

TROIS CAS D'ÉTUDE SPÉCIFIQUES

Law as a tool towards the ecological transition: (urban) mobility

by Wouter VERHEYEN

Professor, University of Antwerp

Josje DE VOGEL

*Doctoral researcher at the Erasmus University Rotterdam
and University of Antwerp*

Bregtje PAVLOVSKI-DIKKER

Doctoral researcher at the University of Antwerp

Ülkü TANRIVERDI

Doctoral researcher at the University of Antwerp

and Fiona UNZ

Doctoral researcher at the Erasmus University Rotterdam

INTRODUCTION

1. Transport and mobility have the largest contribution to EU greenhouse gas (GHG) emissions. Moreover, it is the only sector where emissions have consistently increased since 1990 (apart from the COVID-year 2020).¹ It should thus not come as a surprise that sustainability of transport and mobility are at the focal point of EU transport and mobility policy.² EU mobility policy especially targets (a) sustainable urban mobility and dynamic door-to-door public transport,

¹ European Environment Agency, “Greenhouse gas emissions from transport in Europe” (18 November 2021), <https://www.eea.europa.eu/ims/greenhouse-gas-emissions-from-transport>, accessed on 11 January 2022.

² European Commission, “New transport proposals target greater efficiency and more sustainable travel” (14 December 2021), <https://transport.ec.europa.eu/news/efficient-and-green-mobility-2021-12-14>, accessed on 11 January 2022.

providing a competitive alternative to private car-ownership and (b) international railway networks, as an alternative to short haul air travel.³

2. In the industry a multiplicity of business models is emerging and is able to contribute to an ecological transition of mobility, such as platform-based mobility solutions and a revival of international railway connections. In sheer contrast to the operational breakthroughs in the fields stands the legal standstill. This standstill can create an obstacle to the growth of these business models. Further, in the absence of an adequate legal framework these business models might not make the expected contribution to sustainability or could even have significant spillover effects in other policy areas such as passenger and consumer rights. After first introducing the emerging business models (I) this paper focusses on the legal lacunas and threats in two domains, namely an adequate regulatory embedding of innovative mobility solutions, steering towards sustainability (II) and the protection of pre-existing policy targets, especially in the field of passenger rights and consumer protection (III). To this end, the paper focusses on four innovative business models and the challenges they create. These business models are micromobility (MM), Mobility-as-a-Service (Maas), Mobility Devices as a Service (MDaaS) and gig mobility. While MM and gig mobility can mainly serve as a catalyst for greening urban mobility, greening intercity and especially international transport policy targets boosting EU long-distance rail transport. Moreover, the research also examines whether the side-conditions for the revival of an ‘old’ business model — international railway transport —, are fulfilled.

I. BUSINESS INNOVATIONS

3. A number of organizational innovations in the mobility sector support the EU in achieving these policy targets, especially for what concerns the first policy target (sustainable urban mobility and dynamic door-to-door public transport): namely the rise of platform-based mobility solutions. The concept of platform based mobility solutions embodies four different evolutions: (1) the shift towards MaaS platforms, which provide door-to-door integrated mobility solutions;⁴ (2) MDaaS platforms, providing for platform-based bicycles, scooters, e-steps and car rentals;⁵ (3) the rise of on-demand mobility platforms, such as UBER and Lyft (Mobility on-Demand

³ European Commission, “Communication from the European Commission to the parliament and the Council: Action plan to boost long distance and cross-border passenger rail” (Strasbourg, 14 December 2021) COM(2021)810 final.

⁴ R. UTRAIINEN and M. PÖLLÄNEN, “Review on mobility as a service in scientific publications”, *Research in Transportation Business & Management* 27 (2018): 15-23.

⁵ C. BOYD and J. KIETZMANN, “Ride on! Mobility business models for the sharing economy”, *Organization & Environment* 27.3 (2014): 279-296.

(MOD))⁶ and (4) the institutionalization and upscaling of existing carpooling practices into Peer-to-Peer (P2P) mobility solutions (Crowd Mobility (CM)).⁷

TABLE 1 TYPOLOGY OF PLATFORM-BASED MOBILITY SOLUTIONS

Platform	Abbreviation	Modes	Contract party	Performing carrier/service provider
Mobility-as-a Service	MaaS	All	MaaS-platform or (performing) carrier	Traditional carriers/freelancers
Mobility Devices as a Service	MDaaS	Mainly cars, bikes, scooters, steps	Platform-based operator	Platform-based operator
Mobility on demand platforms	MOD	Mainly cars and vans	Platform or driver	Freelancer/employee driver
P2P mobility solutions (Crowd Mobility)	CM	Mainly cars	Platform or peers	Peers

4. For the second policy target (i.e. boosting EU long-distance rail transport), the picture is rather the opposite: while Europe has a long history of international railway lines, in the last years many lines got disconnected and the lack of interoperability of EU railway lines complicates attempts to revive this network.⁸ Still, inspired by EU policy objectives of doubling cross-border rail transport by 2030,⁹ many start-ups and traditional railway operators have taken up the challenge of creating international railway links in the recent years.¹⁰

⁶ F. ALEMI *et al.*, “What influences travelers to use Uber? Exploring the factors affecting the adoption of on-demand ride services in California”, *Travel Behaviour and Society* 13 (2018): 88-104.

⁷ Fr. BACHMANN *et al.*, “What drives people to carpool? Explaining carpooling intention from the perspectives of carpooling passengers and drivers”, *Transportation research part F: traffic psychology and behaviour* 59 (2018): 260-268.

⁸ European Commission, “Communication from the European Commission to the parliament and the Council: Action plan to boost long distance and cross-border passenger rail” (Strasbourg, 14 December 2021), COM(2021)810 final, p. 4-6.

⁹ European Commission, “Communication from the European Commission to the parliament and the Council: Action plan to boost long distance and cross-border passenger rail” (Strasbourg, 14 December 2021), COM(2021) 810 final.

¹⁰ Europe: Night train renaissance gathers pace, 4 January 2022, <https://www.railwaygazette.com/in-depth/europe-night-train-renaissance-gathers-pace/60628.article> (accessed 14 January 2022).

5. Policy widely supports these new business models. Taking the example of MM, local authorities include it as a focal point of their urban mobility initiatives.¹¹ The International Transport Forum (ITF) (2021) simulated that passenger transport in urbanized areas can become emission free in 2050 only if there is an integrated, available and well-functioning shared mobility offer that attracts private vehicle users.¹² Europe's Smart and Sustainable Mobility strategy (2020) also stresses the importance of shared and collaborative mobility services to reduce the pressure on passenger transport systems.¹³

II. NECESSARY REGULATORY INTERVENTIONS FOR THE SUSTAINABILITY OF MOBILITY

6. In all the case studies dealt with in this article, some regulatory intervention might be necessary or desirable. In this section, we focus on MM and MaaS, as these cases provide a good example of how the absence of an adequate regulatory framework could jeopardize the sustainability of urban mobility.

7. Shared MM and MaaS solutions are increasingly adopted in cities to tackle mobility problems of car dependence, congestion, pollution, noise, GHG emissions, and first/last mile problem. Indeed, there are promising studies illustrating the potential of e-bikes and shared bike systems to reduce energy consumption and GHG emissions and replace car trips.¹⁴ Moreover, studies highlighted the potential of MaaS to promote public transport, active transport, intermodal solutions, and reduction in private car use if it is properly designed and priced.¹⁵

¹¹ See for example: klimaatneutraal.mechelen.be/deelmobiliteit; www.slimnaarantwerpen.be/nl/deelmobiliteit.

¹² ITF (2021). *Micromobility, equity and Sustainability*. OECD Publishing Paris. <https://www.itf-oecd.org/micromobility-equity-sustainability>.

¹³ European Commission, "Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: Sustainable and Smart Mobility Strategy — putting European transport on track for the future" (Brussels, 9 December 2020), COM(2020) 789 final.

¹⁴ J. MASON, L. FULTON, Z. MCDONALD, "A Global High Shift Cycling Scenario: The Potential for Dramatically Increasing Bicycle and E-bike Use in Cities around the World, with Estimated Energy, CO₂, and Cost Impacts", Davis: Institute for Transportation & Development Policy, University of California, 2015; Z. KOU, X. WANG, S. F. (A.) CHIU, H. CAI, "Quantifying greenhouse gas emissions reduction from bike share systems: a model considering real-world trips and transportation mode choice patterns", *Resources, Conservation & Recycling*, 2020, 153, 104534.

¹⁵ M. KAMARGIANNI, M. MATYAS, W. LI, J. MUSCAT, "Londoners' attitudes towards car-ownership and Mobility-as-a-Service: impact assessment and opportunities that lie ahead", MaaS Lab — UCL Energy Institute Report, Prepared for Transport for London, 2018; D. A. HENSHER, C. Q. HO, D. J. RECK, "Mobility as a service and private car use: Evidence from the Sydney MaaS trial", *Transportation Research Part A: Policy and Practice* 2021, 145, p. 17-33.

8. However, these mobility solutions are often developed by private actors driven by specific commercial interests. The reconciliation of commercial interests with complex environmental and societal challenges can be problematic in the absence of policy intervention and adequate regulatory frameworks.¹⁶ Thus, there is a serious risk of aggravating the existing problems, including congestion and GHG emissions, and creating additional issues with safety and social inclusion.¹⁷ Further problems include wandering steps and bikes in city centers,¹⁸ traffic accidents induced by step passengers, and the environmental costs of e-mobility devices.¹⁹

A. Deficiencies existing framework

9. Both MM and MaaS could address traffic problems and their adverse environmental impacts if steered towards sustainability. In this context, MM has the potential to replace short car trips²⁰ and accordingly reduce GHG emissions.²¹ Moreover, it can complement public transport as a first/last mile solution by enhancing access to public transport.²² Nevertheless, MM has also been competing and replacing sustainable modes of transport, such as public transport, cycling, and walking, and thus, discrediting its benefits on the net GHG emission reduction.²³ Similarly, the literature suggests that MaaS has the potential to reduce private car

¹⁶ I. DOCHERTY, G. MARSDEN, J. ANABLE, “The governance of smart mobility”, *Transportation Research Part A*, 2018, 115, p. 115.

¹⁷ K. PANGBOURNE, “Mobility and Ageing: A Review of Interactions Between Transport and Technology from the Perspective of Older People”, *Geographies of Transport and Ageing*, Palgrave Macmillan, 2018, p. 51-71; S. HOWLAND, N. MCNEIL, J. BROACH, K. RANKINS, J. MACARTHUR, J. DILL, “Breaking Barriers to Bike Share: Insights on Equity from a Survey of Bike Share System Owners and Operators”, *Transportation Research and Education Center (TREC)*, 2017; Portland Bureau of Transportation, “2018 E-scooter Findings Report”, <https://www.portlandoregon.gov/transportation/78431>, accessed 7 January 2022.

¹⁸ J. POPPELMONDE, “De deelstep is (g)een strooistep”, *De Standaard*, 26 oktober 2021.

¹⁹ H. MOREAU, L. DE JAMBLINNE DE MEUX, V. ZELLER, P. D’ANS, C. RUWET and W. M. ACHTEN, “Dockless e-scooter: A green solution for mobility? Comparative case study between dockless e-scooters, displaced transport, and personal e-scooters”, *Sustainability*, 2020, 12(5), p. 1803. This article calculates that based on the average lifetime of 7.5 months, CO-emission of sharing steps amount to 131 grams/km, while the emissions in case of travel as uber-passenger is limited to 110 grams/km.

²⁰ C. S. SMITH, J. P. SCHWIETERMAN, “E-scooter Scenarios: Evaluating the Potential Mobility Benefits of Shared Dockless Scooters in Chicago”, *Conference: Chaddick Institute Policy Series*, DePaul University, Chicago, 2018.

²¹ M. MCQUEEN, G. ABOU-ZEID, J. MACARTHUR, K. CLIFTON, “Transportation Transformation: Is Micromobility Making a Macro Impact on Sustainability?”, *Journal of Planning Literature*, 2021, 36, 1, p. 48.

²² B. ŞENGÜL, H. MOSTOFI, “Impacts of E-Micromobility on the Sustainability of Urban Transportation-A Systematic Review”, *Applied Sciences*, 2021, 11, 5851, p. 10.

²³ M. MCQUEEN, G. ABOU-ZEID, J. MACARTHUR, K. CLIFTON, “Transportation Transformation: Is Micromobility Making a Macro Impact on Sustainability?”, *Journal of Planning Literature*, 2021, 36, 1, p. 49.

ownership, congestion, and thus GHG emissions.²⁴ Nevertheless, the net impact of MaaS on sustainability outcomes is rather uncertain. For instance, if reducing car ownership is achieved by providing non-car solutions, such as shared bikes, this can result in a reduction in congestion and GHG emissions. However, if users' preference is shifted to car-based solutions, e.g., Uber or taxis, congestion and related environmental impacts may be exacerbated. Likewise, MaaS can reduce the use of public transport by offering more convenient options, such as shared cars, and this would increase congestion.²⁵ Hence, policy intervention is necessary to realize the potential of these services for delivering sustainability.

10. Further, MaaS and MM can create issues concerning social inclusion and safety. Regarding social inclusion, first, equal distribution of vehicles and services is problematic since service providers may opt to operate in densely populated city centers rather than underserved areas or suburbs due to commercial interests.²⁶ Second, both services require smartphones and bank cards for unlocking vehicles and payments. Hence, those who do not have access to smartphones, bank cards, or are digitally illiterate, are excluded.²⁷ Third, affordability is required to ensure that low-income people can benefit from these services.²⁸ Regarding safety, MM has created concerns due to reported accidents and injuries.²⁹ Especially vehicles left on pavements blocking the mobility of pedestrians, particularly those with mobility difficulties, are problematic.³⁰

B. Existing best practices

11. Policy responses have emerged to address the negative externalities of these mobility services on safety and social inclusion across various jurisdictions.

²⁴ R. WITTSTOCK, Fr. TEUTEBERG, "Sustainability Impacts of Mobility as a Service: A Scoping Study for Technology Assessment", in Fr. TEUTEBERG, M. HEMPEL, L. SCHEBEK (eds), *Progress in Life Cycle Assessment 2018*, Cham, Springer Nature Switzerland AG, 2019, p. 69.

²⁵ K. PANGBOURNE, M. N. MLADENVIĆ, D. STEAD, D. MILAKIS, "Questioning mobility as a service: Unanticipated implications for society and governance", *Transportation Research Part A*, 2020, 131, p. 43.

²⁶ I. DOCHERTY, G. MARSDEN, J. ANABLE, "The governance of smart mobility", *Transportation Research Part A*, 2018, 115, p. 121.

²⁷ K. JOHNSTON, D. OAKLEY, A. V. DURHAM, C. BASS, S. KERSHNER, "Regulating Micromobility: Examining Transportation Equity and Access", *Journal of Comparative Urban Law and Policy*, 2020, 4(1), p. 711; K. PANGBOURNE, M. N. MLADENVIĆ, D. STEAD, D. MILAKIS, "Questioning mobility as a service: Unanticipated implications for society and governance", *Transportation Research Part A*, 2020, 131, p. 43.

²⁸ K. JOHNSTON, D. OAKLEY, A. V. DURHAM, C. BASS, S. KERSHNER, "Regulating Micromobility: Examining Transportation Equity and Access", *Journal of Comparative Urban Law and Policy*, 2020, 4(1), p. 707.

²⁹ See for example: Y. FENG, D. ZHONG, P. SUN, W. ZHENG, Q. CAO, X. LUO, Z. LU, "Micromobility in Smart Cities: A Closer Look at Shared Dockless E-Scooters via Big Social Data", *ICC 2021 – IEEE International Conference on Communications*, 2021, p. 1-6.

³⁰ C. MULLEN, "Governing a Risky Relationship Between Sustainability and Smart Mobility", in M. FINCK, M. LAMPING, V. MOSCON and H. RICHTER (eds), *Smart Urban Mobility: Law, Regulation, and Policy*, Berlin, Springer-Verlag Berlin Heidelberg, 2020, p. 34.

For example, the cities of Atlanta, Los Angeles, Portland, and Austin in the US require MM operators to submit an equity plan as part of their permit application. These equity plans include the provision of non-credit card payment options, including cash and prepaid debit cards, alternative ways to access vehicles without smartphones, commitments to distribute vehicles to underserved areas, reaching low-income consumers via discounts, specified free rides, etc.³¹ These best practices can be extrapolated to the European context to guide policymakers in their efforts to provide inclusive mobility. Moreover, safety regulations have emerged across the EU to tackle safety risks posed by e-scooters.³²

C. Pending proposals and recommendations *de lege ferenda*

12. To ensure that MaaS and MM contribute to sustainable mobility and do not worsen the existing problems, strategic and targeted policies encouraging sustainable modes of transport such as walking, cycling, and public transport should steer them. Moreover, policies and regulatory frameworks should be put in place to ensure that *all* people equally benefit from these intelligent mobility services. Furthermore, policymakers should consider the infrastructure of MM vehicles in relation to space, pavements, and curb management and identify related safety issues.³³ Accordingly, safety regulations on access to pavements, pedestrian zones, and roads, speed limitations, the use of protective equipment such as helmets, licenses to facilitate the provision of MM services, etc., should be developed.

³¹ K. JOHNSTON, D. OAKLEY, A. V. DURHAM, C. BASS, S. KERSHNER, “Regulating Micromobility: Examining Transportation Equity and Access”, *Journal of Comparative Urban Law and Policy*, 2020, 4(1), p. 703-715. The City of Atlanta, Georgia, The Code of Ordinances, Section 150-407 on Equity, available at https://library.municode.com/ga/atlanta/codes/code_of_ordinances?nodeId=COORATGEVOII_CH150TRVE_ARTXSHDOMODE_S150-407EQ, accessed on 15 August 2022. The City of Atlanta, Department of Transportation, Georgia, Administrative Regulations for Shareable Dockless Mobility Device 2021 Annual Permit Holders, available at <https://www.atlantaga.gov/home/showpublisheddocument/50629/637532367525500000>, accessed on 15 August 2022. The City of Portland, Portland Bureau of Transportation, Oregon, TRN-15.01 – New Mobility – Shared Electric Scooters (Amended July 1, 2022), available at <https://www.portland.gov/sites/default/files/2022/trn-15.01-new-mobility-shared-electric-scooters-full-text-of-policy.pdf>, accessed on 15 August 2022. The City of Los Angeles, Department of Transportation, California, On-Demand Mobility Rules And Guidelines 2021, available at <https://ladot.lacity.org/sites/default/files/documents/on-demand-mobility-rules-and-guidelines-2021.pdf>, accessed on 15 August 2022. The City of Austin, Austin Transport Department, Texas, Director Rules for Deployment and Operation of Shared Small Vehicle Mobility Systems, https://www.austintexas.gov/sites/default/files/files/Transportation/Dockless_Final_Accepted_Searchable.pdf, accessed on 15 August 2022.

³² See, for example, the German Regulation: Verordnung über die Teilnahme von Elektrokleinstfahrzeugen am Straßenverkehr (Elektrokleinstfahrzeuge-Verordnung — eKfV), June 6, 2019, Bundesgesetzblatt [BGBl.] [Federal Law Gazette] I at 756, BGBl. Also see for an overview of regulations across the EU on e-scooters: M. M. SOKOŁOWSKI, “Laws and Policies on Electric Scooters in the European Union: A Ride to the Micromobility Directive?”, *European Energy and Environmental Law Review*, August 2020, p. 127-140.

³³ B. ŞENGÜL, H. MOSTOFI, “Impacts of E-Micromobility on the Sustainability of Urban Transportation-A Systematic Review”, *Applied Sciences*, 2021, 11, 5851, p. 14.

III. NECESSARY CHANGES TO MAINTAIN PASSENGER RIGHTS AND CONSUMER LAW PROTECTION

13. An important existing policy area in the field of mobility is that of passenger rights protection, as well as the adjacent and sometimes overlapping domain of consumer law protection. Passenger rights is one of the earliest fields of uniform private law, with international Conventions focusing mainly on a mandatory liability in case of bodily injury going back to the end of the 19th century. The EU complimented this international framework with rules focusing on information, access to transport and liability and assistance in case of delay.

14. The downside of the early unification is that the legal framework is built upon the pre-existing compartmentation of the mobility industry. As a result, the framework is a patchwork of mode-specific instruments, with specific rules for air, sea, road and rail transport, but without rules on for example multimodal passenger transport. This problem is also relevant for MaaS (A). Moreover, even within these mode-specific boundaries, these regimes limit the scope of application even further. These restrictions unwillingly(?) exclude some recent developments from the scope of application. Important restrictions are the restriction to busses and coaches in Regulation 181/2011, excluding most of the on-demand mobility services (B) and the restriction to carriage contracts, thus requiring a carrier. This excludes MDaaS contracts. As a result, only consumer protection is available to users of MDaaS-services (C). A further problem existing for all these business models is that new actors, especially platforms do not fit the terminology used by the legal framework, facilitating platforms to shift away risks. A last specific problem exists for railway transport where the legal framework does not sufficiently support a “one-stop-shop” approach, allowing to make rail transport competitive to short haul air travel (D).

A. Effective passenger protection in case of MaaS

i. Problem statement

15. The *Passenger Rights Acquis*, as described in the previous paragraph, was not designed with Mobility-as-a-Service (MaaS) in mind. To the contrary: It designed a particular legal instrument for each mode of transport, with its own specific rules, tailored to the specifics of each mode of transport. These rules often do not apply to multimodal contracts. This renders the MaaS passenger largely unprotected in case of delayed transport or when they suffer injuries as a result of the transport.

ii. Deficiencies in the existing framework

16. The first deficit of the existing legal framework is that transport law regulations, conventions and domestic legislations, operate in a unimodal paradigm

and largely exclude multimodal contracts from their scope.³⁴ As such, in the legal framework *de lege lata*, a mandatory liability standard for multimodal contracts is not yet developed.³⁵ When a single contract combines different modes of transport, the default position is that the transport law *acquis* does not apply to any part of the journey.

17. Some conventions fully exclude multimodal contracts from their scope, even if that contract contains a rail-leg. Art. 31 COTIF-CIV³⁶ for example stipulates that “the provisions relating to the liability of the carrier in case of death of, or personal injury to, passengers shall not apply to loss or damage arising in the course of carriage which, in accordance with the contract of carriage, was not carriage by rail”. Others provide that the scope of the Convention is limited to that specific mode. The Montreal Convention 1999 provides in this context that “in the case of combined carriage performed partly by air and partly by any other mode of carriage, the provisions of this Convention shall [...] apply only to the carriage by air”.³⁷

18. Oddly, MaaS platforms combining rental services with transport services may fall in the scope of the Package Travel Directive.³⁸ This increases the protection of the passenger in case of delay and injury substantially. The Package Travel Directive provides that the MaaS-platform is responsible for the performance of the travel services included in the package travel contract, irrespective of whether those services are to be performed by the organizer or by other travel service providers.³⁹

iii. Existing best practices

19. Germany and the Netherlands have included similar solutions in their national law system pertaining to multimodal contracts for the transport of goods. Article 8:41 BW prescribes that each leg of the carriage shall be governed by the rules applicable to that leg. This is what is called the ‘network’ or ‘chameleon’ system. This system cannot override the direct application of mandatory

³⁴ The Convention for the Unification of Certain Rules for International Carriage by Air, *Official Journal L* 194, 18/07/2001 P. 0039 — 0049 (Montreal Convention 1999) provides in art. 38 that: “In the case of combined carriage performed partly by air and partly by any other mode of carriage, the provisions of this Convention shall, subject to paragraph 4 of Art. 18, apply only to the carriage by air, provided that the carriage by air falls within the terms of Art. 1.”

³⁵ B. CINCURAC ERCEG, A. VASILJ, “Current Affairs in Passengers Rights Protection in the European Union”, *EU and Comparative Law Issues and Challenges*, 2018, p. 228-9.

³⁶ Art. 31 Convention relative aux transports internationaux ferroviaires (COTIF) ? Règles uniformes concernant le Contrat de transport international ferroviaire des voyageurs (CIV).

³⁷ Art. 38 Montreal Convention 1999.

³⁸ Art. 3(1) Directive (EU) 2015/2302 of the European Parliament and of the Council of 25 November 2015 on package travel and linked travel arrangements, amending Regulation (EC) No 2006/2004 and Directive 2011/83/EU of the European Parliament and of the Council and repealing Council Directive 90/314/EEC (Package Travel Directive).

³⁹ Art. 13 Package Travel Directive.

conventions.⁴⁰ The core of the chameleon system is connecting to the existing transport regimes. The parties must, as far as applicable law is concerned, be placed as far as possible in the situation that would be present, if separate unimodal agreements had been chosen. The multimodal carrier has a cumulation of unimodal commitments.⁴¹ The use of a network system ensures that the consequences of the conclusion of a multimodal agreement are completely analogous to the consequences associated with the sum of the sub-agreements for the individual routes.⁴² A study conducted in service of the European Commission concludes in favor of the ‘chameleon system’, referring to the fact that multimodal transport might change significantly in the coming years thanks to the development of digital platforms selling multimodal products.⁴³

20. In the light of offering a high level of consumer protection and given that a number of MaaS contracts already fall within its scope, we argue that it should also be considered to extend the scope of the Package Travel Directive to multimodal services.

iv. Pending proposals and recommendations *de lege ferenda*

21. Given the international nature of transport — and digital services, it seems opportune that the European Commission takes the initiative to develop a legal framework for digital transport services, including multimodal digital transport services, such as MaaS. Although the EC initially was of the opinion that urban mobility is a purely local issue, it recently seems to acknowledge the EU dimension of such services. A recent Commission Notice (2022) describes that ‘With international and European ride-hailing companies active in different Member States of the EU, with mobile European citizens expecting reliable, safe, good-quality transport services across the different cities in the EU, and with rising awareness of the contribution of the transport sector to climate change, the passenger transport-on-demand sector has developed from a local matter into a matter which has as well an EU dimension’.

22. The Commission appears to have embarked on designing such a framework in 2016, when it started an impact assessment. It implied that it aimed to adjust the legal framework for passenger rights to a new multimodal reality.⁴⁴ A proposal never came to fruition. Fortunately, in its work programme of 2022,

⁴⁰ M. SPANJAART, *Multimodal Transport Law*, Routledge, 1st ed., 2017, p. 181.

⁴¹ A. VAN BEELEN, *Multimodaal vervoer. Het kameleonsysteem van boek 8 BW*, Tjeenk Willink 1996, p. 33.

⁴² W. VERHEYEN, *Contractuele aansprakelijkheid van vervoersintegratoren*, Die Keure Publishing Group 2014, p. 369.

⁴³ European Commission, “Exploratory Study on Passenger Rights in the Multimodal Context — Final report”, June 2019, Study contract No. MOVE/B5/SER/2016-77/SI2.760997, p. 13.

⁴⁴ European Commission, “Inception impact assessment?”.

the EC stipulates that “Digital solutions can also help support more integrated and sustainable mobility. We will propose an initiative on multimodal digital mobility services to address market gaps in the combined use of transport modes, including rail”.⁴⁵ It started by initiating a Multimodal Passenger Mobility Forum (MPMF). The MPMF will assist the Commission in the preparation of policy initiatives in the field of sustainable multimodal mobility for passengers. Although it is unclear to what extent this forum will engage in the protection of passenger rights, a glimmer of hope certainly looms on the horizon for the protection of passengers in the digital era. It is most likely going to discuss data sharing issues rather than passenger rights.

B. Effective protection in case of on-demand mobility

i. Problem statement

23. Risks in the market of on-demand mobility services are specific, because the principal-service providers operating through platforms are often micro-enterprises consisting of a self-employed freelancer. These freelancers are often new to the mobility market and lack the appropriate risk awareness of traditional mobility risks. This results in an ineffective risk management strategy, not only exposing the gig worker himself to the risks of personal injury of passengers, but also detrimental to passengers themselves because they risk staying behind empty handed. The situation of the passengers is even more worrisome as the largest share of the on-demand mobility market escapes the scrutiny of the EU passenger rights framework.

Regulation 181/2011 sets out the rules that determine the rights of passengers and the extent of the carrier’s liability in case of road transport.⁴⁶ Notably, the scope of the Regulation is limited to busses and coaches, which excludes the usual means of transport in the gig economy.⁴⁷ That is because most of the Uber or Blablacar rides are not performed using these two types of automobiles. As a result, the Regulation leaves such transportation uncovered and thus up to national law. This entails important risks for both the gig workers and the passengers, linked to the nature of gig-mobility and legal certainty.

⁴⁵ European Commission, “Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: Commission work programme 2022: Making Europe stronger together” (Strasbourg, 19 October 2021), COM(2021) 645 final, p. 5.

⁴⁶ Regulation (EU) No. 181/2011 of 16 February 2011 concerning the rights of passengers in bus and coach transport and amending Regulation (EC) No. 2006/2004, *OJEU* L55/1.

⁴⁷ Art. 1 Regulation (EU) No. 181/2011 of 16 February 2011 concerning the rights of passengers in bus and coach transport and amending Regulation (EC) No. 2006/2004, *OJEU* L55/1.

ii. Deficiencies of the existing framework

24. The existing legal framework raises important legal risks for gig-workers and passengers because of two main reasons: First, the existing Regulation for the protection of road passengers excludes passengers of on-demand mobility. Second, the nature of platform economy and gig-work has blurred the lines between neutral intermediaries and service providers, which, in some situations, might shift risks to passengers.

25. As mentioned, on-demand mobility includes the shared use of private cars and, when that is the case, it automatically falls outside the scope of the Regulation governing the rights of road passengers. This leaves a legal gap in place that will again be filled by national law provisions if such rules exist within the national legal framework. For passengers of on-demand mobility, such an exclusion can hinder legal certainty and predictability as to the applicable legal framework.⁴⁸ The lack of a uniform regime governing such contracts could leave passengers unaware about their legal rights and under-protected compared to other modes of transport. For example, Regulation 181/2011 sets out the liability rules for carriers in the event of cancellation or delays, and personal injury or death. Regarding the latter, article 7 of the Regulation dictates that the passengers shall be compensated in accordance with national law, as long as the maximum limit set by national law is not less than 220.000 Euro per passenger. In this context, the choice of traveling from the Netherlands to Belgium by Flixbus, instead of Blabla-car could significantly impact the compensation in terms of the minimum amount that a passenger will be entitled to in the event of personal injury. Even more so, passengers using the services of on-demand mobility could face greater risks due to the shift of risks from platforms to drivers.

26. More specifically, the platform economy has created a complicated contractual structure that involves a service provider, a user or buyer of the provided services and an intermediary.⁴⁹ The passengers will enter into a contract either with the gig-worker or with the platform, depending on which of these two parties is deemed as the provider of the underlying service to the consumer, i.e. the passenger.⁵⁰ For example, if the platform is considered to be a neutral intermediary that merely offers a network for interested parties to connect, then the passenger will in fact contract with the gig-worker. The gig-worker will then be the carrier who is liable in case of any damage. In the EU, mandatory motor insurance covers

⁴⁸ W. VERHEYEN & F. UNZ, “Platform mobility and logistics: potential policy tools for gig worker risk management”, *TVR*, 2021-2, p. 32.

⁴⁹ H. HAUBEN (ed.), K. LENAERTS and W. WAEYAERT, “The platform economy and precarious work”, Publication for the committee on Employment and Social Affairs, Policy Department for Economic, Scientific and Quality of Life Policies, European Parliament, Luxembourg, September 2020, p. 16.

⁵⁰ *Ibid.*

claims stemming from personal injury or death to the passengers of the car. In that sense, the passengers of an Uber car, for example, will be able to claim for their medical costs if an accident occurs. However, two considerations are important in this aspect: First, the Regulation mentioned includes a minimum compensation amount, whereas motor insurance coverage includes a maximum limit only. Second, the Regulation promotes legal certainty and predictability for passengers, across the EU member states. On the other hand, passengers claiming under the motor insurance scheme will be subject to the national rules that determine the amounts payable in each European State.

iii. Best practices: Additional insurance as a tool to mitigate risk exposure

27. Additional insurance coverage could ensure the ability of drivers providing on demand mobility services to comply with legal obligations and therefore ensure that passengers are sufficiently protected, at least in terms of financial compensation.⁵¹ Some online platforms already provide such a tool to gig-workers that covers their liability exposure up to a certain amount.⁵² Mandatory insurance, however, could create a uniform safety net in case of accidents, which can lead to vast expenses and claims, especially in view of the misconception of gig-workers regarding insurance coverage. In this regard, it is important to note that studies have evidenced that increased risk awareness is an insufficient incentive for gig-workers to take out insurance.⁵³ In fact, less than half of the gig-workers answering the survey were willing to purchase insurance coverage, even after the potential risks were explained.⁵⁴ Even more interestingly, the reasons supporting their decision not to do so were the financial and timely expenditure required, demonstrating that gig-workers consciously externalize risks.⁵⁵ Consequently, a uniform mandatory insurance scheme that is applicable to drivers providing services through on-demand mobility could ensure that the gap between the coverage of motor insurance and the rights granted through Regulation 181/2011 is bridged. As a result, passengers using these services would be entitled to similar protection.

⁵¹ W. VERHEYEN & F. UNZ, “Platform mobility and logistics: potential policy tools for gig worker risk management”, *TVR*, 2021-2, p. 35.

⁵² See for example: uber.com/en-BE/drive/insurance/; riders.deliveroo.nl/nl/support/verzekering/ben-ik-verzekerd-wanneer-ik-met-deliveroo-bezorg; A. ALOISI, “Commoditized Workers: Case Study Research on Labour Law Issues Arising from a Set of on-Demand/Gig Economy Platforms”, *Comparative Labor Law & Policy Journal*, 2016, (37)3, p. 684.

⁵³ L. VAN DER ELST, *Het bewustzijn van de maaltijdkoerier van Deliveroo over zijn/haar rechten en het daaropvolgend gedrag* (thesis 2018; promotor W. VERHEYEN).

⁵⁴ R. SCHUURS and W. VERHEYEN, *Legal Illiteracy in the Platform economy: Meal Deliverer's knowledge and behavior relating to Insurances*, CAPLA 2018, Work and employment in an era of platform Capitalism, 5-6 June 2018, Paris.

⁵⁵ R. SCHUURS and W. VERHEYEN, *Legal Illiteracy in the Platform economy: Meal Deliverer's knowledge and behavior relating to Insurances*, CAPLA 2018, Work and employment in an era of platform Capitalism, 5-6 June 2018, Paris.

C. Towards a level playing field for railway transport

i. Problem statement

28. Boosting international railway transport does not only require an improved interoperability of national railway services, but also an effective and equal protection of passengers traveling by rail, not only compared to short-haul rail passengers but also to air passengers. There are also significant shortcomings from a consumer-passenger perspective. First and foremost, while it is common practice in air transport to issue airport-to-airport-tickets, in case of railway transport this is still rather uncommon. This does not only increase the administrative burden for the passengers in organizing their journey/travel. In addition, there is a significant impact on the rail passenger's rights. In case of air transport, the contractual air carrier will also be responsible for delays in the underlying contract chain, for example caused by missed connections and will in such cases need to pay compensation and provide assistance. The air carrier is here thus under an "airport-to-airport" responsibility. In case of standalone carriage contracts — as common in case of rail transport — however, no such station-to-station responsibility exists. This can be problematic in situations where a (small) delay on the initial voyage causes a missed connection on the subsequent train. In such a case, compensation will only potentially be due for the part of the journey, on the first carriage contract.

ii. Deficiencies existing framework

29. The recast Regulation 2021/782 of 29 April 2021 on rail passengers' rights and obligations does explicitly provides an obligation to issue through-tickets (station-to-station),⁵⁶ such obligation only exists for railway undertakings operating the transport themselves.⁵⁷ From other railway undertakings only reasonable efforts to this end are expected.⁵⁸ Where chapter IV of the Regulation recognizes a liability and right of assistance in case of missed connections, such obligation remains non-existent in scenario's where not through-tickets were issued. Even though the recast Regulation did not even enter into force yet, it is now already inapt to adequately protect passenger rights in case of long-distance railway transport. This is even explicitly recognized in the action plan,⁵⁹ where it states that "the limited obligation to offer them and the lack of existing market

⁵⁶ Regulation 2021/782 of the European Parliament and the Council of 29 April 2021 on rail passengers' rights and obligations, *OJEU* L 172/1.

⁵⁷ Art. 12 Regulation 2021/782 of the European Parliament and the Council of 29 April 2021 on rail passengers' rights and obligations, *OJEU* L 172/1.

⁵⁸ Art. 12 *in fine* Regulation 2021/782 of the European Parliament and the Council of 29 April 2021 on rail passengers' rights and obligations, *OJEU* L 172/1.

⁵⁹ European Commission, "Communication from the European Commission to the parliament and the Council: Action plan to boost long distance and cross-border passenger rail" (Strasbourg, 14 December 2021), COM(2021)810 final, p. 12-14.

offer of through-tickets limits the protection of passengers, and thus reduces the attractiveness of rail. It is essential that passengers combining several trains into one journey are sure that they will not be stranded if one of the trains is late, regardless of whether the tickets were sold as a through-ticket or as separate contracts. A solution could be to ensure at least that the passengers traveling on combined separate tickets can continue their journey in case of missed connections under certain conditions. The Commission will therefore address the issue of journey continuation in case of delays as part of the initiative on multimodal digital mobility services.”⁶⁰

30. While the inappropriate legal framework directly impacts effective protection of passengers, it can also indirectly impact the success of rail transport as a solution for long-distance travel. Delays and missed connections are inevitable, but the better aftercare in case of air transport can positively impact the passengers’ trust in air transport, compared to that in railway travel. This is even more the case given the fact that compensation for delays is anyways much more generous in case of air transport (€ 250-600) compared to railway transport (25-50% of the ticket price).⁶¹

iii. Pending proposals and recommendations *de lege ferenda*

31. The way forward for rail transport is partially announced in the action plan: namely a better protection for passengers making use of combined transport, irrespective whether it concerns through tickets and irrespective of the combination of modes of transportation (for example rail-air transport, as a complement/replacement to air-air-based hubs and spokes models of major airlines). In addition, the question arises whether there is any justification for the different compensation in case of air and rail transport. One can easily fly from Brussels to Nice for less than €50, while a train ticket might cost up to €200. Still, in case of a lengthy delay, the air passenger will receive €250, while the rail passenger will — depending on the length of the delay — recover €50 up to maximum €100 (50% of the ticket price). However, taking into account that the recast Regulation confirming pre-existing compensation levels did not even enter into force, it is highly unlikely that any change on this point is soon to be expected.

⁶⁰ European Commission, “Communication from the European Commission to the parliament and the Council: Action plan to boost long distance and cross-border passenger rail” (Strasbourg, 14 December 2021), COM(2021)810 final, p. 13-14.

⁶¹ See on this point: W. VERHEYEN and B. PAVLOVSKI-DIKKER “Micromobilitéit, duurzaamheid en veiligheid: Welke weg voor passagiersrechten in de roaring twenties?”, *Droit de la consommation* 2021, (41)130, p. 57-58.

D. From mobility ownership to mobility usership (MDaaS): effective protection of consumer rights

i. Problem statement

32. Traditional, sales based transport contributes to the consumption and ownership of means of transport. In the last decades, attitudes towards consumption have shifted, which brought increasing concern for ecological impact. A solution is found in the transition from mobility ownership to mobility usership.⁶² Mobility usership can be defined as all types of mobility consumption in which the consumer does not possess the legal title of the product, i.e. a vehicle.⁶³ The sustainable benefits of MDaaS models lie 1) in the more efficient (optimal) use of mobility through vehicle sharing and 2) through the incentive that the owner (provider) of the vehicle maintains and repairs the vehicle to extend the product life cycle as much as possible.⁶⁴ Examples are Swapfiets, Mywheels, GoSharing and Lime.⁶⁵

33. The transition from ownership to usership entails consequences for the consumer using such usership-based mobility solutions, especially because consumer protection partially focuses on consumer sales contracts. Hence, both the consumers' and the professional parties' rights and obligations change with a transition from ownership to usership. To facilitate more sustainable mobility by the transition from ownership to usership, consumer protection should undergo a similar transition from ownership to usership-central protection. In other words, a rigid consumer law framework should provide an incentive for mobility usership. Furthermore, a solid consumer law framework can be a catalyst for legal certainty, leveling out the platform's bargaining power and preventing the enforcement of unfair terms on their users.

⁶² A. TUKKER, M. CHARTER, C. VEZZOLI, E. STØ, and M. M. ANDERSEN, *System Innovation for Sustainability 1: Perspectives on Radical Changes to Sustainable Consumption and Production*, London, Routledge, 1st Edition, first published 2008, 2017; G. SCHOLL, "Exploring the symbolic meaning of usership", *Ökologisches Wirtschaften-Fachzeitschrift* 2006, (21)2, p. 30-32; A. KHAMIS, *Smart mobility: exploring foundational technologies and wider impacts*, Berkley, Apress, 1st Edition, 2021.

⁶³ R. W. OBENBERGER, S.W. BROWN, "A Marketing Alternative: Consumer Leasing and Renting", *Business Horizons*, 1976, p. 82-86.

⁶⁴ K. FRENKEN, "Political economies and environmental futures for the sharing economy", *Philosophical Transactions of the Royal Society A: Mathematical, Physical and Engineering Sciences*, 2017, (375)2095, p. 1-13; J. KIRCHHERR, L. PISCICELLI, R. BOUR, E. KOSTENSE-SMIT, J. MULLER, A. HUIBRECHTSE-TRUIJENS and M. HEKKERT, "Barriers to the circular economy: Evidence from the European Union (EU)", *Ecological Economics*, 2018, 150, p. 264-72; C. A. S. MACHADO, N. P. M. DE SALLES HUE, F. T. BERSANETI and J. A. QUINTANILHA, "An Overview of Shared Mobility", *Sustainability*, 2018, (10)12, p. 4342; C. E. CHERRY, N. F. PIDGEON, "Is sharing the solution? Exploring public acceptability of the sharing economy", *Journal of cleaner production*, 2018, 195, p. 939-48; F. BARDHI, G. ECKHARDT, "Access based consumption: the case of car sharing", *Journal of Consumer Research*, 2012, 39, p. 881-98; Chr. J. MARTIN and P. UPHAM, "Grassroots social innovation and the mobilisation of values in collaborative consumption: a conceptual model", *Journal of cleaner Production*, 2016, 134, p. 204-13.

⁶⁵ There is a relevant distinction between C2C models, where the mobility users act as both providers (prosumers) and consumers of mobility services and, on the other hand, B2C models, where businesses provide their mobility services/usership to consumers.

ii. Deficiencies existing framework

34. The EU consumer acquis has several central instruments, such as the Consumer Sales Directive, the Digital Content Directive, the Consumer Rights Directive, the Unfair Contract Terms Directive, and the Consumer Credit Directive.⁶⁶ These instruments are relevant for determining the rights and obligations of consumers in both mobility ownership and mobility usership. The problem is that some of these legal instruments do not apply to MDaaS because these instruments are sales-based and therefore focus on the transfer of ownership. Nevertheless, the applicability of those (sales-based) rights is important because otherwise equal rights would not be granted to consumers in mobility usership. For example, a consumer of MDaaS is currently neither entitled to a purchase guarantee nor has this consumer the advantage of the presumption of proof. Another inequality in protection follows, for example, from the fact that there is a maximum interest rate for consumer credit agreements, while no maximum interest rate has been set for consumers of mobility usership.⁶⁷ As a result, a deficiency of the existing legal framework arises from the difference in business model, namely the absence of the transfer of ownership in mobility usership compared to that transfer of ownership in mobility ownership. This excludes certain protective legal instruments for mobility usership in advance, such as the Consumer Sales Directive and, as just mentioned, the Consumer Credit Directive.⁶⁸

35. Another deficiency in the current legal framework follows from challenges associated with *inter alia* the unclear qualification of the contract parties.⁶⁹ The basic principle in consumer law is that it applies to agreements between a

⁶⁶ Directive (EU) 2019/771 of the European Parliament and of the Council of 20 May 2019 on certain aspects concerning contracts for the sale of goods, amending Regulation (EU) 2017/2394 and Directive 2009/22/EC, and repealing Directive 1999/44/EC, *OJEU*, L 136/28; Directive (EU) 2019/770 of the European Parliament and of the Council of 20 May 2019 on certain aspects concerning contracts for the supply of digital content and digital services, *OJEU*, L 136/1; Directive 2011/83/EU of the European Parliament and of the Council of 25 October 2011 on consumer rights, amending Council Directive 93/13/EEC and Directive 1999/44/EC of the European Parliament and of the Council and repealing Council Directive 85/577/EEC and Directive 97/7/EC of the European Parliament and of the Council, *OJEU*, L 304/64; Council Directive 93/13/EEC of 5 April 1993 on unfair terms in consumer contracts, *OJEU*, L 95; Directive 2008/48/EC of the European Parliament and of the Council of 23 April 2008 on credit agreements for consumers and repealing Council Directive 87/102/EEC, *OJEU*, L 133/66.

⁶⁷ Recital 39 Directive 2008/48/EC of the European Parliament and of the Council of 23 April 2008 on credit agreements for consumers and repealing Council Directive 87/102/EEC.

⁶⁸ Directive (EU) 2019/771 of the European Parliament and of the Council of 20 May 2019 on certain aspects concerning contracts for the sale of goods, amending Regulation (EU) 2017/2394 and Directive 2009/22/EC, and repealing Directive 1999/44/EC, *OJEU*, L 136/28; Directive 2008/48/EC of the European Parliament and of the Council of 23 April 2008 on credit agreements for consumers and repealing Council Directive 87/102/EEC, *OJEU*, L 133/66.

⁶⁹ L. GUIBAULT, N. HELBERGER, M. LOOS, Ch. MAK, L. PESSERS, B. VAN DER SLOOT, *Digital consumers and the law: towards a cohesive European framework*, Kluwer Law International BV, 2013, p. 41-52; P. P. SWIRE, "When Should 'Consumers-as-Producers' Have to Comply With Consumer Protection Laws?", *Journal of Consumer Policy*, 2008, 31, p. 485.

professional party and a consumer; these agreements are regularly specified as a ‘sales contract’ or ‘credit agreement’ for example.⁷⁰ Due to the intervention of platforms and the changing role of the consumer, who in addition to being a consumer can also be a provider (prosumer) in the platform economy, it has been unclear when consumer law applies.⁷¹ For example, there were questions as to whether a neighbour can be regarded as a professional party when this neighbour participates in a community car sharing initiative, in which the neighbour shares his own car with other neighbours. In principle, consumer law does not apply in case of a consumer-to-consumer (C2C) agreement (both the provider and the buyer in the agreement being a consumer).⁷² Whether a prosumer should be qualified as a professional party has become somewhat clearer due to the ECJ.⁷³ For example, the ECJ formulated criteria to help in assessing whether a sale is made as a trader. However, this needs to be assessed on a case-by-case basis and does not yet lead to the desired legal certainty.⁷⁴ Other initiatives towards greater legal clarity are, for example, the proposed Digital Services Act with the request to trace their traders (know your business customer-principle) and the omnibus Directive. This latter directive focuses *inter alia* on cases of an invitation to purchase for products offered on online marketplaces. Here applies that whether the third party offering the products is a trader or not shall be regarded as material on the basis of the declaration of that third party to the provider of the online marketplace.⁷⁵

⁷⁰ J. HIJMA, *Mr. C. Assers Handleiding tot de beoefening van het Nederlands Burgerlijk Recht. 7. Bijzondere overeenkomsten*, Deel I, *Koop en ruil*, Deventer, Wolters Kluwer, 2019, p. 103-121; E. HONDIUS, “The Notion of Consumer: European Union versus Member States”, *Sydney L Rev* 2006 (20)89, p. 95.

⁷¹ This includes the relationship between platform and consumer and the relationship between consumers. European Parliament, “Liability of online platforms — Panel for the Future of Science and Technology”, *Scientific Foresight Unit* (February 2021), p. 63-68; J. VALANT, “Consumer protection in the EU: Policy overview”, *European Parliamentary Research Service* (European Union, 2015), p. 15-17.

⁷² European Commission, “Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions — A European agenda for the collaborative economy”, COM(2016) 356 final (Brussel, 2 June 2016), p. 9-10; L. GUIBAULT, N. HELBERGER, M. LOOS, Ch. MAK, L. PESSERS, B. VAN DER SLOOT, *Digital consumers and the law: towards a cohesive European framework*, Kluwer Law International BV, 2013, p. 41-52.

⁷³ European Court of Justice, 9 November 2016, C-149/15, ECLI:EU:C:2016:840 (*Wathelet*); European Court of Justice, 4 October 2018, C-105/17, ECLI:EU:C:2018:808 (*Kamenova*).

⁷⁴ European Court of Justice, 4 October 2018, C-105/17, ECLI:EU:C:2018:808, p. 37 and 38 (*Kamenova*).

⁷⁵ European Commission, “Regulation of the European Parliament and of the Council on a Single Market For Digital Services (Digital Services Act) and amending Directive 2000/31/EC”, COM(2020) 825 final (Brussels, 15 December 2020); Article 3(4) Directive (EU) 2019/2161 of the European Parliament and of the Council of 27 November 2019 amending Council Directive 93/13/EEC and Directives 98/6/EC, 2005/29/EC and 2011/83/EU of the European Parliament and of the Council as regards the better enforcement and modernisation of Union consumer protection rules, *OJEU L* 328/7; Directive 2005/29/EC of the European Parliament and of the Council of 11 May 2005 concerning unfair business-to-consumer commercial practices in the internal market and amen-

iii. Existing best practices

36. Even though the law does not provide equal protection for MDaaS, nothing prevents the inclusion of contractually equivalent protection for mobility users. In the Netherlands, for example, there exists a private lease quality mark. The rules in this quality mark have been designed and declared applicable by the sector itself and are thus a form of self-regulation. In a study on consumers of mobility usership, more specifically private lease, it appeared that this quality mark entails more extensive rights than the legislative rights arising from the Consumer Credit Directive and the Consumer Rights Directive.⁷⁶ In this exemplary study, self-regulation partially eliminates the difference between mobility ownership and mobility usership.⁷⁷ After all, with the rules that the quality mark designed, it draws a parallel with the rules from the Consumer Credit Directive. However, the sector did not choose for full equal protection and does not fully raise the protection (1) for the right to information and (2) against over-crediting.⁷⁸ However, the protective rules remain a matter of — voluntary — self-regulation. In other words, this protection is not enshrined in law and may cease to exist overnight. In other market segments, such a quality mark does not exist yet. In the Netherlands, however, CROW-Fietsberaad, a knowledge center for bicycle policy of the Dutch governments, is thinking about introducing a quality mark for bicycle sharing (shorter-term use).⁷⁹

iv. Pending proposals and recommendations *de lege ferenda*

37. The existing gaps and resulting legal uncertainties highlight the need for potential regulatory intervention. The ELI Model Rules on Online Platforms is a project that considers burdening online platforms with *inter alia* information

ding Council Directive 84/450/EEC, Directives 97/7/EC, 98/27/EC and 2002/65/EC of the European Parliament and of the Council and Regulation (EC) No 2006/2004 of the European Parliament and of the Council, *OJEU* L 149/22.

⁷⁶ J. DE VOGEL, “Private Lease: Consumer Credit in Disguise?”, *Journal of European Consumer and Market Law* 2020 (9)2, p. 51-60; Directive 2008/48/EC of the European Parliament and of the Council of 23 April 2008 on credit agreements for consumers and repealing Council Directive 87/102/EEC, *OJEU*, L 133/66; Directive 2011/83/EU of the European Parliament and of the Council of 25 October 2011 on consumer rights, amending Council Directive 93/13/EEC and Directive 1999/44/EC of the European Parliament and of the Council and repealing Council Directive 85/577/EEC and Directive 97/7/EC of the European Parliament and of the Council, *OJEU*, L 304/64.

⁷⁷ J. DE VOGEL, “Private Lease: Consumer Credit in Disguise?”, *Journal of European Consumer and Market Law* 2020 (9)2, p. 51-60; S. E. MACHIELS and T. M. PENNINKS, ‘Private lease’, *FR*, 2015, 5, p. 165-169.

⁷⁸ J. DE VOGEL, “Private Lease: Consumer Credit in Disguise?”, *Journal of European Consumer and Market Law*, 2020 (9)2, p. 51-60.

⁷⁹ CROW-fietsberaad, “Kopgroep huur- en deelfietsinitiatieven: Rapportage” (Versie juni 2017), p. 1-48, https://www.fietsberaad.nl/CROWFietsberaad/media/Kennis/Bestanden/201708_13_Rapportage_Fietsdelen_V13.pdf?ext=.pdf, accessed on 5 January 2022.

obligations and liabilities.⁸⁰ Yet, the ELI model rules may offer a solution regarding the ambiguities about the legal qualifications of the contracting parties, referred to above. To equate consumer protection in mobility usership with mobility ownership, a more unambiguous qualification of the parties is necessary. Although the ELI model rules define different concepts, the definitions of the ‘trader’ and the ‘consumer’ seem to be corresponding definitions of EU law. Although this does not seem to provide much clarity, this is perhaps a step in the right direction. For example, the definition of a ‘supplier-consumer contract’ has been considered, which in practice could entail a C2C mobility usership contract.⁸¹ These could therefore be the initial steps towards an unambiguous qualification of contracting parties and could therefore provide clarity about the applicability of consumer law instruments. Also, consideration should be given to the possibility of formulating sales-based instruments more broadly so that they are not only aimed at the transfer of ownership but can also apply to mobility usership. Another option is to design a new instrument to create equal rights for consumers of mobility usership.

CONCLUSION

EU and local policy on sustainable mobility rapidly evolves and high level policy documents are being issued at short intervals, tagging into innovative business models and at the same time trying to boost these business models. Insufficient regards are however given to the impact of the existing legal framework as a catalyst or rather obstacle to such ecological transition. Moreover the single focus on ecological transition seems to come at the cost of losing out of sight other long-existing policy targets, notably passenger rights protection and consumer rights protection. A sustainability policy in mobility thus requires to zoom out from the single focal point of policy and the trust that potentially ecological means of transport will automatically realize their potential. Only this way the ecological transition of mobility can be successful and sustainable.

⁸⁰ European Law Institute, “Model Rules on Online Platforms”, 2019, p. 1-65, https://www.europeanlawinstitute.eu/fileadmin/user_upload/p_eli/Publications/ELI_Model_Rules_on_Online_Platforms.pdf, accessed on 7 January 2022.

⁸¹ European Law Institute, “Model Rules on Online Platforms”, 2019, p. 1-65, https://www.europeanlawinstitute.eu/fileadmin/user_upload/p_eli/Publications/ELI_Model_Rules_on_Online_Platforms.pdf, accessed on 7 January 2022.