End(s) of the Harmonization in the European Union: Centrifuging or Engineering?

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END(S) OF THE HARMONIZATION IN THE EUROPEAN UNION

Centrifuging or Engineering?

Mehmet Bilal Unver

ABSTRACT

The European Union (EU) harmonization has an evolving and dynamic nature. Different theoretical approaches (e.g., regulatory competition, coevolution, reflexive harmonization) are often echoed to delve into the EU harmonization. This article, going through these theories, endeavors to explain the harmonization discourse in the EU with a focus on the electronic communications sector. To understand the trajectory of the EU harmonization in this sector, two areas ("network access" and "spectrum regulation") are selected as the subject-matter of the research. In conclusion, the legislative steps taken so far are found to restrict regulatory experimentation and innovation that this sector needs in the face of increasing challenges.

Keywords: harmonization, regulation, experimentation, competition, EU, electronic communications, European Electronic Communications Code

Harmonization, meaning creation of the minimum standards for the law makers, has an overarching purpose and scope for the European Union (EU). The hard core of the EU harmonization is built on the four pillars of freedom, aiming to establish free movement of goods, services, people, and capital. To realize this, wide-ranging tools and mechanisms have so far been invoked by the EU legislator usually ending up with demarcation of special rules for each sector, based on the hard-core freedoms and accompanying rights (e.g., the right to establishment).

Within this framework, different theoretical approaches (e.g., regulatory competition, coevolution, reflexive harmonization) are often echoed in relation to EU harmonization and its boundaries for various sectors including electronic communications. While "harmonization" as

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a legal and political discourse often means path dependencies through the so-called minimum standards, alternative theories (i.e., regulatory competition, coevolution) do not focus on creating standards but on experimental or evolutionary paths finding out innovative solutions to law making. Among these, "reflexive harmonization" needs to be highlighted for its potential to allow local solutions and self-regulatory mechanisms based on the mobilized endogenous forces (e.g., social actors).

As regards the electronic communications sector, boundaries of the EU harmonization have so far been drawn up by the Electronic Communications Regulatory Framework (ECRF) incorporating the relevant hard and soft law. The main trajectory behind the legislative process was shaped out by the globalized wind of liberalization and (re-)regulation of the electronic communications markets. On the other hand, the European policies pursuing more distinctive and sophisticated rules were put into place with an increasing pace and enthusiasm after the full liberalization, and ECRF has been the leading arena for law and policy making for this sector. This has partially resulted from the fact that the Treaty on the Functioning of the European Union (TFEU) does not envisage any exclusive or shared competence for the EU to regulate this area, unlike some other areas.[1] Therefore, it is arguable, harmonization has already started lacking strong roots; however, such an early conclusion would mean experimental processes would not bring out a harmonized regulatory structure also having diversity and a well-functioning nature. This study attempts not to investigate the institutional structure of the EU law, but the historical trajectories and functioning of the governing laws with a focus on electronic communications sector. In this regard, the article examines the political theories on harmonization and turns the spotlight to this sector, focusing on the three legislative processes underlying the ECRF (i.e., in 2002, 2009, and 2018).

Not only is the aim to answer whether there exists a provable link between a certain political theory and trajectory of the ECRF, but also it is sought to find out what processes or mechanisms so far pursued under ECRF could be instrumental for a better harmonization. In this context,

1. While the areas where the EU has exclusive competence include customs union, competition rules, monetary policy, the conservation of marine biological resources under the common fisheries policy, and common commercial policy under Article 3(1) of the TFEU, the areas of shared competence include internal market; social policy, for the aspects defined in this Treaty; economic, social, and territorial cohesion; agriculture and fisheries, excluding the conservation of marine biological resources; environment; consumer protection; transport; trans-European networks; energy under Article 4(2) of the TFEU.

several research questions emerge: Is any of the political theories more conducive to EU harmonization particularly for the electronic communications sector? Does the trajectory of the ECRF allows regulatory experimentation alongside the minimum standards envisaged for the national law makers? What processes, instruments, or mechanisms of the ECRF would better respond to development of this sector as well as the harmonization aims of the EU? What lessons could be derived from the ECRF's trajectory for the prospect of the EU harmonization?

Against this background, the first part of this article evaluates the legal and political underpinnings of EU harmonization, fleshing out the most relevant theoretical approaches (i.e., regulatory competition, coevolution, reflexive harmonization). Starting with the legal foundations (i.e., Articles 26 and 114 of the TFEU), this initial part delves into the harmonization scheme(s) of the EU with the key examples from different sectors (e.g., environment) and legal areas (e.g., company law), where appropriate, referring to the US law and institutions. Particularly in this part, this article upholds an overall perspective to unravel the dynamics between the centrum and periphery in the EU regulatory sphere, by taking a broader picture of the interplay of institutional actors as well as delving into the substantive rules and measures at the EU level.

In this second part of this article, major thrusts and trajectory of the ECRF have been examined focusing on the two selected areas: (1) network access and (2) spectrum regulation. Under this part, the main features of each regulatory subfield are expounded going through the three cornerstone modifications, ending up with the European Electronic Communications Code (EECC)[2] in 2018. In this part, not only are political theories revisited to shed light on the law making and its political underpinnings, but also natural and legal limits of harmonization are tested in view of the practical implications. Commencing with examining the access and spectrum regulations and their implications for EU harmonization, this part discusses the extent to which such instruments are effective as drivers for development as well as harmonization of the sector. Methodologically, this research relies on theoretical and doctrinal analysis from the multidisciplinary perspective of law and political science. As explained above, two case studies are involved in the second part with a view to reflect on the political theories and investigate their suitability for explaining the EU

2. Council Directive (EU) 2018/1972 ("European Electronic Communications Code" or "EECC").

harmonization ends and measures regarding the electronic communications sector.

The article ends up with a number of findings. First, none of the political theories examined in the article would explain the EU harmonization by itself, although they arguably have a stake within the harmonization schemes designed for the electronic communications sector. This is illustrated by the EU Net Neutrality Regulation issued in 2015, which exemplifies a representation of reflexive harmonization since it predominantly lays out the principles and norms to achieve the intended result (i.e., neutral and nondiscriminatory treatment of all Internet traffic) but not incorporating detailed tools or remedies to that end. On the other hand, the trajectory and core parts (e.g., Directives and Regulations) of the ECRF generally denote a legislative intent toward convergence among the national regulations often by prescriptive means and problem-solving mechanisms. However, this comes up with the opportunity cost of absent or minimized regulatory experimentation and innovation against the diversified problems.

Furthermore, it is argued that the selected parts of the ERCF ("network access" and "spectrum regulation") signify distinctive characters and implications. As far as the former is concerned, there emerge a sophisticated set of rules and remedies, in which every procedural detail and prerequisite are laid down step-by-step (e.g., through market analysis procedures) and are scrutinized by the European Commission and Body of European Regulators for Electronic Communications (BEREC). These features constructed by the ECRF pose a regulatory engineering, which is open to criticism, as can be implicated also from scholarly work.[3] This article concludes that the so-called sophisticated measures would narrow down the room left for the national regulatory authorities (NRAs) in that regulatory experimentation and innovation are highly restricted.

On the other hand, the EECC provisions for spectrum regulation, while aiming to enhance EU harmonization via certain standards, do not include a supranational power (i.e., veto) to intervene with domestic actors or refine a step-by-step approach. Under the relevant EECC provisions exist deadlines (e.g., for award processes), governing principles (e.g., technology neutrality), and potential measures (e.g., passive infrastructure sharing); yet these do not reach out to the point of engineering where (re)designing of the proposed remedies is envisaged. For instance, Radio Spectrum Policy Group's (RSPG)

3. Briglauer et al.

involvement in the decision-making processes through peer-review forums is far less intrusive and allows dissemination of best practices. Therefore, the article qualifies the EECC's approach for spectrum regulation as "centrifuging," in contrast to the engineering model of network access.

Given there is no silver bullet with regard to the EU harmonization particularly in view of the inherent differences across the Member States, it is concluded reflexive harmonization would rather be encouraged for it has the potential to enable regulatory experimentation and innovation that is much needed in the face of rapidly increasing challenges for this sector. Although the legislative intent is criticized for the increased signposts of regulatory mapping and engineering, the EECC's "centrifuging" model regarding spectrum issues is considered preferable to the "engineering" model of network access, given the larger room for regulatory experimentation in the former approach.

Analysis of the EU as a Harmonization Project

Framing the EU Harmonization: Legal Basis and Principles

Harmonization of legal systems is generally a dynamic and complicated topic. "Harmonization" seeks to "effect an approximation or coordination of different legal provisions or systems by eliminating major differences and creating minimum requirements or standards."[4] Harmonization could be defined as a conscious process first and foremost.[5] It begins with the creation of a concept by various actors and included in various instruments that has the intent and the potential to develop a common law.[6] Harmonization as a process aims to ensure no inconsistency or uncertainty will emerge out of different legal systems, frameworks, and their implementations on the same subject-matter. Unification of rules is not necessarily aimed or required by the harmonization.

By all means, EU itself is a harmonization project toward social, economic, and political integration of the Member States based on the free movement of goods, services, people and capital, and the right to establishment.[7]

4. De Cruz, 501.

5. Lohse, 313.

6. Ibid.

7. Article 26(2) of the TFEU states that "The internal market shall comprise an area without internal frontiers in which the free movement of goods, persons, services and capital is ensured in

Differing from other international organizations, the EU builds on a treaty that has a unique structure and envisages deeper integration among the Member States. In fact, TFEU and related laws have multidimensional and broader aspects, cultivating a variety of hard law (e.g., regulations, directives) and soft law (e.g., recommendations, guidelines) that draw up the boundaries of the EU harmonization toward a closer economic, social, and political union. The EU is not focused on the creation of one European Law in contrast to the laws of its Member States.[8] All these harmonization measures focus on the approximation of the national legal systems to the extent that is needed for the functioning of the common market.[9]

It is a distinguishing feature about the EU legal order that harmonization happens within a unique institutional framework, where institutions, entitled by the "signatories" to enact unifying law, issue harmonizing measures independently from the "signatories."[10] This "policy transfer" requires no selection or filtering but adoption and implementation of the relevant EU law or technically speaking harmonization measures by the Member States.[11] Whatever the policy transfer outcome that is achieved at the EU level, it is highly unlikely that there will be a uniform pattern of practice in each of the Member States.[12] On the other hand, such distinct patterns at the national level should not harm EU integration and harmonization ends based on the Article 26 TFEU.[13]

Article 114(ex-95) TFEU, which enables the Community institutions to adopt measures for the approximation of Member States' norms, constitutes one of the most powerful instruments for the advancement of

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accordance with the provisions of the Treaties." In addition to these freedoms, the right to establishment is also a hard-core freedom enshrined under the TFEU. In this regard, self-employed persons and professionals or legal persons within the meaning of Article 54 of the TFEU who are legally operating in one Member State may carry out an economic activity in a stable and continuous way in another Member State (European Parliament, "Freedom of Establishment and Freedom to Provide Services.").

8. Mock.

9. Ibid.

10. Lohse, 286.

11. "Policy transfer" is widely acknowledged to mean the "process by which knowledge about policies, administrative arrangements, institutions and ideas in one political system (past or present) is used in the development of policies, administrative arrangements, institutions and ideas in another political system" (see Humphreys, "Globalization, Regulatory Competition, and EU Policy Transfer," 309, "Europeanisation, Globalisation and Policy Transfer," 53).

12. Bulmer et al., 25.

13. See supra note 7.

the European harmonization.[14] To realize the free movement principles enshrined under Article 26 TFEU, the EU legislator (European Parliament and Council) is charged with the adoption of "the measures for the approximation of the provisions laid down by law, regulation or administrative action in Member States which have as their object the establishment and functioning of the internal market."[15] Notwithstanding, harmonization under Article 114 does not give the EU institutions a general regulatory power, but rather enables them to adopt measures specifically designed to facilitate the establishment and functioning the internal market.[16]

Given this, "functioning of the internal market" signifies the main thrust for the EU harmonization measures and ends. While there is no silver bullet as to how the internal market functions well, this has largely been considered in association with the economic order of the EU, as can be seen through the developmental process of the EU policies, which commenced with European Economic Community (EEC) including a customs union in 1957. While bringing about economic integration among its Member States, EEC and its successor, the EU, has developed into a harmonization project to maintain and advance the preexisting economic vision. This vision is echoed with how to liberalize and regulate the markets to effectuate the fundamental freedoms and accompanying economic rights.

Despite an indubitable emphasis on economic legislative advancement, harmonization under Article 114 TFEU also presupposes the furtherance of related welfare policies (i.e., consumer protection, environmental policies, public health).[17] While such policy items need to be taken into utmost account both in Commission proposals and as reasons for a possible exemption from the EU harmonization measures, Article 114(5) clarifies the scope of potential divergence by the Member States. Article 114(5) TFEU permits the Member States "to introduce national provisions based on new scientific evidence relating to the protection of the environment or the working environment on grounds of a problem specific to that Member State arising after the adoption of the harmonization measure" providing that they "shall notify the Commission of the envisaged provisions as well as the grounds for introducing them." However, there are various examples and case-law demonstrating that derogation from harmonization rules is very

14. Maletic, 314.
15. TFEU, art. 114(1).
16. Maletic, 315.
17. Ibid.

much restricted by the European Commission and the Court of Justice (CoJ) of the EU that strictly require objective and scientific justification.[18]

While the EU was founded as an economic community, its extended objectives were extended to include a great many issues including environmental protection as well as common values like fundamental rights.[19] This broadened vision of harmonization points to a potentially endless process of approximation, although the steering policy transfer does not necessarily mean a coercive process and sometimes happens through negotiations. In fact, there is not a European norm of maximalist harmonization approach, and EU harmonization has remarkable boundaries set out in the TFEU among which two principles are noteworthy: (1) subsidiarity and (2) proportionality.

Under Article 5(3) Treaty on European Union (TEU) are set out three preconditions for intervention by Union institutions in accordance with the principle of "subsidiarity": (1) the area concerned does not fall within the Union's exclusive competence (i.e., nonexclusive competence); (2) the objectives of the proposed action cannot be sufficiently achieved by the Member States (i.e., necessity); (3) the action can therefore, by reason of its scale or effects, be implemented more successfully by the Union (i.e., added value).[20]

This principle, which is set out under Article 5(3) TEU and Protocol No. 2 TFEU, lays a ground for debate as to the reach of the harmonization. In theory, subsidiarity means the EU legislator needs to act toward further harmonization if the national powers are insufficient to achieve the articulated goals. As there is no concretely and discretely designed grid that would filter the European and national powers to indicate this, there is an uncertainty as to the "subsidiarity" for every law-making process of the EU. To date, the Commission revealed a tendency to manipulate the term of subsidiarity in favor of a more centralized and less distributed powers vis-à-vis the Member States toward a more harmonized EU. This can be seen more clearly through the recent EU harmonization measures such as the

18. Regarding the case-law concerning the extent to which any justification for derogation could be acknowledged by the Commission and the EU Courts, see Maletic, 317–19.

19. Lohse notes that although the European Community was originally based on the economic goal of a common market, harmonization has been extended to include environmental protection and realization of common values like fundamental rights (Lohse, 289).

20. European Parliament, "The Principle of Subsidiarity."

GDPR,[21] P2B Regulation,[22] Geo-Blocking Regulation,[23] Digital Markets Act and Digital Services Act Proposals,[24] Artificial Intelligence (AI) Act Proposal[25] that all signify a tendency toward maximized harmonization.[26]

While the aim of this article is not defining the jurisprudential limits of EU harmonization, it is eye-catching that the EU institutions and Courts use a wide discretion as to the principle of subsidiarity when it comes to harmonization. It is remarkable that the EU Courts have not found that the limits of Article 114 TFEU were breached by the EU legislator, except in a very few cases such as *Tobacco Advertising*.[27] Arguably, the relevant case-law has become a mere "drafting" guide, and the practical consequence of the EU Courts' approach is to entrust the legislature with a high level of discretion in choosing whether and how to harmonize the laws.[28]

"Proportionality," another key principle for harmonization, has its roots also in Article 5(4) of the TEU. The principle of proportionality regulates the exercise of powers by the EU, seeking to set actions taken by EU institutions within specified bounds.[29] Both the EU legislator and the EU institutions should make the legislation and implementing decisions within the limits necessary to achieve the articulated goals. As required by the Article 5 of the TEU, the principle of proportionality requires EU-level steps being taken to the extent that is required to achieve the Treaty objectives. Having said that, this principle seems to be complementary to the subsidiarity within the framework of harmonization ends and measures.

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21. Regulation (EU) 2016/679 ("General Data Protection Regulation" (GDPR)).

22. Regulation (EU) 2019/1150 ("Platform to Business Regulation" (P2B Regulation)).

23. Regulation (EU) 2018/302 ("Geo-Blocking Regulation").

24. Digital Markets Act Proposal and Digital Services Act Proposal.

25. Artificial Intelligence Act Proposal.

26. A measure that asserts the EU as the exclusive site of rule-making within the material scope is described as "maximum harmonization," while EU measures that permit scope for Member States to prefer stricter rules above the agreed EU norm are acknowledged as "minimum harmonization" (Weatherill, "The Fundamental Question," 266). See also Veale and Borgesius. Regulations often mean larger occupation of a field when compared to the directives, given the former set out common safeguards and standards, whereas the latter lay down certain goals to be achieved by the Member States granting leeway for the means to achieve such goals. See Europa, "Regulations, Directives and Other Acts."

27. Case C-376/98 *Germany v Parliament and Council* [2000] ECR I-8419. In that case, the CoJ held that "If a mere finding of disparities of between national rules and of the abstract risk of obstacles to the exercise of fundamental (economic) freedoms or of distortions of competition liable to result therefrom were sufficient to justify the choice of [Article 114] as a legal basis, judicial review of compliance with the proper legal basis might be rendered nugatory" (Ibid., para. 84).

28. Weatherill, "The Limits of Legislative Harmonization," 862–63.

29. Europa, "Proportionality Principle."

Despite the aforementioned principles, the Treaty provisions and objectives often do not pose specific boundaries for EU harmonization.[30] Given this fact, many objectives and instrumental tools are designated throughout the implementation of the EU Treaties under the jurisprudential guidance in the face of new challenges. That being said, harmonization is a dynamic process that needs to be analyzed incorporating the institutional actors and governing powers. To better understand the underlying dynamics, the article continues with the theoretical approaches (e.g., regulatory competition, coevolution) to harmonization from a perspective of law-making and political governance.

Regulatory Competition

"Regulatory competition" is a concept built upon two constituent elements; one is related to political governance, the other economics oriented. Juxtaposition of these two elements, namely "regulation" and "competition," denotes a dilemma because of unmatching origins of these concepts. While the former means setting the rules for the market actors, the latter often corresponds to the market actors or forces competing. This term attempts to combine these two elements within the context of political governance and law making.

As a matter of fact, effective regulation aims to find the balance between conflicting interests often by resisting the pressures from the interested parties.[31] By contrast, competition means a dynamic process that does not *prima facie* exclude any political or legal model for a law-making process. Notwithstanding, the latter builds on the idea of finding the most effective solution out of the competing alternatives throughout the process. Coexistence of monopolistic (regulatory) and competitive tenets reflects on the US political history of the early 20th century when competition

30. For instance, regarding consumer protection, it is envisaged under Article 169 TFEU that "the Union shall contribute to protecting the health, safety and economic interests of consumers, as well as to promoting their right to information, education and to organize themselves in order to safeguard their interests." Under the same provision, "measures adopted pursuant to Article 114 in the context of the completion of the internal market" and "measures which support, supplement and monitor the policy pursued by the Member States" are referred to achieve the stated objectives. Likewise, regarding many other areas of law (e.g., social policy [Article 151], environmental protection [Article 191], energy policy [Article 194]), the TFEU has laid down the governing principles and policy objectives with no specific roadmap or guidelines.

31. Andreadakis, 54.

between the States took place finding out the most effective and fit-for-purpose rules in certain areas of law (e.g., corporation of companies).

This contemporary logic traces back to the US Supreme Court decision *Paul v Virginia* (1868)[32] that established states were not able to attach special requirements to corporations that had been chartered in other jurisdictions as a condition of allowing them to do business on their territory.[33] This decision underpins the US rule that the applicable law of a corporate entity is that of the state in which it has been incorporated.[34] This means once a company has chosen to be incorporated and registered in a particular state, other authorities and courts of other states will acknowledge its decision and apply the relevant state law. This was later interpreted as meaning that states had to operate a rule of mutual recognition, according to which an incorporation that was effective in one state was acknowledged by the others.[35] This resulted in a charter competition, by which various states entered into a race of attracting companies with several legal provisions including decreasing or removing taxes and other financial requirements. This process ended up with the preeminence of the state of Delaware that followed a looser regulatory regime for the companies, coined with the "Delaware effect."[36]

At the two extremes of the debate over the Delaware effect are two views: one holds that the Delaware legislature and courts attracted incorporations by diluting standards of shareholder protection, thereby engineering a "race to the bottom"; the other maintains that Delaware has succeeded because its laws offer the best available set of solutions to the problem of agency costs arising between shareholders and managers.[37] Notwithstanding, there is nothing inevitably deregulatory as far as regulatory competition is concerned.

In fact, raising the regulatory standards could also be possible as seen in the phrase of "California effect," which implies that a particular US

32. *Paul v. Virginia*, 75 U.S. (8 Wall.) 168 (1869).

33. Deakin, "Legal Diversity and Regulatory Competition," 447.

34. Deakin, "Is Regulatory Competition," 77.

35. Deakin, "Legal Diversity and Regulatory Competition," 447.

36. At the time when the charter competition has started among the states, New Jersey was more preeminent taking advantage of a looser regulatory regime. In the 1890s and 1900s, Delaware displaced New Jersey when the latter, under the influence of the Progressive political movement, introduced a number of regulatory constraints on large corporations including controls over the holding of shares in one company by another (Deakin, "Is Regulatory Competition," 78).

37. Deakin, "Legal Diversity and Regulatory Competition," 446.

state (e.g., California) is able to drive many US environmental regulations upward (e.g., imposing high emission control standards on the nation's car manufacturers).[38] This effect arises particularly when there is a strategy of such a big state like California for governing the resources in such a way to create its own ecosystem along with the possibility of an impact over the whole standardization of environmental protection. Given the size and importance of the California market and the ensuing spill-over effects, such an attempt to raise the standards would end up with new high common emission standards, first across the United States and then globally.

From a broader perspective, either Delaware or California effect means to create an impact over the marketplace to influence, counter, or mitigate the policy makers' acts by means of positive network externalities. This dynamic perspective is inspired by real markets that are characterized by demand and supply to seek the optimum efficiency.[39] Achievement of the advantages of regulatory competition (e.g., efficient outcomes), presupposes a sufficient number of rule-makers, information about the alternatives that are available and mobility of citizens or factors of production.[40] This type of regulatory competition may be defined as a process involving the selection and deselection of laws in a context where jurisdictions compete to attract and retain scarce economic resources.[41]

Remarkably, distinctive institutional structures and settings across the Atlantic stem from the inherent differences unique to the United States and European nations,[42] and primarily on this very basis, regulatory competition would find a less favorable place in the EU. While it would be argued that there is a room for regulatory competition in the EU considering the subsidiarity and proportionality principles, this resembles more of a maneuverability within certain legal limits set out by the EU for many sectors. Practically speaking, Member States can hardly compete to accomplish design of their own standards and impose it widely across the EU as

38. Humphreys, "Globalization, Regulatory Competition, and EU Policy Transfer," 307.

39. The earliest, and still influential, theoretical models (in particular Tiebout, 1956) envisage a situation in which states supply laws in response to the demands of the "consumers" of those laws, namely individuals and corporations, who have the power to switch the resources under their control to alternative jurisdictions (Deakin, "Is Regulatory Competition," 74). If the states do not amend their codes in response to another state's innovation, they run the risk that firms will move to the state which is the most responsive to firms' and consumers' demands for legislation (Van den Bergh, 29–30).

40. Van den Bergh, 29.

41. Deakin, "Is Regulatory Competition," 76.

42. Josselin and Marciano, 7.

the EU-wide legal standards are increasingly erected against the perceived problems for the potential negative externalities. It seems to be presumed by the EU institutions that negative externalities are a direct outcome of lacking harmonization, regardless of analysis of transaction costs.[43] In other words, the European institutions widely conclude that there would exist a race to the bottom or adverse free rider effect when the Member States are left with their freely chosen acts.

Notwithstanding, CoJ's judgments in a number of cases would be construed to allow a certain level of regulatory competition. For instance, in the *Centros* judgment concerning the right to establishment, the CoJ set out that "The right to form a company in accordance with the law of a Member State and to set up branches in other Member States is inherent in the exercise, in a single market, of the freedom of establishment guaranteed by the Treaty,"[44] and held that any counter-decision should be based on a justification that needs to be tested against the "proportionality" test.[45] *Centros* and the following cases (e.g., *Inspire Art*,[46] *Überseering*,[47] and *SEVIC Systems* [48]), opening the gateway for companies to incorporate in Member States with more favorable company law,[49] have understandably given rise to a huge amount of academic and related commentary, most of which has welcomed the possibility of regulatory competition in the EU as a mechanism for company law reform.[50] While the case-law of the CoJ has been supportive of foreign companies and cross-border corporate mobility in

43. If an externality affects only a limited number of countries and the risk of strategic behavior may be mitigated, negotiations between the Member States on the basis of previously assigned property rights may lead to efficient outcomes (Coase theorem) (Van den Bergh, 35). This same conclusion could also be derived from Murphy's work whereby he reaches out to the following:

> ". . . law and economics research on transaction costs may have suffered from too much success in analyzing monopolies/oligopolies, antitrust, and monopoly regulations, This success has led economists to pay less attention to the much broader array of regulations found in competitive markets. These include social, financial, environmental, labor, and international trade regulations, to which transaction costs concepts can also be fruitfully applied" (Murphy, 253).

44. Case C-212/97 *Centros v Erhvervs-og Selskabsstyrelsen* [1999] ECR I-1459 para. 27.

45. Deakin, "Legal Diversity and Regulatory Competition," 449, "Is Regulatory Competition," 82.

46. Case C-167/01 *Kamer van Koophandel en Fabrieken voor Amsterdam v Inspire Art Ltd.* [2003] ECR-I 10115.

47. Case C-208/00 *Überseering v Construction Company Baumanagement GmbH (NCC)* [2002] ECR-I 9919.

48. *Case C-411/03, SEVIC Systems AG [2005] ECR I-10805.*

49. Panayi, 151.

50. Deakin, "Is Regulatory Competition," 83.

Europe,[51] many problems still persist in practice.[52] That is to say, regulatory competition, even after being acknowledged arguably, could not turn into practice because of the common law safeguards and standards.

While in the United States, any possible intervention at the federal level requires a justification based on the market failure(s) that would not otherwise be eliminated effectively, the same notion of efficiency is rather limited for the EU-level law making. Pro-competitive regulatory policies would come up with some external costs that presumably affect finding the optimum efficiency at the EU level. For instance, negative externalities resulted from tax competition across the Member States give rise to such costs, given the potential race to the bottom to attract the foreign direct investments.[53] While for various reasons (i.e., not to give tax autonomy) EU harmonization on tax rates and bases, in particular for direct taxes has not been successful so far,[54] the so-called negative externalities have so far been the main agenda item for the EU policy makers. Remarkably, the EU policies focus on deterring potential negative externalities in the short term rather than finding the most efficient solution through "trial and error" processes.

Strikingly, whereas the room left for regulatory competition is narrowing down across the Member States, EU centralization more often steps in as a leverage for regulation competition at the international level.

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51. As the Court made clear in *Centros, Überseering,* and *Inspire Art*, host Member States cannot apply their company law rules (e.g., regarding relocation, reincorporation) to such companies, irrespective of the level of activity in the host and home Member States, unless they can justify this under the test of *Gebhard* that requires that restrictions might be justified only if "applied in a non-discriminatory manner; must be justified by imperative requirements in the general interest; must be suitable for securing the attainment of the objective which they pursue; and must not go beyond what is necessary in order to attain it" (see Case C-55/94, *Reinhard Gebhard v. Consiglio dell'Ordine degli Avvocati e Procuratori di Milano* [1995] ECR-I 04165, para 40). In *VALE* (Case C-378/10 VALE Építési kft [2012] ECR I-0000), the Court applies "equivalence and effectiveness principles," rather than requiring justification based on *Gebhard*, meaning that the destination Member State needs to allow reincorporation, at least where it allows comparable domestic conversions (see European Commission, "Study on the Law Applicable to Companies," 32).

52. European Commission, "Study on the Law Applicable to Companies," 32. See also Gorriz.

53. For analysis of negative and positive externalities out of tax competition and their implications along with the EU history of tax harmonization, see Keuschnigg, Loretz, and Winner.

54. This also means permitting regulatory competition as a result. However, fears surrounding such kind of a regulatory competition (i.e., potential economic and social harms) happened to be groundless. While there was a period of strong corporate tax rate reductions, in particular around the time of the Eastern enlargement of the EU, this process has slowed down significantly later on, and no strong downward pressure to tax rates was spotted (Ibid.).

As stated by Humphreys, internationally exposed sectors will be under greater pressure from regulatory competition,[55] and EU's regulatory history for Information and Communication Technologies (ICT) sectors demonstrates this given the early years' impact of the United States and the World Trade Organization (WTO). After the liberalization years following the lead of the United States and the United Kingdom, second wave of re-regulation started, and EU has diverged from the US type deregulation, and chosen its way of harmonization based on enhanced regulatory rules and principles. Based on this enhanced regulatory structure, two points seem to emerge on the horizon: First, the regulatory competition across the EU countries has increasingly faded away through the harmonization efforts and measures. Second, the EU tries to create its own regulatory ecosystem presumably with a presupposed view to attract inward investment based on the advanced regulations (e.g., regarding data protection, digital platforms, and AI) in recent years. While the latter action would have a California effect in view of the size and impact, it is questionable as to whether the tide of the EU would turn in favor of more investment flows given the restricted regulatory competition inside its territory. From a broader perspective, a restricted regulatory competition along with more prescribed path dependencies would arguably cost the EU in regulatory discourse and finding novel solutions against the rapidly increasing ICT dynamics.

Coevolution

Coevolution is another theoretical approach to explain the law-making and political processes. Marking a distinction from regulatory competition and harmonization, coevolution implies the coexistence of diverse systems in an environment where each one retains its viability.[56] From a broader viewpoint, the harmonization process in Europe is constrained by the necessity to take into consideration the diversity of ideas, cultures, and policies, which form the "strength of Europe"; a variety without which Europe will "lose its *raison d'être* and will lose its economic and political role."[57] Following on this idea, keeping the diversity of the national policies would end up with a richer cross-cultivation built upon

55. Humphreys, "Globalization, Regulatory Competition, and EU Policy Transfer," 307.
56. Andreadakis, 59.
57. Josselin and Marciano, 8.

coevolution. As could be inferred from various experiences in some areas of EU law (e.g., labor law), coevolution would thus have a broader impact and realm of implementation within the landscape of the EU.

One might consider, the room left to the domestic regulations would reveal an evolutionary trajectory strengthening the EU, through which diverse examples from the Member States could subsist. Such a trajectory would also potentially give rise to a transformation of national rules toward the internal market objectives. This could be illustrated with the legal fora in which most of the private law rules in Europe have survived, pointing to an adaptive environment whereby they demonstrated an ability to adapt to changing economic conditions, particularly on the basis of less normative and commonly shared principles (e.g., good faith, reasonableness, negligence). On the other hand, it is doubtful whether subsistence of these principles in the European landscape would be interpreted to revitalize the "survival of the fittest" approach following the Darwinian evolution theory. This is particularly difficult to answer in the face of EU harmonization, which aims to achieve legal standards often through hard law measures across the Member States.

Coevolution entails the "spontaneously selected rules" that coexist and repeatedly interact to result in the emergence of common rules. This marks more peculiar characteristics against the regulatory competition that means simplified functional units competing to respond the consumers' needs. Coevolution is defined neither by the legal and political sphere being occupied such as in the "harmonization" nor by leaving this sphere to an uncontrolled competition. This would remind us the English common law that has been built upon customs, posing the idea that a natural selection process would be possible as claimed by Hayek through his theory of "spontaneous order" process or social or cultural "evolution."[58]

If a Hayekian or Darwinian line of reasoning is followed—the latter being purely evolutionary with its biological origin—rules could not be selected for their efficiency but for their capacity to generate a social order in which relationships are based on sympathy.[59] This implies the high possibility that one (spontaneously selected) rule being transplanted or adopted by other legal systems would not bring out the efficiency at all. A purely evolutionist conception of harmonization has to deal with problems of "induction" (simply saying, the way the different rules are made

58. See Ibid., 3–5.
59. Ibid., 6.

accessible), which limit the efficiency of spontaneously selected rules.[60] In fact, the presumed possibility of legal transplantation from one country to another would face some prohibitive costs arising out of culturally and historically defined identical roots. These features would make one consider that the EU-wide path dependencies are hardly explainable with the coevolution theory.

Nevertheless, Humphreys argues that globalization centric policy transfer led by the Anglo-Saxon countries (i.e., the United States and the United Kingdom) denotes a diffusion (or bandwagon effect), which is inconsistent with an evolutionary perspective.[61] Following on this argument, coevolutionary regulatory regimes could be mentioned for the early years of liberalization within the EU telecommunications sector that was largely shaped out by transplantation of Anglo-Saxon deregulatory (liberalization) reform. This reform however seems to have been reinterpreted and reconceptualized while undergoing the waves of reregulation, through which the Europeans diverged from the Anglo-Saxons by building up their own framework, tools, and measures. Arguably, the endogenous forces within the EU can be considered as overshadowed and outpaced given the increasing coercive and mandated rules for harmonization in an increased number of areas including for the telecommunications sector.

Reflexive Harmonization

General Overview

Shortcomings of each model made theorists develop a more responsive approach for the EU, ending up with another concept, "reflexive harmonization," based on the reflexive law theory. The reflexive law theory maintains that it is possible for regulatory interventions to achieve their ends not by direct prescription, but by inducing "second-order effects"

60. Ibid., 6–7.

61. Humphreys, "Europeanisation, Globalisation and Policy Transfer," 58. It is argued that, as suggested by the "natural selection process," a degree of transformation and learning arguably was involved in this process: states and interests have "learnt" that traditional statist policies and regulatory models are neither appropriate nor effective any longer (Ibid.). Acknowledging the benefits of liberalization, they transformed their state-centric telecommunications regimes and reflected the so-called learning into their national policies. According to the Humphreys, this process could also be explained through the coercive transfer mechanisms run by the US's political power—through its trade policy and economic foreign policy and also through its setting the agenda of key international organizations like the WTO (Ibid.).

on the part of social actors.[62] While reflexivity builds upon autonomy and diversity, "reflexive harmonization" attempts to define the EU harmonization by pointing the right directions or ends but not the measures. Coupling self-regulation with external regulation, reflexive harmonization focuses on the "process" that is intended to be effective and successful without stipulating certain measures but the outcomes to be pursued.[63] This rests on the idea that competition is not so much a state of affairs in which welfare is maximized, but a process of discovery through which knowledge and resources are mobilized, the end-point of which cannot necessarily be known.[64]

Harmonization has a dynamic nature dependent on the legal and political settings and drivers. While a strict approach means adoption of harmonized rules and measures with no, or minimum, margin of appreciation, diversity of the legal systems and the way nations interact (compete or cooperate) with each other have an evolving nature, potentially bringing about distinct patterns of convergence or coevolution. Having said that, harmonization would reflect on the legal, social, and political dynamics that interplay from the bottom up, which may not necessarily fall under "regulatory competition" or "coevolution." Drawing on the market actors and their efforts, reflexive harmonization aims to find out optimal results through learning processes and locally driven attempts rather than uniform solutions. From this point of view, "reflexive harmonization" aims to lessen the impact of top-down rules along with the entrusted and mobilized endogenous forces.

The "procedural" orientation of reflexive finds expression in laws, for example, which underpin and encourage autonomous processes of adjustment, in particular by supporting mechanisms of group representation and participation, an approach also finds a concrete manifestation in legislation that seeks, in various ways, to devolve or confer rule-making powers on self-regulatory bodies.[65] While self-regulatory mechanisms would enable a well-functioning reflexive harmonization in many contexts, it should also be noted that knowledge gathering and sharing is key to this law-making approach.

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62. Deakin, "Legal Diversity and Regulatory Competition," 445.

63. Andreadakis, 62.

64. Deakin, "Legal Diversity and Regulatory Competition," 89.

65. Ibid., 445. Thus, laws that allow collective bargaining by trade unions and employers to make qualified exceptions to limits on working time or similar labor standards, or which confer statutory authority on the rules drawn up by professional associations for the conduct of financial transactions, are example of this effect (Ibid.).

Reflexive harmonization holds that the principal objectives of judicial intervention and legislative harmonization alike are two-fold: first, to protect the autonomy and diversity of national or local rule-making systems, while, second, seeking to "steer" or channel the process of adaptation of rules at state level away from "spontaneous" solutions that would lock in sub-optimal outcomes, such as a "race to the bottom."[66] From a broader viewpoint, reflexive harmonization operates to induce individual states to enter into a "race to the top" when they would have otherwise have an incentive do nothing (the "reverse free rider" effect) or to compete on the basis of the withdrawal of protective standards (the "race to the bottom").[67] This is done by giving states a number of options for implementation as well as by allowing for the possibility that existing, self-regulatory mechanisms can be used to comply with EU-wide standards.[68]

Examples from the EU

While reflexive harmonization finds a limited place in the EU law, several examples exist showing how this theory is reflected upon. Reflexive harmonization could be exemplified by the European Works Council Directive (94/95/EC)[69] that did not impose any specific measure but gives incentives to companies to make use of its provisions as the available choice.[70] Setting out alternative routes to the Member States (concerning collective relationships between the employers and employees), this Directive could be marked as an example that creates a "social dialogue" framework as already contemplated by the Maastricht Treaty, as well as enabling reflexive harmonization. In addition, another example could be given from a number of directives[71] adopted in the 1990s in field of social policy that likewise paved the way to a variety of methods, including coordination of

66. Deakin, "Is Regulatory Competition," 89.

67. Barnard and Deakin.

68. Ibid.

69. Council Directive 94/45/EC ("European Works Council Directive").

70. Andreadakis, 63. European Works Council (EWC) Directive aims to regulate collective relationships between employees and their employers (multinational or controlling undertakings with at least 1,000 employees). If a company (employer) chooses not to form a voluntary agreement, or is unsuccessful in establishing one, the Directive provides for a procedure to be initiated (by a special negotiating body) when 100 or more employees, or their representatives, from two or more countries request it. The Directive offers an alternative route, namely a procedure for informing and consulting employees on transnational matters. Not least for this reason but also initiating properly structured and managed information and consultation processes, the EWC Directive is found to be a unique development in transnational labor relations (Chesters).

71. See Directives 96/34/EC, 97/81/EC and 99/70/EC.

the parties, monitoring, and so on. Each of such social policy directives just referred to sets of standards in the form of default provisions that can be adjusted through agreement between the social actors at sectoral, enterprise, or plant level.[72]

Deakin envisages two other channels of reflexive harmonization in the context of social policy directives. What he mentions as the second option is the Community's regular law-making organs to act in a case where the social partners cannot reach a consensus on a framework agreement.[73] This represents the route eventually taken under the Directive establishing a general framework on information and consultation of employees at national level, the Directive 2002/14/EC.[74] Last (third) possibility according to Deakin is for the social partners to reach an agreement that has no independent legal force and is monitored and policed by them, along the lines on employment conditions in teleworking that was arrived at in July 2002 called "Social Partners' Framework Agreement on Teleworking."[75]

Delegation of powers to the social actors appears to be the common thrust of the abovementioned examples that emphasize the central role of self-regulatory mechanisms for reflexive harmonization. Notably, self-regulation in the above context arises as a statutory option alongside the available tools or routes. However, self-regulation should not necessarily be a statutory option and can be sourced from the ongoing collaboration and interplay between the stakeholders. On this basis, self-regulation would surface as the route through which the domestic actors stipulate the harmonization ends deriving most potential benefits. If the benefits created by the parties involved are limited in scope and effect, broadly speaking not serving to harmonization, this would be a reason for the EU legislator to figure and shape out a new agenda for harmonization.

72. In this regard, the distinct practices of the Member States created cross-cultivated solutions within the scope left to the policy makers. For instance, the Parental Leave Directive has triggered a debate in the United Kingdom and Germany about a system of leave-sharing between female and male parents, a system that is not required by the Directive but around which a political consensus appears to have been built, influenced by the example of existing practice in the Nordic Member States (Deakin, "Is Regulatory Competition," 92). In short, convergence on a uniform set of legal instruments for regulating flexible work and the work-life balance is unlikely to be the end result of the process of implementation of these directives; however, that process has triggered a reassessment of policy that may lead in time to greater convergence of practice in at least two member states whose laws were previously at opposite ends of the spectrum (Deakin, "Is Regulatory Competition," 92).

73. Deakin, "Is Regulatory Competition," 91.

74. Directive 2002/14/EC.

75. Deakin, "Is Regulatory Competition," 91.

From this point of view, two more examples can be given to enlighten the self-regulatory mechanisms as a driver for reflexive harmonization.

First example can be given from the field of "open Internet" or "net neutrality" that has been regulated under the Regulation 2015/2120 (EU Net Neutrality Regulation).[76] According to the EU Net Neutrality Regulation, all the Internet service providers (ISPs) are required to "treat all traffic equally, when providing Internet access services, without discrimination, restriction or interference, and irrespective of the sender and receiver, the content accessed or distributed, the applications or services used or provided, or the terminal equipment used."[77] While this Regulation entails both negative and positive harmonization, a more predominant role would rather be attributed to the former, as the Regulation first and foremost bans certain behaviors. Not least as a result of this, but also for the broader scope left to the NRAs,[78] a room seems to be left for reflexive harmonization within which various regulatory examples would emerge.

Within the room left for the national policies, Ofcom, the UK regulator, has supported industry-led self-regulation along the same line with its November 2011 position on its approach to net neutrality.[79] Following the adoption of the EU Regulation, the Broadband Stakeholders Group (BSG) published in June 2016 its renewed code of conduct called "Open Internet Code of Practice," representing 90% of the ISPs in terms of the volume of the broadband subscribers.[80] UK's net neutrality regulation, while fulfilling the requirements of the EU Net Neutrality Regulation, also reflects the local commitments and solutions agreed upon by the UK stakeholders.[81] For example, the UK Code goes further than the EU Regulation in its commitment to protect children from harm for it includes the possibility for the ISPs to deploy parental filters under conditions set

76. Regulation (EU) 2015/2120 ("EU Net Neutrality Regulation").

77. EU Net Neutrality Regulation, art 3(3/1).

78. According to the EU Net Neutrality Regulation, NRAs should be empowered "to intervene against agreements or commercial practices that, by reason of their scale, lead to situations where end-users' choice is materially reduced in practice" (recital 7) and "to intervene when agreements or commercial practices would result in the undermining of the essence of the end-users' rights" (recital 7).

79. In 2011, ISPs and mobile network operators signed the BSG Traffic Management Transparency Code, committing themselves to ensuring that traffic management policies were transparent and comparable. Subsequently, BSG published the Open Internet Code of Practice in 2012, in which signatories committed to not using traffic management practices to degrade the services of a competitor.

80. Regarding the role played by the self-regulation in this area of UK law, see Marsden.

81. Broadband Stakeholders Group, "Implications of Brexit on the Digital Communications Sector."

out in the Code.[82] This exemplifies the reach of self-regulation (i.e., more of race-to-the-top) when the EU regulatory framework puts forward the direction and the minimum standards not the detailed measures.

While the limited maneuverability left to the NRAs under the EU Net Neutrality Regulation is criticized,[83] the reflexive harmonization approach can nevertheless be implicated out of this Regulation. Having said this, it seems inevitable to strike a balance between the locally driven attempts and the EU-wide harmonization ends in combining "reflexivity" with "harmonization"; and this balancing act usually builds on broadly speaking the distribution of welfare mechanisms, incorporating how to reconcile the goal of market competition with provision of innovative services. EU's harmonization ends, which mainly reflect the hard-core freedoms and (intra and inter-state) competitive restraints, would thus have to be revitalized by avoiding top-down measures and by reinvigorating the self-regulatory mechanisms from a wider perspective of law-making.

Another example for self-regulation can be given from the EU Regulation 2018/1807[84] that was put into force under the 2015 Digital Single Market strategy. Aiming at removal of the cross-border obstacles against the free flow of data, Regulation 2018/1807 adopted a self-regulatory process to ensure the portability of nonpersonal data.[85] To that effect, "a principle-based approach that provides for cooperation among Member States, as well as self-regulation" is laid down under the Regulation,[86] whereby the Commission is charged to monitor and issue guidance and evaluation reports throughout the period.[87] In the end, it is intended that by means of self-regulatory codes of conduct users can port data between cloud service providers and back into their own IT environments.[88] Preceding entry into force of this Regulation, major stakeholders like Google, Microsoft, Facebook,

82. Ibid.

83. Ariña, 26–27.

84. Regulation (EU) 2018/1807 ("Regulation 2018/1807").

85. "[S]pecific examples of nonpersonal data include aggregate and anonymised datasets used for big data analytics, data on precision farming that can help to monitor and optimise the use of pesticides and water, or data on maintenance needs for industrial machines" (Regulation 2018/1807, recital 9).

86. Regulation 2018/1807, recital 11.

87. According to Article 6 of the Regulation 2018/1807, the Commission shall "[e]nsure that the codes of conduct are developed in close cooperation with all relevant stakeholders, including associations of SMEs [Small and Medium-sized Enterprises] and start-ups, users and cloud service providers" and "encourage service providers to complete the development of the codes of conduct by 29 November 2019 and to effectively implement them by 29 May 2020" (Regulation 2018/1807, art. 6(1-2)).

88. European Commission, "Digital Single Market: Free flow of non-personal data."

and Twitter had started to collaborate under an open-source project to facilitate data portability between competing services.[89] It is notable that this collaboration has started when this Regulation has been drafted, and this draft seems to have driven the parties to create self-regulatory rules in advance.

This Regulation can thus be seen as a good example for mobilizing the bottom-up resources toward a harmonized legal structure across the EU. Notwithstanding, it is questionable whether this can also be considered as an ideal example of reflexive harmonization since it is clear that the Commission has in mind certain outcomes to be achieved and might not ultimately be satisfied with the outputs from the collaboration, and would ultimately build up its own statutory rules as could be implicated from the Regulation itself.[90] It is key that various policy and legal routes and accompanying solutions should not be preempted by the (reflexive) harmonization insofar as they do not jeopardize functioning of the internal market. Furthermore, for reflexive harmonization to be operational, regulatory experimentation needs to be stimulated through multi-layered information and learning processes, which are particularly important for the dynamic industries including electronic communications.

EU Harmonization in Field of Electronic Communications

General Overview

ECRF: Origin, History, and Legal Background

"Electronic communications" or "telecommunications" could be considered as one of the leading sectors for economic and social development, wealth distribution, and well-being of the individuals and societies. Electronic communications services should mostly be understood as the communication services that are transmitted electronically, whether wireless or wired, data or voice, packet or circuit switched, broadcast or multicast. From single-minded services (i.e., voice telephony) to the convergent services of data and voice transmission (i.e., electronic communications), a wide-ranging spectrum of services and underlying networks (e.g., fixed, mobile, and satellite) are embodied within this sector.

89. Leonard.

90. See Regulation 2018/1807, recitals 30–37.

EU's regulatory framework for electronic communications (ECRF) means hard and soft law consisting of regulations, directives, recommendations, guidelines that contain the governing rules for the provision of electronic communication services. Having said that, whole provision of electronic communications networks or simply speaking, wholesale services, are often meant to be regulated by the ECRF, as mostly represented by "access" and "interconnection" remedies. As such, the retail side of electronic communications, namely provision of services to consumers, is less debated and regulated within the ECRF. Reflecting these nuances, ECRF has the broadly designed objectives to

1. Promote connectivity and access to, and take-up of, very high-capacity networks
2. Promote competition in the provision of electronic communications networks and associated facilities
3. Contribute to the development of the internal market
4. Promote the interests of the citizens of the Union[91]

While the first one (promotion of connectivity) has been brought as a new objective by the EECC, "promoting competition" needs to be noted as the leading one in shaping out the related European policies. In fact, EU regulations in general and in this area alike could be considered as a response to market failures.[92] The central idea behind this lies at the overarching four major freedoms and the right to establishment enshrined under the TFEU. EU policy makers have since the beginning had an ambition based on the notion of efficient and competitive markets, considering they will better suit and respond to the liberal market economy along with heightened consumer interests and allocative efficiency.

In fact, the electronic communications sector was considered as a sector that needs to be fully liberalized and thrive on the notion of effective competition, where necessary through coercive tools of harmonization. As such, the Commission has expedited liberalization of these markets based on not the Article 114 (ex-95) but the Article 106(3) (ex-90(3)) TFEU that offered a fast-track route bypassing the EU Parliament and Council.[93] Not only for the purpose of liberalization, but also to make the network facilities available to new entrants, the EU authorities, particularly the Commission,

91. EECC, art. 3(2).

92. Pelkmans and Renda, 14–15.

93. See also Walden, 161; Bulmer et al., 77–78; Psygkas, 37.

made significant efforts to date. This vision has been reflected within the EU regulations and directives regarding authorization, spectrum policy, net neutrality, network access, and related pricing regimes. EU measures concerning wholesale access and pricing, reveal most coercive (command and control) mechanisms reflecting on the idea of "regulatory state"[94] and drawing the boundaries of harmonization in this area.

This trend of harmonization has started with the introduction of the Green Paper in 1987 and gone through incremental steps of regulation toward creation of a level playing field across the layers of electronic communications networks and services. The 1990s have passed with liberalization efforts to remove the special and exclusive rights of the state monopolies. Establishment of a regulatory framework (i.e., based on the "open network provision" [ONP] directives) alike constituted another, even the main, component of the harmonization agenda of the EU. The underlying liberalization directives and the ONP (or harmonization) directives together constituted the ECRF that had a consolidated version in 2002 representing the key reference point in the timeline.

Through the 2002 consolidation not only were more systemic regulatory mechanisms and tools created, but also additional institutions (i.e., European Regulators Group [ERG], RSPG) were founded to assist the Commission in running the necessary checks and balances. In addition, independent regulators (NRAs) were further empowered with which additional measures (e.g., dispute resolution) and obligations (e.g., local loop unbundling) are introduced with a view to enhance competition and consumer protection. Below, a brief explanation regarding the institutions and actors of the ECRF are given, and this is followed with the examination of selected areas of the ECRF from the perspective of harmonization.

Institutional Structure

Primarily speaking, the ECRF is built on a semi-decentralized structure. On the one hand, the NRAs are charged with regulation of the domestic markets, and on the other hand, supranational powers are used by the European Commission as well as the European Parliament and the Council—the former being responsible with the implementation of the

94. "Regulatory state" is well known for its emphasis on the rise of a plethora of independent NRAs at arm's length from central government that exist to supply efficient "regulation" for competitive markets (Humphreys, "Europeanisation, Globalisation and Policy Transfer," 57), and is coined with the process of transformation from the positive (interventionist) to the "regulatory" state at the national level.

ECRF. While the independent NRAs are charged to implement the regulatory framework within the territories of Member States, the Commission is mandated with the role of coordination, cooperation, and monitoring, which are intensified in the market review processes along with more intrusive tools (e.g., vetoing market definitions).

Within this framework, NRAs should have "market independence" and "political independence."[95] The former means the regulators making decisions independently from the market players[96] and this can be translated for the latter meaning the decision-making processes need to be run independently from the political powers, particularly governmental bodies.[97] With the introduction of EECC, "accountability" surfaces within the national regulatory processes as another principle that needs to be reflected in due course.[98]

While market and political independence of regulators is secured under the ECRF, their day-to-day decisions are highly scrutinized to avoid any deviation from the governing rules and principles. From the institutional point of view, it should be noted that NRAs' decision-making processes go through key monitoring exercises and consultation mechanisms, within which key factors such as BEREC, RSPG, and/or other NRAs have a role. While the Commission often has the final say having the supranational powers, BEREC is also noteworthy for its increased mandates under the EECC.

BEREC has predominantly an advisory role as regards market regulation issues, functioning as an exclusive forum for cooperation between

95. See Psygkas, 41. See also Nihoul and Rodford, 32, where the authors consider the concept of "independence" has three dimensions: (1) legal independence, (2) functional independence, and (3) structural independence.

96. Regarding "market independence," it is set out under the EECC that Member States shall ensure the NRAs are "legally distinct from, and functionally independent of any natural or legal person providing electronic communications networks, equipment or services" (EECC, art. 6(1)). This largely reflects the earlier ECRF provisions such as Council Directive (EC) 2002/21 ("Framework Directive") art. 3(2).

97. Concerning political independence, Article 8 EECC requires that NRAs "shall not seek or take instructions from any other body in relation to the exercise of the tasks assigned to them under national law implementing Union law" (EECC, art. 8(1)). This largely reflects the earlier ECRF provisions such as Framework Directive, Article 3a, as amended by the Directive 2009/140/EC ("Better Regulation Directive").

98. According to the Article 8(2), NRAs are charged with annual reporting "inter alia, on the state of the electronic communications market, on the decisions they issue, on their human and financial resources and how those resources are attributed, as well as on future plans." which needs to be publicly available.

the NRAs and the Commission as well as among the NRAs themselves. BEREC's role and responsibilities exceed those of its predecessor, ERG.[99] It seems that rather than a weak ERG that was structured as a "regulatory network" responding to coordination problems,[100] an enhanced body of regulators has been preferred by the EU legislator not least for the dissemination of best practices but also to stimulate the harmonization agenda by seeking the needed expertise and technical support.

As such, BEREC is running its tasks under the scrutiny of Commission, by closely looking at the EU agenda as well as national approaches, gathering and calibrating such inputs toward further harmonization. As could be derived from the EECC provisions,[101] BEREC's new responsibilities are clearly designed to facilitate the EU regulatory agenda. Thus, the relationship between the Commission and BEREC is largely dominated by the former. Against this institutional structure, the regulatory coordination (or networking) role of BEREC would hardly be sustained given its increased mandates particularly after the EECC.[102]

99. BEREC has originally been founded with the Regulation (EC) No 1211/2009 that has been repealed with a subsequent Regulation in 2018 that brought up new substantial regulatory tasks. See Regulation (EU) 2018/1971 ("BEREC Regulation") art. 4. See also BEREC, "What's BEREC?"

100. See Coen and Thatcher, 61.

101. Under the EECC, BEREC has been conferred with a significant number of roles and responsibilities in addition to the previously given ones (e.g., reviewing the draft national measures regarding market regulation). It is remarkable that according to the EECC, BEREC has to issue guidelines in many areas including obligations regarding geographical surveys, common approaches to the identification of the network termination points, minimum criteria for reference offers, common criteria for the management of numbering resources, quality-of-service parameters, applicable measurement methods and the technical details and parameters to be taken into account when setting symmetric termination rates. By the same token, BEREC is charged by the EU legislator to set single EU-wide maximum (fixed and mobile) termination rates as well as setting up a register for the extraterritorial use of numbers along with a database of providers of electronic communications networks and services. Last but not least, BEREC is mandated to assist the Commission and NRAs in wide-ranging areas such as opining for resolution of cross-border disputes, identification of lacking interoperability, or a threat to end-to-end connectivity where necessary. In conjunction to these mandates, BEREC is empowered to request all necessary information from the Commission, the NRAs, and, as a last resort, other authorities and undertakings. See BEREC Regulation, art. 4, recital 37. See also BEREC, "Tasks."

102. This view is along the similar lines with the opinion of Coen and Thatcher, who conclude that European regulatory networks find themselves caught between the objectives of their two principals, namely the Commission at the EU level and NRAs at the national level (Coen and Thatcher, 57). On this note, "downward" pressure coming from the Commission seems to outweigh against the "upward" pressure from the NRAs toward BEREC given its increased role and responsibilities under the EECC.

While BEREC is mainly charged with the contribution to the implementation of the ECRF regarding market regulation issues, the RSPG is structured to carry out tasks relating to spectrum issues (e.g., distribution, allocation, and assignment of spectrum frequencies).[103] Functioning as an informal policy group, RSPG provides a forum where Member States' representatives (not necessarily NRAs' members) gather to have regulatory discussions in relation to spectrum policies.[104] According to the EECC, RSPG "should assist and advise the Commission with respect to radio spectrum policy" with a view to "further increase the visibility of radio spectrum policy in the various Union policy areas and help to ensure cross-sectorial consistency at Union and national levels."[105]

There are other consultation mechanisms apart from those managed through with BEREC and RSPG. There exist several advisory committees that the Commission consults concerning EU harmonization in this field. Under the pre-2002 framework, the Commission was primarily advised by the "ONP Committee" and the "Licensing Committee," and an ad hoc group composed of the NRAs in the Member States.[106] Within the existing framework, the Commission currently has the following bodies for consultation:

- The "Communications Committee" (Cocom), composed of representatives of the Member States
- The "Radio Spectrum Committee (RSC)," composed of Member State representatives, as well as the "RSPG"
- The "Telecommunications Conformity Assessment and Market Surveillance Committee" (TCAM), to assist the Commission in respect of telecommunications equipment and comprising Member State representatives[107]

Not only the consultation processes run before these committees (i.e., comitology procedures) to adopt implementing acts, but also the mechanisms of BEREC and RSPG represent key leverages for EU harmonization. Clearly, these forms of horizontal and vertical coordination mechanisms focus on the promotion of the internal market and the consistent implementation of substantive regulation.[108] While there exist few instruments

103. See also Radio Spectrum Policy Group, "About RSPG."
104. Nihoul and Rodford, 30.
105. EECC, recital 73.
106. Walden, 185–86.
107. Ibid.
108. Psygkas, 58.

(e.g., veto power) under ECRF that enable the Commission to directly intervene into the national decisions and processes, the enhanced top-down requirements and signposts for the national policy makers signify a trend of "regulatory state" at the EU level. To shed further light on this, two selected areas, namely "network access" and spectrum regulation are examined below.

Analysis of Selected Areas

Network Access

Network access is key to achieve the general objectives set out under Article 3 of the EECC. While this is much echoed and represented with the understanding that the dominant market players, or the so-called players having "significant market power" (SMP), ought to be providers of network access to ensure competition, the network elements falling outside of the SMP regime are increasingly acknowledged as a subject-matter of the ex ante regulation. From the harmonization viewpoint, representing key components of the ECRF, both the SMP and non-SMP aspects are worth being considered. Given this fact, this article evaluates both elements going through the trajectory and cornerstone changes of the ECRF.

Asymmetric (SMP-based) Access

Asymmetric or SMP-based access means a regulatory zone consisting of a set of remedies applicable to SMP players to facilitate new entries and effective competition in the relevant markets. SMP remedies or broadly speaking "SMP regime" constitutes the backdrop of the ECRF in pursuing the objective of promoting competition. Through the SMP regime, it is intended that "overall analysis of the economic characteristics of the relevant market" is conducted on the basis of competition law terms and criteria.[109] Crucially, the concept of SMP defined in the ECRF is equivalent to "dominance" defined in the CoJ case-law.[110] Competition law terms and methods are invoked under the ECRF throughout all the steps of "market

109. European Commission, Commission Guidelines, para 78.

110. See the EECC Directive, recital 161. See also the EECC Directive, art 63(1).

analysis,"[111] which consists of a three-step process: market definition, market power (SMP) assessment, and remedies.[112]

According to the Article 67 of the EECC (formerly Article 15 of the Framework Directive), NRAs should perform market analyses to impose appropriate remedies on SMP (dominant) undertakings. If the relevant market is found not to be competitive in the sense that there exist one or more SMP players operating in the market, then they should be subject to ex ante obligations (e.g., access, transparency, nondiscrimination, cost-orientation, or other pricing obligations such as margin squeeze test).

While the market definition is subject to the Commission's veto power,[113] the right to choose the remedies to be imposed on SMP operators largely depends on NRAs' regulatory decisions. Given this fact and the acknowledgment of convergence (technology-neutral fashion) in the regulatory sphere, the ECRF has widely been found to be flexible and promising in the early 2000s.[114] The key factor behind this seems to be the flexibility of the NRAs in that they should select the remedies in view of the potential market failures "based on the nature of the problem" and complying with the "proportionality" principle.[115] Remarkably, they need to make an analysis as to the extent to which SMP players affect potential competition through various factors (e.g., level of retail prices, availability of competing products and services).

Under the ECRF, "access" is defined to cover a great many elements[116] and access remedies could be imposed on SMP undertakings providing the specified conditions are met.[117] While this requires a certain amount of information concerning the relevant market(s), this needs to be followed by evaluation, interpretation, and optimization by the NRAs. As sub-optimal decisions eventually could be made, the "trial and error" processes

111. Notably, hybridization of the SMP regime with competition law methodologies should not be understood as allowing antitrust to be stretched beyond its reasonable limits and replacing sectoral regulation (De Streel, 542). This approximation is just an attempt to ensure that regulatory decisions are more flexible and closer to the economic reality of the market, as well as responding to the more complex and dynamic markets (Ibid.).

112. Regarding market review processes see also Grewe, 381–419.

113. See Framework Directive, art. 7.

114. See Marcus, 17. For similar views see also Mindel and Sicker, 147; Kariyawasam, 114.

115. EECC, art 68(4).

116. See EECC, art 2(27).

117. According to Article 73(1) of the EECC, access remedies could be imposed in case a consumer harm is likely to attend a potential anticompetitive threat. Imposition of access remedies could be followed or accompanied by other SMP remedies that are set out under Articles 69 to 81 of the EECC that specify further conditions before any intervention.

should be deemed an inevitable part of market analyses that recur every five years (which used to be three years before the EECC).

Remarkably, the scope for the access remedies to be imposed on SMP operators has been enlarged since the introduction of the 2002 regulatory framework. First of all, within the 2009 Reform "access" has been defined in a more comprehensive manner.[118] Second, additional remedies have been added to the ECRF, such as functional separation and associated provisions (i.e., voluntary separation by a vertically integrated undertaking).[119] Third, additional rights and measures for network access are set out under the ECRF to supplement the SMP remedies.[120]

Ironically, this extended nature of the SMP regime came up with a detailed regulatory mapping that potentially results in a restricted flexibility on the part of regulators. This is the dilemma that appears to be a defining characteristic of the ECRF in general. This is particularly seen throughout the market analysis procedures run under Article 67 EECC (formerly Article 7(2) Framework Directive) in collaboration with the Commission, BEREC, and other NRAs. The Commission has increasingly intervened into the NRAs' regulatory decisions not only by means of the ordinary tools of market review (e.g., veto power), but also issuing and actively invoking soft law.[121] Soft law measures have widely turned into a significant leverage of harmonization by which market remedies were tested, examined, and driven to be modified to the point where the perceived inconsistencies were eliminated. In this context, the Commission rejected several market definitions of the NRAs, conveyed serious doubts to many regulators' proposed market remedies where necessary by issuing

118. For instance, "access to information systems or databases for preordering, provisioning, ordering, maintaining and repair requests, and billing" has been incorporated by the Article 2(1) of the Better Regulation Directive in 2009.

119. This followed the particular example of British Telecom (BT) being restructured as two separate units, namely wholesale and retail arms of operation, called "Openreach" and "BT," respectively. Following this case and other similar endeavors (i.e., in Sweden and Italy, the EU legislator included this remedy into SMP regime (see Council Directive (EC) 2002/19 ("Access Directive") Article 13a, as amended by the Article 2(10) of the Better Regulation Directive). This remedy is carried over to the (Article 77(1) of) the EECC.

120. For instance, under the 2009 Reform, the access providers are given a right to specify the standards and/or technical requirements to be met by the access seekers within the context of mandated access (see Access Directive, art. 12(3) as amended by Article 8(f) of the Better Regulation Directive).

121. "NGA Recommendation" (2010) and "Recommendation on Non-Discrimination and Costing Methodologies" (2013) could be given to exemplify two major soft laws that have actively been invoked by the Commission.

individual decisions against their persistence, and referred to the recommendations, guidelines, and/or the decisions previously given by itself.

The Commission's approach served to create a rebuilt Europeanized mind-set across the NRAs, with an effect of narrowing down the potential realm for coevolution that would otherwise be cultivated within the wide-ranging practices of regulatory experimentation. Clearly, there is also a risk of no, or minimum room being left for regulatory competition within the regulatory sphere of the SMP regime. One could thus mention about the rising notion of the "regulatory state" at the EU level toward the intended results of harmonization along the way of engineered patterns particularly under the SMP regime. This however comes up with an opportunity cost of less exchange of best practices across the regulatory networks (e.g., BEREC), and absent reflexive harmonization alike. This could be exemplified with the lacking self-regulated or volunteered functional separation since the case of BT-Openreach upon the 2009 Reform that brought an engineered model of functional separation as part of the SMP regime. This downside of engineering potentially provokes pushback or boomerang effects meaning that regulators tend to react negatively to the already prescribed solutions for them.

This engineered model of regulation effectively depicts some limits for the regulators. In the EU model, NRAs cannot pick up either "regulatory holiday" or "full deregulation" as the regulatory options under their market analysis procedures and decisions.[122] In fact, the flexibility granted to the NRAs allows them to respond to such needs via a few deregulatory tools such as geographic segmentation or FRAND type remedies (e.g., in the case of wholesale-only operators or coinvestment projects) under the ECRF.[123] That is to say, without SMP remedies or such permissible tools, the Commission would

122. SMP regime specifies the regulatory instruments to be used in a step-by-step process. Although there seems a room left to the national regulators in the sense that they are largely free to design the market remedies focusing on the domestic conditions of each market, their margin of appreciation is delimited for the regulatory mapping and engineering approach mentioned above. Regarding the regulatory options and pathways, European NRAs can pursue, see Unver, 964–70.

123. EECC, art. 79(2–3) and 80(2). Notably, NRAs cannot unfetteredly decide whether the SMP undertakings involved in a coinvestment project or wholesale-only undertakings designated as having SMP can freely offer their wholesale services under FRAND terms being subject to competition law. While FRAND terms are permitted in the respective EECC provisions, it is also envisaged that the relevant conditions must be reviewed by the NRA in view of their competitive impact on the relevant market(s) with the possibility that NRAs can revert to the SMP remedies eventually. The rules and principles the NRAs need to pursue in their implementation are further detailed with the guidelines published by BEREC. See BEREC, "BEREC Guidelines to Foster."

convey serious doubts to the regulators for the lacking asymmetric (SMP) remedies concerning anticompetitive market structures or behaviors. This situation makes the EU regulatory policies engineered toward the same goal of effective competition along the same or similar patterns of ex ante regulation.

Between the contemplated starting and end points, no room seems to be left for any deviation or an unanticipated decision as to the (asymmetric) network access. However, innovation and investment decisions, which in the technologically dynamic ICT systems or markets are closely related, take place under uncertainty.[124] At the time an innovation decision is made (a new combination is tried out), it is usually not known whether it will be accepted by users and succeed in the marketplace.[125] As underlined by Bauer, invention and innovation are typically depicted by new combinations and recombinations of existing technological, economic, or organizational knowledge, and if different innovators explore different recombinations, the chances that one or more will succeed are increased.[126]

Given the widely formulated EECC objectives, a key connection exists between "network access" and EU harmonization, which is laid out mainly through the market analysis procedures and the SMP regime. The engineering approach framed above indicates that regulatory predictability is exchanged with regulatory experimentation. Normative prescriptions drawn up for the Member States mean a chosen trade-off out of the mapping approach in that regulatory innovation would be affected since the "trial and error" risk is not internalized at all. Not only regulatory competition but also coevolution would not seem on the horizon out of the engineered regulatory patterns. Nor does the reflexive harmonization have a prospect in this regulatory landscape. Given this, the perceived ends of harmonization under the SMP regime need to be reconsidered against the ECRF objectives that are broadly designed and should allow differentiated network access policies that do not necessarily fit with the engineered patterns and remedies.

Symmetric (Non-SMP) Access

Symmetric network access has been a subordinate part of the ECRF as non-SMP undertakings were not usually addressed for this purpose. Originally, symmetric access remedies were limited to facility sharing and colocation

124. Bauer, 16.
125. Ibid.
126. Ibid.

as enshrined under Article 12 of the Framework Directive that had a generic nature. This was an enabling provision for the Member States to impose an obligation toward sharing of the facilities controlled by an electronic communications provider with other service providers regardless of the market power held by the former. This generic obligation was not formulated primarily to stimulate competition but to protect the environment, public health, public security, or to meet town and country planning objectives.

On the other hand, the notion of competition figured on the EU agenda on a wider scale going beyond the market analysis based on the premise that less duplicated infrastructures would be an important leverage to enable facilities-based competition. Accordingly, in the 2009 Reform, Article 12 of the Framework Directive has been modified to enable symmetric obligations for "sharing of wiring inside buildings or up to the first concentration or distribution point where this is located outside the building, . . . , where this is justified on the grounds that duplication of such infrastructure would be economically inefficient or physically impracticable (. . .)."[127]

This symmetric obligation emerges as an endeavor to stimulate next generation access (NGA) deployments particularly in metropolitan areas, where there has often been a limited area for network roll-out, let alone the cost of capital and rights-of-way requirements. The quoted ECRF provision, which has also been carried over to the EECC,[128] implicitly aims to facilitate NGA deployments and minimize the required capital expenditure (e.g., by extending the facility sharing to inbuilding wiring where necessary).

In the post-2009 period, the EU authorities have had the goal of more efficient and widespread NGA deployments as well as accelerated broadband penetration. In this regard, Directive 2014/61/EU[129] was put into force aiming to reduce the cost of deploying high-speed broadband networks and ameliorate the administrative procedures. Under this Directive are set out the following four mechanisms as the main tasks for the Member States:

a. Access to and transparency of existing physical infrastructure (Articles 3–4): Any network operator, (e.g., utility provider, has the obligation to give access to its physical infrastructure for the deployment of

127. Framework Directive, art. 12(3), as amended by the Article 1(14) of the Better Regulation Directive.

128. EECC, art. 61(3).

129. Directive 2014/61/EU.

high-speed broadband networks (30 Mbps and above), upon reasonable request and under fair terms and conditions, including price.

b. Coordination and transparency of planned civil works (Articles 5–6): Any network operator may negotiate coordination of civil works with electronic communications providers. In addition, undertakings performing civil works fully or partially financed by public means have to meet any reasonable request for coordination of civil works, provided that any additional cost is covered by the communications provider and that the request is made timely.
c. Permit granting (for rights-of-way) (Article 7): All relevant information on procedures for granting permits for civil works must be available via a Single Information Point. Member States are encouraged to organize the application for permits by electronic means. In any event, unless national law specifically provides otherwise, any permit decision should be made in general within four months.
d. Inbuilding infrastructure and access to them (Articles 8–9): All new buildings shall be equipped with physical infrastructure, such as miniducts, capable of hosting high-speed networks and with an access point, which can be easily accessed by the communications providers. Electronic communications providers shall also have the right to access to any existing inbuilding physical infrastructure.[130]

The Directive 2014/61/EU set out a broadened vision regarding the NGA deployments and associated works that are needed to achieve the 2020 Digital Agenda for Europe (DAE) targets.[131] Facility sharing and inbuilding wiring seem to have been given a central locus within this broadly minded NGA-focused framework. The role given to the symmetric access thus became more than complementary given the objectives of promoting competition and connectivity under the ECRF. Based on the acknowledgment of this role and mutual understanding between the stakeholders, this area of ex ante regulation did not seem to have attracted so much debate unlike the SMP regime and its implications.

On the other hand, the idea of widening network access toward non-SMP players and demarcating the lines for EU harmonization alike seems to benefit from the best practices of France, Spain, and Portugal.[132]

130. See European Commission, "Shaping Europe's Digital Future."
131. European Parliament, "Digital Agenda for Europe."
132. Godlovitch; Shortall and Cave, 25.

These countries are the forerunners in utilizing the civil engineering infrastructures, inbuilding facilities as well as passive network elements to the greatest extent with a view to increase efficiency and facilities-based competition. Having said this, Directive 2014/61/EU could be deemed a step further to facilitate policy transfer among the EU countries, representing a coercive means of learning and transferring the necessary policies from the forerunning countries.

Notably, through this way of symmetric obligations, a lesser burden is imposed on the NRAs since new actors (e.g., the governmental bodies or other competent authorities in charge of state planning, city development, environmental protection, and utilities) are involved and mobilized with a comprehensive agenda of harmonization to boost strategic NGA deployments based on dissemination of best practices.

This broadened vision is reflected also under the EECC, which emphasizes access to passive (civil engineering) infrastructure in several provisions.[133] For instance, the Article 61(3) EECC goes beyond the preceding ECRF provisions by stipulating that "If justified on technical or economic grounds, national regulatory authorities may impose active or virtual access obligations" regardless of the market power.[134] Furthermore, the same EECC provision delegates the tasks of determination of the applicable rules and conditions for symmetric obligations to BEREC by assigning each task in detail (e.g., designation of the first concentration or distribution point, high and nontransitory economic or physical barriers to replication).[135] Here, the dilemma mentioned above comes again on the scene. Whereas broadened powers are granted to the national regulators, use of such powers are delimited through the Commission's and BEREC's close scrutiny, reminiscent of market analysis procedure.

Afore stated provisions clearly signify a broadly formulated regulatory structure along with a regulatory mapping through which a great many signposts are planted to shape out the NRAs' actions.[136] While NRAs seem to be freer in

133. EECC, art. 44, 61(3), recitals 105 and 319.

134. The same Article goes on with the conditions for the exemption from these obligations on the basis of being a wholesale-only provider or sustainability of a new network deployment, (i.e., particularly in small local projects, for reasons of the economic and financial viability [EECC, art. 61(3)]).

135. EECC, art. 61(3). Accordingly, BEREC has published guidelines on the criteria for a consistent application of Article 61(3) EECC. See BEREC, BEREC Guidelines on the Criteria for a Consistent Application of Article 61(3) EECC.

136. This should be considered from a holistic viewpoint incorporating the wide-ranging guidelines BEREC has to issue, its increasing dependence on the Commission's agenda and the

symmetric access, imposition of a regulatory mapping as well as increased delegated tasks of BEREC along with its dependence on the Commission would potentially reduce the room for reflexive harmonization and coevolution of distinct practices. Regulatory competition could also be argued to have been affected against the prevailing signposts under the referred EECC provisions.

Whither Network Access? Overall Analysis

As far as network access is concerned, EU regulatory history denotes a rather sophisticated and incrementally expanding framework since the beginning of the ECRF. Given the EECC objectives, "network access" lies at the center of the ECRF driving an important agenda for harmonization as well as competitiveness of the EU. This would remind us of the early 2000s when the LLU Regulation 2887/2000 has been adopted in the globally converging landscape for the regulated broadband access across the Atlantic.[137] By then, without a market analysis by NRAs, copper local loops (the so-called "last mile" access lines) were made available to competitors at cost-based rates in a nondiscriminatory and transparent way. This could also be deemed as internalizing the global competitiveness as well as the Anglo-Saxon influence through a mandated policy transfer process, following the global wave of liberalization during 1980s and 1990s. Notwithstanding, reregulation of the sector drew a divergent path in the subsequent years particularly when another global race loomed in the horizon revolving around the need for NGA deployments enabling service independent and high-speed broadband networks.

Regarding the increasingly globalized NGA competition, the EU authorities' reaction was a bit muted during the early and mid-2000s, which paved the way to several attempts at a regulatory holiday as in Germany.[138]

accompanying mandates as dramatically enhanced by the EECC, which all denote stricter rules and pathways for the regulators.

137. The Commission, following the Lisbon summit in 2000 and after issuing a Recommendation that envisaged implementation of full unbundling by Member States on December 31, 2000, issued a Regulation (No 2887/200) that was an instrument rarely used at the time. The reason behind this was related to the premise that development of the broadband access in Europe was considered insufficient in comparison to the United States warranting EU-wide intervention.

138. In 2006, the German Government relying on the concept of "emerging market" laid down in the Framework Directive and Commission's Recommendation on market definitions, made an amendment in the Telecommunications Act (TKG) 2004 resulting with an exemption of the relevant fiber services (VDSL connections) from the mandatory access obligations. However, the Commission regarded this action as a form of bypassing the rules of European regulatory framework and launched a fast-track infringement proceeding against Germany over

Not only were such undertakings reacted negatively, but also potential attempts were blocked off based on sophisticated regulatory rules developed by either hard law (i.e., 2009 Reform) or soft law (i.e., 2010 NGA Recommendation). In the post-2009 environment, such a blend of hard law with soft law left a much narrower room for the NRAs' design and selection of the remedies regarding network access. Although market analysis was acknowledged as the mainstream route for access remedies, the conventional wisdom of LLU Regulation and well known "ladder of investment"[139] theory seems to have been followed by the EU authorities extensively.

Given the conventional wisdom through the ECRF and the governing soft law, the increasingly sophisticated and complicated rules adopted at the EU level mean a regulatory mapping whereby alternative regulatory approaches would hardly subsist. Every review process for the legislative changes increased the centralized powers along with further rules and signposts inhibiting the possibility of experimentation and innovation. While some ECRF provisions reflect the best practices across the EU, their path to the realm of regulatory governance needs endorsement of the Commission as well as the EU legislator, such as in the case of symmetric (non-SMP) remedies inspired of Spain, Portugal, and France.

Furthermore, the foundation of BEREC in 2009 brought about enhanced mandates toward harmonization in lieu of an increased regulatory capacity for filtering and dissemination of best practices.[140] An already inflexible regulatory system seems to risk NRAs becoming narrow-minded particularly subsequent to the "double-lock system" introduced by the EECC. According to this new system, in cases where BEREC and the Commission agree on their position regarding the draft remedies proposed by an NRA, the NRA can be required by the Commission to amend or withdraw the draft measure and, if necessary, to renotify the market analysis.[141]

Notably, an approach of regulatory engineering can be identified through the decisional practices of the EU Commission as well as the

the country's just-passed legislation, concerning that Deutsche Telekom's competitors would be deprived of access to the new FTTC networks. While the CoJ found that the said German Act infringed the EU framework (the consultation and consolidation procedures of the Articles 6 and 7 of the Framework Directive), it did not refer to the Commission's competition concerns. See European Commission, "Press Release 26 February, 2007."

139. Huigen and Cave, 718.

140. See supra note 102.

141. EECC, art. 33(5/c).

underlying hard and soft law.[142] Blended nature of these measures would result in diminished regulatory experimentation along with an adverse effect on innovative decisions by delimiting the NRAs' problem-solving skills and abilities.

Overall, regulatory predictability seems to be exchanged with absent reflexive harmonization or coevolution across the EU. As far as regulatory competition is concerned, although some countries' practices can be implicated through the EECC provisions, this does not mean a true reflection of this theory.[143] Notably, afore stated policy transfer could be deemed as the conventional way of uploading the best practices that would normally be disseminated through BEREC or other regulatory networks. Instead of this method that would involve far more regulatory experimentation and innovation, EU legislator seems to have crystallized the solutions relying on certain EU best practices. Having said this, the EECC provisions mostly represent normative prescriptions that are however leveraged by the Commission to impose same or similar market remedies. While engineering is far more visible through the market reviews, symmetric remedies also seem to develop along the same lines within the overall European regulatory structure. This trajectory is persuasive given the BEREC's far more enhanced mandates under the EECC covering almost every area of network access regulation.

From a broader point of view, it is fair to conclude regulatory competition has a limited destiny in the EU regulatory landscape, within the ascertained boundaries of the so-called engineering approach. In this landscape, regulatory solutions are destined to need a filtering process at the supranational level, sometimes with some uploads from the national practices when they look for successful results. As this is mostly led by the Commission and ultimately by the EU legislator, one cannot mention about a natural selection or deselection process against the available regulatory options at all.

142. It is also noteworthy that the EECC marks incorporation of the soft law into hard law in various areas, (e.g., price control mechanisms (EECC, art. 74(1)), "equivalence of inputs" obligation (Article 70(2) EECC), three-criteria test (EECC, art. 67(1)). Further to these, totally new elements could be found under the EECC such as provisions regarding regulatory treatment to the coinvestment (EECC, art. 79), wholesale-only obligations (EECC, art. 80).

143. Under the EECC are existing a number of inputs from the examples of France, Spain, and Portugal that lead the facilities-based competition via facility sharing, namely access to the existing conduits, manholes, and inbuilding wiring. See supra note 134.

Spectrum Regulation

General Overview: From "Coordination" to "Cooperation"

Spectrum regulation that is closely linked to liberalization, innovation, and market entries has been one of the key areas of the ECRF from the beginning. Crucially, the amount of spectrum that a national authority releases to the market for mobile voice and broadband use has a strong impact on competition at the national level.[144] Not only for this reason but also for the prospect of pan-European markets and the competitiveness of the EU, spectrum regulation has so far been considered as one of the key drivers for harmonization.[145]

Historically, European spectrum management has been primarily the prerogative of the member states; however, the Commission has always had a coordinating role, especially regarding the establishment of harmonized radio spectrum bands.[146] This "coordination" role is visible in the ECRF provisions such as under the Article 9 of the Framework Directive—as carried over to Article 45 of the EECC—that stipulates Member States to ensure the effective management, allocation, and assignment of radio frequencies based on objective, transparent, nondiscriminatory and proportionate criteria, and promote the harmonization of use of radio frequencies across the Community in accordance with the 2002 Radio Spectrum Decision (Decision No 676/2002/EC).[147] Also, certain principles and standards were set out for the Member States to follow, such as safeguarding competition, prevention of harmful interference, application of the least onerous authorization system, technology and service neutrality, and so on.[148] Last but not least, the Commission has been empowered to take "technical implementing measures" in accordance with the 2002 Radio Spectrum Decision concerning the availability of radio spectrum and technical conditions for its efficient use as well as the availability of relevant information.[149] So far, the Commission has issued more than two dozens of radio spectrum decisions[150] to fulfil this coordination role.

144. Marcus and Wernick, 205.

145. Ala-Fossi and Bonet, 338.

146. Ibid.

147. EECC, art. 45(1–2); Framework Directive, art. 9(1–2).

148. EECC, art. 45(2), recitals 125–27.

149. See Framework Directive, art. 9(2); 2002 Radio Spectrum Decision, art. 1.

150. Regarding radio spectrum decisions, see European Commission, "Shaping Europe's Digital Future."

This coordination-oriented harmonization scheme (see Figure 1) has been supported by further steps of institutionalization. In 2002, not only has a transition to a more simplified framework from the ad hoc regulatory approach taken place,[151] but also several advisory committees were established. With the 2002 Radio Spectrum Decision, the RSC and the RSPG were established setting out a comitology governance system. According to this, the Commission should consult the RSC and the RSPG respectively, for standards and policy issues, broadly speaking. It is also remarkable that the European Conference of Postal and Telecommunications

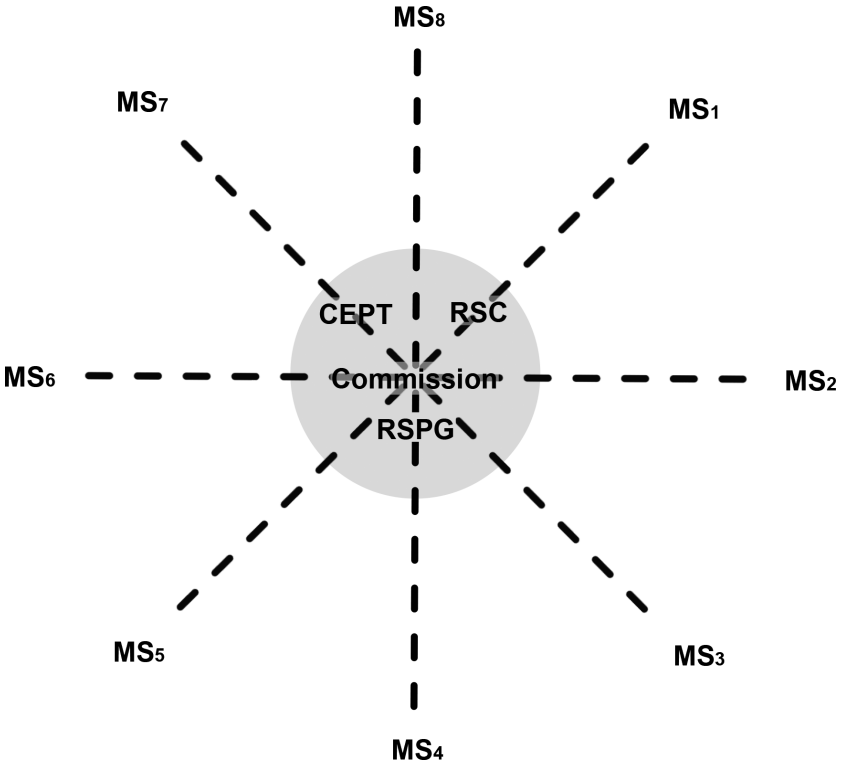

FIGURE 1 Coordination.

151. Under the 2002 framework, the ad hoc regulatory approach that was developed against the day-to-day needs regarding (reservation of certain) frequency bands for certain purposes was left behind. Through the so-called preceding period, many individual directives were adopted including the Directive 87/372/EEC (GSM Directive), Directive 90/544/EEC (ERMES Directive), Directive 91/287/EEC (DECT Directive), Directive 96/2/EC, Directive 97/13/EC, and Directive 97/51/EC.

Administrations (CEPT), if not an EU organization, has wide-ranging mandates as to standardization among the European countries including 14 non-EU countries.

Initially at the heart of the harmonization agenda was the need to ensure interoperability and set the standards at the EU level. Within the introduced system (of EU-wide coordination), Member States would be able to govern their own spectrum policies almost freely within their national domains. There was no requirement like market analysis procedures to check out the national policies, except with the formal modalities of exchanging best practices among the stakeholders (i.e., Commission, national spectrum authorities, and RSPG) to support the coordination of national policy approaches. That is to say, the Member States were enabled to shape out their spectrum policies and regulatory approaches within the broadly designed boundaries of the ECRF that basically served to coordinate allocation of spectrum frequencies under the EU-wide standards and technical rules.

Further steps for coordination have been taken in 2009 with the enactment of Better Regulation Directive that amended Framework and Access Directives, toward a more consolidated European radio spectrum policy. Thereafter, the Commission has been empowered to submit legislative proposals for the establishment of multiannual Radio Spectrum Policy Programmes (RSPPs) that will "set out the policy orientations and objectives for the strategic planning and harmonization of radio spectrum."[152] In September 2010, the European Commission published a draft proposal for a decision establishing the first RSPP, which then has been approved by the European Parliament and the Council on March 14, 2012.[153]

Against this background, the political steps and milestones to that date have developed into a harmonization scheme that consists in "cooperation" as well as "coordination" in the post-2009 environment. The newly set legal framework established that Member States cooperate with each other

152. According to the renewed Framework Directive, these proposals were needed to be submitted to the European Parliament and the Council for approval (Framework Directive, art. 8a/3, as amended with the Article 1(9) of the Better Regulation Directive).

153. According to Article 3(1) of the RSPP, Member States should, including but not limited to, "encourage passive infrastructure sharing where this would be proportionate and non-discriminatory, as envisaged in Article 12 of Directive 2002/21/EC" (para. (h)); "seek to avoid (. . .) the excessive accumulation of rights of use of radio frequencies by certain undertakings which results in significant harm to competition" (para (i)); "reduce the fragmentation and fully exploit the potential of the internal market" (para. (j)) (Decision No 243/2012/EU ("RSPP") art. 3(1)).

and with the Commission in a transparent manner, in order to ensure the consistent application of the following general regulatory principles across the Union:

a. Applying *the most appropriate and least onerous authorization system* possible in such a way as to maximize flexibility and efficiency in spectrum use
b. Fostering *development of the internal market* by promoting the emergence of future Union-wide digital services and by fostering effective competition
c. *Promoting competition and innovation*, taking account of the need to avoid harmful interference and of the need to ensure technical quality of service in order to facilitate the availability of broadband services and to respond effectively to increased wireless data traffic
d. *Defining the technical conditions of the use of spectrum*, taking full account of relevant Union law, including on the limitation of the exposure of the general public to electromagnetic fields
e. *Promoting technology and service neutrality* in the rights of use of spectrum, where possible[154]

These governing principles represent the key features of the new harmonization scheme under which both coordination and cooperation are intended to work out resulting in more dynamic relationships among the stakeholders as illustrated in Figure 2.

While the Member States were asked to cooperate with each other and the Commission based on the referred principles, the way how this cooperation would take place institutionally is not detailed under the ECRF. RSC and RSPG seem to function as the bridges between the Commission and the Member States. It was established the Commission would seek the opinion of the RSPG in advance of proposing common policy objectives as well as multiannual RSPPs to the European Parliament and the Council.[155]The harmonization scheme of "cooperation and coordination" has then been carried over to the EECC in an enhanced form. With the recent amendments through the EECC, RSPG's advisory role is enhanced so as to cover an increased number of tasks including but not limited to

154. RSPP, art. 2(1).

155. See Framework Directive, 8a (3–4) as amended with the Article 1(9) of the Better Regulation Directive; RSPP, art. 9(2) and 13; EECC, art. 4.

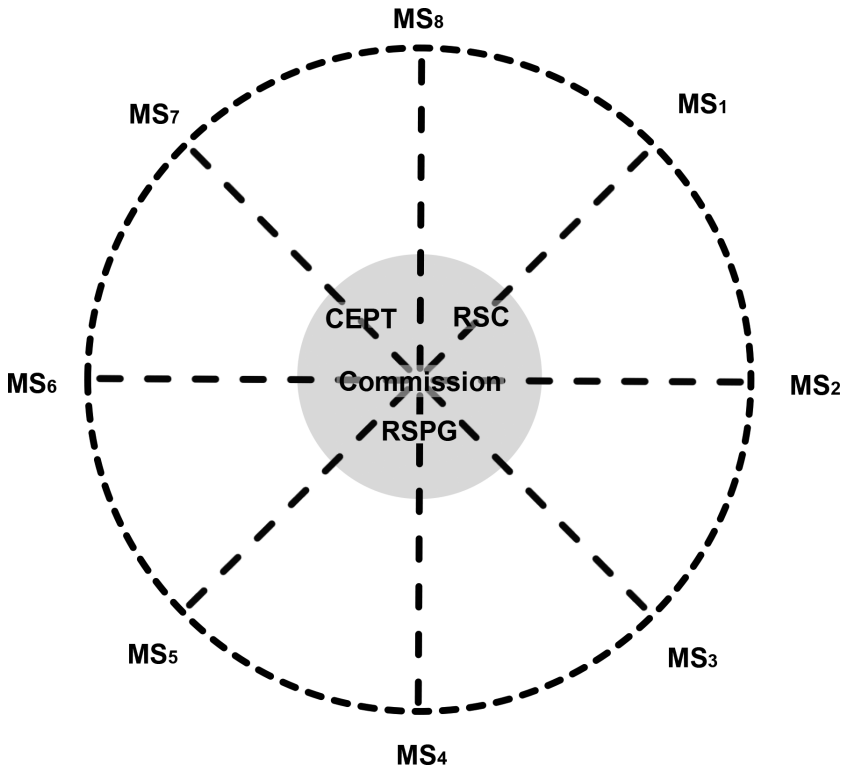

FIGURE 2 Coordination and Cooperation.

- The adoption of a common deadline for allowing the use of a radio spectrum band (EECC, recital 134),
- Establishing multiannual RSPPs, setting out the policy orientations and objectives for the strategic planning and harmonization of the use of radio spectrum (EECC, Article 4(4)),
- Resolving disputes between Member States on cross-border issues (EECC, Article 28),
- Examination of any draft measure that falls within the scope of the comparative or competitive selection procedure (EECC, Article 35(1)),
- Exceptionally taking the initiative to convene a Peer-Review Forum in accordance with the rules of procedure for organizing it in order to exchange experiences and best practices on a draft measure relating to a selection procedure (EECC, Article 35(2)),

- Rendering opinion in the case of divergences out of national implementations, before potential adoption of recommendations or decisions by means of implementing acts (EECC, Article 38),
- Opining on the implications of any standard, specification for the coordination, harmonization, and availability of radio spectrum (EECC, Article 45(2)) and
- Development of technical implementing measures for a radio spectrum band, seeking an opinion regarding the most appropriate authorization regimes for the use of radio spectrum in that band (EECC, Article 45(2)).

For this "enhanced" (cooperation and coordination) scheme to work out, the needed guidelines or signposts are also embedded in the EECC provisions that are mostly based on the earlier directives and decisions, as can be seen through Articles 4, 28, 37 of the EECC. Further to these, a set of requirements including procedural rules, technical principles, and deadlines are imposed on Member States with the EECC.[156] Last but not least, the EECC enlarges the perspective national authorities should have and reflect in their national policies concerning access to passive and active infrastructure toward a more efficient spectrum use and access. Considering this broader regulatory approach, there arguably exists a regulatory mapping under the ECRF by which the abovementioned dilemma continues, as can be inferred from Article 61(4) EECC exemplifying empowering the NRAs with a lessened discretion.[157]

156. For instance, the EECC obliges the Member States to take all the appropriate measures for the reallocation of certain frequency bands (3,4-3,8 GHz and at least 1 GHz of the 24,25–27,5 GHz under certain circumstances) to mobile from broadcasting services before the end of 2020 under Article 54 of the EECC. Not only this but also many requirements concerning choice of the authorization regime (i.e., between general authorization and individual right of use), selection procedures (e.g., between beauty contest and auction), conditions for spectrum trading and transfer, limitations for granting rights to use, denote a considerable increase in the number of check and balancing mechanisms concerning spectrum regulation.

157. According to this EECC provision, national authorities would be able to "impose on undertakings providing or authorized to provide electronic communications networks obligations in relation to the sharing of passive infrastructure or obligations to conclude localized roaming access agreements, in both cases if directly necessary for the local provision of services which rely on the use of radio spectrum" and "where access and sharing of passive infrastructure alone does not suffice to address the situation (. . .) may impose obligations on sharing of active infrastructure" (EECC, art. 61(4)). Further to these, additional criteria are set out under the Article 61(4–5) of the EECC for the competent spectrum authorities to consider regarding the abovementioned access obligations. Also, it is stipulated that these obligations be assessed every

Considering the new sophistication in the EECC provisions, one can conclude that the EU legislator intends to gear up the coordination and cooperation to a higher level toward further harmonization. Given the whole regulatory structure and the detailed governing principles, more scrutiny can be gauged at the supranational level regarding the prospective radio spectrum decisions of the Member States, in the sense that their decisions would be far more assessed by the RSPG and the Commission. To that end, the newly born mechanism of "peer-review forum" seems to be the most convenient tool under the EECC.

Peer-review forum, as an important harmonization tool, means an obligatory process under the newly created Article 35 of the EECC. According to this provision, when national authorities intend to undertake a selection procedure to enable use of a radio spectrum for wireless broadband networks and services, they need to inform the RSPG about any draft measure they aim to take.[158] In addition to such forum meetings, the RSPG may also exceptionally take the initiative on its own to convene a peer-review forum in order to harmonize the conditions of spectrum access and regulation across the EU (i.e., where the draft measure would harm the ECRF objectives).[159]

While the peer-review forum is described as an instrument of "peer learning" to disseminate best practices, the vision of the EECC also demonstrates that a more convergent environment for the spectrum regulation is aimed through running this process.[160] This notion of regulatory convergence makes the RSPG situated in a more central place, built on the premise of facilitated exchange of views concerning the draft measures (i.e., within the scope of the comparative or competitive selection procedures that entail limiting rights of use for radio spectrum).[161] By means of this mechanism, the Commission clearly aims to gather all the relevant information, even the information that is not directly related to the award processes, potentially with a view to set out more harmonized procedures

five years at latest, following the procedures referred to in Articles 23, 32, and 33 (EECC, art. 61(4)).

158. EECC, art. 35 (1). Thereby, every NRA (or competent authority) should indicate whether and when it is to request the RSPG to convene a peer-review forum within the meaning of Article 23(2) EECC.

159. EECC, art. 35(2). See also EECC, recital 88.

160. See EECC, recital 88.

161. EECC, art. 35(1).

and conditions for spectrum use, presumably through a common reporting system.[162]

Given this, peer-review forum is regarded as a leverage for further harmonization toward the goals of promotion of the internal market and regulatory predictability as well as effective and efficient use of radio spectrum.[163] Regardless of the critiques regarding effectiveness of this process,[164] creation of peer-review forum apparently elevates the harmonization scheme (of "cooperation and coordination") under the ECRF. Although the Member States still have the final say as to the assignment of the individual rights of use concerning the spectrum frequencies (e.g., reallocation of 800 MHz for high-speed wireless broadband), the Commission clearly gains more foothold toward a more harmonized regulatory landscape.

Within this framework, the mechanism of peer-review forum facilitates the aim of harmonization through disseminating best practices. However, the complicated and sophisticated nature of the EECC incorporating a great many rules and principles would mean an enhanced supranational ability to monitor national decisions regarding spectrum issues. Nevertheless, given the absence of directly applicable supranational power over such decisions, it is considered that distinct national approaches and practices would take place with the possibility of both coevolution and reflexive harmonization. By the similar token, regulatory competition would be likely within the boundaries of spectrum regulation left for the national policy makers, although this should not be understood as a typical US competition model considering the EU legal system. On the other hand, these scenarios largely depend on the channels of regulatory experimentation and innovation being kept alive and the extent to which peer-review forums are used for that purpose.

Ultimate Ends: Centrifuging or Engineering?

Enhanced regulatory principles and mechanisms as well as the vision of regulatory convergence would potentially end up furthering harmonization at the EU level. EECC provisions regarding spectrum regulation (e.g., extensive requirements and principles) along with the mechanisms toward convergence would be argued to signal an engineering approach in the

162. See EECC, recital 88.

163. See EECC, art. 35(4).

164. Flanagan, 409.

future.[165] By contrast, this would be found to be speculative since the comprehensive design of the EECC would pose alternative routes for the policy making. From a broader point of view, neither "cooperation and coordination" nor "engineering" can explain the EU's standpoint regarding spectrum regulation.

The EECC's provisions and measures toward harmonization in this area could be better described with the term "centrifuging." In this harmonization scheme, a higher level of cooperation among the stakeholders is figured on the EU agenda along with a more institutionalized basis. Going beyond pure exchange of best practices, RSPG-led processes including peer-review forums represent tools of further harmonization toward a converged environment concerning authorization regimes, selection criteria, and award procedures. This would mean a regulatory structure based on the momentum out of enhanced cooperation mechanisms, as illustrated in Figure 3.

Under this light, the chosen term of "centrifuging" entails mobilized national spectrum policies to the effect that they revolve around the EU-centric rules and principles. Hence, Member States should have a freedom to design their spectrum policies and make their individual decisions. Regulatory convergence is, or at least should not be, the primary aim of this "centrifuging" system for as long as Member States spin around the ECRF, considering convergence would come about as a natural outcome of the created momentum.[166]

By means of the centrifugal force (from the centrum to the periphery) Member States are supposed to draw similar trajectories if not totally the same as having a continuous spinning pace and benefitting from the resultant momentum. This EU-centric momentum paves the way for them

165. This is persuasive in view of the relevant EECC provisions such as Article 38(1) that enable the Commission to "adopt recommendations or (. . .) decisions by means of implementing acts to ensure the harmonized application of this Directive and in order to further the achievement of the objectives set out in Article 3" in case of "divergences in the implementation by the national regulatory or other competent authorities of the regulatory tasks specified in this Directive."

166. This approach could be criticized against the EECC's notion of harmonization that could be derived from the Article 38 of the EECC where lack of convergence stands out as a reason for harmonization measures (see supra note, 169). Notwithstanding, this does not represent the only aim for harmonization since the evaluation against the general objectives (enshrined under the Article 3 of the EECC) is specified another reason for a potential intervention. In the overall analysis of this article, the latter approach namely the evaluation against the general objectives is given a prioritized role for harmonization, considering the principles of "subsidiarity" and "proportionality" and the relevant case-law (i.e., *Tobacco Advertising*) (see supra note, 27).

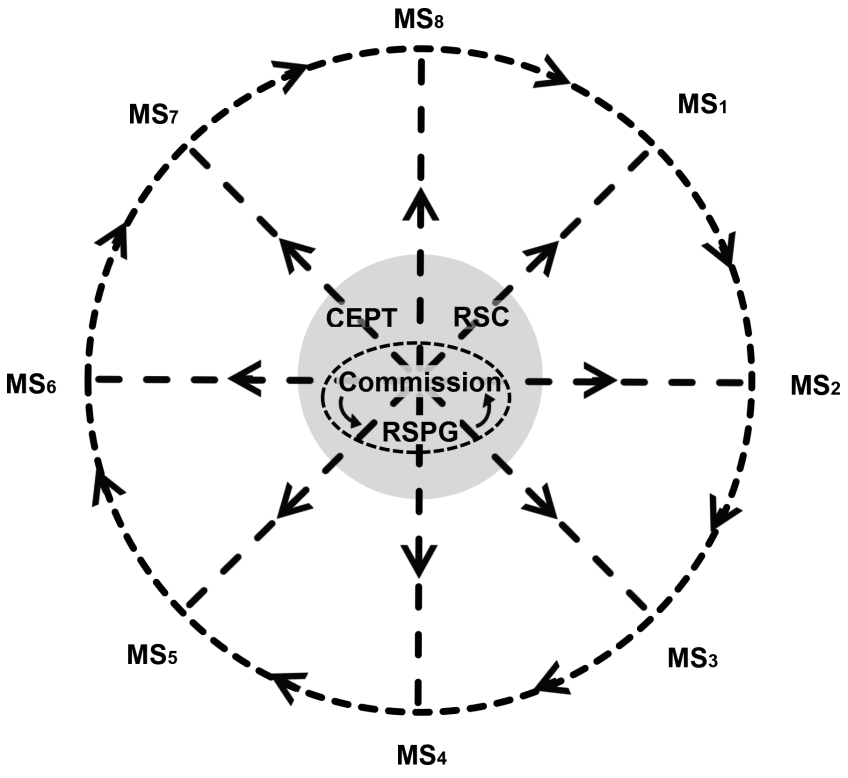

FIGURE 3 Centrifuging.

to be connected to each other as well as to the centrum. Their distance to the centrum would not be a matter of concern by itself insofar as they pursue the EU standards as well as cooperating with each other and the Commission. Eventually, every peripheral force would choose their respective way of harmonization via which they maintain their centrifugal and peripheral connections. This harmonization scheme thus depends on the enhanced cooperation, coordination, and resonance of the stakeholders.

From this point of view, both coevolution and reflexive harmonization can develop under this approach whereas the same cannot be concluded under an engineering model. It needs to be emphasized the minimum distance required for the needed momentum is lifted under the engineering model that is often depicted by the EU's intrusion toward the periphery. In the case of market analysis procedures, the so-called minimum distance is almost removed since the Commission is extensively involved in the process of determining the SMP players and their obligations. This does not mean performing the market analysis but having a determinant role (i.e., through the veto power and double-lock system). Overall, an

"engineering" rather than "centrifuging" approach is identifiable from the EECC's market analysis procedures or the so-called SMP regime.

As far as the national spectrum policies are concerned, it seems that the referred distance between the stakeholders is left to the reasonable limits and interaction of centrifugal and peripheral forces mostly based on dissemination of best practices. According to this harmonization model (of "centrifuging"), national authorities stay as the decision makers, notwithstanding the enhanced cooperation, increased standards, and heightened the role of RSPG. Despite the fact that assessment of the competitive effects of "spectrum regulations" is required from the lens of a "market analysis" approach and the perceived link between these two,[167] the "centrifuging" model relation to the former (spectrum decisions) needs to be distinguished from latter (market analysis procedures).

Within the former harmonization model, the Commission's tools are limited to centrifuging the national practices on the axis of enhanced cooperation, whereas within the latter model, the decision-making process is turned into engineering of the proposed remedies. Throughout this engineering, peripheral and central forces have confrontation with each other, with an effect of neutralizing the potential momentum normally to be derived from the centrifugal forces. Figure 4 illustrates this pushback effect, which often results in depletion of the mobilized regulatory resources as they come along from the opposite sides. The outcome means lack of further harmonization as opposed to what is intended. Within this environment of engineering model, regulatory experimentation is not permitted at all. Emerging examples out of the NRAs' margin of appreciation are often filtered by the Commission toward further harmonization; which however cannot be as successful as expected given the pushback effect resulting in the absent or minimized momentum.

Against this background, confrontation of peripheral and central forces seems to be the key factor inhibiting the momentum. This brings out the importance of the channels of communication and procedures having the potential to turn the so-called confrontation to a positive momentum. Every stakeholder would then benefit from the ultimately achieved results that one might qualify and describe with "centrifuging" rather than

167. Last paragraph of the Article 52(2) of the EECC requires the national regulatory and other competent authorities to base their spectrum decisions on an objective and forward-looking assessment of the market competitive conditions, and in so doing to "take into account the approach to market analysis as set out in Article 67(2)."

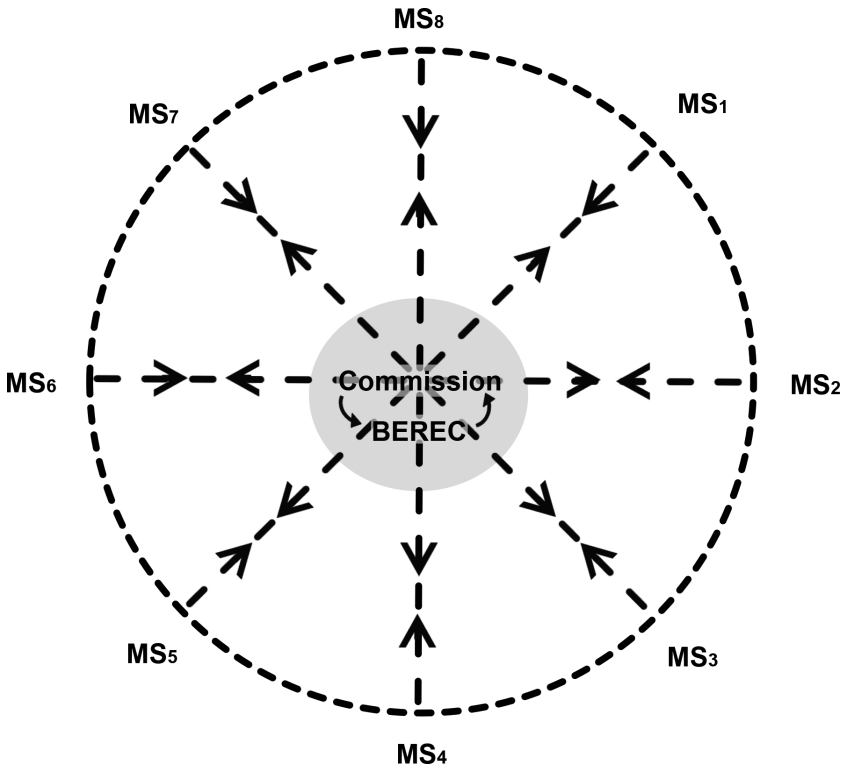

FIGURE 4 Engineering.

"engineering" as a model of harmonization. In that case, the peer-review forum should not be a leverage for imposing the top-down EU agenda but a mechanism through which the stakeholders cooperate and create a momentum based on dissemination of best practices that potentially results in a larger room for experimentation and innovation.

Conclusion

The EU could be considered as a harmonization project arising out of the freedoms of goods, persons, services and capital, and accompanying rights (e.g., right to establishment). Based on the hard-core right and freedoms, EU harmonization has a nature evolving into different forms and models in each sector, particularly in conjunction with liberalization and competition policies. Different trajectories conflated with the institutional actors made various theoretical approaches (e.g., coevolution, regulatory competition, reflexive harmonization) surface and are discussed regarding the EU

harmonization. This article, based on these theories, endeavors to explain the harmonization discourse in the EU with a focus on the electronic communications sector.

Alike with other utility sectors, electronic communications (formerly called as telecommunications) sector is portrayed with the global wind of liberalization and efforts to eliminate the market failures in the last decade of 20th century. After the commencement of (re-)regulation following the liberalization, more coercive tools and sophisticated mechanisms at the EU level started to appear in the 2000s. Since the 2009 reform, the centralized powers had a predominant and prevailing impact on the Member States along with further institutionalization (i.e., based on foundation of BEREC and RSPG) that have become highly dependent on the Commission's agenda. Like the BEREC's role in market analysis procedures, RSPG's role and involvement in national spectrum policies have increased in the post-2009 environment, which reached to its peak in 2018 when the EECC has entered into force. The sophisticated and highly centralized institutional mechanisms however resulted in lessened experimentation and innovation in the European landscape, which correspondingly restricted regulatory competition and coevolution.

This trend of "centralization," although being not at the same degree in every area of regulation, is hardly justifiable with the need of "harmonization." EU authorities' linking the latter to the former points to a vision of regulatory convergence, which however should not be taken as a blueprint for harmonization. Centralization would be acknowledged when there is a risk of "race-to-the-bottom" or "reverse free riding effect" as can be exemplified with the case of opening the broadcast spectrum (first digital dividend) in the 800 MHz frequency.[168] Had the Commission not taken an active role in reassignment of this spectrum frequency for high-speed mobile broadband, Member States would be lost in the political circles of regulatory governance and/or fail to act for effective use of this valuable spectrum. However, the same cannot be easily mentioned about market remedies and/or spectrum regulations with regard to sharing of passive or active network elements. The rhetoric of further harmonization being invoked for wide range of regulatory purposes would result in a push-back effect, as can be seen through market reviews and accompanying interventions that all pose an engineering model.

168. See European Commission, "Commission Decision of 6 May, 2010."

Having said that, many areas of ex ante regulation would need innovation arising out of experimentation rather than an engineered model of regulation. This is particularly compelling in the face of new challenges (i.e., growing importance of unlicensed spectrum as well as IoT, the need to find new and real-time ways to monitor interference, problems related to spectrum sharing, issues of transmitter and receiver performance).[169] Likewise, many new and challenging areas of network access would need to undergo "trial and error" experimentation to make the necessary trade-off decisions (e.g., for optimizing market competition and NGA investment) against the long-lasting problems of "dynamic consistency" and/or "regulatory commitment."[170]

From this point of view, the "engineering" model of market analysis approach would be less preferable when compared to the "centrifuging" model emerging for the spectrum regulations under the EECC. According to the former, the regulatory path for the NRAs is designed in a step-by-step approach facing the adverse consequences (i.e., pushing back regulatory innovation) whereas the latter subsists with the mechanisms enabling dissemination of best practices (i.e., peer-review forums) based on the governing principles and requirements (i.e., regarding authorization regimes, spectrum trading, limitation of individual rights, preventing harmful interference). Behind such differences lies the main fact that centrifuging model does not stimulate confrontation of stakeholders or deplete their regulatory resources (i.e., by neutralizing or passivating potentially innovative solutions) as illustrated in the market analysis procedures.

Although there is no blueprint for harmonization, harmonization ends and measures often need to be fed by experimentation to find out the best possible solutions both at the EU and national level. While it is widely acknowledged by the EU institutions that "one size fits all" approach is counterproductive,[171] the legislative footprints uncovered in this article demonstrate that there is a clear intent to make the national practices converge toward prescribed norms and standards and the fine line between the harmonization and legal convergence seems to be blurred for the examined sector, given the functioning of the existing mechanisms (e.g., market analysis procedures and peer-review forums alike).

169. Cave and Webb, 16–17.
170. See Unver, 975.
171. Bulmer et al., 91, 115.

From this vantage point of view, the intended regulatory convergence would ideally be realized in natural forms and processes, through dissemination of best practices instead of through top-down agenda of the Commission, except where there is no risk of "race-to-the-bottom" or "reverse free riding effect." Having said this, the option of reflexive harmonization would be a potential saver for it can enable both regulatory experimentation (i.e., by mobilizing the local/endogenous actors) and predictability (i.e., setting out the goals along with the necessary directions). From this point of view, the EECC provisions regarding spectrum regulation that denote a "centrifuging" rather than an "engineering" model should be noted as more permissive of reflexive harmonization.[172]

Under this light, regulatory experimentation and innovation need to surface more in the EU harmonization agenda so as to embrace and infuse reflexive harmonization particularly in the regulatory governance of dynamic sectors such as electronic communications. This point would make anyone remind of the intra-EU pitfalls over the globalized debate of regulatory competition and experimentation. In fact, regulatory competition in the recent decade appears to gain a globalized dimension embodying the EU particularly around the ICT policies. EU's strategy in this era appears to be on the global lead in some areas of regulation (i.e., GDPR, digital platforms and AI)[173] as well as maintaining the sophistication in the regulatory arena. The EU seeks an advantage of higher-level transplantations and to gain a competitive foothold on the global scale, while not permitting regulatory experimentation and innovation in itself. Peculiarly, the EU as a global actor is prone to transfer its conventional wisdom of ex ante regulation with differentiated formulas across to other ICT sectors than electronic communications (e.g., digital platforms). However, in the long run, the abovementioned problems arising out of this approach would reappear against the so-called globalized regulatory competition that exceed supranational borders and would require collaboration (i.e., peer-review forums) at the global level to find innovative and dynamic solutions.

172. Although not being typical examples of reflexive harmonization, a number of recently adopted EU regulations such as the Regulation 2015/2120 and the Regulation 2018/1807 enable or propose self-regulatory measures within their broadly designed scope.

173. See European Commission, "EU's Digital Strategy," see also Shapiro.

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