**Resisting the Reign of Technocracy
the [re]turn towards civic space**

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Abstract

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Our technological way of being conditions and transforms all cultural practices. It is our predominant mode of seeing, thinking, and making the world, politically and architecturally. The investigation of technology reveals a bias in contemporary society towards the virtual, objective, rational, and efficiency driven imperatives of technocracy. Although no longer the dominant medium of communication and politics, architecture still has a latent capacity to shape our everyday life and to engendering social and political practices. This thesis seeks to reassert architecture's role in social production by uncovering the ontological and epistemological roots underpinning the technocratic architectural practice and proposing an alternative.

The design element of this thesis is the renovation of the Government Conference Center housed in the old Union Station building in Ottawa, a site that has transformed several times over in the brief history of the city in response to technological change. This thesis does not consider architecture primarily as form: an artifact or object inserted on a site; but as space: an intervention in the continuity of the urban fabric.

The project is informed by the political nature of the program, the historical value and narrative of the building artifact, the civic potential of the site, and the new political structure conditioned by contemporary values and technological mediation, all of which come together to produce or construct the meaning of the space.

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Preface

“Strive constantly to serve the welfare of the world; by devotion to selfless work one attains the supreme goal of life.”

*Lord Krishna, Bhagvat Gita (3:19)*¹

This thesis began with my personal apprehensions about society's unwavering faith in technology and how it could potentially be compromising our lifeworld and particularly, as an architecture student, in the way that we build. The exploration lead me deeper into notions of essence, ontology, and epistemology, uncovering frameworks that suggest that technology is not itself the driving force of our social transformation but that it is the manifestation of our own perceptions.

Alongside this enquiry was my search for meaning and meaningful architecture. Over the course of my education I found myself increasingly dissatisfied with the formalized notions of meaning in the contemporary discourse of architecture that is informed predominantly by art. Although the direction this thesis gives me does not offer an objective criteria for meaning in architecture, it has given me an appreciation for the formal and symbolic meanings and also given me an alternate path, one that is intersubjective, embodied and temporal... something to pursue further beyond the completion of my formal education.

¹ The Bhagavad Gita. Trans. Easwaran, Eknath. New York: Random Books, 2000. p.19

Introduction

“Technology is the medium of daily life in modern societies. Every major technical change reverberates at many levels, economic, political, religious, and cultural. Insofar as we continue to see the technical and the social as separate domains, important aspects of these dimensions of our existence will remain beyond our reach as a democratic society. The fate of democracy is therefore bound up with our understanding of technology.”

Andrew Feenberg (1999)¹

Architecture and urban planning in North America over the last century has failed to produce viable civic spaces that are necessary for enabling citizens politically in a healthy democracy. Rather, the built environment has increasingly isolated individuals from public life. Society is now faced by its own naïveté of having acquiesced social production to technological imperatives. There is an awakening taking shape that the human lifeworld² can and must act as a measure in determining its own construction. Whereas faith had once been placed in technology to liberate and revitalize society, contemporary studies of our technological extension reveal the primacy of the body and the embodied lifeworld and the urgency for civic space. The contemporary condition is one that is in the process of reassessing technology and its role in social production. In this reassessment, there is the promise of reassigning architecture with renewed significance and social purpose.

The first chapter examines technology as a way of being. Technology is no mere instrument but a way of life for it *mediates* every aspect of our lives and as such becomes an active agent in reforming our social and political sphere. The emergence of new technology redefines a society, creating new meanings for old terms and altogether new terms, and fundamentally reorganises how we relate to one another and to our environment. Technology “moulds us in what we are... in our actions and thoughts and imaginings”³ or in other words, it redefines how we perceive, what we imagine, and our range of potential actions.

Technological change is not a non negotiable force, the new meanings and forms must not

¹ Feenberg, Andrew. Questioning Technology. New York: Routledge. 1999. p.vii

³ Feenberg's discussion of the Husserl's notion of lifeworld is one that incorporates the interaction of individuals and social groups, be they families, neighbours, or communities, in generating a common understanding of meaning and identity, of social norms and values. The lifeworld is the communicative realm of social and cultural participation and production.

³ Grant, George. Technology and Empire. Toronto: House of Anansi.

necessarily be accepted as substantivist philosophers such as Heidegger warned. Recent discourse on the question of technology reveal that the direction of technological change can be shaped, subverted, and directed by the social sphere. Substantivist believe that technology has an indomitable essence to bias the social sphere and that as long as we employ technology, we are in servitude to the forms it generates. The term technology is generally confined to study and use of devices and the application of technical knowledge. However technology is not something outside of us but something that comes to be from the very way that we see the world and ourselves in it. Our technocratic ontology leaves the social sphere open to technology's bias.

The second chapter contrasts the democracy of the ancient Greek *polis* with the contemporary democratic nation state to illustrate the importance of the public sphere in politically enabling citizens within their society. In the *polis*, citizens inserted themselves directly into public life, in direct relationship with each other. This was an act that was essential to the constitution of the city state. Contemporary life, due to the demands of the scale of our society, is one that operates through systems and bureaucracies that governs interrelation. In contemporary society, the public sphere has shifted in part to technological mediums such as newsprint and television, enforcing unidirectional flows, placing those with control over the mediums in a privileged position and relieving those without control of the ability to assert themselves fully into political discourse. Over the course of the 20th century, citizens have found themselves increasingly isolated physically, socially, and politically through the combination of representative government, municipal and regional political boundaries, administrations and bureaucracies, and urban planning.

The technological upheaval of today is electronic communication and computer technology, centered on the Internet. Our everyday life is increasingly layered with digital communication and information networks. Mobile phones, pagers, the Internet, satellite television, ATM, hand held global positioning systems and the like, are the apparitions of this revolution that pervade our lives. The third chapter introduces the power challenge recent communication technology poses to the spatially institutionalised and technologically exercised structures of power and also to the relevance to political discourse. Foucault declared that "space is fundamental in any exercise of power,"⁴ meaning that politics is fundamentally a spatial practice. Contemporary technologies such as the Internet are breaking the physical boundaries of time and space, creating a new communicative sphere that is broadly referred to as Cyberspace. As these technologies gain immanence, they challenge older physically defined boundaries, identities, hierarchies, and every other political constituent.

The Network Society that is materializing in today's technological climate is one that favours a horizontal political structure. The technologically aided free flow of information creates a communicative sphere that circumvents the economical, structural and temporal restrictions that can be imposed by physical space. Even as technological mediation becomes increasingly exercised relative to traditional embodied interrelation, the digital age demonstrates the re-emergence of the body as socially and politically constructive necessity.

1969. p.15

⁴ Foucault, Michel. "Space, Power, Knowledge." Architectural Theory since 1968. Ed. K. Michael Hays.

The fourth chapter discusses the metaphor of a disembodied existence that the objective epistemology and ontology upon which technocracy is structured. This biases the way in which we engage each other and the world in an abstract, formal, and detached manner. A critique of this condition suggests an alternate way of being that returns the subjects centrality to the foundation of knowledge. Technocratic terms are found to be inconsistent in providing a suitable basis for the social sciences or for accounting for actual events. These inconsistencies make way for the reinstatement of the body, experience, and perception in establishing the terms of knowledge and meaning in our lives.

The final chapter of this section reflects on architectural practice and the dystopias of the 20th century that beckon an end to formalism in architectural practice and urban planning. The technocratic ideology underlying the architecture in the 20th century gave primacy to static objective space over experienced subjective space, favouring the abstract world of idea and synthetic knowledge over the perceptual world of the body and the distinction between the two. The failure of Modernism did not refocus architectural discourse on the embodied construction of meaning and social and political. Instead, it led to a resignation from social purpose in favour of a superficial discourse on the meaning and the deconstruction of meaning of form. The re-emergence of the body as the basis of social and political construction spells an end to a self-referential architecture and introduces the means to recover an architecture that refers to mankind, an architecture that gives primacy to *lived* space.

The built environment frames our everyday lives. It embodies the range of possibilities of social practices by enabling certain practices and power relations while disabling others. Architecture is a socially productive agent. As the body is the source and the contested terrain of politics, architecture's role in framing the embodied experiences of our everyday lives must be considered fundamentally as a political act.

In reshaping the social sphere, technological change continuously challenges architecture to remain relevant within the changing social sphere. The challenge and opportunity posed to architecture by technology is not simply that of accounting for technological change in the design of the built environment. This approach, which has long been encouraged by society's predominant technologically deterministic attitude, identifies *what* changes have been brought upon by technology in our practices and enthusiastically incorporates them into the built environment. The meaningful revelation is *how* the new technology transforms old practices or creates entirely new ones, how it reshapes our political sphere and as a result how it defines us.⁵ A critical architecture must be one that is simultaneously wary of the dominating tendency of technological determinism and informed by a reassessment of how and to what end technological change has redefined the social sphere to enable the positive aspects and subvert the negative ones. The built environment must be made to embody the aspirations of the social sphere and engender the appropriate opportunities of political relationships and resistance.

Cambridge, Mass.: MIT P. 1998. p. 437

⁵ McLuhan, Marshall. Understanding Media: the Extensions of Man. Scarborough, On.: Mentor. 1964. p.10.

McLuhan states that any child could list the given effects technology has on social practice; it is the understanding of these effects that would open

Technology

Technological Determinism

Technology – (noun)

- The body of knowledge available to a society that is of use in fashioning implements, practicing manual arts and skills, and extracting or collecting materials.
- The scientific method and material used to achieve a commercial or industrial objective

The American Heritage Dictionary on www.dictionary.com (2003)

Man the tool user/maker has been a powerful anthropological distinction that separates humans from the rest of the animal kingdom. Our ability to fashion tools has long been considered unique, and instrumental in our survival as a species. In the beginning technology facilitated tasks for our survival, then the development of complex societies, and eventually our domination of the planet. Technology has always been an integral aspect of human existence.

Over time, there has been a shift in how we view our relationship with technology and in the technology we employ. Until modern time there was never any question of the role of tools or instruments in society. Instruments had direct uses, either to facilitate physical action or carry symbolic meaning in the social or political sphere. It was not considered that tools might shape culture; rather, the culture dictated how technology was developed or used.¹

¹ Postman, Neil. Technopoly: the Surrender of Culture to Technology. New York: Knopf. 1992. p.23

²Feenberg. p.2

³Grant. p.27

⁴Ibid. p.28

The coming of the modern age challenged this belief. The developments leading up to the 19th century favoured reason and natural science over theology. There emerged a profound belief in objectivity, efficiency, and progress. As Francis Bacon had suggested, science and reason would be the tools to feed invention for the betterment of human life. Karl Marx's suggestion that society is developing towards a set end and Darwin's theory of evolution entrenched the notion of progress in the minds of the West and fermented the notions of technological determinism. Technology was seen as an autonomous force assumed to serve our biological and social evolutionary ends. Thus it was still thought of as a neutral thing since it did not change the natural ends but simply facilitated them.²

An unquestioning trust in technology was identified as the vehicle for, on its identification with the liberation of mankind.³ In the writings of George Grant, we see the realization of Bacon's vision and the Marxist and Darwinian confirmation:

"Man has at last come of age in the evolutionary process, has taken his fates in his own hands and is freeing himself for happiness against the old necessities of hunger and disease and overwork, and consequent oppressions and repressions. The conditions of nature ... are now at last being understood so they can serve our freedom."

George Grant (1969)⁴

Technological determinism is founded on the beliefs that the technical demands of the social sphere determine the path of technological development and that this path is predicated by the pursuit of efficiency.⁵ Determinism is infused with the Hegelian view of history, social evolution, and progress. A backward glance on technological change affirms an illusion of unilinear progress that is “proceeding from lower to higher levels of technological development.”⁶ Establishing technology as a means to a historic end, Determinism does not have issue with conforming social institutions and practices to technological imperatives. It views these imperatives and social progress as one and same.

⁵ Feenberg. p.77

⁶ Ibid.

Substantivism

⁷ Heidegger, Martin. "The Question Concerning Technology." Basic Writings. Ed.: David Krell. San Francisco: HarperCollins. 1993. p.319

⁸ Ibid.

⁹ Alderman, Harold. "Heidegger's Critique of Science and Technology." Heidegger and Modern Philosophy. Ed. Micheal Murray. New Haven: Yale U P. 1978. p. 46-48.

Substantivists observed that modern technology has a bias and that this bias is nonnegotiable as it is the essence of technology. They warned that our faith in technology was the surrender of culture and that by accepting it into our lives we had unequivocally accepted all of the benefits and the losses. In doing so they introduced technology to the discourse of politics and social production.

Heidegger describes the emergence of modern technology as a break from the past in his seminal essay "The Question Concerning Technology". In his search for the essence of modern technology, he describes how technology is associated with a "*revealing*".⁷ As a *mode of revealing*, technology is a controlling force that even the maker cannot escape. Whereas premodern technology was a revealing or *bringing-forth*, a deference to nature, modern technology is one of *challenging* nature. The break is that modern technology "is based on modern physics as an exact science".⁸ Modern technology is one of unlocking, transforming, storing and distributing. By applying science, technology is able to subordinate everything it touches into a standing reserve, including Man, its maker. Heidegger's argument shows that the essence of modern technology, in establishing the standing reserve, is the making of meaning. For example, the technical expertise of an engineer redefines a mountain into a minable ore body, a river into a power generator, while economics and business administration redefines people as consumers and human resource.⁹ Contemporary examples such as organ transplant, xenotransplant, and plastic surgery challenge the unity of the human body as "self" as body parts become replaceable

and retraceable, in the case plastic surgery, as a means to something as trivial as fashion. ¹⁰ Feenberg. p.2
Surgery extends the human body into the realm of fashion accessorization and stem cell research promises the possibility of redefining human tissue as an organ farm.

Both technological determinism and substantivism hold technology as an autonomous force. But unlike the modernist view that is predicated on the betterment of human life, substantivism holds technology is out of human control and has a trajectory of domination. This bias is explicit in what substantivism believes to be the essence of modern technology: rationality and the drive for efficiency. In a sense, this is a reversal of the view held by modernists. This belief questions whether it was not science and technology that caused us to have these values to begin with.

“The tools we use shape our way of life in modern societies where technique has become all pervasive. In this situation, means and ends cannot be separated. How we do things determines who and what we are. Technological development transforms what it is to be human.”

Andrew Feenberg (1999)¹⁰

Technology establishes the conditions for an accounting of the practices and perceptions of everyday existence in the language metaphors, and in the sign and symbol relations from which we construct meaning.

In the act of revealing, technology isolates that which is unknown, which defines our limits, and makes it known. Once the foreign becomes common, once we have become sufficiently familiar with the new known, the limits of our perception, understanding, and imagination are expanded and therefore an expansion in the field of possibilities occurs. The discovery of gravity and being able to explain it mathematically allows us to imagine and understand projectile motion, the idea of a gravity-free environment, and the possibility for space travel. The technology of the automobile gave us a new understanding of time and space. By making it possible to commute greater distances, it extended our understanding of urbanity, creating new possibilities in how we dwell and how we structure our societies. Similarly the Internet is in the process of redefining our environment, the conditions of our everyday that establish the limits of possibilities of communication in our lives. By redefining how we can imagine, our way of understanding, and our realm of possible actions, technology alters our perceptions, our lifeworld and what it means to be human.

Communication Technology and the Public Sphere

“‘The medium is the message’ means, in terms of the electronic age, that a totally new environment has been created.”

*Marshall McLuhan (1964: 8)*¹¹

In his seminal work, *Understanding Media*, Marshall McLuhan noted that technology shapes social and political practice. His now ubiquitous statement, “the medium is the message” infers that changes in technology create new environments, the changes expressing themselves in a change in the scale and nature of relationships.¹² *Medium* refers to the new technologies and environments while *message* refers to the personal and social consequences of the medium.¹³

¹¹ McLuhan. p.8

¹² McLuhan. p.9

¹³ Ibid. p.23

McLuhan is careful to discuss the medium in terms of scale, although the result of new scales can affect the spatial relationships. For example, the medium of the railroad transformed the spatial relationship of the city and the country. Communities along the railway line were privileged with closer ties to the city whereas equally distant communities excluded from the rail infrastructure were suddenly farther due to the new scale. Their exclusion from the new medium made them less privileged than before and pushed them towards irrelevance while the communities along the railway lines prospered. The restructuring of spatial relationships is one of the consequences of the new medium.

¹⁴ Burnett, Robert and P. David Marshall. Web Theory. London: Routledge. 2003. p.18

¹⁵ Benjamin, Walter. "Art in the Age of Mechanical Reproduction." (1936). Illuminations. New York: Schocken Books. 1969. p.221.

Benjamin asserted that art held an aura of authenticity that was wielded by the elite to hold influence over the masses (1969: 221). His hope was that mechanical reproduction would cause art to become a mass media, more accessible and to the public, thus generate a more politically critical and empowered population.

¹⁶ Spigel, Lynn. "The Suburban Home Companion: Television and the Neighbourhood Ideal in Postwar America." Sexuality and Space. Ed. Beatriz Colomina. New York: Princeton Architectural P, 1992. p.191

¹⁷ Spigel, Lynn. p.192-193

¹⁸ Feenberg, Andrew. p.178

McLuhan coined the term *global village* to describe the society mediated by electronic communication technologies, expecting that the medium would allow for an interconnectedness that would permit information to flow freely around the world.¹⁴ But unlike a village, in which all participants have the ability to exert themselves into the communicative sphere, the one-to-many medium of television placed the control over content in the hands of a minority with wealth and power. With control in the hands of the elite, television maintained the *aura* of authenticity.¹⁵

The political implication of electronic communication was that the television became "an instrument of social sanitization."¹⁶ As a tool to insulate people from heterogeneity in society, broadcasting effectively "purified the essence of an 'American' experience, relegating social and ideological differences to a kind of programming ghetto."¹⁷ With the content muting any cultural or political differences in the process of misrepresentation, the television effectively reconstructed a uniform idea of the public identity and infused it into the perception of the masses.

Habermas argued that the public sphere, a space of dissemination of information and of rational discussion and debate amongst the citizenry, is an essential element to keeping the institutions of government in check. In his study of the public sphere, Habermas differentiates between *lifeworld* and *system*.¹⁸ The lifeworld, to which the public sphere belongs, is the realm of communication, family, and social and cultural practices. The system refers to the economy, and the institutions, administrations and bureaucracies that mediate our lives. In *The Structural Transformation of the Public Sphere*, Habermas

warned that society was threatened by the encroachment of systemic imperatives upon the lifeworld, thus compromising democracy.¹⁹

In other words, the systemization of the lifeworld compromises the public sphere. Differing values and goals are buried under the automation of the lifeworld, removing agency from communicative action and debate. Paolo Carpignano *et al.* write that public “is no longer the result of a spontaneous circulation of social messages. The public becomes an objective, it has to be produced.”²⁰ Government agencies, corporations and other institutions do not use the authority of the media technology for accessing the public opinion but to create it with propaganda, advertising and selective information. Being removed from any discursive sphere, private citizens fail to realize a public life necessary to maintain democracy.

¹⁹ Ibid. p.143

²⁰ Carpignano, Paulo et al. “Chatter in the Age of Electronic Reproduction: Talk Television and the Public Mind.” The Phantom Public Sphere. Ed. Bruce Robins. Minneapolis: University of Minnesota P, 1993. p.102

Technocracy

²¹ Feenberg. p.75

Technological determinism has developed into the ontology of *technocracy*, whereby authority is drawn from science, reason, and efficiency over tradition, law, or popular support. In the technocratic mode, public discourse is unnecessary for managing state affairs. Researchers and experts are the source of legitimacy with direct control over shaping the institutions, bureaucracies, and built environment that would define normative behaviour. Technocracy is congruent with the conditions Habermas described whereby the lifeworld is systematized and the public sphere and democracy compromised.

The language by which a technocratic society operates is not one that is informed by the notion of public participation and the social sphere, but by areas of technical expertise. It is the rhetoric of objectivity that puts social decisions in terms of engineering efficiency, scientific objectivity, and economic feasibility. Feenberg writes that “technocracy represents a generalization to society as a whole of the type of ‘neutral’ instrumental rationality supposed to characterize the technical sphere. It assumes the existence of technological imperatives that need only be recognized to guide management of society as a system.”²¹ Power is not in the hands of the voters but in technology. Public life is suppressed by the ontology of technocracy, and democracy is severely compromised.

It is not the essence of technology that is dominating society, but society’s uncritical approach to technology. Society’s adherence to the precepts of technological determinism is the bias by which technocracy is constituted.

The Collapse of Space and Time

Cyberspace. A consensual hallucination experienced daily by billions of legitimate operators, in every nation, by children being taught mathematical concepts... A graphic representation of data abstracted from the banks of every computer in the human system. Unthinkable complexity. Lines of light ranged in the nonspace of the mind, clusters and constellations of data.

*William Gibson (1984)*²²

As an instrument for technocracy's drive for efficiency, speed, and facility, technology pushes continuously to further compress time and space. With each wave of technological reform, society is increasingly rescaled to accommodate spatial remoteness with technologically mediated immediacy. This is observed most acutely by the array of technologies that constitute cyberspace.

The cyberspace of common parlance has been here for quite some time. Defined as the "juncture of digital information and human perception,"²³ the Internet and other information networks are cyberspace. Electronic banking, surfing the World Wide Web, and accessing touch tone operating systems are all conditions where "information seekers navigate layers of data stored [on a network of computers] and represented in [a] virtual space."²⁴

The internet was designed by the US military to reroute information through alternate nodes if one part of the network was destroyed in the case of war.²⁵ In the conceptual

²² Gibson, William. Neuromancer. New York: Ace Books. 1984. p.51

²³ Strate et al. "Surveying in the Electronic Landscape: an Introduction to Communication and Cyberspace." Communication and Cyberspace. Cresskill, NJ: Hampton P. 1997. p.2

²⁴ Ibid.

²⁵ Burnett and Marshall. p.11

²⁶ Aarseth, Espen J. Cybertext: Perspectives on Ergodic Literature. Baltimore, Maryland: John Hopkins P. 1997. p.6

structure of a net, every point is connected to every other point,²⁶ *making direction meaningless*. The speed at which information travels along the electrical and optical lines makes distances inconsequential. The protocol of packet switching was developed to use the fullest possible capacity of the Internet. Information is broken into small pieces which are routed through a multitude of paths as per availability and then reconstructed at the receiving end. The ability for information to be sent instantly from one point to another is equivalent to a collapse of time and space. The Internet is another step along society's technological imperatives of efficiency, speed, and facility, which compress time and space towards a unifying collapse.

The Polis and the Nation State

Politics

Human existence is a social existence. According to Aristotle, Man is by nature speaking and political. By political he meant a city dweller. *Politics* is rooted in the Greek word *politikos*, or pertaining to the *polis*, the ancient Greek city-state. Alone or in small tribes, humans lived at the mercy of natural forces. The ability to communicate, cooperate, and settle into permanent cities is the virtue of human nature by which our species is able to survive.

The Greek idea of *polis* does not refer simply to the physical form of a city. It is an institutionalized idea of unity that defined the life of ancient Greeks.¹ Tied strongly to the idea of the *polis* is the interrelation of citizens that binds them together as a community in time and in space. The *polis*, as a built form marks the geographical limits of inclusion in space. A transcendental unity binds the citizens together temporally in a common history and destiny. Were the physical city destroyed, the *polis* remains intact, embodied in its citizenry. The physical city can be rebuilt.²

The interrelationship of citizens is not frictionless. The arising conflicts of different citizens or groups of citizens are to be resolved with words and persuasion and not violence.³ Although in much of colloquial discourse on politics in a technocratic society, we are referring to the “guiding or influencing governmental policy, or of winning and holding control over a government,”⁴ a review of the ancient Greek society presents the less used but more radical definition of the “internally conflicting interrelationships among people in a society.”⁵

¹ Crowe, Norman. Nature and the Idea of the Man Made World. Cambridge, Mass.: MIT P. 1997. p.110

² Ibid p.112

³ Ibid P.111

⁴ Merriam-Webster 1997: 567

⁵ Dictionary.com

⁶ Hardt and Negri, Empire. Boston: Harvard U P. 2000. p.95

The contemporary nation state, like the ancient *polis*, is a framework for human life that is simultaneously physically immanent and transcendental in its composition. Whereas the *polis* was an embodied construction, the nation state is a virtual one. Both define interiority and exteriority in space by geographic boundaries. The limits of the *polis* were outlined physically by the limits of the city while the nation state's spatial boundaries exist virtually as associations to transcriptions on political maps. The *polis* was an embodied experience in which the citizens were unified by architecture and participation in public life. Similarly, the nation-state is "experienced as (or at least functions as if it were) a collective imagining, an active creation of the community of citizens."⁶

It is observed however that there is a differing idea and practice of politics in ancient Greece and contemporary society. Whereas the *polis* directly mediated politics through embodied participation in the public sphere, the public sphere of contemporary nation states is one that is mediated by technological extension such as print and television media, the Internet, bureaucracy, systemization, and representative government. This mediation biases systemic divergence in the notions of public and private, what it means to be a citizen, and political practice.

Public Sphere

"The public sphere is a place for communication, a place where people can speak, establish their presence, and assert their rights."

*Kathy Halbreich (1992)*⁷

The public sphere is of great importance, not only for communication and shared social existence, but also for the negotiation of personal public and private rights and responsibilities. Beginning with the idea of the public sphere in the ancient Greek political structure, Habermas states that the public sphere is "made up of private people gathered together as a public and articulating the needs of society with the state."⁸

The private sphere included commerce, family, and other social and cultural effects. Conflicting values or goals caused the private sphere to emerge into the public sphere. Conceptually, anything that took place in the public sphere, which was synonymous with the *polis*, could be seen and heard by all members of the community.⁹ The community was limited to a size that allowed the citizens to have knowledge and relations with one another, thus making the public life of any citizen visible to all. The public sphere consisted of the assembly of private citizens in a rational dialogue whose action of generating opinions, attitudes, and common action constituted the public. The formation of the public served to guide the affairs of the state and to legitimize the authority of democratic process.

⁷ Halbreich, Kathy. "Forward." Public Address: Kryztof Wodiczko. Minneapolis: Walker Art Centre, 1992.

⁸ Habermas, Jurgen. The Structural Transformation of the Public Sphere. 1962. p.176

⁹ Arendt, Hannah. The Human Condition. Chicago: U of Chicago P. 1958. p.50

¹⁰ Feenberg, Andrew. p.167

Although the public sphere was tied directly to the built form of the city as its medium in the *polis*, Habermas does not view the public sphere as an actual place in an identifiable space but as a virtual community that is socially constructed through the participation in communicative actions. This includes the urban and architectural space of the street, plaza, or coffee shop, the literary sphere of books, newspapers, and magazines, or contemporary telecommunications.¹⁰

In contemporary society, the public sphere is found to be degraded. The common sphere where differences are reconciled is pushed aside by the uniform systemization of the lifeworld and our technocratic ontology. Our faith in objectivity, efficiency, reason, science and progress leaves society vulnerable to the biases of mechanical and electronic instruments, the automation by bureaucracy, and the hegemony of private interest of capitalism in the guise of economy. Systemization suppresses difference by eliminating the interrelationships of citizens. The ontology of the ancient Greek polis served to reaffirm the human lifeworld. The ontology of technocracy that constitutes contemporary society compromises the primacy of the lifeworld to the biases of technology.

Citizenship

Plato's assertion that the city was a magnification of the human soul illustrates the importance civic life had in those times.¹¹ The *polis* unified the community in time and in space. Norman Crowe writes that "central to the concept of the *polis* was the agreement that the polity binds the community together; each citizen is aware that he shared a destiny with all other citizens, just as all citizens share in the common history of the *polis*."¹² Citizenship was as much a result of inhabiting and participating in the polis as the polis was an emergence of the ritual and practices of citizenship.

Aristotle defined the citizen as "a person who has the right to participate in deliberative or judicial office,"¹³ but to call it a right is an understatement. Participation in public life was very much a moral obligation that conferred citizenship. Citizens could not retire completely into a private life but were required to participate in public life as Hannah Arendt has observed "a man who lived only a private life ... was not fully human."¹⁴ In the ontology of the *polis*, public life separates Man from beast.

The identity of the ancient Greek was drawn from his role in society. Involvement in the public sphere was central to one's identity, freedom, spirituality, and morality, and a chief requisite to citizenship. To be a citizen was to be a political agent in the public sphere, actively participating in the discourse and debate that guided, legitimized, and, at times, resisted the authority and affairs of the city-state.

¹¹ Plato. *Republic*. G.M.A. Grube trans. Indianapolis: Hackett Publishing Company, Inc., 1992.

¹² Crowe, Norman. p.112

¹³ <http://plato.stanford.edu/entries/aristotle-politics/>

¹⁴ Arendt, Hannah. p.38

¹⁵ Hardt and Negri. p.95

¹⁶ Ibid. p.23

¹⁷ Duany, Plater-Zyberk and Speck. Suburban Nation. New York: North Point Press, 2000. p.9

¹⁸ Oliver, J. Eric. Democracy and Suburbia. Princeton: Princeton U P, 2001. p.12

The contemporary state of affairs disguises differences with the technocratic regime of bureaucracies, administrations, opinion polls, and mass media. Hardt and Negri stated that “every nation must make the multitude into a people,”¹⁵ whereby the multiplicity is suppressed to create one unified will. Social command is no longer constructed in the discursive association of citizens in a public sphere but by the disciplinary regime. Foucault defines this as a “diffuse network of *dispositifs* or apparatuses that produce and regulate customs, habits, and productive practices.”¹⁶ This *disciplinary power* was traditionally constituted by institutions such as the prison, factory, hospital, universities and so on. These institutions that socially organized society spatially were ones which the citizens still had agency to resist and guide. Habermas argued that in the 18th and 19th centuries, western society experienced one of the highest forms of public spheres, one that saw great advances in the rights and liberties of the common person. In the 20th century, as technocracy took full hold of society with the maturation of modernity, *disciplinary power* technologically extended beyond spatial limitations and became internalized in our lives, bringing forth what Foucault calls the *society of control*. Technology is wresting control of the human lifeworld. Power is no longer wielded by citizens but by machines and bureaucracies that automate and reorganize our lives.

Citizens are no longer actors in the public sphere but are more akin to spectators looking in. Today’s citizens’ lives are increasingly isolated in space and mediated by technological extension. Class struggles are suppressed by the segregation of different socioeconomic groups into separate suburban subdivisions,¹⁷ and on different sides of municipal lines.¹⁸ Living homogenous lives, citizens are not faced with the difference that initiates dialogue

or debate. The public sphere has been transplanted increasingly onto the technological mediated infrastructure required to administer the contemporary nation state. The unquestioning implementation of this technological mediation has a predilection to erode the public sphere. In the degraded public sphere, legitimacy is drawn from the values of technological determinism rather than from the consensus of citizens. Citizenship is involved less in forming public opinion to affect the system and instead is in being formed by the system.

Network society

Information Age

"The Internet is the basis for the organizational form of the information age: the network."

Manuel Castells (2001)¹

The Information Age is materializing from the convergence in the miniaturization of electronics, and advances in digital communication and computer technology. The networking of the vast array of computers and communication devices has created the Internet, which has penetrated deep into Western Civilization. The Internet is a many-to-many medium wherein the infrastructure feasibly supports any individual to simultaneously take the role of consumer or producer of information and messages. The communicative sphere is once again becoming accessible to the private citizen offering an opportunity to regenerate the public sphere.

This change in medium is restructuring how we practice commerce, governmental politics, politics of resistance, and how we structure communities,² as the medium ruptures and reconstructs spatial relationships by applying a new scale to them. What is seen is that society is shifting from a vertically organized hierarchical society, to a horizontally organized network society.

¹ Castells, Manuel. Internet Galaxies. New York: Oxford. 2001. p.1

² Ibid. p.4

³ Ibid. p.2

In the past, a vertical chain of command outperformed the network in mobilizing resources and achieving objectives. Although networks have the advantage of flexibility and adaptability, they in the past they posed the problem of coordination that vertical organization of a chain of command did not present. Castells finds that the network society is a result of three convergent realities: in response to the need for management flexibility in the globalization of capital, demands of social values which favour individual freedom and open communication, and the availability of the aforementioned technologies.³ The network society desires decentralization of power to individuals. It requires the reestablishment of a functioning public sphere. The network society seeks to overcome the technocracy which produced it.

The Internet as a Public Sphere

“The Political significance of computer mediated communication lies in its capacity to challenge the existing political hierarchy's monopoly on powerful communications media, and perhaps thus revitalize citizen based democracy... The vision of a citizen-designed, citizen controlled worldwide communications Network is a version of technological utopianism that could be called the vision of “the electronic agora.”

Howard Rheingold (1993)⁴

As the defining medium of contemporary society, the Internet's many-to-many mode of communication rescales the relationships between every person, placing every participant in the simultaneous role of producer and consumer of information. The medium of the television rescaled the relationship between the elite content producers and the consuming masses. It inflated the imbalance of power by allowing those with power increased access to the privacy of the home, a space that previously was sheltered by the physical framing of space. The Internet removes the physical restraint of space from the practices of the communicative sphere and, unlike television and radio, it does so in a democratic fashion. The Internet opens society towards a new commons.⁵

The Internet's reshaping of the public sphere can be observed by studying political activism. As it was discussed earlier, Habermas stated that politics is the realm of conflicting values. Politics manages the conflicts that result in social change. As politics involves the practice of authority and power, the compression of time and space that communication technology exerts holds the possibility to circumvent the spatial structures of power. The

⁴ Rheingold, Howard. The Virtual Community: Homesteading on the Electronic Frontier. Reading, MA.: Addison-Wilson. 1993. p.14

⁵ Ideally, it opens society towards a new commons, but as every writer on the Internet footnotes, the reality of geographic and economic inequity gives privilege to those with access.

⁶ Dovey, Kim. Framing Places: Mediating Power in Built Form. London: Routledge. 1999. p.82

⁷ McCaughey and Ayers. Cyberactivism. New York: Routledge. 2003. p.4

⁸ Margolis and Resnick. Politics as Usual: The Cyberspace "Revolution". Thousand Oaks, CA: Sage Publications. 2000. p.21

⁹ Jordan, Tim. Cyberpower: The culture and Politics of Cyberspace and the Internet. New York: Routledge. 2001. p.35

Internet enables users to communicate instantly across a non-hierarchical network of computers. Many early proponents of the Internet, such as Rheinholt, believed that the Internet would reopen the channels of communication that had been shut down by the decline of public space. This newly realized connectivity would empower the citizens to sidestep space in their organization against authority.

An example of the allowance of communication technology to dodge the inequities in spatially framed power relations is the 1989 student protest in favour of democracy at Tiananmen Square. Following protests in 1987, the Chinese authorities decreed that the space could not be used by the public without approval by the government.⁶ To circumvent the government's total control over urban space, the students used early network communication technology of the BBS to organize their resistance.⁷ Internet technology allows social movements to overcome unfavourable social and spatial structures by applying a new scale.

The Internet acts as a "destabilizing technological window," making it very difficult for oppressive regimes to censor ideas and information that threatens its authority.⁸ The Internet's network structure can reroute information nodes that block access. Though intranational internet sites can be controlled, this form of censorship merely encourages the content to be moved to a site in another country.⁹ Shutting out the global Internet is impossible because the Internet is becoming a crucial constituent of international commerce. Jordan concludes that free-speech is a technological bias of the Internet, and that it undermines any attempt by the media or government to control information. In the Information Age, *information is free*.

In modern society power is exercised by technology. Power is now diffused as a technologically mediated network of the social body and is exercised by the generation of normative behaviour. Political activism must focus on changing the cultural values that are coded into such behaviours. To alter the cultural values in a network society, social movements cannot act upon institutions of power directly because their power is distributed but must instead act to seize the minds of the constituency by impacting public opinion through communication technology.¹⁰ The network of the social body acts as the generative apparatus for normative practice. What Castells identifies is not a revolutionary form of political activism, but a reassertion of a public sphere as described by Habermas and as approximated by the ancient Greeks and the early parts of the Industrial Age. The Internet, as the technological support for the network society, provides the infrastructure to reestablish the necessary public sphere.

¹⁰ Castells. p.141

Body Space Politics

The Myth of the Metaphysical Self

“The notion of cyborg is inherently about boundary making and identity, not merely between the human and the prosthetic machine but between ideality and materiality.”

Jerry Everard (2000)¹

Human experience has been defined for millennia by the conditions of our bodies. The physical constraints of time and space have always been among the conditions that define the limits of what and how we understand, perceive, and imagine, and consequently the field of possible choices of actions that we may take. McLuhan stated that the technological medium is the “extension of man,” that in the application of the new scale, it extends the limits of the body, creating a new understanding of what the body is.

The conditions of the body have also acted to define our identities. The body defined gender, race, age, and sexuality, its work defined occupation and status, and its location determined nationality or ethnicity. Technology extends the limits set by the body, creating new meaning, thus new identities. For example, before communication technologies, parents had control over the bodies of their children. By limiting the body, parents were capable of determining the environment for their children.² Parents and children lived in the same cultural world, hence sharing many identity traits. Poster argues that Internet technology has segmented the family. By allowing information to slip into the house, it has extended the universe the children live in, placing each member within their own

¹ Everard, Jerry. Virtual States. London: Routledge. 2000. p.21

² Poster, Mark “Desiring Information and Machines.” Data Made Flesh. Ed Mitchell and Thurtle. New York: Routledge. 2003. p.94

³ Ibid. p.95-96

⁴ Haraway, Donna. "A Cyborg Manifesto: Science, Technology, and Socialist-Feminism in the Late Twentieth Century." Simians, Cyborgs, and Women: The Reinvention of Nature. New York: Routledge. 1991. p.149-150

cultural world.³ No longer do we meet the boundaries of our existence solely through our biological bodies but also by our extension through machines.

Technological mediation creates a fiction for the human condition that would erase the inequities of embodied life. Emergent from Cartesian thought is the the 20th Century belief in the dichotomy between body/flesh and information/mind, which Donna Haraway describes as the fiction of the *cyborg*, a metaphor for our technological extension that would erase the biological and physical imperatives of unique bodies and make all bodies conceptually the same, or irrelevant in terms of social relations and political construction.⁴ The body is extended so far technologically; or rather technology has penetrated so deeply into the body, that boundary between body and technology has become indistinguishably blurred to the technocratic eye.

The meanings and metaphors generated by technocracy bias perception. Imagination to social relations are no longer understood through a human identity that is bound by a biological body. Rather, the social is a function of an emergent hybrid constituent. The myth of the cyborg speaks of the encroachment of technology into the lifeworld. In a society predominantly configured by technological mediation, the cyborg's existence circumvents space. Technocracy ignores the primacy of the body and perception to human existence because it collapses the notions of time and space and omits the subjective body from discourse. The primacy of the Cartesian Ego that informs technocracy places the body under the domination of technologies, cementing the body's exteriority to one's

concept of self. In this manner the body may be considered an unfortunate coincidence to being, not a necessity for the true self, it is regarded as a conscious mind trapped in the body.

In technocracy, space exists only as a medium for the operation of the system. Giving primacy to objectivity and the rational mind over the subjective body, space is conceived in an abstract manner which Henri Lefebvre calls the representation of space, or space as understood in terms of numbers and geometry.⁵ Lefebvre believed this was the space of scientists, social engineers and other technocrats. This is also the terms by which the technical systems of the social sphere, such as economy and capital, construct space.⁶ In technocracy, the understanding of space disregards the body, and operates under the abstract, rational, and quantifiable terms favoured by the objective language of technological determinism. This view of space gives primacy to the virtual space that is constructed through the abstraction of measurables with the goal of understanding space from the outside, as if to remove the human subject from its conception.

The Cartesian Ego, which is outside of physical space, presents a notion of the self which is outside of time, being eternal and unchanging.⁷ Similarly, the privilege given to a representation space biases a notion of timelessness. The space of our experience is imbued with flux but the space of our imagination is static and objective, outside of the subjectivity of experience. Since the embodied elements of sense and experience are considered unimportant and not constitutive of the self, social relations are equally considered unimportant and often imposing or restrictive of freedom. Social life requires

⁵ Lefebvre, Henri. The Production of Space. Trans. Donald Nicholson-Smith. Cambridge, Mass.: Blackwell. 1991. p. 38-39

⁶ Merrifield, Andy. "Henri Lefebvre: A Socialist in Space." Thinking Space. Ed. Mike Craig and Nigel Thrift. New York: Routledge. 2000. p.174

⁷ Merleau-Ponty, Maurice. Phenomenology of Perception. Trans. Colin Smith. New York: Routledge. 2002 p.433

⁸ Richards, Simon. Le Corbusier and the Concept of Self. New Haven, Connecticut: Yale U P. 2003. p.5, 133-134

political resolutions to mediate conflicts, thus restricting the freedom to do, whereas introspective solitude offers the possibility of autonomy.⁸ To overcome the unpredictability of communal life, there is an underlying appeal for technocracy's systematization of the lifeworld to suppress public life by isolating individuals in space such that differences do not come face to face. A fully systematized lifeworld is free of conflict and change. It is outside of time. As the privilege of the autonomy of the individual, it is utopia. As the end of political agency and history, it is dystopia.

Embodiment: Excavating the Really Real

"Perception is our primary form of knowing and does not exist apart from the a priori of the body's structure and its engagement in the world."

Alberto Perez-Gomez (1988)⁹

Despite the range of technology now extending human experience physically, by the instrumental compression of space, and virtually, by the administration nationhood, the basic limit of defining interiority and exteriority of the self remains the body. The technological extension of the body has transformed how we conceive of the body and alters the limits of our imagination and our representation of our perceptions,¹⁰ but it does not suppress the body and embodiment as the source of social construction and politics.

Elizabeth Grosz finds that the suppression of the body and the transcendence of the mind are impossible, stating that "the bodies limits ... are the limits of technological invention. ... Technology is the limit of the body, its most 'external' as well as 'internalized' reach. Technology in this sense is necessarily tied not to a subject or a community but to bodily capacities and imaginaries."¹¹ Thus, while technocracy allows for fictions of disembodiment, the reality is that the body is ever present. It remains the condition by which we define our limits and boundaries, but it is erased from our virtual representation of self and our imagination. Allowing a mistaken virtual representation to influence the reproduction of the lifeworld endangers the social and political spheres from its inability to appreciate the role of the body in their construction.

⁹ Perez-Gomez, Alberto. Architecture and the Crisis of Modern Science. Cambridge, Massachusetts: MIT Press. 1988. p.3

¹⁰ Grosz, Elizabeth. Architecture from the Outside: Essays on the Virtual and Real Space. Cambridge, Massachusetts: MIT P. 2001. p.52

¹¹ Ibid. p.53

¹² Grosz, Elizabeth. "Feminism and the Crisis of Reason." Space, Time, and Perversion. New York. Routledge. 1995. p.26-28

¹³ Merleau-Ponty, Maurice. "Eye and Mind." The Primacy of Perception. Trans. Carleton Dallery. Chicago: Northwestern U P. 1964. p.159

¹⁴ Merleau-Ponty, Maurice. "The Primacy of Perception and its Philosophical Consequences". The Primacy of Perception. Trans James M. Edie. Chicago: Northwestern U P.

How is it that society abides by a virtual representation that defies our lived experience? The root of this confusion, which Grosz calls the *crisis of reason*, is that the conceptual or mental are given a privileged position over the corporeal, by ignoring the material source of the production of knowledge and considering it to be timeless and placeless, free of the conditions of historicity and specificity.¹² Technocracy gives primacy to the objective values of reason and scientific inquiry, of which Merleau-Ponty wrote:

"Constructive scientific activities see themselves and represent themselves to be autonomous and their thinking deliberately reduces itself to a set of data collecting techniques which it has invented."

Maurice Merleau-Ponty (1965)¹³

The notion of automation is the attempt to remove the human subject from the processes of acquisition/creation of knowledge, or at the very least, to circumvent the subjectivity of human perception and to directly access the objective rational Cartesian Ego in the quest for knowledge. Merleau-Ponty believes that we are grounded in the real world by our perception of it, that "the experience of perception is our presence at the moment when things, truths, values, are constituted for us; that perception ... summons us to the tasks of knowledge and action."¹⁴ Given that the body is directly involved in perception, the practice of science is to give up living in the real world. The two rarely came face to face,¹⁵ as the operation of scientific inquiry was to overcome the subjectivity of embodiment and

perception.

Objectivity is being attacked from within science itself. A challenge is posed to the goal of “unmediated objectivity” by the propositions of Heisenberg’s *uncertainty principle* and the more recent *chaos theory*, and it is questioned whether or not the scientific process can remain impervious to the presence of the observer and his presumptions.¹⁶ This crisis becomes increasingly apparent in the humanities and social sciences wherein to produce the necessary “raw data,” the human lifeworld must be broken down into measurable objects, an enterprise that “ignores the specificities, the singularities of the subject.”¹⁷ The application of scientific objectivity demands the observer to remove himself from the study of its object – humanity – which is clearly an impossibility.

There lies an epistemological rupture in technocracy: the process by which knowledge is created ignores the direct role of perceptions in tying the mental to the real world. The rift is mended by acknowledging the *primacy of perception*, once again giving embodiment a privileged position in the creation of knowledge. To this end, Merleau-Ponty stated:

“It is not a question of reducing human knowledge to sensation, but assisting at the birth of this knowledge, to make it as sensible as the sensible, to recover the consciousness of rationality.”¹⁸

1964. p.25

¹⁵ Merleau-Ponty. “Eye and Mind.” p.159

¹⁶ Grosz. p.28-29

¹⁷ Ibid. p.29

¹⁸ Merleau-Ponty. “The Primacy of

Perception and its Philosophical Consequences.” p.25

¹⁹ Edie, James M. “Introduction” The Primacy of Perception. Chicago: Northwestern U P. 1964. p.xvi

²⁰ Fielding, Helen A. “Envisioning the Other: Lacan and Merleau-Ponty on Intersubjectivity.” Merleau-Ponty, Interiority and Exteriority, Psychic Life and the World. Ed. Dorothea Olkowski and James Morley. Albany, NY: State U of New York P. 1999. p.190

²¹ Merleau-Ponty, Maurice. “An Unpublished Text by Maurice Merleau-Ponty: A Prospectus of His Work”. The Primacy of Perception. Trans Arleen B. Dallery. Northwestern U P. 1964. p.3. Merleau-Ponty states that “we never cease living in the world of perception, but we go beyond it in critical thought – almost to the point of forgetting the contribution of perception to our idea of truth.”

By perception, he means “sensory-motor behaviour,” the combination of sensing and acting, by which the world is constituted for us “prior to any explicit or reflexive thought about it.”¹⁹ Merleau-Ponty is critical of the solipsistic concept of the Cartesian Ego that posits an isolated thinker able only to speculate on everything outside of his own consciousness, unable to reconcile ones mental world with the physical world or the mental world of others.²⁰ The main purpose of his project, *the phenomenology of perception*, is to reinstate an ontology that recognized the embodied, the perceived, as living in the world, and the starting point on knowledge.²¹ By invoking the primacy of perception he did not aspire to diminish the virtual realm of critical thought but to reinvigorate it with renewed vitality. His goal is to establish a bridge between the interior mental world and the exterior physical world; a gap that had opened with Plato’s favouring of the metaphysical *idea* as the source of the physical “*shadow*,” and later entrenched by Cartesian dualism.

Merleau-Ponty found it noteworthy that it was not until the Renaissance that the awareness of perspective even arose. The relatively recent revelation of the perspectival deformation of objects and of space suggested to him the immediacy of perception, that “there is no deciphering, no mediate inference from the signs to what is signified, because the alleged signs are not given to me separately from what is being signified.”²² He attacked the notion that there is a perceiving mind that reconstructs sense data to create a virtual/artificial image of the real. The wholeness of perception speaks of a space no longer simply conceived of as an objective network of measurable geometric relations between objects and reconstructed as if from an external vantage. That conception of space is now recognized to be a virtual image of space. The space as the real world constitutes itself

to us, is one that places the subject at the centre and all things radiating out in degrees of depths. It is a subjective space that accepts our interiority. Of this space, Merleau-Ponty says “I live in it from the inside; I am immersed in it.”²³ Lefebvre’s analog of this understanding of space is what he calls *representational space*, the space in which we experience our everyday lives, “*lived* through its associated images and symbols, and hence the space of ‘inhabitants’ and ‘users’.”²⁴

Lefebvre’s representational space easily eludes us. Its elusiveness is most appreciated by its susceptibility to the domination of thought and conceptualization.²⁵ This mysterious *lived* space is what artists and poets, philosophers and writers try to describe. The path to technocracy has increasingly put us out of touch with this embodied space, such that it is now relegated in importance, if recognized at all in the virtual. Architects and planner’s decisions have always been and will always be informed by the formal representation of space, but the fundamentally embodied nature of the product – representational space, the “primordial space of our perceptions”, the space from which all other conceptions of spaces are derived – must be recognized for the built environment to respond *sensitively* to the conditions of human existence.

²² Merleau-Ponty. “The Primacy of Perception and its Philosophical Consequences.” p.15

²³ Merleau-Ponty. “Eye and Mind.” p.178

²⁴ Lefebvre. p.39. Lefebvre also adds his belief that this space overlays physical space. By this admission Lefebvre trivalent conception of space could reassert an underlying duality. This does not concern this narrative because the use of Merleau-Ponty’s phenomenology unifies the internal and external through perception/experience as the root of all knowledge and the direct access to the real.

²⁵ Merrifield. p.174

Intersubjectivity: the Embodied Public Sphere

“What we observe in our society is the development of a communication hybrid that brings together physical place and cyber space to act as the material support of networked individualism.”

Manuel Castells (2001)²⁶

²⁶ Castells. p.131

²⁷ Nakamura, Katherine. Cybertypes: race, ethnicity, and identity on the Internet. New York: Routledge. 2002. p.9

²⁸ Ibid. p.10

²⁹ McCaughey and Ayers. Cyberactivism. New York: Routledge. 2003. p.3-5

While technocracy has moved us towards overlooking the imperatives of embodiment, with fictions of our virtual self image, the reality of the body in space did not disappear. Nakamura argues that the claim to erase gender and racial differences do not account for the inaccessibility of the “expensive and difficult-to-learn technology amongst the marginalised.”²⁷ Nor does fluid identity cope very well with geography wherein an Internet based company can deny service to an ethnic minority based on locations which are often tied to race and class.²⁸ The specificities of the body do not only factor in with Internet technology, but their inequities are apparent in all forms of technology. The divergence experienced with information technology is that it provides a semblance of a public sphere where differences can once again come face to face.

In their compilation of papers examining the politics of resistance in the Information Age, McCaughey and Ayers conclude that activism will always require an embodied component to come to fruition.²⁹ Although the affinity groups that are orchestrated for protests such as those against the World Trade Organization are possible because of the fluid cyborg identity as described by Haraway, and the Internet was essential in the dissemination of

information and the coordinating action for both the WTO protest and Tiananmen Square protest, they noted that both of those protests required the traditional practice of political activism of putting bodies on the line.³⁰ These findings contradict the utopian vision of the technocratic regime by which information technology, in itself, would bring forth the public sphere in the form of the “electronic agora.”³¹ Although information technology is found to support a free communicative sphere and diffusion of information between and amongst private citizens, by itself it does not support the practices of political resistance necessary to constitute a public sphere. Evidently, the body holds a prominent position in the reassertion of the public sphere.

The problem of a technologically mediated public sphere can be traced to technocracy’s inability to reconcile the material and mental dichotomy of its model for the human condition. By interiorizing the self to the depths of consciousness and evoking an isolated thinker cut off from the world, technocracy produces a lifeworld that ignores difference, or rather, systemizes the lifeworld to suppress difference, such that the heterogeneity of values in a conflict in a commons, an essential to establishing a public sphere, is limited and accidental in its occurrence. Technocracy is limited in its facility to identify the role of the body in social construction or, having externalized subjectivity to its processes, very much incapable of recognizing it at all.

Conversely, the emerging notion of embodiment understands the body and mind as continuous by way of perception and recognizes politics as being in the same realm of sensing-acting by which the world manifests itself to us. It does not consider the self as

³⁰ Ibid. p.4-5

³¹ Rheinhold makes this claim for the internet in the passage quoted at the top of p.blah blah

³² Fielding. P.190

³³ Grosz. Architecture from the Outside: Essays on the Virtual and Real Space. p.41, 149

an isolated thinker but as a function of perception, emerging outside itself from acting in a world with other selves, being acted upon, and changing and being changed. Fielding writes that “because [Merleau-Ponty] can see the other seeing the same things he sees, he cannot doubt that we share the same world,” and that “because we are embodied, because we live in and encounter the same world, the primacy of the ego can be dismissed.”³² Unlike the Cartesian subject, the embodied subject only comes into being in space and in time in a condition of intersubjectivity.

Grosz also understands that embodiment intends a multiplicity of bodies; it presupposes the inclusion of the other. As a feminist philosopher, her idea of embodiment is gendered, serving to challenge the phallocentrism of cultural production that, in overlooking women’s specificities, is biased towards masculinity.³³ Our interpretation can be much broader in recognizing embodiment as all of the differences that can be brought together into intersubjectivity. The notion of embodiment recognizes the way in which we experience the world, subjectively immersed in space and time. The narrative of daily life is one that is weighted by very plain observable realities of being human such as age, gender, appearance, socioeconomic status, but also very personal and unappreciable ones such as the personal experience, history and disposition. Embodiment locates the subject in space, rather place, and where shared history, ritual and meaning is constituted through social engagement.

It is not that technocracy actually suppresses the body, it is that technocracy is unable to account for the body. It does not allow for an epistemology and an imagination for possibilities that can engage the inherent role of embodiment or intersubjectivity in contributing to political engagement. That the activities of political activism, aligned with Habermas's fundamental definition of the role of the public sphere, have revealed themselves to have a strong embodied component suggests that a new approach must be considered in how we produce our lifeworld.

The [re]Turn towards Civic Space

Architecture and Technocracy

“This functionalization of architectural theory implies its transformation into a set of operational rules, into a tool of an exclusively technological character. Its main concern becomes how to build in an efficient manner, while avoiding questions related to why one builds and whether such activity is justified in an existential context.”

*Alberto Perez-Gomez (1988)*¹

At the turn of the 20th century, the architectural profession was infused with the sense that architecture could bring about a positive cultural change whereby the common person would fulfill his or her potential and would be culturally and intellectually refined. “Architecture or revolution,” declared Le Corbusier, claiming that architecture had the political agency to avert the political revolution of a furious working class by improving their quality of life.² Under the influence of humanist and liberal ideals, under the inspection of reason, science, and technology, architecture would play a central role in building a better, more humane world for the common person. Not only was technology embraced wholeheartedly into design considerations, the technocratic attitude presented architecture itself as a technical enterprise. Expounding the virtues of engineering, Le Corbusier juxtaposed the Parthenon with an automobile,³ claiming that “the house is a machine for living,” and that once the problem of the house was properly stated, armed with science and reason, man could invent the solution.⁴ As one of the most

¹ Perez-Gomez. p.4

² Le Corbusier. Towards a New Architecture. Trans. Frederick Etchells. New York. Dover P. 1986. p.7-8

³ Ibid. p.135

⁴ Ibid. p.4-7

⁵ Isozaki, Arato. "Introduction." Architecture as Metaphor: Language, Number, Money. Ed. Michael Speaks. Cambridge, Massachusetts: MIT P. 2001. p.xi-xii

influential manuscripts of 20th century architecture, *Towards a New Architecture* stands as a charismatic testament to the view that technocracy held a firm grip on architectural discourse at very beginning of the century.

The argument of technocracy and architecture can be traced to the late 19th century works of Gottfried Semper, Otto Wagner, and Adolf Loos who worked to redefine architecture in terms of utilitarianism and rather than Art. Isozaki, following Karatani, discusses the rejection of Art for its inability to adequately legitimize architectural practices in favour of "methodological procedure," and "analytic decomposition."⁵ In times of increasing privilege of science, objectivity, and invention, it is not a coincidence that the institution of Art was found unfit, and that it was replaced by technocratic values. The ideal of this movement was to eliminate all non-essential elements from architecture. In practice, the focus was on the surface and form of architecture. Operating under the notion of objectivity, these innovators worked with the technically measurable aspects of space, initiated over a century long discourse of architecture as object. While the move to Modernism brought the influence of technocracy upon the totality of architectural discourse and production, it was the goal of the early moderns to justify architectural form by reason rather than Art. This became one of the central critiques on the failure of Modernism.

The initiative of utilitarian architecture was furthered by Walter Gropius and Le Corbusier, icons of early modernism, in their desire to bring architecture to the masses. They embraced mass-production as a rational means to manufacture architecture economically and did not shy away from the necessity of standardization in its application. Far

from being an obstacle to social development, Gropius believed it was a prerequisite. Determining a standard, a “simplified, practical, exemplar,” required the “elimination of the personal content of their designers and all otherwise ungeneric or non-essential features,”⁶ assuming a position of exteriority to the lifeworld and viewing humans as an object of study. Le Corbusier and Gropius both used the authority of economy of means as a researched expertise to uphold their ideas. Gropius defended standardization against criticism of tyranny over individuality by claiming that the conscious adoption of standards has been the criteria to “polite, well ordered societies” throughout history, for standardization did not imply the “robotization of the individual, but, on the contrary, the unburdening of his existence from unnecessary dead-weight so as to leave him free to develop on a higher plane.”⁷

Critics have argued that the historical claims to connect standardization of architectural form to the liberation of the people are unsubstantiated, that Modernism attempted to universalize form while ignoring localized differences amongst geographically and culturally disparate people and that this course of action attacked tradition and individuality. Another prominent criticism is that Modernism had been co-opted by the establishment. Its promotion of the economy of mass production, which was intended to provide better living conditions, was embraced by government and capital to such a degree that in its maturity, modernism became emblematic of their institutions. As the formal expression of a dominating authority, modernism’s claim that architecture could serve in the liberation of the people was considered a failure. In regards to these intentions, the movement became depicted simply as seeking to apply the metaphors of

⁶ Gropius, Walter. *New Architecture and the Bauhaus*. Cambridge, Mass.: MIT P. 1965. p.34-37

⁷ Ibid.

⁸ By social transformation or reformation, it does not refer to the potential for mass-productions to provide quality lodging more economically, but the Modernist hope that architecture could morally improve its inhabitants, or as Gropius said, that people would be “free to develop on a higher plane.”

⁹ McLeod. P.680

¹⁰ Venturi, Robert. *Complexity and Contradiction in Architecture*. New York: MOMA. 1966.

¹¹ McLeod. p.680

industry to architectural form, believing that the potential for social transformation lay in the manipulation of form, and its failure to bring this about determined that architectural form does not in fact have the potential for social reformation.⁸

Ironically, despite attributing Modernism’s failure to a focus on the rational justification of form, the Post-modern discourse on architecture is one that is widely identified by its focus on form; one that McLeod writes, “rejects the formal and social constituents of the modern movement and embraces a broader formal language, which is frequently figurative and historically eclectic.”⁹ In lieu of a utilitarian approach to form, Post-Modernists like Robert Venturi advocated “Complexity and Contradiction.” Venturi argued that the justification for vernacular or historical decorative elements was their very existence and that architects could not create these elements wholesale for they had communicative value outside of the architect’s authority.¹⁰ The movement directed its attack on the failure of the aesthetic of modernism to find acceptance amongst the common people as evidence for the necessity for a new formal approach that would resonate with the masses. McLeod states that the single unifying objective of the movement was “the search for architectural communication, the desire to make architecture a vehicle of cultural expression.”¹¹ Justification for post-modern architecture lies not in utility but in conveying meaning in a literary sense.

In the late eighties a new architectural movement was identified. The deconstructivism movement emerged as a reaction to Post-Modernism. To some of its practitioners it is a rejection of the communicative aspirations of Post-modernism. Inspired by philosophers

such as Jacques Derrida, it is celebration of the disintegration of the communicative potential of form.¹² While denying Post-Modernisms historicity, it reconsiders Post-Modernisms rejection of the technological image, finding its formal source in Modernism and the machine age aesthetic.¹³ However Deconstructivism also rejects Modernism's social and moral purpose. Some traditions of Deconstructivism seek the paradoxical goal of reassigning architecture's moral purpose to a formal and aesthetic obligation to itself. Peter Eisenman says of his work, "My first concern in looking at the nature of architecture involved an attempt to change the nature of the sign of the substance – from referring to man to referring to architecture itself."¹⁴ The self-referential architecture of today has been realigned with Art and has rejected social purpose as an impossibility.

What the critics of Modernism have ignored are the implicit underpinnings of the modern tradition that, due to ignorance, still manage architectural production today. Despite the rhetoric and diverging formal languages, contemporary architecture still functions under the technocratic ideals that informed early modernists. Under the assumption that modernism sought to reform society through architectural form, and that it was from this formal strategy that the problems of modernism arose, the reactions have focused almost entirely on the formal. Colin Rowe rightfully condemned Modernism's utopian urban vision as totalitarian and apocalyptic, laying the blame to formal homogeneity resulting from Modernism's focus on architecture as object. Instead Rowe advocated the complexity of fragmented urban patterns in *Collage City*, using ancient Rome as an example. While cities of antiquity and modern cities differed in urban form, they differed also in their conceptions of space. Yet as discussed earlier, there is an epistemological and ontological

¹² Ibid. p.681

¹³ Ibid. p.691

¹⁴ Mitchell, C. Thomas. Redefining Designing: from Form to Experience. NY: Van Nostrand Reinhold. 1993. p.21

¹⁵ McLeod. p.682

¹⁶ Grosz. p.143

¹⁷ Mitchell.

difference between the antiquity and the contemporary, one that goes beyond form and acts in restructuring our everyday. Changing the form does not necessarily change the structure of space. Thus in Rowe's critique of modernist utopias there is no possibility for a renewed understanding of space that is necessary for structural change. Instead, it is limited to a hopefulness that imitation may recreate past successes.

McLeod reminds us that Le Corbusier was not arguing "for formal isolation, but rather the expansion of architecture's role to address social problems."¹⁵ In the critique of utopianism, what is not considered is the source of these visions. Grosz tells us that visions of utopia are not projections of the future but the projection of the present as if it were the future.¹⁶ Underlying Le Corbusier's use of revolutionary language in service of the liberation and improvement of the common man was a conscious desire for the cessation of civic life that was informed directly by technocratic ideals. Modernist utopias identified with ontology by which they operated and the kind of society that would be engendered. Without identifying the epistemological and ontological roots, contemporary architecture and urban planning remain trapped in Modernism's legacy, resigned to rebuild the same spaces in new forms. For example, in his book *Redefining Designing*, despite recognizing the need to address experience, Mitchell advocates an approach to design that treats experience in the minor individual terms of human comfort and the appreciation of craft in architectural aesthetic while completely ignoring more consequential terms of intersubjectivity and social construction that heavily influence political agency.¹⁷

It must be understood that formal considerations are secondary in framing the lifeworld. To move past utopianism and to reengage the masses into a proper public sphere, there must be consideration of the temporal, the embodied, the representational space. What critiques of modernism have generally failed to recognize is that by standardization, Modernists such as Gropius and Le Corbusier were concerned with much more than architectural form. Implicit in their visions was the standardization of the representation of the human being and the lifeworld. Their indebtedness to humanist ideals inherently biased them towards the systemization of lived space under a technocratic regime that is more commonly identified as utopia. The early Modernists intentionally put forth a vision of a homogenous apolitical society in accordance with their epistemology and their concept of self, and thus their idea of free and liberating society.

The Cartesian epistemology gives privilege to the abstract knowledge produced in thought, of which the highest order is given to the precision and clarity of reason, mathematics and geometry.¹⁸ Geometry was integral for CIAM (International Congress of Modern Architects), of which Le Corbusier was a member, to the reordering the city and the human lifeworld in approximating it to the truthfulness of thought. Applying dialectic and analysis to spatial considerations, the representation of space was distilled into four zones, working, living, recreation, and transportation.¹⁹ These distinctions produce homogeneity in the *lived* space as it is framed for unique functions. Considering transportation as the *nonspace* of technological compression, this not entirely different from Lefebvre's analysis that the Bauhaus was the turning point in the representation of space, introducing a global concept of space founded on a workplace dwelling-place dichotomy.²⁰ The

¹⁸ Whyte, Ian Boyd. "Introduction." Modernism and the Spirit of the City. New York: Routledge. 2003. p.4

¹⁹ Welter, Volker M. "From locus genii to the heart of the city." Modernism and the Spirit of the City. New York: Routledge. 2003. p.36

²⁰ Lefebvre. p.123-124

²¹ Welter. p.48

²² Ibid. p.49

²³ Lefebvre. p..304

vision to rebuild space from the spoon to the city, this objective universal idea of space left the built environment susceptible to the objective authority of research, economy, and reason, eliminating the once privileged position of the subjective intentionality informed by interiority to the lifeworld. Arranging space by function became a rational approach to compartmentalizing activity and introducing technocratic management of the lifeworld. Exclusion of otherness in space disallows the opportunity to embody an unhindered public sphere. These criticisms were offered by Colin Rowe and Lewis Mumford, among others. However unable to move outside of Cartesian epistemology, their commentary remained an attack on form and was unable to reveal the processes by which Modernist ideals functioned as social management. In the 1940's Mumford identified CIAM's neglect in accounting for "the organs of political and cultural association ... the distinguishing marks of the city: without them there is only urban mass" and the role of the buildings concerned with these features in the constitution of city.²¹ CIAM and other modernists responded to this inadequacy by adding yet another "zone" to their discourse and their image of the city, a *core* that would act, in Gropius' words, as a "cultural breeding ground that enables individuals to attain his full stature within the community."²² However it can be seen in the virtuality of the discourse and in graphic representation of their utopias, that this space is nothing more than a place holder, a reference, for a temporal and heterogeneous space that is impossible in the technocratic conception and management of space.

Lefebvre commented that modernism served the interests of the state and capital.²³ Technocracy has an appeal to government and commerce because it provides objective standards by which to measure success; while notions of reason, research, and objectivity

create an illusion of apolitical or neutral management.²⁴ While some modernists may not have questioned the illusion of political neutrality in subscribing to technological determinism towards the positive evolution of the life of the common man, it has been argued by Simon Richards that Le Corbusier aspired to technocracy to remove politics entirely from the social sphere and replace it with a society entirely managed by the authority of experts, and the very same terms of the administrations and bureaucracies of the Nation State and the research, analysis, and rationale of economic systems, be they capitalist or socialist. For modernists such as Le Corbusier, politics, society, and the city were not an end on to themselves. Simon Richards argues that the end was a spiritual revival that could only be found in isolation. Le Corbusier evidently held a concept of self that privileged the Cartesian ego. Richards found that Le Corbusier's plans for Ville Contemporaine were not "a hymn to technology, as commonly thought, but as armature for sustaining this new surge of consciousness... there was no politics in the Ville Contemporaine."²⁵ His vision was not founded on naïve technological determinism, thus mistakenly undermining his social purpose. It was a convergence of technocratic ideals that gave primacy to the Cartesian concept of self and found social harmony the ideal proposition to limit the interference of society on the individual to truly realize oneself. It can be seen that modernism was not co-opted by capital or the state. Modernism always belonged to them, or more accurately, can be sourced to the same contributing ideal - technocracy.

In ignoring the fundamental ideals of modernism, proceeding architectural movements remained subservient to them. McLeod supports post-modernisms rejection of modernisms

²⁴ Richards, Simon. Le Corbusier and the Concept of Self. New Haven, Connecticut: Yale U P. 2003. p.24

²⁵ Ibid. p.34

²⁶ McLeod. p.689

²⁷ Low, Setha M. On the Plaza. Austin, TX: U of Texas P. 2000. p.34

²⁸ Deutsche, Rosalyn. "Uneven development: Public Art in New York City." Out There: Marginalization and Contemporary Culture. Cambridge Massachusetts: MIT P. 1990. p.108

urban vision, and how contextualization and preservation have produced better urbanism by eschewing the brutal concrete aesthetic, the unused elevated walkways and the elimination of the isolated urban block. She offers Battery Park as an example of the post-modern urban strategy that may be inhibited and unexciting, but generally a "better urbanism." Her criticism is that the revitalization of urban centres is only accessible to the upwardly mobile and that it ignores the problems of gentrification, or otherwise properly addressing poorer neighbourhoods, conditions that are in need of change, not preservation.²⁶ Setha Low' more recent reflection on Battery Park demonstrates how revitalisation and gentrification are related.

The urban multi-use development of Battery Park City in NYC has become yet another piece of the spatial board game in which the capitalist system is reproducing the central city as a homogenous professional domain. The public space of Battery Park City is upper middle class space, not simply because only the wealthy can afford to live or rent offices there, but also because its design vocabulary and limited public access exclude other less affluent members of the city's population. Even city squares and village greens are no longer places for public discussion and casual loitering, but instead have become filled with regulated green markets, military reenactments, and seasonal county fairs."

Setha M. Low (2000)²⁷

Rosalyn Deutsche also argues that uneven economic and geographic development is in fact a structural feature of urban expansion and redevelopment.²⁸ While it may seem that inequities are randomly located and that growth and prosperity will eventually benefit all,

she finds that they are actually a hierarchical occurrence wherein benefits are dependant on losses. Revitalisation incurs the converse: disinvestment and displacement of the poor, thus redevelopment is a form of domination. Under the influence of capital, Deutsch finds that public space is increasingly privately owned as city regulators have forsaken their responsibility to administer it by putting it in the hands of private interests as a trade off for concessions. This has resulted in spaces that are no longer accessible to all, but rather, through a “multitude of legal, physical, or symbolic means,” are able to limit access to specific groups and/or purposes while excluding others.²⁹ The exclusion of the other acts to homogenize the public, an outcome that is justified by a technocratic value for social harmony. According to Deutsche, such public space is determined by profit, and the public itself is conceived of as a mass of consumers. This is a far cry from a meeting ground of conflicting values of a heterogeneous citizenry. Deutsche’s examination of public space in New York City is a perennial theme throughout North American cities. The profession may relegate these issues to the authority of social scientists and politicians, perhaps due to lost agency in a democratic network society, but as the barterers of lived space, it is essential for architects to once again account for the embodied in its representation of space - architectural discourse and representation - in offering its images of potential futures.

²⁹ Ibid. p.112

Architecture and Social Construction

Architecture has tended to conceive of itself as an art, a science, or a mechanics for the manipulation of space, indeed probably the largest, most systematic and most powerful mode for spatial organization and modification. Space itself, the very stuff of architectural reflection and production, requires and entails a mode of time, timeliness, or duration.

Elizabeth Grosz (2001)³⁰

³⁰ Grosz. p.110

³¹ Dovey. p.1

The built environment plays an important role in embodying our values and politics by framing them into everyday life. To frame is to shape, structure, or organize. It can also mean to enclose or to build. In one sense then, the frame denotes a border or boundary, and in another it suggests an established order. In a literal sense of the word, actions in everyday life are organized or shaped by the walls, doors, clusters of rooms and buildings within which they take place. The designer's decisions structure the space and consequently the actions within its boundaries. As a discursive concept, "built form frames meaning. Places tell us stories; we read them as spatial texts."³¹ These dynamics are not only encapsulated in space but in form as well. Places and forms can convey messages that have power as long as the message has significant meaning to the receiver. While formal meaning is embodied merely by reception, spatial meaning is embodied by response. Formal meaning is very much akin to literary meaning and is easily understood. Spatial meaning is slippery as it is made and remade in intersubjective participation.

In describing the contribution of public space to the political sphere, Low relates the importance of the plaza in particular in providing “a physical, social and metaphorical space for public debate and governance, cultural identity, and citizenship,” and that observations that “politicians manipulate the political symbolism of these charged spaces,” is evidence of “the plaza’s power to elicit civic commentary and social action.”³² The aesthetic interpretation of the form of architectural space and its symbolism is important in expressing meaning but there is also meaning that is located outside of spatial representation. Meaning is also made in the everyday life of “daily interactions, economic exchanges, and informal conversations,” that occur in public space. It is important to note that both types of meanings only come into being as intersubjectivities occurring in a shared perception of the world. All meaning is created in the interrelations between individuals or groups of individuals, thus meaning, as a product of the reconciliation of differing subjectivities, is the foundation of the politics.

³² Low. p.32

McLeod noted architecture’s convergence with politics as being twofold, the first point being the social and economic aspect of architectural production, the second being the architecture as a cultural object. Her argument is congruent with Lefebvre’s, that because architectural production demands a control over resources, space is produced under the pressures of socioeconomic conditions generated by relations of wealth, power, authority, and ideology. Conditions influence site selection, program, budget, and material and technology, amongst others, conditioning the built environment from its inception to enact the power imbalance between different individuals, classes, and identity groups in lived space. Considered in this manner, architectural practice is seen to be the *social*

³³ McLeod. p. 682

³⁴ Low. P.128

³⁵ Nakamura, as a critic of the internet society, McLeod as an architectural critic and Low as a social scientist, all conclude make similar remarks of the mistaken assumption of architectural space, geography and technology being neutral in relation to the body. The role of the body and space in the mitigation of power is a fundamental and reoccurring theme in Foucault's works as well.

production of space. The embodied aspect of architecture, its gradual impact “through repeated contact,”³³ constitutes it as McLeod’s cultural object, a process Low refers to as *social construction of space*, an analog for representational or lived space. It is the “transformation of space-through peoples social exchanges, memories, images, and daily use of the material thing – into scenes and actions that convey meaning.”³⁴ The architectural product frames meaning into the spatial configurations, and functional relations, and figurative dimensions, but these only construct the social sphere in space through embodied interrelationship to each other and to the environment.

Public space is a contested space by the bringing together of a diversity of social groups and classes. It is a participatory space wherein their negotiation of conflicting values, a highly structured way of intermingling and interacting emerges. In this intersubjective space the public sphere comes to be the space which Habermas described. Low warns that the privatization of “public space,” as was described by Deutsche, transforms them into homogenous spaces maintained by strict surveillance. This occurrence is the realization of Foucault’s *society of control*. For the public sphere to resist the domination of technological determinism which seeks to manage every aspect of our lives, the notion of embodiment, which returns temporality and subjectivity to architectural discourse, must be given the greatest consideration.

Feminists, be they architectural, technological, or social critics, all assert the importance of the body, a gendered, raced, subject that is impacted by space and geography and affluence.³⁵ Joan Ockman reaffirms Deleuze’s analysis of the importance of the importance

of the minor in challenging the normative.³⁶ In recognizing that space is not neutral in establishing the public sphere, architects must reclaim their role in embodying the political sphere, and it is apparent that architecture plays a role in creating the conditions to reassert the minor, the other, into lived space by subverting the process of spatial production and the spatial relationships in built form.

³⁶ Ockman, Joan. "Toward a Theory of Normative Architecture." *Architecture of the Everyday*. Eds. Steven Harris and Deborah Berke. New York: Princeton Architectural Press. 1997. 123-152

Architecture and the Network society

"No one wants to discuss the relationship between architecture and politics. It is an unsavoury subject. All those politicians, all that rhetoric, mixed with timeless verities embodied in the noble forms of architecture. Yet the resistance to enter this discussion is not noble at all. All architects are deeply involved in their work with the political, whether or not they admit it to others, or to themselves. Most architects in this highly commercial era, who accept commissions and clients that affect public life, are in fact committed to supporting political systems... It is no wonder that the majority of architects avoid the political implications of their work... they are nothing more nor less than the executors of a physical and social order designed by those institutions presently holding political authority and power.

Lebeus Woods (1988)³⁷

³⁷ Woods, Lebeus. Anarchitecture: Architecture is a Political Act. New York: St. Martin's P. 1988. p.9

³⁸ Castells. p.207

³⁹ Mitchell, William J. e-topia. Cambridge, MA: MIT Press. 2000. p.31

Technology, and the Internet in particular, does not mark the end of geography but rather "new territorial configurations emerge from simultaneous processes of spatial concentration, decentralization, and connection, relentlessly laboured by the variable geometry of global information flows."³⁸ The internet is spatially defined by its physical structure and by the distribution of users. Networks create privileged places at their junctions and access points.³⁹ The development of cities such as Montreal, Chicago, Seattle, or New York is attributed in great part to privileged location as junction points, termini, and/or dispersion points along network of shipping routes and railway. The development of the information industry is no different, being dependant not only on transportation and communication infrastructure(as would be suspected in association to

decentralization), but also access to social, cultural, commercial and industrial activity.⁴⁰ While social organization is decentralizing, populations are concentrating. Networks are more favoured in urban centres where depths and distances between these factors are much smaller.

⁴⁰ Castells. p.226-229

Contrary to the belief that telecommunication technology would spell the end of the urbanity by the way of a telecommuting information industry, the current trend is towards increasing urbanization. While it is shown that the internet provides the material support for the social relations and politics of the network society, the progressive urbanization indicates that the built environment has a role to provide in the service of the network society. Castells' analysis offers a renewed importance to urbanism based on a model of consumption but it is a technocratic study of a technocratic subject. The direction to fulfill the network society is one of subverting hierarchical structures of power. As discussed earlier, while the Internet provides the material support for horizontal organization, for it to be fully constructed socially and politically it requires an intact public sphere to embody the meeting of differences and the opportunity for resistance to institutions of government and capital.

In the struggle between the globalisation and the individual, it is the overarching institutions of state and capital that will hold power over the processes of architectural production. While our embodied existence resists the placelessness of information flows, places are beginning to lose meaning and identity in the global economy. But while place no longer holds economic importance, it still holds the key to cultural meaning and social

⁴¹ Woods. p.13

and political production. It is in public space, a place of active civic participation, that the citizenry can begin to mount localised resistances. Institutions of technocracy control the structure of society but the citizenry can once again control the space. Architects must reclaim their social and moral purpose by subverting architectural production to insure the possibility of the material support in the built environment for a reenergized public sphere.

To accomplish this, architecture must no longer be conceived of as mere objects. Objects are formal and outside of us. Representational space is subjective, and it is space from the inside. Architecture must be conceived of as the production of representational space. The practice which favours objectivity gives primacy to form and to the virtual reconstruction of space. It is a space outside of time that is appears to us as a utopia, ordered and managed, homogenous and harmonious. The practice which favours subjective space allows for the overlapping of people and programs in time and in space. It allows for spaces with an ambiguity of function that can be held in contention between citizens and the institutions of power and open to spontaneous appropriation for cultural production and the politics of resistance. Thus architecture must move past the post-modern and deconstructive movements focused simply on expression, a practice confined to representation, and embrace its instrumentality, as Wood argues, as “a tool extending individual capacities to do, to think, to know, to become.”⁴¹ An ethical practice cannot shirk this responsibility but must face it head on.

To argue for a practice that gives primacy to embodiment and lived space is not to argue against architecture's communicative potential, but to reclaim a much broader purpose, that when ignored leaves society to the dehumanization of technological determinism. The architect acts as an agent for social intention to create a vision of the near future. In a democratic network society, the architecture is no longer appointed power from above the reshape localities or large urban centres. Agency now lies in the network, which the architect must engage to realize his or her vision. Most importantly, it is the architect's ethical responsibility to be engaged in the discourse of social and political production and not to shy away from it despite the complexity of realizing one's vision. Architecture is not the practice of making art objects. It is the most consequential of human activities. Architecture is the production of the human lifeworld.

Project

The role of the architect is to imagine and represent a near future. It is a practice that exists predominantly in the realm of the virtual. The architect envisions the possibility and represents it through the various medium at his or her disposal – drawings, models, and more recently, digital media such as 3d renderings and animations. The actualization of built form lies in the hands of builders and craftsmen. The scale of economy of architecture does not often lend the architect the luxury of experimentation afforded to artists, particularly not in today's economically driven society. The architect's experiments remain virtual and untested. The act of building defines the idea as the final product. This thesis is such an experiment, a virtual representation of architecture, a synthesis of words and images that attempt to embody the idea of... embodiment.

The problem of the architect is to design architecture that is sensitive to the real and spatial needs of the inhabitants using a method that is inherently virtual and formal. Fortunately there is no prescriptive method for fulfilling social aspirations into built form. Each intervention is uniquely situated in place. Each site has its own social and infrastructural narrative. The theoretical element of this thesis explored a general condition through abstraction. The practical concern of this thesis was the exploration of similar concerns through the specific. While the theory developed a language and framework for discussion, the practice develops a strategy and representation for design, not just of a building object but a way of living.

Areal view of the Government Conference Centre site and neighbourhood (*John McQuarrie*)

The design consideration of this thesis is a renovation of the Government Conference Centre (GCC) located in downtown Ottawa. The GCC provides conference facilities to government agencies in the Capital as well as public clients but its most prominent role has been for conferences between the federal and provincial governments on various multilateral issues such as the Constitution Act and public health care.

The GCC political significance in the lives of Canadians and the sites privileged location in the lives of Ottawa citizens provide a good framework for exploring architecture's latency in political production and notions of embodying meaning in space through the intersubjectivity of politicians, visitors, political activists and local citizens in terms of their spatial relationship to each other and to the architecture in the narrative of the everyday. Functioning in the service of national interests, falling under the overriding authority of the federal government, yet embroiled in the daily lives of local, the GCC project must mediate national identity, civic participation, and the ongoing contest between the federal and municipal government.

Client

Public Works and Government Services Canada

The department of Public Works and Government Services Canada (PWGSC) is the institution responsible for providing services that are common to all federal government departments. With a diverse workforce of over thirteen thousand employees including architects, engineers, scientists, translators, interpreters, auditors, real estate specialists, and IT experts, the PWGSC provides an in-house consulting firm for the federal government. Although the PWGSC acts as the client on behalf of the government for most building commissions, in this case the project is the renovation of one of its own divisions.

Union Station under construction (*PWGSC*)

The National Capital Commission and Confederation Boulevard

The National Capital Commission (NCC) is a crown corporation with a mandate to plan and assist in the development, conservation, and improvement of the National Capital Region in accordance with its national significance as the seat of government. It is also mandated to promote events and activities in the city that will “enrich the cultural and social fabric of Canada.”¹ Established in 1959, it is the third such commission with the purpose of beautifying Canada, although much greater in scale than its two predecessors. The NCC is the largest property owner in the city of Ottawa, owning almost six hundred million dollars worth of real estate, and has an annual budget that exceeds one hundred million dollars.² The NCC is a major influence in the development of the city. Federal backing allows the NCC to appropriate land through its deep pockets and through legislating land acquisition as law. Furthermore, all federal corporations must consult the NCC to insure they conform to its master plan.

As a part of their master plan, the NCC has outlined a route lined with the major public institutions and national symbols known as the Confederation Boulevard. It is conceived of as “the location for the most important political and cultural institutions in Canada, as the Capital’s ceremonial route, and as the centre of programming and interpretation activities in the Capital.”³ It is the main focus of the NCC in planning “Canada’s Discovery Tour” through cultural institutions and commemorative landmarks. The GCC has been identified by the NCC as an understated gateway/node to their “Canada’s Discovery Route.”

¹ About the NCC: Mandate and Mission. http://www.canadascapital.gc.ca/corporate/aboutthenc/m/mandate_e.asp

² National Capital Commission. Annual Report 2003-2003. 2004. p.5

³ National Capital Commission. Canada’s Capital Core Sector Plan. 2005. p.8

Southeastern approach to the Union Station as it neared the end of construction (*National Archives of Canada*)

The contemporary Southaastern approach to the old Union Station building

Context

Building

The GCC building was once home to the city's central railway station, the Ottawa Union Station. The site was initially home to the Canada Atlantic Railway Station, established in 1896, though the proposal for a monumental station had already been championed by influential figures such as Sir Wilfred Laurier since 1891. Numerous designs were rejected until the Beaux-Art design by the Montreal firm of Ross & Macfarlane in 1908 was commissioned which also included the design for Chateau Laurier. The planning of the station was greatly indebted to the much larger Pennsylvania Station in New York City, by McKim, Mead & White. In fact, the waiting room of the Union Station was a half scale replica of that of Penn Station, though both drew their origin from the Roman baths of Diocletian, the ruins of which had been reconstructed by Michelangelo as the Basilica of Santa Maria degli Angeli.

Union Station served passengers between 1912 and 1966, when it fell victim to what is commonly known as the Gerber Plan. Proposed in 1950 by National Capital Planner Jacques Gerber, the General Report on the Plan for the National Capital advocated a decentralised approach to deal with infrastructural problems of the growing city. To avoid the possibility of traffic congestion in the downtown core, as experienced by bigger cities, Gerber initiated the decentralisation of government offices and ministries, the Ottawa Greenbelt, and the relocation of the central railway station. The railway beds were replaced by the Nicholas Expressway and Colonel By Drive in an effort to adapt

Union Station waiting room
(Heritage Ottawa)

Penn Station waiting room
(Heritage Ottawa)

Ottawa to the increasing automobile traffic in the city. The building butting up against the northeast facade was replaced with a grey stucco wall to make way for expressway style dedicated lanes for traffic coming from Elgin Street or Wellington Street to merge easily into Colonel By Drive road. A passage under the roadway connects the GCC to a small crossing island at the main intersection.

The plan also called for the demolition of Union Station, but the building was preserved due to public outcry and instead served as the Centennial Centre for the Centennial celebrations in 1967. The building was then refitted as the Government Conference Centre. Since then, it has been the site of some prominent political moments in Canadian constitutional history, including the famous "Kitchen Cabinet" negotiations that took place in one of the kitchenettes between concerned parties when the constitutional reform meeting between the premiers and the federal government in 1981 seemed to be on the brink of failure. The negotiations saved the stalled conference and led to the successful passing of the Constitutional Act in 1982 which included the redefinition of past constitutional acts and the introduction of the Canadian Charter of Rights and Freedoms.

City

Confederation Square is situated to the west of the terminus of the Rideau Canal, naturally finding itself in a boundary condition in the urban fabric and the GCC is located to the east of Confederation Square, across the Canal. The GCC's location is unique in its historical relevance, its position along a vertex of the Confederation Boulevard promenade, and its heterogeneous surroundings.

War Memorial

Parliament Hill

Bank of Canada and the
Currency Museum

Library and Archives of Canada

War Museum (*H.Foster, Canadian Museum of Civilization*)

Along the southwestwardly axis of Wellington Street lies the Parliamentary precinct. Parliament Hill aside, it features the Bank of Canada, the Library and Archives of Canada, the National Press Building, and the Supreme Court of Canada. It will soon feature several cultural institutions of national significance with the newly opened War Museum and the intended conversion of the old American embassy into the Portrait Gallery to accompany the Currency Museum that is already in place.

Supreme Court of Canada

National Press Building

National Portrait Gallery

Canadian Museum of Civilization

Chateau Laurier

700 Sussex

Confederation Boulevard turns northwest at the GCC site along Sussex Drive and Mackenzie Avenue. Directly across the street are Chateau Laurier, now a privately owned five star hotel, and 700 Sussex, a high end condominium high rise. Further along this path are the offices of Revenue Canada, the American Embassy, the National Gallery, and the Royal Canadian Mint. Turning west on the fork, the boulevard leads across the river to Hull where the Museum of Civilization is located. Continuing on Sussex, the Boulevard bends north along the riverside, terminating at 24 Sussex, the home of the Prime Minister. As the Prime Minister enters the city centre in the morning, presumably along this corridor, the first site that currently welcomes him is the blank stucco wall on the north face of the union station.

National Gallery

American Embassy
Royal Canadian Mint

Revenue Canada

Byward Market

Byward Market (John McQuarrie)

Rideau Street from Sussex and Rideau Intersection

Byward Market

To the north of the GCC lies Lower Town, the most proximate area being the By Ward Market which serves as an open air market in the summer and retail and entertainment district year round. Along Rideau Street to the northeast, the retail and entertainment venues often take on a larger scale with several department stores and chain stores and two cinemas. This is the largest of the few areas of the city that remain busy throughout the day and evening every day of the week. Located directly across Colonel By Drive to the northeast is Rideau Centre, Ottawa's largest retail centre, and the Westin Hotel.

Colonel By Drive corner
entrance to Rideau Centre

Westin Hotel

Rideau Canal at Mackenzie Bridge

Ottawa Congress Centre and Department of National Defence

National Arts Centre

City Hall

To the east, also along Colonel By Drive is the Ottawa Congress Centre followed by Mackenzie Bridge and then the Department of National Defence. Further west is the low-rise residential neighbourhood of Sandy Hill and the University of Ottawa Campus.

To the south lies the high-rise commercial district of Centretown. It begins at Spark Street, butted up against the parliamentary precinct, and extends southeastward for half a dozen blocks, where the urban fabric makes an abrupt transition to a generally low rise residential neighbourhood. The Confederation Boulevard branches southeast on Elgin from Confederation Square, beyond the National Arts Centre lays City Hall. As Elgin Street continues outward, its business district atmosphere gradually shifts to that of pubs and restaurants.

Confederation Square and War Memorial

Spark street

Located at the meeting point of four major roads, and four distinct neighbourhoods/precincts, the GCC maintains a privileged position as a place of intersection in the one of the busiest areas, one who's potential to provide a compelling public arena for national and civic politics which has yet to be actualized.

federal government
municipal government
retail
leisure
hotel
university of ottawa
commercial

Sussex and Rideau Intersection from above

Design

It is difficult for the GCC to capture the collective imagination of the population as it does not feature prominently into the everyday lives of locals or visitors from around the country. A very problematic aspect of the existing site condition the inhospitability of the urban fabric. Rather than celebrating the institution of the GCC, the historical importance of the site in shaping the city, or the variety of culturally and politically rich surrounding that meet at this corner in a spatial narrative of everyday life, the area has been turned over blindly to the technocratic predilections of traffic engineers, creating the non-space of automotive thoroughways.

With the main entrance of the GCC relocated away from the main intersection, the activity at the GCC goes relatively unnoticed. Furthermore, the new entrance is a clumsily made stucco and drywall addition that is uninspiring and unrepresentative of the GCC. The GCC building understates itself as the institution of political dialogue. Its insular design excludes the public from participating in it through the narratives of their everyday life and prevents the GCC from participating in the everydayness of the public.

The internal layout of the GCC is entirely compartmentalized with long narrow corridors. The design attempts to compartmentalize discussion and, in plan, does not engender flexibility or openness in the conference experience. The example of the “Kitchen Cabinet” illustrates an experience that is well known to most conference goers, which is that more often than not, the most valuable discussions happen outside the scheduled conference sessions.

Pedestrian underpass on site

Main entrance addition addition at the rear

Plaza

“So the *urbs* or *polis* starts by being an empty space ... and all the rest is just a means of fixing that empty space, of limiting outlines... The square... This lesser rebellious field which secedes from the limitless one, and keeps to itself, is a space *sui generis* of the most novel kind in which man frees himself from the community of the plant and the animal... and creates an enclosure apart which is purely human, and civil space.”

*Jose Ortega y Gasset*¹

¹ Rowe and Koetter. P.50

² Low. p.33

The plaza has been foremost amongst public spaces as a place where the conflicting values and agendas of diverse social groups have confronted one another and resolved themselves. Traditionally, the plaza has been the centre of cultural expression in its design (form) and in the activities of the inhabitants (space). The Plaza has been the backdrop for urban life, the place for intersubjective participation in the form of daily interaction and commerce. Often the plaza becomes the contested terrain as various groups struggle to assert themselves. Low states:

“The aesthetic, political, and social aspects of the plaza are dynamic, changing continually in response to both personal action and broader socio-political forces. They are contested through conflicts about use, design, and meaning of space.”

*Setha M. Low (2000)*²

View of GCC and Plaza from Westin Hotel tower

³ Ibid. p.35

It is these interactions and conflicts that give their own unique meaning to the space, and in their resolution the plaza becomes “an arena where diverse social groups and social classes appear together in a highly structured way, segmented by space and time, yet intermingling and interacting on the same site.”³

Removing the dedicated merging lanes on the north side of the GCC allow room for an open public plaza with ample walkways to reintroduce the possibility of pedestrian engagement with the site. The area is directly faced by a variety of programs – two hotels, an affluent condominium high rise, a large shopping complex, and two restaurants - and as illustrated earlier, the site is located in a heterogeneous part of the city, suggesting the possibility of heavy cross filtration and, given the opportunity, aggregation of people.

The plaza introduces the public into a dialogue with the GCC building in urban space placing people on the site rather than automobiles. In the nonspace of the automobile, the GCC is a mere landmark. In the space of the pedestrian, the GCC becomes a place. And incidentally, the plaza becomes one gesture to fulfill the NCC’s ambitions to assert this corner as a gateway/node along Confederation Boulevard.

The contestation of urban space between urbanites and the GCC at the boundary of the Capital and the Municipal reconstitutes polity in the form of a minor localised resistance by the citizens against the federal government.

View of GCC addition from plaza

Government Conference Centre

The renovation of the GCC sees the main entrance moved to the north facade, facing the new plaza, making the daily activities of the GCC a spectacle for loiters and passer bys. The entrance facade not only participates in the interplay of public and private through transparency and openness, it acts as the bounding limit which anchors the plaza. It marks the monument of a national institution of significance and gateway point for the Confederation Boulevard and the parliamentary precinct.

The designated heritage elements of the building are preserved, namely the south and west facades and the main hall, which was once the waiting room of Union Station. The rest of the building is gutted and refit with the GCC program. In the design proposal, the north western face of the building, which is currently a plain stucco wall facing the heavily trafficked corner, now lunges out towards the plaza with two leaning concrete volumes that reveal a gap for the new main entrance that provides a direct visual connection between the new central atrium space of the GCC with the plaza. The north western facade on Rideau Street, which is a heritage facade, is preserved. The building envelope is rebuilt as a transparent glass façade to reveal the Conference activity to the streetscape. The southwest facade is treated similarly except that the building envelope is recessed to allow for an arcade space. The glass facade is punctured by the extensions of the concrete forms to give a suggestion of the renovations on this mostly preserved face.

Plaza

Canadian History Centre

Train Station

Boat Station

Site Plan

North East Elevation

View of GCC from Rideau Centre office tower (opposite)

Arcade - Sussex Dining Room patio

South West Elevation

View of Rideau Street facade and train and boat stations

North West Elevation

View of GCC from Boat Station

South West Elevation

The notion of embodiment is not reserved for public urban space. It applies to buildings as well. In the case of a conference centre, the building is a framework for the meeting of various parties with the intent for negotiating or sharing of information. The GCC can best serve this purpose not with the strict compartmentalization of the program that would engender an atmosphere of rigid schedules and structure but with open and flexible planning that enable discourse in a comfortable setting. With this mindset, the new design brokers conference rooms with naturally lit atrium space, open lounges and meeting spaces, and an open air internal garden rather than the narrow hallways and enclosed lounges of the existing GCC building. The building design must recognize that conference discussions are neither limited to their slotted times nor are they confined to conference rooms.

The main hall serves a new purpose, and that is as a ceremonial hall for Canadian citizenship on Canada day. This hall once welcomed newcomers to Ottawa as they disembarked from their train. Now it will welcome new citizens. The axis of the train station will also serve this purpose. The prospective citizens would enter from the east, the direction of the train platforms, for the ceremony. They would then ascend the decorative stairs and exit on Rideau Street to a throng of cheering Canada Day celebrators.

Section of Atrium including Plaza

Ground Level Plan

Main Hall

Second Level Plan

Collage of main lobby perspectives

Third Level Plan

Atrium from fourth floor
bridge over entrance

Fourth Level Plan

Atrium from fourth floor
hallway by Centennial Room

Fifth Level Plan

Fifth floor central bridge
over atrium space

Sixth Level Plan

View of internal courtyard

Fifth floor near South
western facade

Looking out towards National
Gallery from Centennial Rooms

Fourth Floor Lounge

Atrium space from
fourth floor lounge

⁴ Oliver. p.5

Public Transit

Ottawa's growth in the last half century has been largely a suburban expansion, supported by automobiles, the federally backed mandate of the Canadian Mortgage and Housing Commission of supporting minimal down payment mortgages to encourage home ownership, and the NCC's predecessors Gerber Plan that called for the decentralization of Ottawa's infrastructure. Outside of the core, which ranges in age from 100 to 200 years old, the typical North American affliction of urban sprawl becomes quickly evident.

In *Democracy and Suburbia*, observing the coinciding trend of increasing suburbanization and voter apathy over the second half of the 20th century, J. Eric Oliver undertook an empirical study to establish whether or not the physical design of urban sprawl has implications on authentic civic participation and the democratic process. Oliver upholds that for democracy to function, "municipalities need to adequately encompass the social cleavages and disagreements that occur amongst people within a particular area,"⁴ but his study finds that the well documented outcome of racial and economic segregation has had political implications as it has distorted the social and political terrain by concealing conflicting values through the establishment of homogenous localities. The privatized approach to urban development transforms citizens into consumers, whereby the scarcity in desirable locality and disparate affluence create an inherent inequity in the political agency of dictating public policy. The geographic reality of urban sprawl is a condition of citizen demobilization wherein a segment of the population, through economic and geographic inequity is unable to assert itself meaningfully in the political sphere.

Commuter train station
along Rideau Canal

1) This map forms part of the Transportation Master Plan of the City of Ottawa and must be read in conjunction with the text.
 2) This map is intended as a framework for planning and design; consequently alignments of proposed corridors are approximate and subject to detailed study.
 3) The rights of way to be protected for all future Rapid Transit Corridors is 40 metres. Additional rights of way may be required at selected locations for provision of local transit terminals and other transit related infrastructure as well as pedestrian and cycling facilities as appropriate.
 4) The City, in consideration of potential long-term public transit requirements, shall protect rapid transit corridors beyond those shown in this schedule to enable each of the identified rapid transit corridors to extend through to the edge of the urban boundary.
Note:
 1) La présente carte fait partie du Plan directeur des transports de la Ville d'Ottawa et doit être consultée en se reportant au texte même du Plan officiel.
 2) La présente carte doit servir de guide en matière de planification et de conception; il s'ensuit que le tracé des routes proposées n'est qu'approximatif et donnera lieu à une étude plus approfondie.
 3) L'emprise à protéger pour tous les couloirs futurs de transport en commun rapide est de 40 mètres. Il peut s'avérer nécessaire d'utiliser au besoin d'autres emprises à certains endroits afin de permettre l'installation de terminus de transport en commun local et d'autres infrastructures liées au transport en commun de même que des installations piétonnières et cyclables.
 4) La Ville, compte tenu des besoins à long terme potentiels en matière de transport en commun, doit protéger les couloirs de transport en commun rapide au-delà de ce qui figure dans le présent document afin que chacun de ces couloirs puisse être prolongé jusqu'à la limite urbaine.

Transportation Master Plan - Map 5 **Rapid Transit Network** Prepared by: CITY OF OTTAWA, DEVELOPMENT SERVICES DEPARTMENT, RESEARCH & TECHNICAL SERVICES DIVISION, September 2003 **Plan directeur des transports - Carte 5** **Couloir de transport en commun rapide** Préparé par: VILLE D'OTTAWA, SERVICES D'AMÉNAGEMENT, DIVISION DE LA RECHERCHE ET DES SERVICES TECHNIQUES, Septembre 2003

Existing Bus Rapid Transit	Transport rapide par autobus actuel	Transit Station Existing	Station du transport en commun actuel
Existing Rail Rapid Transit	Transport rapide par train sur rail actuel	Transit Station Future Defined	Station du transport en commun futur endroit déterminé
Future Bus Rapid Transit	Future transport rapide par autobus	Transit Station Future Possible	Station du transport en commun futur possible
Future Rail Rapid Transit	Future transport rapide par train sur rail actuel	Park & Ride Lot Existing	Parc-O-Bus actuel
Future Bus Transit (semi-exclusive)	Future transport par autobus (couloirs partiellement exclusifs)	Park & Ride Lot Future Defined	Parc-O-Bus futur endroit déterminé
Future Rail Transit (semi-exclusive)	Future transport par train sur rail (couloirs partiellement exclusifs)	Park & Ride Lot Future Potential	Parc-O-Bus futur possible
		Conceptual Future	Avenir conceptuel
		Abandoned Railway Corridor	Emprises ferroviaires abandonnées

The City of Ottawa has already begun to address this condition on two levels of infrastructure. The first, virtual, the amalgamation of the regional municipalities, though conceived of as a money saving solution for the redundancy of services and administration, that act of merging 'pools of taxpayers' under one municipality also has the added benefit of unifying the civic politics on one terrain. The second initiative is transportation infrastructure. Facing rapid population growth, the city is in the process of reforming its public transit system. The long standing decision to favour bus transit was reconsidered and with the success of the pilot light rail project, a new master plan has been approved, calling for extending the light rail system, the bus rapid transit system, and reintroducing semi exclusive rail transit (street cars).

existing bus routes		existing bus stop
proposed boat transit route		proposed street car stop
proposed light rail line		proposed light rail station
proposed light rail line (underground)		proposed boat transit stop
proposed street car line		

The master plan calls for a street car route along Wellington and Rideau. This thesis is slightly more ambitious. In recognition of the site's historical relevance - the Rideau Canal waterway to which Ottawa arguably owes its existence and the building artifact of Ottawa's grand central train station - a municipal boat transit and light rail transit station is proposed. Boat transit could provide an alternate, traffic free seasonal transit option for commuters from the city centre to several prominent locations in the city - Pretoria Bridge and the Canadian National History Museum, Lansdown Stadium, and Carleton University. The opening of the new War Museum building has left its old home available to be annexed by the neighbouring National Gallery of Canada, making space for its satellite gallery, the Canadian Museum of Contemporary photography to move out of its current location in the old railway tunnel under Chateau Laurier. This vacancy facilitates the possibility of introducing a train route that would link the city centre to the Museum of Civilization across the river and potentially lighten the load of interprovincial traffic load on the bridges and streets of both cities,

The addition of light rail and boat transit serves multiple purposes. In the most practical terms, it supplants the automotive traffic that is displaced by the plaza. In a city wrestling with how to best implement a light rail system to handle a projected explosive growth in population over the next few decades, the GCC site is an ideal location a combination of transit systems right in the heart of the city while minimizing urban upheaval. In more idealistic terms, it is a democratic infrastructure that makes the city core accessible. The train station has the potential to amplify the heterotopic character of the plaza and assert it as a space for authentic civic participation and political resistance. It gives accessibility the less affluent members of society to assert themselves in the urban core replete with its five star hotels, high rise condos for the wealthy, and the increasing gentrification of Lower Town.

The train, unlike the automobile, is an intersubjective space, as it is not uncommon for certain behavioural norms and hierarchies to form. My experience of city and intercity train travel in different parts of the world suggests that trains establish their own unique cultures from place to place.

The reintroduction of the train to the GCC site also serves as an act of resistance similar to the plaza against the technocratic management that rerouted the train in favour of the “flavour of the day” technology of the automobile. Ironically, the NCC’s Core Area Sector Plan to promote interprovincial public transit integration and to enhance the linkages between the Capital and municipal realms⁵ is established by contravening it’s passed planning regulations. In this fashion the architect’s representation of a vision can become an act of political resistance against the federally instituted technocracy.

Conclusion

It has been established that the architect does not create the meaning of space. The meaning comes to be through embodiment. The architect does play a role in engendering meaning in space and is also drawn into the political contestation of space. The architect is caught in the conflicting position of simultaneously serving the needs of the client and of society at large. In doing so the architect must remain critical of the terms imposed upon him or her that could undermine this pursuit. The examination of the technological way of being has revealed that technology as a physical or methodological instrument alone that threatens the way we live and make our lives, but that it is produced and coproduced by out technocratic ideologies.

In architectural terms, the tradition of Cartesian thought and humanism has an objective notion of space, a representation of space that is static and outside of time, thus outside of ourselves, for our experience of space is intrinsically temporal. Conceiving of architectural practice as the making of objects, this tradition fetishizes form, privileging it to such an extent that it threatens the notion of time in our very lives. In formalizing the built environment by rationing it labeling it into various discrete components such as work, dwell or leisure, it formulates our lives, imposing rigid structure into the way we live. This way of thinking naturally perceives of a potential future that is a historical end, an objective or goal to guide our progress, progress being a contentious word because it's value is generated internally by the technocratic ontology. In obeying the terms it generates, Technocracy must inherently strive for the systemization of the

lifeworld in practice and in built form. The utopic vision in reality is the homogenization of communities, segregating social differences, inequities and conflicts and rendering them invisible to the ones everyday experience. A fully systemized society has no need for politics, for it operates very much on the metaphor of a machine engine - ordered, managed, and harmonious - whereby success is measured by reason, empiricism, and efficiency.

Utopic visions are clearly a threat to a free and open society. In accepting democracy as an ideal, dialogue and debate must be sustained. The environment built under technocracies terms does not engender these qualities because they require the meeting of differing values, aspirations, or the contestation of shared social and natural artifact or resources. This qualities are fluctuating and temporal embodied and spatial. Lacking temporality, utopia is a nonspace, in capable of providing the conditions for meaningful civic participation or appealing to democratic process.

Phenomenological discourse reintroduces embodiment and perception as the foundation of knowledge. As the cracks in objective and scientific thought begin to reveal their limits, subjectivity or rather intersubjectivity reasserts itself as a means to account for the world we live in and with. The move away from objective form is necessitated as feminist thinkers and other critical theorist who are concerned with the minor clearly identify that the very real inequities that we observe can only be accounted for through the notion of embodiment, and temporality, thus reinstituting subjective *lived* space, a space that is perceived from within, not constructed from the outside.

Architectural discourse and practice in the 20th century was dominated by technocratic terms. Even in recognizing the foils of Modernism, the profession has had difficulty moving past the discourse of architectural form. Considering the contemporary reality, at the dawn of a new millennium, that privileges, perhaps out of the necessity of scale, virtual representations of social union, such as the nation state, and must constantly adjust to capitalism and its appendages, it is a world that must contend with immense structures, structures that can only be made to bend to the terms of the lifeworld through localized resistances. It is in enabling resistance into the everyday where the architectural profession can be of service.

Resistance is not necessarily reactive. It can and should attempt to be proactive. No longer endeavoring to prescribe meaning in architecture, subsuming notions of intersubjectivity and embodiment, architects can work towards open ended spaces, whereby everyday life encapsulates the interrelationship of people and groups in space and time. This can be enacted by providing for spaces and places that are layered with a diverse uses by diverse people, making it a contested space but also a shared space for the differences to meet face to face in civic participation. The architect must balance the needs of the client with the needs of society, by recognizing that the ownership of land and building artifact is itself a social and political allowance. With this in mind the architect can critically challenge the client's absolute dominion over space and redistribute power through the architectural frame.

Accepting representational, *lived* space is still the acceptance of an idea. Architectural practice is not transformed such that would abandon representation as its way of imagining and proposing potential futures. What does change is the content of the representation, as it shifts away from privileging the formal object and towards *lived* space. It conceives of architecture not simply as a place for prescribed hermetic events but potentially ambiguous and dynamic, in contention and open to appropriation. It is a practice that must look at the frame it sets on everyday life at various scales, for this frame is the production of the human lifeworld.

Appendix

Bibliography

- Aarseth, Espen J. Cybertext: Perspectives on Ergodic Literature. Baltimore, Maryland: John Hopkins P. 1997.
- Alderman, Harold. "Heidegger's Critique of Science and Technology." Heidegger and Modern Philosophy. Ed. Micheal Murray. New Haven: Yale U P. 1978.
- Arendt, Hannah. The Human Condition. Chicago: U of Chicago P. 1958.
- Benjamin, Walter. "Art in the Age of Mechanical Reproduction." (1936). Illuminations. New York: Schocken Books. 1969.
- Brado, Edward. Brado's Guide to Ottawa. Kingston, ON: Quarry P. 1991.
- Burnett, Robert and P. David Marshall. Web Theory. London: Routledge. 2003.
- Carpignano, Paulo et al. "Chatter in the Age of Electronic Reproduction: Talk Television and the Public Mind." The Phantom Public Sphere. Ed. Bruce Robins. Minneapolis: University of Minnesota P. 1993.
- Castells, Manuel. Internet Galaxies. New York: Oxford. 2001.
- Crowe, Norman. Nature and the Idea of the Man Made World. Cambridge, Mass.: MIT P. 1997.
- Dovey, Kim. Framing Places: Mediating Power in Built Form. London: Routledge. 1999.

- Deutsche – “Uneven development: Public Art in New York City.” Out There: Marginalization and Contemporary Culture. Cambridge Massachusetts: MIT P. 1990. p.106-130
- Duany, Plater-Zyberk and Speck. Suburban Nation. New York: North Point Press, 2000.
- Everard, Jerry. Virtual States. London: Routledge. 2000.
- Feenberg, Andrew. Questioning Technology. New York: Routledge. 1999.
- Foucault, Michel. “Space, Power, Knowledge.” Architectural Theory Since 1968. Ed. K. Michael Hays. Cambridge, Mass.: MIT P. 1998.
- Gibson, William. Neuromancer. New York: Ace Books. 1984.
- Grant, George. Technology and Empire. Toronto: House of Anansi. 1969.
- Gropius, Walter. New Architecture and the Bauhaus. Cambridge, Mass.: MIT P. 1965.
- Grosz, Elizabeth. “Feminism and the Crisis of Reason.” Space, Time, and Perversion. New York. Routledge. 1995.
- Grosz, Elizabeth. Architecture from the Outside: Essays on the Virtual and Real Space. Cambridge, Massachusetts: MIT P. 2001.
- Habermas, Jurgen. The Structural Transformation of the Public Sphere. 1962.
- Halbreich, Kathy. “Forward.” Public Address: Kryztof Wodiczko. Minneapolis: Walker Art Centre, 1992.

- Haraway, Donna. "A Cyborg Manifesto: Science, Technology, and Socialist-Feminism in the Late Twentieth Century." Simians, Cyborgs, and Women: The Reinvention of Nature. New York: Routledge. 1991.
- Hardt, Michael and Antonio Negri. Empire. Boston: Harvard U P. 2000.
- Heidegger, Martin. "Questioning Concerning Technology." Basic Writings. Ed.: David Krell. San Francisco: HarperCollins. 1993.
- Holzman & Tosh. Ottawa: Then & Now. Ottawa: Magic Light Publishing. 1999.
- Isozaki, Arato. "Introduction." Architecture as Metaphor: Language, Number, Money. Ed. Michael Speaks. Cambridge, Massachusetts: MIT P. 2001.
- Jordan, Tim. Cyberpower: The culture and Politics of Cyberspace and the Internet. New York: Routledge. 2001.
- Le Corbusier. Towards a New Architecture. Trans. Frederick Etchells. New York. Dover P. 1986.
- Lefebvre, Henri. The Production of Space. Trans. Donald Nicholson-Smith. Cambridge, Mass.: Blackwell. 1991.
- Lloyd, Tanya. Ottawa. Toronto: Whitecap Books. 1997.
- Low, Setha M. On the Plaza. Austin, TX: U of Texas P. 2000.

- Madison, Gary B. "The Ethics and Politics of the Flesh." Merleau-Ponty's Later Works and Their Practical Implications: the Dehiscence of Responsibility. Ed. Duane H. Davis. Amherst, NY: Humanity Books. 2001
- Margolis, Michael and David Resnick. Politics as Usual: The Cyberspace "Revolution". Thousand Oaks, CA: Sage Publications. 2000.
- McCaughey, Martha and Michael D. Ayers. Cyberactivism. New York: Routledge. 2003.
- McLeod, Mary. "Architecture and Politics in the Reagan Era: From Postmodernism to Deconstructivism." Architecture Theory since 1968. Ed. K. Michael Hays. Cambridge, Massachusetts: MIT P. 1998, pp. 680-702.
- McLuhan, Marshall. Understanding Media: the Extensions of Man. Scarborough, ON: Mentor. 1964.
- Merleau-Ponty, Maurice. Primacy of Perception. Ed.: James M. Edie. Chicago: Northwestern U P. 1964.
- Merrifield, Andy. "Henri Lefebvre: A Socialist in Space." Thinking Space. Ed. Mike Craig and Nigel Thrift. New York: Routledge. 2000.
- Mitchell, C. Thomas. Redefining Designing: from Form to Experience. NY: Van Nostrand Reinhold. 1993.
- Mitchell, Robert and Phillip Thurtle. Data Made Flesh. Ed Mitchell and Thurtle. New York: Routledge. 2003.

- Mitchell, William J. e-topia. Cambridge, MA: MIT Press. 2000.
- Mumford, Lewis. "Paleotechnic Coketown." The City in History. New York: Harcourt, Brace, and Co., 1961.
- Nakamura, Katherine. Cybertypes: race, ethnicity, and identity on the Internet. New York: Routledge. 2002.
- Ockman, Joan. "Toward a Theory of Normative Architecture." Architecture of the Everyday. Eds. Steven Harris and Deborah Berke. New York: Princeton Architectural Press. 1997. 123-152
- Oliver, J. Eric. Democracy and Suburbia. Princeton: Princeton U P, 2001.
- Fielding, Helen A. "Envisioning the Other: Lacan and Merleau-Ponty on Intersubjectivity." Merleau-Ponty, Interiority and Exteriority, Psychic Life and the World. Ed. Dorothea Olkowski and James Morley. Albany, NY: State U of New York P. 1999.
- Perez-Gomez, Alberto. Architecture and the Crisis of Modern Science. Cambridge. Massachusetts: MIT Press. 1988.
- Plato. Republic. G.M.A. Grube trans. Indianapolis: Hackett Publishing Company, Inc., 1992.
- Pope, Albert. Ladders. Houston: Rice University School of Architecture, 1996.

- Poster, Mark. "Desiring Information and Machines." Data Made Flesh. Ed Mitchell and Thurtle. New York: Routledge. 2003.
- Postman, Neil. Technopoly: the Surrender of Culture to Technology. New York: Knopf. 1992.
- Richards, Simon. Le Corbusier and the Concept of Self. New Haven, Massachusetts: Yale U P. 2003.
- Rheingold, Howard. The Virtual Community: Homesteading on the Electronic Frontier. Reading, MA.: Addison-Wilson. 1993.
- Spigel, Lynn. "The Suburban Home Companion: Television and the Neighbourhood Ideal in Postwar America." Sexuality and Space. Ed. Beatriz Colomina. New York: Princeton Architectural P, 1992.
- Strate et al. "Surveying in the Electronic Landscape: an Introduction to Communication and Cyberspace." Communication and Cyberspace. Cresskill, NJ: Hampton P. 1997.
- Venturi, Robert. Complexity and Contradiction in Architecture. New York: MOMA. 1966.
- Welter, Volker M. "From locus genii to the heart of the city: embracing the spirit of the city." Modernism and the Spirit of the City. Trans. Iain Boyd Whyte. NY: Routledge. 2003.
- Whyte, Iain Boyd. Modernism and the Spirit of the City. NY: Routledge. 2003.

Woods, Lebeus. Anarchitecture: Architecture is a Political Act. New York: St. Martin's
P. 1988.

Woods, Shirley E. Jr. Ottawa the Capital of Canada. Toronto: Doubleday Canada.
1980.