

Enhancing EU Payment Services Provisions: Exemption from SCA for Electric Vehicle Charging Stations

Position Paper – 31 October 2023

Executive Summary

In light of the European Commission's ongoing review of the Payment Services Directive (PSD2) with its proposals issued on June 28th, 2023, and the relevant request for feedback, we welcome the opportunity to address emerging challenges in the context of the implementation of the EU Alternative Fuels Infrastructure Regulation (AFIR), its impact on building the European network of electric vehicle (EV) charging stations, and meeting the objectives set out in AFIR.

Further growth in Europe's electric vehicle fleet and charging infrastructure could help the EU meet emissions reduction targets and ensure progress towards its 2050 objective of being climate neutral.

This paper advocates for a new exemption under Chapter III of the Regulatory Technical Standards on strong customer authentication and secure communication (SCA). Specifically, an exemption from the SCA requirements for payments at EV charging stations payment terminals. This exemption is vital to facilitate seamless and user-friendly payment experiences, driving the adoption of electric mobility while ensuring security, and helping to accelerate the deployment of the EV charging infrastructure in Europe.

Context

The introduction of the SCA framework within PSD2 has played a key role in reducing fraud levels¹. It has also showed ability to deal with evolving circumstances, like the COVID-19 pandemic. During the pandemic, payment service providers were granted the possibility to use provisions under Article 11 of the Regulatory Technical Standards (RTS) on SCA and increase the threshold for contactless payments to EUR 50 in all EU countries². The lockdown forced many people to change their habits related to payments, and led to an increase in non-cash transactions (cards, digital wallets) to avoid physical contact and a significant rise in e-commerce. Increasing the threshold represented a good example of striking the right balance between innovation and security.

¹ European Commission, Directorate-General for Financial Stability, Financial Services and Capital Markets Union, Bosch Chen, I., Fina, D., Hausemer, P., et al., *A study on the application and impact of Directive (EU) 2015/2366 on Payment Services (PSD2)*, Publications Office of the European Union, 2023, https://data.europa.eu/doi/10.2874/996945;

² European Banking Authority, Statement on consumer and payment issues in light of COVID19, 25.03.2020, https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20Press/Press%2 https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20Press/Press%2 https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20Press/Press%2 <a href="https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20Press/Press%2 <a href="https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20consumers%20on%20 <a href="https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20consumers%20on%20 <a href="https://www.eba.europa.eu/sites/default/documents/files/document_library/News%20and%20consumers%20on%20 <a href="https://www.eba.eu/sites/default/documents/files/document_library/News%20and%20consumers%20on%20 <a href="https://www.eba.eu/sites/default/documents/files/documents/files/documents/20on/documents/20on/documents/files/documents/fi

The EU's transportation sector ranks as one of the primary sources of greenhouse gas emissions. Therefore, mobility is an essential sector for the EU to meet its Green Deal goals and the recent adoption of AFIR is aiming to increase the availability of EV charging stations.

In this context, the deployment of EV charging infrastructure must be ramped up at a much higher pace to further encourage the adoption of sustainable mobility, providing location wide usability and convenience for customers.

Reaching already 600.000 charging stations³, the continuous roll-out of EV charging infrastructure in the EU will imply a significant increase in the number of credit card terminals.

Publicly accessible EV charging terminals involve low-risk and mostly low-value transactions, similar to those for public transport and parking fees, which are the only terminals exempted from the SCA rules⁴. A payments service legislative framework that is less rigid in its directives does not in any way signify compromised security levels for both consumers and businesses. As the safety regulatory standards in the PSD2 get reviewed, we call for an exemption from the SCA requirements for payments at charging points, due to the unique characteristics of EV charging transactions and their critical role in environmental sustainability.

Furthermore, industry data shows that the average price for ad-hoc DC recharging sessions at publicly available stations is between EUR 8 and EUR 17 (for vehicles of segments A and B) and between EUR 16 and EUR 36 (for vehicles of segments C and D), well under the threshold of EUR 50⁵ required for SCA payments. Nonetheless, there could be cases where ad-hoc DC charging could account for more than EUR 50 (e.g. multiple recharging sessions during long trips, situations where over-stay fees apply and HDVs recharging). This is why pre-authorization for these transactions would be necessary.

The SCA exemption will stimulate a seamless payment experience at EV charging points which is critical to promote public acceptance of e-mobility technologies. Both owners and users of EV infrastructure will benefit from access to contactless payments at the point of sale.

It will also reduce hardware costs of both future and existing infrastructure, as it would remove the need to install physical PIN-pads, leading to a quicker roll-out of EV charging points across Europe.

Advancements in cybersecurity measures for remote payment service providers at EV charging points are lowering the risk of fraudulent activities. Cyberattacks against EV charging points have limited impact whereby only circumstantial information (customers IDs, charge time and payment amounts) may be affected, however not critical financial data that can be exploited in fraud.

Through payment security solutions based on biometrics, users can authorize the payment through face recognition or a finger scan. As the payment industry is creating new secure solutions such as digital identity or behavioural data analytics to reduce the exposure to payment fraud and identity

³ A breakdown of the infrastructure rollout, tracked by the EU Alternative Fuels Observatory, checked on 27.10.2023 at https://alternative-fuels-observatory.ec.europa.eu/transport-mode/road/european-union-eu27

⁴ Commission Delegated Regulation (EU) 2018/389 of 27 November 2017 supplementing Directive (EU) 2015/2366 of the European Parliament and of the Council with regard to regulatory technical standards for strong customer authentication and common and secure open standards of communication, Article 12, published in the Official Journal on 13 March 2018, https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32018R0389;

⁵ Recharging session price calculator available at https://alternative-fuels-observatory.ec.europa.eu/consumer-portal/electric-vehicle-recharging-prices.

theft, we consider that digital payment solutions in the e-mobility sector should be widespread and could provide a higher protection.

In addition to the immediate benefits of exempting Secure Customer Authentication (SCA) for payments at EV charging stations, there is a broader ripple effect that could positively impact the wider EV charging ecosystem. While the exemption at EV charging points is essential, it may also serve as a catalyst for broader adoption of debit card payments, even at (AC) stations that are not currently mandated to have this exemption. This domino effect can result in a more extensive network of charging stations across Europe where consumers, regardless of the type of charging station, can enjoy the convenience and ease of debit card payments. By removing barriers and streamlining payment processes, we can ensure that even more consumers will be inclined to embrace electric mobility, aligning with the EU's sustainability goals and making EV charging more accessible to all.

Conclusion

In conclusion, while reviewing the Regulatory Technical Standards (RTS) on SCA, we call on the European Banking Authority to recognize the unique characteristics of EV charging transactions — low-risk, low-value payments and to provide an exemption to EV charging stations.

This will enable a seamless and user-friendly payment experience that supports the wider adoption of electric mobility while maintaining security.

Furthermore, this exemption aligns with the overarching trend toward digital and mobile payment solutions, offering enhanced convenience, adaptation, and security through advanced technologies like biometric authentication.

By embracing such innovation in the e-mobility sector, we not only safeguard the interests of consumers and businesses but also cater to a diverse range of users, including vulnerable segments of the population.

About CharIN e.V.

CharIN is the leading global association dedicated to promoting standards in the field of charging systems for all kinds of EVs worldwide, including the maritime, mining, road transport, and aviation sectors. With over 340 members, CharIN is an umbrella, cross-industry organisation which represents stakeholders such as charging station manufacturers, charging point operators, component suppliers, energy providers, payment service providers, automakers, and grid operators. Our main goal is to move towards interoperable charging, where vehicles, chargers, and software systems work together, and as such make the EV user experience reliable, easy and smooth.

With the scope of interoperability, CharlN's international community is comprised of companies of all sizes representing every link to the e-mobility value chain and multiple experts, who have been working together as a team to drive the requirements of charging all kinds of electric vehicles. CharlN is, for example, member of the European Commission's Sustainable Transport Forum and its Sub-Group on Governance and Standards. We have currently been developing and launching a Plug & Charge system – i.e. the project "Plug and Charge Europe" – PKI; a technology needed to enable secure authentication and authorization via Plug and Charge in accordance to ISO 15118. Furthermore, CharlN is also working within the context of the EU-US as well as the India-EU Trade and Technology Council in light of its work on the Megawatt Charging System to be used to charge other heavy-duty vehicles commercial vehicles, like-e-ferries, ships and planes.

CharIN does not only see itself as a promoter of e-mobility but even more so as a facilitator of interoperability by providing the relevant technology tools based on industry expertise to this end. We work closely with international standardisation organisations and also with industry-driven standardisation bodies. As facilitator, CharIN itself hosts and drives platforms to develop the parameters and approaches to standards such as the aforementioned Megawatt Charging System (currently being standardised within the relevant international standardisation bodies), as well as OPNC. We are also working together with OCA on OCPP to drive the processes through the IEC.

CharIN with its head office in Berlin and EU Affairs office in Brussels, also host offices in *inter alia* Washington D.C., Hong Kong, Dubai, Beijing, Chennai, Tokyo and Yongin-Si Geonggido (Korea) and São Paulo.