Review

Factors of Change: The Influence of Policy Environment Factors on Climate Change Mitigation Strategies in the Transport Sector

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Abstract: There is a large potential for cost-effective solutions to reduce greenhouse gas emissions and to improve the sustainability of the transport sector that is yet unexploited, in particular in the urban context. Considering the cost-effectiveness and the potential for co-benefits, it is hard to understand why energy gains and mitigation action in the transport sector is still lagging behind the potential. Particularly interesting is the fact that there is substantial difference among countries with relatively similar economic performances, such as the OECD countries in the development of their transport CO2 emission over the past thirty years despite the fact that these countries had relatively similar access to efficient technologies and vehicles. This study aims to apply some well established political science theories on the particular example of climate change mitigation in the transport sector in order to identify some of the factors that could help explain the variations in success of policies and strategies in this sector. The analysis suggests that institutional arrangements that contribute to consensus building in the political process provide a high level of political and policy stability which is vital to long-term changes in energy end-use sectors that rely on long-term investments. However, there is no direct correlation between institutional structures, e.g. corporatism and success in reducing greenhouse gas emissions in the transport sector. Environmental objectives need to be built into the consensus-based policy structure before actual policy progress can be observed. This usually takes longer in consensus democracies than in politically more agile majoritarian policy environments, but the policy stability that builds on corporatist institutional structures is likely to experience changes over a longer-term, in this case to a shift towards low-carbon transport that endures.

Keywords: Sustainable transport; policy implementation; governance; institutions

1. Introduction

The transport sector accounts for about 14% of global CO2 emissions and it combines a number of other interesting factors. The transport sector stands out in comparison with other sectors by its almost entire dependence on one source of energy supply, i.e. oil, which is a key subject of energy security concerns. It is consumed primarily in the transport sector that is less diversified than any other energy-consuming sector. While the electricity sector draws its energy demand from a range of fossil and renewable sources, global transport energy demand is met 95% by oil. Only a few countries have made noticeable progress to curb transport sector greenhouse gas emissions whereas others have almost entirely failed (Davis and Diegel 2007). It is argued that a number of factors contribute to different policy outcomes in OECD countries. Differing pressures from climate change and energy security are likely to influence the time and scale of policy responses, but epistemic communities and institutional relationships are the vital elements that impact on the success of fuel efficiency policies for the transport sector, according to the hypothesis of this study. The combination of economic, and

environmental policy objectives makes the transport sector a particularly interesting case for an in-depth analysis of climate change policies. Transport energy efficiency polices will be used as an example to examine, in more detail, the differences in policy making in different institutional frameworks.

The political environments can be very different from country to country, which affects the capacity to implement sustainable transport and other climate change mitigation measures. This study aims to explore the relevance of several political science theories to the climate and energy policy context. There are a number of studies examining the influence of the concepts of corporatism, coordinated market economy, consensus democracy, epistemic communities, European integration and centre-left and green party strength on environmental performance (see for example: Haas 1992, 1999; Jahn, 1998; Scruggs, 1999, 2001; Neumayer 2003; Bernauer & Koubi, 2009). Most studies focus on higher-level environmental performance indicators and their relationship to specific institutional settings (Lundqvist 1980; L. A. Scruggs 1999; L. Scruggs 2001; Congleton 1992; D Jahn 1998). This paper builds on these studies, but beyond that, aims to show a causal relationship between institutional frameworks and their impact on policy agenda setting and the implementation of policies and specific outcomes in the transport sector, which has often been described as one of the hardest to de-carbonise (ITF 2010; IEA 2012a; Edenhofer et al. 2014). A set of institutional factors will be compared to the presence (or absence) of key climate change mitigation policies and a number of energy and climate indicators for this sector.

Some of the key institutional indicators are compared with policy output and aggregated quantitative data on transport sector energy consumption and greenhouse gas emissions, which will aim to shed some light on the relationship between institutional arrangements and the success or failure of policies to de-carbonise the transport sector. While this will not show a linear relationship between the institutional settings and outcomes, it aims to highlight a potential relationship.

2. Factors for Continuity and Change

The pressure from environmental, energy security and economic drivers to implement policies that increase the efficiency of the transport sector is profound. While it is fair to say that a majority of countries are not acting sufficiently, a number of countries are performing considerably better than others in curbing energy consumption and carbon emissions from transport (IPCC 2014a). Provided that technologies to reduce greenhouse gas emissions are available (IPCC 2014a; Figueroa Meza et al. 2014) and policy mechanisms to support the uptake of these technologies are proven to be effective (Gross, R., Heptonstall, P., Anable, J., Greenacre, P. 2009) then the question arises:

> What factors influence the policy environment in which transport energy efficiency policies can be successful over the long-term?

Energy and climate change policies for the transport sector require a consensus on the need for policy intervention and a strategic, coherent and stable operating environment. Policy interventions in the transport sector, such as fuel and vehicle taxation, are highly visible and politically sensitive. They require a strong political commitment to appear on the policy agenda and to remain in place as they rely on investments that are only cost-effective over the medium to long-term (IEA 2010a; IPCC 2014a). The hypothesis here is that successful transport sector energy efficiency measures are:

- more likely to be implemented in a policy environment that is based on shared methods and values, and
- more likely to be successful over the long-term in a consensus orientated policy environment.

It is hypothesised that in a policy environment influenced by uncertainty, a shared set of methods and values is vital for policy agenda setting, usually delivered through epistemic communities. This paper considers the following factors as vital contributors to enable epistemic communities to influence policy agenda setting and for policy continuity and political consensus,

corporatism, coordinated market economy and consensus democracy. These concepts are applied to the climate change and energy policy context. Additional influencing factors are assumed to be the level of integration into the supra-national policy framework of the European Union and the strength of centre-left parties and green parties. This includes an analysis of the level of dependence of climate change mitigation policies on support from these parties and if and how policies evolve following changes of government.

3. Testing Institutional Factors and Their Relationship to Policy Outputs and Outcomes

3.1 Epistemic Communities, Societal Consensus and the Uncertainties of Climate Change Impacts

While the basic physics of anthropogenic climate change are scientifically robust, there remains uncertainty over the scale and timing of climate change impacts, which makes policy making much more complicated than in other areas (IPCC 2007). The adoption of a precautionary approach is therefore vital and "lack of full scientific certainty shall not be used as a reason for postponing cost-effective measures to prevent environmental degradation" (United Nations Conference on Environment and Development 1992). The debate has moved in many countries from climate science to climate action. Since the First Assessment Report was published by the Intergovernmental Panel on Climate Change in 1990, some countries have steadily progressed climate change mitigation policies, while others have experienced substantial political volatility in this area. Uncertainty about the potential impacts of climate change makes decision-making very difficult and complex. A critical factor from the policy makers' perspective is the impact chain, characterised by increasing scientific uncertainty, which is related to the complex nature of the global climate system (ITF 2010). While the scientific understanding of the impact pathway has improved, climate change policies are often stalled by uncertainty about risks (World Energy Council (WEC) 2008). Issues such as climate change require particular sorts of information, which are not based on ideology, guesswork or raw scientific data, but are a human interpretation of social and physical phenomena (Haas 1989; Haas 1992). It is hypothesised that epistemic communities are vital in providing this information to enable policy action and consensus building. The members of an epistemic community share the same values and understanding of causal relationships, which creates the foundation for policy decisions in consensus or compromise (Katzenstein 1978; Baldwin 1979; Haas 1999). An epistemic community can produce consensual knowledge, even if the level of scientific evidence is uncertain or inconclusive (Haas 1992; Craig and Porter 1997).

Epistemic communities are a "network of professionals with recognized expertise and competence in a particular domain and an authoritative claim to policy-relevant knowledge within that domain or issue-area" (Haas 1992). Regardless of the professional background, epistemic communities have a shared set of normative and principled beliefs, which provide a value-based rationale for the social action of community members. They share causal beliefs, which serve as the basis for identifying linkages between possible policy actions and desired outcomes (Haas 1992). Epistemic communities provide a key input into the policy process, which is particularly effective in certain institutional structures. In corporatist structures, participation in the policy process is limited to a small number of societal actors who collectively form an epistemic community that has a shared set of values. Members of this community are able to influence policy agenda and they also provide policy stability.

Unfortunately, there are no clear indicators available for epistemic communities to confer on climate change, let alone sector specific ones. As a proxy for public perception and a societal consensus about the importance of climate change, outputs from a 2013 Gallup poll have been used and correlated with the change of per capita CO2 emissions in the transport sector over ten years (2003 – 2013) for the G20 countries.

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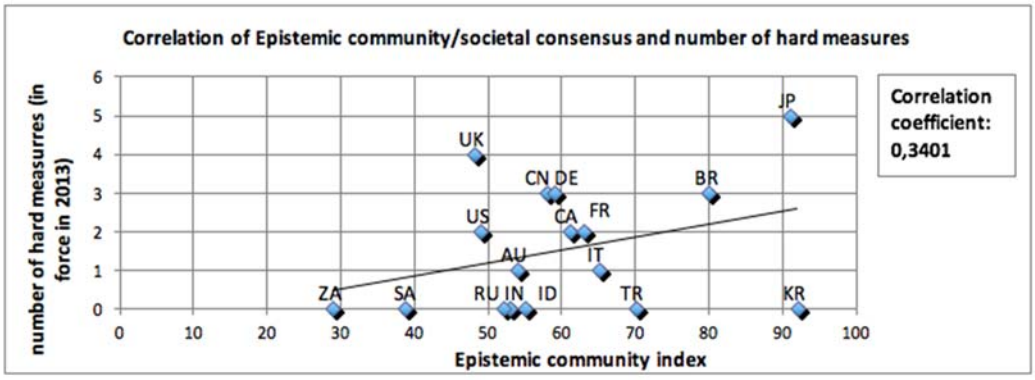

Figure 1 Epistemic community/societal consensus and CO2 average emissions in the vehicle fleet

The correlation shows a link between the public awareness and the societal consensus on climate change and the number of hard measures in the transport sector. This, however, does not directly translate into an actual change in per capita CO2 emissions (Figure 3). While there appears to be some overall correlation, the values of some countries show a somewhat disparate picture, e.g. over 90% of Chinese respondents agreed that they need to change habits to reduce the impacts of climate change, but per capita emissions have increased rapidly over the last decade (Gallup 2013).

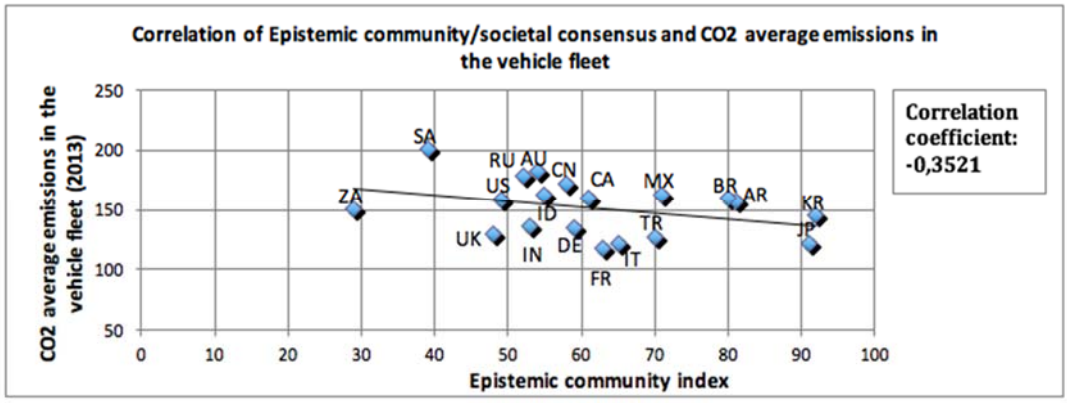

Figure 2 Epistemic community/societal consensus and number of hard measures

Hence, there remains the question what other factors influence the implementation and effectiveness of climate change mitigation polices in the transport sector.

3.2 Consensus Focused Democratic Institutions

A central element of many consensus democracies is a corporatist institutional structure that allows a more coordinated approach to policy making with a small number of large peak organisations (Goldthorpe 1984). This closed shop approach enables the formation of epistemic communities as it substantially limits number of players that need to be convinced. The hypothesised comparative advantage of consensus democracies also relates to a number of other elements that characterise these countries, such as the 'shadow of state regulation' (Scruggs 1999) and a broad acceptance of government regulation due to a history of strong penetration of the state in areas such as the labour market and social policy (Woldendorp 1997). The institutional structures of a consensus democracy are the primary drivers behind political stability and continuity that creates better environmental policies over the long term (Lundqvist 1980; McGuire and Olson 1996). Corporatist institutional arrangements characterised by a strong relationship between large encompassing groups enable decision makers to negotiate policy in a way that is distinctively different from policy making in pluralist, majoritarian democracies (Hall and Soskice 2001). These groups are integrated into the policy process in a country with a corporatist structure and broaden the basis of policies,

which creates a high level of continuity that is required for long-term investments (Lehmbruch and Schmitter 1982). Such coalition building locks groups into certain policy directions that further enhance policy progress, which is almost self-reinforcing (Katzenstein 1977; Katzenstein 1978).

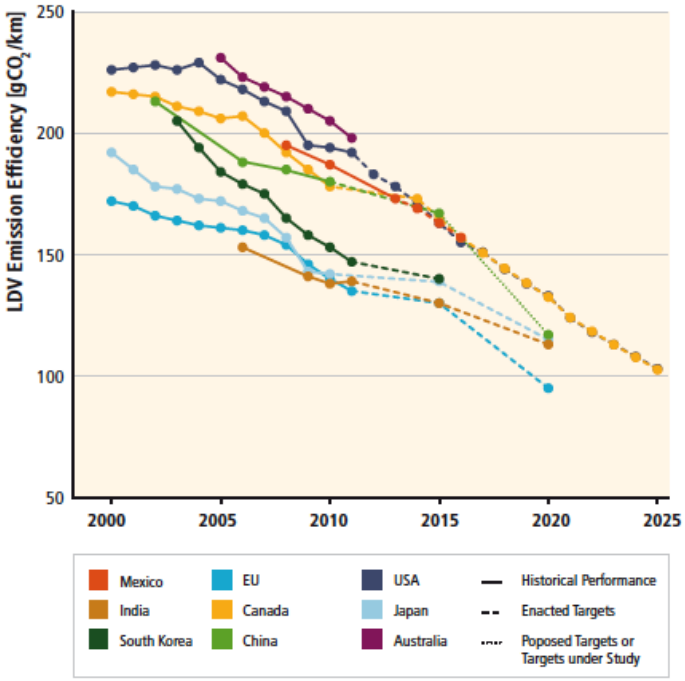

Figure 3 Historic and target vehicle emissions standards for light duty vehicles in selected countries (ICCT 2013)

The institutions that enable a broader consensus amongst politicians and society are described by a large number of scholars using different approaches and definitions. This study aims to apply these theories in a combined approach which will allow an assessment of institutional relationships that goes broader than isolated approaches used in many previous studies. It aims to relate one particular institutional feature to socio-economic or more specific policy outcomes.

Democratic systems can largely be divided into two major categories: majoritarian and consensus democracies (Crepaz 1995; Lijphard 1984; Lijphard 1999). Majoritarian system are characterised by the concentration of power in one-party and minimal winning majority cabinets, a two-party system, non-proportional election systems, interest organisation pluralism, centralised forms of government, unicameral parliaments, constitutional flexibility, absence of judicial review and executive control of the central bank. Consensus democracies on the other hand are characterised by coalition government, balance between executive and legislative power, proportional representation, interest group corporatism, federalism, bicameralism, constitutional rigidity, judicial review and independence of the central bank (Lijphard 1984). These combinations are not a definitive list of characteristics, but an indication of typical elements of countries that can be described as majoritarian or consensus democracies.

Due to its characteristics it could be argued that a majoritarian democracy is decisive and able to implement climate change mitigation measures faster than a consensus focused counterpart (Beer 1998). While this argument may have some merit when looking at the amendments to the vehicle fuel efficiency standards introduced by Australia, Canada and the US in recent years. All three countries are typical majoritarian democracies and changes in the standards have been introduced in the US and Australia by Democratic and Labour-led governments respectively. Canada´s regulation is aligned with the US standards. This shows that change is possible and can be implemented fairly swiftly in majoritarian systems, but this relies on support of the minimal majority, which may change and with that, possibly support for the policy.

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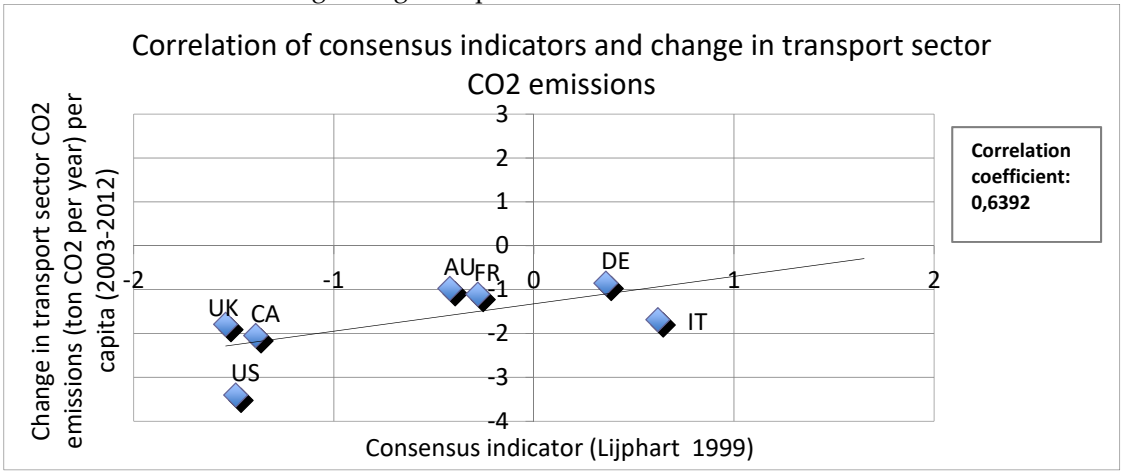
This paper argues that the decisive factor of success for climate change mitigation policies is the reliability of the policy environment over the long term. It challenges the theory that majoritarian democracies are more effective and argues that consensus orientated democracies are more likely to be successful in moving towards sustainable development over the long term. The lower levels of the historic emissions and standards in the EU may be one indication (Fig. 21). The following analysis aims to assess the link between institutional and climate change indicators. This will test the hypothesis that consensus democracies outperform majoritarian democracies by creating a more stable policy environment through more efficient institutional relationships (Lijphard 1999). It is argued that consensus democracies are even more responsive and decisive than majoritarian systems, at least over the longer term, because of the more coordinated interaction with societal actors (Crepaz 1998). This positive impact on the stability of the policy environment depends on a number of elements that are characteristic for a country with a corporatist structure, for example: comparatively encompassing interest groups, the 'shadow of state regulation' and a broad acceptance of government regulation due to a history of strong penetration of the state in areas such as the labour market and social policy (Scruggs 1999).

The institutional structures of a consensus democracy have a positive correlation to the change in transport sector CO2 emission, which indicates that consensus democracies provide a positive environment to climate change mitigation policies in this sector.



Corporatist institutional arrangements characterised by a strong relationship between large encompassing interest organisations that enable decision makers to negotiate policy in a way that is distinctively different from policy making in pluralist, majoritarian democracies. The difference between corporatist and pluralist institutional arrangements has been studied for many years. However, there is still debate about corporatism creating more positive impacts, in particular on socio-economic performance (Schmidt 1982; Cameron 1984) as opposed to negative effects (Therborn 1987; Flanagan 1999). Corporatist intuitional interaction is considered to have less collective protests and strikes (Schmitter 1981), which gives an indication of political stability. It can be claimed that corporatism is beneficial for climate change policy development if the encompassing groups have vital interests that foster environmentally sustainable policies. When looking at the correlation between corporatism and the change in transport sector CO2 emissions, this hypothesis appears to be valid (Figure 5).

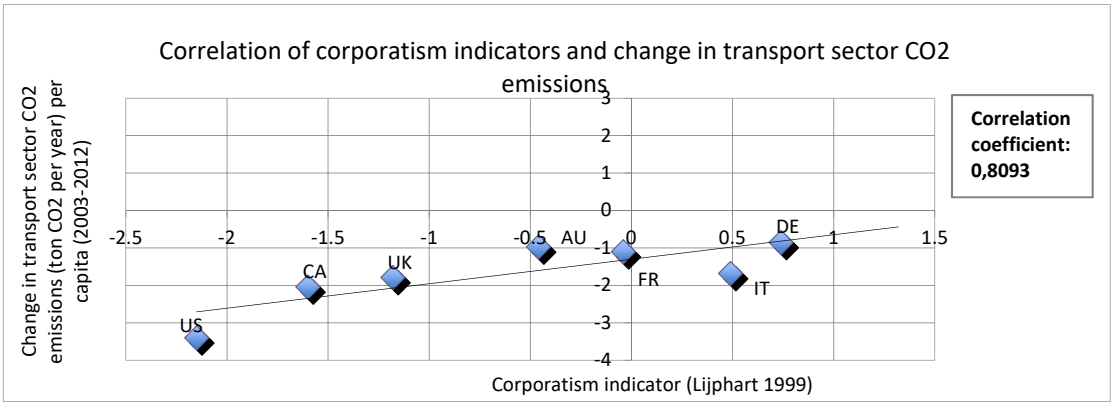


Figure 4 Corporatism indicators and change in transport sector CO2 emissions

These groups are integrated into the policy process in a corporatist country and broaden the basis of policies, which creates a high level of continuity that is required for long-term investments. This coalition building locks groups into certain policy directions that further enhance policy progress, which is almost self-reinforcing (Katzenstein 1977; Katzenstein 1978). A similar effect is expected from consensus democracies and coordinated market economies.

3.3 European Integration

The interrelations between European and domestic politics and policies create a new dimension for societal and political actors (Hall and Taylor 1996; March and Olsen 1989; March and Olsen 1998). The European level opens new opportunities, but potentially also constraints the pursuit of specific political interests. This provides societal actors with an opportunity to advocate for policy measures even if the particular issue has no or little priority on the domestic political agenda (Börzel and Risse 2009). Even more important for the hypothesis of this study are the formal institutions of the European Union, which provide the opportunity for new policy initiatives. They also create a policy environment that is less dependent on national elections and hence less likely to become subject to radical change after an election (Weidenfeld 2010). The "logic of appropriateness" (March and Olsen 1998) and processes of persuasion in the European Union are mediated by the influence of change agents who persuade others to adjust national interests to the overarching European framework and a European political culture which aims for political consensus and cost-sharing (Börzel and Risse 2009). The European Union influences climate and energy polices of its member states both directly and indirectly (Jordan, Schout, and Zito 2004; Vogel 1986; Börzel and Risse 2009). Due to its supra-national character, the European Union is a significant policy driver. How much influence this driver has in comparison with, for example, the United Kingdom and Germany, is examined. Both are members of the European Union, differ significantly in their level of corporatism, but have similar developments in energy intensity in the transport sector. Hence it could be assumed that membership of the European Union is a contributing factor to more political continuity, which will be an alternative hypothesis to be tested in this study.

A high level of integration into the European Union may be an additional factor for policy continuity. It may also result in policy action and may enhance policy implementation, as outcomes are externally monitored. Integration into the European Union as factor of political continuity touches on various concepts, in particular rational choice institutionalism and constructivist institutionalism (see for example: March and Olsen 1989, 1998; Hall and Taylor 1996; Boerzel and Risse 2009). The interrelations between European and domestic politics and policies create a new dimension for societal and political actors. The European level opens new opportunities, but potentially also constraints to pursue specific political interests. This provides societal actors with an opportunity to advocate for example climate change mitigation policy measures even if this issue has no or little priority on the domestic political agenda. Even more important for the hypothesis of this study are the EU' formal institutions, which provide the opportunity for new policy initiatives, but also create

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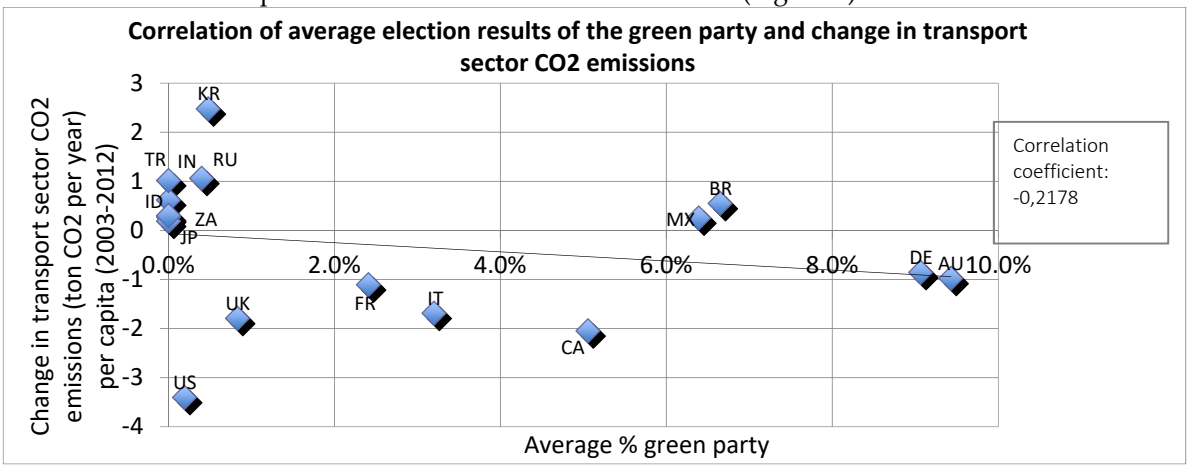
policy environment that is less dependent on national elections and hence less likely to become subject to radical change after an election. The "logic of appropriateness" (March and Olsen 1998) and processes of persuasion in the European Union are mediated by the influence of change agents who persuade others to adjust national interests to the overarching European framework and a European political culture which aims for political consensus and cost-sharing (Börzel and Risse 2009).

Participation in international forums and international governance structures, most notably the United Nations Framework Convention on Climate Change (UNFCCC) influences national climate policy strategies. Pressures on countries for acting on climate change in international negotiations may vary depending on the country's role in the international community and its track record on climate change policies. This may influence a country's motivation to implement policies that curb emissions. International agreements are relatively weak compared to supranational policies and its structures and comparatively loose. The second component of this factor will examine the role the European Union plays directly and indirectly in polices of its member states. Due to its supranational character the European Union is a significant policy driver for the union and for its member states. It will be examined how much influence this driver in comparison with other drivers has, for example the United Kingdom and Germany, both members of the European Union, differ significantly in their level of corporatism but have similar developments in energy intensity in the transport sector. Hence it could be assumed that membership of the European Union is a contributing factor to more political continuity.

3.4 Influence of Centre-left Parties and Green Parties

Several authors suggest that the strength of centre-left and green parties has a significant impact on the effectiveness of environmental policies (Touraine, Wieviorka, and Dubet 1987; Kitschelt 1993; Benton 1997; Neumayer 2003). Green parties' central, if not defining, political objective is environmental protection. Hence, their political representation and influence in Parliament and government is likely to impact positively on climate change policies. Centre-left parties are the more likely coalition partners for Green parties and also tend to be more interventionist in their policy making (Bernauer and Koubi 2008; Neumayer 2003). However, over the period examined in this paper there is no be clearly distinguishable differences over time in the strength and influence of centre-left and Green parties in the OECD countries examined (Figure 6).



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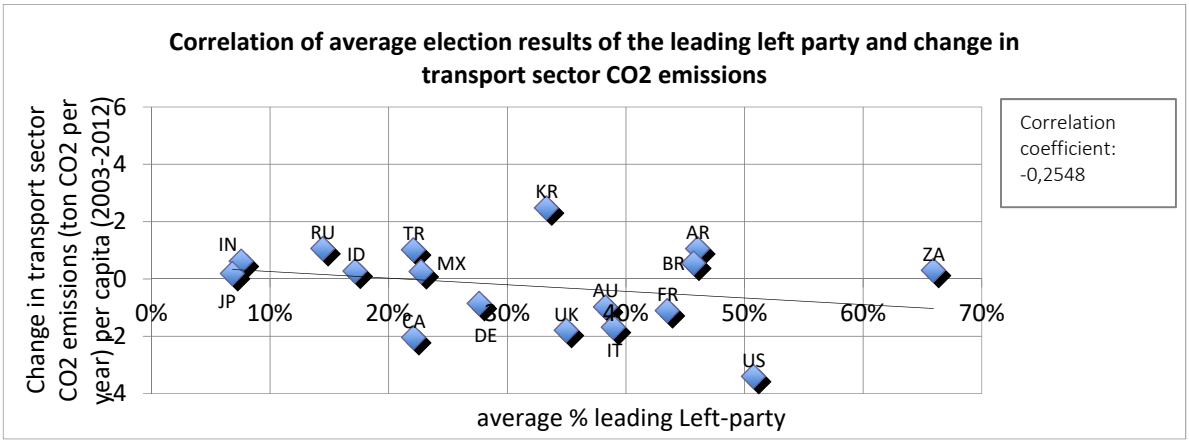

Figure 5 Green and Left-party election results and changes in transport CO2 emissions

This provides some indication that the dependence on centre-left and Green party-strength is less relevant for policy outcomes than the higher level of continuity in corporatist countries and consensus democracies. This could be linked to the integration of climate change mitigation and energy security as important policy objectives by the societal actors.

4. Analysis and Conclusions

Consensual political institutions as outlined by Lijphart and Crepaz (1991, 1996) may lead to higher levels of policy continuity, which in turn would have positive effects for the success of climate change mitigation strategies in the transport sector. This approach also adopts the theoretical concept of "encompassing organisations" (Olson 1982) and examines the relationships between political and societal actors and their ability or inability to negotiate policies that are based on broad majorities in both, politics and society. Crepaz (1991) argues that multiparty coalition governments with proportional representation and negotiation are more effective in lowering unemployment and inflation and hence creating a more favourable socio-economic environment. Lijphard and Crepaz (1991, 1996) and Lijphart (1999) provide conceptual frameworks and supporting evidence that, governments with consensual, inclusive, and accommodative constitutional structures and wider popular cabinet support act more politically responsible than more majoritarian, exclusionary, and adversarial countries.

In countries with corporatist institutional structures are major policy issues negotiated in a concerted effort by organised interests. Studies in this domain usually focus on the interaction between unions and employer organisations to negotiate socio-economic policies. Policy coordination among organised interests facilitates favourable policy outcomes, which relates in the case of this study to high levels of energy efficiency and low levels of greenhouse gas emissions. According to this, a high level of corporatism may influence the implementation and improvement of policies with a long-term focus. There are a number of elements which may support this, for example: comparatively encompassing interest groups, a consensual social partnership, the 'shadow of state regulation' and a broad acceptance of government regulation due to a history of strong penetration of the state in areas such as the labour market and social policy (Scruggs 1999). Interest groups are integrated into the policy process in a corporatist country and broaden the basis of policies, which creates a high level of continuity that is required for long-term investments. This coalition building locks groups into certain policy directions that further enhance policy progress, which is almost self-reinforcing (Katzenstein 1977; Katzenstein 1978). As response to economic downturn, high unemployment and inflation rates triggered by the 1970s oil price shocks, several countries with an open economy used corporatist structures to cope with increasing policy pressures (Goldthorpe 1984; Katzenstein 1978; Woldendorp 1997).

The concept of a coordinated market economies is very similar to the general concept of corporatism, as it relies on formal institutions to regulate the market and coordinate the interaction

of firms and their relations with suppliers, customers and employees (Hall and Soskice 2001). Coordinated market economies can be characterised as having long-term relations between key actors in the economy. A particular focus in research has been the relationship between trade unions and employer associations. These long-term, cooperative relations provide coordinated market economies with a comparative advantage that affects positively the policy continuity and policy capability of a country in a similar way as corporatist structures do.

Hall and Soskice (2001) argue that the hands-off policy approach and uncoordinated interaction between policy makers, economic and societal actors, characterises liberal market economies and puts these countries at a relative disadvantage compared to coordinated market economies. The strong interlinks between industry, banks, government and non-governmental organisations in coordinated market economies are considered to cause inertia, but also can result in continuity and policy stability (Amable 2003; Hall and Soskice 2001; Schmidt 1982; Streeck and Yamamura 2001; Whitley and Hedesstrom 2000). The analysis of the potential relationship of carbon intensity and continuity and coherence indicators gives some indication of clusters of countries that represent certain institutional arrangements and governance structures and their transport CO2 emissions per capita. Pluralist and less consensus oriented countries, such as the US, Canada, Australia and New Zealand, have higher levels of per capita transport CO2 emissions than nations with a strong focus on consensus building after deliberation, such as Austria, Sweden, Germany and Switzerland. Countries such as the UK and France have both, leading to low levels of CO2 emissions. For these countries it is argued that the membership in the European Union acts as a factor of policy stability (Börzel and Risse 2009; Jordan 2001). In addition cohabitation (France) and the strength of the Labour Party (UK) when it was in power, are considered to have contributed to emission reductions in these two countries in the early 2000s (Vogel 2003) (Wurzel, 2006). The divide between various countries becomes even more obvious when comparing the level of consensus in various EU and non-EU member countries regarding increasing or decreasing emission reductions in the respective transport sectors, which reflects the actual progress in low-carbon transport policy (or the lack thereof).

Sustainable transport policies require a consensus on the need for policy intervention and a strategic, coherent and stable operating environment. Policy interventions in the transport sector, such as fuel and vehicle taxation, are highly visible and politically sensitive. They require a strong political commitment to appear on the policy agenda and to remain in place as they rely on investments that are only cost-effective over the medium to long-term. This policy environment prevails in the European Union and some of its member states where a mixture of national and supra-national institutional structures ensures a relatively high level of continuity that can mitigate political volatility to a certain extent and fosters policy coherence through integration.

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433 **Annex I: Analysis of correlations between CO2 emissions, numbers of policy measures, election results and Governance measures in the G20 and other selected countries**
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		Dependent variables: Emissions (impact)				Dependent variables: Policies (output)			Independent variables (institutions and governance measures)				
Countries	**Country Code**	**Change in Road sector CO2 emissions** (ton CO2 per year) per capita 2003-2012	**Change in transport sector CO2 emissions** (ton CO2 per year) per capita (2003-2012)	**CO2 average emissions** in the vehicle fleet (2013)	**Change in CO2 emissions from fossil fuel use** (ton CO2 per year) per capita (2003-2013)	**No. of transport CO2 mitigation policies** (in force in 2013)	**No. of Hard measures** (economicregulatory	**No. of Soft measures** (information, voluntary measures)	**average % leading left-party** (average results of last three elections)	**average % green party** (average results of last three elections)	**Epistemic community/Public perception**	**Consensus dimension (Lijphart)**	**Corporatism 93-98**
G20													
Argentina	AR		1,056	157	0,9168239				46,0%	NA	81		
Australia	AU	-0,0715	-0,9758	182	-1,915206	9	1	8	38,3%	9,4%	54	-0,42	-0,46
Brazil	BR		0,55	160	0,6750153	4	3	1	45,7%	6,7%	80		
Canada	CA	0,3542	-2,0459	160	-2,46058	7	2	5	22,1%	5,1%	61	-1,39	-1,6
China	CN		2,8187	172	3,9983463	4	3	1	NA	NA	58		
France	FR	-0,2402	-1,1048	118	-1,158176	8	2	6	43,5%	2,4%	63	-0,28	-0,04
Germany	DE	-0,146	-0,8549	135	-0,30926	8	3	5	27,6%	9,1%	59	0,36	0,74
India	IN		0,6184	137	0,6023727	1	0	1	7,6%	0,0%	53		
Indonesia	ID		0,2733	162	0,4296922	3	0	3	17,2%	0,0%	55		
Italy	IT	-0,3987	-1,686	121	-1,947176	4	1	3	38,9%	3,2%	65	0,62	0,49
Japan	JP		0,1875	122	0,3872467	11	5	6	6,8%	0,0%	91		
Korea	KR		2,4777	145	2,2135819	2	0	2	33,3%	0,5%	92		
Saudi Arabia	SA		4,4948	201	3,5620454	0	0	0	NA	NA	39		
Mexico	MX		0,2548	163	0,2922867				22,7%	6,4%	71		
Russia	RU		1,0613	178	0,7734900	2	0	0	14,5%	0,4%	52		
South Africa	ZA		0,3025	151	-0,93557	1	0	0	65,9%	0,0%	29		
Turkey	TR		1,0146	127	0,9245354	0	0	0	22,1%	0,0%	70		
UK	UK	-0,2565	-1,7916	129	-1,820107	10	4	6	35,0%	0,8%	48	-1,54	-1,18

US	US	-0,6646	-3,4022	159	-3,501674	44	2	42	50,8%	0,2%	49	-1,49	-2,15
EU 28	EU28		-1,2427		-1,328346	5	3	2			60		

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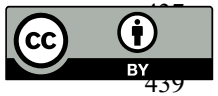

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