girders and

anticipated production and representational-technical developments in industrialized building? At that time Wachsmann had the various lines of force penetrate and overlap each other within an organic system of bars: three-legged, polygonal steel girders twist within themselves and grow together into a network, radicalizing Modern space into an "infinite" infrastructure. Wachsmann, who worked with Mies van der Rohe in the fifties on broad-span projects, provided some crucial ideas for the fun-worlds of Archigram in subsequent years. Those designs combine for the first time the emancipatory potential of wide-span structures with nomadic programmes and hedonist events: Archigram use a technologically defined hardware to develop informal and interchangeable "landscapes" of pop culture, of the kind that will also characterize the interior of the Mediatheque.

Toyo Ito and his structural engineer Mutsuro Sasaki moved into new territory when planning the Mediatheque. But their access to technological innovation is not meant to help an antiquated building culture to connect up with technological progress, as attempted by the Metabolist group (Kikutake, Kurokawa, Tange) in sixties Japan with growing and interactive structures. For Japan has even less to change than other places regarding the power relationship between architecture, the building industry and planning mechanisms. Any "critical" voices about the limitless density and frail urban planning instruments are not heard. So Toyo Ito goes beyond all dialectic and takes up the – much more fascinating – "wild" infrastructuralism of the Japanese city. Its literally organic juxtaposition of programmes and competing networks is distilled into a single architectural object.

In Ito's words the Mediatheque is intended to function as a cultural "department store". If he has in mind a culture centre open 24 hours a day and offering something different on every floor, this is to be taken correspondingly literally – just like the experience of the vertical public quality of the temples of consumption in Tokyo where urban focal points emerge out of spatial and economic links with the public transport networks.

Colliding signatures

As early as 1970, Roland Barthes described the stations of Shinjuku and Shibuya in "L'Empire des Signes", where Tokyo begins in a fluent transition from the suburban train to the shoe departments of the department stores. In the same way, Ito's own perception of the Mediatheque does not seem very much like a hermetic place for concentration and research. It is much more about a space tailored to strolling around, the six floors open to the public being allowed to appear as attractive – and as transient – as "boutiques". The Mediatheque has characteristic interior architectures, alternating between the abstract horizontals of the floor slabs. For, with the exception of signalistics, different designers were responsible for the

structure and furnishings of the individual departments. The joint venture that Ito entered into with some well-known names here goes further than, for example, Herzog/de Meuron's and OMA's spectacular teaming up for a hotel project in Manhattan. There is also a tactical difference between the – certainly remarkable – cooperations between OMA and artists like Petra Blaisse or Atelier van Lieshout: Furnishing and detailing at Congrexpo Lille or the Kunsthal Rotterdam somehow still appear to respect constructive didactics and reflect OMA's search for additional stimuli by including work by an avant-garde drawn into the architectural project.

In Sendai, the bright red signal objects by Karim Rashid (ground, 4th, 5th floor), Ross Lovegrove's design landscapes (6th floor), Kazuyo Sejima's textile intervention (1st floor) explore the degrees of durability between fashionable furnishings and open space. Certainly these innards, extending from a White Space to a lounge with oak parquet are transient, but their aesthetic plays a tactical role for Ito's control of space. The collision of individual signatures blurs traces and disorients to an extent in the macro-space of the Mediatheque. And also because the 20 metre spans only become an experience on isolated occasions, a display of muscle comparable to the Centre Pompidou does not come about. Here interior space, as in the case of Tokyo's commercially organized verticals, is a performative vessel. Fittings, coverings, linings, but also sophisticated handling of light, make it into a stage that can be played in different ways at any time.

Even the "overwound" steel structure seems to have shifted into this condition – as an elastically perverted infrastructure. Because of its informal geometry, the white forest of tubes does not compel us – despite the allocation of functions and media – to embark on a reading of servant and served elements. For this reason Ito's architecture also avoids any sort of structural – or even organic – rhetoric, even given its extraordinary theme in terms of building technology.

Formless Japan – various readings

So is the Mediatheque an everyday building? One of the unusual qualities of Japanese cities is that the juxtaposition of artificial and material realities is not merely a contemporary phenomenon, unlike the case in Europe. It is also possible to see approaches like Ito's to the media challenge of architecture in the light of Japan's cultural traditions. Essentially, the themes adopted as a matter of course by the avant-garde in their practice like artificiality, dematerialization, transience have formed a part of historical architecture and garden design from time immemorial. The concept of transformable, performative space, equipped with fluent transitions, is anchored there as well. And something similar applies to another Mediatheque design theme, the relating of interior and exterior space through thin layers.

At the point where Ito goes back to classical Modernism's historic dispositive of formless space, he is caught up twice over by the reality of the building commission and of the place – and they allow that he is right. This is because on the one hand the Mediatheque as an institution is addressing precisely the new, immaterial phenomena of the public realm and communication, and on the other hand Japan does not have any urban public spaces to which a fixed "gestalt" could be assigned. Concepts like context and place have always functioned differently from the way they do in Europe – to the extent that a comparable perception of such phenomena existed at all. A completely different relation of the parts to the whole is expressed simply by the Japanese relationship between the house and the urban infrastructure.

Ito's interest in the phenomena of the fluent, nomadic and transitory is in tune with the times. But the European perspective, despite globally imposed discourses and signatures, opens up only a "Western" reading of his work. Like the work of artist Mariko Mori, Ito's handling of technology and narration also applies to everyday life in Japan – to the artificial imagery, to the playful handling of the gadgets and toys constantly turned out by the national consumer goods industry and taken for granted. This condition is not invoked and projected by an avant-garde, on the contrary, it exists in reality and on the basis of an acceptance of unparalleled forms of modernity, density, interaction and simulation.

Jesse Reiser: RUR Architecture, New York
 Nanako Umemoto: RUR Architecture, New York
 Chris Duisberg: architect, Berlin
 Hans Drexler: architect, Frankfurt a. Main
 Original version of pages 18–23

Uses, Situations and Conditions of Space

Attempts to break down the material quality of space have a long tradition. They were one of Modernism's basic reflexes, and have been updated by a number of avant-garde movements, most recently in the nineties against the background of digitalized spatial representation and form generation. Reiser & Umemoto's projects investigate a force-field superimposing use programmes, traffic diagrams unpredictable processes and movements. But their urban landscapes populated with nomadic individuals – compared with the Utopias of the fifties and sixties – are less concerned with subversion and a desire for emancipation. Instead, Reiser & Umemoto's fluid event spaces are concerned with the controlled public space that is a particular quality of contemporary consumer and event culture. And at the same time, as endless infrastructures, they endow global streams of data and capital with vivid, monumental form.

Drexler, Duisberg: Architectural theory, especially at Columbia University, where you have been teaching, has shifted away from questions of representation and issues of meaning towards the effects of architectural form. What triggered this paradigm shift?

RUR: At one point there was a real hope that we might achieve truly transformative architecture through complex manipulations of representation. This came out of Deconstruction and the whole legacy of semiotics in architecture. These issues formed a central part of our projects from the mid-eighties up to the early nineties, but there was always a schizophrenic aspect to our design process. We wanted to make collage the engine of design, but never entirely succeeded. We went through a kind of crisis; I could, actually pin it down to the work we showed in a publication called "Semiotexte Architecture". We came to the conclusion that this kind of process was not really productive, that one was invariably going back to a more modernist way of composing or organizing, using bubble diagrams and then embellishing the project with image-based secondary material. Inevitably, the basic principles of organization would not and could not be linked to collage. This happened over and over again. We realized that we were just banging our heads against a wall. At that point we decided that there had to be other ways of working. We were not the only ones frustrated by the process; across the board, people were becoming increasingly interested in projects that would engender change and difference within a coherent and integral system.

Drexler, Duisberg: Has this had an influence on the role of perception in your work?

RUR: The semiotic approaches, of which collage is a part, primarily involved working with issues of perception and legibility. We realized that the perceptual condition was properly a by-product of the system rather than the generator of it. The claim we would make is that one doesn't have to worry about perception, especially perception tied to the communication of a meaning; you will still get all the phenomena, all the perceptual effects, but you shouldn't start with those as a basis of a design. The question of perception within space follows from organization. So we're not denying meaning, but rather making it the project of the user rather than of the architect.

Drexler, Duisberg: Claude Parent and Paul Virilio stated in their theory of the "Function of the Oblique" that: "Architecture must never be neutral or indeterminate. It must be active; it must continuously engage people, draw them into action, involve them in public events." How can architecture have a potential for activity and how can time become operative within a built space?

RUR: There is a parallel to this question about Claude Parent and Paul Virilio in their interest in creating a literal potential in terms of oblique and

sloping surfaces, and having those motivate connectivity and flows within a space. It isn't something that one could talk about in the abstract so easily. Those are issues that require constant checking. It is something that has to be brought into physical reality, and then it becomes part of what can actually be experienced.

In our IFCCA project in Manhattan, infrastructure is inherently connected to flow and quantity (10,000 people an hour flowing into and out of Pennsylvania Station). These aren't architectural inventions per se, but material facts which we were able to tap into and rework. In the crudest possible analogy, if you are handed a high pressure hose with water shooting out of it, you don't try to imagine the activity and force within it, you think what to do with it and how to direct it. Therefore architecture, although physically static, enters into these conditions through organization, in terms of potentiality and connectivity. Equally, there are effects which are certainly tied to quantitative conditions, but not in themselves reducible to pure data. The time that becomes operative in a building for example is not clock time, it's duration. It's not measurable like time on a stopwatch, it's about how environments effect experience. However, we would contend that quantitative material organization generates these experiences, but not the other way round.

Drexler, Duisberg: In your IFCCA project you introduce a multitude of different activities and movements so that an almost uncontrollable site is created. Can this be seen as an attempt to simulate a complex natural environment where unforeseen conditions would emerge?

RUR: It really wasn't so much about replicating complex systems about engendering a certain complexity in the artefact. The assumption is that by mixing systems there is a greater possibility for unforeseen effects to occur in the final built structure. Our way of working involved managing different material regimes and systems. Our methodology involves incorporating multiple systems or environments into the mix and working back and forth between them. One of the overall ambitions of the project was for interconnectivity among all parts: we literally attempted to weave the strata of the city together. We tried to make these realms, which in some form are already present on the site, accessible and continuous, for example by incorporating green spaces, infrastructure for cars, different scales of structural hierarchy and pedestrian flow. We at first looked at a fairly simple diagram of movement from various infrastructural sources and then tested how these movements would mix in the station, in the commercial spaces and in the large event space. Thus, we were managing a situation that was only partially controllable. Much of it had to do with working on something, seeing what would happen and then adjusting it along the way. Sanford Kwinter compared this way of working to cooking, or the way in which aerial combat is waged.

Drexler, Duisberg: Some of the models for your IFCCA competition project contain three-dimensional flow diagrams. The architecture no longer seems to refer to a Cartesian model of homogeneous and static space. Your project seems to be based on a notion of a nomadic, transitory space.

RUR: That is substantially true, but architecture, especially in the context of the IFCCA project, inevitably finds itself suspended between scales and uses that are radically divergent. Essentially we are dealing with locales that are part of a vast global system, the transportation corridor. It is actually about the movement-corridor rather than about the object itself moving. So the problem is relative. If we approach the project from the point of view of global logic, that is from the vehicular side of things, then yes, the vectorial expression in the project as built form is actualized in use. However, the same formal development seen from the standpoint of a pedestrian would appear to be more localized and more traditionally expressive.

More generally, when talking about transition and the departure from homogeneous and static space, time does become a function of spatiality. As a consequence, we have taken up the notion of the diagram as a productive procedure, and so movement among temporal material regimes becomes a natural outcome. Many different material dynamics begin to enter into the work, because now it is possible to move among them fluidly. It is about a kind of extreme artifice. There is always the problem of representational thought, especially among critics. When they say "all of them are looking at weather", we are not really looking at weather itself. We are looking at weather in terms of its dynamics. However it always has to be expressed in the terms that are possible within the material construct of architecture. One could further claim that such diagrams do not really originate in weather either but that there is a vectorial dynamic that cuts across many different material systems.

Drexler, Duisberg: How can the notion of function and programme be expanded and become an essential input for the design process without submitting the design to a rationalist or opportunist procedure?

RUR: One of our basic assumptions is that programme and form don't correspond precisely. Functionalism is in itself a myth. We have known for quite some time that a programme doesn't absolutely adhere to what the architects say it does. Labelling a space a kitchen and assuming that the only thing that happens in it is cooking is a fiction.

This is something that was already visible in the nineteenth century to people like Frederick Olmsted. The great example of a loose correspondence between programme and form would be Central Park in Manhattan, where there is almost no programme spelled out and yet you could never say that it is aprogrammatic. It is

actually loaded with different kinds of programmes, even though there were no labels as such on the drawings. Indeed, it continues to accrue different uses over time. Olmsted didn't know what a rock concert was but the spaces and relations between roads and paths anticipated that scale of public event.

Drexler, Duisberg: In your more recent projects like the Kansai library your design seems widely based on computer models as a means of investigating the relationship between structure and divergent patterns of activity.

RUR: We constantly work back and forth between physical models and computer models since we come from a slightly older generation that doesn't really trust computer generated perspective views. We are much more interested in metrical space than in perspective space, especially during the design process. We always want to have an artefact in front of us that can be inspected and measured.

In the project for the Kansai library we initially used a bubble diagram as a model of connectivity among different programmatic zones. We then looked at the relationship of different slopes of floors and specific programmatic elements that would relate to those slopes. A provisional physical model was made in wax. This model connects the topologies of the various surfaces of the ramp system. This was remodelled on the computer and analysed in terms of heights. After that we worked manually on a secondary scale by developing smaller organizations on the slopes, as if we were working on a landscape project. So there is a constant to-ing and fro-ing between media and methods, not a linear process.

Drexler, Duisberg: We have been talking about the influence of vectorial dynamics in your projects. How would these forces continue to operate in the spaces that they created?

RUR: Again the question arises of how to deal with a dynamic system. We have increasingly moved away from a vectorial relationship between force, geometry, and a derived materialization, which is what Greg Lynn would be interested in. We are more interested in working with the way matter computes itself. It is possible to create a dynamic field while operating on a physical model. Dynamics, although necessarily arrested in built structures, live in a very literal sense at the structural level.

This can be a way of shifting from dynamic organization right into something that, even though static, is actively influencing organization and use beyond that of structure per se. This is not a metaphor, it is about a kind of behaviour you could then use to manage architectural organization. For example, with the IFCCA project we were working back and forth between the programme within the roof and the roof structure itself by mixing the domains. The models were structural models but we were already contaminating them with formal and organizational

material. Thus force becomes a tool, an engine with which to influence and design things within a structural field.

So it wouldn't be a purified structure, and it isn't really about innovative structural design either. You would not arrive at the most efficient structure possible given a certain span, but it would be as efficient as it could be given that these other influences are included. A modernist structural designer would probably see what we were doing as impure and possibly irrational. We were trying to mix things that had been distinct realms within a modernist framework.

We created a catenary field and then influenced it by impinging on it from many directions with lines of force. The idea for the catenary field came from a suggestion made by our structural engineer Ysrael Seinuk. Antoni Gaudi used similar models in the design of the Sagrada Familia, but was working solely with gravity forces. Our situation, however, was far more complex than Gaudi's. We had generated a rough geometrical model on the computer using the Alias modelling program. The problem we were facing was that the computer models we were working with were only crude approximations of structural behaviour. Physical catenary models have the advantage of being able to simultaneously compute geometry as well as structure with a high degree of precision. We

proceeded to construct a two metre long chain-model acted on by weights and pulleys. We pulled on the chains from a number of directions in order to get them to relate to the formal and organizational strategies of the building. This shaping resolved the organization of programmatic elements and the structural capacity of the field itself. The interesting part is that one would always be assured that any expression in this field is structurally sound. It is a material computation.

Drexler, Duisberg: Is it important to you that the process of the generation of form and the forces that influenced it can be read and understood in the final project?

RUR: That is a discussion we have had with Greg Lynn and Jeffrey Kipnis. It isn't so important for us to show the history of the project as a rational development. You know as well as I do that most of these are falsified histories anyway. The design is done and then a cosmetic history is presented which appears retrospectively as being rational. It is simply rhetoric to produce sanitized and rationalized histories, but it makes people feel better.

That is not how our office works. The important thing to us would be to have those influences embodied in the project and not simply make them a way of arguing or of describ-

ing a process. We don't have to illustrate that. I guess that ultimately the most important thing would be the project in terms of its actual effects and not the history of its process.

Sicher.Schön.Sparsam. Signum

SIGNUM bietet mehr Glasfläche, gesteigerte Wärmedämmung, überdurchschnittliche Sicherheit, exzellente Schalldämmung und überzeugende Formschönheit. Der Fassadengestaltung eröffnen sich völlig neue Designmöglichkeiten durch den fast unsichtbaren äusseren Blendrahmen und die schlanke Mittelpartie. Das neuartige Flügelprofil ist direkt mit dem 32 mm Isolierglas verschraubt. Die klassischen Einbruch-Angriffspunkte entfallen. Innere Glasleisten gehören der Vergangenheit an. U - Werte unter 1,0 für alle Konstruktionselemente führen zu einer sensationellen Energiebilanz. Die neue Kunststofffenster-Generation vereint Spitzentechnologie und Ästhetik. Besuchen Sie unsere Fensterausstellung in Ebikon oder die Website und fordern Sie die Unterlagen an.

Fenster zweiflügelig mit
eleganter Mittelpartie

Signum einflügelig
wirkt wie eine
Festverglasung

Kronenberger AG
Ronstrasse 7
6030 Ebikon
Fon 041-445 15 15
Fax 041-445 15 51

KRONENBERGER
Fenster • Fassaden • Metallbau

fenster@kronenberger.ch
www.kronenberger.ch
ISO 9001 / ISO 14001

Die Krone steht für Qualität

ASPA