

Roadworthiness package

This briefing provides an initial analysis of the strengths and weaknesses of the European Commission's impact assessment (IA) accompanying the [proposal](#) amending Directive 2014/45/EU on periodic roadworthiness tests for motor vehicles and their trailers and Directive 2014/47/EU on the technical roadside inspection of the roadworthiness of commercial vehicles circulating in the Union, and the [proposal](#) on the registration documents for vehicles and vehicle registration data recorded in national vehicle registers. Both proposals have been referred to the European Parliament's Committee on Transport and Tourism (TRAN).

KEY FINDINGS

The impact assessment provides a qualitative and quantitative analysis to underpin the revision of the roadworthiness package. It explains the analytical methods used and acknowledges the limitations and uncertainties of the available data and findings. While it clearly identifies the problems and their drivers, further quantification of their scale would have benefited the problem description. Furthermore, even though the IA presents a sufficient range of policy options, they are partially cumulative and therefore not entirely distinct alternatives. The IA duly assesses the main economic, social and environmental impacts of the options, but further explanations of certain methodological choices (e.g. the calculation of administrative costs for citizens) would have strengthened the analysis. The justification of the choice of the preferred option could have been more robust, as it scored highest on the coherence criterion, while other options performed better in terms of effectiveness and efficiency. In this context, information on the views of stakeholder groups on the options would have been helpful. Overall, the stakeholder consultation shows some shortcomings. For instance, stakeholders were not consulted on all policy measures – such as citizens on the testing of older vehicles – and small and medium-sized enterprises (SMEs), despite being significantly affected, do not appear to have been sufficiently targeted. Finally, it appears that the proposals are mostly in line with the preferred option of the IA.

Background

The European Commission's [sustainable and smart mobility strategy](#) announced plans to revise the current EU roadworthiness legislative package (RWP, 2014) to ensure that vehicles comply with evolving safety and emissions standards. In its 2021 [resolution](#) on the 2021–2030 EU road safety policy framework, the European Parliament urged the Commission to strengthen the roadworthiness testing regime to keep pace with technical advances in vehicle safety features. The initiative to revise EU roadworthiness legislation was included in the [2023 Commission work programme](#) as a REFIT initiative (Annex II).



Problem definition

The 2021-2030 EU [road safety policy framework](#) is based on the 'Safe System' approach, according to which deaths and serious injuries in road collisions become largely preventable by acting on five pillars: safe roads and roadsides, safe speeds, safe road users, safe vehicles, and fast and effective post-crash care. The EU's roadworthiness legislation focuses on safe vehicles. The existing legislative framework is composed of three directives relating to periodic technical inspections (PTI) for motor vehicles and their trailers ([2014/45/EU](#)), technical roadside inspections (RSI) of commercial vehicles ([2014/47/EU](#)) and vehicle registration documents (VRD) ([2014/46/EU](#)).

The [ex-post evaluation](#), conducted in parallel with the IA (back-to-back), found that the roadworthiness package has increased road safety and helped reduce air pollutant emissions. However, it also concluded that the package only partially succeeded in achieving its objectives. The evaluation considered, among other things, that defective vehicles could remain undetected because some types of vehicles are not subject to PTIs or RSIs in some Member States, and testing (frequency, scope) is not adapted to their safety and environmental risk and to the latest technologies (e.g. advanced driver assistance systems, electronic safety features). The IA explains the links between the main findings of the ex-post evaluation and the IA in Annex 11 (pp. 299-300).

Drawing on the stakeholder consultation, the ex-post evaluation, the IA supporting study,¹ and other studies in the policy field, the IA identifies **three problems** (Ps):

P1: Presence of unsafe vehicles on EU roads. The IA explains that road crashes continue to impose high costs on society, amounting to €250 billion per year (IA, p.2) and unsafe vehicles are one of the main causes of crashes, or at least a significant contributing factor.² According to the IA, the share of vehicles with major or dangerous defects³ ranges between 20 % and 25 % for almost all types of vehicles. Only a part of the unsafe vehicles can be detected in PTIs and the RSIs, and some are not subject to testing. It considers that early detection of defects in older vehicles, which are prone to breakdowns and contribute to more road crashes, could significantly improve road safety, given the increased [average age](#) of the EU fleet (e.g. around 14 years for trucks). It also states that, although the share of safety-tampered cars in the entire fleet is low, their 'share is higher among those involved in crashes' (not quantified in the IA),⁴ (IA, pp. 7-10).

The IA highlights the safety risks caused by improperly stowed or secured cargo which can slide or fall from a vehicle and potentially cause collisions. It notes that the current roadworthiness package includes only non-binding provisions on cargo securing inspections. For motorcycles – currently subject to PTI testing with an option to opt out – the IA stresses the importance of regularly checking components such as tyres and brakes to ensure safety. However, it does not provide quantified estimates of the contribution of unsecured cargo or motorcycle defects to road crashes (pp. 10-11).

P2: Insufficient control of vehicle air pollutant and noise emissions. The IA notes that, although air pollutant emissions from road transport have decreased since 1990, levels of harmful emissions affecting health and the environment remain high. For example, road transport is responsible for 40.6 % of NO_x and 10.5 % of PM_{2.5} emissions in the EU. The IA explains that real-world NO_x emissions from modern vehicles can be above type approval limits, due to tampering or an absence of emission-reducing technologies. It also notes that there is currently no EU provision to test vehicles for defects or manipulation of NO_x and diesel particulate filters. The IA mentions that, depending on the Member State and how checks are conducted, vehicles with defective emission control equipment or above-limit exhaust emissions range between 1 % and 45 % of the fleet (IA, pp. 12-13).

Road transport is the largest source of noise pollution in the EU and the IA highlights that modified or defective exhaust systems are a significant contributor. The IA does not quantify the share of high noise emitters in the total vehicle fleet, which limits assessment of the scale of the problem. While it provides some indicative data, e.g. 30 % of motorcycles in RSIs in Bavaria (2018) were equipped

with tampered-with noise control systems, it openly acknowledges that estimates of motorcycles with above legal limit noise emissions are drawing on limited data (IA, pp. 13, 118).

P3: The roadworthiness directives are not effective in enforcing rules in EU cross-border traffic and vehicle trade. The ex-post evaluation showed national authorities face difficulties in enforcing road safety measures in an EU cross-border context. For example, they may register different vehicle data sets or may have problems in accessing registration data and other safety-relevant information, especially in a situation where a vehicle is registered in another Member State. The IA refers to 'various' (not quantified) complaints and [SOLVIT](#) requests claiming that citizens find the process inefficient and cumbersome. The ex-post evaluation also identified some inconsistencies in the definitions used between the Vehicle Registration Directive (VRD) ([2014/46/EU](#)) and the Type Approval Regulation ([EU 2018/858](#)), for instance on vehicle registration data/terminology, which may lead to errors and confusion when recording vehicle information during re-registration (IA, pp. 13-14).

The IA considers that difficulties in the cross-border exchange of safety-relevant information have a negative impact on the fight against odometer tampering. The IA supporting study estimates fraud rates in used cars from 2.2 % to 10 % in national sales, and from 4.4 % to 25.7 % in cross-border sales. The IA report refers to a European Parliament [study](#) which estimated the economic costs of odometer fraud in second-hand cars traded cross-border in the EU at around €8.77 billion per year, resulting from a lack of cooperation between Member States and insufficient exchange of mileage information (IA, p. 14).

The IA identifies **five problem drivers** (Ds), expected to persist without further EU action (IA, pp. 15-20):

- D1: PTI methods are not available to test electric vehicles, electronic safety and driver assistance systems (linked to P1).
- D2: Current PTI and RSI methods are not suited to measuring the emission performance of modern vehicles (linked to P2).
- D3: Limited technical possibilities to detect vehicles with defective or tampered components (linked to P1-3).
- D4: Vehicle identification and status data are not sufficiently available to, and recognised among, enforcing authorities (linked to P3).
- D5: Certain vehicles are not sufficiently tested for roadworthiness (linked to P1-3).

Overall, in line with the [Better Regulation Guidelines](#) (BRG), the IA clearly identifies the problems and their drivers, provides estimates of their scale and sufficiently substantiates the revision of the roadworthiness package. Sources are, in general, duly referenced; however, in some cases, references such as 'experts' or 'others' are too vague (IA, p. 10). While further quantification would have strengthened the analysis, the IA is transparent about the limitations of the available data.

Subsidiarity/proportionality

The proposed legal basis of this initiative is Article 91(1)(c) of the Treaty on the Functioning of the European Union (TFEU) regarding laying down measures to improve transport safety. The IA sufficiently substantiates the necessity and added value of EU action. It explains that the revision of the current roadworthiness package to reflect recent regulatory and technological developments can be carried out more efficiently and effectively only at EU level (IA, p. 22).

Subsidiarity and proportionality are further discussed in the comparison of policy options. In addition, while a subsidiarity grid is not provided, Annex 14 of the AI analyses the policy options and measures in terms of coherence, subsidiarity and proportionality (pp. 305-308). The subsidiarity deadline for national parliaments is 22 July 2025 for the [proposal](#) on roadworthiness and

8 September 2025 for the [proposal](#) on vehicle registration and data. No reasoned opinions were submitted at the time of writing.

Objectives of the initiative

This initiative has **three general objectives**: improve road safety in the EU; contribute to sustainable mobility; and facilitate the free movement of persons and goods in the EU (IA, p. 23).

The IA defines **three specific objectives** (SOs), linked to the problem drivers (IA, pp. 23–24), and identifies **five problem drivers** (Ds), which are expected to persist without further EU action (IA, pp. 15–20):

- SO1: Ensure the adequacy, consistency, objectivity, and quality of roadworthiness testing of today's and tomorrow's vehicles (linked to D1, D2, D3, D5).
- SO2: Significantly reduce fraud and tampering and improve the detection of defective vehicles (linked to D2, D3, D5).
- SO3: Improve electronic storage and exchange of relevant vehicle identification and status data (linked to D3, D4).

In line with the BRG recommendation, the IA presents **four operational objectives** for the preferred option in the monitoring and evaluation section (IA, pp. 75, 309–310). The objectives appear to meet the S.M.A.R.T criteria ([Tool#15, Better Regulation Toolbox](#)) as they are specific, measurable, achievable, relevant and timebound. The IA expects this initiative to contribute to the [Sustainable Development Goals](#) (SDGs), particularly to SDG 3 (Good health and well-being) (IA, p. 7).

Range of options considered

The IA presents four policy options (POs) in addition to the baseline scenario, which appears adequately described. All options include a set of common policy measures (PMC), which the IA considers as the 'minimum necessary' to address the shortcomings of the current roadworthiness package directives. In addition, they include measures (PM) which differ from the scope and the level of ambition (IA, pp. 24–32). The policy measures are clearly linked to the specific objectives. According to the IA, the packaging of options reflects their differing focus. For example, PO1a focuses on enhancing the exchange of vehicle data and digitalisation, while PO1b focuses on improving vehicle testing and recognition of PTIs.

Overall, the criteria used to compile the list of common measures are not clearly explained. For instance, it is unclear why certain measures – such as the digital registration certificates (PM16) or the minimum set of data for the vehicle register (PM17) – are not included among the common measures. Furthermore, the policy options appear to be partially cumulative, suggesting that the options may not represent entirely distinct or real alternatives. For example, PO2 includes most of the measures of Options 1a and 1b while PO3 incorporates most measures from PO2. In general, the IA describes the policy measures to a satisfactory level, but for certain measures a more detailed explanation would benefit the analysis. For example, regarding the measure on increased testing frequency for older vehicles, the IA neither clearly justifies the choice of a 10-year threshold nor assesses alternative thresholds (pp. 27–32, 272–287).

Finally, the IA also discusses the discarded measures (IA, pp. 288–290). For example, setting a mileage limit between two PTIs has been discarded as not technically feasible due to monitoring difficulties and the potential to incentivise odometer tampering.

Table 1 – Overview of policy measures and policy options

Policy measures	PO1a	PO1b	PO2	PO3
PMC1. Adapt PTI to electric and hybrid vehicles (safety, environmental performance, standardised data), including training of inspectors (SO1)	X	X	X	X
PMC2. Update PTI and RSI due to new requirements in General Safety Regulation and checking emission reduction systems, by reading on-board diagnostics (SO1)	X	X	X	X
PMC3. Mandatory PN testing of LDVs and HDVs equipped with particle filter, at PTI, and of HDVs at technical roadside inspections of commercial vehicles (SO1,2)	X	X	X	X
PMC4. Mandatory NO _x testing of LDV and HDV at PTI, and HDVs at roadside (SO1,2)	X	X	X	X
PMC5. Mandatory roadworthiness testing following significant modification of the vehicle (e.g. change of class, propulsion system) (SO2)	X	X	X	X
PMC6. Require the roadworthiness certificate in electronic format only (SO3)	X	X	X	X
PMC7. Provide electronic access to relevant data, including on PTI reports stored in national databases, to the registration authorities of other EU Member States using a common interface (SO3)	X	X	X	X
PMC8. Harmonisation and regular update of the technical data in the vehicle registration documents (currently optional content) (SO3)	X	X	X	X
PMC9. Member States to record odometer readings in a national database and make the records available to other Member States in the case of re-registration (SO2,3)	X	X	X	X
PM1. RSI for heavy/powerful motorcycles (L category > 125cm ³) as an alternative measure, in Member States where they are not subject to PTI (SO2)	X		X	
PM2. Mandatory PTI for motorcycles above 125cm ³ (remove opt-out) (SO2)		X		
PM3. Extend PTI to all motorcycles (incl. from 50cm ³ = all L3e, L4e), plus tricycles (L5e) and heavy quadricycles (L7e) (SO2)				X
PM4. Mandatory PTI for light trailers (O1 and O2 categories) (SO2)				X
PM5. Annual emission testing for light commercial vehicles (N1) instead of the currently required 4-2-2- frequency (SO2)		X	X	X
PM6. Mandatory yearly testing for vehicles that are 10 years old or older (SO2)		X	X	X
PM7. PTI certificate issued in any EU Member State is recognised by the Member State of registration + further harmonisation of test methods (SO1,3)				X
PM8. PTI certificate issued in any EU Member State is recognised by the Member State of registration for a period of up to six months (for passenger cars only), on the condition that the next PTI is conducted in the Member State of registration (SO3)		X	X	
PM9. PTI in another EU Member State recognised by Member State of registration based on bilateral agreement (voluntary recognition) (SO3)	X			
PM10. More advanced testing of noise for motorcycles (SO2)		X	X	X
PM11. Data governance: further define the procedures and the means of access to vehicle technical information by testing centres free of charge (SO1,3)			X	X

Policy measures	PO1a	PO1b	PO2	PO3
PM12. NO _x , PM, and noise measurement by remote sensing in RSI of all vehicles (with option for simplified PTI if vehicle passed recent RSI) (SO1,2)		x	x	x
PM13. Mandatory inspection of cargo securing (SO1,2)		x	x	x
PM14. Extend the scope of application of roadside inspections to light commercial (N1) vehicles (SO2)			x	x
PM15. Extend the scope of application of roadside inspections to two- and three-wheeled vehicles (L-vehicles from L3) (SO2)				x
PM16. Introduce issuing registration certificates in digital format to gradually replace current paper (and smart card) documents (SO3)	x		x	x
PM17. Add new data to the vehicle register – minimum mandatory set (SO3)	x		x	x

Source: Compiled by the author based on Table 3 (IA pp. 27–29). The preferred option is indicated in grey.

Assessment of impacts

As required in the Better Regulation Guidelines, the IA assesses the main economic, social and environmental impacts of the policy options covering 2026 to 2050 (pp. 32–62).

Economic impacts are analysed for national public authorities (NPAs), businesses (e.g. PTI centres,⁵ vehicle manufacturers, garages) and citizens (as private vehicle owners). For 2026–2050, policy options involve adjustment and administrative costs for NPAs and PTI centres, which are expected to be offset by cost savings and additional revenues (for PTI centres). Similarly, business vehicle owners and private citizens will face administrative costs, which are expected to be offset by cost savings. Finally, vehicle manufacturers and garages would only incur administrative costs (IA, pp. 32–53).

In general, while the assessment of economic impacts appears comprehensive and transparent, the references to stakeholders' views are at times rather vague (e.g. in the context of the NO_x and PN measurement devices – IA, p. 160), or mention an estimate of only one specific stakeholder, without cross-verification or triangulation (BRG Toolbox, Tool #4) and without clarifying what the cost includes (e.g. the cost of a PTI lane, IA, p. 163). Furthermore, the report could more clearly justify certain methodological choices – for example, why the time spent on PTIs (including travel, waiting and inspection) by citizens or business vehicle owners is excluded from their administrative costs; why retraining is only considered for cargo securing inspections; or why maintenance costs for new tools are omitted in some measures – for instance, insulation resistance tools in PMC1 or on-board diagnostics (OBD) tools in PMC2.

Regarding the **social impacts**, the IA considers road safety, employment and fundamental rights. It states that impacts on employment would arise mainly from measures extending the scope of PTIs and/or RSIs or those increasing the testing frequency. For example, under PO2, additional inspectors would be needed by 2050 (20 207 for PTIs and 243 for RSIs). In terms of road safety, the IA argues that the reduction of unsafe vehicles would lead to fewer road accidents, thereby decreasing fatalities and injuries. While recognising the uncertainty in defective vehicles' contribution to road crashes, the IA estimates that the number of fatalities saved over 2026–2050 in the EU would range from 4 661 (PO1a) to 7 013 (PO3), and the equivalent monetised external cost savings, including by avoiding serious and slight injuries, from €48 billion (PO1a) to €75.2 billion (PO3), expressed as present value over 2026–2050 (IA, pp. 10, 57–60, 200, 209–214).

According to the IA, the policy options would fully respect fundamental rights and 'none will have any negative impact' (p. 60). However, certain measures relating to data governance, odometer readings, digitalisation and access to roadworthiness certificates entail access to personal data which may limit relevant rights (i.e. right to privacy and protection of personal data). The IA neither provides further information on the type of data needed nor assesses the need for specific safeguards to mitigate these limitations (IA, pp. 301–302).

In its analysis of the **environmental impacts**, the IA considers air pollutants (NO_x and PM), CO₂ and noise emissions, as well as natural resources, and finds that all the policy options are consistent with the 'no significant harm' principle. It notes that the digitalisation of certificates would have a positive impact on natural resources and presents the estimates of the external cost savings of air pollutant emissions and noise. These range from €58.6 billion (PO1a) to €76.1 billion (PO3) for air pollution and from €0.15 billion (PO1a) to €7.7 billion (PO3) for noise (expressed as present value over 2026–2050). Impacts on CO₂ emissions and climate change are not quantified, yet the IA acknowledges that the effect on climate change may be 'substantial' (IA, pp. 60–62).

In its brief analysis of **territorial impacts**, the IA stresses that there is 'no inherent bias' in the policy options regarding specific regions or territories but refers to the implications of different climatic and territorial conditions, e.g. engine NO_x tests or the long distances to reach a PTI centre. While it mentions that Member States would be allowed to adapt testing procedures to their specific climatic conditions, it does not clarify which specific measures should be adapted (IA, p. 56).

The IA compares the policy options against the criteria of effectiveness, efficiency, and coherence, as well as subsidiarity and proportionality. PO3 is presented as the most effective option, closely followed by PO2. PO1a scores highest in efficiency based on the benefit-to-cost ratio, while PO2 delivers the highest net benefits. The IA identifies PO2 as the most coherent option. It considers all options except PO3 equal from the point of view of subsidiarity and proportionality and acknowledges that under PO3 some measures concerning the full recognition of PTI certificates or the extension of PTI scope to light motorcycles and light trailers might be seen to go beyond what is necessary (IA, Annex 14, pp. 305–308).

The IA concludes that **PO2 is the preferred option**. It is expected to bring net benefits of €2.6 billion for NPAs, €17.2 billion for PTI centres, €93.9 billion for business vehicle owners, and €54.7 billion for citizens (expressed as present value over 2026–2050). Additionally, it would save 6 912 lives by 2050, and reduce external costs of accidents by €74.1 billion, including those related to fatalities, and serious and slight injuries. The initiative would also lead to a reduction in external costs from air pollutant emissions amounting to €76.1 billion. The IA presents a sensitivity analysis, to address the uncertainties in assumptions which confirms the findings of the assessment, both in terms of results and the ranking of the policy options (pp. 68–71). Nevertheless, given that PO2 received similar scores to PO1b and PO3, and scores highest only on coherence, the IA could have provided a more convincing justification for its selection as the preferred option. In addition, a more detailed presentation of the views of different stakeholder groups on policy options would have strengthened the analysis and clarified the extent to which PO2 is supported (and by whom).

SMEs/Competitiveness

The IA finds that the revision of the roadworthiness package is relevant to SMEs and performs an **SME test** following the Better Regulation Guidelines ([Tool #23](#)). However, it does not differentiate the impacts (e.g. costs and benefits) between SMEs and large companies due to the lack of statistics on the share of SMEs among PTI centres, vehicle-owning businesses and garages. The consultation strategy appears to have lacked specific activities aimed at gathering input from SMEs (e.g. SME panels), and the activities conducted did not collect sufficient information to disaggregate the results by company size. Acknowledging that a large share of these impacts is expected to fall on SMEs, it suggests, as a mitigating measure, the extension of the transitional period for SMEs to

update their equipment and facilities (IA, p. 55, Annex 10, pp. 296–298). As required in the Better Regulation Guidelines, the IA presents a **competitiveness test** (Annex 5, pp. 263–265), which considers impacts on the competitiveness dimensions. For example, it finds that the initiative would not have an 'evident' impact on EU businesses' international competitiveness, while it would positively affect innovative capacity (test requirements).

Simplification and other regulatory implications

The IA explains that this REFIT initiative would contribute to simplification and improved efficiency by replacing outdated tests in PTIs and RSIs with modern solutions, and by interconnecting national databases to enable access to and sharing of vehicle data, for instance. It also considers the costs of the preferred option (PO2) relevant to the 'one-in, one-out' principle (Better Regulation Guidelines Toolbox, Tool #59). In total, businesses (PTI centres, vehicle manufacturers and garages) are expected to incur an administrative burden of €51.9 million (annualised). No administrative burden is expected for citizens (IA, p. 107, Annex 3, p. 107).

Monitoring and evaluation

The IA outlines a monitoring plan consisting of 16 relevant and quantifiable indicators, each linked to the four operational objectives (Annex 15, pp. 309–310). Data sources would rely on triannual reporting by Member States – replacing the current biannual reporting – and on ad hoc data collection efforts. The IA states that the Commission would conduct an evaluation five years after the revised legislation enters into force to assess its effectiveness (IA, p. 75). It also highlights the need to collect data on the number of PTI lanes and inspectors to enable a more accurate assessment of the measures' impact (IA, p. 309).

Stakeholder consultation

In line with the Better Regulation Guidelines, the IA provides a summary of stakeholder consultation activities in Annex 2 (pp. 81–83), covering October 2021 to August 2023. A combined [call for evidence](#) (ex-post evaluation and IA) was published for feedback from 4 October to 1 November 2021, followed by a 12-week open public consultation conducted from 6 July to 28 September 2022. Although the evaluation and IA were carried out as a back-to-back exercise, targeted consultations appear to have been conducted separately for each.

The IA includes a brief overview of the different types of consultations and references their results. It provides numerical data primarily for the targeted online survey. However, the results are presented without disaggregating the findings by stakeholder group, contrary to the recommendation in the Better Regulation Guidelines Toolbox ([Tool #53](#)). It appears from the [factual summary report](#) of the public consultation and the consultation summary (Annex 2) that stakeholders were not consulted on all proposed policy measures – for instance, citizens on the annual testing of older vehicles, and business vehicle owners on the annual emissions testing for light commercial vehicles. In general, although the initiative is expected to have a significant impact on SMEs, the limited input gathered from them is not sufficient to enable a disaggregated analysis by company size.

Finally, while the IA acknowledges the presence of a campaign in the public consultation (731 out of 907 responses), it does not provide a separate analysis of these responses, or a summary of the views expressed. This falls short of the standards set out in the Better Regulation Guidelines Toolbox ([Tool #54](#)), which explicitly requires that campaign contributions be treated and analysed separately.

Supporting data and analytical methods used

The analysis draws on a range of data sources, including an ex-post evaluation, an external IA supporting study, stakeholder consultations and studies relevant to the policy field. The sources are generally well-referenced, with most of them hyperlinked. However, at the time of writing, the supporting study does not appear to be publicly available, which limits the transparency of the IA.

The IA details the analytical methods, assumptions and estimates to assess economic, social and environmental impacts in a dedicated Annex 4 (pp. 109–261). It relies on the PRIMES-TREMOVE model (included in [MIDAS](#), the Commission's Modelling Inventory and Knowledge Management System) to provide quantified estimates of variables to calculate the costs and benefits of different policy options. The IA also uses foresight tools (e.g. megatrends) in the analysis (pp. 21, 25).

The IA is transparent about its data limitations and acknowledges the considerable uncertainty this introduces into the results. Therefore, it has conducted a sensitivity analysis relating to the contribution of defective vehicles to road crashes, the share of high-emitting vehicles (air pollution and noise) within the fleet and the economic damage caused by odometer fraud and the number of tampered-with vehicles (IA, pp. 68–71; Annex 4, pp. 255–260)

Follow-up to Commission Regulatory Scrutiny Board opinion

The Regulatory Scrutiny Board issued a positive [opinion](#) with reservations on the draft IA report on 13 December 2023. It found that the IA should be clearer about the scale of the problem, and about the robustness of the underlying evidence and assumptions, and clarify to what extent key assumptions were validated by independent experts. Furthermore, it should better explain the packaging of policy options, the key policy choices and their related trade-offs. Finally, it should provide a more detailed and nuanced comparison of these options.

As required in the Better Regulation Guidelines ([Tool #11](#)), the IA provides explanations on how it has addressed the Regulatory Scrutiny Board's remarks (pp. 76–79). It appears that most of these have been addressed; however, some issues remain. For example, the IA could have better illustrated the geographical distribution of the problems, explained the reasoning for not including the digitalisation of registration certificates in the common measures and provided further justification for the choice of the preferred option.

Coherence between the Commission's legislative proposals and IA

The proposals generally align with the IA's preferred option. However, the proposal on roadworthiness includes mandatory PTIs for motorcycles above 125 cm³, while the preferred option of the IA would allow RSIs as an alternative measure when motorcycles are not subject to PTIs. Furthermore, to verify the level of exhaust emission and noise through remote sensing, it mandates three measurements within six months before a vehicle is required to undergo a test.

ENDNOTES

- ¹ Ricardo et al., Impact assessment support study on the directives of the roadworthiness package, 2023.
- ² The IA points out that, while the link between vehicle condition and increased road safety is supported by studies and relevant data, the exact nature of this causal relationship remains uncertain. The IA uses 4 % for cars, vans and heavy-duty vehicles and 6 % for motorcycles as factors of defective vehicle contribution to road accidents (p. 10).
- ³ Article 7 of the PTI directive defines major deficiencies as those that 'may prejudice the safety of the vehicle or have an impact on the environment or put other road users at risk'. Similarly, dangerous deficiencies are those that 'constitute a direct and immediate risk to road safety or have an impact on the environment which justify that a Member State or its competent authorities may prohibit the use of the vehicle on public roads'.

⁴ According to the IA, safety-related tampering includes the 'manipulation of engine performance, torque, maximum speed and improved acceleration, representing an obvious safety risk' and 'due to the nature of the problem, available data on it is rather limited' (IA, p. 10).

⁵ The IA explains that PTI centres are classified under businesses for the purpose of the IA (p. 39).

This briefing, prepared for the Committee on Transport and Tourism (TRAN), analyses whether the principal criteria laid down in the Commission's own Better Regulation Guidelines, as well as additional factors identified by the Parliament in its Impact Assessment Handbook, appear to be met by the IA. It does not attempt to deal with the substance of the proposal.

DISCLAIMER AND COPYRIGHT

This document is prepared for, and addressed to, the Members and staff of the European Parliament as background material to assist them in their parliamentary work. The content of the document is the sole responsibility of its author(s) and any opinions expressed herein should not be taken to represent an official position of the Parliament.

Reproduction and translation for non-commercial purposes are authorised, provided the source is acknowledged and the European Parliament is given prior notice and sent a copy.

© European Union, 2025.

eprs@ep.europa.eu (contact)

www.eprs.ep.parl.union.eu (intranet)

www.europarl.europa.eu/thinktank (internet)

<http://epthinktank.eu> (blog)