Chapter 1.

Risk of social unrest

Social unrest as a systemic risk

Risks can generally be understood as the potential for experiencing harm (Rowe, 1979; Renn and Zwick, 2008). More specifically it denotes the likelihood of a scenario leading to adverse effects caused by an activity, event or technology. The causal chain is not always one-directional. In ordinary terms, a risk agent (hazard) impacts on a risk object that is of value to individuals or society as a whole. The impacted risk object can then be the cause of further risks to other objects or even trigger a feed back to the source of the hazard. A good illustration of this two-way relationship can be found in technologies that pose risks to the environment. If this risk materializes and harms the environment it may pose new risks to others, for example persons who eat contaminated food. Finally, once the risk is acknowledged the technology causing that risk might be abandoned or changed. Moreover, the developer of that technology may face legal actions or other forms of social sanctions. In this way risks are part of an interaction between humans, technology and natural environment. Natural causes (such as earthquakes), technologies such as nuclear power plants but also human activities (such as clearing the rain forest) are good illustrations for this interaction (Beck, 1986; Luhmann, 1985).

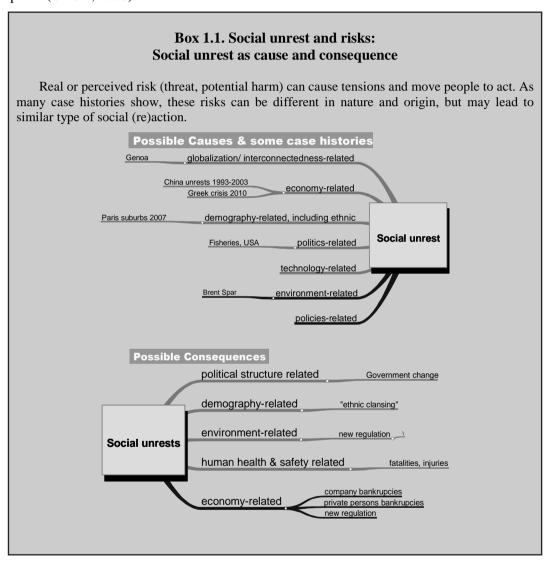
Damages arising from such events can generally be described as physical or psychological harm to objects that humans value. This may be the loss of property, health or even life (Aven and Renn, 2010). Since objects that humans value are at stake the term risk does not only denote an analytical concept of how to link hazards with potential damage to valuable objects but also a normative orientation to mitigate, reduce or avoid risks.

The idea of interaction between hazard and risk object and the focus on analytical as well as normative perspective are also major starting points for dealing with the connection between risks and social unrests. Social unrest can be viewed as a risk: depending on its manifestations objects that people value can be threatened by violence or other forms of social outrage. Social unrest, however, can also be the trigger or the initial hazard leading to damage in other areas, for example economic losses due to technological sabotage or boycott. Social unrest is hence cause and effect in a complex risk web that links technological, natural, social and cultural drivers. This situation is best described in the framework of systemic risks (OECD, 2003; Renn and Keil, 2008).

From a more systemic or functionalist point of view social unrest can be conceptualized as risk (posing threats to society) but also as an opportunity for positive change or development. For example those who pursue social or political goals as a means to reshape society, may turn to stimulating social unrest as an instrument for facilitating changes. Even though social unrest may trigger positive changes in society, it is associated with the risk of experiencing damage to human lives and property. It

describes a complex web of triggers, immediate risks and probably remote benefits and threats which makes social unrest a typical representative of systemic risks.

The term 'systemic' describes the extent to which any risk to human health, the environment, the economy or individual well-being is embedded in the larger contexts of social and cultural aspects that shape our understanding of risk, influence our attention to causal relationships and trigger our activities for handling these risks. In late 2000, the first meeting of the OECD Steering Group on Emerging Systemic Risks concluded that such risks are located at the crossroads of three discrete and much more familiar types of perils (OECD, 2003):



- natural events (which, of course, have been partially altered and sometimes amplified by human activity, such as the emission of greenhouse gases);
- economic, social and technological developments; and
- both domestic and international policy-driven actions.

These interrelated risk fields require a new form of risk analysis and necessitate a new approach that successfully tackles the challenge of integrating data from different risk

sources, either geographically or functionally, into a single analytical perspective. In other words, systemic risk analysis requires a more holistic approach to hazard identification, risk assessment, and risk management because investigating systemic risks goes beyond the usual agent-consequence analysis. Instead, the analysis must focus on interdependencies and spill-over effects that initiate impact cascades between otherwise unrelated risk clusters. The earthquake which struck ChiChi, Taiwan, in September 1999, for example, caused a global shortage of computer memory chips for a couple of weeks because it impacted severely on nearby memory chips facilities. They were a crucial part of the supply chain to the worldwide computer manufacturing industry (Hellstroem, 2001).

Box 1.2. Social unrest of the future

Relevant questions are:

- Will social unrests of the future differ from the ones we have observed in the past?
- If yes, what will be the main differences?
- Will we experience new formats of unrest (for example cyber protest)? How do we expect that social unrest will evolve in a globalised setting?
- Is social unrest a consequence of the Future Global Shocks or a driver or both?

These questions require a systemic framework. This paper develops such an initial framework. It proposes that social unrests of the future

- will be different from the past experiences, primarily in terms of their manifestations and global interdependencies and
- must be seen as an integral component of a complex interaction between natural, technological and social risks forming a systemic challenge since unrest will be cause and effect in a network of closely interrelated events and developments

An extension of the current 4-step framework toward a "lifecycle of unrest" might be explored in the future.

Another well known example is BSE which had not only effects on the farming industry but also on the industry of animal feed, the economy as a whole and on politics (De Bandt and Hartmann, 2000; Wynne and Dressel, 2001; OECD, 2003). The transmission effects were globally diffused to all areas of the world even to those who were not immediately affected by the crisis. The risks have therefore a growing potential of harm (OECD, 2003) since effects were amplified or attenuated throughout the prolongation of effects based on a complex system of interdependencies (Renn et al., 2007).

Social unrest can be grouped into this framework of systemic risks. It can be a cause of risk to others, it can be a consequence of experiencing risk (for example a terrorist threat) or the manifestation of such a risk (the actual terrorist attack) or it can be a promoter of a risk chain that is located in other functional systems of society (for example financial crisis in the banking sector).

Goal and scope of this study

Our main goal in this study is to develop a framework of social unrest within a complex understanding of systemic risk. On order to reach this goal we will try to identify triggers and drivers for the emergence of social unrest and, based on this functional analysis, to design policy options telling us how to avoid, mitigate or handle unrest. The framework should enable us to improve our understanding about the circumstances that may trigger social unrest, how intensely that unrest is likely to materialize and what interventions promise to de-escalate the conflict or even avoid social unrest in the first place.

Module 1 – Changing risk landscape (trends and projections) Includes horizontal drivers (increased networking, heightened concentration, globalization, interdependence, climate change, demography) Module 3 – Tools Module 2 & 4 – Case Studies (past and future) Scenarios **Projections** Financial / Human Health Critical Simulations Economic (e.g. pandemic flu, anti-Infrastructure Crises Complexity microbial resistance (e.g. cybersecurity) analysis Network analysis Social Unrest etc. Module 5 – Strengths, weaknesses and gaps in: Knowledge Mitigation Anticipation Regulation Prevention etc. Commonalities/divergences **Best Practices** Module 6 & 7 – Summary, synthesis, conclusions Socio economic Public-private resilience interface Socio economic etc. resilience Risk management toolbox Messages Publication

Figure 1.1. Overall OECD FGS Framework for the Social Unrest study

Source: Schieb, P-A., J. Radisch and D. Sawaya (2010), OECD International Futures Project on Future Global Shocks - Draft Terms of Reference, OECD, Paris, January.

In this paper we provide an outline of such a framework that can help us to identify drivers (causal roots) as well as triggers (events that lead to social unrest). Since social unrest is more a process of escalation than a finite state of the world we have conceptualized the term in from of a step-by-step escalation scheme. Each step makes social unrest more severe. It is a gradual framework that identifies different stages that make social unrest more and more probable. Before we have a closer look to the main subject -social unrest - within this paper we will explain in a short chapter in what way social unrests show characteristics of systemic risks.

In order to identify relevant drivers and cluster of drivers we will investigate three case studies with the following topics: Pandemics, cyber-related risk and financial crises. The main question is how these events did or could cause social unrests. In a second step we outline an analytic model that can be used to capture the combined effects learned from the case study analysis. In a third step we will apply the IRGC risk governance model for explaining the risk of social unrest or predicting the consequences of social unrest. Finally we will develop some guidelines for normative governance with respect to social unrest.

This paper is a contribution to the Module 2&4 of the proposed work plan for the OECD Future Global Shocks (FGS) Project (Schieb, Radisch and Sawaya, 2010). The modules and the part on Social Unrest will provide useful inputs for Module 3 ("Tools") and Modules 6 & 7, in particular for the conclusions related to

- Socioeconomic resilience and
- Governance issues.

The considerations in this paper are compatible with the development of applicationoriented tools and, in particular "Risk management toolbox" (Figure 1.1).

As such the document is a part of the series of case studies accompanying the OECD (2011) main report on Future Global Shocks.

References

- Aven, T. and O. Renn (2010), *Risk Management and Governance. Concepts, Guidelines and Applications*, Springer, Heidelberg/New York.
- Beck, U. (1986), "Risikogesellschaft Auf dem Weg in eine andere Moderne", Suhrkamp, Berlin.
- De Bandt, O. and P. Hartmann (2000), "Systemic Risk: A Survey", Working Paper No. 35, *Working Paper Series*, European Central Bank, pp. 1-77.
- Hellstroem, T. (2001), "Emerging Technological and Systemic Risk: Three Cases with Management Suggestions", contribution to the *OECD International Futures Project on Emerging Systemic Risks*, OECD, Paris.
- Löfstedt R. and D. Vogel (2001), "The Changing Character of Regulation: A Comparison of Europe and the United States", *Risk Analysis*, Vol. 21, No. 3, pp. 393-402.
- Luhmann, N. (1985), "Kann die moderne Gesellschaft sich auf ökologische Gefährdungen einstellen?" in Rheinisch-Westfälische Akademie der Wissenschaften (ed.), Vorträge G287, 35. Jahresfeier am 15. Mai 1985, Westdeutscher-Verlag, Düsseldorf.
- OECD (2003), "Emerging Systemic Risks", Final Report to the OECD Futures Project, OECD, Paris, France.
- OECD (2011). Future Global Shocks: Improving Risk Governance. OECD Reviews of Risk Management policies, OECD Publishing, Paris, France.
- Renn, O., P.-J. Schweizer, M. Dreyer and A. Klinke (2007), "Risiko: Über den gesellschaftlichen Umgang mit Unsicherheit", Oekom, München.
- Renn, O. and F. Keil (2008), "Systemische Risiken: Versuch einer Charakterisierung", Gaia Ecological Perspectives For Science And Society, Vol. 17, No. 4, pp. 349-354.
- Renn, O. and M. Zwick (2008), "Risikokonzepte jenseits von Eintrittswahrscheinlichkeit und Schadenserwartung" in C. Fegentreff and T. Glade (eds.) *Naturrisiken und Sozialkatastrophen*, Springer, Berlin, pp. 77-97.
- Schieb, P-A., J. Radisch and D. Sawaya (2010), OECD International Futures Project on Future Global Shocks Draft Terms of Reference, OECD, Paris, January.



From: Social Unrest

Access the complete publication at:

https://doi.org/10.1787/9789264173460-en

Please cite this chapter as:

Jovanoviæ, Aleksandar S., Ortwin Renn and Regina Schröter (2012), "Risk of social unrest", in *Social Unrest*, OECD Publishing, Paris.

DOI: https://doi.org/10.1787/9789264173460-3-en

This work is published under the responsibility of the Secretary-General of the OECD. The opinions expressed and arguments employed herein do not necessarily reflect the official views of OECD member countries.

This document and any map included herein are without prejudice to the status of or sovereignty over any territory, to the delimitation of international frontiers and boundaries and to the name of any territory, city or area.

You can copy, download or print OECD content for your own use, and you can include excerpts from OECD publications, databases and multimedia products in your own documents, presentations, blogs, websites and teaching materials, provided that suitable acknowledgment of OECD as source and copyright owner is given. All requests for public or commercial use and translation rights should be submitted to rights@oecd.org. Requests for permission to photocopy portions of this material for public or commercial use shall be addressed directly to the Copyright Clearance Center (CCC) at info@copyright.com or the Centre français d'exploitation du droit de copie (CFC) at contact@cfcopies.com.

