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CONTENIDO

PRÓLOGO

Dr. Luciano Segurajáuregui Álvarez.....7

RESEÑA

Arq. Moisés Bustos Álvarez11

ENTENDIENDO EL PARTIDO ARQUITECTÓNICO DE UN RASCACIELOS, BASADO EN SUS FLUJOS, SU FORMA, CONTEXTO URBANO E INTEGRACIÓN ESTRUCTURAL

Arq. Romano, L. Benjamín25

LA OBRA DE CAI GUO-QIANG APRECIADA DESDE UN ÁMBITO DE ENCUENTRO MULTICULTURAL

Ing. Liliana Di Egidio Mosquera41

EL GRAFITI, UN NUEVO LENGUAJE EN EL ARTE Y EL DISEÑO

Mtra. Elena Segurajáuregui Álvarez57

COLLABORATIVE LEARNING IN INDUSTRIAL DESIGN

Designer Héctor Silva.....69

EL ESTUDIO CALIFICADOR DE LA IMAGEN COMO APAREJO DEL CONOCIMIENTO Y LA OBLIGACIÓN DE UN JUICIO IMPARCIAL

Dra. Isary Paulet Quevedo79

LA IMPORTANCIA DEL DISEÑO

Dr. Julio Frías Peña93

DESARROLLO DE UNA PROPUESTA BINACIONAL DE COMUNICACIÓN DEL LENGUAJE DEL DISEÑO INDUSTRIAL A PARTIR DEL USO DE LAS TIC-PROYECTO COLABORATIVO UAM-UIC

Dr. Luciano Segurajáuregui Álvarez

Dr. Jorge Rodríguez Martínez

D.I. Francisco Javier Gutiérrez Ruíz103

BEYOND THE IMAGINATION IN DESIGN: COMPELLING STRATEGIC VALUE

Designer Alexander Manu121

Designer Alexander Manu

08

BEYOND IMAGINATION IN DESIGN:
COMPELLING STRATEGIC VALUE

DESIGNER ALEXANDER MANU

ABSTRACT

Alexander Manu is a strategic innovation practitioner, international lecturer in over 25 countries, and author¹. He provides strategic counsel and future based advisory to executive teams in Fortune 100² companies in industries as diverse as consumer packaged goods, media, advertising and mobile communications. Alexander lectures around the world on innovation, imagination, change agents and strategic foresight. He teaches “Innovation, foresight and business design” at the Rotman School of Management and at the OCAD University School of Design in Toronto, Canada. For over 25 years he has enabled global companies as diverse as Motorola, Lego, Whirlpool, Nokia and Unilever, to develop strategies that address emerging issues through strategic foresight and pre-competitive business models”. In October 2016, he delivered a Keynote lecture, “Beyond Imagination³” at Universidad Autónoma Metropolitana, Azcapotzalco campus, in Mexico City, as part of the 10th International Congress of Management and Technology in Architecture and Design.

This essay has four parts: The Emerging Context 1, Dissonance and Strategy. The Emerging Context 2, Autonomous Everything. Data as material for the new brief. The last one is The Future as a choice.

1 In the personal site of Manu, this information comes from the “About” section. <http://alexandermanu.com/>

2 The magazine Fortune publishes every year the list of the 100 largest US public and privately-held companies.

3 <https://www.youtube.com/watch?v=Y-lx4sjbw0Q>

In The emerging context 1. Dissonance and strategy, describes how to make sense of the permanent changes in our context, the first task is to map out the emerging context on a regular basis. The Data Set of the Mobile Networked Society is the first tool to path the transformation. The context reveals the new behavior spaces and their sources of value. One's location and real time activity has status value, and hence social capital value. The data set points to a context defined as SoLoMo: Social, Local and Mobile. The Strategic Dissonance is a diagnostic tool that is of great necessity for companies faced with a shifting landscape; we are, at dissonance with our context. The premise of "Strategic Dissonance" as a planning tool is that strategic intent that lacks strategic action due to the speed at which change occurs. Another cause of dissonance is the divergence between what customers' value and old business models.

In the *Emerging Context 2. Autonomous everything*. We are at the moment history turns a corner, behind us is the age of mass manufacture, and the way we connect people with people, and people to goods and services. We are already seeing the first signs of a life in which everything is social, everything is augmented and everything is autonomous. Human invention in the form of technology has always become a condition of our existence. In this process, our tools are extensions of ourselves that have transformed human life, society and the economic system. The current challenge for design is how do we create a deep experience, how do we connect users with moments of surprise and delight, engaging them intellectually and emotionally? By seeking deep experiences, we seek a deeper life, and this is the role technology through augmentation, sociality and autonomous features is starting to play. The framework I propose as an answer is Everything Social, Everything Augmented and Everything Autonomous. Everything social, our interactions, our activities and our information are now shared with a larger audience that ever before, in a context that converges the physical and the real world. For example, the Internet is not merely a technology; but rather the Internet is a behavior. Everything Augmented, for example products, services and augmented places, all add value through nonphysical elements, by providing new layers of insight and new dimensions of experience.

In addition, Everything Autonomous, as objects can react and can adapt to their surroundings, their autonomy means they may exist independently and separate from external force; when everything is autonomous, every experience connects to another experience: this is the value of social technologies.

Data as material for the new design brief. With the introduction of the World Wide Web in 1991, it came a shift in the creation, amalgamation, storage, transmission and transfer of a new material. Pre-1999 the design and development brief was centered around problems, and the necessary capability required was that of problem solving. Post-2000, a new material starts to become part of the development brief. This material is DATA. Information is the organization of data, the presentation of data and the architecture of data. This simply means that Data is the new material we are shaping by design. Data is the resource. Transformed into information. Data becomes a PRODUCT. The opportunity of data as material leads to a new type of organization: The Data Enabler Organization, its aims are defining, collecting, transforming Data into Information and Knowledge into Wisdom at specific locations.

Finally, the future as a choice. The future is the changes you make to the present, through your motivation, behavior and action. The future means the pursuit of a better condition for the individual and the organization, at a defined period in time, ahead of the present time. Organizations have two choices when it comes to their treatment of the future, choice one is to stay in the present and let the future flow towards you; choice two is to design your path to where the future is and purposefully claim it as your future. The Future-Proof, a sustainable innovation enterprise has the ability to sustain innovation over the long term. Innovation is not a process, but rather is an outcome. Innovation is the thing you are creating as a result of a process that might involve design, engineering, creativity, imagination, inspiration and multiple iterations of concepts, very much like art does.

RESUMEN

Alexander Manu es un innovador estratégico, conferencista internacional en más de 25 países y autor de varios libros. Es consultor estratégico y consejero en temas relacionados con el futuro, para grupos de ejecutivos de compañías que aparecen en la lista del Fortune 100, en industrias tan diversas como alimentos, comunicación, publicidad y comunicación móvil. Alexander da conferencias en todo el mundo en temas como innovación, imaginación, agentes de cambio y previsión. Es académico y enseña “Innovation, foresight and business design” en la Escuela Rotman de Negocios, así como en la Escuela de Diseño de la Universidad OCAD, de Toronto, Canadá. Por más de 25 años ha colaborado con compañías de sectores diferentes como Motorola, Lego, Whirlpool, Nokia y Unilever, a desarrollar estrategias dirigidas a temas de pensamiento estratégico y modelos de negocio competitivos”. En el mes de octubre de 2016, él impartió una conferencia magistral titulada “Beyond Imagination” en la Universidad Autónoma Metropolitana, Azcapotzalco campus, Ciudad de México, México, como parte del 10mo Congreso Internacional de Administración y Tecnología para el Diseño, organizada por el área de investigación del mismo nombre.

Este ensayo se compone de cuatro secciones; La primera es el Contexto Emergente 1, Disonancia y Estrategia. Contexto Emergente 2, Todo es autónomo. La información (data) es el material para elaborar el nuevo “brief” de diseño. Y la última sección es el Futuro como opción.

En el Contexto Emergente 1, Disonancia y Estrategia, describe como darle sentido a los cambios permanentes en nuestro contexto, para ello la primera tarea es “mapear” el contexto emergente de una manera frecuente. “*El Juego de Información de la Sociedad Móvil Interconectada*” (The Data Set of the Mobile Networked Society), es la primera herramienta para ordenar la información. El contexto revela los nuevos espacios de comportamiento y sus fuentes de valor. La ubicación de uno mismo y la actividad desarrollada en tiempo real, proporciona valor de estatus y por lo tanto valor capital social. Los puntos de información generan un contexto denominado como SoLoMo: Social, Local y Móvil. La

Disonancia Estratégica es una herramienta de diagnóstico muy útil para compañías que se enfrenten a un panorama cambiante, disonante con el contexto actual. La premisa “Disonancia Estratégica” es una herramienta de planeación al que le hace falta una acción estratégica debido a la velocidad con la que el cambio ocurre. Otra causa de la disonancia, es la divergencia entre lo que los clientes valoran y los viejos modelos de negocios.

En el Contexto Emergente 2, Todo es autónomo. Nos encontramos en el momento en que la historia da vuelta, y queda atrás la era de la manufactura en masa, y la forma en que la gente se conecta con otra gente, y la gente con productos y servicios. Ya estamos viendo los primeros signos en que todo es social, todo es aumentado y todo es autónomo. Las invenciones humanas en forma de tecnología siempre han conformado nuestra existencia. En este proceso, nuestras herramientas son extensiones de nosotros mismos que han transformado la vida humana, la sociedad y el sistema económico. El reto actual para el diseño es como crear una experiencia profunda, como conectarnos con los usuarios con momentos de sorpresa y de encanto, ¿y como involucranos con ellos intelectual y emocionalmente? Al buscar experiencias significativas, se busca una vida más profunda, y este es el rol que la tecnología a través de las opciones de aumento, social y de autonomía ya ha comenzado a desempeñar. El marco de referencia que propongo en forma de respuesta es Todo Social, Todo Aumentado y Todo Autónomo. Todo Social, nuestras interacciones, nuestras actividades y nuestra información, en la actualidad se comparten con una audiencia más grande que nunca; en un contexto en que convergen el mundo físico y el mundo real. Por ejemplo, la Internet no es sólo una tecnología, sino un comportamiento. Todo Aumentado, por ejemplo productos, servicios y lugares aumentados, todos ellos agregan valor a través de elementos no físicos, ofreciendo nuevas capas de entendimiento y nuevas dimensiones de experiencia. Y para finalizar, Todo Autónomo, ya que los objetos pueden reaccionar y adaptarse a sus alrededores, la autonomía significa que pueden existir independientemente y de manera separada de fuerzas externas; cuando todo se ha vuelto autónomo, cada experiencia se conecta a otra experiencia: este es el valor de las tecnologías sociales.

La información (data) es el material para elaborar el nuevo brief de diseño. Con la introducción del *World Wide Web* (www) en 1991, vino un cambio en la creación, amalgamación, almacenamiento, transmisión y transferencia de un nuevo material. Antes de 1999, el diseño y desarrollo de un brief de diseño se centraba en problemas. En la época post-2000, la información (data) se convierte en el material que forma parte del brief de diseño. Lo que significa simplemente que la información es el nuevo material que le da forma al diseño. Data es el recurso. Se transforma en información. Data se convierte en el producto. La oportunidad que ofrece la Data como material, nos lleva a un nuevo tipo de organización: La organización que facilita la información, sus objetivos son definir, reunir, y transformar la información y conocimiento en sabiduría en algunos lugares específicos.

Y finalmente, el Futuro como opción. El futuro son los cambios que le hagas al presente a través de la motivación, comportamiento y acción. El futuro significa la búsqueda de una mejor condición para el individuo u organización, durante un período en el tiempo, que esté más allá del momento actual. Las organizaciones tienen dos opciones en relación a cómo ven el futuro, la opción uno es mantenerse en el presente y dejar que el futuro fluya hacia uno; la opción dos, es diseñar su camino hacia donde está el futuro y reclamarlo de manera decidida como el futuro de la compañía. La prueba del futuro, es una compañía que innova de forma sustentable y que tiene la capacidad de mantener la innovación durante un largo plazo. La innovación no es un proceso, sino más bien es el resultado. Innovación es aquello que creas como resultado de un proceso que puede incorporar diseño, ingeniería, creatividad, imaginación, inspiración, y conceptos iterativos múltiples, que es similar a lo que ocurre con el arte.

THE EMERGING CONTEXT 1:

Dissonance and Strategy

What are we to make out of the permanent changes in our context? Well, the first task is mapping the

emerging context on a regular basis; without an accurate data set we cannot focus on the implications of any particular data point.

The current emerging context Data Set of the Mobile Networked Society is the first tool we must use in setting any path for transformation. The context reveals the new behaviour spaces and their sources of value, while the new sources of value inform us as to the distinctive capabilities needed to successfully compete in the behaviour space of our business (see Figure 1).

Tools for Emerging Contexts

In “The Global Village ⁴: Transformations in World Life and Media in the 21st Century”, McLuhan and Bruce Powers proposed a new “right brain” creative model of communication. This model demonstrates the dynamic and synchronic nature of change, which is triggered by the creation of a new artifact, and the “all-at-oneness character” of that transformation—as illustrated by the positive and negative consequences of television’s impact on mass culture. The authors contended that any new technology will emphasize some of our senses and functions, while at the same time obsolescing others, even if temporarily. In this process, a person retrieves his or her latent behavior, namely the will ‘to worship extensions of himself as a form of divinity.’ McLuhan proposes the concept of the ‘tetrad’ a tool that could predict what society might do with a new invention, and whether it should accept or reject the artifact’s future effects through a series of questions that result in experimental and alternative shapes of the future.

The questions are:

- What does this artifact enlarge or enhance?
- What does it erode or obsolesce?
- What does it retrieve that had been earlier obsolesced?
- What does it reverse or flip into when pushed to the limits of its potential?

⁴ McLuhan, Marshall and Powers, Bruce. *The Global Village: Transformations in World Life and Media in the 21st Century*. Oxford University Press. Oxford. 1992.

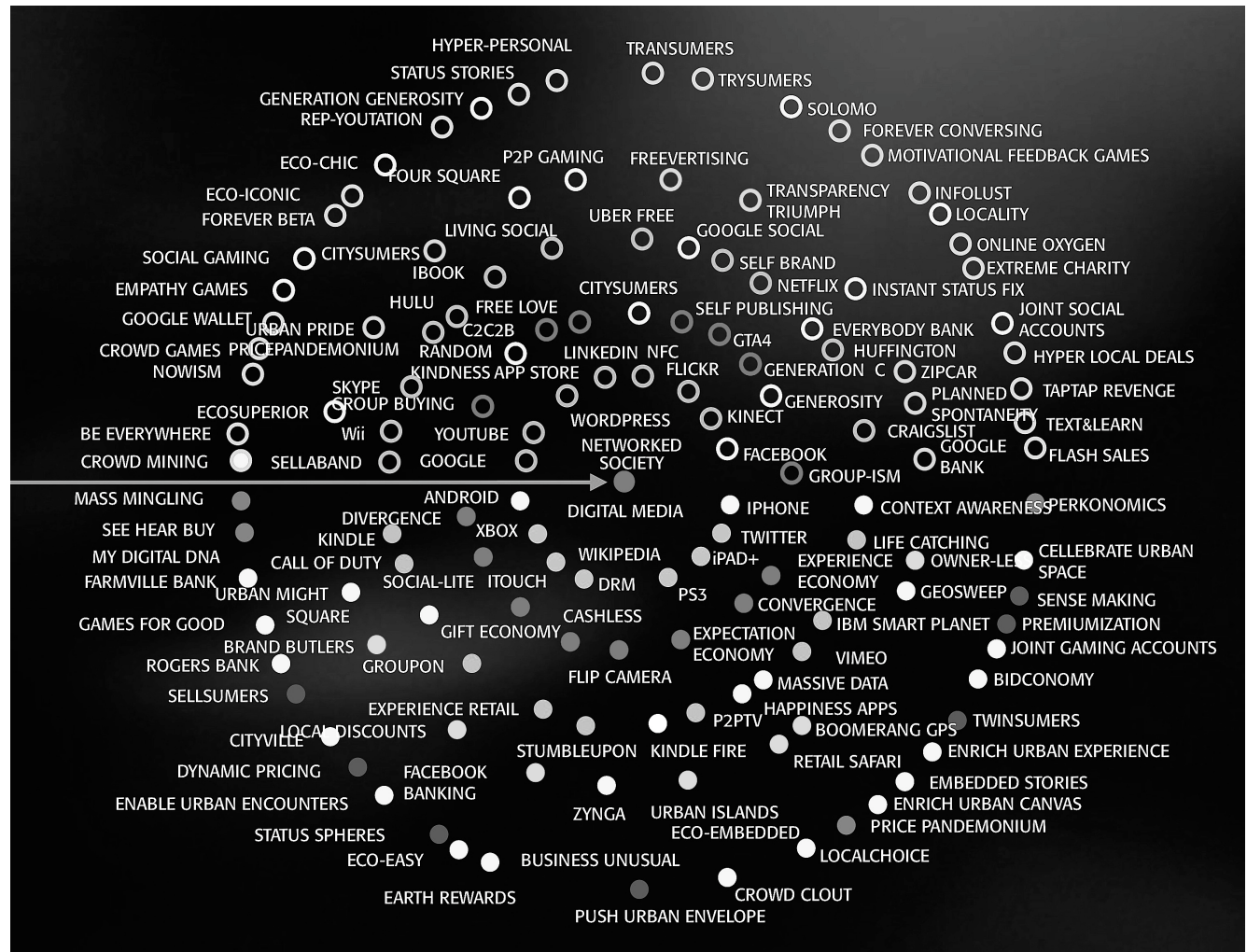


FIGURE 1 Emerging Context Data Set

These questions reflect McLuhan's belief that all media forms are extensions of our senses, bodies, and psyches, in the way that a hammer is an extension of our hand and a book is an extension of our memory and ideas. As such, they intensify one thing in a culture while obsolescing something else. They also retrieve a phase or factor long ago pushed aside a behaviour retrieval and undergo a modification when extended beyond the limits of their potential. For example, the cell phone intensifies the capability of one person's voice reaching another's at any time, and in time will obsolesce location-bound telephones and landlines. At the same time, the cell phone reverses our freedom from location by making us perpetually accessible to others, and it retrieves the fundamental desire of being seen and heard by others. McLuhan wrote: "As an exploratory probe, tetrads do not

rest on a theory but a set of questions; they rely on empirical observation and are thus testable. When applied to new technologies or artifacts, they afford the user predictive power; in this sense as well, they may be viewed as a scientific instrument. Once again, insofar as the tetrads are a means of focusing awareness of hidden or unobserved qualities in our culture and its technologies, they act phenomenologically.” McLuhan’s tetradic analysis acts as a lens through which we seek the deeper meaning and impact of a signal—foreseeing what it may mean in the future, by recognizing its past and present implications.

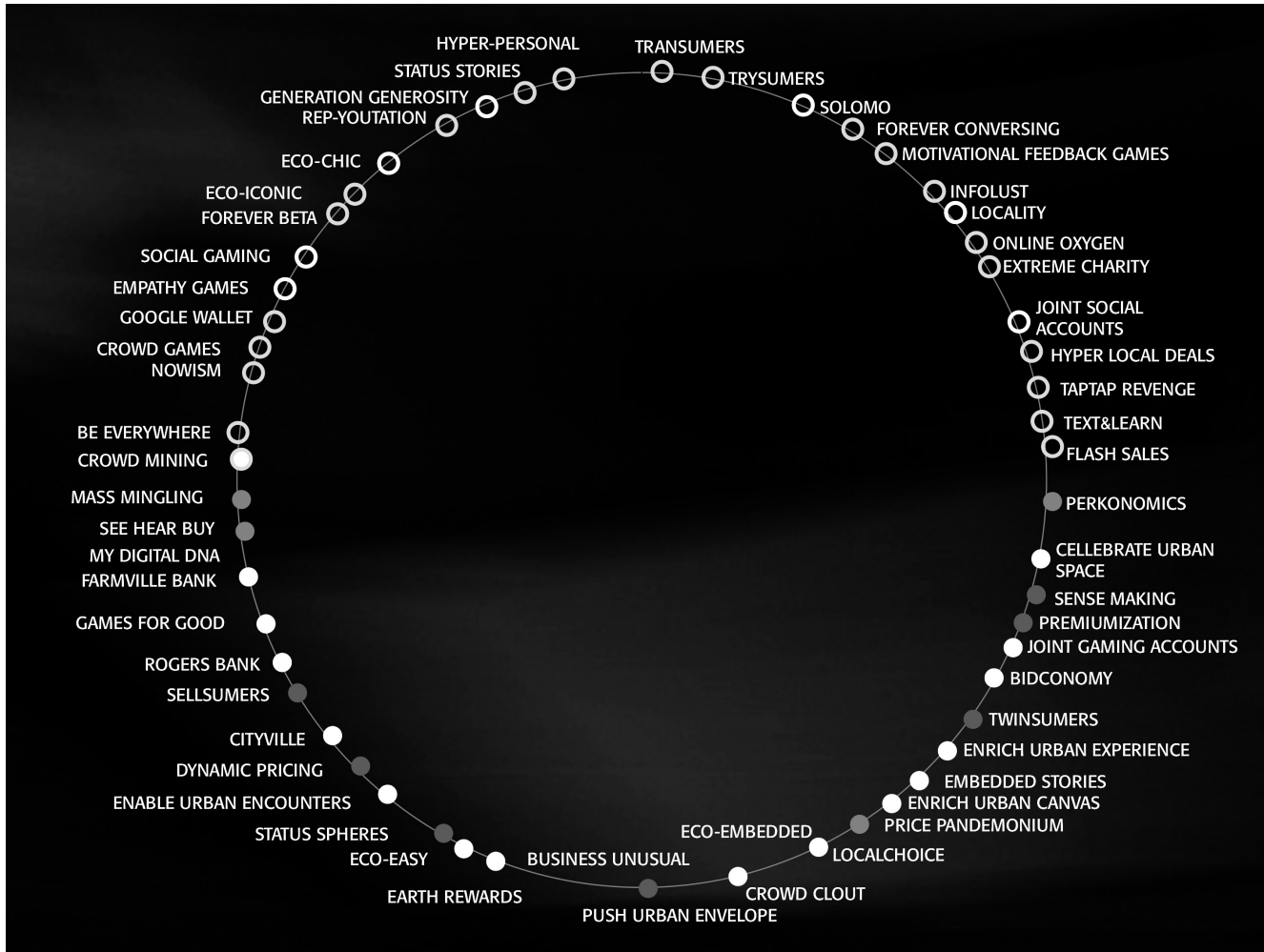


Figure 2 New Behaviour Spaces

Dissonance and the Data Set

The strategic questions framed in 1996 by Robert A. Burgelman and Andrew S. Grove and mentioned earlier in the text, map the challenges and opportunities faced by an organization in this dynamic. The questions are formulated around the tension between two opposing sets of data; The New Context—the New Data Set as illustrated in Figure 2- VS the Organization's Distinctive Capabilities, and New Sources of Value VS Existing Business Models. The Data Set indicates that a majority of the data points are behaviour spaces concerned with social participation, engagement and empowerment, collaboration and mobility. They further suggest that one's location and real time activity has status value, and hence social capital value. The data set

points to a context defined as SoLoMo: Social, Local and Mobile⁵ (see Figure 2).

Strategic Dissonance

Burgelman and Grove described a diagnostic tool that is of great necessity for companies faced with a shifting landscape. So we have a new behavior space introduced in our business context, but our strategy does not change. We are, by all accounts, at dissonance with our context, and with no practical tools to redress the situation. The premise of 'Strategic Dissonance' as a planning tool, is that strategic intent lags strategic action due to the speed at which change occurs. The context is being reshaped everyday by

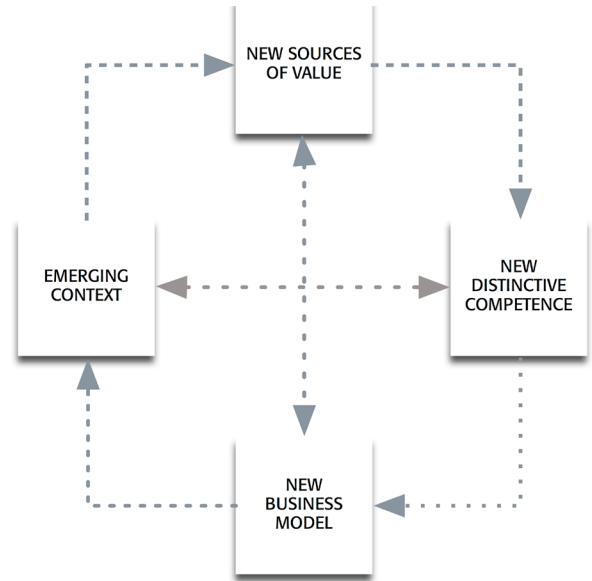
5 More on SoLoMo at <http://outspokenmedia.com/internet-marketing-conferences/the-solomo-revolution-social-media-local-search-mobile-search-collide/>

new players and new entrants in the market, as well as by the creation of new behavior spaces that the organization has little control over. These changes in the context –the shifts in the landscape– are in effect new behaviour spaces, and new behaviour spaces bring with them new sources of value.

Any new data point means a new demographic whose values have been changed by new behaviours while the organization is stuck in a strategy that does not recognize the shift. What we need is a set of tools that recognize the dynamic nature of change, as well as the synchronic dimension, which is our ability to respond to the new sources of value with new distinctive competencies. According to Burgelman and Grove, ‘the first cause of dissonance is the divergence between the industry’s new competitive landscape and an organization’s distinctive competencies to succeed in it.’

The second cause of dissonance is the divergence between what customers value and old business models. Existing structures often reflect current leaders’ beliefs about historical success in their organizations or field. Emotional attachment deeply influences the leaders’ perceptions, leading to hesitation to change strategies when the consequences are not completely clear. The lack of will to transform and the imagination to do so is the major cause of dissonance. The faster we recognize the changes in context, and the nature of the new sources of value, the faster we can redesign our organization and provide a distinctive competence. But competence is not enough, as our old business model does not account for the new value propositions we must now focus on. So the forth element is the redesign of the business model. The statement ‘This is not our business’ must be replaced with ‘we will make this our business’, by designing a new business model which contains the new sources of value as a focus point.

As SoLoMo defines the nature of the behaviour space, now we can formulate the questions that will allow the organization to remain relevant in this emerging context. The questions seek to align the context with our competences and the value with our business models. Figure 3 illustrates a dissonant strategy, while Figure 4 illustrates the strategic balance achieved when answering the questions.



STRATEGIC DISSONANCE

FIGURE 3 Strategic Dissonance

- **Emerging Context:** How is the Landscape Changing? How will the social and physical infrastructures of SoLoMo help our organization reach and retain their customers, define new market segments, and create new revenue opportunities?
- **New Sources of Value:** What is the meaning of value in the Social Local and Mobile society? What do millennials consider essential and important in this context? What desires do they need fulfilled? What are the characteristics of the SoLoMo behaviour space? What, therefore, are the characteristics of the organization that will best respond to this dynamic?
- **New Distinctive Competencies:** What new capabilities are needed to succeed? What are the market issues, that when addressed, will create frictionless growth and hence superior margins? What future do we envisage and plan for?
- **New Business Models:** How are we presently structured to create, renew and deliver value in SoLoMo? What key value activities do we need to be engaged in? What are the key business model issues that will determine our ability to develop a ubiquitous business model?

The emerging context is that of a society in which every person, object and space is both a link and a holder of

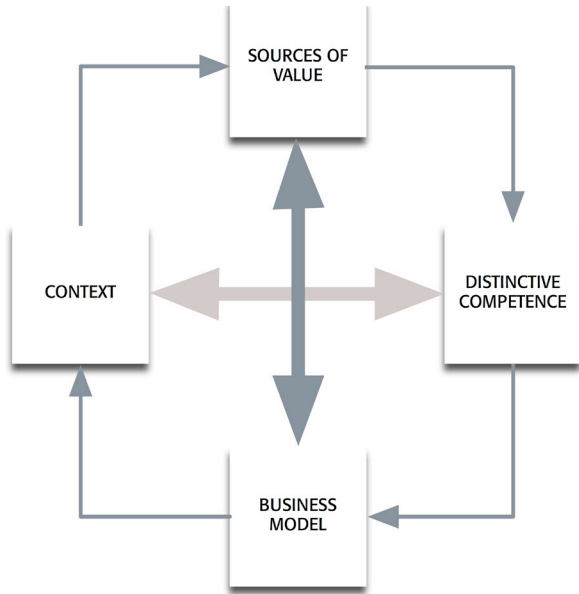


FIGURE 4 Strategic Balance

information. Later in this book I refer to this context as Data Transfer Behaviour Spaces - spaces where digital data resides on mobile devices, can be transmitted and received, and can be managed. The social, local and mobile society made possible by data transfer behaviour is the sum of the lifestyles of its participants, and the participants are in a constant state of searching for media to navigate it, for media to engage with from play to work, learning to knowledge, entertainment and leisure. Thus the challenge of SoLoMo for organizations is not about technology, but about strategy.

As we participate in the SoLoMo space, we create new norms for new social interactions, which in turn lead to new forms of engagement, new forms of exchange, which in turn, create new behaviour spaces. This is the dynamic system ecology of behaviour. And this dynamic makes the case for a dynamic strategy, a continuum of strategic repurposing, in which the context is at all times aligned with the organizations core competence and business models (see Figure 4).

The dynamic elements of this model imply that we permanently scope the emerging context for changes and we permanently tweak or redesign our distinctive competencies and business models. The scope of this permanent redesign is to make sure that strategic action does not lead strategic intent, but they are in balance at all times.

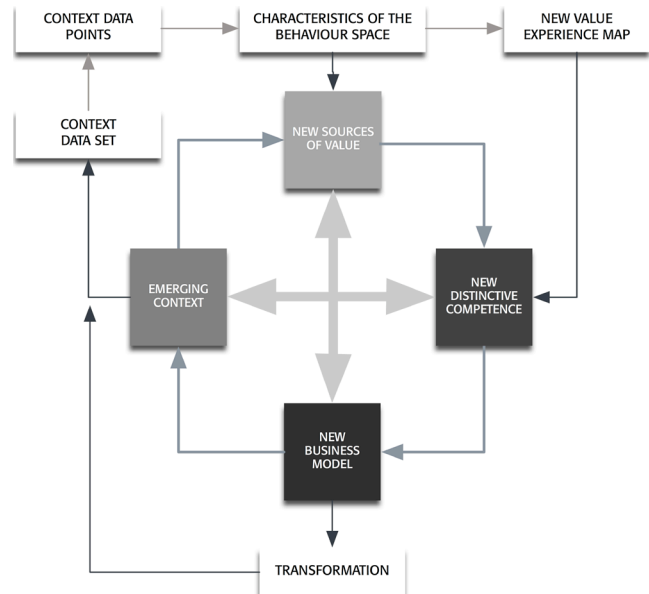


FIGURE 5 Strategic Balance and Dynamic Transformation

THE EMERGING CONTEXT 2.

Autonomous everything

We are at the moment history turns a corner.⁶ Behind us we see the age of mass manufacture and industrial might, represented by large multinational corporations, giants that could bend steel and transform it in airplanes, ships, trains and bridges. Those were impressive days; the days in which we built the infrastructure of the world, as we thought these variables would be a constant of civilizations to come. We covered the ground with asphalt, redefined communities around the automobile, and redefined the way we connected people to people, and people to goods and services. These were physical manifestations of a moment in history, but we regarded them as history itself, having a hard time imagining how things could be different.

All we have defined so far as the indispensable infrastructure for our way of life might simply not exist in the industrialized world 50 years from now. Because just around the corner we are seeing the first signs of a life in which everything is social, everything is augmented and everything is autonomous. A convergence

⁶ Some of this text has been previously published in: Manu. A "Transforming Organizations for the Subscription Economy", Routledge, 2018.

called life subscribed. In this new context, life becomes a subscription to moments, curated invisibly by virtue of our past actions, and our sets of preferences.

Human invention in the form of technology has always become a condition of our existence. In this, we are not different than any other animal, as we appropriate as ours the tools, machinery, and shelters we have developed over the years and which by now have all become conditioners of our life, the infrastructures that dictate what and when, we do what we do. This is how we arrived to being conditioned by Facebook, Google, Amazon, WiFi, Blue Tooth, GPS, mobile phones, all unthinkable even by science fiction standards as recent as 20 years ago, and all part of everyday life now. In this process, our tools as extensions of ourselves have transformed human life, society and the economic system. And this is how the present always contains the future, as humans grow understanding how these technologies will transform them and, allow them to achieve a new level of becoming. Every experience is a bridge to another new experience, and technology functions the same way: as a bridge to the next technology.

The current challenge for design is how do we create a deep experience, how do we connect users with moments of surprise and delight, engaging them intellectually and emotionally? By seeking deep experiences, we seek a deeper life, and this is the role technology through augmentation, sociality and autonomous features –is starting to play: maximizing humanity, by reassigning repetitive tasks from users to their devices, freeing humans from habitual chores, and creating a new relationship between objects, places and people, transforming society and culture. This is the emerging context; a brand-new canvas for rethinking what human life can be about, mediated by new tools and re-symbolized by new concepts. What frameworks do we need to construct these new concepts? To answer this question, we have to look around and find what has already happened that has yet to reach its full effect, what behaviors and technologies are unquestionably converging in transformative ways, affecting our quality of life and the providers of the goods and services we depend on. The framework I propose as an answer is Everything Social, Everything Augmented and Everything Autonomous.

Now: Everything Social

Our interactions, our activities and our information are now shared with a larger audience than ever before, in a context that converges the physical and the real world. We are presenting to this world a social self at the core of every interaction, at the core of every daily transaction, as a projection of the ideal self, an entity constructed through our actions every day, in front of our virtually real audience. At the same time, we have deployed technologies that have added this social layer to objects and places, which in turn are now becoming social. A social entity behaves, engages in manifest actions that leave a trace and compounded, transform the economic system into a behavior economy. We, together with our objects and places behave, and the result is a dynamic and synchronic economic system. We exist in the measure in which we engage. The more we engage, the more we exist, and nowadays engagement being possible in a passive way –our location and activities being tracked by our wearable devices– we are now passively participating in the economy of behavior. Passivity in this context is not a disadvantage but an opportunity, as it gives us more time to pursue an enhanced purpose for the self, in a transparent environment, where we can measure our purposes against our peers, giving our pursuit more meaning and more authenticity, while at the same time maximizing our humanity. The social layer is the connectivity we seek with the world that surrounds us.

The Internet is a Behavior

The social nature of our interactions on the Internet defines what the Internet is and what it is not. The Internet is not a technology; the Internet is a behavior. And the Internet was a behavior from the very beginning: people connected to the issues that define them, to the ideas they want to explore and expand, and to the people they care about. The behavioral product we know as the ‘Selfie Stick’ is not about the stick, but about the self; the self-memorializing for others. The self and its desire to participate in the life of others, by sharing moments. People behaving, and creating the new economic engine of the behavior economy.

Next: Everything Augmented

Augmented products and services as well as augmented places add value through nonphysical elements, by providing new layers of insight and new dimensions of experience. Augmentation gives us the ability to extend our perception and deepen our understanding of reality, giving it a new dimension into a mixed reality, in which technology plays the role of translator of meaning without interference. This is the augmentation of experience and the opportunity to create deeper experiences through meaningful interactions. Experience is about 'how' something makes you feel. Interaction is the reciprocal action(s) you engage in in order to acquire that feeling. Reciprocity means that the device you interact with 'behaves', prompting further user actions. A virtual experience relies on the ability of the imagination to glean meaning from an intangible event, and humans are starved for meaning as experience. This is what makes virtual reality so compelling and addictive. Within a few minutes one can fly to the edge of space, be surrounded by sharks under the Pacific Ocean or stand at the edge of a 400 ft. canyon. Digital technologies have created platforms that invoke interactive and immersive virtual experiences that are connecting users with epic moments in unprecedented ways. The importance of these virtual experiences increases and becomes more acute as these digital platforms become increasingly connected. These new, persistent platforms represent a split not between reality and virtual reality, but between the real and virtual manifestation of self.

Eventually: Everything Autonomous

Autonomy means existing independently and separate from external forces, leading to self-sufficiency. Objects can react and can adapt to their surrounding context without any outside control, thus reducing the participation of humans in the shaping of an object's actions, and freeing that human from daily chores, allowing him or her to pursue a deeper lever of life experiences. Searching for the deep human in humans, what we might be really about when we remove the preconditions for survival imposed by the chores of everyday life. Autonomous objects present themselves

to their owners only when needed, and perform tasks with fluidity and efficiency. They adapt to the surrounding context, and continually learn and upgrade themselves, through constant uploads and downloads of data. Autonomous everything will find its first impact felt in the eventual loss of jobs, primarily jobs that can be automated. There is a lot of discussion about what will happen to the people presently holding these jobs, and proposals for a basic universal income abound. The impact on the economy of knowledge, skills, and jobs can be creatively addressed by understanding the elements needed in a transition to the deep experience economy; a transition from quantity to quality, from objectification to the dematerialization of experience, via mixed reality and augmented reality.

Autonomous everything also means deep learning taking over. It means sensors and cameras everywhere and in everything, obstacle detection technologies and of course, robotics. More than just autonomous vehicles, it means unmanned aerial and underwater vehicles, guided objects with vision aided navigation, it means autonomous production in agriculture, self-generating objects, self-aware objects, self-updating news and reporting, human machine collaboration and emotionally responsive robots. Rapid factories producing assistive devices, biosensors for health monitoring, biomimetic machines and autonomous medication, regulated by the quantitative and qualitative data we collect and evaluate every day. Adding sensors to every interface as well as machine learning would result in new social playgrounds and new value; new forms of action, as autonomous everything results in the fluidity of everything. When everything is autonomous, every experience is connected to another experience: this is the value of social technologies. Platforms for a connected world create a new deep reality, new means for economic parity and participation, means by which the self becomes an economic agent at both ends of the system: creation and consumption. The autonomous forces of reality create the means for the economic self, a human economy that defines life by its attributes, as well as by new means to experience reality.

Around the corner: Convergence

We are at the moment history turns a corner. Behind us we see the age of mass manufacture and industrial might, represented by large multinational corporations, giants that could bend steel and transform it in airplanes, ships, trains and bridges. Those were impressive days; the days in which we built the infrastructure of the world, as we thought these variables would be a constant of civilizations to come. We covered the ground with asphalt, redefined communities around the automobile, and redefined the way we connected people to people, and people to goods and services. These were physical manifestations of a moment in history, but we regarded them as history itself, having a hard time imagining how things could be different. Search the Internet for images of the 'city of the future' and see the overwhelming majority showing vast landscapes defined by buildings and roads. After all, who needs paved roads if the future was that of the flying car? Or a future with no cars at all, but delivery drones instead? Autonomous mobility is not about cars. It is about the coming together of all social and convenience technologies on a single platform and the transformation of everything.

Life Subscribed

Humans in organizations often think they are building for history, but history has a funny way of making humans feel inadequate. It turns out that the industrial world was just looking for a bridge to take us from 1900 to the second decade of 2000's. All we have defined so far as the indispensable infrastructure for our way of life might simply not exist in the industrialized world 50 years from now. Yes, that means roads, cars, shopping malls, transportation companies, parking lots, gas stations, insurance and financial institutions, as we have known them over the past 120 years. Because just around the corner we are seeing the first signs of a life in which everything is social, everything is augmented and everything is autonomous. A convergence called life subscribed. In this new context, life becomes a subscription to moments, curated invisibly by virtue of our past actions, and our sets of preferences.

DATA AS MATERIAL FOR THE NEW DESIGN BRIEF

Product and service design and development underwent a profound shift of focus after the introduction of the World Wide Web in 1991, and its unprecedented acceptance as a tool for daily use. The reason for this shift was the creation, amalgamation, storage, transmission and transfer of a new material. Pre 1999 the design and development brief was centered around problems, and the necessary capability required was that of problem solving. Every product or service which performs in a competitive category has multifaceted problems: features vs price comparisons with its closest competitor, performance comparisons, aesthetic comparisons, etc. These are problems rather easy to identify by asking standard qualitative or quantitative questions. Once answers are obtained, they become the 'problem to be solved' and a development brief is drafted to reflect the scope of the work to be done in order to solve the 'problem'. This is all good and easy, and one can plan for it with a reasonable expectation that the problem will be solved, the product or service redesigned, and the share in the market recovered. All of the inputs into this process deal with known factors: the demographic, the technology, the material, and the behaviour in which the product or service fits. Post 2000, a new material starts to become part of the development brief. This material is DATA.

While vast amounts of data was also collected before the wide spread use of the internet pre www, the Internet world allowed individual users to create, manipulate and consume data at an unprecedented scale and rate. And once Google released their search algorithm, this data became searchable, collectible, and thus usable in a beneficial way. After all, in a Data Transfer Behaviour Space (say Earth, mid 2011) all we do is Data centric; it is all we Gather, Research and Create. So now we have the data, but it does not have any value; it must be transformed in Information. Information is comprised of the way we organize data, the way we present it, and the way we design its architecture (the framework of data that is most relevant to the questions we are asking). Information is:

- The Organization of data
- The Presentation of data
- The Architecture of data

This simply means that Data is the new material we are shaping by design. Data is the resource. Transformed into Information, Data becomes a *PRODUCT*. No different than forged steel that becomes a blade.

KNOWLEDGE on the other hand, is Data transformed into facts, ideas, truths and principles. Sharper at times than the blade; knowledge allows one to create the blade for different purposes. Knowledge gives purpose to the data embedded into the piece of steel: you are a knife, or you are a sword. The last embodiment – or use – of Data is *WISDOM*, which is the accumulated knowledge needed to make a decision or to pass sensible judgment. Do I use this knife, or the other one? Which knife is most appropriate for my task? What are the consequences of this task? Knowledge and Wisdom are *SERVICES*. Both operate in a minimum of three contexts: Local, Global and Personal. 'Am I committing an illegal act while using my sharp blade' is a matter of context (where am I and what am I doing, what are the threats, what are the consequences, what are the laws of the land, what are my own values).

In the Internet age the development question became 'what can we use this data for?' Music? Poetry? Video Motion? Image? Opinion? Profiling Preferences? –or the 'database of our intentions', the repository of humanity's curiosity, exploration, and expressed desires, as John Batelle⁷ has called the current role of the search engine in his 2005 (*The Search: How Google and Its Rivals Rewrote the Rules of Business and Transformed Our Culture*). The opportunity for massive retrieval and consumption makes data a new material for the design and development of products and services.

This material changed the development paradigm; no longer focused on 'satisfying need' or at providing a solution to an identified problem, but focused on the creation of New Business Platforms.

This is the opportunity of Data as Material and it leads to a new type of organization: the Data Enabler Organization.

⁷ Batelle, John. 2003 Available at http://battellemedia.com/archives/2003/11/the_database_of_intentions.php [accessed June 22, 2011]

The Data Transfer Behaviour Space: Dataspace

The data transfer behaviour space, or Dataspace⁸ is the distributed and interconnected physical, digital, and human network of places, spaces and relationships. In a Dataspace, information is embedded in objects and spaces, creating a new world of addressable spaces in which devices know where they are. In this new embedded sensory world, all devices incorporate context awareness and emotionally intelligent capabilities and established social forms change in fundamental ways. Intelligent devices recognize the context of the user; once the context is recognized, the device will process, communicate and retrieve appropriate information. This capability means new opportunities for people, organizations and markets; opportunities that may lie beyond the current business models of organizations. Business success in the next decade will be tied to understanding the impact and nature of this transformation, and taking advantage of it by providing new services, understanding the resulting new values, opening and taking advantage of new channels of communication.

A Practical Definition Of Dataspace:

A Dataspace is any perimeter containing communication and data enabled devices, fixtures or structures. A prerequisite for Dataspace is that it contains a minimum of one of the following: Enabled Objects/Fixtures or Enabled Spaces. Your smartphone is an enabled object. The Mall you shop at is an enabled space. Your home, and any other place where you wirelessly connect via WiFi is also an enabled space. Dataspace does not describe science fiction or some long term foresight scenario: it is your life right now.

A third element of a Dataspace is Enabled People, which can be defined as users in possession of a device that enables them to retrieve or transmit data to the objects or spaces in their proximity, as well as to objects and spaces outside the immediate proximity (through a carrier). The presence of an enabled

⁸ Manu, A. 2016. *The Imagination Challenge*. New Riders. Berkley. p.184.

individual in proximity to an enabled object or space, creates the final component of Dataspace which is Enabled Data. Enabled Data is a descriptive term for data that has been filtered through personal parameters, and has been transformed in Information of distinctive benefit to the user of the retrieving device. The address book on your mobile device is enabled data. As an example of use, imagine you are shopping for new golf clubs at your favourite specialty retailer. While in proximity of the club section of the store, data stored in clubs as well as in the retail display structures, is transmitted to your enabled device. The device contains Information of a defined nature –personal filters such as preferences– which combined with the data received from the object becomes Knowledge for the Individual. Once Knowledge is acted upon –a decision being made, a recommendation being followed, a new set of clubs being purchased, etc– it becomes Wisdom, or what we can refer to as Enabled Data Use. Enabled Data Use is the management and collection of all transaction or location data that can further result in a user benefit.

Once enabled to do so, people will reveal their needs and wants through their very interactions and behaviours. In an emerging world of omnipresent data, the role of technology will shift radically; technology will become an essential element of the ecosystem, determining its very nature. When places and objects are data enabled they take meaning from people. When meaning is enabled it becomes benefit. Every possible action, observation –twittering, blogging, email, sms– has become data readily available for analysis. Every different combination of people, devices and places will create a wealth of unique social capital possibilities. Every setting and every interaction, will determine a one of a kind ecosystem of opportunity. Presence is proximity, and data transfer is a potential marketing opportunity. Where does this opportunity come from?

1. Propagation of Information. The Self is the viewpoint from which we create a perspective of the world. This is why what we want to propagate by broadcasting our information. This explains blogging, Twitter, Facebook, Flickr, as well as very personal YouTube videos. They are the means by

which we fulfill our hunger to inform others about ourselves. Social Networks are about how our information relates to others in a given group. Value in information is always related to the Self. The information that has value is only the information that teaches, speaks, refers to the self, or to the ones the self is protecting or cares about. Social Networks are not ends in themselves; they are conduits for the larger purpose of Self Expression in the service of self-propagation.

2. Me on a Massive Scale. The data of Person A is attached to Object B, in proximity of Space C; the opportunities of this information are so abundant that it means nothing, unless the question it was answering was already understood. The data itself yields no new knowledge. How do you sell it? How does it become useful? Whom would this data ultimately benefit?

What is the shape of the organization that can undertake this challenge? Here is a possible vision.

The Data Enabler Organization

What is this organization after? Defining, collecting, transforming Data into Information and Knowledge into Wisdom at specific locations. Four critical contexts frame the opportunity of the data transfer behaviour space:

- People's actions and engagement in life or commercial activities expressed as data, will become a new form of currency.
- Location based structured data will become the marketing communication media of choice.
- Any company with an audience will be in the granular broadcast business, as a curator of the experience of place.
- Every company is in the business of creating content.

The data enabler organization operates from two essential premises that are returning marketing to its roots of creating and delivering a standard of living. The first, is the belief that in the Dataspace of the Networked Mobile Society 'standard of living' extends beyond the sale and use of branded goods and services,

embracing all of the activities of everyday life. The second premise is related to the trust people place in the brands they favour; a trusted brand is well positioned to monetize this trust by brokering transactions –or the entry into experiences– which are part of the whole that defines standard of living.

Critical to creating and delivering a standard of living are the following tenets:

- You have to be part of the cultural life of the user;
- You have to be part of the emotional life of the user;
- You have to be part of the intellectual life of the user;
- You have to create culture, not products;
- You have to be in touch with the culture of the user;
- You have to engage the user on multiple platforms of experience.

Three strategic elements are required for marketing in Dataspace:

- A Brand Value Platform Strategy
- A Proximity/Location Engagement Strategy and
- A Mobile Device Strategy

I am using the consumer packaged goods (CPG) sector as an example, as this is the sector that spends most on marketing its products. P&G was the largest advertiser in the world in 2010, spending \$8.68 billion dollars⁹. The old-fashioned way to do brand building was by vertically expanding products and strengthening core brands. This seemed like the right strategy for growth, and growth was tied to product sales. The first challenge for consumer package goods companies is the realization that growth based on sales is a finite business, which neglects the real opportunities afforded to trusted brands. In the old wisdom, a brand did not become a brand until it offered something spectacular. And the best of the CPG's got very good at delivering spectacular value to consumers, by leveraging core strengths — consumer understanding, brand-building, innovation, go-to-market capability and scale. By mid 2010 - as the penetration of smart

phones and mobile apps reached the mainstream – this was no longer enough, as it became clear the brands needed to play a new role in this emerging context.

In the emerging context a brand is not spectacular unless it enables a new experience. Behavioral realities are changing the structure of business, by enabling new forms of engagement and participation. Twitter, Facebook, LinkedIn, YouTube, Google Buzz, Google Earth, were just some of the early manifestations of the transformation in progress, transformations that required consumers actively engaged in actions. These actions of daily life were actually expressed as data, (IBM was one of the companies that understood this early in the decade) and it became clear that data was a new form of currency. It also became clear that the Internet, was becoming location based and location centric –my friends, my stuff, my places– and that structured data –what we know about the brand's consumers and their preferences– will become the marketing communication media of choice, engaging consumers at the granular level, one on one, with the potential of individually enhancing one's experience of one's location.

On the technology side it was also clear that 'Places' will communicate data –maps, navigable attributes and content– about themselves actively and passively to people, objects and other places. Bandwidth and mobile device limitations (memory, screen size, power, etc.) will no longer be relevant; in this context, users will expect perfect information of what is around them, and how to navigate to what interests them. When every place on Earth will have a location profile, can a large brand afford not to be there? The emerging context calls for a new ambition:

Navigating Life. This means that brands will become more valuable as a trusted brand/partner for consumers to 'navigate life', by providing a comprehensive suite of tools, applications, content and mobile services; a trusted brand can now become a granular broadcaster, transforming the consumers of its products into an audience. With this understanding, large advertisers must reframe the role of Marketing Communications: it is not about what a brand wants to talk about with their consumers, *but about what the consumers want to talk about*. It is about their life, in all its dimensions. And

⁹ Available at <http://hbr.org/product/procter-gamble-marketing-capabilities/an/311117-PDF-ENG> [accessed January 6, 2012]

what they want to talk about is connected to where they are; to a location.

What new experiences can a trusted brand enable? If location is proximity 'to something' in the 'context of something else' then three opportunities open up:

- To become a 'proximity conduit expert'
- To become a 'proximity context expert'
- To become a 'proximity content expert'

The first –conduit expertise– is a strategic shift that requires answers to the question: How can the brand make money because it is? In other words, how can one of your brands leverage the trust consumers have in it, by becoming the broker of the experience consumers have at specific locations, and further on, by brokering possible transactions that enhance this experience?

The second– context expertise – will leverage one of the core competencies of CPG's which is consumer understanding.

The third – content expertise - will leverage open innovation by enlisting as Location Content Alliance Partners products and services that people use and rely upon on a daily basis, and whose value profile matches the values of your brand. These partners are value markers in people's lives, offering location based content, the products and services consumers are interested in at a specific geo location.

THE FUTURE AS A CHOICE

The Value Creating Enterprise

My definition of 'The Future' in the context of enterprise is this: The future is the changes you make to the present, through your motivation, behavior and action. Motivation is the internal condition that gives rise to what we want to do, based on our goals, what can we do based on our capabilities, and what we will do, based on our will. Motivation is the ethos of goal-entertained behavior.

The engagement with the future is a matter of will. Make your choice and have the Will to Engage. In this definition 'The Future' means taking a stance about what you want to be when you have become. What then when the future is not a choice? More precisely, when it is not 'your choice'? You and your organization are then just reacting; you are just mitigating an emerging condition of the market space, which was designed by others, as their future. These 'others' have imposed on you a condition of surrendering to forces you rarely understand, and even more so rare, you can fully master. Think about the demise of Blockbuster and the surge of Netflix. Think about the entire advertising industry that is surrendering every year more than \$30 billion dollars to Google. Think about the recording industry, transformed in a few years by forces they did not control or anticipate. These examples are about choices not acted upon, and futures that we imposed on incumbents, by enterprises actively engaged in designing their own future.

Designing the Future

The future means the pursuit of a better condition for the individual and the organization, at a defined period in time, ahead of the present time.

Another way to look at this and illustrate the difference between the future as a physical phenomenon, and the future as a psychological and physiological experience, is to place an object a few yards in front of you. A book is a good object for this exercise. There is a physical distance between you and the book now. There is also an intellectual distance between you and the book, as you are not aware of its contents. If you wait –and you can wait quite a few hours, days or months– the book will not come to you. The placement of the book in relationship to you is physically in 'the future', in the sense that only by an active and conscious action of moving forwards and towards the book, you can touch it, open it and become aware of its contents. And only after these actions are complete, the books contents will enrich your life experience. The future is thus an individual experience. The future is your action; it is what you do to get to it. The future includes your proactive engagement in getting there. The future does

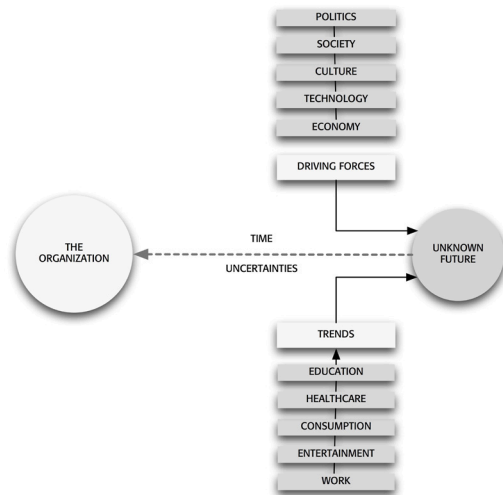


FIGURE 6 Mitigating the future

not mean ‘tomorrow’, it means a move forward (see Figure 6).

Organizations have two clear choices when it comes to their treatment of the future: Choice number one is to stay in the present and let the future flow towards you (Figure 6). Choice number two is to design your path to where the future is and purposefully claim it as your future (see Figure 7).

Future-Proof:

The Sustainable Innovation Enterprise

A sustainable innovation enterprise is an enterprise that has the ability to sustain innovation over the long term. An innovation-producing journey starts with defining an innovation challenge. The greater the challenge, the more satisfying the potential outcomes. Obviously, we are attempting to create an outcome that will create its own market space, either as a product or service, and something we can fully control in terms of the legal property –something that we can obtain Intellectual Property protection for. Also to keep in mind when setting the innovation challenge is the size of the demographic the outcome is addressed toward. We are not concerned with identifying a user need, but we are concerned with mapping accurately the best opportunities at the intersection of emerging technology with emerging behavior.

Every new product introduction helps the development team in expanding its future potential, by training the marketplace into the use of new technologies. As an

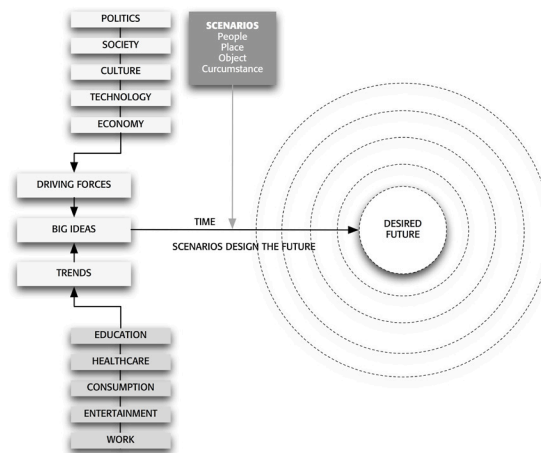


FIGURE 7 Designing the desired future

example, the Apple iPhone trained users how to use a multi-touch screen, and that helped many development teams around the world create new applications in which multi-touch is a prerequisite. These applications were not introduced at the same time as the original iPhone, but after enough time have passed for users to become familiar with the multi-touch gestures, and the capability of the device. Each one of these applications serves to sustain the innovation we call the iPhone over the long run, by giving users new benefits and new behaviors to engage in.

Before expanding on the methodology used in sustainable innovation, let us make sure that we all understand innovation the same way, and specifically what innovation is not.

First of all: innovation is not a process. Every time we think innovation is a process, we are reducing it to the basic elements of every process, and we expect the outcome to be the result of a process within a timeline, within the deliverables that processes result in. The reality is that when you are engaged in the pursuit of innovative outcomes, you simply don’t know when you will be done, and simply don’t know what the outcome will be. And this is where the art comes in knowing when you have found something worth developing, and in knowing when to stop searching. If innovation is not a process then what is it? Innovation is an outcome. Innovation is the thing you are creating as a result of a process that might involve design, might involve engineering, and might involve creativity, imagination, inspiration

and multiple iterations of concepts, very much like art does. The ethos of innovation has little to do with technology; it has only to do with what we want of ourselves.¹⁰

The processes leading to innovative outcomes start by understanding human nature, our desires, goals and motivations at the present time, seen through the lens of a new possibility of satisfying them, at a higher and deeper level. So one has to start with the driving forces in society, combined with emerging trends in behavior. Sometimes the innovation outcome is a new medium, which releases latent behavior –things we did not know we wanted to do are now feasible, and become a new condition for our life, as briefly discussed in section 1.1 of this book. Think of Google. You never knew you wanted to search on Google until you could, and now Google is a constant companion of your life. We can surmise from this that the success of any innovation is proportional with its capability to create the experiences most conducive to emerge our latent behavior, and the desires that shape who we are in our best representation. On Facebook we have the best example of ‘who we are in our best representation’. No one will post there anything less.

Scenario Based Innovation and Decision Making

What will prompt us to engage in change? A vision of new possibility is a powerful attractor image for change. Another attractor is knowledge, specifically knowledge about the continuous transformation present around the world at every moment, and the fact that the present is constantly emerging. Understanding that the present is in a constant emergence means that something else has to be the variable, and that might be the business you are in. What is the variable in this statement is not your organization, but the capability around which your organization is formed. The variability of your current form of organization requires you to change. Change is not continual; it occurs only as a voluntary act, when one reacts dynamically to emergent forms of technology or behavior. A change strategy needs to be based on courageous foresight scenarios, scenarios that explore the nature of human beings in new contexts, and around new

behaviors. Humans are the ultimate medium through which technology manifests itself, and scenarios are the ideal platforms to explore these manifestations, and make strategic choices leading to change.

Scenario based decision making is all about having informed judgment about the present, in order to create future based advisory sets of possibilities. These possibilities are not best guesses, but designed futures, places that represent a desirable destination for the enterprise or group in question.

National level strategies need national level normative scenarios, which take into account how the innovation object will change, enhance, expand or redefine specific instances in the social, political and legislative realms, and which technologies might be developed as the result of the innovation object now available.

At the normative level (Figure 8) one needs the capability of articulating a number of scenarios from the most optimistic to the most pessimistic, in order to be able to prepare the norms by which we were create new methodologies or mitigate new impacts. As an example, look at the Internet and its impact on copyrights. The Internet allowed the transmission of data, which is expressed as ones and zeros, from one device to another device. At the point of the receptor device the information 001100011 is decoded and replayed back as music, so now we need laws that include the representation of music as data. The innovation object in this case is music recorded as data bits, and the impact is distributed in all corners of the

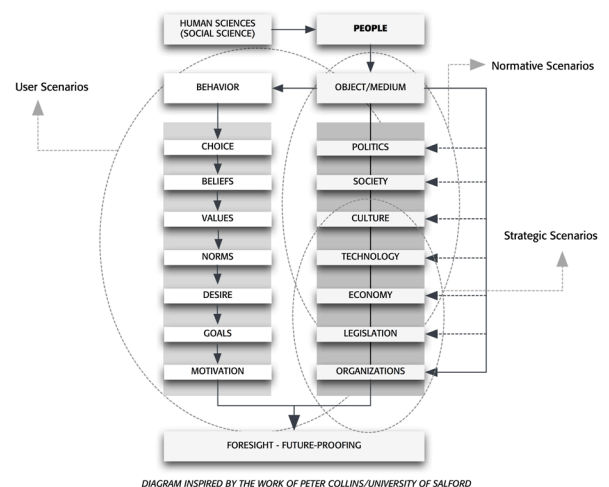


FIGURE 8 Strategic Value through Foresight Scenarios

10 Manu. A. 2010. Disruptive Business. Gower Publishing. p.174

social and economic landscape. The normative scenarios will need to explore the impact in society, culture, organizations and the economy, before describing the impact in legislation, which undoubtedly will follow.

Normative scenarios have no immediate strategic value, but inform about the possible shape of the economic, cultural and political space in which the other scenarios would operate. What is described in Normative Scenarios is the answer to the question: *How is the Landscape Changing?* The answer often takes the form of 'when this technology happens, this is what society will become!'

Normative scenario building often uses a framework of four quadrants of opposite possibilities, in a desire to explore all alternatives, even the less palatable one. I do not favor this technique as it restricts the free form and beauty of scenario writing, limiting it to a manufactured negative construct, which is just that, a construct. If we can construct a negative dystopia in order to get ready for its impact, we may as well use our imagination and construct a Utopia from the beginning. Constructing the richly imagined future gives organizations a powerful attractor image, rather than a scary version of the future. Scare tactics do not inspire; visions of a better future do.

Strategic and User Scenarios

Enterprises are interested less in what happens in the political or social realm, so they need a different type of scenario. They will need a strategic scenario as a tool allowing them to mitigate the impact of the innovation object, and design a desired future. A strategic scenario will be looking at the intersection between the object and the economic, technological, organizational and legislative framework. The organization also needs a different type of the scenario at the intersection of behavior inclusive of choice, beliefs, values and motivation and involving the life of users. Not just one user scenario, but many, because we have many users and each one with a different point of view, and each one informed by different beliefs, values and norms.

A strategic big picture scenario has two advantages: it discloses the big picture in which any user experience scenario operates –which allows a company to plan strategic approaches that deal with the new context– and

it can be used in turn as a point of departure for other scenarios, as it describes a new opportunity or attitude. A strategic scenario answers the fundamental transformative questions: What are the characteristics of the new market? What, therefore, are the characteristics of the organization that will best respond to this dynamic?

The value of strategic scenarios is that they plant early seeds for a new business strategy in the mind of the executive team. They plant an idea about the possible direction of their business, an idea that has attractor power, and enlists the intellectual acceptance of the executive. When executed properly, these scenarios deliver as if written by the company itself. This methodology forces corporations to understand the dynamic nature of society, and implicitly, the interdependent economic nature of the system of which they are a part. It forces them to articulate a vision for the future, and actively pursue strategies and tactics by which this future will become reality.

Scenarios help the leadership team prepare a strategic and imaginative response to emerging market conditions, and implement changes faster. Used at their best, scenarios create pathways for change, from sets of signals in the market space directly affecting the organization, and reveal the dynamic of the behavior space in which an organization functions. They provoke thinking and analysis; they define methods that engage an organization's ability to shape the future, to create options of possibility, and link any future activity to action today (see Figure 9).

The sustainable innovation enterprise needs a process by which informed judgment will result in shaping a desired future, thus future proofing the enterprise. The idea here is to mitigate an unknown over the course of time, and with as few ambiguities as possible. Defining a desired future, removes many of the uncertainties we associate with the future, and engages the passion of the enterprise in the present, toward achieving a common future goal. The method starts by formulating the strategic opportunity as a series of big ideas at the intersection of Driving Forces and Trends. The big idea gives shape to the discovery phase of this (see fig. 10)

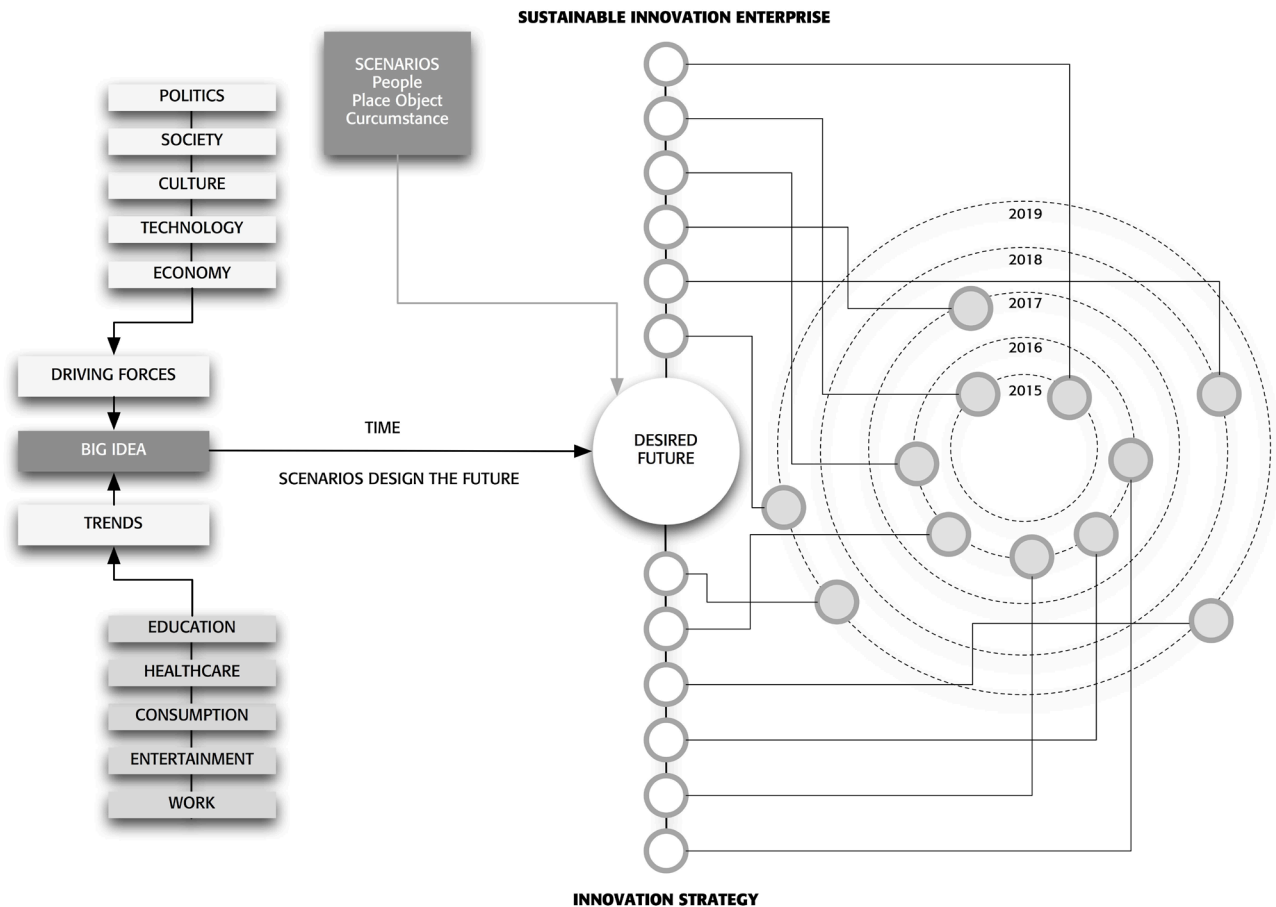


FIGURE 9 Sustainable Innovation Map

Inspired by the big idea –in this example I am using a Link Enabled Ecology- we produce a series of scenarios describing the desired future, from multiple points of view, and disclosing multiple benefits. The end result of this process is a large bank of scenarios that disclose new applications of technology, and new user benefits. In effect, what we now have are multiple intellectual property disclosures that form an innovation strategy, which will sustain the enterprise for a long time in the future. The tasks remaining are to prioritize these ideas, and enable them as user facing applications, products and services, which will be introduced gradually to the market, as the user base becomes familiar with their capabilities, and as these new products become new mainstream platforms for daily behavior.

The *'future as a choice'* strategy forces forward thinking and adaptive mindsets, without which maintaining growth is a practical impossibility. Once the future is outlined and it becomes an attractive image, this image

engages the spirit of the organization, its leadership as well as all participants alike. It gives purpose to the organization, becomes a shared vision and a destination. Shared visions are powerful tools for transformation in organizations and create compelling strategic value, and this the new expectation from the design profession in the age of data as material.

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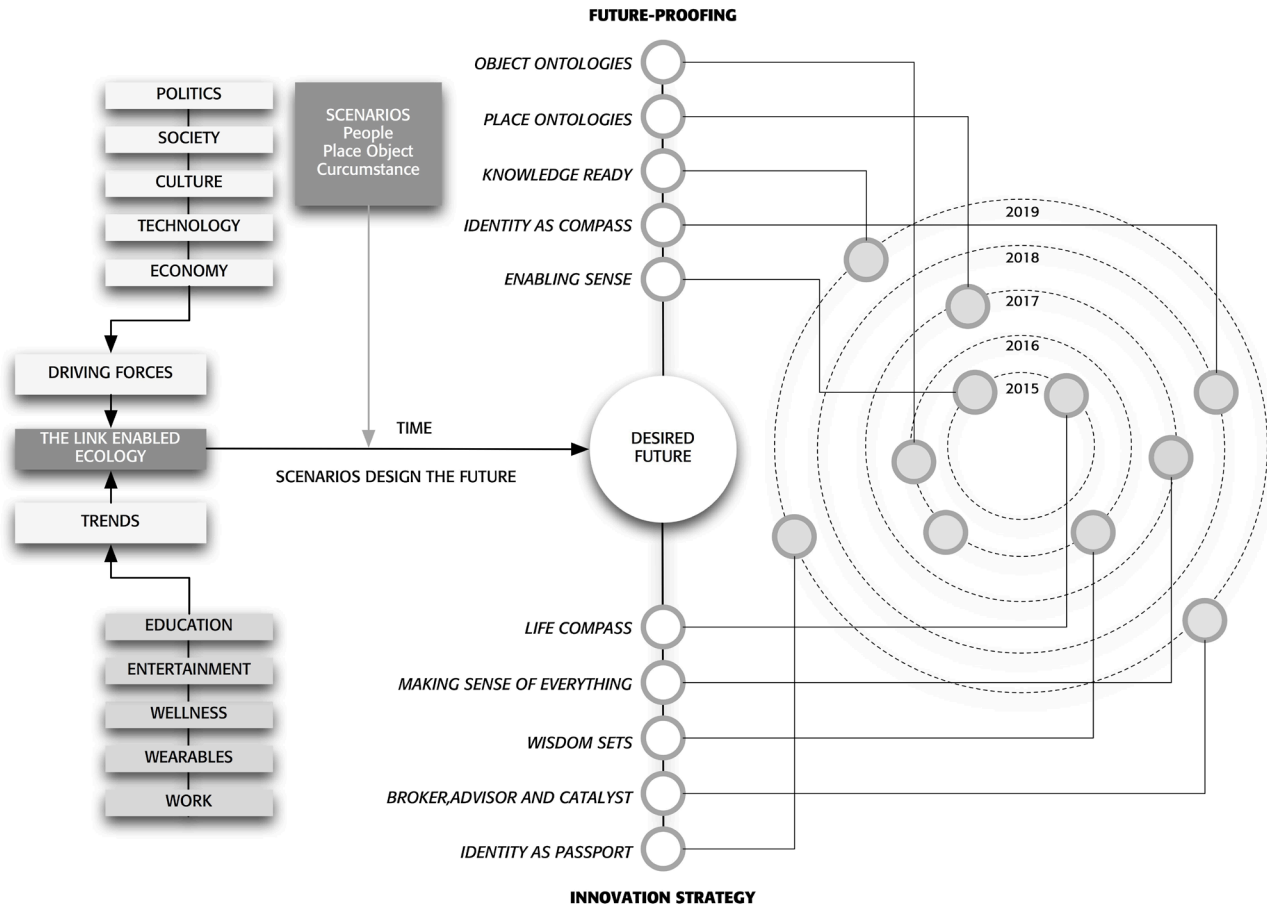


FIGURE 10 Link Enabled Ecology in the Internet of Things Innovation Map

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COMPILACIÓN

ARTÍCULOS DE INVESTIGACIÓN

Este número se terminó de imprimir el 15 de diciembre de 2018, por la Sección de Impresión y Reproducción de la Universidad Autónoma Metropolitana Unidad Azcapotzalco, con domicilio en Av. San Pablo No. 180, Col. Reynosa Tamaulipas, Alcaldía Azcapotzalco. Ciudad de México C.P. 02200, con un tiraje de 178 ejemplares.

En 2015 Design Week México encabezado por el Arquitecto Emilio Cabrero y con el apoyo del Gobierno de la Ciudad de México lograron la designación de la misma como “Capital Mundial del Diseño” World Design Capital WDC CDMX 2018, dicha asignación la otorga la WDO (World Design Organization) cada dos años, y por primera vez fue adjudicada a una Ciudad en América. El enfoque general planteado por el Comité de WDC fue el de Diseño Socialmente Responsable a través de 6 temáticas generales a desarrollar en eventos protocolarios (bajo lineamientos de la WDO) y lo que finalmente se denominó Agenda Local. Es en ésta última que la Universidad Autónoma Metropolitana decidió incorporarse a las actividades del Circuito Inter Universitario conformado por las escuelas de diseño de la zona metropolitana de la ciudad de México y en el que participaron instituciones de educación superior como el ITESM, la UNAM, Universidad Iberoamericana, Universidad del Valle de México, Universidad La Salle, Universidad Anáhuac, Universidad Centro y la Escuela de Diseño del INBA. Una vez conformado este Circuito el Comité de WDC generó el denominado “Pasaporte Universitario” mediante el cual los alumnos de Diseño de estas instituciones podrían acceder a las actividades de todas ellas.

El Área de Investigación “Administración y Tecnología para el Diseño” de la UAM Azcapotzalco, División de Ciencias y Artes para el Diseño y específicamente del Departamento de Procesos y Técnicas de Realización había realizado ya en 11 ediciones previas el Congreso Internacional “Administración y Tecnología para la Arquitectura, Diseño e Ingeniería”. Durante el XI evento en septiembre de 2017, la Maestra Graciela Kasep del Comité de Design Week nos acompañó como ponente en el ciclo de conferencias y compartió con la comunidad de Diseño de la UAM Azcapotzalco los objetivos y alcances de WDC CDMX 2018.