

# Limited Fragmentation through Coordination in the Regulation of the Energy and Telecommunications Sectors in Belgium<sup>1</sup>

## Communication

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## ***Abstract***

In the post-liberalisation area, utility companies operate in a context of multilevel regulation, involving a wide set of authorities with general or sector-based competencies. Such a specialisation in the regulatory arrangements may generate fragmentation and lack of effectiveness. This paper tempers these predictions and shows that coordination mechanisms drastically limit fragmentation in multi-level regulatory arrangements. In other terms, specialisation is not synonymous of fragmentation as coordination mechanisms compensate the dispersion of competencies between multiple levels and authorities. Using a typology of coordination instruments, the aim is to identify which instruments contribute to avoid fragmentation in the regulatory arrangements. The empirical analysis is based on a comparison of two utility sectors, energy and telecommunications, from a single-country perspective. Although the number of regulatory actors involved in each sector is quite substantial, arising coordination needs are dealt with by a range of procedural and structural

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<sup>1</sup> This paper has been prepared within the framework of the ongoing REGUNET-project. This research project of the Belgian Federal Science Office is realised in execution of the Research Programme “Society and Future”. Several public and private organizations, among which the Belgian sector regulators, are participating willingly in the REGUNET-project, and have been quite forthcoming with information. However, the authors would like to stress that all data gathering and conclusions reached in this paper are their sole responsibility. The aforementioned organizations have never authorized or have been asked to authorize in any way the content of this paper.

coordination mechanisms. A multitude of coordination instruments are used in regulatory arrangements, notably advisory platforms in vertical coordination and non-binding advices in horizontal coordination.

## ***Introduction***

In the post-liberalisation area, utility companies operate in a context of multilevel regulation, involving a wide set of authorities with general or sector-based competencies. Within the European Union, the legal framework is defined at this level of authority and its implementation belongs to the Member States and the federated entities in federal countries. At each level of authority, the competencies are divided between different organisations (e.g. Ministers, ministries, independent regulatory agencies, and competition courts). Such a specialisation within the regulatory arrangements may generate fragmentation and lack of effectiveness. In fact, the literature points out that competition between multiple regulators may have disadvantages, such as the lack of transparency and equal rights, redundancy in interventions, high administrative costs for companies, risk of blame shifting between regulators, and blind spots in rule enforcement. This paper tempers these predictions and shows that coordination mechanisms drastically limit fragmentation in the multilevel regulatory arrangements of the utility sectors. In other terms, specialisation is not necessarily synonymous with fragmentation, as coordination mechanisms compensate the dispersion of competencies between multiple levels and authorities. In line with Verhoest and Bouckaert (2005) coordination is understood as a process that aims at enhancing the voluntary and forced alignment of tasks and efforts of organisations within the public sector. We propose a typology of coordination instruments to conduct a synchronic and comparative analysis of the organisation of regulation in the energy and telecommunications sectors in Belgium. In a theoretical part, we present the concepts of specialisation and coordination and the typology of coordination instruments. Then, the two case studies describe the regulatory arrangements of the energy and telecommunications sectors in Belgium from a synchronic and territorial perspective, i.e. the arrangement governing at one point in time and within a specific territory. The legislative framework is sketched and the overall arrangement briefly presented. The emphasis is put on the division of competencies and coordination instruments used along four dimensions of specialisation: vertical, horizontal, between general competition regulation and sector regulation, and between sectors. The last part compares the coordination instruments

used in both sectors. It appears that a multitude of coordination instruments are used in regulatory arrangements, notably (non-binding) advisory platforms to cope with vertical specialisation and non-binding advices in horizontal specialisation. However, some non-binding instruments are used informally in the shadow of hierarchy as long as no conflict stands out (e.g. the veto power of the European Commission on the national market analyses in the telecoms sector).

### ***Coordination and Cooperation in Regulatory Arrangements***

Regulation is a broad and encompassing concept ranging from policy-making to monitoring and evaluation, hence with an emphasis on policy implementation and the related organisational arrangements. It is defined as the “public administrative policing of a private activity with respect to a rule prescribed in the public interest” (Mitnick 1980). It covers a whole range of activities, such as the definition and enforcement of public service obligations, company status, competition rules, technical standards, and access prices. Regulatory bodies are involved in several tasks: translation of general policies in more concrete rules, criteria, norms and standards (e.g. standards of interconnection); application of rules and standards in individual cases via licenses and permits (e.g. building permission, license for supply or approval of technologies); and monitoring of compliance and enforcement (e.g. information gathering and application of sanctions and rewards). Thus, regulation is conceptualised as a bundle of tasks, where the output of a preceding task forms the input for the following task<sup>2</sup>. Although a regulatory arrangement should include all these tasks, they can be spread across several organisations (Hood, Rothstein et al. 2001).

Regulation is often organised at multiple levels and form a regulatory arrangement. While regulatory functions have been carried out for long by central administrations, they are increasingly shared with and delegated to specialised agencies, self-regulating bodies, as well as supra- and sub-national authorities: “Multilevel regulation involves interaction, reinforcing, and colliding rule making and governance at the international, Federal, [regional], and city/local community levels. It emerges from varied top-down, bottom-up, and negotiated processes within the state, among states, among [regions] and cities, and among economic and

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<sup>2</sup> These regulatory tasks represent a cycle or chain, where all tasks are connected in a logical order. The chain normally starts with the creation of general rules. Next, these criteria are applied to a specific case. If the applicant is compliant with the criteria, then an individual authorisation or license is granted, allowing the applicant to perform an activity (e.g. enter a market). Next, monitoring is performed to test whether the regulatee still complies to the norms, after the licensing. If necessary, the regulatee may be sanctioned, for instance by retracting the license.

social interests” (Doern and Johnson 2006: 21-22). The regulatory arrangement is the whole set of organisations and authorities located at different levels of government which have the task to orientate or govern the behaviour of market actors as well as the capacity to implement regulatory decisions and to control their enforcement. The regulatory arrangement encompasses all the organisations involved in sector-based regulation at all phases of the policy process, not only the implementation phase. It includes the multiple levels of authority (e.g. international, European, federal, regional, and local) as well as the different organisations and bodies at the same level of authority (e.g. the independent regulatory agency and the competition authority at the national level).

Until now, little has been said about regulatory arrangements. Descriptions have mainly focused on the (independent) sector regulators (Coen and Thatcher 2005; Gilardi 2007). Regulatory arrangements taken as a whole would usefully describe the context where regulatory agencies and other regulators operate. In particular, the degree of specialisation of the respective authorities and the coordination mechanisms and other forms of interactions between the different competent authorities may tell much about the actual functioning of regulation. Our aim is to develop analytical tools that are able to grasp the complexity of the interactions occurring within the regulatory arrangements. We look at the combined action of regulators at different government levels with an emphasis on the dialectical relationship between specialisation and coordination.

Specialisation is the organisational form that led to the creation of regulatory agencies. The reforms conducted under the influence of New Public Management broke up the multi-objective bureaucracies embodied in hierarchical and monolithic departments into small organisations. Within the sectors, new public sector organisations with limited objectives and specific tasks were created out of these larger departments and the regulatory tasks split up between them. These new organisations were considered to be single-purpose agencies (Hood and Dunsire 1981; Pollitt and Bouckaert 2004). Thus, specialisation refers to the extent to which competencies are divided between several organisations. “Specialisation as a organisational-theoretical concept refers to the definition of which tasks and relations can be grouped together and coordinated and which can be separated” (Christensen and Læg Reid 2006). In the regulation of utilities, four dimensions of specialisation can be identified: (1) A vertical specialisation of competencies across governmental levels; (2) A horizontal specialisation of competencies within a sector, divided between several public sector organisations (e.g. ministry, agencies and bodies of appeal); (3) Specialisation between

sector-specific regulators and general competition authorities; and (4) Specialisation between sectors or policy fields.

The benefits and drawbacks of fragmentation and specialisation of regulatory activities raised much debate between the supporters and opponents of ‘regulatory competition’. The theory of ‘regulatory competition’ explains how several governments compete against each other, through regulation, in order to attract companies, citizens and resources (Tiebout 1956). As well, this competition may exist between regulatory authorities within one level of government, between different levels of government and between public and private sector organisations. Competition between several regulatory bodies with closely related competencies may result in favourable outcomes, such as innovation in the used types of regulation, the avoidance of ‘regulatory capture’ and other regulatory failures, the increase of performance of the regulatory organisations (because benchmarking becomes possible) and an intrinsic drive to minimise and simplify regulation, the creation of checks and balances, and the existence of a back-up in case of failing regulators (Hood, Rothstein et al. 2001: 174-175).

Nevertheless, competition between a multitude of regulators may have certain disadvantages as well, such as the lack of transparency and equal rights, high administrative costs for companies dealing with divergent regulators, risks of blame shifting between regulators, companies who play regulators off against each other, and blind spots in rule enforcement (Hood, Rothstein et al. 2001; Geradin and McCahery 2004). Under certain conditions, the coordination between regulators helps reducing the number of rules and administrative burdens and stimulate innovation with regard to types of regulation (because of the pooling and the exchange of experience and expertise), improves the enforcement of regulation (by exchanging standardised information), prevents ‘regulatory capture’ (because the regulator is not the only decision-maker), and increases the regulators’ accountability.

Specialisation inherently brings about new coordination needs. The creation of autonomous agencies disaggregated government and enhanced the risks of incoherence and inconsistency in public activities and policies. Establishing specific coordination instruments on a specialised organisational structure may overcome the potential problems of specialisation, such as fragmentation, redundancy, contradictions or lacunae in service delivery. In order to operate, regulatory arrangements with a high extent of specialisation must provide sufficient coordination (Verhoest and Bouckaert 2005).

Coordination is a central issue in public administration, which has met a renewed interest with the current reforms influenced by the New Public Management, and the resulting ‘agencification’ (Peters 1998; Pollitt and Bouckaert 2004). Coordination is the “extent to which organizations attempt to ensure that their activities take into account those of other organisations” (Hall, Clark et al. 1977: 459). The mechanisms can be more or less integrative as organisations limit themselves to exchange information and adapt unilaterally or reach mutual adjustments through negotiation or coercion. In the second sense, coordination refers more precisely to a “mutual adjustment between actors or a more deliberate interaction [that] produces positive outcomes to the participants and avoids negative consequences” (Lindblom 1965: 23). Coordination is scaled from independent decisions by organisations to governmental strategy encompassing all areas of the public sector (Metcalf 1976). Following Bouckaert, Peters and Verhoest, we consider coordination as a process rather than an outcome and keep their definition: “The instruments and mechanisms that aim to enhance the voluntary or forced alignment of tasks and efforts of organisations within the public sector. These mechanisms are used in order to create a greater coherence, and to reduce redundancy, lacunae and contradictions within and between policies, implementation or management” (forthcoming).

A broad consensus exists on the distinction between three mechanisms of coordination in social life, i.e. hierarchies, networks and markets (Thompson, Frances et al. 1991; Peters 1998). Hierarchical mechanisms rely on authority and power, market (or competition) mechanisms on bargaining and information, and network mechanisms on mutual cooptation and mutual norms. In the utility sectors, forms of coordination between governments and regulators tend to be less hierarchical and progressively more based on networks and markets. While these three fundamental mechanisms are widely accepted in the literature, they remain somewhat general and abstract. Rather, we propose a typology of coordination instruments tailored to the analysis of regulatory arrangements (see table 1)<sup>3</sup>.

This typology is based on the distinction between procedural and structural instruments. Procedural coordination refers to the interactions between the main sector regulator (e.g. BIPT in the telecoms sector) and the other organisations involved in the regulatory arrangement, but specifically those defined in legally set procedures (i.e. primary and secondary legislation). The main sector regulator can play different roles in these procedures

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<sup>3</sup> “The coordination instruments are specific activities which are done or structures created in order to bring about coordination” (Bouckaert, Peters and Verhoest forthcoming).

(e.g. advisory role, decision proposal, decision-making or overruling of others’ decisions). Procedural coordination concentrates solely on the procedures engaged in by the main sector regulator, which includes any appeal procedures against these decisions. A procedure means a formal interaction between organisations that leads to a regulatory decision. Structural coordination on the other hand groups together the interactions not handled in legally defined decision-making procedures, mainly those occurring in platforms for advice and consultation, information sharing systems, coordinating functions and the like. For example, Belgium uses formal and informal concertation platforms between national and regional regulators where discussions are held out of the legal decision-making procedures (e.g. ENOVER and FORBEG in the energy sector).

**Table 1: Typology of Coordination Instruments**

<b>I. Procedural instruments</b>		
Unilateral, top down imposition of decisions which constrain or determine the functioning of the other actor (e.g. instructions by a minister to an agency)	<b>Ranging from more hierarchical instruments for coordination...</b>	
Veto power, nullification of decisions, overruling		
Binding advice	(formal non-binding advice can be virtually binding in practice because of lack of expertise with the decisive actor)	
Non-binding advice, consultation		
Negotiation		
Joint decision, co-decision	<b>... to more network-like instruments for coordination</b>	
<b>II. Structural instruments</b>		
Reshuffling of competencies (e.g. bringing closely related competencies together in one organisation, reallocation of competencies because of better coordination)	<b>Ranging from more hierarchical instruments for coordination...</b>	
Coordinating function or body with hierarchical power over other actors		
Coordinating function or body with no hierarchical power over other actors	(could also refer to presence of a representative of actors in another actors’ advisory board)	
Systems or procedures for information exchange (e.g. sharing of database, common information structure or sharing of reports)		
Advisory platforms (platforms for non-binding advice, best practices, etc.)		
Concertation bodies or platforms (platforms which decisions still have to be approved by the participating organisations before they enter into effect)		(could also refer to presence of a representative of actors in another actors’ governing board or other board but without voting rights)
Bodies for collective decision making (platforms which decisions are binding for the member organisations)		(could also refer to presence of a representative of actors in another actors’ governing board or other board with voting rights)

Joint planning by regulatory actors

Joint actions by regulatory actors by pooling of information, resources and staff (joint inspections, joint monitoring or joint reviews)

**... to more network-like coordination instruments**

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This paper shows the multitude of coordination instruments used in a context of great specialisation. Thanks to coordination instruments, specialisation does not lead to fragmentation of the regulatory arrangement. The aim is to observe which kinds of coordination instruments allow a multi-level, multi-players, and multi-tasks regulatory arrangement to perform well, or to simply work. In a multi-level perspective, we look at the four dimensions of specialisation to see which coordination instruments are used, following the typology presented above. The procedural and structural instruments have been ranked from the more hierarchical to the more network-like.

The observations are based on a comparison of two cases of utility regulation located in the same country: telecommunications and gas in Belgium. The analysis is synchronic. A snapshot of the regulatory arrangement is taken at one moment in time for both sectors, to be precise in January 2009. The evolution of the arrangement is not taken into account. A territorial approach was taken, meaning that the multi-level regulatory arrangement is described from the perspective of one particular place. For telecoms, this place is located in the Walloon Region (i.e. Louvain-la-Neuve) and for energy in the Flemish Region (i.e. Leuven). As such, the regulatory arrangement described does not present all the different possible configurations existing in the EU or even in Belgium, but only one configuration that applies to a particular operator or customer located in one place of the territory. To illustrate why this is important, we give this example: the telecoms regulatory arrangement described is the one that applies to a customer or company located in Louvain-la-Neuve in Belgium. Both the regulation and the regulatory arrangement would be different if the observer had been located in Brussels or Ghent.

We opted to limit the scope of the comparison both in time and in space to reduce the complexity of the regulatory arrangement without impeding the rigour of the analysis. The choice of Belgium is motivated by the number of political levels involved and the challenge of the constitutive autonomy of the Regions and Communities within the Federation. The choice to compare telecommunications and energy is justified by the fact that, although both are utility network industries, here are important differences that exist between these two sectors. First, they produce very different goods and services. Energy production is based on

primary goods (e.g. natural gas), while telecoms produce electric signals only. Second, their regulatory frameworks differ in the level of autonomy they give to the Member States' Governments. The Telecoms framework is closer to standard competition law and leaves a lot of competencies to the European Commission and the national independent regulatory agencies (or sector regulators), while the energy framework leaves more control to the national executives and to the (Federal or Regional) Government rather than the sector regulator. Third, the delegation to the Federated entities (i.e. the Regions or Communities in Belgium) is higher in the energy sector. In the telecoms sectors, the Community level is involved marginally through broadcasting, while in the energy sector, the Regional sector regulator and Government are heavily involved in regulation of distribution networks, supply through the distribution network, and the development of renewable energy. Thus, the observation of regularities in the use of coordination instruments between both sectors would tell much about the effectivity of these instruments, whatever the context.

The paper was prepared on the basis of the second report of the REGUNET project, a three year project funded by the Belgian Science Office, aiming to assess the effectiveness and coherence of multilevel regulation in the utilities sectors. This second report mapped the telecommunication and energy sectors in Belgium, this to acquire a better view of the regulatory processes and arrangements in these two sectors. The REGUNET project itself aims at expanding this knowledge towards three other countries (Ireland, the Netherlands and Switzerland) to be able to come to a comparative analysis.

Methodologically, the REGUNET researchers first analyzed the legal acts on the Belgian Federal and Regional/Community levels (sector specific and general competition law), and used the information found on these levels to obtain data on relevant European legal documents as well. Second, relevant literature was examined both from academic and professional sources (such as OECD documents). Third, the researchers sent a standardised questionnaire to the sector specific regulators and the general competition authority, containing requests for information on the structure of the organisation, the links with Ministries and Departments, control methods by other organisations, and contacts with various other organisations. The legal analysis, academic literature and questionnaires were then completed by a series of interviews with public and private organisations, most notably the sector regulators, general competition authority, relevant Departments, European Institutions, and private federations. The aims of the interview was to complement the obtained information and to put data that could not be interpreted correctly into its context.

The authors of this paper have tried to put the wealth of information obtained from the second report in a more concise theoretical framework, so that results can be extrapolated and used more broadly. This can then be adopted once again into the final output of the REGUNET project.

### ***Regulation of Network Industries in Belgium***

The regulatory arrangements of the Belgian energy and telecommunications sectors are multi-level, multi-actor and multi-task arrangements. Surprisingly, although the number of regulatory actors involved is substantial, the extent of fragmentation seems to be limited and the coordination problems are few. For each sector, we present the current legal framework and the regulatory arrangement following the four dimensions: (1) vertical specialisation and coordination across governmental levels; (2) horizontal specialisation and coordination within a sector; (3) specialisation and coordination between sector-specific regulation and general competition; and (4) specialisation and coordination between sectors.

### **Regulatory Arrangement of the Energy Sector**

The legal and regulatory situation of the energy sector in Belgium is the result of several laws and regulations on the European, Federal and Regional levels that always consisted of separate texts for the electricity and natural gas sectors. Though both these sectors differ in terms of production, transportation and storage, little difference is observed in their regulatory arrangements, in particular the division of the sectors in four submarkets: production, transmission (electricity) or transport (natural gas), distribution and supply. Production and supply have been liberalised while transmission/transport and distribution remain (natural) monopolies<sup>4</sup>. Liberalisation of the electricity sector was driven by the European Law as of 1996<sup>5</sup>. Likewise, the liberalisation of the natural gas sector started as of 1998<sup>6</sup>.

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<sup>4</sup> The EU has made tremendous efforts to unbundle the submarkets, making sure that no company would vertically integrate all of them, and thus be able to cross-subsidise to inhibit competition on the liberalised markets.

<sup>5</sup> Directive 96/92/EC, establishing common rules for the internal market in electricity, repealed in 2003 by the Internal Market in Electricity Directive (2003/54/EC). The framework is completed by a directive about the security of supply and investments in infrastructure (Directive 2005/89/EC) and a regulation that governs the conditions for access to the network when engaging in cross-border trade in electricity (Regulation 1228/2003).

<sup>6</sup> Directive 98/30/EC concerning common rules for the internal market in natural gas, repealed in 2003 by the Directive 2003/55/EC (also known as the Second Gas Directive). The Regulation 1775/2005 that governs access to the natural gas transmission network completes the framework.

The Belgian Federal law implements the EU energy framework<sup>7</sup>. It is also divided between electricity and natural gas with reference laws of 1999, that foresee in particular the creation of an independent regulatory agency, the Commission for the Electricity and Gas Regulation (CREG), set up in 2000. In the energy sector, the Regional level occupies a major position in the regulatory arrangement as well. Concerning supply through the distribution network<sup>8</sup>, liberalisation was put into operation in the three Regions with significant differences in time, between 2002 and 2003 in Flanders<sup>9</sup>, and 2003 and 2007 in Wallonia and Brussels<sup>10</sup>. Each Region has a sector-based regulatory authority, the *Vlaamse Reguleringsinstantie voor de Elektriciteits- en Gasmarkt* in the Flemish Region (VREG)<sup>11</sup>, *Commission wallonne pour l'énergie* in the Walloon Region (CWaPE), and Brugel in the Brussels Region<sup>12</sup>.

#### *Description of the regulatory arrangement in the energy sector*

The regulatory arrangement in the energy sector in Belgium is organised primarily around the European Commission, and both the CREG and the Regional sector regulators (VREG, CWaPE, and Brugel), while the European Commission continues to play an important role in producing norms, without being directly involved in the everyday regulation process (see Figure 1). At the European level, policy-making is made under co-decision between the Council of the EU and the European Parliament on initiatives prepared by the European Commission<sup>13</sup>. In policy-making, the national and Regional sector-based regulators are

<sup>7</sup> For electricity, this concerns the Law of 29 April 1999 about the organisation of the electricity sector, and for gas the Law of 29 April 1965 concerning the transportation of gaseous substances through pipes, as revised by the Law of 29 April 1999 concerning the organisation of the gas sector. Numerous amendments were adopted in order to follow the evolution of the EU framework.

<sup>8</sup> Supply through the transmission/transport network was liberalised on the Federal level, while supply through the distribution network was liberalised on the Regional level. Though the quantity of supply through the transmission/transport network is quite high, household consumers were only directly involved in the energy liberalisation process when supply through the distribution network was liberalised.

<sup>9</sup> Regional Laws of 17 July 2000 about the organisation of the electricity market and 17 September 2000 about the organisation of the gas market.

<sup>10</sup> In the Walloon Region, electricity is regulated by the Regional Law of 12 April 2001 concerning the organisation of the electricity sector, modified by the Regional Law of 17 July 2008, and gas by the Regional Law of 19 December 2002 concerning the organisation of the gas sector, as amended by the Regional Law of 17 July 2008. In the Brussels Region, the energy market is regulated by the Regional Law of 19 July 2001 concerning the organisation of the electricity sector, amended by the Regional Law of 14 December 2006, and the Regional Law of 1 April 2004 concerning the organisation of the gas sector, amended by the Regional Law of 14 December 2006.

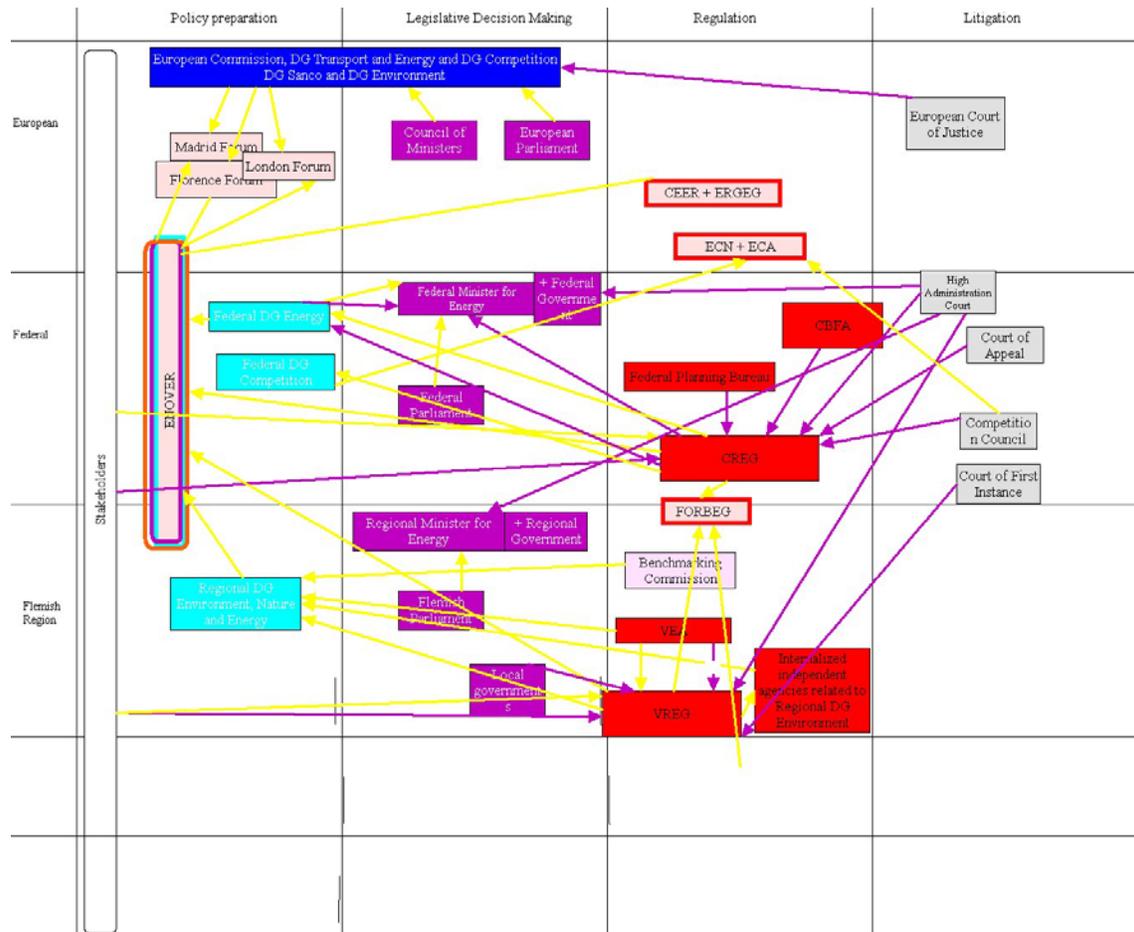
<sup>11</sup> VREG was established in 2001 but its structure was changed in 2004. These changes were operationalised in April 2006 (Regional Law of 30 April 2004).

<sup>12</sup> CWaPE, has been operational since September 2002 and Brugel since 2007 (Regional Law of 14 December 2006). The three regional sector-based regulators share similar responsibilities and are also all independent regulatory agencies.

<sup>13</sup> Art. 289 of the Treaty of the EU.

consulted through the European Regulators' Group for Electricity and Gas (EREG), the Commission's formal advisory group of energy regulators<sup>14</sup>. The policy implementation phase is handled by the Commission's DG Transport and Energy (DG TREN), but DG Competition (DG COMP) checks the compatibility of decisions with the EU competition law, and more recently the DG Health and Consumer has become more involved due to the creation of the London Forum. Lastly, the DG Environment is an important contributor to the Green Package, revolving around renewable and sustainable energy sources.

**Figure 1: Regulatory Arrangement in the Energy Sector in Belgium**



In the energy sector in Belgium, the competencies are divided between the Federal and Regional levels. With regards to the regulated markets (transmission/transport and distribution), the transmission submarket is regulated by the Federal authorities, as well as the

<sup>14</sup> A separate organisation, the Council of European Energy Regulators (CEER), groups the different sector regulators as well, but is completely independent from the European Commission.

setting of the social tariffs, and tariffs for the different distribution networks<sup>15</sup>. However, most regulation with regards to the distribution network is situated on the Regional level. This can sometimes cause issues for the gas sector, since it is not always clear in this sector where the transmission network ends, and the distribution network starts. For the electricity sector, the transmission network is any network which exceeds currents of 70kV.

With regards to the liberalised markets (production and supply), the Federal level retains some regulatory competencies regarding production, and is involved in regulation of supply through the transmission/transport network, and the regulation of social tariffs and maximum prices. Additionally, it has general monitoring competencies regarding the state of the market and competition on the market. Both the Federal and Regional levels can impose public service obligations.

At the Federal level, policy-making is directly managed by the Minister of Climate and Energy, in consultation with other members of the Government (e.g. consumer protection, social protection, foreign policy, finances, and the environment). The Federal Ministry for the Economy (*SPF Economie*), which houses the Federal DG Energy and the Federal DG Competition, assists the Minister in the preparation works. The Federal DG Energy is also responsible of prospective studies. Inter-departmental meetings allow the inclusion of the viewpoints of other ministries. The positions of the Regions in policy-making are also officially expressed within the *Energie overleg Staat-Gewesten groep* (ENOVER)<sup>16</sup>. CREG is involved in the policy-making stage through prospective studies and it is consulted concerning reforms of its own statutes and capacities.

Policy implementation is the primary task of the sector regulators, mainly the CREG<sup>17</sup>, but also the Federal DG Competition and the Competition Council (together the Belgian Competition Authority). At this stage, another platform organises the cooperation between the Federal sector regulators, and the Regional sector regulators, i.e. the *Forum des régulateurs belges de l'électricité et du gaz* (FORBEG). The Minister of Energy is himself involved in the regulatory process, and the Federal Government also has limited possibilities to suspend

<sup>15</sup> A move of competence in tariff setting to the Regional level is at this time under discussion.

<sup>16</sup> Cooperation agreement of 18 December 1991 between the Federal and Regional Governments.

<sup>17</sup> In terms of economic regulation, the CREG is involved in general monitoring, accepting the tariffs for the transmission and distribution network, and the transit tariffs, giving advice on a mechanism for the exchange of electricity blocks, proposing minimum purchase obligations for green stream certificates through the transmission network, designating the transmission network operator and giving licenses to retail/supply companies to provide electricity or gas directly through the transmission network, procedures to start up new production facilities for electricity, procedures to reinforce the transmission network, procedures for domain concessions for offshore facilities, development plans of the transmission network for electricity, prospective studies, and procedures to accept costs by energy companies due to public service obligations.

CREG decisions. Regulation decisions can be appealed either to the Competition Council, the Court of Appeal in Brussels, or the High Administration Court (Court of State, *Raad Van Staat* or *Conseil d'Etat*).

The regulatory arrangement of the energy sector at the Regional level shows parallels with the Federal level. In Flanders for instance, policy-making is driven by the Flemish Minister of Public Works, in association with the Flemish DG Environment, Nature and Energy, and the Flemish Energy Agency (VEA) which tasks focus on the implementation of energy policy, notably the promotion of energy savings. As far as regulation is concerned, it is handled by the VREG<sup>18</sup>. Coordination of regulatory issues goes through the FORBEG, which is also used to have an impact on Federal policy preparation. There is no competition authority at Regional level, as competition is a Federal competence. Consequently, VREG has no competencies on general competition regulation, nor does it have any formal links with the Competition Authority. However, it can be informally contacted regarding a specific case or consulted as expert. Regulatory decisions can be appealed to a Court of First Instance or to the High Administration Court.

#### *Vertical specialisation and coordination across governmental levels in the energy sector*

With respect to vertical specialisation and coordination, there are no strong procedural links between the European and Federal or Regional levels, but several structural ties (i.e. yearly implementation reports sent to the European Commission). National representatives work together in the comitology committees, while ERGEG brings the sector regulators together and advises the Commission. However, the European Union concentrates on policy-making. In terms of regulation, the European Union is only partially involved in the procedure of authorising interconnections (i.e. cross-border connections) where DG TREN provides standard guidelines to the Member States. With regards to general competition law, the ex-post evaluation of the Belgian market is made by the Competition Authority, but in case of cross-border issues, the Commission's DG COMP either acts as a coordinator between the involved competition authorities, or handles the case by itself.

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<sup>18</sup> Within economic regulation, VREG is involved in the provision of permissions to distribution network operators, provision of licenses to supply companies that supply energy through the distribution network, provision of green stream certificates to producers of green stream energy, provision of licenses for installations related to green energy, and public service obligations imposed on the distribution network operators and the retail/supply companies

The second element of vertical specialisation and coordination, i.e. between the Federal and Regional levels, shows that the competencies between the two levels of authorities are well delineated both in the Constitution and into the law. Each level works on their own within their own competence. There are no procedural coordination instruments, involving both levels. Nevertheless, some structural coordination instruments exist in order to coordinate common matters. The Federal Government consults the Regions within ENOVER for policy-making, and FORBEG groups the sector regulators on both the Federal and Regional levels regarding implementation.

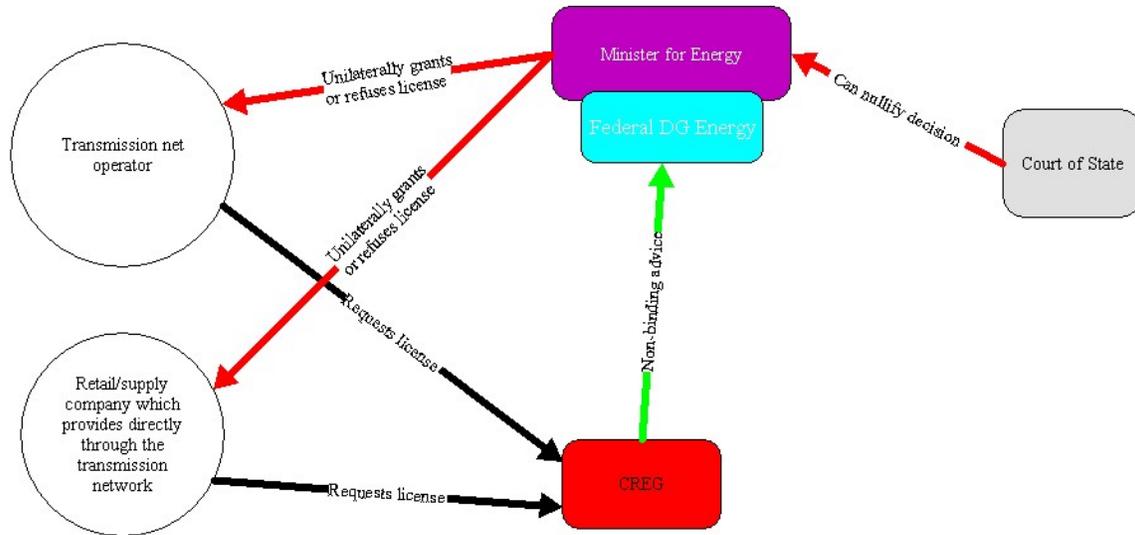
*Horizontal specialisation and coordination at the same governmental level within the energy sector*

As such, the policy levels are quite independent from each other and cooperation within the regulatory arrangement is mainly developed in the horizontal dimension. At the Federal level, economic regulation is shared between CREG and the Minister of Energy. For instance, the Minister is responsible for granting licences to suppliers who supply energy through the transmission/transport network (see Figure 2). The request for the license however is sent to CREG, and it then proposes the license (in case of electricity)/gives advice on the license (in case of natural gas) to the Minister. This proposal carries an important weight, since it is normally followed<sup>19</sup>. Moreover, the general conditions for the granting of the license are set in a Royal Decree decided on by the Minister, but again it is CREG that gives advice on this Royal Decree. Since it is not the CREG that officially decides, appeals can only be made to the High Administration Court.

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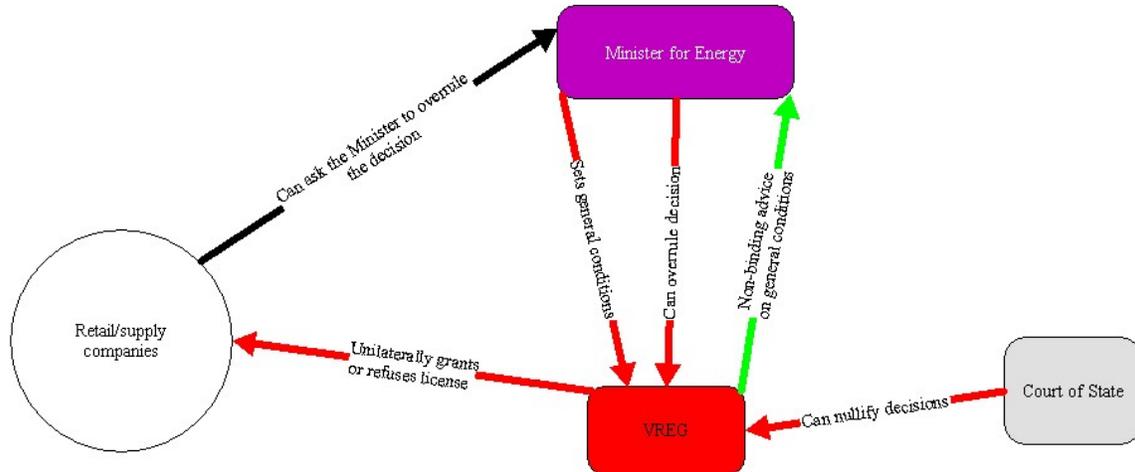
<sup>19</sup> CREG has a much better view than the Minister for Energy or the Federal DG Energy about economic regulation issues. There has only been one politically motivated case where CREG's advice was not followed.

**Figure 2: Procedure of Licensing Transmission Operators and Suppliers through Transmission Networks**



The regulation is organised quite similar at the Regional level, with a distribution of competence between VREG and the Flemish Minister of the Energy. For example, VREG has the task to grant licenses to supply companies, under the control of the Flemish Minister (see Figure 3). The Flemish Minister of Energy sets the general conditions of a license, to which the candidate supplier must adhere, and VREG gives a non-binding advice on these general conditions. This advice is usually followed as VREG holds the technical expertise. VREG grants the license itself, but in case of appeal the Minister can suspend the decision. VREG has also the competence to withdraw the licences. To sum up, the horizontal distribution of competencies at the Regional and Federal levels is similar. VREG is involved in advisory functions and has an extensive influence in all cases where the Flemish Minister of Energy decides. The most important difference between the Federal and Regional level is that at the Federal level, it is the Federal Minister who makes the regulatory decision to grant a license, but in light of the importance given to the proposal/advice of CREG, this difference should not be overstated. Within the Flemish Region, there is further specialisation because other agencies also have competencies related to the energy sector, for instance the Flemish Energy Agency (VEA) which is competent in energy savings.

**Figure 3: Procedure of Licensing Energy Suppliers through the Distribution Network**



*Specialisation and coordination between energy regulation and general competition.*

The division of competencies between the energy regulators and the general competition authorities is relatively clear. At the Federal level, CREG is charged to collaborate with the Competition Council to eliminate anti-competitive behaviour, this by reporting this behaviour to the Federal Minister and the Competition Council, when observed in the course of the monitoring competencies of CREG. Until recently, the exchange of confidential information from CREG to the Competition Council was problematic, since such an exchange was not foreseen in the different Acts. However, this situation has recently been remedied. At the Regional level, we see no overlaps because the Regional sector regulator is not involved in general competition policy.

*Specialisation and coordination between energy sector and other sectors*

In terms of inter-sectoral coordination, there is no specialisation between natural gas and electricity. The same organisations are responsible for regulating both sectors. Unlike the telecommunication sector, as we will see later on, there is also no other sector inherently related to the electricity and gas sectors, as is the case between telecommunications and media. Nevertheless, energy issues have impacts on closely related policy sectors, such as the environment. Usually, coordination is organised at the Government levels during the policy-making stage. The different ministries make comments on bills in inter-cabinet and inter-department meetings.

Lastly, the continuous evolution in the energy sector is striking. In Belgium, competencies of different organisations have been reshuffled and are still being reshuffled at this time. The last change in the Federal Law was made in June 2008 and a next one is envisioned this year. At the European level, the new third package is still being discussed, and will most likely bring new changes as well.

### **Regulatory Arrangement of the Telecommunications Sector**

Telecommunications first referred to the public phone and the telegraph. The dependence of telecommunications services on a physical network was problematic for the development of competition. Economics of network industries is based on an extreme large scale effect which has been the rationale for public monopolies. In the early 1970s, technological evolution put pressure on the market, which questioned monopolies and their inefficiency.

In Belgium, the liberalisation of the sector is due to the EU telecoms policy that has developed since 1990<sup>20</sup>. At that time, the incumbent was turned into a public limited company<sup>21</sup>. The second round of the opening process was launched in 1996 with the objective of a full market opening in 1998<sup>22</sup>. In spite of liberalisation, some operators maintained dominance and control on the market. To tackle this, the EU decided to adopt the current legal framework that improves economic regulation with the conduct of market analyses and the designation "powerful operators"<sup>23</sup>. National sector-based regulators are implementing the framework and charged to impose specific obligations (e.g. about transparency, network access or tariffs) to the powerful operators. The 2003 framework is a sophisticated legislative initiative that extends regulation to all electronic communications networks and services, pushes sector regulation very close to general competition law, and sets up a regulatory arrangement centralised around the European Commission while enlarging the national

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<sup>20</sup> Directives 90/388/CE, 94/46/CE, 95/51/CE, and 96/2/CE liberalising the market for terminals and services with high added value.

<sup>21</sup> Law of 21 March 1991 on autonomous public companies.

<sup>22</sup> Directive 96/19/CE transposed into Belgian Law by the law of 19 December 1997.

<sup>23</sup> The 2003 EU telecoms framework is composed of the Directive 2002/19/EC on access and interconnection of electronic communications networks and services ("Access Directive"), 2002/21/EC on a common regulatory framework for electronic communications networks and services ("Framework Directive"), 2002/22/EC on universal services and users' rights ("Universal service Directive"), and 2002/58/EC on the processing of personal data and the protection of privacy ("Directive on privacy"), the Commission Directive 2002/77/EC ("Competition Directive"), and the Decision 676/2002/EC for radio spectrum policy in the Community ("Radio Spectrum Decision"). The Directive 1999/5 on terminal equipment ("R&TTE Directive") and Regulation 2887/2000 on unbundled access to the local loop are also part of this current framework.

regulator's competencies at the same time. The European Framework was transposed in Belgium through Federal and Community laws<sup>24</sup>.

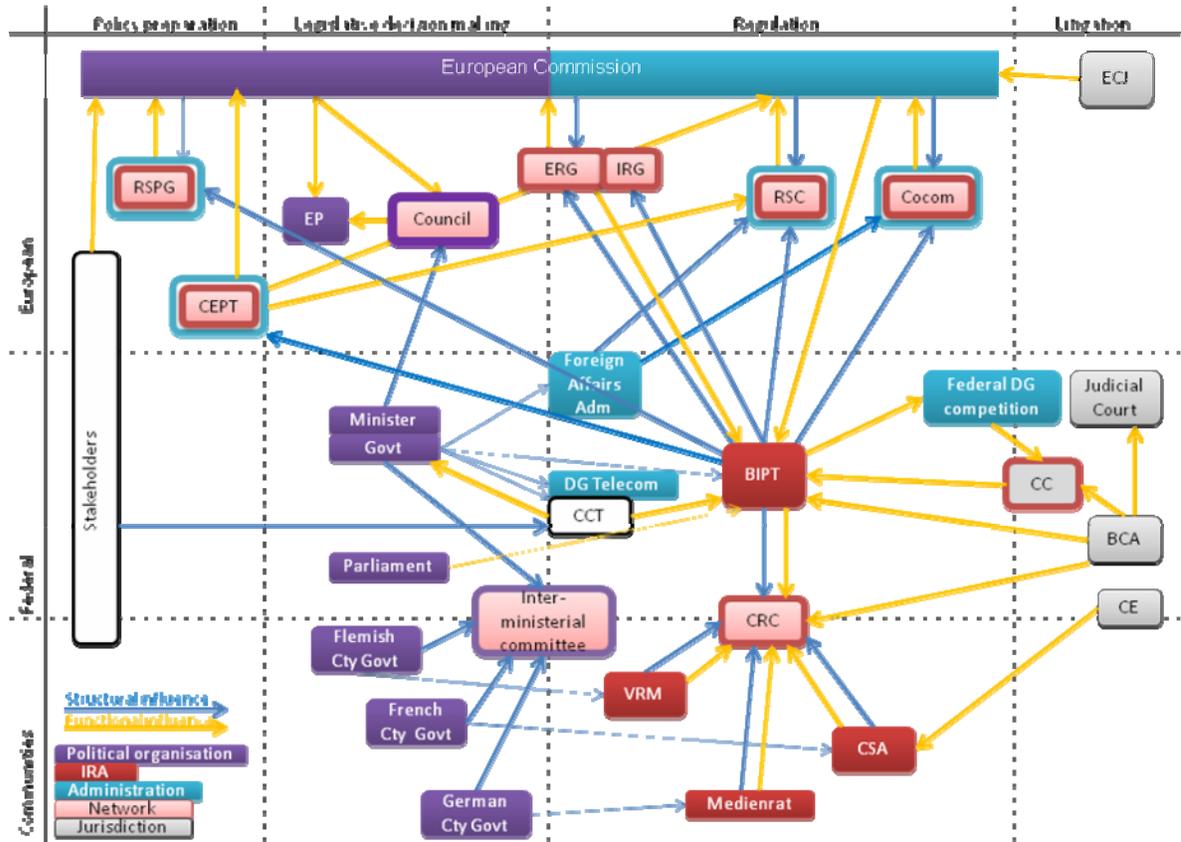
*Description of the regulatory arrangement in the telecoms sector*

The regulatory arrangement in the telecoms sector in Belgium is organised around the European Commission, and the Belgian Institute for Post and Telecommunications (BIPT), the sector regulator (see Figure 4). At the European level, the policy initiative belongs to the Commission which consults a large set of public and private stakeholders in particular the European Conference of Postal and Telecommunications Administrations (CEPT), the association of national telecoms administrations, and the Radio Spectrum Policy Group (RSPG), the European Regulators Group (ERG) and the Independent Regulators Group (IRG). Under co-decision, decision-making belongs to the EU Council and the European Parliament, but the Commission is still present to discuss the amendments and can withdraw the proposal at any time. In the implementation phase (referred as regulation in Figure 4), the Commission still participates. The Directorate General Information Society (DG INFSO) monitors the Member States' transposition and DG Competition (DG COMP) participates to the supervision of the market analyses made by the national sector regulators within a joint task force with DG INFSO that has a veto power on these analyses. In addition, the Commission can take technical implementing recommendations or decisions to harmonise implementation under the supervision of comitology committees (i.e. the Communications Committee, COCOM; and the Radio Spectrum Committee, RSC). Eventually, the non-binding common positions of the ERG also contribute to harmonization in the Member States.

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<sup>24</sup> Telecommunications belong to the Federal competencies and broadcasting the Community competences. At the Federal level, the EU framework is transposed by the Law of 17 January 2003 about the statute of the BIPT, the Law of 17 January 2003 on appeal and dispute settlement, and the Law of 13 June 2005 on electronic communications, which entails most of the transposition. At the Community level, the transposition is made by the French Community Law of 27 February 2003, the Flemish Community Law 4 March 2005, and the German Community Law of 27 June 2005. Belgium is a federation composed of two categories of sub-national entities. The three regions (Wallonia, Flanders, and Brussels) are one type of federated entity. Geographically defined, they are in charge of issues linked to the territory, such as infrastructure and the economy. The three communities (French, Flemish, and German Communities) refer to linguistic groups of people and are in charge of issues linked with people, such as culture, broadcasting and education.

Figure 4: Regulatory Arrangement in the Telecommunications Sector in Belgium



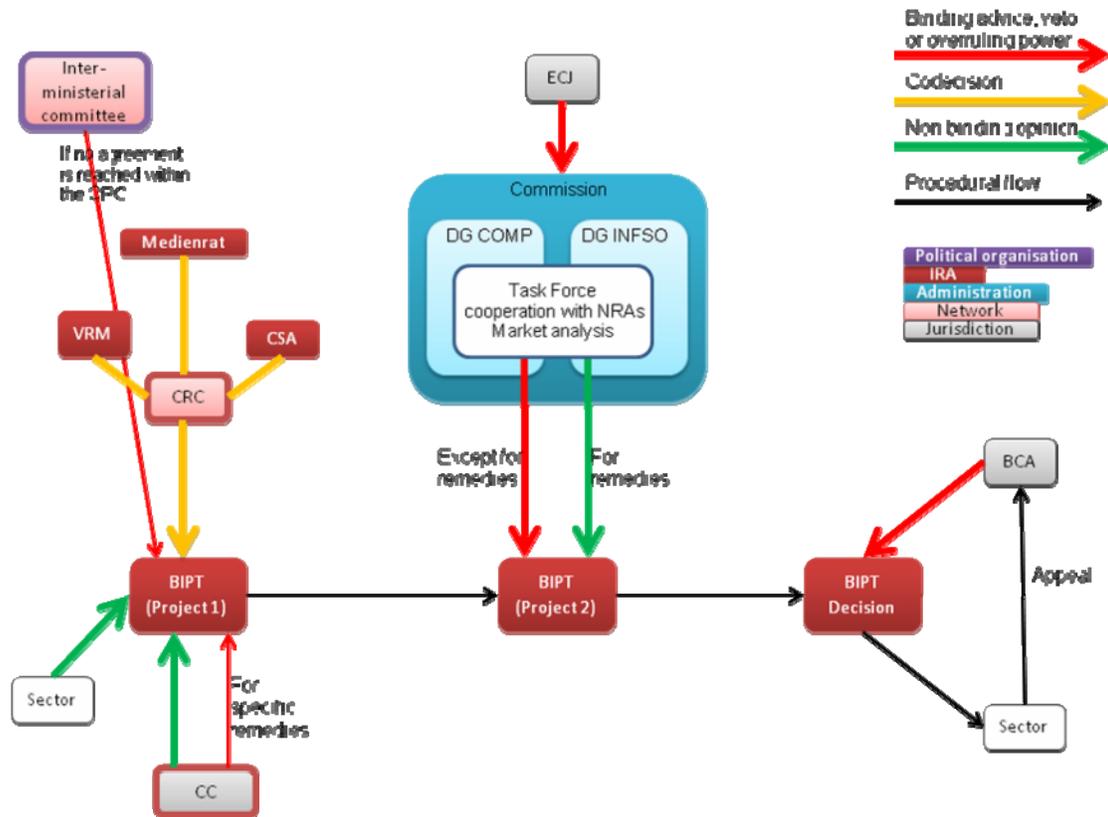
The Belgian Federal level is mainly involved in the implementation of the EU framework. Formally, the Federal Ministry of the Economy is in charge of drafting the Federal legislation (DG Telecoms), but in fact it has remained a task of BIPT. Each bill is submitted to consultation to the Community Governments within the Interministerial Committee for Telecommunications and Broadcasting. The implementation of Belgian laws is handled by the BIPT which largely consults the stakeholders as well as the Competition Council (CC) about issues related to competition law. Usually, BIPT follows the guidelines of the ERG about secondary issues. In terms of litigation, the Competition Council is competent for dispute resolution between operators, even if the operators rather complain to BIPT or the judicial courts. Complaints against BIPT decisions must be referred to the Court of Appeal in Brussels. As mentioned before, the Communities manage broadcasting. In terms of regulation, the Federal and Community telecoms and media regulators (BIPT, CSA, VRM and Medienrat) agreed to consult each others, notably within the Conference of Regulators of Communications (CRC), and consider their respective positions in their decisions<sup>25</sup>.

<sup>25</sup> Cooperation agreement of 17 November 2006.

*Vertical specialisation and coordination between governmental levels in the telecoms sector*

The major element of the telecoms regulation is the market analysis. It reflects quite well the vertical specialisation within the regulatory arrangement (see Figure 5). Market analysis is a national competence with four elements. The first is the definition of the regulated markets that draws the perimeter of economic regulation. If a service does not belong to a regulated market, it is submitted to the general competition law<sup>26</sup>. The second consists in scrutinizing the market to assess whether it is competitive enough. The third is the identification of operators with significant market power (SMP). The fourth element is the choice of remedies, i.e. the choice of obligations that will be imposed on the operators with SMP.

**Figure 5: Procedure of Market Analysis in the Telecommunications Sector in Belgium**



In the first phase of the procedure of market analysis, BIPT coordinates with the other Belgian regulators and stakeholders. After a first public consultation, BIPT sends its draft decision to

<sup>26</sup> According to the European Commission’s Recommendation of 17 December 2007, the current list entails one supply market (access to the public telephone network at a fixed location for residential and non-residential customers) and six wholesale markets (call origination on the public telephone network provided at a fixed location; call termination on individual public telephone networks provided at a fixed location; wholesale (physical) network infrastructure access (including shared or fully unbundled access) at a fixed location; wholesale broadband access; wholesale terminating segments of leased lines, irrespective of the technology used to provide leased or dedicated capacity; and voice call termination on individual mobile networks).

the Competition Council for a non-binding advice (except about some remedies)<sup>27</sup>. Then it sends the draft to CRC which can decide to handle the issue at unanimity (or be replaced by the Interministerial Committee)<sup>28</sup>. In the second phase, the Commission makes sure of getting a certain degree of harmonization between the Member States. It starts with an informal phase of consultation with BIPT called the pre-notification meeting<sup>29</sup>. The notification follows where BIPT informs the Commission and the other national regulators of the expected measures. In reaction, the Commission issues a 'letter of comments'<sup>30</sup>. In absence of 'serious doubts', the letter is interpreted as an agreement and the national regulator must take utmost account of the comments made by the Commission. In case of 'serious doubts' against the notification from BIPT, the Commission launches the phase two which freezes the regulator's decision for two more months and opens a dialogue and negotiation between both parties. In case of persistent disagreement, the Commission uses its veto power, a situation that is seldom observed. However, the veto power does not apply to remedies, but the Commission is able to suggest appropriate remedies and issue recommendations.

Within the market analysis, the interactions between BIPT and the Commission are mainly hierarchical, even if network mechanisms also play a role. As the Commission's veto power does not reach all decisions of the BIPT, other channels for regulatory harmonization are developed either through voluntary cooperation or joint decision (e.g. the non-binding benchmarks of the ERG or the binding technical implementing decisions taken under the comitology procedure with the national representatives). Thus, even if competencies are rather clearly allocated (with very few conflicts of competence), vertical coordination is widespread with a mix of hierarchy and cooperation between the Commission and the sector regulators. National law-making also involves the Commission which checks whether the transposition is consistent with the legal framework. The contacts unfold on a cooperative mode, although they are due to the hierarchical power of the Commission which has the ability to launch infringement procedures against the Member States. Coordination is often based on a hierarchical power of the Commission, although hierarchy is very rarely visible in practice while cooperation seems to be the main mode of relationships between the Commission and national authorities.

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<sup>27</sup> These are the interdiction of charging excessively high prices, impeding market access, using eviction prices that limit competition, and grouping services in an unjustified way (art. 63 §1 of the Law of 13 June 2005).

<sup>28</sup> The CRC has not entered into force yet, for cooperation is taking place informally.

<sup>29</sup> Which is not compulsory but widely used.

<sup>30</sup> Operators, who are not consulted in this phase, claim for the possibility to react or appealing against the letter of comments. The European Court of Justice (ECJ) rejected the claim as it does not consider the letter as a legal act.

*Horizontal specialisation and coordination within the same governmental level in the telecoms sector*

Specialisation in the telecoms sector is also horizontal, between the Government, ministries, sector regulators and courts. At the European level, the decision-making process is usual and follows the co-decision procedure. Advisory platforms deliver non-binding advises that have a high moral value and are often respected (e.g. ERG and IRG). A joint task force is organised inside the European Commission between DG COMP and DG INFSO in order to coordinate the telecoms regulation with the general competition law. At the Belgian level, law-making in the telecommunications is a competence of the Federal Government, while regulation is delegated to BIPT. BIPT is also involved in drafting legislation, but informally, and can issue non-binding opinions on these drafts. Though, the role of the Minister of Telecoms is relatively marginal and the Federal DG telecoms is understaffed and has no influence. In terms of litigation, the Court of Appeal in Brussels can overrule the BIPT decisions. The Constitutional Court and the judicial courts settle the disputes between operators. At the Community level, the sector regulators are only involved in broadcasting (CSA, VRM and Medienrat).

*Specialisation and coordination between the telecoms regulation and competition regulation*

The division of tasks between the competition authorities and telecoms regulators is clear. The sector-specific regulation is endorsed by the BIPT and competition authorities apply the general competition law, but both organisations cooperate. During the market analysis, the Competition Council is giving a non-binding advice about BIPT's market analyses. The Council's opinions are sometimes binding, which punctually provides the Council with a hierarchical position to the BIPT. In case of conflict, the operators should go to the Competition Council, as BIPT has no competence for it (the mediation competence is not very successful). But in practice, BIPT resolves conflicts through administrative decisions. So far, the Competition Council has not attracted much conflict as operators rather refer their cases to BIPT or judicial courts<sup>31</sup>.

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<sup>31</sup> Eventually, the relationships between the Competition Council and BIPT may become more hierarchical. The Government is currently working on reforming the appeal mechanism system and clarify the relationship with a view to clearly set the Competition Council in a hierarchical position towards BIPT. The idea is to transfer all appeals against BIPT decisions to the Competition Council when competition issues are involved. The Council's competence to issue non-binding opinions would then be transferred to the Federal DG competition.

*Specialisation and coordination between the telecoms sector and the media sector*

In Belgium, the implementation of the EU telecoms framework initially produced a conflict of competence between the BIPT and the media regulators, as well as between the Communities and the Federal Government about law-making. The Constitutional Court set an ultimatum and obliged the Communities and the Federation to reach an agreement before taking further measures. Long negotiations followed and ended up in 2006 with an agreement on a cooperation mechanism based on a network of regulators (for regulatory issues) and a network of Governments (for legislative issues).

***Comparison of Specialisation and Coordination in the Energy and Telecommunications Sectors***

In terms of specialisation, we observe a quite substantial number of authorities across different governmental levels participating in the regulatory arrangements. However, due to the procedural and structural coordination mechanisms in place, the extent of regulatory fragmentation seems to be low.

The independent regulatory agencies (or sector regulators) are mainly involved in the policy implementation stage. Either they take decisions on individual cases or they prepare ministerial decisions (see Annex for a comparison of the capacities of CREG, VREG, and BIPT). The regulators also play a major role in law-making as they advise the legislator or sometimes draft the legislation. The comparison of the specialisation and coordination of the regulatory arrangements in the energy and telecoms sectors in Belgium follows the four dimensions of specialisation presented above: Vertical specialisation, horizontal specialisation, specialisation between competition and sector regulation, and specialisation with other sectors.

**Vertical Specialisation: European, Federal, and Regional/Community Levels**

The integration between government levels is important in both sectors, though more pronounced between the EU and Federal levels than between the Federation and the Regions (see Table 2). This is certainly due to the specificity of Belgian Federalism built with strict barriers around the Regional and Community competencies. Most of the legislation implemented comes from EU frameworks that are transposed into the national law. The EU

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The reform project of the Government is therefore likely to bring significant changes in the balance of power and the relationships between BIPT and the Competition Council.

institutions consult the Member States in the preparatory phase and carefully monitor the transposition and implementation. The Regions are autonomous from the Federation to transpose the EU frameworks within their field of competence. Not much coordination problems arise, except with the cost acceptance mechanism of public service obligations in the energy sector where the CREG is asked to accept costs that are the result of obligations imposed from both the Federal and Regional levels. Cost impositions from the Regional level can become problematic when CREG decides not to accept the cost calculations made by the companies. Other problems were resolved with different kinds of coordinating bodies.

**Table 2: Vertical Specialisation and Coordination in the Energy and Telecommunications Sectors**

	ENERGY	TELECOMMUNICATIONS
Law making	<p><b>EU:</b> <i>Commission initiates + EU Council and Parliament decide + Member States implement</i>                      Advisory platforms (CEER, ERGEG, etc.)                      Non-binding advice and exchange of information (Commission)                      Concertation body for Belgian positions (ENOVER)  <b>Federal/Regions:</b> <i>Clear division of competencies</i>                      Advisory platform (ENOVER)</p>	<p><b>EU:</b> <i>Commission initiates + EU Council and Parliament decide + Member States implement</i>                      Advisory platforms (ERG, RSPG, CEPT, etc.)                      Non-binding advice and exchange of information (Commission)                      Non-binding advice (BIPT) (draft)  <b>Federal:</b> <i>Fed. Gov. decides + Community Gov. decide</i>                      Body for collective decision making (Interministerial Committee)</p>
ECON	<p><b>Interconnectivity:</b> <i>DG TREN sets the framework + Government sets the guidelines</i>                      Advisory platforms with high moral weight (CEER, ERGEG, Madrid &amp; Florence forums)                      Body for collective decision-making (comitology)</p> <p><b>Federal/Regions:</b>                      Clear division of competencies                      Advisory platform (FORBEG)</p>	<p><b>Market analysis:</b> <i>BIPT decides + Commission steers</i>                      Veto power (Commission)  <b>Market analysis:</b> <i>BIPT decides + Community Regulators decide (unclear competencies)</i>                      Body for collective decision making (CRC)  <b>Choice of remedies:</b> <i>BIPT decides + ERG recommends</i>                      Advisory platform (ERG)  <b>Choice of remedies:</b> <i>BIPT decides + Commission and Cocom recommend (for harmonization)</i>                      Non binding advice (Commission)                      Concertation body (Cocom) (non-binding)  <b>Choice of remedies:</b> <i>BIPT decides + Community Regulators decide (unclear competencies)</i>                      Body for collective decision making (CRC)</p>
TECH	<p><b>EU: Harmonization of technical issues:</b> <i>DG TREN sets guidelines in comitology</i>                      Advisory platforms (CEER, ERGEG, etc.)                      Body for collective decision-making (comitology)</p> <p><b>Federal/Regions:</b> <i>E.g. specifications for connection between transmission and distribution networks</i>                      Clear delineation of competencies                      Advisory platform (FORBEG)                      Imposition of decisions (possible) (Fed. Gov.)</p>	<p><b>Numbering:</b> <i>BIPT decides + Commission decides</i>                      Body for collective decision making (Cocom) (limited)  <b>Spectrum:</b> <i>Belgium + international organizations</i>                      Concertation bodies (ITU, ISO, IEC)                      Negotiations (treaties)</p> <p><b>Spectrum:</b> <i>BIPT+ EU</i>                      Body for collective decision making (RSC)                      Concertation body (RSPG)                      Advisory platform (CEPT)  <b>Spectrum:</b> <i>BIPT decides + Community decides</i>                      No specific coordination instrument  <b>Standardisation:</b> <i>Member States + Commission</i>                      Advisory platform (Cocom)                      Body for collective decision making (Cocom)</p>

SOC	<b>USO:</b> <i>EU directives + Fed. &amp; Reg. ministers impose obligations + CREG accepts costs (coord. problem)</i> Non-binding advice (CREG at Fed. level only, VREG) Advisory platforms (CEER, ERGEG, FORBEG)	<b>USO:</b> <i>EU legislates + Member States implement</i> Exchange of information (Commission)
COMP	<b>EU:</b> <i>DG COMP retains cross-border cases + Competition Council deals with remaining cases (incl. regional cases)</i> Advisory platforms (ECN, ECA) Veto power (Commission)	<b>EU:</b> <i>Commission DG Competition + Competition Council</i> Advisory platforms (ECN, ECA) Veto power (Commission)
Litigation	<i>Constitutional Court for conflicts of competence between Federal and Regional levels</i>	-

Advisory platforms seem to be crucial to vertical coordination, whatever the kinds of delegation models in place between the government levels<sup>32</sup>. Even if their recommendations and guidelines are non binding, they seem to work well and have an impact. Between the Federal and Regional authorities, advisory platforms compensate the rigidities of the Belgian Federal regime. In the energy sector, a concertation platform prepares the Belgian positions at the EU level (ENOVER). Another advisory platform coordinates the regulation between the Federal and Regional levels and three Regions incidentally use it as a horizontal contact point (FORBEG). At the European level, advisory platforms facilitate the inflow of information towards the EU institutions that would otherwise be somewhat isolated (e.g. the ERGEG).

Consequently, bodies for collective decision-making are scarcely used, except in the comitology procedures. In fact, comitology committees are intensively involved in vertical coordination in both sectors (e.g. Committee on the implementation of legislation on conditions of access to the network for border exchanges in electricity or Communications Committee, COCOM). They either provide non-binding advice or take collective decisions. At the Belgian levels, bodies for collective decision-making were set up in order to resolve conflicts of competencies between the Federation and the Communities about electronic communications (i.e. CRC and Interministerial Committee). Hierarchy seems to be used as a coordination mechanism only in case of problems.

Governments of upper levels maintain control on regulation at the lower level. The European Commission controls the implementation of the EU frameworks in the Member States. First,

<sup>32</sup> A distinction is made between two types of federalism according to the way competencies are formally distributed between levels of government: Power separation and power sharing (Braun 2008: 5). In the power separation type, both levels are granted a complete authority on distinct blocks of competencies by the Constitution. For example, in Belgium, the Regions are responsible for the economic policy and the Communities for broadcasting, while the Federation is responsible of the social security. None of the levels can interfere in the other's competencies. The second type, power sharing, is based on a functional division of tasks between levels: Most of the decisions are taken at the Federal level where both the Member States and the Federal government have their say, but the Member States are almost entirely held liable of the implementation. It refers more to the organisation of the relationships between the EU and the Member States, as well as the German or Swiss regime.

the EU institutions have the power to legislate. They can reform the EU framework if they are not satisfied with the way their legislation is implemented. Second, the Commission has some means to exert more control on implementation. In the telecoms sector, it obtained a veto power on national market analyses made by the telecoms regulators. Third, the EU imposes decisions. In fact, the EU can enact regulations on issues of Community interest that are directly applicable in the Member States (e.g. the new EU roaming rules adopted in April 2009). In a lesser extent, the Belgian Federal authorities have a pre-eminence on the Regions in the energy sector, but this exception to the Federal system is strictly limited to technical regulations having an impact on the transmission network (e.g. the compatibility of connection of distribution networks).

As already mentioned the supervision of the European Commission goes far beyond the usual monitoring of implementation consisting in a standard exchange of information and the potential threat of an infringement procedure. As a consequence, the Member States consult the Commission about draft transposition laws (non-binding advice). In the telecoms sector, the Commission uses its veto power on market analysis to create informal consultations on draft decisions of the national regulators. As such, draft regulatory decisions are sent backwards and forwards between the European and Federal levels. Procedural and non-binding coordination instruments develop in the shadow of hierarchy. As such, it seems that formalism is used only when necessary. As long as informal interactions are enough to achieve the objectives set by the interacting organisations, they prefer to use them.

Vertical coordination is the result of a mix of network-like structural and hierarchical procedural instruments. Advisory platforms clearly dominate. They provide non-binding advice and best practice that are elaborated in common between the members of the platforms. The bodies for collective decision-making are also present with the comitology committees which intervene in the implementation at national level. In telecommunications only, hierarchy is another coordination mechanism, with the veto power of the Commission on market analyses and the possibility for the Commission to take unilateral decisions (e.g. maximal cross-border prices for roaming and SMS).

### **Horizontal Specialisation: Politics, Administration, Regulators, and Courts**

The horizontal dimension of the regulatory arrangements shows a limited degree of specialisation between the different regulatory authorities. Competencies are divided mainly

between the Governments, the ministries and the regulators. This division is clear and does not generate much overlaps or coordination problems, except about litigation (see Table 3).

Non-binding advice is the privileged coordination instrument for the horizontal interactions within the regulatory arrangement. The main consulted authorities are the sector regulators (CREG, VREG, BIPT). Their contribution consists in commenting draft laws, e.g. the laws transposing the EU framework, or ministerial decrees setting the modalities of the regulation, that they are applying afterwards (e.g. the definition of universal service obligations in the telecoms sector). In the energy sector, the situation is more peculiar as CREG and VREG do not always decide on individual measures, but advise the Minister who takes the decisions. The Competition Authority is also solicited to give advice on the telecoms market analyses and remedies. This advice becomes binding when the remedies refer to issues of general competition. Surprisingly, it is not consulted on tariff setting in the energy sector, but the Competition Council is the appeal court in case of non-acceptance of tariffs by the CREG.

**Table 3: Horizontal Specialisation and Coordination in the Energy and Telecommunications Sectors**

	ENERGY	TELECOMMUNICATIONS
Law making	<p><b>Federal:</b> <i>Fed. Gov. (law) + Minister of Energy decide</i>                      Non-binding advice (CREG) (if so asked)  <b>Between Regions:</b> <i>Each Region has jurisdiction over its own territory</i>                      No known coordination instrument  <b>Flemish Region:</b> <i>VREG prepares drafts + VEA is consulted + Reg. Gov. decides (laws)</i>                      Non-binding advice (VREG, VEA, various agencies)                      Concertation body (management meetings)</p>	<p><b>Federal:</b> <i>Government decides (Law) + BIPT actually writes the draft (DG Telecom should)</i>                      Non binding advice (BIPT)                      No coordination between Federal DG telecom and BIPT.</p>
ECON	<p><b>Federal:</b> <i>CREG and DG Energy prepare + Minister of Energy decides. Prospective studies of DG Energy + analyses of Federal Planning Bureau</i>                      Non-binding advice (CREG) (high value, except in case of high political sensitivity)  <b>Tariffs:</b> <i>Operators propose + CREG/VREG accept</i>                      Veto power (Federal or Regional Government)  <b>Between Regions:</b> <i>Division of competence</i>                      Advisory platform (FORBEG)  <b>Flemish Region:</b> <i>Minister of Energy sets the framework and VREG decides</i>                      Non binding advice (VREG) (high value)                      Veto power (Reg. Gov.)(on license provision)</p>	<p><b>Market analysis and remedies:</b> <i>BIPT decides</i>                      Non binding advice (Competition Council)                      Binding advice (Competition Council) on remedies about prohibition of charging high prices, impeding market access, using eviction prices, and grouping services</p>
TECH	<p><b>Federal:</b> <i>CREG drafts + Minister of Energy decides or CREG decides</i>                      Non-binding advice (CREG)  <b>Between Regions:</b> <i>Division of competence</i>                      Advisory platform (FORBEG)  <b>Flemish Region:</b> <i>VREG drafts + Minister decides or VREG decides</i>                      Non-binding advice (VREG)</p>	<p><b>Numbering:</b> <i>Government decides over the modalities (decree) + BIPT regulates</i>  <b>Standardisation:</b> <i>Government decides + BIPT applies</i>  <b>Spectrum:</b> <i>Government decides over the modalities (decree) + BIPT regulates</i>                      Non binding advice (BIPT)</p>
SOC	<p><b>Federal:</b> <i>Minister of Energy decides</i>                      Non-binding advice (CREG)  <b>Social tariffs:</b> <i>CREG drafts social and maximum prices for DG Energy + Minister decides + CREG monitors and sanctions</i>                      Non-binding advice (CREG) (draft decisions)</p>	<p><b>USO:</b> <i>Government decides over the modalities (decree) + BIPT regulates</i>                      Non binding advice (BIPT)</p>

	<p><b>Between Regions:</b> <i>Division of competence</i> Advisory platform (FORBEG) <b>Flemish Region:</b> <i>Reg. Gov. decides + VREG monitors and sanctions</i> Non-binding advice (VREG) (but no advice from CREG)</p>	
COMP	<p><b>Federal:</b> <i>Competition Council + CREG makes reports</i></p> <p><b>Flemish Region:</b> <i>No competence</i></p>	<p><b>EU:</b> <i>Commission supervises national market analyses</i> Body for collective decision-making (DG COMP &amp; DG INFSO) <i>Competition Council judges and is the appeal body</i> Overruling power</p>
Litigation	<p><b>Federal:</b> <i>Competition Council + Court of Appeal in Brussels deal with CREG decisions and High Administrative Court with Minister's decisions</i> <i>Disputes: Competition Council + Judicial Courts</i> Potential overlaps <b>Flemish Region:</b> <i>Court of First Instance and High Administrative Court for appeals</i> <i>VREG arbitrates for technical or access disputes between operators</i> Clear division of competence</p>	<p><i>Court of Appeal in Brussels deals with BIPT decisions</i> Overruling power (appeal) <i>Disputes: BIPT through administrative decisions + judicial courts + Competition Council (not much used)</i> Overlaps</p>

Non-binding advises are widespread in the horizontal coordination, but their influence varies. The category of non-binding advice reveals a formal coordination procedure but does not tell much about the actual influence of the advising authority. The standard non-binding advice is formulated during consultation procedures and the advised authority is free to retain or reject the arguments developed. This hides the reality of the relationships between the organisations. For instance, when the EU Commission or the Competition Council give an advise to the BIPT, the BIPT is aware that there will be consequences if it does not follow this advice without good arguments, as both organisations have some hierarchical power on BIPT later in the procedure (e.g. veto power of the Commission on the market analysis and overruling power of the Competition Council). Of course, the advice is not binding, but it brings certainty to follow it, particularly if it results of an informal concertation between the adviser and the advised organisation.

Second, some non-binding advises are almost always followed because of the high moral weight and high-level expertise of the adviser. In the energy sector, the sector regulator is the main adviser of the Minister for individual decisions. For instance, in economic regulation, the advice provided by the CREG is followed, except in rare case of high political sensitivity. It is also true at the Regional level where advises of the VREG on technical and social regulation are observed. The same applies to the opinions of advisory platforms that join together much technical expertise and experience (e.g. the ERGEG in energy or the ERG in telecoms). These opinions have high moral value and are followed.

Third, sector regulators sometimes draft the laws or ministerial decisions. For instance, BIPT is still in charge of drafting laws in absence of capacity of the Federal DG Telecoms. VREG

does the same with energy laws at the Flemish level, though officially the Flemish DG Energy has this competence. The energy regulators are also drafting some ministerial decisions (e.g. CREG proposes social maximal prices and draft technical decisions as well as the VREG). As such, the non-binding character of the advice is compensated by the fact that regulators may have the first say in drafting laws or decisions, which makes them very influential.

An advanced form of coordination instrument is the body for collective decision-making that takes different forms than in the vertical dimension. At the European level, the Commission set up a task force for electronic communications composed of the DG COMP and the DG INFOSOC. They jointly supervise national market analyses and take common decisions. The task force is an intra-administrative form of horizontal coordination that goes beyond formal inter-department consultations. They are not limited to issue opinions about draft laws, but coordinate the management and the implementation of public policies. A second example is observed at the Flemish level. The DG Environment, Nature and Energy organises monthly management meetings that group together representatives of the different competencies and satellite agencies of the DG (e.g. VREG, VEA, and VLM). Grouping related competencies in or around a single ministry seems to be beneficial for sector and cross-sector coordination, as advocated in the Whole-of-Government Approach (Christensen and Lægread 2007).

Litigation is a component of the regulatory arrangement. Its importance is due to the high degree of conflict in the sector-based regulation. On the one hand, the decisions of the sector regulators are systematically contested (e.g. all BIPT decisions). On the other hand, disputes between operators are usual. The contesting of regulators' decisions is made at the Court of Appeal in Brussels, which has a division dedicated to regulatory issues, but also to the Competition Council for CREG decisions. As appeal courts, they have an overruling power on regulators' decisions reinforced by the fact that almost all decisions are contested. The Competition Council may be designated as the only appeal court for all sector regulators' decisions, a possibility which was originally envisioned by lawmakers. Its hierarchical power could be considerably reinforced because the Court could develop general orientations in the regulation. As it stands now, it is in fact the Court of Appeal in Brussels that developed expertise to deal with regulatory matters, since it is a separate chamber that specifically deals with these issues. In case of disputes between operators, the situation is unclear as both the Competition Council and all the judicial courts are competent. In addition, VREG arbitrates technical and access disputes and BIPT takes administrative decisions to resolve disputes. In both sectors, the jurisdictions are overlapping and create the possibility of "judicial shopping".

Horizontal coordination is realised with a mix of procedural and structural instruments as well, but this time it is the procedural non-binding advises which dominates. Most often the sector regulators are involved in the preparation of Governments’ decisions. The impact of these advises are various, from usual consultations without repercussions, advises taken in the shadow of hierarchy (i.e. with a possible overruling later in the procedure), advises with high moral weight (e.g. when the organisation advised has no expertise to contradict the adviser), or even the drafting of laws. A thinner analysis reveals that sector regulators have much more weight in coordination procedures than the coordination instrument would suggest. Their advice is almost always followed. Bodies for collective decision-making are also encountered, notably within administration in order to coordinate the management between several divisions (e.g. the joint task force for electronic communications at the EU Commission and the management meetings at the Flemish DG Environment, nature and Energy). In both sectors, courts have an overruling power, but without being in a position to instigate coordination (e.g. cross-sector coordination) or gaining a hierarchical position on the sector regulators.

### Specialisation between General Competition and Sector-Based Regulation

The division of competence between regulatory and competition authorities is quite clear, even if both are still interrelated on several aspects. Here, our aim is to answer to two specific questions: How do competition authorities interfere with sector affairs? And how do sector regulators interfere with general competition? The first question is addressed in all the lines of the table, except the line about competition (COMP) that answers to the second question (see Table 4).

**Table 4: Competition versus Sector Regulation in the Energy and Telecommunications Sectors**

	ENERGY	TELECOMMUNICATIONS
Law making	<p><b>EU:</b> <i>Commission initiative</i></p> <p>Inter-department consultations (DG COMP)</p> <p><i>Gov. decide + stakeholders advise</i></p> <p>Non binding advice (Fed. DG Competition)</p>	<p><b>EU:</b> <i>Commission initiative</i></p> <p>Inter-department consultations (DG COMP)</p> <p><i>Government decides + stakeholders advise</i></p> <p>Non binding advice (Competition Council)</p>
ECON	<p><i>CREG/VREG or Government decides</i></p> <p>Informal contacts with CREG (Fed. DG Competition)</p> <p>No contact with Regional authorities (Fed. DG Competition)</p>	<p><b>Market analysis:</b> <i>BIPT regulates + Commission supervises</i></p> <p>Joint decision and veto power (DG COMP &amp; INFOS)</p> <p>Non binding advice (Competition Council)</p> <p><b>Remedies:</b> <i>BIPT decides</i></p> <p>Binding or non-binding advice (Competition Council)</p> <p><b>Non-regulated markets:</b> <i>Competition Council agrees on mergers &amp; acquisitions + decides on infringements (e.g. price squeezing)</i></p> <p>Clear division of competence</p>
TECH	-	<i>BIPT regulates</i>
SOC	-	<b>USO:</b> <i>BIPT regulates + Competition Council applies competition law (overlapping competencies regarding price regulation)</i>

		No coordination instrument
COMP	<i>Fed. DG Competition + Competition Council</i> Procedure of exchange of confidential information (CREG) CREG alerts Competition Authorities in case of suspicion of anti-competitive behaviour <i>No competence of Flemish authorities</i> Informal contacts (VREG)	<i>Fed. DG Competition + Competition Council</i> Procedure of exchange of confidential information (BIPT) BIPT alerts Competition Authorities in case of suspicion of anti-competitive behaviour
Litigation	<i>Appeal to Competition Council against CREG decisions on tariff setting</i> Overruling power (Competition Council) <i>Court of Appeal in Brussels against decisions of the Competition Council</i> <i>Federal DG Competition can act as a mediator in infringements of general competition law</i>	<i>Competition Council (or Court of Appeal in Brussels) as appeal body against BIPT decisions</i> Overruling power (Competition Council) <i>Competition Council (or judicial courts) + BIPT (mediation) to settle disputes between operators</i> <i>Court of Appeal in Brussels against decisions of the Competition Council</i> <i>Federal DG Competition can act as a mediator in infringements of general competition law</i>

Competition authorities are consulted in law-making in both sectors. By competition authorities, we mean both the Competition Council and the Federal DG Competition. The first is the court, and the second an administrative division that is mainly involved in policy-making and provides the Council's auditors with personnel to conduct the investigations. The Council is sovereign in deciding to launch an investigation and conducting it. It takes the decision and can impose sanctions. It is also entitled to issue opinions and advice.

In the telecoms sector, the European DG COMP participates to the regulation through the joint task force on electronic communications. At the Federal level, the Competition Council also plays a major role. It is involved in the preparation of the market analyses for which it provides binding and non-binding advises. But mainly, it supervises non-regulated telecoms markets, i.e. the market that were judged competitive enough to fall out of the scope of the regulation (e.g. publicly available local and/or national telephone services provided at a fixed location for residential customers). As such, competition authorities participate to the economic regulation of the telecoms markets. Surprisingly, their involvement in energy is limited to informal contacts with the regulator (CREG) and they do not intervene in tariff setting. They are also absent from technical and social regulation in both sectors.

The sector regulators also intervene in general competition. In both sectors, they alert the competition authorities in case of suspicion of anti-competitive behaviour (e.g. suspicion of abuse of dominant position). They also provide information in investigations through reports or exchanges of information. Both CREG and BIPT signed a protocol for exchanges of confidential information, but in the energy sector the protocol was denounced in 2006 and the relationships have been limited to informal contacts. The Competition Council has also an

overruling power on regulators' decisions. But operators privilege judicial courts whenever possible.

Interactions between general competition law and sector regulation are bi-directional. Competition authorities have the possibility to formulate binding or non-binding advises on law-making and regulatory decisions. The DG COMP can also interfere in the telecoms market analyses as member of the joint taskforce. In case of litigation, the competition courts have an overruling power on some of the regulatory decisions, but it does not put them in a hierarchical position against the sector regulators. Reciprocally, the sector regulators alert the competition courts in case of suspicion of anti-competitive behaviour and provide information to assist them in their investigations.

### **Inter-Sector Specialisation**

Coordination between sectors is limited to law-making and at the highest level of government, precisely within the Councils of Ministers (see Table 5). The only exception is when regulatory frameworks cross sectors (e.g. the EU framework on electronic communications that includes broadcasting and communications on the cable networks). In such cases, Belgium set up coordination instruments between the Federal level, competent for telecoms, and the three Communities competent for the media. Nevertheless, sector regulation is in general quite isolated from other sectors.

**Table 5: Inter-Sector Specialisation and Coordination in the Energy and Telecommunications Sectors**

	ENERGY	TELECOMMUNICATIONS
Law making	<i>No specialisation between electricity and gas Coordination with other sectors through Government decisions (EU, Fed. &amp; Regions) Inter-department consultations on proposals</i>	<i>Federal Gov. + Community Gov. (unclear competence distribution) Inter-department consultations on proposals Body for collective decision making about media (Interministerial Committee)</i>
ECON	-	<b>Market analysis:</b> <i>BIPT decides + Community regulators decide (unclear competence distribution) Body for collective decision making (CRC)</i>
TECH	-	<b>Mobile phone antennas:</b> <i>BIPT approves the antenna + Regional Gov. or municipalities deliver building permits</i>
SOC	-	-

### **Conclusion**

The regulation of the liberalised utility sectors is implemented with multi-level, multi-actor and multi-task arrangements. The aim of this communication was to show that a considerable extent of specialisation within regulatory arrangements does not necessarily lead to high

levels of fragmentation, with many overlaps, blind spots and redundancies. Coordination mechanisms compensate the dispersion of competencies between multiple levels and authorities. The empirical analysis was based on a comparison of the regulatory arrangements in the energy and telecommunications sectors in Belgium. It encompassed the whole regulatory arrangement insisting on four dimensions of specialisation: vertical, horizontal, between competition and sector regulation, and between sectors.

Firstly, the number of authorities involved in regulation at one governmental level remains limited. Although it increased much compared to the pre-liberalisation period where the Member States managed utilities in autonomy within a single ministry, it remains grouped around a Minister, a ministry and an independent regulatory agency at each level, except at the EU level where the EU Commission still concentrates the competence. However, considering the interplay between governmental levels, with competition regulation and with other sectors, the regulatory arrangements do show considerable degrees of specialisation with a substantial number of actors involved. Despite some particularities, both sectors mobilise the same instruments. Vertical coordination is dominated by a network-like structural instrument, namely advisory platforms. In the telecoms sectors, they are supplemented by hierarchical procedural instruments that used only in last resort. Horizontal coordination is using mainly non-binding advice, a network-like procedural instrument, but with many variants. Indeed, it appears that sector regulators have actually much more weight in coordination procedures than the coordination instrument of non-binding advice formally would suggest alone. Their relationships with the competition authorities are bi-directional and based on non-binding advice and exchanges of information. The overruling capacity of the competition courts does not put them into a hierarchical position against the sector regulators. Between sectors, coordination remains weak, limited to law-making and arbitrations within the Council of Ministers.

From a more general perspective, the regulatory arrangements are complex, but not fragmented, and produce few coordination problems. In their design, the legislators seem to have believed firstly in a clear distribution of competencies in order to make them effective. In addition, 'soft' coordination instruments have completed the arrangements. Non-binding advice and platforms allow the extended consultation of the organisations and authorities which have to implement the decisions. More binding and hierarchical coordination instruments are only mobilised in case of conflicts of competencies (e.g. joint decision bodies for issues of common interests for telecoms and media), or when the questions are politically

sensitive to the Government (e.g. the Flemish Minister of the Energy can overrule the VREG decisions to license a supplier). This legislator's concern for clear divisions of competencies is also illustrated by the expected reshuffle of competencies in both the Belgian energy and telecoms sectors (e.g. transfer of prospective studies from CREG to the Federal DG Energy and project to transfer all appeals against BIPT decisions to the Competition Council).

Finally, coordination instruments make functional links between policy-making and implementation. On the one hand, sector regulators (and in a lesser extent competition authorities) are widely consulted by the legislator in the policy-making phase. Although they are only consulted, their influence is high given their expertise and the fact that they will have the task to implement the policies. On the other hand, the executives want to keep control on the activities of the sector regulators. Of course, they foresaw hierarchal mechanisms to do so, but actually privilege more network-like approaches in preliminary phases (e.g. the Government gives a non-binding advice to the regulators draft decision, rather than overruling it in a later phase). Although they attracted the expertise that flew away from the ministries, the sector regulators are still subject to government control either from the European or lower levels. One consequence of their development is a marginalisation of ministries at the benefit of direct contacts between the regulators and the Minister. Though this may be temporary as ministries try to rebuild their capacity.

As such, the different authorities are involved in all the phases of public policy with constant formal and informal interactions. Such an organisation is counter-intuitive with regard to the to the New Public Management precepts in favour of a clear functional divide between policy-making and implementation. Despite the appearance induced by the presence of independent regulatory agencies, it seems that pragmatism took the upper hand on doctrine to set up smooth and effective regulatory arrangements.

### ***Bibliography***

- Bouckaert, G., Peters, B., Verhoest, K. (forthcoming). The coordination of public sector organizations: shifting patterns of public management. Hampshire: Palgrave Macmillan Ltd..
- Braun, D. (2008). "Making federalism more efficient: A comparative assessment." *Acta Politica* 43(1): 4-25.
- Christensen, T. and P. Lægreid (2006). Rebalancing the State: Reregulation and the reassertion of the centre. *Autonomy and regulation. Coping with agencies in the modern State*. T. Christensen and P. Lægreid. Cheltenham, Edward Elgar: 359-380.
- Christensen, T. and P. Lægreid (2007). "The whole-of-government approach to public sector reform." *Public Administration Review* 67(6): 1059-1066.

- Coen, D. and M. Thatcher (2005). "The new governance of markets and non-majoritarian regulators." Governance **18**(3): 329-346.
- Doern, B. and R. Johnson, Eds. (2006). Rules, rules, rules, rules: Multi-level regulatory governance. Toronto, University of Toronto Press.
- Geradin, D. and J. A. McCahery (2004). Regulatory co-opetition: Transcending the regulatory competition debate. The politics of regulation: Institutions and regulatory reforms for the age of governance. J. Jordana and D. Levi-Faur. Cheltenham, Edward Elgar.
- Gilardi, F. (2007). "The same, but different: Central banks, regulatory agencies, and the politics of delegation to independent authorities." Comparative European Politics **5**(3): 303-327.
- Hall, R. H., J. P. Clark, et al. (1977). "Patterns of interorganizational relationships." Administrative Science Quarterly **22**(3): 457-474.
- Hood, C. and A. Dunsire (1981). Bureaometrics: The quantitative comparison of British central government agencies. Farnborough, Gower.
- Hood, C., H. Rothstein, et al., Eds. (2001). The government of risk. Understanding risk regulation regimes. Oxford, Oxford University Press.
- Lindblom, C. E. (1965). The intelligence of democracy. New Haven, Yale University Press.
- Metcalf, J. L. (1976). "Organizational strategies and interorganizational networks." Human Relations **29**(4): 327-345.
- Mitnick, B. M. (1980). The political economy of regulation. New York, Columbia University Press.
- Peters, G. B. (1998). "Managing horizontal government: The politics of co-ordination." Public Administration **76**(4): 291-305.
- Pollitt, C. and G. Bouckaert, Eds. (2004). Public management reform: A comparative analysis. Oxford, Oxford University Press.
- Thompson, G., J. Frances, et al., Eds. (1991). Markets, networks and hierarchies. London, Sage.
- Tiebout, C. (1956). "A pure theory of local expenditures." Journal of Political Economy **64**(5): 416-424.
- Verhoest, K. and G. Bouckaert (2005). Machinery of government and policy capacity: The effects of specialisation and coordination. Challenges to state policy capacity: Global trends and comparative perspectives. M. Painter and J. Pierre. Basingstoke, Palgrave MacMillan: 92-111.

*Annex***Table 6: Comparison of the Main Regulators' Competencies and Control**

	CREG	VREG	BIPT
<b>Competences</b>			
Policy Preparation	Involvement through prospective studies Consultation in drafting of laws about its functioning	Involvement through monitoring	Drafting of laws Advice on draft laws
Norm making	Setting of transmission and distribution tariffs Advice on setting standards for access to the network and technical regulation Advice on public service obligation, and on maximum and social prices	Advice on setting standards for access to the distribution networks and public service obligations Drafting of technical regulations and code of conduct	Advice on technical and universal service regulations Sets exceptions to the general competition law
Decisions on individual cases	Advice on license provision of suppliers (almost always followed) and designation of transmission system operator Evaluates licenses for new production facilities	Granting of permissions to distribution network operators Granting of licenses of supply companies and for warm power installations and green energy	Identification of dominant operators and imposition of remedies Decision on allocation of numbers and frequencies Imposition of administrative sanctions
Monitoring	Possibility of inspections and information requests	No inspections, but strong monitoring capabilities, including coercive demands of information	Control of the application of universal service obligations Control of the respect of prescriptions on frequencies
Enforcement of decisions	Imposition of administrative fines and "power of suggestion" on fines and license withdrawal (strong impact)	Imposition of administrative fines and withdrawal of permissions and licenses	Imposition of administrative fines and withdrawal of authorisations and licenses
Litigation	Mediation on disputes on technical regulation and tariffs	Resolution of disputes about access to the distribution network	Mediation
<b>Control by Minister or Government</b>			
<i>Ex ante</i>	Yearly negotiations on budget and Policy Plan Government veto on decisions on tariffs	Management agreement every three years and yearly business plan Appeal for license refusal	Semestrial management plan
<i>Ex post</i>	Representation in General Council (not effective) Yearly report Dismissal of CEO and management board Budget and legal framework	Monthly consultations, yearly evaluations of the business plan Dismissal of governing board and CEO Budget and legal framework	Semestrial report Semestrial evaluation of the management board Dismissal of the management board
<b>Control by Parent Department</b>			
<i>Ex post</i>	Comments on advice to the Minister (not effective) Management committee (not effective)	Monthly meetings within a management committee (not effective)	-

**Table 7: Comparison of the Main Regulators' Instruments**

	CREG	VREG	BIPT
<b>Instruments</b>			
<i>Licensing</i>	Advice about designation of the transmission system operator (always followed) Advice on licensing of suppliers through transmission network	Appointment of distribution network operators Licensing of suppliers	Not applicable
<i>Using general competition law</i>	Reporting of anti-competitive behaviour	-	Influence through market analysis
<i>Tariff setting</i>	Approval of tariffs of transmission and distribution	-	Approves tariffs of transmission and interconnection.
<i>Quality regulation and standard setting</i>	Advice on standards for access to the transmission network	Advice on standards for distribution and supply	-
<i>Prior permission for access to the market</i>	Advice on licenses for production and access to the transmission network	Permission to distributors and suppliers	- (general authorisation regime)
<i>Taxing or subsidising</i>	Collects contributions to funds and manages the funds, but no discretion	-	Collects contributions to funds and manages the funds (universal service)
<i>Influencing corporate governance structure</i>	Advice on independent managers of transmission operators Checking reports of the corporate governance committee	Involved in the drawing up of criteria for independence of distribution and supply companies	Possibility to impose account unbundling
<i>Regulating market behaviour</i>	Checking that energy prices relate to real costs	Part of code of conduct monitored by VREG Mediation	Control of prices and conditions of access to network and interconnection
<i>Regulating quantity</i>	Monitoring of virtual power plant capacity (not effective)	-	-
<i>Regulating network capacity</i>	Advice on development plans of transports networks	Part of technical regulation about continuity of supply, monitoring capacities	-
<i>Access to the networks</i>	Prohibition of access denial to the transmission network by technical regulation Appeal	Prohibition of access denial to licensed suppliers Appeal	Regulation of network access through remedies (market analysis)
<i>Regulating interconnections</i>	Monitors transit and capacity at border and accepts tariffs	Part of technical regulation No cross-border competence	Regulation of interconnections through remedies (market analysis)
<i>Regulating infrastructure investment</i>	Involved in prospective studies and development plans	Monitoring and advice to the Government, approval of investment plans	Yes
<i>Universal service obligations</i>	Monitoring of public service obligations (sanctions) Approval of costs incurred at Federal and Regional levels	Advice on regulation Monitoring of public service obligations (sanctions)	Monitoring Payment of costs incurred
<i>Definition of markets</i>	Not applicable	Not applicable	Yes, under veto of the European Commission