

Bureaucratic functionality in implementing European risk regulation in Eastern Europe: case of drinking water safety in Estonia and Lithuania

Working paper to be presented at King's College Risk Research Symposium, June 5th, 2009

Kati Kangur, PhD researcher at King's College London, Kati.Kangur@kcl.ac.uk

Over the past ten years, the governments of the Baltic States have been implementing environmental health reforms in order to integrate with the EU regulatory system. This realignment offers accession countries political incentives as well as financial opportunities for improving the health and safety of the citizens. Studies on Europeanisation processes, however, show that a change in governance entails more than just the adoption of black-letter law. The implementation of European directives needs to be complemented with the development of institutions and techniques for monitoring compliance and practical enforcement (Schimmelfennig and Sedelmeier 2005). This paper explores one of the several factors of European rules implementation success - the functioning of regulatory bureaucracies. I will use the case of Europeanisation of drinking water safety regulation in the transitional countries of Estonia and Lithuania to study the impact of the internal drivers of bureaucracies. The study will test the extent to which the success or failure of the drinking water safety regulation in Estonia and Lithuania is dependent on the inner design of regulation, its institutions, cultures and capacities. I have chosen two countries as differences between their regulatory systems have a significant impact on the success of implementing the Drinking Water Directive (DWD, Directive 1998). For example, Estonia is conscientiously following the EU rules, whereas Lithuania has gone beyond the strict but limited DWD requirements. Consequently, the drinking water safety control regime offers less protection to Estonian people. This paper is part of a wider PhD project looking at a range of factors - the inner design of regulation as well as political context of multiple interests and interpretations of risk that might affect the success of implementing and operationalising the drinking water safety regulation.

After departing from the Soviet Union, most of the Eastern European countries set the Europeanisation as their political aim. The alignment with European policy paradigms entailed the change from over-politicized command and control government to the market-based, integrative and interactive strategies of governance. Furthermore, the EU accession entailed rewriting the national laws and accommodating nearly 100,000 pages of the community law. Generally positive attitude towards the EU made the accession states more EU allegiance striving. It has been argued that the EU newcomers would naturally make greater efforts to implement faithfully any directives to prove their credentials as cooperative and committed member states (Perkins and Neumayer 2007). However, the EU policy institutionalisation in the post-soviet accession states is a particularly precarious process. New regulations have to fit with the deep-rooted dominating pressures, administrative and expertise capacities, and regulatory actors present in the state (Heritier and Knill 2001; Radaelli 2003). To study the different drivers shaping the implementation and operationalisation of EU safety regulations this research adopts the risk regulation regime approach elaborated by Hood et al. (2001). Drawing on this perspective, we can distinguish two key elements of regulation: the context of multiple interests and interpretations of risk; and the inner design of regulation, its institutions, cultures and capacities.

This paper scrutinises the importance of pressures inside the bureaucratic machineries shaping the drinking water safety regulation components. For example, previous studies have shown that the applicant countries' *goal-setting* might be distorted due to the inclination to carry out whatever demands the EU would make while disregarding the local interests (Kramer 2004). Administrative capacity issues, namely the bureaucratic overload when rushing the adoption of EU policies has been described as one of the main reasons for insufficient policy analysis and the poor quality of legislation in Eastern Europe (Raik 2004). In addition, as Hutter (1999) has explained the level and quality of staffing in the agencies are also determining the ability to fulfill regulatory mandate in *information-gathering* as well as *rule-enforcement* activities. The design of the regulatory regime is also important, as for example Rothstein (2003) has noted, extensive regulatory complexity may attenuate the perception of risks amongst regulators and regulatees. Furthermore, cultures of compliance may become significant, as Mastenbroek (2005) has demonstrated that the constant ranking of accession states has created an incentive to mask implementation problems in progress reports. In conclusion, previous studies have shown that governing safety issues is increasingly complex and even more so in new EU member states.

The significance of the bureaucratic functionality determinants will be tested in case of implementing the DWD in two accession states, Estonia and Lithuania. The undertaken comparative research provides an opportunity to explore and control the determinants of cross-national variations in risk regulation regime implementation in seemingly similar contexts of Estonia and Lithuania. By adopting the DWD requirements and the European Commission oversight of the national safety control system, more comprehensive standards for concentrations of contaminants have been set and real-life inspecting and enforcement capacities have gained a positive boost in the case study countries. For example, national reports to the European Commission suggest that the water companies serving more than 5000 people per day mainly obey the water safety criteria. Unlike soviet time traditions of masking or fabricating the safety records, the breaches from the safety regulations are now acknowledged and acted upon. However, there are several deficiencies in governing the drinking water safety in the Baltic States.

First, there are problems with how the universalized quality standards were adopted. Fearing being incapable of meeting the DWD criteria, Estonia asked European Commission for derogation periods to upgrade the water supplies in order to be able to fulfill the safety parameters. During EU accession negotiations, Lithuania did not manage to argue for time leeway for meeting the safety standards. However, in current DWD revision process, Lithuania is being actively suggesting improvements in the scope of drinking water quality regulation.

Second, in both countries the DWD requirements on monitoring the drinking water safety are not fulfilled. The drinking water safety control requirements are universal to all European countries regardless the presence of pollution. The need to check the full list of health parameters even though it is unlikely to find any contaminants (no natural or anthropogenic pollution) is overburdening the safety inspections. In addition, the adopted DWD monitoring criteria do not extend to the numerous water operators serving less than 50 people per day. This is important because 35% of the population in Lithuania and 25% in Estonia drink from such supplies and studies show that microbiological contamination and excessive nitrogen compounds in small supplies threaten the consumers' health (Saava 2003). Lithuania has moved beyond the DWD requirements, and a control system has been applied to well waters. In contrast, in Estonia, it is up

to the individual well owners' concern whether they test their drinking water and take measures to prevent possible intoxication.

Third, studies (e.g. Annus 2007; WHO 2007) suggest that there is only limited enforcement of the drinking water safety rules. Operators in large areas of Estonia and Lithuania provide water that does not meet maximum allowable concentrations set for fluoride, sulfides, radionuclides and other compounds. Due to the poor cost-recovery policies in Estonian and Lithuanian water supplies, meeting the safety criteria is reliant of the Ministry of Environment decisions regarding allocating EU Cohesion Fund money to municipal water companies' upgrading projects.

The following analysis scrutinises the importance of pressures inside the bureaucratic machineries that have lead to above-described poor outcomes of drinking water safety regime. Documentary analysis and interviews with representatives of key regulatory actors from the EU, and case study countries inform the analytical sections of this paper. First, the bureaucratic functionality drivers of safety goal-setting, second pressures in information-gathering component, and third, factors in rule-enforcement activities will be explored.

Estonia and Lithuania converging with European safety regulation sphere

This section will look at the EU DWD transposition phase and current revision processes to clarify the processes inside regulatory machinery that might have led to poor quality of legislation. The following will try to answer questions: Why only a few derogation periods were obtained when adopting the DWD? Which conditions favour Lithuanian national interests' representation on EU level?

At the end of 1990s / beginning of 2000s, Estonia and Lithuania were caught up in a competition with other acceding countries for faster integration into the EU. Because of conveyor belt transposition of community law in the run-up to accession, less attention was given to questions of compatibility with local safety needs. However, when compared to Lithuania, Estonia was better prepared for negotiating with the European Commission in terms of drinking water safety regulation. Re-independent Estonia took a position radically opposing its past regulatory system and eagerly agreed to take up the European ways of regulation. Estonia was invited to the negotiation table already in 1998 and could start analysing the national capabilities of meeting the EU DWD earlier and ask for derogation periods. This has given Estonian water operators extra time to carry out upgrading projects in order to meet the criteria. In contrast, Lithuania has favoured an incremental change towards Europeanization. Having retained much of its soviet-time political elites and civil servants, Lithuania was slower in its deregulation reforms and was invited to the accession negotiations only in 2000. This simply left too little time for the ministerial civil servants to gather all the evidence to establish derogation periods for fluoride and other problematic compounds, where the water supplies do not meet the safety requirements. Therefore, unfeasible goals of meeting the DWD criteria by 2008 were set for Lithuania.

Currently, the EU DWD is being revised and there is a possibility to amend the quality requirements. The new member states are in a stronger position for claiming representation for their national interests, when compared to the time when they were only acceding the Union. However, new member states use this opportunity to a different extent. Interviews demonstrate the continuity of the pre-accession national policies. The member states involvement in the DWD revision process allows them to negotiate for more protective measures. More EU-aligning Estonia

is accepting the pre-set requirements and does not seize the opportunities of lobbying for changes in the DWD. Lithuania, owing to the long-term experiences of civil servants in drinking water sphere, has obtained a much stronger negotiator position in current revision of drinking water safety regulations. It has actively engaged in the revision of the Directive regarding, for example, lowering the reporting threshold to smaller water supplies.

One explanation for better representation of Lithuanian needs in the EU drinking water policy negotiations lies in better national level understanding of the local problems. In Lithuania, stronger safety monitoring based on the municipal control has allowed for a better overview of the water safety issues in smaller settlements and has promoted greater accountability for local safety needs. Estonian centralised monitoring network has not allowed for creating the visibility for the local problems. Superficial overview of the local problems has contributed to smaller responsibilities for local safety issues and uncritical allegiance to the EU standardised requirements. Thus, the drinking water case shows that country-specific policy networks lead to varying engagement of expertise resulting in differing reflection of stakeholders' needs in safety regulation.

In conclusion, the nation states' styles in policy-negotiations with EU and sub-national institutions vary resulting in regulatory goals that are more or less reflecting the local safety needs. Lithuanian policy formulation involves bargaining and compromises amongst interest groups inside the state and with the EU. However having been better prepared to defend national needs upon accession, Estonia has been generally more accommodating to the EU pressures and less to local interests.

Safety control: following the EU monitoring rules or moving beyond

This section scrutinises the extent to which the institutional functioning affects the information-gathering regarding the drinking water safety. It explores the determinants of emphasis and efficiency of monitoring programmes in Lithuania and Estonia. The section will try to answer following questions: What has triggered Lithuanian policy-makers to go beyond the safety control requirements foreseen in DWD? Why has Estonia maintained control requirements that leave the well water users, i.e. up to a quarter of its population with uncontrolled and possibly hazardous drinking water?

Even though more or less frequent monitoring programmes apply to all water supplies serving more than 50 people per day, the European Commission demands from nation states information only about the larger water companies (serving more than 5000 people). Regardless the likelihood of the presence of contaminants in drinking water source, the DWD requires monitoring the full set of 62 quality parameters. The strict yet limited (smallest supplies are uncovered) monitoring protocol provokes differential responses in national control regimes. The Estonian and Lithuanian focus on the largest water operators can be explained by the overstretched monitoring capacities. According to the inspectors, it is cost-effective to focus their limited capacities on monitoring the largest water supplies where potential outbreaks can have larger detriment on user population. It also occurs that the punctilious following the EU DWD monitoring protocol is especially characteristic to Estonian inspectors. Therefore, Estonian inspectors have fewer endeavours for pushing for wider control than expected from the EU. Prioritised focus on larger water operators sets great segments of Estonian population's health in danger. It can be explained by Estonian cultures of accountability for European Commission rather than the local needs. When compared to Estonia, Lithuania has taken a more substantial approach in offering protection to the segments of water users that do not have to be controlled under the DWD premises.

One of the explanations for Lithuanian endeavours to go beyond the DWD requirements lies in the nitrate poisoning cases that shocked Lithuanian public and civil servants in Lithuania. Several casualties over the years of 2001-2003 forced the Lithuanian Ministry of Health to acknowledge and react upon the gap in regulation and a special order relating to diagnostics and prevention of nitrate poisoning was issued in 2003. In Estonia, there have not been lethal water-related outbreaks for several years. Therefore, no need for extra regulations has been sensed.

Another justification for the control programmes in areas not connected to the public water supply in Lithuania may lie in the implications of the design of information gathering system. In Lithuania, the Municipal Public Health Centres and Municipal Doctors (relics from the soviet system) have a close oversight of the local hazards. This makes the control system more accountable to local issues, promotes reflexive solutions (e.g. the dug well control programme). In contrast to Lithuanian system, Estonian municipal health and safety centres were expelled as the remains of soviet system and monitoring was centralised to Regional Health Inspections for efficiency reasons. Estonia has adopted a more liberal approach to risk governance, which leaves the individual water supplies' safety control under private responsibility. Thus, the Estonian state control system is physically as well as responsibility-wise dissociated from the essential problem of small water supplies.

In conclusion, the analysis of small member states' drinking water safety case shows that the inadequate universalised EU standards provoke diverse national responses. The strict, but incomplete standards that do not consider the natural and politico-economical specificities of the nation states leave member states in an ambiguous situation. States may oscillate between the endeavours of performing well to the EU conditions and offering real protection. We can find Estonia and Lithuania at the either ends of this behavioural spectrum when operating with the EU safety regulations. The scope and forcefulness of safety standards is locally re-interpreted according to existing monitoring capacities and prevailing cultures of accountability.

Enforcing the safety regulations

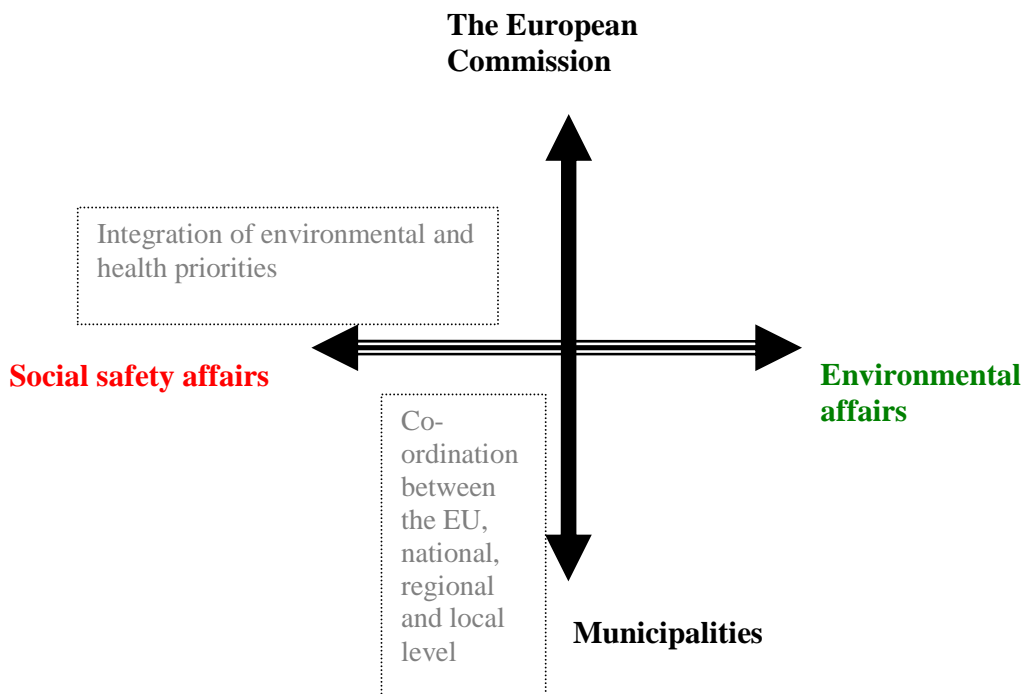
Next to the goal-setting and information gathering components of drinking water safety regulation, rule-enforcement phase is crucial in organising measures for ensuring public safety. The drinking water safety enforcement activities are problematised in several ways in Estonia and Lithuania.

First, the drinking water safety case shows that regulatory design and issues of allocating responsibilities are significant determinants of attaining the safety goals. Even though the records on largest water operators show compliance with safety requirements in both Lithuania and Estonia, rule-enforcement breaches of smaller operators are not prioritised especially in Estonian case. The complexity of the regulatory structure, span through the EU expert committees, national levels of government, and their sub-departments may create an illusion of regulatory control, yet the real drinking water safety issues may remain unattended. As the decision-making hierarchy has extended towards the European Commission, there is a danger that the real problems of enforcing EU requirements are backgrounded.

Second, rule-enforcement is problematic due to the horizontal division of water management responsibilities between different government agencies in Estonia and Lithuania. Naturally bound water cycle governance is divided between the Ministry of Environment and Ministry of Social

Affairs (Ministry of Health in Lithuania) that have different priorities. Due to the low cost-recovery policies in both countries, the management of municipal water companies, including upgrading the systems to meet safety criteria is dependent on the state subsidies and the EU Cohesion Fund allocation. This makes the safety goal-attainment reliant on the Estonian and Lithuanian Ministry of Environment that direct the water infrastructure upgrading funding. In the EU-advocated integrated water management, the expediency of planning depends on the comprehensiveness of the local environmental as well as human safety analysis. The regulatory capacities for analysing development needs and feasibility of different measures set basis for water infrastructure upgrading projects' success. Benefiting from detailed health screening, there is a good understanding of the Lithuanian local water safety issues, however the environmental monitoring and planning is lagging behind. In Estonia, assessing the municipal environmental needs has progressed, yet the integration of safety parameters is deficient due to a poor information basis. More efficient Estonian local environmental planning helps to speed up the state coordination of the EU funds that feed into the water infrastructure upgrading. However, the meeting of health priorities is uncertain. In Lithuanian case, the water management planning is slower; however, health priorities are better represented and more likely secured in water infrastructure upgrading projects.

In conclusion, the integration of regulatory agencies from the EU to national and local levels, as well as balancing between the environmental as well as health priorities under different government agencies determines the strength of the drinking water safety rule-enforcement (Graph 1). The weakness of either of these dimensions in the complex web of safety regulation may jeopardise the health of water users.



Graph 1. Integration of environmental and health priorities on different levels of safety regime for drinking water rule-enforcement.

Conclusions

Four years of being a part of European Union and preceding years of preparation has allowed accumulating the experiences to draw out major weaknesses and opportunities in Estonian and Lithuanian risk regulation regimes. Now is time to explore the extent to which EU dominated goal-setting is supported by the adequate institutional structures, implementation cultures and enforcement strategies. The specific case of governing environmental health risks in Estonia in comparison to Lithuanian contexts shows that the national specificities make the EU harmonisation processes more difficult and diverging regulatory styles, structures and strength lead to different compliance outcomes.

The two case study countries reveal wider lessons about the conditions shaping the implementation of EU environmental legislation in Eastern Europe. In the extended range of decision-making units from the EU expert committees to municipal councils, and from safety testing to river basin planning, regulating complex drinking water safety bureaucracies is a challenging task for new EU member states. Even though stemming from the same post-soviet background, Estonia and Lithuania show different styles in building up the regulatory networks. The influence of the presence of EU oversight seems to be especially strong in Estonian case. Generally stronger EU allegiance, but also lesser overview of the local problems has contributed to smaller responsibilities for Estonian local safety issues. In Lithuania, greater monitoring has allowed for better understanding of local problems and has promoted greater accountability for local safety needs and has led to institutionalisation of safety measures in addition to the EU requirements. Thus, it is logical that Lithuania has retained a stronger position in negotiating with EU regarding, for example, the revision of the DWD for designing better protective measures.

References

Annus, A. (2007). *Järevalve joogivee kvaliteedi üle 2006. aastal* (Drinking water quality control in 2006). Tallinn, Estonian Health Protection Inspectorate.

Directive (1998). "Directive 98/83/EC of the European Parliament and of the council of 3 November 1998 on the quality of water intended for human consumption." Official Journal of the European Communities(OJ L 330).

Heritier, A. and C. Knill (2001). Differential Responses to European Policies: A Comparison. Diferential Europe, SSRN: 257-294.

Hood, C., H. Rothstein, et al. (2001). The Government of Risk. Understanding Risk Regulation Regimes. Oxford, Oxford University Press.

Hutter, B. (1999). A Reader in Environmental Law. Oxford, Oxford University Press.

Kramer, J. M. (2004). "EU enlargement and the Environment: Six Challenges." Environmental Politics **13**(1): 290-311.

Mastenbroek, E. (2005). "EU Compliance: Still A "Black Hole"?" Journal of European Public Policy **12**(6): 1103-1120.

Perkins, R. and E. Neumayer (2007). "Implementing Multilateral Environmental Agreements: An Analysis of EU Directives." Global Environmental Politics **7**(3).

Radaelli, C. (2003). The Europeanisation of Public Policy The Politics of Europeanisation. K. Featherstone and C. Radaelli. Oxford, Oxford University Press: 27-56.

Raik, K. (2004). "EU Accession of Central and Eastern European Countries: Democracy and Integration as Conflicting Logics." **18**(4): 567-594.

Rothstein, H. (2003). "Neglected risk regulation: the institutional attenuation phenomenon " Health, Risk & Society **5**(1): 85-103.

Schimmelfennig, F. and U. Sedelmeier (2005). The politics of EU enlargement: theoretical and comparative perspectives. The Politics of European Union Enlargement: Theoretical Approaches. F. Schimmelfennig and U. Sedelmeier. London, Routledge.

WHO, E. (2007). Support for the Development of a Framework for the Implementation of Water Safety Plans in the European Union. Copenhagen, World Health Organisation Europe.