

Quis Custodiet Ipsos Custodies in the Internet: Self-regulation as a Threat and a Promise

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Abstract: ICT sectors have always involved regulation, much of which arises outside traditional command-and-control government structures. Traditional regulation aims to fill a ‘governance gap’ left by market players and other self-interested stakeholders; as markets evolve it is appropriate to consider rebalancing responsibilities. Self- and co-regulation responds to many of the same issues and offers some advantages over traditional arrangements – and some new risks. The evaluation and design (or facilitated evolution) of new regulatory structures further requires new methods of *ex post* and *ex ante* assessment. This paper places these developments in the European policy context, considers the varieties of arrangements that exist, analyses the conditions for their success and failure, and derives impact assessment guidelines that take self- and co-regulation into account.

1. Introduction

The ICT domains have always been subject to technical, economic and/or societal regulation. The traditional basis for these interventions was a ‘governance gap’ between the economically motivated activities of key stakeholders and the external consequences for other firms, end-users, public services, etc. Recent changes in European market and societal context, and policy initiatives such as the Lisbon and ‘Better Regulation’ agendas, have triggered a reconsideration of this basis. Four developments in particular are particularly challenging: enterprise convergence and divergence that reshape market and sector boundaries; the evolution of ‘converged’ regulators along sectoral or network-industry lines; new regulatory concerns (IPR enforcement, RFID, net neutrality); and changes in the European policy context. These have combined to lay the foundation for cross-cutting reviews and rebalancing of regulatory roles and responsibilities which can have profound structural and dynamic implications. This development has been largely confined to formal or statutory regulation, while much of the governance in these domains is provided by a spectrum of self- and co-regulatory organisations (hereafter referred to as XROs).

Like formal regulation, XROs address perceived failures of governance. They differ in breadth and flexibility and the more-or-less enlightened self-interest behind participation and compliance. XROs face (actual or potential) *competition* from other XROs and government – indeed, many come into being primarily to pre-empt more costly, inflexible and/or burdensome statute regulation. This ‘self-organising’ nature *can* make them more flexible, less burdensome and more effective than formal counterparts, with decisions reflecting a more nuanced balance of issues and interests and rules more appropriately framed and more willingly complied with. Openness and potential competition *may* also make them appear more transparent and accountable.

However, they are not necessarily organised around public service objectives. The case studies revealed distinct examples of XROs formed around:

- Longstanding perceived problems with supplier (upstream), peer/rival (horizontal), citizen/customer (downstream) and public sector relationships;
- ‘Triggering events’ such as a report on child pornography, a large-scale security or privacy breach or a major international summit meeting;
- Industrial sectors, market segments, technologies, services, etc.;
- Specific policy tools (certification, standards, etc.); and even
- Individuals or particular cultural clusters.

Such XROs involve various mixes of those affected, those responsible and those with the greatest power to address the problem. They are not based in statute, tied to formal objectives or endowed with solid access to resources and powers of compulsion. Despite this, they are widespread even where the stakes of failure are extremely high, such as professional self-regulation (doctors, lawyers), financial services, etc. This combination of ubiquity and ambiguity raises distinct issues of critical importance to ICT-related policy.

XROs may face corruption and loss of effectiveness if used to inhibit competition, weaken or deter regulation or erect a ‘wall of silence’ around non-compliant members.

The breadth and flexibility of XRO objectives and participation makes them difficult partners for formal regulators; governments’ participation, forbearance, delegated powers, supplementary enforcement, etc. require delicate crafting and active monitoring.

Third, outside parties (including governments) face serious problems in tracking and evaluating XROs’ (positive and negative) impacts – and in anticipating their evolution.

But XROs are inescapable parts of the policy landscape: overarching Better Regulation objectives cannot be attained without their aid; Lisbon Agenda and i2010 ambitions are facilitated by XRO-style ‘innovation-friendly’ governance; and the *ex ante* evaluation and Impact Assessment required of significant policy public and expenditure initiatives cannot be performed without taking XROs into account. Even if they are not used as instruments of policy, governments can do little to prevent – though much to affect - their continued evolution, which will in turn affect policy costs, impacts and long-range outcomes.

This paper presents a simple ‘Beaufort scale’ of self- and co-regulation derived from extensive case studies and theoretical analysis and analytic results useful to policy analysis in the presence of XROs. The underlying analysis, case studies and recommendations are drawn from a recently-published European Commission report [1].

The results are intended primarily for policy-makers and policy analysts but also as a contribution to the analysis of rebalancing public, private and civil society governance.

2. Objectives

The research behind this paper aimed to support policy design and impact assessments by assessing the efficiency, effectiveness and sustainability of existing XROs in the field of Information Society services and other digital content and applications and to identify conditions in which XROs (initiated or mediated by the EC) could best enable innovation in Europe while upholding safety, security and fundamental rights. 21 case studies provided raw material for cross-cutting analysis. For reasons of space, we summarise them via a sampling frame and a ‘Beaufort Scale’ of degrees of self-regulation. It emerged that establishing XROs requires policy trade-offs; there is no ‘magic bullet’ in Internet regulation, and resolving contested policy claims between moving competitiveness, innovation, public safety and security concerns requires continual political judgement. The benefits of ‘unregulation’ or ‘pre-regulation’ must be judged against market maturation and the political judgements behind regulatory intervention logics.

The analysis took into account the coevolution of policy, markets and civil society. On the policy side, the combined agendas associated with Better Regulation [2], Impact Assessment [3] and the i2010 policy framework [4] have provided new perspectives and a

more innovation-orientated basis for regulation in the context of other forms of public intervention. At the same time, markets have reorganised through convergence [5], emergence of new business models and different forms of competition [6]). In the ‘third sector’, new forms of interaction through ICT-enabled human networks (e.g. multiplayer online role-playing games, virtual environments, etc.) have unleashed new potential policy sensitivities, new mechanisms for choosing and enforcing norms and – perhaps most profoundly – collaborative modes of innovation in technical, economic, societal and governance domains. The combined result is a continuing need to reassess the case for regulation: some issues no longer require regulatory intervention; some can be addressed by new tools (e.g. market-based mechanisms for spectrum allocation, universal service provision, etc. [7]); and new issues have emerged (e.g. in relation to IPR and harms committed in virtual environments). New forms of regulatory intervention are being urged by some interested parties (e.g. ‘net neutrality’ [8]) and the very form and locus of regulatory responsibility are undergoing profound and rapid shifts.

The regulatory playing field in the European Union (EU) is dynamically evolving to reflect developments in market, societal and political contexts. Particularly in relation to the information and communication technology (ICT)-enabled sectors, the identities of key stakeholders, the nature of their participation and the spillover impacts onto a broad range of societal and political objectives are changing rapidly. The resulting challenges have created strong impetus for a fresh look at regulatory engagement.

Methods involved preliminary policy and legal analysis; 21 detailed XRO case studies; theoretical analysis; and the development of policy assessment and design frameworks.

3. Types of Self- and Co-regulation

The study considered 21 examples of XROs in:

- Critical infrastructure and resources (domain names, standards setting and labelling);
- Internet intermediaries (hotlines, internet service provider (ISP) filtering, co-regulatory oversight, search engines);
- Content filtering and rating (video, games, premium and mobile content, etc.); and
- Emerging (security, virtual worlds, social networks, trustmarks, global coordination).

We considered economic, policy and legal contexts. At the individual level, this was refined to highlight: formation; membership and how it is determined; powers and terms of reference; what XROs decide and how; and what powers of monitoring, enforcement and sanction they possess. A third level of analysis mapped them in relation to each other.

The case studies highlight gaps in policy coverage, institutional affiliation and the methods and information needed for assessment. They illustrate the variety of static and dynamic considerations that should be considered or might arise if an XRO alternative to regulation is pursued. They also highlight the salience of detailed design and conduct variations in the political context and provide indirect evidence of the correlation between contextual factors and outcomes. While they do not always support objective performance measurement or general conclusions about XROs *per se*, they do shed light on the perceptions of those involved, which may be more relevant to *ex ante* impact assessment.

A particularly fascinating forward-looking element concerned new types of social organisation in virtual worlds (SecondLife), social networking (Bebo) and royalty-free copyright (Creative Commons), where novel challenges produced innovative XROs.

3.1 Resources and ‘Capture’

Funding is generally fee-based and minimal, with three exceptions:

- Market makers, which produce critical resources or deliver historically necessary functions for consumer acceptance. Examples included Nominet, Internet Corporation

for Assigned Names and Numbers (ICANN), Internet Watch Foundation (IWF) and standards bodies. Payments for these functions provides a stable resource base;

- Co-regulatory schemes have statutory backing for their resource demands on industry. They might be considered a sub-category of market makers declared essential by government, e.g. NICAM, ICSTIS and Kommission für Jugendmedienschutz (KJM).
- Market-funded organisations in growing markets, e.g. Nominet, ICSTIS, Family Online Safety Initiative (FOSI), PEGI and the standards bodies W3C and IETF.

‘Hidden resources’ also play a powerful role. They take three forms: member contributions, self-implementation by individual members and third-party pro bono activities. The case studies involved successful start-up or established businesses - the leading edge of Internet businesses rather than the broad membership of e.g. EuroISPA or Nominet. Many Internet companies lack resources or incentives for more than minimal compliance - some have no interest in avoiding users who access harmful content (especially if they seek to ensure wide viewership of content that may be offensive to some); far from contributing to content-controlling XROs, they may actively intend to expose unsuspecting users to challenging content. Bebo has regulatory standards designed for a particularly vulnerable sub-group; it no more represents social networks *per se* than AdultfriendFinder, which serves the explicitly adult ‘contact’ community.

This is of interest because ‘self-selection’ influences both the agenda and the efficacy of self-regulation, particularly if reputation effects magnify or mitigate harm from compliance failures or inappropriate regulation. We explored the extent to which XROs ‘capture’ was facilitated by governance design or inhibited by e.g. inclusion of non-executives who are also not corporate members on advisory boards.

The “founding myths” of many XROs provide a tacit constitution - most formed as emergency responses or as market-makers. Despite the risk of being seen as anti-competitive, the latter motive predominated. The analysis also considered ‘scope creep’ and institutionalisation. Like their formal counterparts, XROs tend to outlive their motivating problems and seek to expand – or at least renew – their policy base. On the other hand, most resist outside pressures to take on new responsibilities and to broaden participation. A particularly interesting example is the recent move to force ISPs to enforce content owners’ intellectual property rights. The costs (direct and lost clientele) of this co-regulatory (if they do not achieve sufficient compliance, statute regulation is threatened) activity cannot be recovered from the beneficiaries without falling foul of ‘net neutrality’ prohibitions on charging based on content. The only exceptions are vertically integrated providers, who are thus enabled to pursue what might otherwise be regarded as anticompetitive exclusionary policies. As they were the main opponents of net neutrality proposals, it is possible that what seemed at first a regulatory ‘long game’ is being expanded to the XRO arena.

3.2 A Taxonomy of XROs

The case studies can be classified by ‘degree of self-regulation’ from basic informal communication through to the onset of formal regulation. Table 1 describes the extent of government involvement by analogy with the Beaufort wind strength scale: levels 9–11 represent co-regulation (government legislative force behind the regulatory forum); while 0–8 represents the evolution of self-regulation from first beginnings towards co-regulation.

This broad classification by policy involvement is not perfectly aligned with direct or indirect government funding. Such aid to self-regulation by soft law and other policy includes financial assistance to XROs. For instance, governments or the EU may choose to support self-regulatory standard-setting as a genuinely non-regulatory policy (scales 2 and 6) which may or may not include financial support or co-funding.

In general, future Impact Assessments (even in the Internet domain) will not match one of the XRO case studies. However, the very great diversity that they reveal strongly

suggests that Impact Assessments can usefully draw on significant and applicable elements within the case studies, as indexed by the Beaufort Scale.

Table 1: A 'Beaufort Scale' of Self-Regulation

Scale	Regulatory scheme	Self-Co	Government involvement
0*	'Pure' unenforced self-regulation	Creative Commons SecondLife	Informal interchange only – evolving partial industry forum building on players' own terms
1	Acknowledged self-regulation	ATVOD	Discussion but no formal recognition/approval
2	Post-facto standardised self-regulation	W3C#	Later approval of standards
3	Standardised self-regulation	IETF	Formal approval of standards
4	Discussed self-regulation	IMCB	Prior principled informal discussion – but no sanction/approval/process audit
5	Recognised self-regulation	ISPA	Recognition of body – informal policy role
6	Co-founded self-regulation	FOSI#	Prior negotiation of body; no outcome role
7	Sanctioned self-regulation	PEGI# Euro mobile	Recognition of body – formal policy role (contact committee/process)
8	Approved self-regulation	Hotline#	Prior principled less formal discussion with government –with recognition/approval
9	Approved compulsory co-regulatory	KJM# ICANN	Prior principled discussion with government –with sanction/approval/process audit
10	Scrutinised co-regulatory	NICAM#	As 9, with annual budget/process approval
11	Independent body (with stakeholder forum)	ICSTIS#	Government imposed and co-regulated with taxation/compulsory levy

Denotes the presence of government/EU funding.

* Option 0 is infrequently found – a pure self-regulatory body with no prior or later approval is close to invisible in practice; it is certainly the case that only the very 'early stage' hybrid of self-regulation can be viewed in this space.

4. Analysis of XROs

The growing literature on XROs in different contexts [1] tends to distinguish XROs formed around general public objectives linked to members' (often commercial) interests (e.g. environmental standards or IPR compliance), those addressing other public objectives that the members are best-placed to tackle (e.g. content filtration, privacy) and those intended to protect specific stakeholder groups threatened by informational or strategic market failure (e.g. anti-fraud or quality-of-service). These distinctions shed light on the alignment of policy objectives with those of XRO participants, and on the likely extent of participation (highest for those whose interests are directly affected) and compliance (highest for participants whose interests are most closely aligned with the XRO's collective preferences and/or those whose activities can be most easily monitored).

The analysis considers separately selection (who participates and why) and incentives (how participation affects conduct) and positive (analysing the behaviour of actual XROs) and normative ('optimal' XROs) approaches. This section summarises some findings.

Information: if authorities and participants have the same information about the underlying situation, the key is to efficiently align powers to act with incentives and to minimise administrative, operational and compliance costs. XRO outcomes can always be replicated by statutory regulation [9], albeit with:

- Possibly higher costs;
- Different market distortions and dynamic effects (e.g. for innovation); and
- Different (and possibly lower) possibilities of regulatory ‘capture’ by producers.

However, even if firms are better informed than public regulators, self-regulation is only socially optimal if the regulator values firm profits sufficiently highly. Thus self-regulation is: encouraged by public monitoring; most likely to emerge in concentrated industries where the danger to competition is greatest; and least likely to be optimal in globalised industries where domestic firms’ competitiveness is a regulatory objective.

Where participants have superior information, authorities have to trade off the benefits of incorporating this in policy against the costs of inducing them to disclose it (or equivalently, the costs of providing incentives to participate in the XRO and follow its rules). Authorities may have superior information – for instance, when regulation in a particular domain has crosscutting effects on a range of public objectives or when regulation may be affected by impending policy changes. Even so, self- or co-regulation may be appropriate if it avoids the deadweight costs of statutory regulation or can more effectively or efficiently monitor and enforce rules. In such cases, the authorities should consider how their approach to the XRO (the latitude or resources they provide, or the powers they delegate) adequately signals this necessary information.

Entry: decisions to admit new members made by existing members reflect ‘downstream’ competition. If new members are likely to change the rules chosen or if membership gives privileged market access (e.g. certification) entry will be too restricted from a social point of view. On the other hand, if all members are bound by the rules and their membership does not affect the choice of rules entry may be too broad from a social point of view, in effect creating a platform for collusion.

Competition among self-regulatory organisations: multiple organisations often develop and promulgate standards, provide certification, notify the authorities or the public of incidents and carry out other regulatory functions. The overall market impact depends on how such competition affects the breadth of membership and the stringency of rules: when is there enough competition to induce efficient self-regulation? The analysis resembles models of regulatory competition and regulatory entrepreneurialism, but takes into account the added ‘bonus’ of market power. In general, direct competition among self-regulatory bodies is too weak and leads to potential confusion and conflicting standards. However, the threat of competition by rival self-regulators or government is often beneficial.

Compliance: Most XROs lack statutory enforcement power, which raises the question, why would members comply? It is important to recognise that the organisation and its members get different (but nonetheless real) payoffs to passing rules and to enforcing them. Compared to the optimum, investigations are ‘too rare’, although penalties may be adequate (on paper). Compliance can be induced either by the ‘carrot’ of gainsharing with customers or the ‘stick’ of investigation. The organisation’s members naturally prefer the carrot. The weaker the policy, the more customers will offer in exchange for compliance. A reduction in investigation cost (e.g. by public monitoring) can actually weaken enforcement. The basic insight is that competition among firms in the end-user market may need to be complemented by competition in the ‘governance market’ if the anti-competitive potential of self-regulatory choice of enforcement policy is to be avoided.

The analysis can be extended to draw out its dynamic implications. Firms may comply to: raise individual reputations; realise operating cost, interoperability and efficiency savings; affect the reputation of industry as a whole; and/or pre-empt or reduce the burdens of formal and possibly inappropriate regulation. This divergence between individual and collective benefits introduces a possibility of ‘free-riding’: firms may benefit (or suffer) from others’ compliance. Is such ‘free-riding’ a barrier to self-regulation or only to successful self-regulation? The answer turns on whether enforcement is interpreted by the

market as bad news (there was non-compliance) or good news (the rules are being enforced). This in turn depends on what customers (and others) already know from public monitoring or competing self-regulatory organisations. If compliance is monitored externally and investigation costs are high, it is optimal for the XRO to carry out no enforcement at all. However, if investigation costs are low and the organisation punishes non-compliance by withdrawing certification (as with effective Trustmark schemes), the policy chosen will be just strong enough to pre-empt outside incentives to monitor compliance. In this case, mandatory XRO membership can benefit firms and damage customers' interests. Without such a requirement in a static world, no one would do business with a firm that did not belong to the relevant XRO. In a dynamic setting, non-member firms get business on the strength of their reputations. Mandatory membership would eliminate this and thus preserve rents under the XRO 'umbrella'.

An alternative is for the government to monitor and step in if compliance 'fails'. XRO's enforcement will tighten up just enough to deter such intervention to the extent that costs permit. This comforting conclusion may fail where regulators are vulnerable to capture or where differences among XRO members make them prefer the government 'stick'.

5. Recommendations for Impact Assessment

There is always a price to be paid for regulation - distortion, cost, institutionalisation, agenda creep and so on. This needs to be offset against the justifying benefit by extending or shrinking regulation; rebalancing rule-making and rule-enforcing; delegating or clawing back responsibility, etc. It is necessary to reassess not only how to regulate, but also whether and even why (if some needs become more pressing or cease to be relevant). Generally, this calls for some evolved form of, or alternative to, regulation. We make six broad findings that lead to six recommendations.

1. Internet XROs are already a fact of life in many areas
2. XROs have high-level endorsement with the EU taking a lead role across many sectors. Internet XROs are interesting and particularly dynamic but the Internet is by no means the most influential domain for XROs. Financial services and environmental regulation, among others, have important lessons for Internet XROs.
3. Alternatives to regulation are generally less controllable, less certain or more limited in their impacts. Crucially, their inputs, activities, outputs and impacts are harder to measure. The wide variety of XROs 'in the wild' behave very differently depending on history, government and stakeholder engagement, policy domain and area, resources and competition. One size does not fit all, but factors that favour success include the environment and human resources for establishment and ongoing reform. XROs led by experienced personnel who aim to meet market needs and incentives generally succeed in adoption, innovation and public safety, especially in comparison to XROs designed to fulfil a political design without market validation.
4. User involvement is increasingly important. The formation or subsequent governance reform of robust XROs reflects multi-stakeholder inputs and dynamics.
5. European institutions have been at the forefront of helping innovative XROs to develop using recommendation, coordination and funding best practice dissemination. This 'soft power' encourages XROs to evolve and spread throughout Member States.
6. XROs can contribute alongside government-led co- or full regulation. In particular, market actors and other stakeholders may have superior information on their activities and the interplay between different types of direct regulation and XROs and therefore can react faster to changes. Regulatory policy can move beyond simple distinctions among self-, co- and 'full' regulation to embrace a richer variety of complex and productive interdependence among self-organising control by individual companies, empowered groups of citizen stakeholders, XROs and state actors.

Recommendation: The choice of XRO options for consideration in Impact Assessment is particularly critical. Issues that should be considered include:

- Benefits of ‘unregulation’ or ‘pre-regulation’ judged against the maturing of markets and the political logic of intervention;
- Assessment of these alternatives in terms of quantifiable costs and benefits;
- Incorporating XRO considerations in ‘do nothing’ and ‘normal regulation’ options; and
- Ongoing collection and refinement of available evidence.

There is no ‘magic bullet’ in Internet regulation; resolving contested policy claims among competitiveness, innovation, public safety and security concerns involves continual political judgement. However, IA provides a tool for clarifying potential costs and benefits, even where political judgement necessitates a decision that may impair competitiveness and/or innovation. This may help in the design of regulatory policies to mitigate, for example, the anti-competitive effects of an otherwise necessary increase in regulation. We by no means discount the need for more regulation in particular policy areas, where the benefits of market-based XROs are outweighed by distortions of competition, free-rider problems, lack of compliance incentives, extra costs in self-regulation or other costs. We conclude that, given a suitable choice of options for assessment and a full understanding of the conditions that lead to XRO success, the IA methodology may be expected to yield satisfactory results when applied to XROs in the Internet domain. Therefore, it should be employed more broadly.

Although the advantages should not be overstated, a failure to take XROs seriously in policy design can lead to inefficient, ineffective and/or inappropriate regulation; a failure to fill the governance gap; exacerbation of the original problem; or anticompetitive behaviour under the cover of public service. A failure properly to assess XROs may lead to inaccuracies in ex ante evaluation or a proliferation of ‘Potemkin regulators’ providing an illusion of governance potentially more harmful than overt failure to manage problems.

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