

# From Technology to Aesthetics

by Brigitte Desrochers

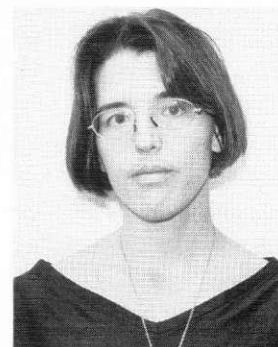
**T**ECHNOLOGY: Tech as in *teuch*, Indo-European radical. *Teuch*, as in *teuchô*: tool, instrument, weapon. Also, as in *tektôn*: carpenter, artisan, craftsman. Or as in *tuktos*: well constructed, well fabricated, complete. Technology, then, would be more than a thing... it would be a way of making. And even, a way of knowing. *Techné*, in Plato, is quasi-synonymous with “rigorously established knowledge” that is, *épistèmè*. More: a way of creating for Aristotle, who defines *techné* as a *hexis poiètik*, a permanent, acquired disposition based upon reason and creativity. Or for the stoicians: *habitus hodopoieticus*, milieu creative of poetic avenues.

Since then, the Great Divide cast the poetic avenues on one camp, and the technological object on the other. Yet as of late many a thinker has been brought to consider that this divide nurtures a potentially self-destructive mix of power relations, and that it bears witness of a profound cultural crisis. I am, here, thinking about figures such as Cornelius Castoriadis – to whom I owe the above insights on *techné* – Bruno Latour or Michel Serres. In works such as *Le Passage du nord-ouest* (The Northwest Passage), Serres attempts to weave the great divide back into a single conceptual field. This field, in turn, allows a reproblematicization of the notion of “technoscience”.

I never consider science in terms of it being an object ... an exterior space that can be described, analyzed, judged, ascertained. Or else, a city to be defended, a place to be captured, a temple to be protected from impurities. I suppose that science is admitted, that it is acquired, known, I suppose that science is a constitutive element of our subjectivities.<sup>1</sup>

Tema  
RUM FÖR KULTUR

*This paper takes technology as the starting point for an aesthetic reflection. The technological object has transformed the cohesion of the metropolitan environment. This, in turn, calls for people to entertain different sorts of affective transactions with their surroundings. What could these be? How might architecture support and enhance them?*



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New world of objects, new subjectivities, and also the need for renewing our aesthetic practices and theories suggests Serres, in *The Five Senses, Philosophy of the Mixed Bodies*.

I should also mention André Leroi Gourhan, Gilbert Simondon, Gilles Deleuze and Félix Guattari who follow a similar route, proceeding from the technological, through the collective and the individual, and towards aesthetics.

“Planet earth” – says Guattari in *Les trois écologies* –

is undergoing a period of intense techno-scientific transformations which give rise to ecological disequilibrium that could potentially jeopardize the presence of life upon its surface. In parallel to these transformations, human lifestyles – be them collective or individual – are progressively deteriorating. Family ties are reduced to a minimum, domestic life is invaded by the mass-media, the relations inside couples and families are often ossified into standardized behaviors, the relations amongst neighbors are reduced to the poorest possible form of expression. It is the relationship of the subject with what is exterior to himself/herself that is being compromised, through a general movement of implosion, and of regressive infantilism. Alterity is losing all of its asperity.<sup>2</sup>

Guattari interpellates the creative disciplines – psychoanalysis, institutional analysis, film, poetry, literature, pedagogy, urbanism and architecture – asking them to reorient their practices along a “New Aesthetic Paradigm”, meant to reinstate a thicker, richer and more constructive attuning between individuals and their milieu. He is most explicit about the central role that art could play in the realignment of the subjective and the objective realms in his recent book *Chaosmose*:

It is in the forest of art that we can find the most consequential kernels of resistance against the erosion and the flattening that capitalism impinges upon our subjective lives. Art can best resist unidimensionality, the generalization of equivalencies, segregation, ignorance of any true form of alterity. I am not saying that we should see artists as the new heroes of a revolution to come, or as the only moving forces of history! Art does not only come from those who declare themselves artists. It stems out of the creative practices developed across many generations of oppressed peoples, in ghettos, and amongst minorities... I simply mean to say that this Aesthetic Paradigm is meant to support and to cultivate new forms of perception and of affectivity, and that our liberation and emancipation will best proceed directly through these. I want to propose than an affective Paradigm, be pursued, as an alternative to the scientific paradigm upon which historical materialism and Freudism were anchored.<sup>3</sup>



Architects could contribute to the development of this Aesthetic Paradigm by thinking how a building, or an urban space can encourage a positive, and sustainable attuning between people and their milieu.

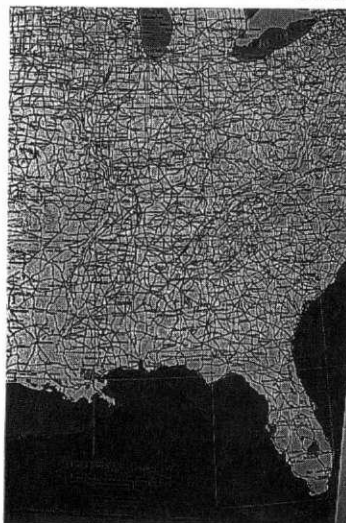
Most often, this attuning is reached without our even thinking of it, without our writing theories about it. Here is the simplest of examples: A person, broom in hand, steps, circles, and sweeps. The circling strikes an allure, the allure leads to a rhythm. From the rhythm there arises a tune, that attunes the sweeper to the sweeping, and to all that which is swept. Soon enough, it all functions as one: all contingencies are moved by a single sense of collusion, into a single, uninterrupted engagement, that makes full use of both the subjective and objective dimensions of the milieu.

Rhythm and melody are the aesthetic dimensions of the milieu: Guattari would have called them a “block of sensations”. They allow the sweeper to cut across the milieu’s many, heteroclitic dimensions with the single, integrative jest of a rhythm, and a melody. It allows the sweeper to inflect every single one of these dimensions, and to group them all back upon the single keystone of a truly felt, well-integrated, personal emotion. Rhythm and melody transcribe the sort of agency that allows the intermingling of the tools, movements, territory and people to effectively “function as one”.

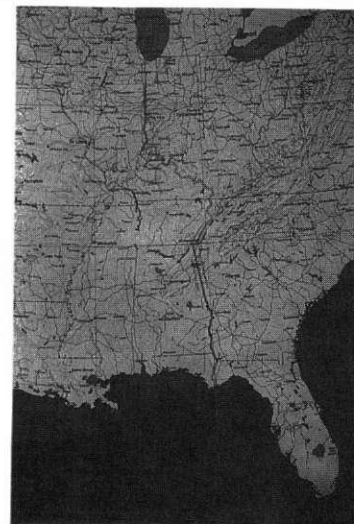
The sweeper’s milieu felt like a huge piece of felt: its aesthetic moment was an even, uninterrupted and unproblematic continuum. The contemporary milieu, stranded by networks, has become an amass of crisp stems. Riddled by so many thin, partial codes, it feels like a resilient weave of hardwires, upon which we can but gain a slippery grip.

How are we to circle the immensely vaster circles of our technology-based, global environment? The rhythm, here, is metered by

Urban highways<sup>4</sup>



Major Highways systems (1966)



Major Rail Network (1966)



Crude Oil and Products Pipelines (1966)



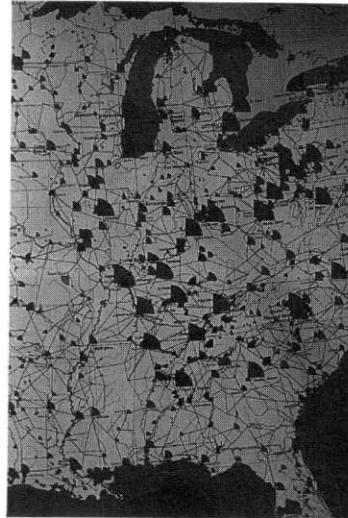
Natural Gas Pipelines (1967)

metrologies. Measure units align themselves along the immense, regular weave of the Mercator grid or after some other, international convention. Upon the many beats of all these units of distance, temperature, altitude, speed, pressure, frequency, our high-strung networks unravel. There are carefully delineated rights of way for satellites, for airplanes, and ships. There are wires, in the thick of which electrons move rapidly, affording for the transmission of signals and power. There are jealously guarded frequencies, in boundless fields of electromagnetic radiations. Wires, waves, projectiles, messages multiply, and insert themselves along one another, adding

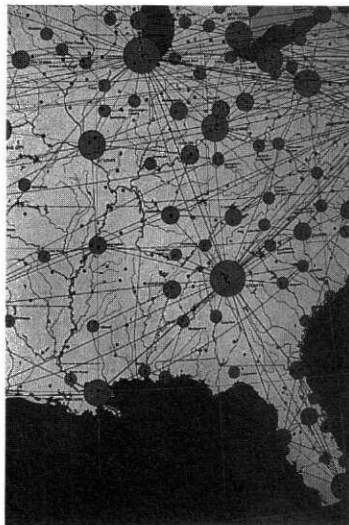
Descriptions<sup>5</sup>



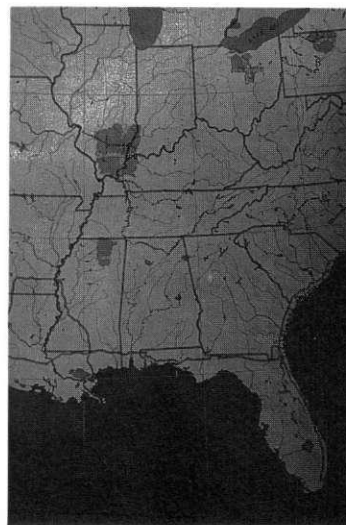
Standard Metropolitan Statistical Areas with Changes (1960-1967)



Power Generation and Transmission (1968)



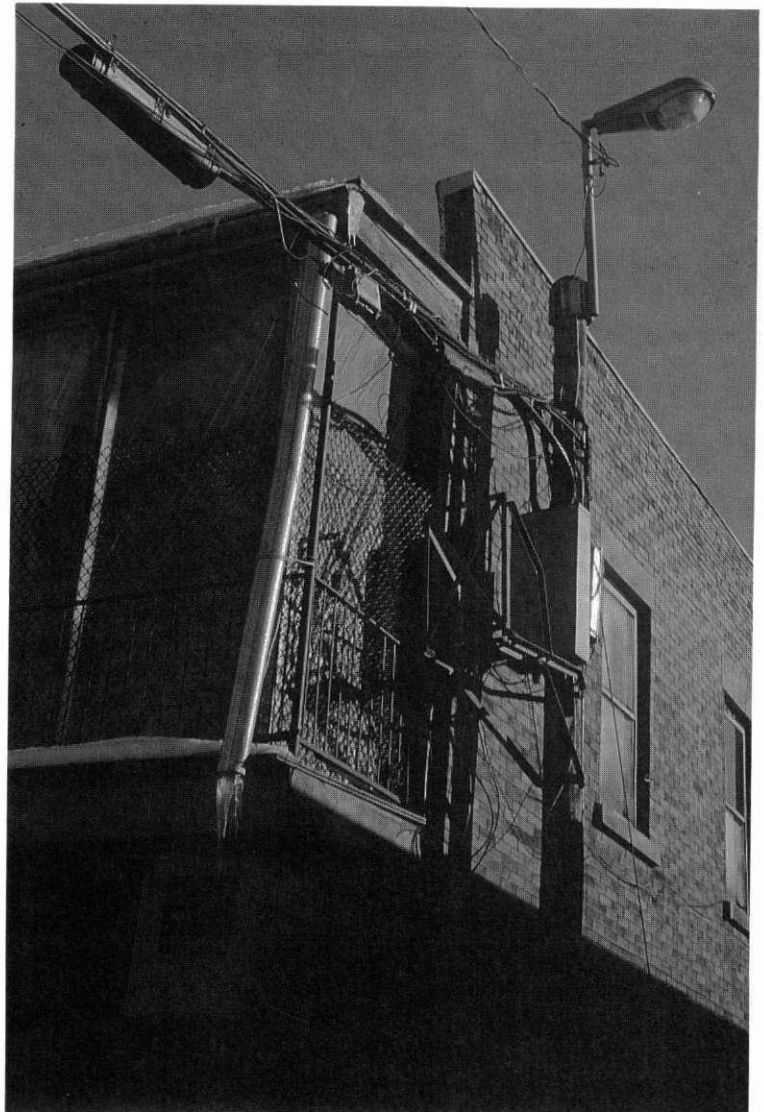
Airflight and Facilities (1965)



Horizontal Control Points (1968)

up to nothing but slippery series of self-regulated fields of numbers and vectors.

These so many figures, in turn, blindly slide upon a dumbfound, neutralized ground plane. So we hop, from telephone number to address, from credit card number to license plate number, driver's license number and numbered highway route, from the semaphores of the airport, to a passport number, a gate and then seat number, down to a hotel room number, along the reassuring lines of time and date, thanks to a number-based token of exchange, capable of cutting across this many-layered world.



These systems of addresses colonize the more immediate, local scale of our life worlds. Zip codes, systems of land division for census, for policing, for politicking, zoning laws, rights of way, property division lines, driving laws, highway semaphores, are so many autotelic layers to our stratified metropolitan world.

Highways unravel their long, sinuous ribbons of concrete and asphalt amidst the other, strict, narrow, tight weave of the gridiron. Tucked into the weave of the streets, there lays the weave of property lines, the rhythm of façades, with their own, structural framework's rhythm, sometimes supple and understated, sometimes rigid, as rigid as the gridiron. In places, it cracks up, making way to loose fields of speculation, cheap and lonely sheds, or yet another network: two continuous, parallel lines of lustrous metal, clamped upon a staccato of



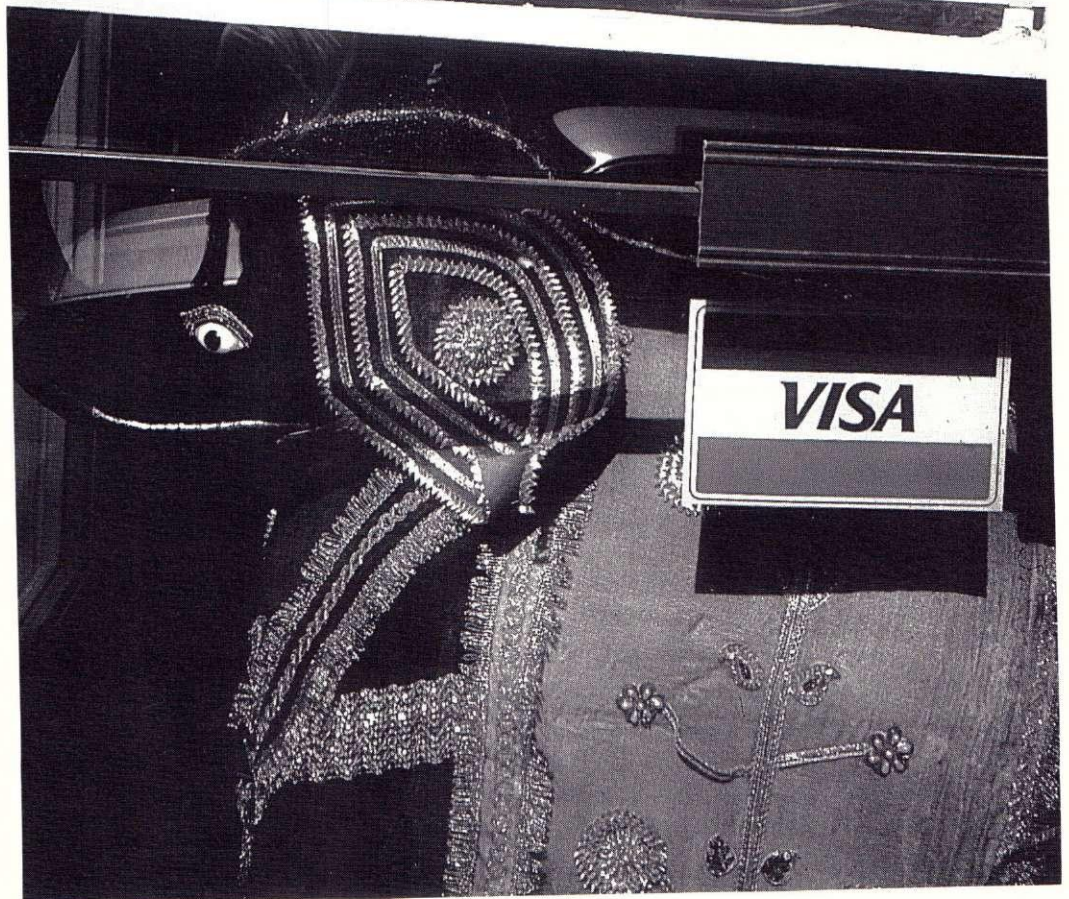
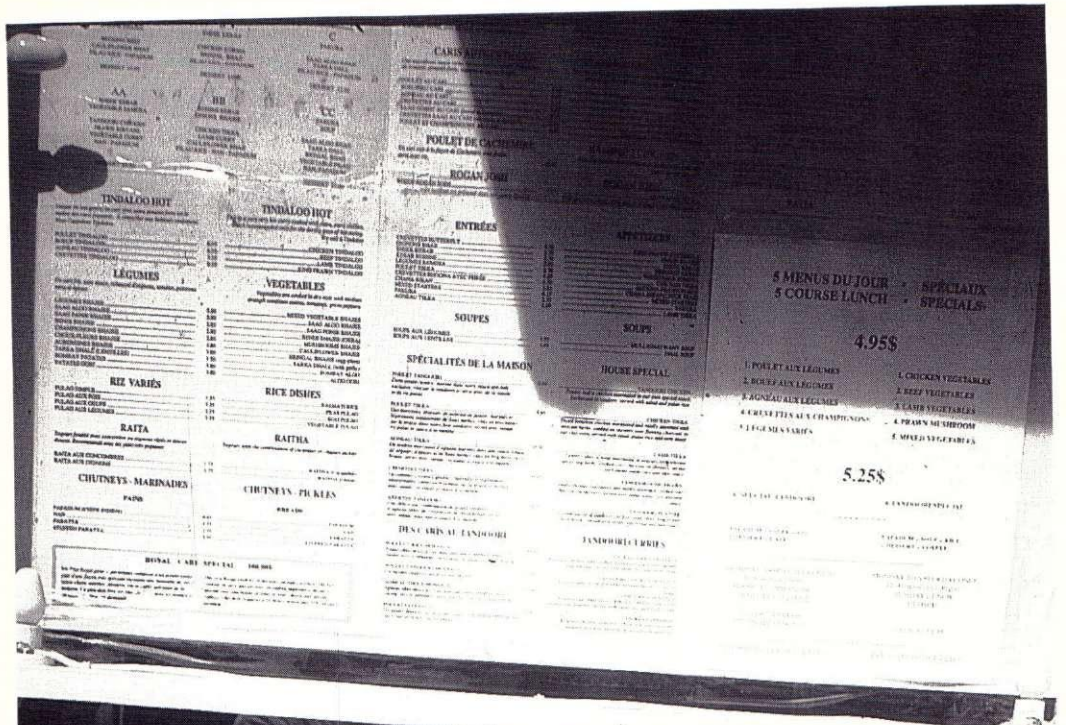
small, scruffy wooden beams. Like all the others, it rigidly clings to its own, internally-defined standards of maximum slope, maximum curve, typical sections. Hollow cylinders, wires for communication, water and power distribution systems, sewage collection networks are laid over, under one another, but always sliding past one another, like fishes in a stream.

They relate back to one another thanks to the many threads of the men-holes, the taps, television receptors, antennas, plugs, loading docks, bus stops, subway entrances.

Further on, the landscape is dotted by many discrete series of ever-same, mass-produced objects. Street lamps, direction signs, stop signs, traffic lights, parking meters, standardized public benches regularly sprout along the sidewalks. Publicity signs flourish along highways. Graffiti are sprinkled upon the factory walls, along railways.

Like so many more a-contextual vignettes mass-produced objects are constantly sent across the landscape. There are series of nuts, series of bolts, series of screw-drivers, made compatible with one another thanks to the careful maintenance of certain dimensional standards. There are cladding systems, structural systems, plumbing systems. Most often, these are merely clipped atop one another, affording for a peculiar quality of detailing: crisp, and segmented.

The accompanying photographs illustrate a few of the details that tend to arise, when the source of available materials is but a complex enmeshment of a few networks of mass-production.







This reticular sort of detailing is no longer relegated to the industrial buildings or the back-alleys. Unrelated modules, building materials, and media are set atop one another on all sides, and at all scales of the building, to such an extent that “unity” amounts, nowadays, to little more than the ‘intersection’ of many delocalized and self-explanatory systems of signs and of objects. There they remain, an amass and not a block, not a space, not a place.

As they insert themselves into our domestic environment, the endless trickles of the ever-same objects, the boundless webs of metal and concrete, the charts, grids and measure units deploy a particular, uncompromising “presence” that all too often reads as an absence – a neurotic retrieval into the generic and abstract, the delocalized, the safe, self-referential standards, and logical skeletons. Everything that is local and specific is negated by these global, generic objects.

This, for Simondon, is the central challenge raised by the technological object.

The availability of the technical object consist in its being liberated from its servitude to the background of the world. With technique it is necessary that the whole of reality be addressed, and traversed. All the while it is necessary that the technical object be detached from the world, and be applicable at any point, and at any moment. (...) It is an object of mediation between people and their world, but it is the first object that is detached from both the one and the other.<sup>6</sup>

This detachment will, in turn, raise problems as for our affective appropriation of the landscape. How are we, now, to cut across it with the single jest of a situated, and properly aesthetic moment? It demands much more than an uncompromising surrender or a turning back from the technical. It calls for moving beyond the wholesale acceptance of a cheap “heterogeneity”, and all the while it closes off the dream of our immediate grasping of a unitary, homogeneous sense of cohesion. Within these limits that is, between unity and fragmentation, there may still lay a host of strategies for gathering the aesthetic moment, and many alternative strategies for identity formation, against the rugged edges of our everyday world.

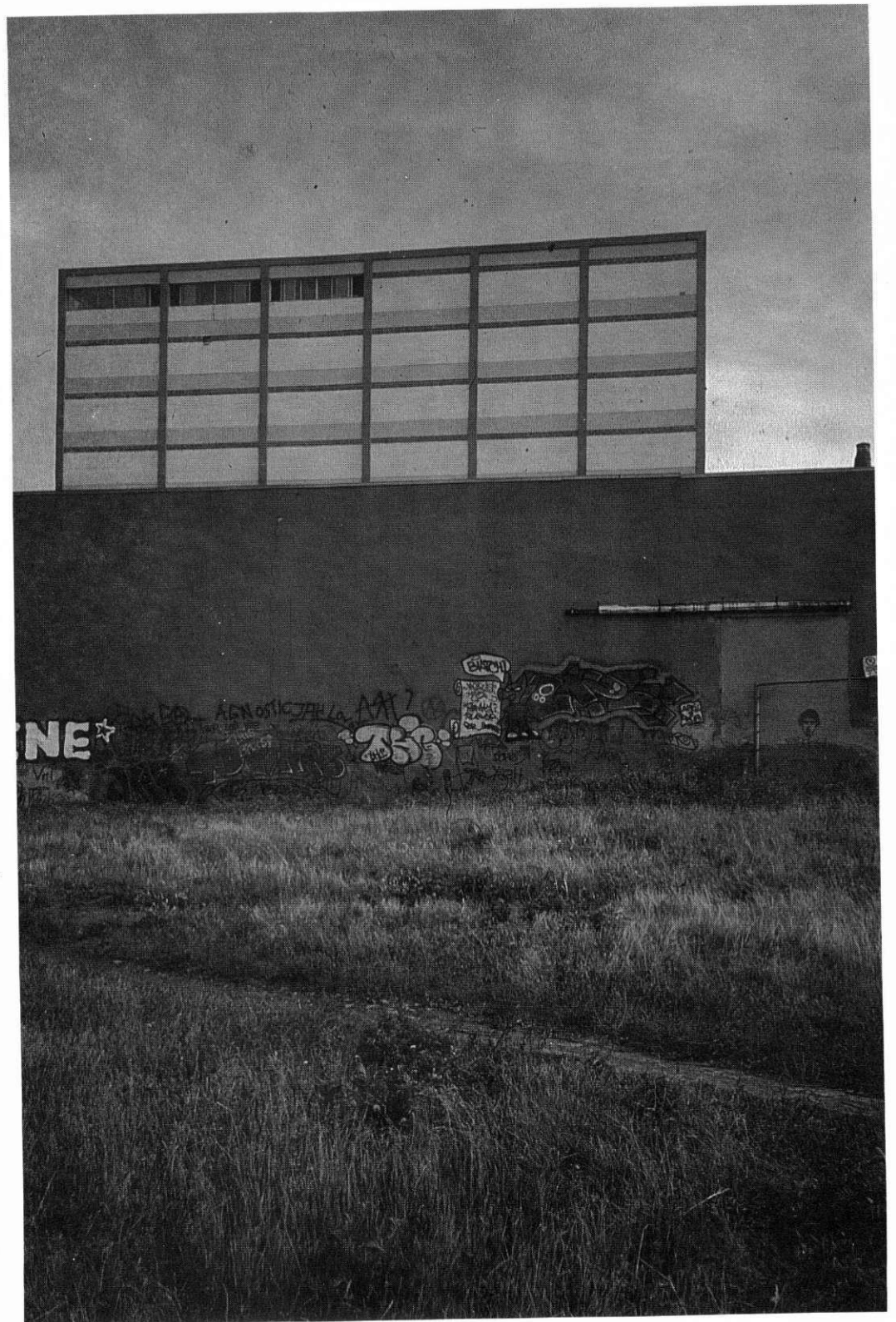
A peculiar beauty sometimes arises out of the very hybrid character of urban spaces. The train tracks, on and by themselves, are a lean, clean, controlled functional unit and yet: little holes are pierced into the fences. Footsteps, a little bit crooked, run across the tracks. Moody graffiti expand upon the blind walls. All of these things are flat, detached and yet they somehow add up, and interesting spaces can be created.

If not a singular, flat spatial geometry, this overlay of figures provides for a stimulating gymnastics of apperception, that runs across many different tunes, from the mute and abstract railway line to the talkative, teasing graffiti; from the disheveled stems of wild grass to the orderly pattern of a brick wall.





Turning the corner of Casse-Croute Belgo, one is struck by a similar, enticing sort of eclecticism. Casse-Croute Belgo is a building, an articulated block. Towards Beaubien Street it has a front, marked by a canopy, a sign, a big window. Towards the sky it has a roof. On the side, there should be very little, just a humble and quiet wall. And yet: it has a disproportionate, blaring lining of red paint crossed by a conspicuous white arabesque: we know that logo by hearth. It has a matte, metallic ventilation channel, and all of this brings a lot of materials, a lot of volumetric articulation, a lot of colors to what should have been the quiet, secondary side of the building. The ventilation system and the Coca Cola sign are just stamped upon the building, they contradict its logic. Still, they don't make a disturbing sort of contradiction, on the contrary they provoke a very interesting sort of resonance around the structure. As the Coca Cola sign brings side and front on a more equal footing with one another, as the brick motif pierces through the peeling paint a fragile equipoise between collaboration and contradiction develops upon the building, superseding the detachment of its many constituent parts and motivating a more complex, and potentially richer reading of the ensemble.



If properly understood and properly managed the intermingling of so many discrete strands can serve creators well. This particular expressive charge has long been harnessed by musicians and music theorists, since the use of polyphony and its subsequent developments into counterpoint and serial music.

Counterpoint, says the *Harvard Dictionary of Music*, involves the combination of two or more discrete melodic lines.

A melody must have coherence: its tones follow one another in a musically sensible way (...) This is not to say that every melody used in counterpoint must be as memorable as a song, but it must be perceptible as a continuity, not just as a succession of isolated tones. So too, melodies relate to each other in counterpoint, with the result that a perceptual balance is struck between the individuality of the lines and their combination; the ear's attention will ideally be focused now on one line, now on the other, and simultaneously on both.<sup>7</sup>

It demands that the beholder successively engage, and then let go of one musical line after another, flickering, as if it were, from line to line. Through the movement from line to line, a unique musical space is sensed. It could either be a tense space, evolving from the collation of drastically different lines, or a relaxed one, as when kin lines nestle against one another. Soon enough, tension and relaxation can become a concern that guides the making and the placement of these lines against one another, and that works towards the development of some form of a "pump" effect, from tension to relaxation, to impinge a sense of movement to the composition. We should understand this space in terms of an intensity of differences or else, in terms of the extent of the leaps that need to be performed, when we hop from one reference to another.

This compositional logic has also long been exploited by architects. Baroque architecture champions in the harnessing of tense spaces that engage the visitor into a movement of spatial discovery. Michelangelo's famous staircase crowds the vestibule of the Laurentian library. It is almost impertinent, but it nevertheless entices the visitor to proceed towards a vaster space in relation to which the scale of the staircase finally "makes sense". Yet every time a "line" entices and takes the beholder, another one emerges, or comes back to unsettle and displace the satisfied attention towards yet another goal, forming an ever-gaping, ever-wanting procession, always keeping the visitor at the mercy of a new desire.

Counterpoint operates after the sliding of line upon line, and it capitalizes upon the loading and the down-loading of the relationships from line to line. It demands that the beholder be attached not to the lines, but to the to-and-fro movement between the lines. The beholder can but constantly, restlessly hop from one element to the next.

A beholder has to be much more active, then, he or she is always on the look-out for something new to come and tip the balance of the composition. One has a more open, and a more mobile engagement with the world around himself or herself, he or she flickers, as if listening to counterpoint. Simondon called this engagement between subject and object “transduction”<sup>8</sup>. It lays, first and foremost, in a subjective availability that constantly rejects closure, that resists from being enrolled by the despotic spell of any single-minded strand of semaphores, that volunteers to weave a sense of totality across these many regimes, and that accepts to constantly actualize and re-actualize this sense of totality.

What Simondon proposes, then, is to use our very landscape of neurotic and single-minded networks as a point of departure – as the raw materials – for the development of an aesthetics of the engaging and of the complex. Of the frustrated will for the plenitude of unity, he makes a driving force for spatial engagement, an active agent for identity construction, and a motivation towards an open-ended collective cohesion.

Transduction is consequential with the technological. It should be sustainable, it could even be emancipatory, but for the time being, it still is a very tentative idea that needs to be explored further by practicing architects. We can’t assume that this aesthetic strategy will work, and restore a more positive engagement between people and their world because transduction involves the most fragile form of equipoise between subject and object.

Yet – and this is the reason why Guattari so insists upon our undertaking of the aesthetic paradigm – it may be the only form of availability that still holds promises, at all levels of personal self-realization, collective emancipation, and ecological viability in a political context where inter-determinations have grown to be so entwined, and so explosive.

The neighborhood where these photographs were taken is called La Petite Patrie. A census made in 1987 showed that 92% of the population did not know the name of their own neighborhood which, ironically, translates in English as “The Small Homeland”. “Home”, for most residents, is elsewhere. Thirty different tongues are spoken in a single square mile, and there are six major strands of ethnic affiliation: Italian, Central-American, Middle-Eastern, Vietnamese/Laotian, Haitian, and French Canadian.

It is not uncommon to find, tucked by one another, a Salvadorian Pupuseria (specialty restaurant), an Afghan rug merchant, an Italian salesman of baroque bedroom furniture, and a French-Canadian convenience store. In the neutral matrix of the industrial buildings self-conscious loft-dwellers cohabit with anonymous aliens working in sweatshops. Topless bars are transformed into highbrow dancing clubs for the blasé to meet the wanting. Elsewhere, long



established pubs carefully cultivate the homogeneous, now introverted clientele of the long-established residents.

The restlessness of the cosmopolitan bar-goers, intent to mingle with anyone at any price for the sole sake of newness and difference, rejoin the caustic disposition of those who bitterly sip a beer, resentful of these too many foreigners, and these too many changes that recently shook the metropolitan landscape: both attitudes stand witness of a same, contemporary “mal de vivre”. Could architecture heal it?

In this article I suggested that people’s difficulties to relate back to their milieu does have something to do with the nature of the objects to be found in this milieu. Technological objects radically altered the cohesion of our everyday milieu, and we have no choice but to take these objects on board, try to see how we can satisfactorily relate back to a technology-ridden world, and explore ways in which architectural design could support, and even enhance this new relationship. In my view Simondon’s notion of transduction seems like a promising way out of today’s “mal de vivre”, as well as a responsible and potentially rich avenue for design explorations.

The photograph on page 11 is taken from *Leonardo Benevolo, The History of the City*, MIT Press, Cambridge 1980, p. 840. Photographs on pp. 8, 14–23 are from the author.

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## Notes

1. Michel Serres, *Les Cinq Sens*, Grasset et Fasquelle, Paris 1985 (my translation).
2. Félix Guattari, *Les trois écologies*, Galilée, Paris 1989, pp. 11–12, (my translation).
3. Félix Guattari, *Chaosmose*, Galilée, Paris, 1992, pp. 126–127, (my translation).
4. The plans from *The National Atlas of the United States of America*, US Department of the Interior Geological Survey, Washington DC, 1970.
5. *Ibidem*.
6. Gilbert Simondon, *Le Mode d'Existence des objet techniques*, Aubier, Paris 1958, (my translation).
7. Don Randell (ed.), *Harvard Dictionary of Music*, Harvard University Press, Cambridge MA, 1986, p. 205.
8. In Louise Levac, "Perception et identité dans les quartiers de Montréal: le cas de La Petite Patrie", in the collective work *Montréal, tableaux d'un espace en transformation*, Association Canadienne Française pour l'avancement des sciences, Montréal, 1972.