ENABLING ENTREPRENEURSHIP WITHIN VIRTUAL WORLDS: THEORIZING THE ROLE OF GOVERNANCE AND CULTURE

Anuragini Shirish, CERDI, Faculté Jean Monnet, Université Paris-Sud 11, France, anuragini.tandalam@u-psud.fr
Shirish C. Srivastava, Department of Operations Management & IT, HEC Paris, France, srivastava@hec.fr
Shalini Chandra, S P Jain School of Global Management, Singapore, shalini.chandra@spjain.org

Abstract

Recent times are witnessing the emergence of entrepreneurship within virtual worlds (VWs). Although, VWs offer opportunities for entrepreneurial activities, their use for such activities is rather limited. We posit that the lack of an internal governance framework within VWs, specifying the rights, duties, responsibilities and obligations for its different stakeholders is limiting the growth of entrepreneurial endeavors within VWs. In this research-in-progress paper, grounding our study in literature on governance and trust, we propose a legitimate governance framework (LGF) for fostering user trust in VWs – as past research has shown that user trust may be the key for entrepreneurial ventures. Further, because VWs are highly diverse and multi-cultural in nature, we examine - if the proposed LGF in VW would be equally effective across different cultures. Specifically, we theorize the moderating influence of the three cultural value dimensions: power distance, uncertainty avoidance and individualism/collectivism - on the relationship between the proposed LGF and user trust in VWs. We plan to test the proposed hypotheses through a combination of survey method and interviews with VW entrepreneurs. The study, by integrating the role of governance and culture in VWs, is expected to contribute to the literature on entrepreneurship in VWs.

Keywords: governance, culture, trust, adoption, entrepreneurship, virtual worlds.
1. INTRODUCTION

Virtual Worlds (VWs), which originated as mediums for gaming and leisure activities, are increasingly being utilized for meaningful social, educational, collaborative and entrepreneurial business pursuits (Boughzala, 2012; Chandra et al. 2012). As per the current estimates, there are about 300 different VWs - with a total of almost one billion registered users (KZERO 2012). A significant segment of these one billion users are making use of VWs for a variety of entrepreneurial activities (Frelande et al. 2011). Possibility of creating and trading virtual products using virtual currency, which is convertible to real money, has resulted in a market economy within the VWs. Virtual worlds are no longer mere social spheres - but have evolved into transactional platforms where virtual goods are traded - US$9bn - being the current estimate for this virtual economy (KZERO 2012). Although, many real world laws and rules can regulate the activities of the VW provider and its users, such as, taxes on income, regulations on securities, infringement of third-party trademark, piracy, and terrorism. Yet, most trade within VW happens under informal social conventions that are not bound by any formal governance mechanisms (Lastowka 2010; Stikova 2010). The absence of legal and regulatory governance structures within VW is a cause of concern. Research suggests that unregulated environments, because of lack of predictability and increased risk, tend to inhibit fostering of user trust, which in turn can restrict future entrepreneurship and trade in such environments (see Risch 2009).

Entrepreneurship in VWs is the result of a complex interaction amongst and between various VW actors, primarily - VW service provider, individual VW user, the VW entrepreneur and the VW technology. Of special importance is the relationship between the VW service provider and the VW service user/entrepreneur. The Institute of Electrical and Electronics Engineers (IEEE), has recently appealed to the regulators and policy makers for taking virtual communities seriously, and it has taken upon itself to craft best practices for reducing technical barriers to interoperability among various technological interfaces within the VWs (Kathy et al. 2011). Moreover, as virtual and real worlds converge, the laws and rules that govern virtual experiences will increasingly impact the real life experiences and actions including the ones related to business and entrepreneurship (Fairfield 2008).

In this research, we posit that the lack of internal governance structures describing the rights, duties, obligations and restrictions for different VW actors may inhibit fostering of user trust in VW. Prior research has shown that lack of user trust will have multiple negative implications related to adoption, continuance and usage of new technologies including VWs (e.g. Chandra et al. 2010; Srivastava & Teo 2009; Teo et al. 2008). These implications will result in not creating a favorable environment for facilitating entrepreneurship within VWs. Without delving deeper into the negative consequences of lack of user trust in VWs, in this study, we first propose a LGF for VWs, and then theorize the mechanisms through which proposed LGF promotes user trust in VWs.

In addition, previous research on governance structures in the real world has shown that cultural values influence the efficacy of regulatory structures (Licht et al. 2007). Culture, therefore, plays a key role in determining the efficacy of governance structures. In a multi-cultural environment, like the VWs, where national borders are not a limiting criterion, users from various cultures join together to pursue their entrepreneurial intentions. Hence, it becomes pertinent to examine whether the cultural values of the VW users influence the effect of governance structures on individual user trust - which in turn is expected to influence the entrepreneurial activity within VWs. In the context of VW communities, we believe that the three cultural value dimensions - power distance, uncertainty avoidance, and individualism/collectivism, proposed by Hofstede (1980), will influence the relationship of governance mechanisms with user trust. Examining how user culture interacts with the governance mechanisms will inform us on the ways to govern users from different cultural backgrounds. This knowledge will be especially useful in helping to adapt the governance frameworks depending upon the level of impact it has - from liberal legitimate governance mechanism to a more restrictive legitimate governance mechanism. Hence, this unique knowledge about the influence of users’ cultural values on their individual trust in VW will help in designing appropriate governance frameworks for different user groups. In addition to proposing a legitimate governance framework LGF for VWs, the two specific research questions that we intend to examine in this research are:-
• RQ 1: Does the proposed LGF for VWs foster user trust in VWs?
• RQ 2: Is the relationship between LGF and user trust in VW moderated by the cultural values of the users?

There are three primary contributions that this research-in-progress paper expects to make. First, grounding this study in governance literature, we conceptualize and propose a LGF for VWs. Second, we theorize the mechanisms through which the proposed LGF will influence the level of user trust in VW, which is an essential condition for utilizing VWs for entrepreneurial endeavors. Third, we theorize the moderating influence of culture on the relationship of LGF with user trust in VWs. Which signifies that despite implementing an LGF in VWs it is essential to be cognizant of the cultural values of the users so as to govern VW users in a culturally congruent fashion, thereby leveraging users’ support and co-operation in governance. Users’ disposition to accept the governance mechanism will further aid in fostering trust in VWs.

2. THEORY DEVELOPMENT AND HYPOTHESIS

2.1 Developing a Framework for Legitimate Governance in Virtual Worlds

The current governance structures in VWs are inadequate and often biased towards the interest of service providers (Roquilly 2011; Suzor 2010). VWs are primarily governed by service provider implemented rules in the form of contracts between VW provider and the users, referred to as Terms of Service (TOS) or End User Agreement (EUA) which are often lop-sided and lean heavily on the side of the VW service providers. The terms are mostly unjust and unclear, leaving users blind in relation to several issues (Radin & Wagner 1999). In the event of a conflict between the user and the provider - users are generally left high and dry with the only one recourse, namely - to exit the VW whose governance doesn’t seem fair (Mayer-Schonberger et al. 2006). As long as VWs were merely sources of recreation, this arrangement worked well - but in the present scenario of increasing entrepreneurial activities within VWs, there is a need to carefully examine the governance structures within VWs. For developing a framework for legitimate governance within VWs, we draw upon the existing literature on governance.

The academic literature on governance is relatively eclectic and relativity dis-joined (Jessop 1995) The extant literature on governance has diverse theoretical roots - institutional economics, international relations, organizational economics, development studies, political science, and public administration (Stoker 1998). These different theoretical perspectives define governance in different ways (Rhodes 1996; Srivastava and Teo 2012; Weiss 2000). Traditionally the term ‘governance’ was considered a synonym for ‘government’. In political theory, government refers to formal institutions of the state and their monopoly of legitimate coercive power. From a development studies perspective, governance is defined as the process of decision-making and enforcement of decision making (UNESCAP 2009). For the purpose of this paper, we define governance as a complex set of institutions and actors that describe the duties, obligations, rights and responsibilities of the different actors within the VW. Governance, therefore, deals with the manner and means to exercise authority on the VW users and the service providers to bring about order and development.

Developing further on the concept of governance it is important to understand - what is meant by legitimate governance in the context of VWs. Legitimacy, taken as a political concept, describes the exercise of power to rule. Beetham (1991) postulates three conditions of legitimacy of such power “the conformity to establish rules, the justifiability of the rules by reference to shared beliefs, and the express consent of the subordinates, or the most significant among them, to the particular relation of power” (p 91). It is therefore possible that the power in any context can be less or more legitimately exercised. It now becomes necessary to see how much of legitimacy can one bring to any system of governance. Legal philosophers support institutional norms and principles that describe the degree to which the interaction among the governed and governor is provided and regulated by formal or procedural laws in place (Fuller 1969; Rawls 1971; Raz 1979). Most of all, the exercise of power and governance is considered legitimate when it is exercised according to an accepted set of laws (rules) and not in an arbitrary fashion (Dicey 1915). Based on a review of literature on legal provisions for
legitimate governance, we propose that any governance framework for being legitimate should follow three basic principles - Rules must rule, Fairness in formal actions/procedures, and Participatory decision making. Taken together, this describes the LGF that we describe below in the context of VWs.

2.1.1 Rules must rule

For the purpose of this paper - rules must rule - means, that the entire governance mechanism is guided by the predefined extant rules. Rules (which may include, contractual agreements, codes, community rules, guidelines, real life laws and similar forms as may arise within a virtual community) will establish the basis of interaction amongst the various stakeholders namely, VW providers/managers, designers and individual users or groups and lay down the rights and obligations of each of the respective parties. Even the VW provider, who can control the VW infrastructure and possess all informational knowledge about the other parties, would have to be subjected to such accepted rules. This principle also enunciates that - rules (like real world laws) are equal and nondiscriminatory. Rules that are arbitrary shall not be enforceable. All decisions must be based on the extant rules and not arbitrarily. Moreover, recognition of some basic substantive rights such as - right to privacy, intellectual property, freedom of speech, right to legal enforcement, right against discrimination should be encouraged when they appear to be essential to a particular VW community’s interest as a whole and the same can be implemented or enforced by the VW provider technically and without losing its autonomy completely. This principle when adopted will enhance legitimacy as the rights and obligations will be clearly understood by all parties and arbitrary exercise of punishments by the provider can be controlled, thereby aiding in effective decision making by the users while using the VW for various entrepreneurial purposes.

2.1.2 Fairness in formal actions and procedures:

As per this principle, firstly there must be fairness in how and what rules are formed in addition to actively applying the rules. Therefore, under this principle we argue that the expounded rules must be reasonably stable (i.e., not changing rapidly without notice), public, comprehensible, prospective and rational. However, the subjective nature of the rule is a contextual aspect that needs to be determined by the stakeholders of the VW, based on their purpose, goals and beliefs. What may seem fair in one VW community may not suit the users of the other virtual world per se (Castronova 2006). Any governance framework must be sensitive to the real needs of the stakeholders in such VWs and should avoid regulatory solutions that diminish the value and potential of the virtual community. Secondly, it describes procedural fairness in the application and enforcement of the explicated rules. Transparency, due process of hearing, neutral adjudication, and equal treatment of the rules are some of the tenets essentials for achieving procedural fairness in case of conflict situations.

2.1.3 Participatory decision making:

It is argued that similar to a civil society, the opinions and needs of the citizens should shape the formation and implementation of the rules. So an attempt to consult the users of the VW, who are at the bottom of the pyramid in terms of power and control dynamics, should be taken into account while making or changing rules that may affect their interests. In theory, it also implies that rules that are formed through participatory process must be considered more reliable and depict the real intention of the parties involved, and therefore should be given precedence over other rules - in the case of any discrepancies between the two sources by the adjudicating authority.

2.2 Linking Legal Governance Framework to User Trust in Virtual World

Trust has been studied for several decades and sociologists believe that it is a means to survive in a complex society (Luhmann 1979). Trust becomes all the more important in a high tech environment where the uncertainties are multifarious (Fukuyama, 1996). Prior research on online environment has shown user trust to be an important factor for both initial adoption (Gefen et al. 2008) and for continued use (Teo et al. 2008). Similarly, in a business environment, including VWs, trust has been
identified as a key success factor (Chandra et al. 2012; McKnight et al. 2002). Adopting the definition given by Chandra et al. (2012), in this research, we conceptualize ‘user trust in VW’ as the ‘belief or expectation that VWs will accomplish an individual’s tasks reliably’. Thus, user trust in VWs signifies an aggregation of user trust in different VW actors namely, trust in the VW technology, trust in the VW community and trust in the VW service provider.

User trust in VWs provides the belief to the user that the desired task will be completed satisfactorily when s/he interacts with VW community consisting of individual users, VW technology and/or the VW service provider. This belief is often the result of having knowledge about the structure and processes that are used to resolve uncertain situations related to the conflicts between the different actors in the VW especially between service provider and service user. In the case of entrepreneurship endeavors in VWs, users’ concerns about their intellectual property and monetary rights may be mitigated should there be a well-defined governance framework that takes into account their views. Moreover knowledge about the uniformity of the rules and regulations for all actors and assurance about the fairness of application procedures will help VW users to be more risk-taking, an attribute that is the key to any entrepreneurial activity. The theorized LGF, by proposing principles of - Rules must rule, Fairness in formal actions & procedures, and Participatory decision making, effectively mitigates autocracy, uncertainty, unreasonability, that looms within VWs and enhances the predictability, authenticity, and reliability of transactions within VWs by increasing the stakeholders trustworthiness. This enhanced trustworthiness of the VW actors due to LGF will foster user trust in VWs. Hence we hypothesize:

- **Hypothesis 1:** Within the VWs, legitimate governance framework is positively associated with user trust in VWs.

### 2.3 The Moderating Influence of Cultural Values

The traditional definition of culture describes it as a shared value (Kroeber & Kluckhohn 1952). Hofstede (1980) defines culture as the collective programming of the mind that distinguishes members of a group or category of people to others. Prior research has proposed several dimensions of culture which describe the attributes on which nations and societies are different from each other. Schwartz (1994, 1999) has provided a set of cultural value dimensions for both individual and group level, namely embeddedness/autonomy, hierarchy/egalitarianism and mastery/harmony. Similarly, Hofstede (1980, 2010) provides six dimensions of culture namely, power distance, uncertainty avoidance, individualism/collectivism, masculinity/femininity, long/short term orientation, and indulgence/restraint. For the purpose of this research, we identify and theorize the moderating relationships of the three identified cultural dimensions namely, power distance (PDI), uncertainty avoidance (UAI) and individualism/collectivism (IND). PDI relates to the diverse solutions to the basic issues of human inequality, UAI is related to the level of pressure in a society in the face of an uncertain future and IND describes the integration of individuals into groups.

#### 2.3.1 PDI and its impact on the relationship between LGF and user trust in VW

PDI is “the extent to which the less powerful members of institutions and organizations within a country expect and accept that power is distributed unequally” (Hofstede et al 1991, p 27). In the context of VW it would be the extent to which less powerful members of the virtual world community (VW users) expect and accept that power is distributed unequally. In a scenario of high power distance, users are amenable to accepting authority and hierarchy. Acceptance of hierarchy implies an implicit assumption about recognition of differences in privileges based on the status in the society. In a low power distance scenario, users will view the inequalities in power distribution as salient, real and significant. Extending this discussion to the VW, users in a high PDI scenario may be more accepting of the inequality in power distribution amongst various stakeholders in the VWs. For example, they may not feel the need to be equal in terms of rights and privileges to the VW service provider even though they may be contributing equally to the overall development of the virtual community through user generated content. Hence equality and participative decision (LGF) may assume lesser importance for fostering user trust among such community of such users. Hence in a scenario of high PDI, the relationship between LGF and user trust in VWs will be weaker. We hypothesize:
Hypothesis 2a: High level of power distance negatively moderates the relationship between legitimate governance framework and user trust in virtual worlds.

2.3.2 UAI and its impact on the relationship between LGF and user trust in VWs

UAI is defined “as the extent to which the members of a culture feel threatened by ambiguous or unknown situations” (Hofstede et al 1991, p 113). In the context of VWs, it would mean that the extent to which the users of the VW feel threatened by ambiguous and unknown nature of the basic norms and rules that govern the interactions among VW stakeholders. In a scenario of high uncertainty avoidance, users need clear projection about the expected results. There is a need to mitigate all the avoidable uncertainties so as to have a clear view on the plausible results. LGF in VWs offers possible means for reducing risks and mitigating uncertainties especially for entrepreneurial endeavors by not only limiting discretionary use of power of VW service provider but also providing stability to all transactions in the forms of well-established internal rules. Hence, in a scenario of high UAI, the relationship between LGF and user trust in VWs will be stronger. We hypothesize:

Hypothesis 2b: High level of uncertainty avoidance positively moderates the relationship between legitimate governance framework and user trust in virtual worlds.

2.3.3 IND and its impact on the relationship between LGF and user trust in VWs

Individualism “pERTains to societies in which the TIES between individuals are loose and everyone is expected to look after himself or herself and his or her immediate family. Collectivism, its opposite, pertains to societies in which people from birth onwards are integrated into strong, cohesive in-groups, which throughout people’s lifetime continue to protect individuals in exchange for unquestioning loyalty” (Hofstede et al 1991, p 51). In the context of VW, individualism would mean VW users whose TIES with other stakeholders are weak and they seek to act opportunistically and derive benefits/expected results from using VWs for their own personal goals rather than that of the VW community as a whole. Whereas collectivist VW users would be those that integrate into strong cohesive groups and are primarily concerned about the protecting their group against odds even in the absence of any personal benefit that they may derive from their actions and interactions. In a scenario of high individualism, users need to have full control over the outcomes as they feel individually answerable for the results. In individualistic cultures both success and failures are attributed to the individual user rather than the community in which the individual is situated. In the VW scenario, high individualism, by putting the locus of control on the VW user, enhances the need for predictability of outcomes in terms of clear governance structure for fostering user trust. As they prefer not to trust any group or individual particularly, these users will prefer a neutral governance mechanism which encourages their interaction capabilities, relying on generalized set of rules that are applicable uniformly. Because such rules will set the stage for risk-taking endeavors for personal gains, they raise the expectation of the users to be recognized, rewarded and incentivized efficiently with relevant basic property rights and other safeguards as in the real world economies. The proposed LGF offers right to freedom and control needed for individual user to take advantage of VWs without having to be responsible for a group or being in a group. Thus, in a scenario of high IND, the relationship between LGF and user trust in VWs will be stronger.

Hypothesis 2c: High level of individualism positively moderates the relationship between legitimate governance framework and user trust in VW

3. PROPOSED METHODOLOGY AND FUTURE WORK

We conducted initial exploratory interviews with VW entrepreneurs to identify some of the key issues restricting the use of VWs as an entrepreneurial platform. The findings from these interviews and a review of related theories and literature - enabled us in formulating the research model presented in this research-in-progress paper (Figure 1). In the final paper, we intend to strengthen the theoretical
development. Further, we intend to use a mixed methods approach combining survey with in-world interviews with VW entrepreneurs - to examine the proposed hypotheses. We plan to do the survey within a relatively mature VW (suitable for entrepreneurial activities – e.g. Second Life), taking into account samples from users from diverse cultures - so as to capture respondents from cultures - both in high as well as low power distance, uncertainty avoidance and individualism/collectivism cultures. Existing measures and scales will be adapted to the VW context to the extent possible. New measure of LGF will be developed specifically for this study, which we believe would be a one of our major contributions. Statistical tools will be used to analyze the collected data to test the proposed hypotheses.

![Research Model and Proposed Hypotheses](image)

**Figure 1. Research Model and Proposed Hypotheses**

**References**


