

## Government as a Platform? Public Virtual Structures for Participation and Service Delivery

*"It may well be that the current period presents this rare combination of external and internal disruptions to the existing governance structure"<sup>1</sup>*

### 1. Introduction

Information produced by citizens could be the essence of a public administration that seeks to reinvigorate its capabilities lost during the neo-liberal period. In the traditional model, the citizen expects services in return for taxes paid. When the services do not meet expectations, the "participation" is often limited to a protest/voice or exit. In the now emerging new view of government, administration in its various forms reaches into the virtual space, capturing the motivation and talents of citizens, their "cognitive surplus", which has been neglected by the private and public sector. This cognitive surplus of ideas and talents is integrated into the processes of policy formulation and service delivery using modern social media tools and virtual platforms. This co-option is often achieved with negligible transaction and marginal costs to solving collective problems at the community, state, national and international level: The ability to tap the cognitive surplus becomes part of a country's political and economic competitive advantage and shows a way out of the dilemma of "post-democracy", which describes the dependency of politics on the private sector. As the desire (or rather need) for utilising the cognitive surplus continues, we can expect the administration system to evolve into a kind of partner state that supports activities of its citizens by providing data, applications and interaction spaces as they compete and collaborate with the traditional economic and administrative sector by using various forms of the peer-to-peer (P2P) approach that has been successfully implemented in the Open Software community. Therefore, services must not ultimately be delivered by state organisations, but rather, platforms must be provided to allow for the self-organised interaction of citizens to solve their pressing issues. In times of financial hardship, these models seem to make even more sense.

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### 2. Forces of Disruptive Innovations

The transformations that are occurring in our societies have their root in the globalisation and technisation/digitalisation of the economy (Fuhr 2005). These changes lead to a different understanding of the roles of the state, the citizens, and the fabric and cohesion of society.

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<sup>1</sup> Anheier/Korreck (2013: 87).

## 2.1 The Limited State

The efficient and effective organisation of public administration is restricted for two main reasons: the structural limitations of the classical hierarchical Max Weber model aggravated by neo-liberal conceptions of the role of the state, and the financial meltdown that occurred in 2008/2009.

Hierarchies do not seem to cope with the expectations of a complex world. Breaking down information and work into smaller bits and bytes leads to institutional performance that is far away from a required capability: to act efficiently, responsively, flexibly and innovatively. Trying to put the small work packages together again, designing and governing complex programs from a command height is almost impossible in a complex environment.<sup>2</sup> Even worse: Hierarchies do not make good use of the capabilities of their workforce, let alone the talents and motivations of their customers/citizens. Hierarchies select and use only certain aspect of the talents and motivations of individuals and neglect the rest.<sup>3</sup> Being aware of these limitations, or rather of the propagated often poor performance of government agencies, the neo-liberal model has argued for cutting back the role of the state, replacing it with market mechanics, which, however, cannot substitute public action and public goods. Thus, the role of the state has been mitigated over the last twenty years, cutting back capabilities for development and service delivery to a further extent and leading observers to describe the situation of government as being "post-democratic". This phenomenon describes a weak government that cannot act on behalf of the citizens but is left to the mercy of market forces, which exert influence and co-opt state activities to serve their interests (Crouch 2004). The weakening capabilities of the state show themselves even in developed nations, as they suddenly seem incapable of implementing complex programs (i.e. "Obamacare", "Energy Transition" in Germany). The final blow came with the financial crisis, which required the state to save the market, with the effect that the public had to take over market debts, cutting back further on its own abilities in the near future.<sup>4</sup>

## 2.2 Peer-to-Peer Collaboration as a New Force of Production

Given that the talents and motivations of individuals (employees and citizens) have often been excluded by hierarchies, individuals can now use social media to do more for themselves, by themselves or with others (Benkler 2006: 8). Using digital devices, the individual can act as a free producer, as a peer, to produce, enrich and redistribute

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<sup>2</sup> For an early and still impressive critique, see: Marglin (1974).

<sup>3</sup> For this problematic selective inclusion process, which rejects "unwanted aspects" of the personality but always gets too little of the wanted traits (commitment, quality ...), cf. Neuberger (2000: 500).

<sup>4</sup> For a summary of this discussion, cf. Al-Ani (2013).

information, thus creating a new social (and political) relationship coined “peer-to-peer” production. This P2P process of collaboration uses existing technologies (smart phones, computers, technical infrastructure...) and available time at negligible margin costs to engage in production processes, creating “non-exclusive” goods, *commons*, that are available to anybody for free.<sup>5</sup> A new scheme of production is emerging, one that is not explainable by the current logic of micro- and macroeconomics, as non-profit motivations and inclusive property rights are used. In addition, current systems of resource allocation are obsolete in this sphere. In a hierarchy, our superiors decide; in the market, prices decide; in a democracy, “we” decide. However, “(...) *where resources are abundant, as they are with immaterial knowledge, code, and design, which can be copied and shared at a marginal cost, they are truly unnecessary.*” (Bauwens 2012). Clearly, these P2P relationships have a different collaboration and governance logic. Individuals select, by themselves, work packages they are truly interested in and work when and as much as they like/can. Of course, this is not a non-hierarchical world, but its hierarchies are fluid and tend to be used to ensure participation (rather than exclusion). Furthermore, with individuals governing themselves, less management overhead is necessary: “*The old model for coordinating group action requires convincing people who care a little to care more.*” (Shirky 2008: 181). Experience from Open Software organisations has been very instructive: The mechanisms of self-selection and self-governance avoid this problem in the sense that the work effort is an individual choice and the great number of participants balance the various levels of input “(...) *so that people who cared a little could participate a little, while being effective in aggregate.*” (ibid). There are many impressive examples of P2P production besides the common success stories (Linux, Mozilla and Wikipedia) and this mechanism has now entered into the public sphere, creating public goods.<sup>6</sup> Even more fascinating is that the state (and of course private companies) is now scrambling to use these P2P processes fuelled by cognitive surplus, co-opting processes and

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<sup>5</sup> Nobel laureate Elinor Ostrom (1990) re-introduced the commons into the economic sphere. Writing before the internet era, she came short of describing that commons in the information technology era are something rather different than commons used to govern natural resources as described in her ground-breaking work. These new information commons are not affected by the “tragedy of the commons” (Hardin 1968), for instance. The value of the information commons created through P2P processes is not diminished by use, but on the contrary enhanced by it: it is governed “(...) *by a Comedy of the Commons, or using a similar metaphor, producing a Cornucopia of the Commons. This is so because of the network effect, which makes resources more valuable the more they are used.*” (Bauwens 2005). With the advancement of technology, Ostrom later noticed this as well: “(...) *open access to information is a horse of a much different color than open access to land or water (...). With distributed knowledge and information the resource is usually nonrivalous.*” (Hess/Ostrom 2011: 13).

<sup>6</sup> Bollier (2004) notices “*Librarians, who are trying to protect free access and circulation of knowledge. Scientists, who are trying to preserve their foundational traditions of openness, collaboration and free inquiry. Creative artists in music, film and other fields who realize that culturally compelling creativity depends upon their ability to use prior works and collaborate with others. Media reformers, who are trying to reclaim the public airwaves for public benefit, whether through open spectrum commons or auctions. Indigenous peoples, who are trying to retain some measure of cultural sovereignty by preventing Big Pharma and other commercial predators from appropriating their traditional knowledge and art. Online user communities, who wish to protect their ability to communicate among themselves without the impediments of market transactions.*”

peers in a myriad of shapes and variations.<sup>7</sup> In their former role, citizens only had the possibilities of revolting (voice), leaving (exit) or – as public goods are often delivered by a monopoly – accepting the unsatisfying level of services. Now a new strategy is available: “*To resist is to create!*” (Holloway 2005: 25), or in other words: to use available P2P production processes, talents and resources of peers to create or enrich public services: A new way to produce is emerging. “*By this I mean: a new way to produce anything and everything, whether it is software, food, or cities. What once required rigid organisations and a society defined by the mentality of hierarchies, we are discovering now (and in many cases re-discovering) how to do through free association of peers.*” (Bauwens 2012).

### 2.3. The Rise of the Multitude

The vacuum of the retarding state is now filled to some extent by P2P collaborations and processes. The attractive innovative power and problem-solving and product-enrichment capabilities of P2P are the target of a co-option strategy by private and public organisations. This rise of the importance of the individual and corresponding new collaboration schemes also reflects a deeper transformation of the societal constitution. Conventional thinking of a societal fabric consisting of classes, ethnical groups, is being challenged by a more individualistic perception of the “multitude”. “*The multitude is composed of innumerable internal differences that can never be reduced to a unity or a single identity—different cultures, races, ethnicities, genders, and sexual orientations; different forms of labor; different ways of living; different views of the world; and different desires. The multitude is a multiplicity of all these singular differences.*” (Hardt/Negri: XIV). Unanswered for some time was the question of how this multitude of individuals unites and cooperates. With the understanding of P2P the picture becomes clearer: The individual can now use P2P to unite for a specific purpose, making use of the “general intellect” (Virno 2008) or the cognitive surplus (Shirky 2010): The multitude is a multitude of thinkers and producers that can use new relationships and technologies to collaborate. This collaboration however, is by no means comparable to former loyalties defined by ethnic or ideological adherence. It is transient, rather tied to a specific topic and timeline associated with the topic. Thus, examples of citizens’ use of platforms that address certain public issues in Germany show that these technologies allow for a selective and time-specific inclusion of citizens (Der Standard 2012: 9). Once the specific task of the platform/collaboration is fulfilled, members exit to seek new tasks.<sup>8</sup>

## 3. The New Role of the Citizens and the State

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<sup>7</sup> For this co-option movement and resulting hybrids often labelled Netarchies, see Al-Ani (2013: 223) and Bauwens (2012).

<sup>8</sup> “(...) individuals can do more in loose affiliation with others, rather than requiring stable, long-term relations (...)” (Benkler 2006: 9). For the specific characteristics of political collaboration platforms (large, small, long-lived and short-lived), cf. Anheier/Nassauer (2012: 17).

Social-media-enabled collaboration and available skills give citizens the option of participating in the production process of government tasks. Public policies can be influenced – at least to some extent – by citizens. Although this process of adding a discussion level to state services seems to have its limitations, on a local level, at least, the impact is obvious. Perhaps even more important, the citizens in their role as free producers begin to be more interwoven into the process of service delivery. The community evolves into a community of contributors that create commons of knowledge, software or design.

### 3.1. Peers and Policy Formulation

The most obvious impact of social media is its capacity to mobilise voices cheaply and quickly. This has been demonstrated by the use of social media for the purposes of political mobilisation and even political resistance (Shirkey 2011). With the use of smart phones and the like, virtually everybody can become a sender of information and has a propensity to influence opinion in one way or another. In Europe, the development of a new constitution in Iceland, which used the participation of the crowd, and the opening of some law-making processes to interested contributors in Germany demonstrate limited but successful experiments.<sup>9</sup> These examples show how the traditional system of government has introduced parts of the P2P logic to increase its capacity to find solutions to issues and, ultimately, also enhance the legitimacy of these solutions via crowd participation. The German example demonstrates how the original system of law making has been amended by introducing a further – virtual – member of the law-making body, serving as an interface to the crowd.<sup>10</sup>

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<sup>9</sup> For a summary of German open policy formulation experienced mainly at the communal level, see, for instance, the platform provided by the Bertelsman Foundation (<http://www.beteiligungskompass.org/>).

<sup>10</sup> For the example of Iceland, see: The Guardian (2013). For the use of social media in US election campaigns, see Shirfy (2004), and in the Obama election campaign, Heigl/Hacker (2010: 17).

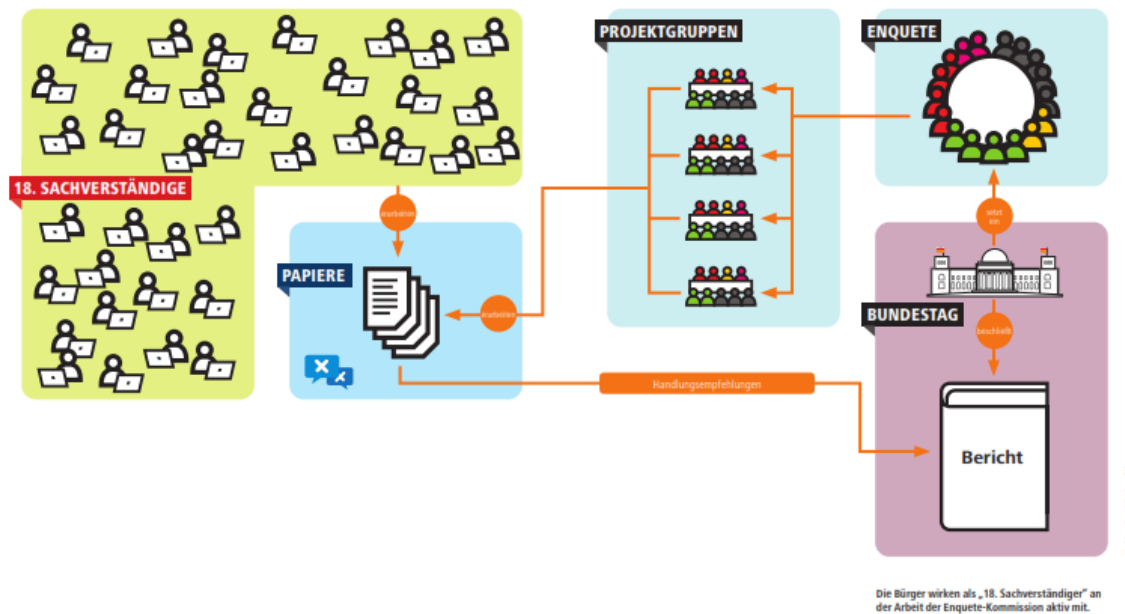


Figure 1: The crowd acting as a virtual 18<sup>th</sup> member of a law-making special committee of the German parliament (Bundestag). Source: Fischalek (2012).

The early hopes however, that some kind of liquid democracy or electronic democracy would emerge and pave the way for a *deliberative democracy* (Habermas 1998), or at least for a discussion layer guiding and reflecting capitalist mechanisms (Brown 2010), have not yet materialised. There may be several reasons for this:

- The deliberative process is seen by many as not being effective enough to influence politics. The arena of deliberation, or the “political periphery” as described by Habermas, is too far away from the real decision making at the “political centre”: *“Deliberative democracy relegates the role of citizens to discussions only indirectly related to decision making and action. The reality of deliberation is that it is toothless.”* (Noveck 2009: 37) In practice, as it often seems to turn out, civic talk is largely disconnected from power. *“It does not take account of the fact that in a web 2.0 world ordinary people can collaborate with one another to do extraordinary things.”* (ibid). This may explain why most examples of open policy formation are found at communal level: here, motivation is direct and the distance to decision making is short;
- Not only is the political influence of deliberation limited, it is often clear what needs to be done. Thus, action to change things is more pressing than discourse, as recent interviews from Occupy movement members revealed: *“One interviewee states that it is almost too trivial to formulate global problems Occupy is concerned with, because they [are] the same topics [that have been] moving people [for] decades: environmental*

*destruction, war, lacking possibilities of democratic participation, an unjust world order, putting profits before people, a disrespect of human rights, drastic cuts in education and social services, to name the most prominent ones. There is no need to come up with specific topics, since there are enough pressing issues as it is.*"(Anheier/Nassauer 2012: 26);

- Peer-to-peer collaboration in itself is not democratic, but rather *meritocratic*: The status of its participants is tied to their output performance only. The outputs need not be produced in a democratic, organised manner, but rather by the right producers, as the peer-to-patent project revealed. Here, peers acting as experts were asked to evaluate patents. As it turned out, not masses of peers and talents were needed for that evaluation, but rather point skills: *"The excitement of modern collaborative environments (call it Web 2.0 or what you will) lies in the hope of bringing the masses on board to create something collectively. Hundreds of thousands, it is thought, can be not only consumers but producers. But more often than you'd think, what you need is not hundreds of thousands, but just five or ten people who know best."* (Oram 2007);
- There are few examples of the rule of the many. Even in democratic systems, we are more accustomed to the rule of delegates. Thus, the involvement of the multitude the Athenian way has few examples and seems difficult to achieve. Our political culture is ill equipped to deal with a broad understanding of citizen participation. Rather, *"(...) the devaluation of citizenship is an integral component of a 'successful' modern democracy; not a failure to be corrected by technical means."* (Varoufakis 2014) Effectively, *"(...) e'democrats will be facing the task not simply of involving more people in deliberations regarding policy making but, more ambitiously, of deploying new technology as a part of a broader political intervention whose purpose is to re-invent the political sphere."* (ibid);
- We do not seem to have tools yet that allow for the deliberation of complex issues. Rather, we seem to use liquid democracy tools to ask ready-formulated questions, which is not stimulating enough. Furthermore, traditional political institutions are lacking the experience to generate attention and resonance for political topics.<sup>11</sup>

### 3.2 The Citizens as Producers of Public Services

While using P2P sources and processes to enhance policy formulation remains, at the time being, a rather mixed experience, expectations for the positive effects of producing or enriching public goods are more promising. In line with the above findings, Gilding (2011:251), who evaluated social services performed by peers, came to the conclusion: *"What these examples show is that people have stopped talking and started acting."* This is due to the fact that the production model of P2P is clearly geared to directly tapping into the intrinsic motivation and talents of the citizens, in other words the cognitive surplus, in a very efficient way. Moreover, ubiquitous collaboration technology seems to compensate for a missing

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<sup>11</sup> See the examples of Swiss political parties and their restricted use of web tools to connect with the crowd in Kruse (2010).

infrastructure in developing countries and might trigger a development process unseen.<sup>12</sup> Of course, the integration of peers into the process of delivering public services can have many shades and variations. An emerging pattern, however, seems to be that in return for market or product information provided, citizens contribute information to the service provider, who uses this to further enrich his services and learning content. A very impressive example is the use of Open Agriculture Solutions in Africa. Here (mainly private or NGO) producers of agricultural services provide information and learning content to the citizens/customers, who in turn send feedback adding further value to the services (see Table 1). Furthermore, using the virtual platform, peers interact not only with the provider but also with other peers. A typical mixture of peer-to-peer and company-customer relationships emerges. Other examples, such as the Ushahidi platform, resemble more a classical P2P relationship: an open source platform provided for free, as a commons, which allows peers to collaborate to collect and analyse information about security issues (Anheier/Korreck 2013: 106).

#### **iCow**

The iCow platform has a series of dairy agri products that are available over a simple menu system. Farmers dial a short code, \*285#, and access a simple menu that guides them on how to subscribe to the various products. After subscribing, the system sends messages to users at intervals – depending on the product choice.

#### **Rural eMarket**

Developed for rural Africa, Rural eMarket is a simple yet powerful solution to communicate market information, using smartphones, tablets or computers. The use of appropriate ICT solutions can improve transparency and access to market information and transform the livelihoods of rural populations.

#### **Esoko**

Esoko is Africa's most popular mAgric platform for tracking and sharing market intelligence. "It links farmers to markets with automatic market prices and offers from buyers, disseminates personalised extension messages based on crop & location and manages extension officers and lead farmers with SMS messaging.

#### **FarmerConnect**

The FarmerConnect Platform is a cloud-based and mobile-enabled platform that delivers personalised agricultural extension services and text/audio information intelligence in local languages to smallholders and farmers who otherwise do not have access to or cannot comprehend information from traditional sources. Such service helps them stay connected with the information and aiding agencies on a daily basis, increase their yields/incomes, and reduce hunger, poverty and under-nutrition. FarmerConnect, in a nutshell, hosts a one-stop market place for agricultural communities, including service seekers (Farmers), service enablers (Government, NGO and Private agencies) and service providers (Agronomists, Markets Trackers, Weather Stations etc.).

#### **M-Shamba**

M-Shamba is an interactive platform that provides information to farmers through the use of a mobile phone. M-shamba utilises the various features of a mobile phone, including cross-platform applications accessible in both smart and low-end phones, and SMS to provide information on production, harvesting, marketing, credit, weather and climate. It provides customised information to farmers based on their location and crop/animal preference. Farmers can

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<sup>12</sup> Smart phone coverage in Southern Africa is almost higher than in parts of Europe (Fox 2011).



also share information on various topics with each other. M-shamba is currently being used by 4,000 rice farmers in Kenya to help them adopt new technologies in rice farming.

#### **Mobile Agribiz**

Mobile Agribiz (mogribu.com) is a web and SMS mobile application that helps farmers decide when and how to plant crops, select the best crops for a given location using climate and weather data, and connect to the available market. It helps connect farmers to buyers, and helps them to source important, relevant information (e.g. how to plant crops, how to use fertilizers) and necessary data aggregates (e.g. weather, crop pricing) from various sources. Farmers can easily connect with customers by sending an SMS with their phone number, information on goods, prices and quantities for sale. This information is plotted into a map on servers, enabling customers to see farmers' information, the goods they are selling, their quantities and location, and make a connection.

#### **AgroSim**

AgroSim is a valuable tool for decision-making in agricultural projects. It works primarily on data collected online and provides a virtual representation of the different stages of crop growth and development as would be the case in reality. It is an event simulator able to anticipate the quality and quantity of the productivity of a desired crop by taking into account data related to seed, soil, hydraulic climate, geography, macro-economy and the demographic of the targeted area.

#### **amAgriculture**

Developed by Access.mobile, amAgriculture is an analytical tool that helps agri-businesses understand underlying business trends, manage transactions, cut costs, increase revenues and mitigate risk. Core product features include agricultural input data collection and management; agricultural output data collection and management; transactional data tracking from agent transactions with farmers in cooperatives/networks [...]

#### **Farming Instructor**

Farming Instructor is a mobile app that provides online and offline agricultural information (text, speeches and animations) to farmers and their communities. The application is created specifically to inspire youth and all other groups in the society to have the passion to engage in agriculture as the means to self-employment. With this app, the user or farmer can source all the necessary information related to agriculture, as well as share and comment on other farming tips and advice.

Table 1: Agricultural Applications/Platforms in Africa. Source: IT News Africa (2013).

#### 4. The Emerging Partner State

The aforementioned examples of collaboration may now lead to a new role of the state: a state that rather enables and empowers the social creation of value by its citizens. It protects the infrastructure of P2P cooperation and the creation of commons: The state evolves into a manager of a "marketplace", stimulating, enabling and organising the assets of the country – the abilities and motivations of its citizens – in an efficient manner. The state will use modern devices and digital platforms to do this. By providing the prerequisites of peer production, the strategy of the state changes: Instead of providing the services all by itself, a strategy that encourages and enables peer production becomes relevant. *"Can we imagine a new compact between government and the public, in which government puts in place mechanisms for services that are delivered not by government, but by private citizens? In other words, can government become a platform?"* (O'Reilly 2009: 65). We can already observe that

some states and nations are embarking on, or rather, trying out, this kind of role. An interesting project to be cited in this context is the Flok project of Ecuador, which aims at elaborating ways towards an “open economy” (see Figure 2). Clearly, in order to stimulate peer production, a set of enabling practices are needed.

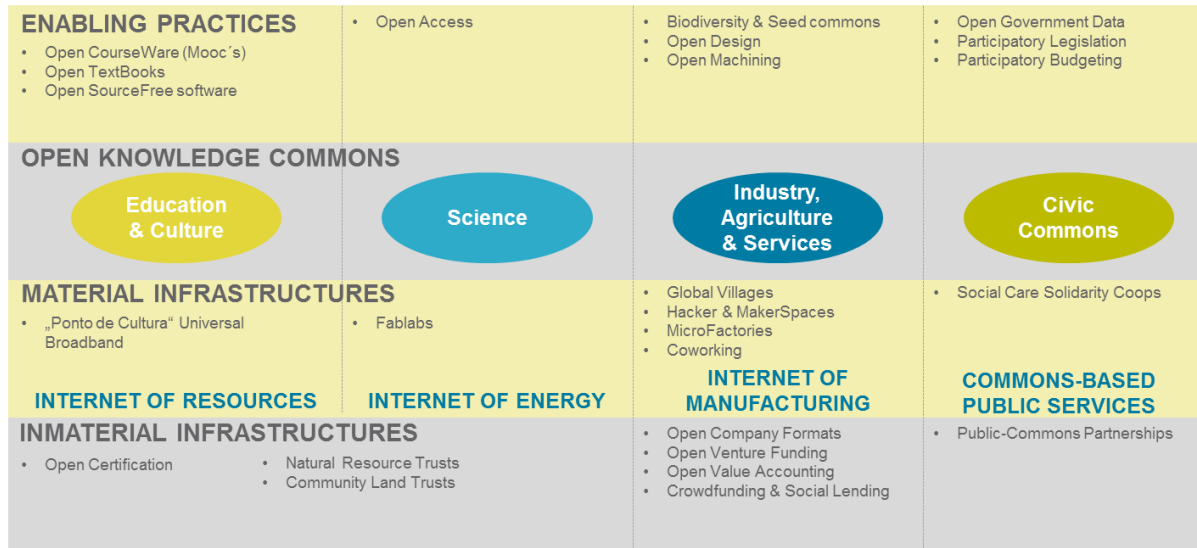


Figure 2: Open Knowledge Society Project Ecuador. Source: Flok Society (Free/Libre Open Knowledge Society) (<http://flocksociety.org/>).

The peer is a typical knowledge worker. This implies that access to learning content is crucial to peer productivity, allowing the knowledge worker to retrieve learning contents for free, on demand, preparing him/her for the next task. The impact of digitalisation on education is already impressive and will have a massive impact on society and the economy. Suddenly, the *Edupunk* way of learning becomes attractive and possible: a strategy of individuals who can have access to online education free of charge in order to create meaningful products in the net.<sup>13</sup> This strategy is already available to anybody who has access to the web and understands the language of the content.<sup>14</sup> Already, major universities – sometimes behaving as commoners – are spreading their content via digital outlets all over the world, as, for example, the edx.org network of Harvard and MIT (edx.org). On a smaller scale, the above examples of agricultural solutions have demonstrated that peers can also learn from other peers (lateral learning) and will in turn produce learning content while acting as peers.<sup>15</sup> The

<sup>13</sup>. The term was coined by Jim Groom in a blog in 2008, cf. Al-Ani (2014: 12).

<sup>14</sup> Even language problems are not the ultimate restriction, as the experiments of Mitra et al. (2005) with slum children in India have clearly demonstrated. The concept also showed that digital learning needs to be complemented with some sort of moral support und coaching (which can be delivered online as well, as the example usage of British “grannies” supporting Indian students online showed: <http://grannycloud.wordpress.com/>).

<sup>15</sup> The important effects of lateral learning are described by Rifkin (2011: 244-8).

role of the state should here embark on a non-elitist learning strategy and open up learning content for anybody for free.<sup>16</sup>

Peers not only need personal skills. In order to produce or enrich products, access to designs – often protected by copyrights – is necessary.<sup>17</sup> Clearly, copyrights are the most visible battleground between the traditional economy and the P2P sphere.<sup>18</sup> Here, the state should propose the use of peer property rights that ensure that peer products remain free and accessible. In addition, the means for reproducing infrastructure (tools, hardware and software) must be given.<sup>19</sup> Here, for instance, relatively inexpensive 3D printers provided by the public will be helpful in reproducing parts of complex scientific tools (Open Source Lab): *"Working replicas of expensive scientific equipment could be made for a fraction of conventional costs using cheap 3D printers, possibly saving developing world labs thousands of pounds each time."* (The Guardian 2014). Peers already provide design plans for almost any agricultural tools (Open Ecology) to be reproduced using simple and available tools.<sup>20</sup> Eventually, the state could provide libraries for all kinds of relevant products to be downloaded by peers: *"This regime of open, shareable knowledge would move away from the idea of privatized knowledge accessible only to those with the money to pay for copyrighted and patented knowledge. The system could be adapted for education, science, medical research and civic life, among other areas."* (Bollier 2014). Of course, the data produced by the state must be opened up as well and be accessible to anybody, thereby increasing the availability of relevant data for market transactions, product design and delivery.

All these prerequisites and contents will be delivered through physical infrastructure (IT, Telecommunication), which needs to be open and accessible to the public at minimum possible cost. Also, the state could support and provide virtual platforms that people use to collaborate, as for instance demonstrated by the "meetup" platforms that enable citizens to

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16 For the "Edupunk Guide to Education", a manual supported by the Bill Gates foundation, see Kamenetz (2010) and (2011). For new strategies of universities: Al-Ani (2014). For Sub-Saharan Africa, see the results of the Tessa program of the Open University, which aimed at giving teachers access to teaching content using smart phones (<http://www.open.ac.uk/about/open-educational-resources/oer-projects/tessa>). .

17 See here, for example, the successful fight of Brazil and Civil society organisations for AIDS drug patents. The Brazilian Administration used P2P mechanisms to mobilise civil support for the cause (Fischer-Lescano/Teubner 2004: 1027f.).

18 See here the work of Lessig (2004).

19 See here the example of reproducing hardware using the raspberrypi hardware assembling kit (<http://www.raspberrypi.org/>)

20 Open Source Ecology provides *"Open Source Blueprints for Civilization. Build Yourself. We're developing open source industrial machines that can be made for a fraction of commercial costs, and sharing our designs online for free. The goal of Open Source Ecology is to create an open source economy – an efficient economy which increases innovation by open collaboration."* (<http://opensourceecology.org/>).

communicate about relevant events and also to collaborate to rectify issues of mutual interest.<sup>21</sup>

## 5. The Perils of Political Co-Optation and Individual Overextension

Strikingly, this concept of a state draws support from all over the political spectrum, as it allows the perspective of lean government focused on the provision of infrastructure and simultaneously supports the notion of a decentralised, participatory and enabling administration. As the administrative systems are constantly being contested by increasing expectations of citizens and the economy while having less financial means and capabilities available, the co-option appears to be the only reasonable way out of this dilemma. The dangers associated with this situation becomes exemplified by the Big Society program in the UK – as criticised by Bauwens (2012) – “(...) *which uses a superficially similar language of civic autonomy and action, but hides a completely different practice, i.e. is based on a strategy to further weaken the welfare states and its provisions. A partner state cannot be based on the destruction of the public infrastructure of cooperation. What the British Tories did was to use the Big Society rhetoric to attempt to further weaken the remnants of social solidarity and throw people back to their own wits without any support. There was no enabling and empowering, but rather its opposite.*” The peer production of common value requires civic wealth and strong civic institutions. The partner state that is complementary to P2P production is not a minimal or retarding state concept. On the contrary, it is based on the best of the welfare state, i.e. solidarity mechanisms, education, open access to almost everything. It is very central in this context to understand the pressures and requirements of working as a peer. For the first time in history, perhaps, a system begins to emerge that allows us to collaborate with other peers on a truly global scale and share information and knowledge without boundaries. Yet this approach is based on the idea of the knowledge worker of the typical (Western) middle class. The requirements of a peer working style are very demanding for the individual. An overall assessment of what this could mean for the entire population is not yet available.<sup>22</sup> The “overextension” of the individual, who not only self-selects and self-manages, but also self-educates, seems like a real threat. Although modern technology can compensate by supporting and educating in a more efficient way, these techniques cannot fully replace a

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<sup>21</sup> “Meetup is a platform for people to do whatever they want with. A lot of them are using it for citizen engagement: cleaning up parks, beaches, and roads; identifying and fixing local problems.” (O’Reilly 2009: 65).

<sup>22</sup> Florida (2010: 99), however, who propagated the New Creative Class, is quite clear in this context: “We not only take all the risks of our job moves, we assume the task of taking care of our creativity-of investing in it, and nurturing it. (...) Increasingly workers have come to accept that they are completely on their own – that the traditional sources of security and entitlement no longer exist, or even matter.”

lacking welfare and social system.<sup>23</sup> Just as the web is not democratic in itself, it does not provide a self-enforcing social code.

## 6. Conclusion

As states struggle to finance/deliver meaningful services to their citizens, providing platforms and stimulating self-organisation of customers seems a prudent strategy. It must be clear, however, that this participatory platform approach is not a substitute for missing democratic institutions at the local or national level. Rather, these platforms must be linked with legitimate institutions to provide services that capture the desires and motivations of citizens on meritocratic bases and at the same time provide a democratic legitimisation. Thus, we can expect a merger between the behaviour and organisation of the state and the behaviour of self-governing, self-identifying peers organising themselves around platforms. As experience from the private sector shows, the mechanisms of hierarchy and P2P are dramatically different. Hybrids resulting from a hierarchy co-opting decentralised functions of peers (Netarchy) face challenges as they struggle to define viable interfaces that serve as efficient translators between the two spheres. In any case, we can suspect that this co-optation process between the traditional structures and peer production emerging on platforms will serve as a dramatic transformation mechanism over the next ten years.

## Literature

Al-Ani, A. (2013): *Widerstand in Organisationen, Organisationen im Widerstand. Virtuelle Plattformen, Edupunks und der nachfolgende Staat.* Wiesbaden.

Al-Ani, A. (2014): *Edupunks und neue universitäre Strukturen* In: Keuper, F./Arnold, H. (eds.): *Campus Innovation - Education, Qualification and Digitalization.* Berlin (in print).

Anheier, H./Korreck, S. (2013): *Governance Innovations.* In: *The Governance Report 2013.* Oxford, 83-116.

Anheier, H.K./Nassauer, A. (2012): *The Swarm Intelligence. Mapping Subterranean Politics in Germany.* Country Report Germany. Working Paper. Berlin.

Bauwens, M. (2005): *The Political Economy of Peer Production.* In: *ctheory.net*, 12 Jan. 2005. Online available: <http://www.ctheory.net/articles.aspx?id=499>, (5 May 2012).

Bauwens, M. (2012): *Blueprint for P2P Society: The Partner State & Ethical Economy.* Online available: <http://www.shareable.net/blog/blueprint-for-p2p-society-the-partner-state-ethical-economy>, (10 March 2014).

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<sup>23</sup> This is why extensive social protection in the form of basic income is envisaged by some observers (Hardt/Negri 2004: pos. 2418). To some extent, these ideas seem to resemble the concept of the English Poor Law, so vividly described by Polanyi (1944: 79).

Government as a Platform? Public Virtual Structures for Participation and Service Delivery: Paper presented at the Winelands Conference March 2014, Stellenbosch South Africa, currently under review

Benkler, Y. (2006): *The Wealth of Networks. How Social Production Transforms Markets and Freedom*. New Haven.

Bollier, D. (2004): *The Commons as a Movement*. In: *Commons Magazine* (onthecommons.org) (8 Nov. 2004). Online available: <http://onthecommons.org/commons-movement>, (1 June 2012).

Bollier, D. (2014): *The FLOK Society Vision of a Post-Capitalist Economy*. Online available: <http://bollier.org/blog/flok-society-vision-post-capitalist-economy>, (10 March 2014)

Brown, M. T. (2010): *Civilizing the Economy. A New Economics of Provision*. Cambridge.

Crouch, C. (2004): *Post-Democracy*. Oxford.

Der Standard (2012): *Die Bürger müssen eingebunden werden*. Gisela Erler, in Baden-Württemberg Staatsrätin für Bürgerbeteiligungen, über die „Politik des Gehörtwerdens“, intelligentes Beteiligen und Minderheiten als Sensoren. 6 Nov. 2012, 9.

Fischaleck, F. (2012): *Demokratie reloaded*. In: *Politik und Kommunikation*, 2/2012, 12-13.

Fischer-Lescano, A./Teubner, G. (2004): *The vain Search for Legal Unity in the Fragmentation of Global Law*. In: *The Michigan Journal of International Law*, Vol. 25, Summer 2004, 1000-1046.

Florida, R. (2011): *The Rise of the Creative Class Revisited*. New York.

Fox, K. (2011): *Africa's mobile economic revolution. Half of Africa's one billion population has a mobile phone – and not just for talking. The power of telephony is forging a new enterprise culture, from banking to agriculture to healthcare*. Online available: <http://www.theguardian.com/technology/2011/jul/24/mobile-phones-africa-microfinance-farming>, (28 Feb 2014).

Fuhr, H. (2005): *Constructive Pressures and Incentives to Reform: Globalization and its Impact on Public Sector Performance and Governance in Developing Countries*. In: Hodges, R. (Ed.) *Governance and the Public Sector*. Cheltenham, 525-549.

Gilding, P. (2011): *The Great Disruption*. New York.

Habermas, J. (1998): *Faktizität und Geltung. Beiträge zur Diskurstheorie des Rechts und des demokratischen Rechtsstaats*. Frankfurt/M.

Hardin, G. (1968): *The Tragedy of the Commons*. In: *Science*, No. 13, December 1968, Vol. 162, 1234-1238.

Hardt, M./Negri, A. (2004): *Multitude. War and Democracy In the Age of Empire*. New York.

Hess, C./Ostrom, E. (2011): *Introduction: An Overview of the Knowledge Commons*. In: Hess, C./Ostrom, E. (eds.): *Understanding Knowledge as Commons*. Cambridge (MA), 3-27.

Holloway, J. (2005): *Change the World Without Taking Power. The Meaning of Revolution Today*. London.

Kamenetz, A. (2010): *Edupunks, Edupreneur, and the Coming Transformation of Higher Education*. White River Junction.

Kamenetz, A. (2011): *The Edupunk's Guide to Education. To a DIY Credential*. Online available: <http://diyubook.com/wp-content/uploads/2011/07>, (10 Nov. 2012).

Government as a Platform? Public Virtual Structures for Participation and Service Delivery: Paper presented at the Winelands Conference March 2014, Stellenbosch South Africa, currently under review

Kruse, P. (2010): Rechts, Links, Mitte – Raus! Vom politischen Wagnis der Partizipation. Interview von Ulrike Reinhard. In: Heuermann, H./Reinhard, U. (eds.): Reboot\_D – Digitale Demokratie. Oldenburg, 44-59.

Lessig, L. (2004): Free Culture - The Nature and Future of Creativity. London.

Mitra, S./Angwal, R./Chatterjee, S./Jha, R.S./Kapur, R. (2005): Acquisition of Computing Literacy on Shared Public Computers: Children and the "Hole in the Wall". In: Australasian Journal of Educational Technology, 21, No. 3, 407-426.

Neuberger, O. (2000): Individualisierung und Organisation. Die Wechselseitige Erzeugung von Individuum und Organisation durch Verfahren. In: Ortmann, G./Sydow, J./Türk, K. (eds.): Theorien der Organisation. Wiesbaden, 487-522.

Noveck, B.S. (2009): Wiki Government. How Technology Can Make Government Better, Democracy Stronger, and Citizens More Powerful. New York.

O'Reilly, T. (2010). Government 2.0.: It's All About the Platform. In: Heuermann, H./Reinhard, U. (eds.): Reboot\_D – Digitale Demokratie. Oldenburg, 60-67.

Oram, A. (2007): In Search of Micro-Elites: How to Get User-Generated Content. Online available: <http://radar.oreilly.com/2007/11/in-search-of-microelites-how-t.html>, (18 May 2012).

Ostrom, E. (1990): Governing the Commons. The Evolution of Institutions for Collective Actions. Cambridge.

Polanyi, K. (1944): The Great Transformation. The Political and Economic Origins of Our Time. Boston.

Rifkin, J. (2011): The Third Industrial Revolution. How Lateral Power is Transforming Energy, the Economy, and the World. New York.

Sifry, M. L. (2004): The Rise of Open-Source Politics. Online available: <http://www.thenation.com/article/rise-open-source-politics>, ( 19.May.2012).

Shirky, C. (2008): Here Comes Everybody. The Power of Organizing Without Organizations. New York.

Shirky, C. (2010): Cognitive Surplus, How Technology makes Consumers into Collaborators. London.

Shirky, C. (2011): The Political Power of Social Media. Communications Technology will Help Promote Freedom - But it Might Take a While. In: Foreign Affairs, January/February 2011, Vol. 90, No. 1, 28-41.

The Guardian (2011): Mob Rule: Iceland Crowdsources its Next Constitution. Online available: <http://www.guardian.co.uk/world/2011/jun/09/iceland-crowdsourcing-constitution-facebook>, (10 Oct. 2012).

Varoufakis, Y. (2014): Can the Internet democratise capitalism? Online available: <http://yanisvaroufakis.eu/2014/02/21/can-the-internet-democratise-capitalism/>, (1 March 2014).

Virno, P. (2008): Grammatik der Multitude. Vienna.