FROM ACCESS TO INFORMATION TO ACCESS TO EACH OTHER: WHY PUBLIC LIBRARIES SHOULD DEVELOP INNOVATION SPACES

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"We systematically overestimate the value of access to information and underestimate the value of access to each other." (Shirky as quoted by Hochman 2011)

Viewed through the lens of the library, this statement by Clay Shirky, new media specialist and professor at New York University, is particularly provocative. After all, libraries are in the information business. Is Professor Shirky challenging the library's underlying *raison d'etre*? Not necessarily. Although we will argue that libraries, in optimizing how they deploy computer and internet technology for people to meet their information needs, have unknowingly overlooked and even inhibited the use of computers for the purposes of creativity and innovation. Specifically, we suggest that there is a vast and unmet demand for physical environments, built around the notion of 'access to each other', environments that foster innovation. These innovation spaces, as we call them, can leverage features of the library that are common throughout the world: the physical space and the strong community presence.

We start by discussing the concept of innovation, what it is, and how it occurs. Then we introduce the idea of innovation spaces, physical spaces that embody the principles of what stimulates innovation, and describe different types of innovation spaces in society. Lastly, we return the focus to libraries and discuss opportunities and barriers to introducing innovation spaces in library settings.

INNOVATION

When it comes to computers and the internet, most of the world's libraries exemplify the 'access to information' model. In this model, the objective

of equipping libraries with public access computers is to enable people to meet their information needs. These needs are in areas like employment, health and education, as well as communication with family and friends. Access to information is a proven model, and libraries are in an ideal situation to provide information access and related services to assist people in accomplishing information-related tasks. It is no surprise that many libraries experience long queues for their computers.

But, while this model works well when it comes to access to information, it is not the best model when the objective is to stimulate innovation.

Innovation is a vast subject with a long and rich history. For purposes of this article, we are abridging our discussion in two ways. First, we adopt the notion that innovation has its place on a continuum that leads from imagination, the process of bringing to mind things that are not present to our senses, to creativity, the process of developing original ideas that have value, to innovation, the process of putting new ideas into practice (Robinson 2011). That is, in addressing the need for spaces that foster innovation, we are referring to the entire continuum.

Second, while there is a substantial literature on national or organisational innovation, our interest here lies in innovation at the individual level. At this level, innovation is about what stimulates creative thought and innovation in ways that fulfil individual aspirations for work, a hobby or personal growth. That is, it is not limited to entrepreneurial motivations, nor is it to be equated with invention. We are interested in innovation in its broadest sense, as it occurs in all realms of an individual's life. In discussing how our current social systems are not addressing society's rapid changes, Ken Robinson (2011) makes the case for creativity and innovation being the critical skill needed by any individual to navigate an uncertain future. As he points out, in the future, an individual's ability to be a creative and innovative thinker will outweigh most other skills. It is in this context that we choose to focus on the individual and explore opportunities by which individuals might be able to develop and enhance their capacity for innovation.

This said, we can now ask: Is access to information adequate for stimulating innovation, or are there better ways of accomplishing this?

To answer this, we need to ask a fundamental question concerning the birth and cultivation of innovative ideas. It may seem obvious, but in fact it is not

what it is commonly perceived to be. The popular notion is that innovation occurs when a person, deep in thought, toils away in the laboratory, pores over books, or otherwise engages in solitary activity unencumbered by the distractions of society. This continues until there is a "eureka!" moment and a new idea is born. Rodin's statue "The Thinker" is the visual embodiment of this notion.

This picture, however enticing or romantic, does not accurately depict reality. This is the lone thinker myth, not real innovation. Rather, the literature suggests that innovation occurs when ideas come into collision with each other; that is, when individuals interact with other individuals (Johnson 2010). These interactions allow ideas to bounce around, enabling people to refine and further develop their own ideas, while simultaneously providing stimulus for others. In other words, it is the 'access to each other' model that fosters innovation.

> Fundamentally, innovation is about how human beings get inspired to look in new places, work together and react to the unwelcome and the unexpected (Kingdon 2012).

Innovation is mostly about finding solutions to problems. It is about tackling a problem that has not been faced before. It is the story of going from the blank page, one step at a time, to reach a new solution and being able to say, "I did it". Some bemoan the fact that this story has been hijacked by the entrepreneurial community. Nevertheless, our interest is in the individual, whether for hobbies and personal growth or for starting a new business and we suggest that the innovation challenge is relevant for all of these purposes. An individual's ability to be creative and innovative, particularly when faced with the unwelcome and unexpected, is a critical skill for leading a satisfying life.

Building this skill and the confidence to use it require 'guided mastery', a concept developed by the psychologist Albert Bandura and adapted by David Kelly of IDEO and the Stanford school for innovation and creativity (Kelly 2012). It is a step-by-step process, as visualized below.
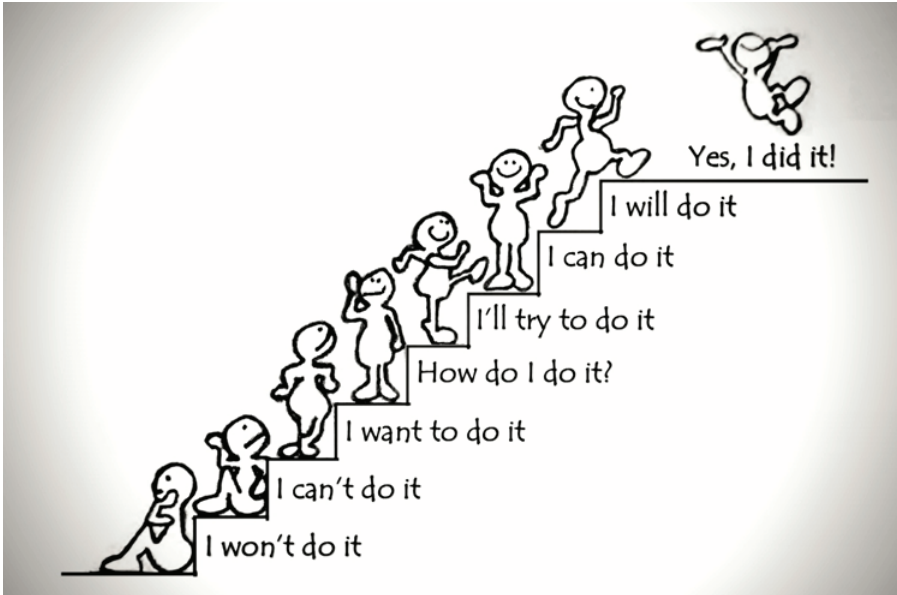
Figure 1: Step by step to self-efficacy (Source: Plant City Adult Learning Lab, FL)

Guided mastery has, it turns out, other benefits. Albert Bandura used it to cure phobias, and people who went through the process were ultimately less anxious about other things in their lives and developed a confidence he calls *self-efficacy—the belief that you can change the world and that you can attain what you set out to do.* Inherent in the guided mastery of creativity is a process whereby other individuals guide you along the way. This, too, is the 'access to each other' model, here fostering self-efficacy.

As this discussion illustrates, therefore, the 'access to each other' model enables creativity, innovation and self-efficacy. Human interaction is well known for its information dispersion capacity and this model builds on this same capacity as a means of generating ideas and confidence in individuals. It follows, therefore, that we need environments that encourage this form of interaction.

EMERGING INNOVATION SPACES

Enter the emergence of places designed explicitly for fostering innovation. They go by many names—coworking space, hub, makerspace, hackerspace, and fablab, among others. They are experiencing tremendous growth and popularity, and what makes them particularly effective is a design that is intentional about 'access to each other'. They have filled a strong need,

especially among adults and entrepreneurs. They are spaces that stimulate ideas while at the same time providing the possibility of finding a guide or multiple guides, supporting mastery in any given field. In this section we explore a number of innovation spaces, focusing in particular on stories coming out of Africa. Then we turn to the underlying principles and drivers of this movement.

Coworking spaces

The first space we introduce is the coworking space. Coworking spaces combine the conveniences and facilities of an office or home office with the aesthetics and vibe of a café. Popular among freelancers and particularly entrepreneurs, coworking spaces are distinctive from other shared workspaces or business centres, in that they comprise a community of people working alongside one another on their own projects or businesses. People become members of a coworking space not only because it is a place to work, but also because it is a means of connecting to a community of professionals with whom they can interact and exchange ideas. Coworking spaces are growing at an increasing rate, as is shown by the Global Coworking Census 2013 (DeskWanted 2013).
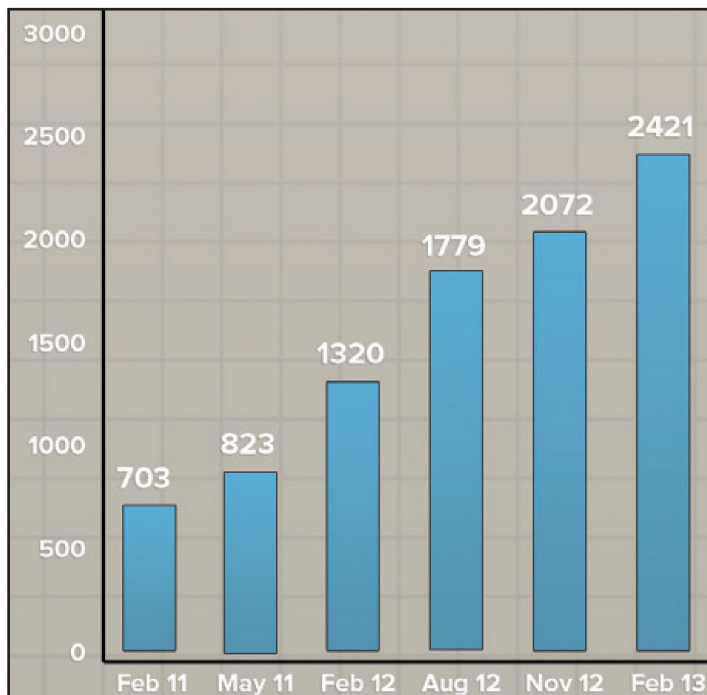

Figure 2: Growth of global coworking spaces (Source: DeskWanted 2013)

More specifically, coworking spaces provide a shared work place where members have access to facilities like a desk, meeting spaces, office equipment, a kitchen and other amenities. They are usually comfortable, pleasant and well-maintained working environments located in areas with easy access to other services like transport, other businesses and restaurants. In countries where internet and electricity services are unreliable, these locations often provide backup services that may not otherwise be easily accessible to the individual. They also provide a more acceptable address and environment to which a supplier, client or collaborator can be invited rather than a home office or a coffee shop.

Many coworking places host events, offer training, maintain job boards and hold regular social gatherings connecting the co-workers to each other and others in the outside community. All these activities further deepen a sense of community, while offering a venue for learning new skills and exchanging ideas with others.

A Jelly is coworking in event form. The name comes from the initiators, two self-employed people working from their New York apartment in 2006. Missing the camaraderie of colleagues, they started by inviting friends to a weekly full day event during which the invitees would work from their apartment. This invitation then spread to friends of friends and now to anyone who would like to join. These events have become constant in many cities, found and organized via web sites, where people come together to work together for a day; either in someone's home, a coffee shop or an office. Seating and wireless internet are usually available at the location and people are expected to bring whatever they need to work. They must be willing to interact.

Many coworking spaces go by the name of 'hub'. Nairobi's iHub is viewed internationally as a model. iHub Research, an arm of the iHub, has studied a number of hubs across Africa, synthesizing its findings according to the elements that contribute to a successful hub experience. As shown in Image 3, their findings point to the centrality of community. Community, person-to-person interactions, is what attracts an individual to become a member, and enables that person to realize his/her own aspirations. The other elements that support community are: a welcoming environment, personal growth opportunities, knowledge sharing, open interactions and internet connectivity. This stands strongly in contrast to a library that would feature information in this central role.
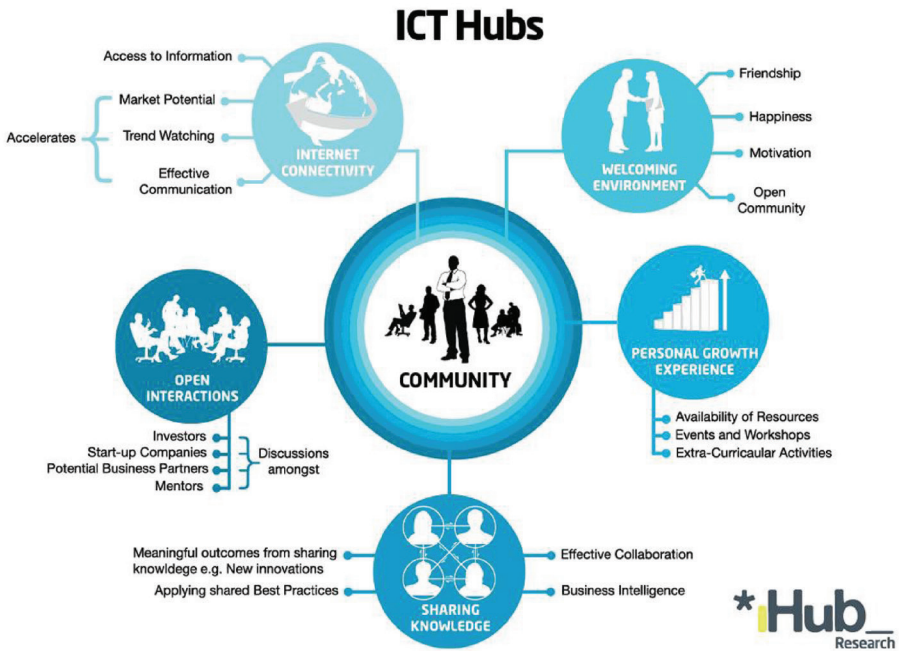
Figure 3: ICT Hubs: Elements of success (Source: iHub Research, 2013)

The iHub and hubs like it have also influenced the region and locality
by drawing other similar ventures to the area, growing an even larger
community focused on similar enterprises. In fact, Africa can be said to be a
leader in the hub movement (see Image 4 for a map of several of these hubs).
The international development community is particularly excited about
this movement. After devoting most of their attention to online services
and applications, especially for the mobile phone platform, they are now
seeing the value of physical place for supporting innovations that leverage
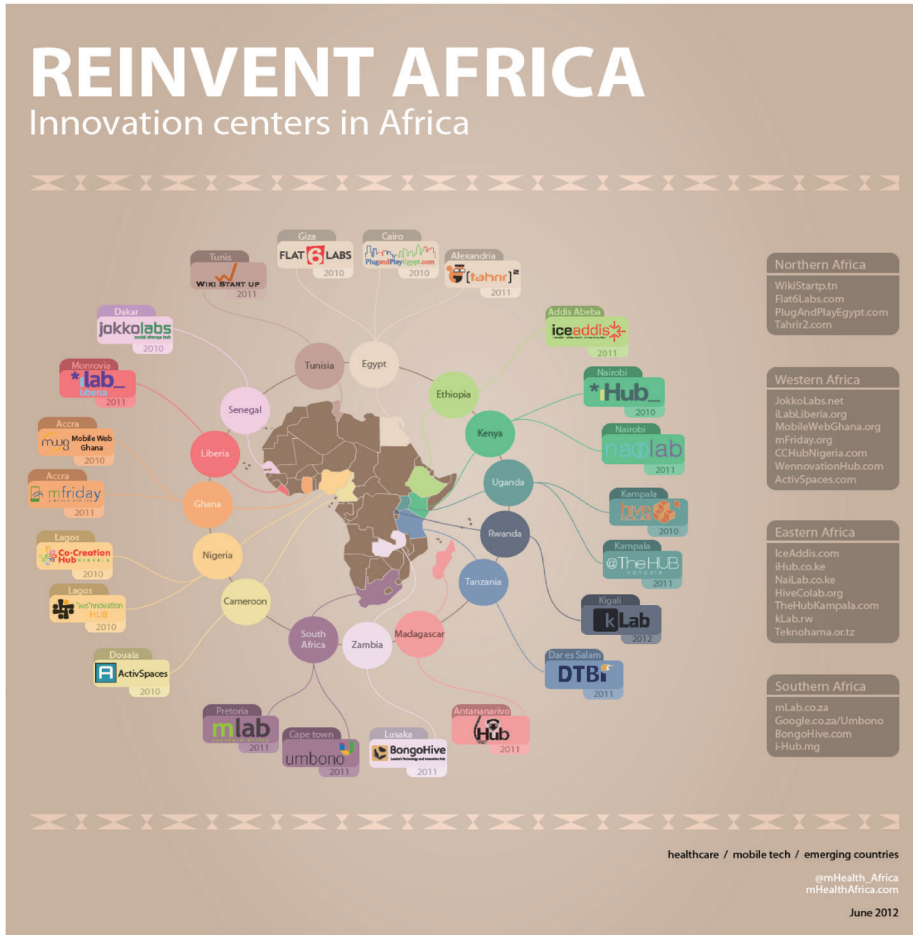information and communication technologies.

Figure 4: Innovation centers in Africa (Source: mHealthAfrica.com, 2013)

HACKERSPACES AND MAKERSPACES

Another type of space is known as the hackerspace, or makerspace. These spaces are typical of the DIY (do-it-yourself) culture. DIY is about taking things apart to learn how they work, and modifying and building new things without the aid of professionals. Hacker/makerspaces build on this DIY ethos, adding the notion of a community space where one can simultaneously learn from others and share one's own expertise. They foster experimentation, invention, creation, exploration and learning.

Historically, these spaces have usually been community-organized and led, and have provided a gathering and work space, to which equipment

and tools are brought and shared. The physical space and equipment are often paid for by community membership fees. Training and knowledge are shared freely among members, who in turn mentor newcomers.

The initial hackerspaces originated in Europe, beginning in Germany in the 1990s. They consisted of computer programmers who shared common work space much like the coworking spaces described above (Cavalcanti 2013). The term 'hack' refers to repurposing an object or piece of equipment or computer code to do with it something other than what it was initially designed to do. It is similar to DIY without the malicious connotation it now holds in much of the media. The use of the term makerspace was introduced as a result of the media hi-jacking of the word 'hacker'. The space broadened to include other forms of making beyond electronics. Wood and metal working and sewing are popular maker crafts.

Many hacker/maker spaces emphasise electronics and building physical objects. A core piece of equipment is the 3D printer, which is becoming more and more affordable. 3D printers allow one to make three-dimensional solid objects of virtually any shape. Laser cutters, vinyl cutters, CNC (computer numerical control) routers and CNC milling machines are often part of the equipment mix. Most of these spaces offer classes in how to use the equipment and work with various mediums (wood, metal, fabric) in addition to electronic circuitry. The physical space, range of equipment, and availability of instructors with specialist skills are features of these spaces.

One South African example is the Robohand. A carpenter who lives near Johannesburg lost fingers in a table saw accident. Using a 3-D printer and access to the internet (he had found someone in the United States who knew something about hands), he and his collaborator were able to fashion a functional set of fingers. The story continues when he was contacted by a local woman whose son had been born without fingers. With a donation from MakerBot, a leader in 3-D printers, the two set about fashioning a design that anyone can use. The first version of the hand cost about $150 to create, but by open sourcing the design the community has brought this down to a cost of under $5. This cost is well within reach of many families, allowing parents to produce new sets of fingers as their child grows.

Figure 5: Robohand (source: MakerBot Industries)

Makerspaces also manifest in event form, the Maker Faires, which bring people together in a festival atmosphere to share their talents and creations. A combination of the medieval fairground and the modern garage, Maker Faires mix old low-tech with new hi-tech, attracting tinkerers and techies. Since hacker/maker spaces are often squeezed into tiny places, the Maker Faire offers a venue where ideas can be shared with a much larger number of people. Again, Africa is home to some of the most vibrant Maker Faires in the world.

PRINCIPLES OF INNOVATION SPACE DESIGN

The phenomenal growth and spread of these emerging places point to the fulfilment of an unmet societal need. What do all these emerging places, be they coworking spaces or jellies or hacker/maker spaces, have in common? What are the lessons to be learned from the innovation spaces movement? In this section we discuss five key principles: community, serendipity, flexibility, tinkerability and the ability to play.

First we discuss the central concept of design intentionality. Design intentionality is what is employed to achieve the key principles. That is, it is about designing *for* community, *for* serendipity, *for* flexibility, and so on

(Image 6). 'Designing *for'* means that an innovation space is created and operated with the intention of awakening and promoting, in the minds of the users of the space, the behaviours associated with each one of the principles to be discussed.
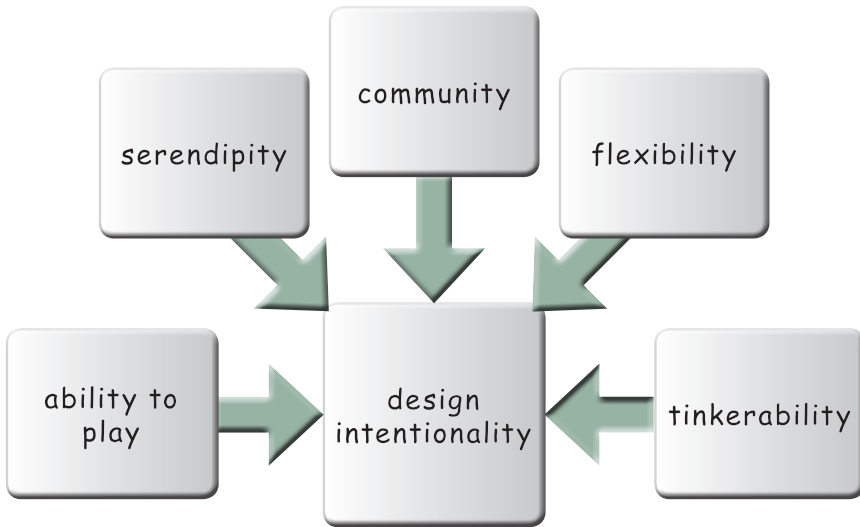

Figure 6: Five principles for applying design intentionality to innovation spaces

Design, as taken from the field of architecture, recognizes that the physical space around us has a profound impact on the way we think and interact with each other. As we shape our environments, through constructing interior spaces, buildings, neighbourhoods and cities, they, in turn, influence us, shaping our thinking and behaviours. Regarding innovation spaces, the configuration of the environment can promote the collision of insights and ideas, accelerating creative and innovative processes. On the other hand, this may not happen, slowing down one's access to fresh insights. It is important for anyone interested in stimulating innovation to take an active interest in the space in which they spend their time.

Design concerns more than the physical space itself. Design is also about the services, policies, rules, programmes, tools, resources, culture and any other characteristic that influences how a place is used. One can design a programme, such as a speaking event, where the entire focus is directed to the speaker, such as in a traditional classroom setting. Alternatively, it can be done in a way that combines the talk with a period during which attendees mingle and interact with each other and the speaker. Design permeates every decision and action we make, whether we are aware of it or not.

The degree to which each principle needs to be cultivated within the space is entirely contextual. Understanding the users and the types of lives they lead, their expectations and their community and national priorities, determines to a great extent what type of space fits a specific context. There is no one-size-fits-all model. What is important, however, is directing the design effort towards the space and the types of interactions to be encouraged, and not a specific end result. Furthermore, design is an on-going, iterative, participatory effort that changes over time in response to the evolving needs of the community.

Community

Building the feeling of belonging to a community is the most important and overarching design concern. As pointed out earlier, the research on hubs signifies the centrality of community in the success of any innovation space.

By community we are typically speaking of a community of interest. This is one in which people share some common interests, while not necessarily working in the same industry or profession. There is thus a certain degree of commonality allowing bonds to form, but sufficient diversity for new perspectives, insights and ideas to emerge. In hacker/makerspaces, it could be a shared hobby or skill. For instance, a coworking space may build its community around social entrepreneurs. A shared interest may also be to overcome a shared problem, such as starting a business. Very often the communities of interest consist of individuals who are passionate about everything they are doing and are very keen to share this passion with others. This results in reciprocity, an important builder of communal currency.

Intentionality in designing for community may take the form of designating staff, or one or more active, well-networked people, as community hosts and facilitators. The Center for Social Innovation (CSI) in Toronto staffs its coworking space with "community animators", people who are attuned to what various members are doing, connecting people whom they think will benefit from meeting each other (CSI Publications, 2013). They may also be the people who ensure that the facility is well supplied and maintained.

The reason community is often cited as the core building block is because it is needed for serendipitous interactions, a key ingredient for innovation. This is the next principle.

Serendipity

Serendipity or the accident of finding something good or useful while not specifically searching for it, is a critical element of creativity and innovation. Creative people get ideas and inspirations from chance encounters with other people, and so seek environments where such interactions are more likely to occur. In *The science of serendipity,* Kingdon (2012) discusses both the importance of serendipity, and how to create it. Spontaneity actually takes a lot of planning: "promoting microbursts of social interaction should be a managed activity". While serendipity cannot be predicted, it can be facilitated and accelerated when it is explicitly designed into the environment. It is said that Google designs even its cafeteria lines to be about three minutes long, enough to encourage talk among people in line without being too long to discourage people from eating in the cafeteria. The need to use entrances, stairs or lifts, the need to eat, or to use the toilet are all tools that force collision and promote microbursts of social interaction. Serendipity can also mean an encounter with another form of information, not just a human.

Flexibility

Flexibility in individual thinking is another important factor for innovation. Flexibility is associated with, and is an integral component of all the other principles.

Flexibility supports the manner in which all other interactions can take place. Planning flexibility is a critical choice for designing and operating. Changing spatial configurations of furniture, equipment and other fittings and events should be welcomed and accommodated as far as possible. It is often said that librarians complain about having to put the furniture back in its "proper" place at the end of the day, when perhaps this should be embraced, as this use clearly represents how patrons want to rearrange the environment in order to interact with one another.

Tinkerability

Tinkering is a way of approaching a question or problem in a playful, exploratory, and often iterative style. It amounts to a tweak and trial process, and is very central to the DIY mindset. In the maker community, it is also described as bricolage. Tinkering is not in any way limited to the physical or maker environments, but is also popular in approaches such as

design thinking, in generating ideas of 'how might we' (Washor & Mojkowski 2013). In solving problems, people in many places, often out of economic necessity, develop a DIY mindset, using whatever tools and resources that are available at the moment (Resnick & Rosenbaum 2013). Failing, evaluating and persisting are essential characteristics of the tinkering process, as are agility and the ability to use existing resources in new and context-appropriate ways. While traditional planning uses a top-down approach, tinkering works bottom-up. According to Resnick & Rosenbaum (2013) therein lies its benefit in addressing any rapidly changing problem or environment. It is easy to see why many of the world's leading innovators identify themselves as tinkerers.

In the space, providing materials, tools and guides contributes to an environment of tinkerability. It is most often a continuous process and emphasis on the process over the final product is a factor in designing for tinkerability (Resnick & Rosenbaum 2013). Tinkering is often associated with play and this is our next principle.

Ability to play

The ability to play, the last of our principles, is also applicable to the individual and the space. Play is not an activity for just the beginning of our lives as children, but is something significant to our entire lives. "The play-less adult becomes stereotyped, inflexible, humourless, lives without irony, loses the capacity for optimism, and generally is quicker to react to stress with violence or depression than the adult whose play life persists", according to researcher and psychiatrist Stuart Brown (2009: 2010). Play is categorized in seven types, including attunement, body, object, social, fantasy, story-telling and transformation and is an essential part of pushing boundaries, sampling possibilities and maintaining an agile and flexible mind (Brown & Vaughan 2010). The state of mind when you are energized and fully engrossed in an activity, which identified by Mihaly Csikszentmihalyi (1996, 1997) as 'flow', is often achieved when work feels or looks like play (Washor & Mojkowski 2013).

All types of play are facilitated by cultivating a low-risk environment that allows for stretching boundaries, making mistakes and serendipity. Playing happens in a safe, non-judgemental and supportive environment and leads to building bonds and forming community. The iHub in Nairobi has a foosball (table soccer) table in the middle of its space. Google has places for people to play games. Some creative companies provide for low-risk play environments or sandboxes as a way of very seriously

promoting innovation within the organisation. Google and 3M use play as the basis of their innovation programmes, allowing staff to spend a limited amount of time during working hours, using company resources in pursuit of individual projects. These companies have found mixing play with work leads to innovation. Innovation spaces need to support both seriousness and playfulness at the same time.

THE CHANGING ECONOMIC, SOCIAL, AND TECHNOLOGICAL LANDSCAPE

The innovation spaces movement is being driven by changes in the economic, social and technological landscape. In the United States, President Obama's Educate to Innovate initiative and his call in 2009 to "think about new and creative ways to engage young people in science and engineering… encourage young people to create and build and invent - to be makers of things, not just consumers of things" has generated renewed interest in using the creative process of making and being makers as a way of teaching essential skills in science, technology, engineering and mathematics (Kalil 2013). We see it also as a way of empowering individuals to build their capacity to imagine, create and innovate in their lives, as well as those who might want to build further on these skills by becoming entrepreneurs.

Economically, the labour force is undergoing systemic changes. In the U.S., freelance and self-employed workers now represent a quarter of the workforce, a figure that is expected to rise to 30% or 50% in the next few years (Gandia 2012). Similar trends are seen worldwide. This model is rapidly replacing the one whereby full-time employees work for a single corporation. The other significant change is the growing services sector, much of it knowledge-intensive and not dependent on on-site employment. The services sector now comprises two-thirds of the global gross domestic product (GDP). While they are higher in industrialized nations, services represent over 50% of the GDP in developing nations (UNCTAD 2013).

Technological changes have enabled and contributed significantly to these economic trends. Most obviously, the internet has fuelled global opportunities for remote work. Freelancers are able to perform work from anywhere and deliver services halfway around the globe. Using the internet, they can conduct research, find collaborators, join communities of interest or otherwise find information and engage with other people, unencumbered by the barriers of time and space. Corporations now commonly outsource significant volumes of work to freelancers and small businesses.

Social changes, too, are playing a major role. The popularity of maker/hacker spaces taps into a growing sustainability consciousness represented, inter alia, by the DIY culture, 'buy local' movements, small-scale agriculture and environmental stewardship.

Innovation spaces can also be viewed as fulfilling a need for 'third places'. This is a term coined by Ray Oldenburg in his 1999 book *The Great Good Place*, in which he discusses American society's need for an array of informal places outside of first places (the home) and second places (the workplace), where people can congregate (Oldenburg 1999). Oldenburg sets out a number of characteristics of third places, including:

- Free or inexpensive;

- Food and drink, while not essential, are important;

- Highly accessible: proximate for many (walking distance);

- Involving regulars – those who habitually congregate there;

- Welcoming and comfortable;

- Both new friends and old should be found there.

(Source: Wikipedia 2013)

Innovation spaces share all of these features, with the important distinction that they have an intentionality of design focused on cultivating creativity and innovation. This is in contrast to more traditional third places – cafés, tea-houses, bookshops and other community spaces that have no explicit purpose. Thus, while a freelance worker may find a comfortable, inviting environment at a coffee shop, the likelihood of coming into contact with people who share common interests and values, one of the cornerstones of an innovation space discussed above, is rare.

LIBRARIES AND INNOVATION SPACES

In certain countries, public libraries are third places and have long held this important role in society. They comply with the list of criteria above as general purpose third places. But can they support innovation spaces? Are such spaces congruent with the mission of the library? Or, to put it differently, should libraries promote the 'access to each other' model?

By no means are we suggesting that libraries should abandon the 'access to information' model. It is a successful and essential model that libraries have followed for centuries, first with books, maps and other physical artefacts, and more recently by means of digital technology and the internet. On the contrary, our aim is to build on this heritage and suggest that innovation spaces represent a natural extension of a library's mission. As the 'access to information' model in the library facilitates a more informed patron, we submit that the 'access to each other' model in the library could potentially facilitate a more confident and innovative patron.

Developing a capacity for imagination, creativity, innovation and entrepreneurship has always been part of what libraries do. They have typically pursued this by providing access to resources and assistance. In providing this access, the relationship between the patron and the resources or assistance is typically one-to-one. That is, a patron, acting alone, will check out a book, use a computer or ask a reference librarian for help. The twist we are suggesting is to consider the many-to-many model.

In fact, this is not a new model for libraries, and recognizing this requires a bit of 'vuja-de', or the ability to see something you have seen many times, and see it as if for the first time; it is the opposite of *déjà vu*. For instance, consider arts and crafts, an activity for children commonly found in most libraries around the world (see Image 7). Arts and crafts is normally a group activity, usually with a guide (recall the earlier discussion of guided mastery), and is full of creative expression, innovation (problem solving), and self-efficacy (going from "I won't do it" to "Yes, I did it!").

Figure 7: Cape Town Public Library (source: Brian Bannon)

No-one would consider isolating each child to work on his or her own in such an environment. Yet this is precisely what most libraries do when it comes to computer access. At the Cape Town library, a sign for computer use in the children's area stipulates: "*Only one learner allowed at the computer. If you don't listen to this rule you will be logged off*".

There may be some valid reasons for this rule, but at the same time this is representative of the traditional library mindset, lodged in the 'access to information' model wherein each person should have a one-to-one experience with the computer.

What if the arts and crafts model were extended to the use of technology and to adults? While still quite nascent, there is a growing movement to equip libraries with hacker/makerspaces and coworking spaces. There are several prominent examples in the United States, from both large metropolitan areas and small rural villages. These include the Chicago

Public Library (Maker Lab), the Fayetteville Free Library (Fab Lab), and the Chattanooga Public Library (4th Floor), among many others. There is tremendous excitement around these innovation spaces, judging by both the number of people who use them and the attention they have received in both traditional and social media. There is a strong need for public libraries, with their truly public mission, to develop these sorts of spaces. The value and benefit to society are captured by journalist Signe Brewster:

That made it especially exciting to hear that Chicago opened a maker lab in one of its public libraries today. Most maker spaces carry a membership fee of $50-200 a month or are located in an institution like a university, where you are required to be a student or staff member to access equipment. A free lab that is open to the public is a novel concept that will hopefully be a lot more common in the future (Brewster 2013).

This highlights a key distinguishing feature of public libraries: they are available to all members of the public for free or reduced fees (many places, such as the Chicago Public Library, charge for materials and consumables, like charging for printing). By contrast, most hacker/makerspaces and coworking spaces carry membership fees, as they require revenues to support their operations.

The growth of global coworking spaces as depicted earlier (Image 2) is indicative of the increasing demand for such spaces. Other research supports this. For example, as part of a global study on the impact of public access to information and communication technologies, research on cybercafé users in Ghana showed that one half of the visitors came with their friends, family or colleagues; two thirds of the users reported that sharing the physical space made coming to the venue more productive for them, and; three quarters of the users were interested in environments that support better collaborative group work (Best et al. 2013) (Image 8). This is powerful data, and we posit that a survey of library users would yield similar results. It is no surprise that, at the end of the day, librarians constantly have to return the furniture to its original location.

1/2 of users come with others – family, friends and colleagues

1/2 of users find sharing physical space made coming to venue more productive

3/4 of users were interested in environments supporting better collaborative group work

Figure 8: Cybercafé users in Ghana (source: Best et al. 2013)

The global explosion in innovation spaces represents a tremendous opportunity for libraries. With their public mission and functioning as a community hub, public libraries are ideally positioned to play an important role in enabling community members to have the confidence and skills they need to realize their aspirations, whether these be a new hobby or a business. Innovation occurs when people come into contact with one other, allowing sharing of ideas and techniques, and sparking inspirations. For a library aiming to develop an innovation space, the process is most effective when it adopts a user-centred approach, typically drawing on design thinking, a methodology generalized from the field of design. It is different from the information-centric approach commonly found in the library field, and, as such, it requires a different orientation and another set of skills if it is to be implemented effectively.

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