

## **The Age of Imagination--Placing Art and Design at the Centre**

The force of 21<sup>st</sup> century transformation begs for a concept that embraces the social capital of the creative class, and more than that, describes the very processes that activate knowledge, turning it into discovery. When Richard Florida describes, “an age of pervasive creativity that permeates all sectors of the economy and society”, he conjures in my mind, an image of a multivalent flow of power that swirls within the DNA of any economic, social or cultural transformation—the energy within the triple helix.

That force is “imagination”, the capacity to think beyond constraint, and then to render as real. And it is here that culture matters—for artists, designers, and other cultural makers transform the stuff of mind to stuff that matters and is matter. Artists bring a disciplined imagination that can melt and meld a problem – making is soluble and solvable.

Creativity is a messy business. It requires freefall, free diving, rupture through repetition, muck, extraction, revisionism.

Without even thinking we live and breathe the power of popular culture for the 20<sup>th</sup> century has been the epoch of the consciousness industries (mass media, fashion, advertising, games) and the *métier* of the consciousness industries— is the ability to unleash the collective imaginary of society. And what is perhaps so compelling about the current moment, with its focus on participatory media and the “prosumer, is the potential permeability of a culture of the imagination through broad layers of society.

In our recent strategic planning work at the Ontario College of Art & Design we built scenarios that addressed the possible futures of creativity, placing these within a larger analysis of social, economic and political change. We looked at emerging social values and asked: Would the tools and expressions of culture achieve a high level of influence, challenging, leading and shaping society’s values and perspectives? Or would culture become narrow, more service-focused, bound by history, buffeted by

immediate values in society? The sustainability of the world's resources and the level of conflict in the world and the forms that resolution would take were key elements of a second axis. Would the world become more open, outward looking and integrated as part of a global community? Or could the world become more inwardly focused and narrow in a mosaic of local communities and interests? Were there meeting grounds between these axes?

This exercise is particularly relevant because we are seeing the dramatic re-enactment of the Age of Anxiety of the 1920s, at least in some quarters. Madeleine Bunting describes this condition in *The Guardian*: “We live for longer and in greater security than ever before, yet...fear has become the dominant currency of public life — our politics and our streets — and it reaches deep into our most private emotions.”<sup>i</sup>

Unlike the prison, the television, the school, and other systems of authority, while there is a multi-point quality to the structures of the Internet, monitoring is polyvalent and multi-located. Reality television makes participatory surveillance into a cultural enterprise, with its overarching intimacy and 24/7 attention to the mundane, in combination with a heightened sense of desperation about social mobility (Murray & Ouellette, 2004). Theorists such as Sandy Stone, Sherry Turkel and Goert Lovinck argue that the Internet has opened possibilities. Many participants in online communication are contradictory, protective of their right to contribute to dialogues and to control their data at the same time that they want to shop online and feel secure against terrorism. As DJ (Spooky) and theorist Paul Miller demonstrates, consumer programmers and young music lovers created peer-to-peer systems that disrupted highly centralised server control and thin clients, reinstating control to the originator of a communication (Miller, 2004). Consumers use mobile phones to build active communities. And, lest we forget, Google's almost \$1.2 billion acquisition of Youtube, with DIY videos, porn and documentaries.

On the same day, a prize winning Texas schoolteacher with 23 years of teaching experience was sacked after she allowed her pupils to see a nude art work during a museum field trip. A parent

complained that his child had been exposed to "an abstract nude" - a Greek funerary relief from 4BC depicting a marble torso. (This is not sauna culture).

The cultural moment—with its raw materials for futurists—is best understood as a complex terrain where the stakes are lateral flow, command and control, repression and openness. This context introduces a compelling urgency for art in the 21st century, an art that, with all of its complexity and challenges, allows us to live within and resolve — “the rich texture of the present.”<sup>ii</sup> Consider Carsten Höller—his Tate Modern Unilever Commission installation, Test Site 2006, is a series of slides where visitors can experience both the visual spectacle of watching people sliding and the "inner spectacle" of the state of simultaneous delight and anxiety as they have a go descending in the slides.

In a recent poll, American teens expressed optimism that future inventions and innovations would be able to solve important global issues, such as clean water, world hunger, disease eradication, pollution reduction and energy conservation. Lemelson-MIT Program Director Merton Flemings said,

Teens' belief that science and technology may hold the answers to our biggest societal challenges is encouraging, but it also begs the question: Is this generation properly equipped and motivated to invent solutions to these mind-boggling challenges?

In fact, we need to fuse art & design capability right into the science and technology learning and solution matrix—because art and design combine deconstructive understanding with human needs sensibility. It is that fusion that can bring the ipod revolution, or make a Karim Rashid chair a household word.

The problem we must address is deeper. In his history of science and studies of the emergence of techno-culture, philosopher-sociologist Bruno Latour has shown the ways that scientific and technical invention are “black-boxed” – that is, represented as finished, whole products whose inner working, or mode of development, cannot be seen. Society naturalises inventions and science appears as a free-floating enterprise, operating as an engine outside of society, “without people as carriers” (Latour, 1987, p133). The mystified and invisible processes of invention make the intentions and ideas behind each new stage of technology appear as absolutes. To create an innovation culture, (one that is

driven by possibility) we need to open these black boxes--a gesture that participatory tools, open source, user-centred design and certainly artists' work with technology has begun.

If I suggest that the dialogue of creativity has to place culture at centre stage, what do we mean by culture? Ontario, Canada is adopting a cultural policy that would acknowledge the texture of lived culture, with all of its informal and formal modes of expression. Cultural resources are what make a place distinctive and unique, and their potential and transformative power lie in the skills of its people, which are unleashed through their creative practices.”<sup>iii</sup> “The cultural ecology is the complex system of social structures and cultural features in relationship to the rest of the social and physical environment...The system is complex and multidimensional...A growing body of evidence indicates that a healthy cultural ecology supports sustainable economic development in the increasingly important creative economy.”<sup>iv</sup>

A cultural ecology provides intrinsic (communication, constructing meaning, creating a sense of play from experimentation and discovery), instrumental (promoting learning, building cohesion, trust, promoting health, sustainable communities; innovation) and institutional (history carrying for a culture, facilitating) values. Because of this fundamental role, culture has been described as the “fourth pillar”, or even better, the column of energy driving the helix. (Culture--The Fourth Pillar, Conference, Australia, 2004)

Let's return to our present context.

The digital revolution is the mainstream—and that revolution has been televised—it is ubiquitous. The disruptions, the edge conditions, have overtaken. Timothy Druckery, writing over ten years ago foresaw the ways the digital would become biotechnical:

The cognitive system becomes a more pertinent subject than the communicative system. Systems supplant cultures. Networked communities, the emergence of bio-computing, and genetic mapping represent fields in which information has become essentialism...a consideration might be made of the image not only as a signifier, but rather as an event...

In other words, knowledge has become cognitive, sensory and integrated. And the monumental problems, global warming, energy shortages, require material and social answers.

Cultural tools are critical because the body (literal) and its metaphor (Nature) are the stakes. This is an era that requires the EMBODIED knowledge of art practice, theatrical improvisation, design brainstorming, physical game play to meet the rational approaches of science and to invent perceptions beyond our current capacities. Techniques like location storming (where teams develop a charrette in context) allow solutions to arise in situ.

We need culture to understand time. Time is the Long Now, quantum, non-linear. Time is the matter of systems change, the juncture where science and art flow together, where the non-living and living meet. Artists of all kinds, are experts in time disruption and management, prescient in expressing now and soon, capable of showing unseen dimensions. Great designers such as Will Alsop or Bruce Mau, understand the interpolation of futurism and the present—they sniff the zeitgeist—placing their inventions at the next moment, yet within reach. Cleaning up the mess of the past is required while we make the neat future.

The philosopher Gilles Deleuze proposed that it is only if we “rethink time” that we will be able to transform our future and ourselves. He argued that, “Through memory, concepts, art and philosophy, we can move backwards and forwards through the flow of time; we can think other durations, and we can disengage perception from the apparatus of prompted actions.” (Deleuze, 1989) He suggested that time could be an explosive force, not glue. Neurobiologist Francisco Varela concurs. He describes “...the rich texture of the present, its “thickness” (retention, nowness, protention); and “the multiscale hierarchies of temporal registers that underlies the flow of time”. Mark Hansen in *New Philosophy for New Media* suggests that machine time becomes a force that can allow a window into time, for example, machine vision overrides human vision (if you have ever looked through with an electron microscope)--

and as such it is imagination that unites these limits of our perception with possibility -- allowing new realisations, a new vitality, one that stimulates our desire to be alive, to discover, to announce and redefine our sense of humanness.<sup>vi</sup> He notes the abilities of artists' works to "compel us to confront the rich temporal depth, or affective bodily spacing, that underlies our complex experience of time".

Feminist theorists and writers also attempt to find ways of producing and understanding new forms of dynamic language. Ethicist Rosi Braidotti underscores "the genderisation of time and space as well as history and memory" (2006, p155). In her view, "the continuous present is set in opposition to the tyranny of the past" (p167). Language is living matter... with all kinds of ethos and musical variations." (p175) Stuart Hall, the Black British theorist looks at temporality through "hybridity, syncretism, multidimensional temporalities, the double inscription of colonial and metropolitan times" (Hall, 1996, quoted in Braidotti, op cit, p155). Braidotti, like Deleuze, poses the subject as in a state of constant becoming, "... Ethics means faithfulness to this potential, or the desire to become." (p163) Philosopher, poet and novelist Hélène Cixous refuses narrative and closure, preferring a multiplicity of readings of the present and future. She states that it is only through moving through time freed from "the conventions of linear, sequential narrative" that the reader can achieve the full potential and spectrum of the text (experience), or, *jouissance*, "the whole spectrum of pleasure and enjoyment, sexual and otherwise" (p118).

This notion of "*jouissance*" jostles up nicely against concepts of "play" and "flow" explored by Brian Sutton-Smith, a semiotic games theorist. He would argue that game structures will replace narrative altogether and that games echo natural processes of evolution. Sutton-Smith looks at the many vocabularies of play. It can be understood as a form of bonding, as a chaotic or self-transcendent "flow", as a means of reducing conflict, as a mix of sensory knowledge and reason, as an exploration of the radical variability of meaning, as a means to deconstruct reality, as a means to multiple goals, as a means of adaptation and variation (Sutton-Smith, 2001).

As we heard in the workshops yesterday, linguistic differences and assimilations are benchmarks within collaborative experiences – when, over time, different disciplines learn to talk to each other, understanding specialised terms, a world of potential unlocks. Sociologists and anthropologists, such as Bowker and Star, discuss boundary objects, which are objects that unify disparate spaces as gifts of exchange, allowing the creation of new relationships of power. The recipient begins to “own” the gift as much as does the donor (Star, 1989; Bowker & Star, 1996). In cross-disciplinary dialogue these gifts can be terms or words. Hence “semiotic artefacts are often the ‘boundary objects’ that mediate non-local, scale-breaking interconnections.” Concepts and words can draw one discipline into another’s field.

The brainstorm focuses on solving a problem. A brainstorm suspends judgment. It emerges new definitions. It combines irrationality and irregularity with intelligence – the brainstorm means to break through assumptions. Participants deliberately develop broad ideas as fast as possible. Brainstorming is a lateral thinking process. Far-fetched ideas can turn out to be appropriate solutions. Brainstorming is now often connected to body storming, to physical improvisation--acting out possible design solutions through participatory design. And body storming has become location storming. The relationship between face-to-face interaction (wherein facial expression and other forms of body language, as well as tone of voice and other contextual cues, inform meaning) and networked conversation or performance (where these cues are largely lacking or may be represented by other cues) cannot be underestimated. These processes are cultural!

So this time is truly a cultural moment, one that needs to again and again bridge engineering and cultural practices.

Cultural producers create contexts. At their best, the “sociable media” as MIT scholar Judith Donath calls them, of the 21<sup>st</sup> century such as Myspace, blogs, VOIP systems like Skype, , social networks, photo, video and music file sharing (Youtube, Flickr), text messaging, blogs and their

aggregators, wikis, & on-line social and game spaces like Second Life, are characterized by virtual gift giving. At the same time personalisation and the direct sharing of stories and opinion are hallmarks of 21<sup>st</sup> century mass culture. This sharing occurs in a context that is increasingly collaborative, peer to peer, and engaged with process as much as product, style as much as function, not only in the West, but around the world as individual expression is equally heightened. These social and individual qualities, though enabled by technology, are disruptions, or side effects of the last great technological revolution. It is the global nature of this sociable media transformation that again, requires the capacity & also the possibility to think across cultures and to bridge to the imaginative powers outside of our own imaginations.

Culture has the capacity to create equitable global relationships. Glocal Culture can really shake that long tail! (Chris Anderson) The concept of “Glocal” – the connections between local and global communities—acknowledges the pervasive impacts of globalization on all economies while understanding the ongoing power of location. Cultural contact can be woven from the bottom up, through equitable cultural exchanges. The Internet provided the vast bridge across locations to create communities of interest and investment opportunities. Systems like Sellaband allow investment in alternate culture.

Mobile and locative technologies and the ongoing specificity of place as well as systems of control, created a double dimension of localism and globalism. Resistance to globalization has resulted in new economies, such as the Grammine bank that focus on micro-economic development with technological systems that take advantage of the world economy. The Latin American phenomena—combining Argentina’s refusal to collapse in the face of the IMF hand in hand with a cultural renaissance that is ironically making that country a tourism investment magnet, Brazil’s resolute insistence on open source, in part as a means to bring literacy and cultural tools into the favelas, Bolivia’s indigenous revolution—all draw on imaginative economic and creative models. All require the need to navigate



respectfully, creatively and with intellectual integrity in a world of equitable diversity. The long tail in combination with access to international cultural imagery has created an appetite and economy for world music, alternative culture and art forms that are beyond the barriers and into the barrios of the world.

Art, design, culture is increasingly practised and recognized across cultural boundaries and from hybrid sources. Fundamental work is to be done in equitable partnership with the developing world. This would be the sort of social imagination brought together Dean Kamen the inventor of the Segway and Iqbal Quadir, the inventor of the Grameen Telephone Company to develop a new, solar powered miniature clean water machine that will dramatically eliminate disease. The project is, built on, “a distribution model fashioned after Grameen Phone’s business, where village entrepreneurs (mostly women) are given micro-loans to purchase a cell phone and service. The women, in turn, charge other villagers to make calls.”

Artists and designers are creative strategists. It would be wise for companies to consider placing artists and designers into key business positions, for example on their board of directors and of placing artists and designers in key positions throughout their companies, directly involved in the critical planning of new products, processes and evaluations. Artists and designers could help companies to unilaterally adopt participatory design not just user testing—where the end user is engaged in the design process; creative improvisation and brainstorming; body storming; visualisation, as ways of moving their thinking closer to user needs?

Global and local citizenship, crisis resolution and peace making have never been so critical. We Need New Forms of Social Cohesion & we Need Culture to produce it. Karl Deutsch (1957) importantly described the nature of social cohesion afforded by a united community, a cohesion indicated by the cultivation of mutual loyalties or “we-feeling”, trust, successful prediction of behaviour and the ability of people to engage in cooperative action.<sup>vii</sup>

Innovation collaborators operate within different cultures and even physical contexts.<sup>viii</sup>

Studies such as the comprehensive National Science Foundation's *Beyond Productivity: Information technology, innovation and creativity* indicate that creating a truly conjoined culture, with trust and "we-feeling", requires relentless and attentive labour as well as institutional support (NSF, 2003; Packer & Jordan, 2001).<sup>ix</sup> Effective collaboration, social problem-solving, citizenship, all require cohesion across complex boundaries. This requires the creation of shared culture.

We could make citizenship an imaginative act. "It is above all by the imagination that we achieve perception and compassion and hope." Ursula LeGuin

Artists and designers can engage with building citizenship. Youth at risk could rather be seen as potential influencers, communicators and working culture makers. The elderly can engage through culture. Citizenship can be associated with engagement, pleasure & empowerment, with imagining solutions to problems. Cities and nation states can use culture to activate communities, to bridge boundaries, to keep our city clean, to resolve disputes....to engage communities in participation, in decision making.

Artists can help the public to reclaim our urban streets as spaces for public dialogue, debate, pleasure and exchange. Toronto recently undertook Nuit Blanche, a night of visual, media and performance art that went from dusk to dawn and drew a half million people. It was a model of safety and heralded a zeitgeist of cosmopolitan citizenry.

The future needs an international, multi-generational talent base that includes all children. Learning would start with the learner and be social as well as individual. "We especially need imagination in science. It is not all mathematics, nor all logic, but it is somewhat beauty and poetry." Maria Montessori Schools need to be encouraged to use culture, art, music, dance, to create wisdom, engagement, numeracy and literacy, to allow for multiple learning styles What if society did all that it could to encourage the trend towards self-motivate learning? There is extensive proof that learning in

the arts creates capacities in science, mathematics and social skills (if you have doubts check the web site of The Arts Education Partnership (AEP) an American national coalition of arts, education, business, philanthropic and government organizations that demonstrate and promote the essential role of the arts in the learning and development of every child and in the improvement of America's schools—it holds extensive research findings). Changes in the forms of knowledge and communication, in the nature of learners, combining to require a more holistic perspective to cultural learning. It is applied across disciplines, links theory and practice. Students span all ages, they bring diverse life experience with them, they bring a prosumer attitude towards learning, they are technologically literate, learning requires new metaphors such as gaming

The world needs a different research model—an action laboratory that integrates imagination with other forms of knowledge in research. Ahasiw Meskagen-lskwew, a recently deceased Cree performance artist and Internet visionary said, “Understanding the world as an infinitely complex system of interactions, rather than a plethora of independent causes is a significant move away from reductionist approaches to understanding...perhaps the future lies less in the pursuit of specialized knowledge but rather an understanding of how this knowledge relates to and is influenced by the complexity of the real world.” We would build a unique research and innovation culture—action tanks to fuel discovery and knowledge transfer, linking major universities and industries with art and design and placing human needs at the center of technology.

Research must discover the ways that imagination and curiosity, embedded in the very methods of art and design can be forces in their own right (new multi-dimensional & temporal forms of visual art, new applications for emerging materials, discovery in cognition and perception predicated on art making) and equally link art and design to a larger innovation capacity -- through intensive human factors research, through participatory design, through providing fundamental knowledge about

emotion, semiotics and meaning, through discovery, that helps populations stay healthy and active, makes home care a viable alternative, or humanizes institutional experience, making it more effective and efficient.

The world needs to choose a sustainable pathway. Companies and governments need to put resources towards making sustainability desirable.

This is a youth issue. Increasingly, art and design worldwide must assume responsibility for developing sustainable solutions in all areas, including the nature of building, electronics, local economies, health and welfare. Sustainability must find a new vocabulary, to make it sexy. What if our countries empowered young people to teach both ourselves and those even younger about the importance of sustainability as a choice and the measures that needs to be taken? We would make our cities emissaries for sustainability.

What model for the year 2020 might emerge from these actions?

Let's call it GlobeLab-- an optimistic, but not impossible scenario in which global creativity and problem-solving drive the world economy, with art, design & cultural expression firmly at its core. Everything is connected. Centres of political and economic power are distributed. Ubiquitous computing has raised global consciousness of both common problems, and distinct cultural and social differences. "Local" problem solving includes "Globe Lab's" approach to non-geographic resolutions, through physical and technical networked collaboration. Creative diversity, art, design methods and a cohesive cultural imagination and leadership are valued and harnessed in collaborative ways to help solve major global problems, from poverty and security, to disease and sustainability. "Prosumers" participate with experts, in designing their own products, spaces and experiences and are a powerful influence on art and design. History is valued, grounding individuals and communities, but not reified. Sound knowledge and research support a strong leadership that is bound by ethics, integrity, foresight,

a willingness to experiment and take risks. Not for profits, as well as corporations and world government formations are effective partners. Institutions create global regional allies.

There are multiple speeds of enterprise--the super sonic and risk-oriented, is balanced with slow food, deep appreciation and a fundamental love of pleasure and the exquisite.

For artists, society is rich in paradox, evolving in its thinking and open to exposure and direction in reshaping society's view of itself. Creative collaborative teams are as renowned as individuals. There is cultural expression at every opportunity. The number of people directly employed in what in 2006 is known as "culture" greatly expands. We have mediated conflict, taught the power of multiple or lateral pathways, recycled, melded and made anew, linked pleasure with sustainability, animated our sense of history, reminded ourselves of the multiplicity of beauty, taught our world to revere, to reveal, and helped the world to heal. We are capable of making that world a reality.

The future is uncertain... but this uncertainty is at the very heart of human creativity. Ilya Prigogine

**Welcome to the Age of Imagination!**

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<sup>i</sup> Bunting, M. (2006) <<http://www.guardian.co.uk/comment/story/0,3604,1335171,00.html>> (last viewed May 2006)

<sup>ii</sup> Varela, FJ, Thompson, E & Rosch, E (1993) *The Embodied Mind: Cognitive Science and Human Experience*. Boston: MIT Press.

<sup>iii</sup> Ontario, Page 8

<sup>iv</sup> Ibid. Page 12

<sup>v</sup> Druckery, T, ed (1996) *Electronic Culture: Technology and visual representation*. New York: Aperture.

<sup>vi</sup> Hansen, M. 2005.

<sup>vii</sup> . "Social Coherence and Tolerance", The Metropolis Project <[http://www.international.metropolis.net/research-policy/social/chapt1\\_e.html](http://www.international.metropolis.net/research-policy/social/chapt1_e.html)> (last accessed 16 April 2006)

<sup>viii</sup> NESTA's programmes encourage art and science collaboration in the UK. See Sommerer & Mignonneau, 1999.

<sup>ix</sup> This NSF study looks at the history of cultural and technological innovation and expectations that surround it. See also Century, 2002 and 1999. He examines the criteria for success and failure and the tendency for new forms of science to emerge as well as new forms of culture.