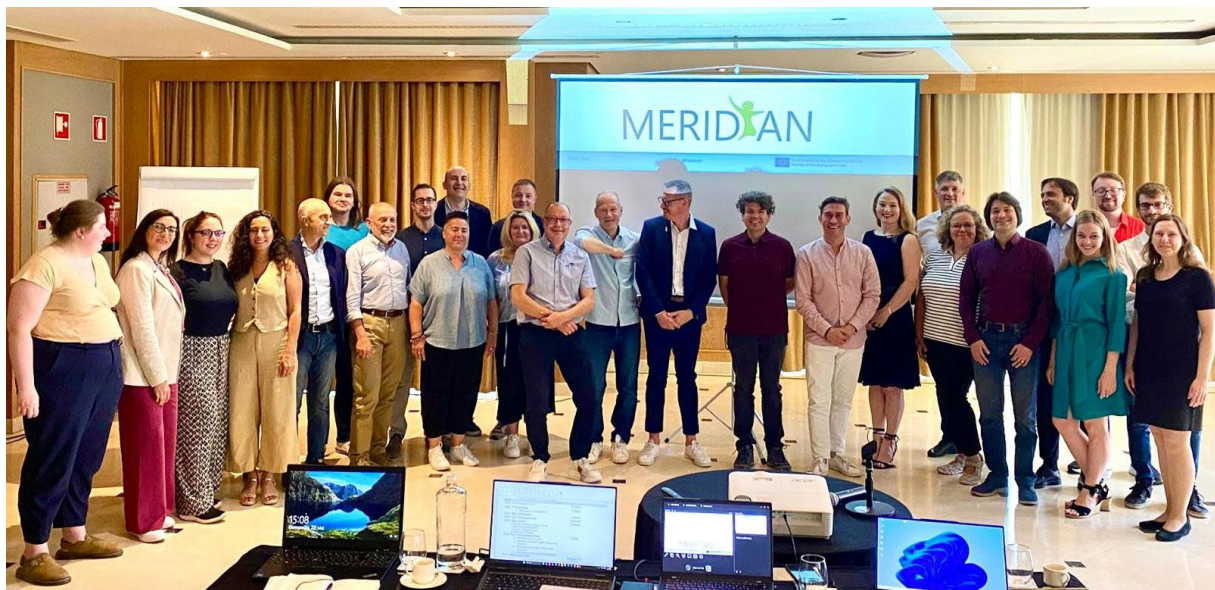**MERIDIAN Newsletter VI, July 2024**

Contents

If you would like to receive the Meridian Newsletter in the future, please mail to: peter.van.dop@rws.nl and nora.boujddayn@rws.nl.

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Throwback to the Steering Committee in Sevilla

Welcome in Seville / Urgent News

Björn Siebert welcomed everyone to the Steering Committee Meeting in Seville and presented the agenda. A coffee break was scheduled for 10:00, followed by lunch at 12:00. After lunch, task presentations took place, along with a presentation from the Spanish Road Administration on the V16 beacon for broken-down vehicles. Additionally, there was a presentation on the Sub-Working Group for Smart Cycling. The agenda also included a discussion on impressions from the ITS Congress and updates from the various working groups.

WP1 Project Management

Henri Schlüter introduced the new colleague, Natalie Strohschein, and informed the group that Nil Mudul will be transitioning to new projects, concluding her involvement with MERIDIAN.

NM presented an overview of MERIDIAN's milestones and deliverables achieved between October 2024 and May 2025. To date, 43% of the planned milestones and 64% of the deliverables have been reached. It was noted that many are scheduled for completion at the end of the project, which explains the current figures. Nonetheless, the importance of meeting milestones and deliverables on time was emphasized.

Task 1.05 Evaluation

Francesco Varone provided an update on Task 1.05 – Evaluation, noting that there have been no major developments since the SCM in Trento. He reported that Evaluation activities have now officially started. However, partners anticipate delays in their respective activities and in the evaluation process overall. As a result, the timeline will need to be adjusted. Since the evaluation phase falls at the very end of the project, a workshop is tentatively planned for

early next year, possibly in March. The Evaluation activities are expected to conclude by November or December 2026.

He urged all partners to complete and return the status quo table as soon as possible and reminded everyone that any questions should be addressed to the Evaluation Task Force.

Updates on MER RP01 & RP02 Process

HS presented the current status of RP01, outlining the overall project situation. RP01 took approximately 1.5 years to complete, longer than initially expected. The extended timeline was due to multiple rounds of sampling.

RP01 has now been finalised with only minimal cost rejections. Most outcomes were in line with self-reporting. The few rejected travel costs can be resubmitted in RP02, provided they include more detailed justifications. HS reminded everyone to ensure these are properly included and visibly marked as resubmission in the DCRT.

HS continued with his presentation on the finalisation of RP01. Payments have been made to BMDV, and partner shares have been calculated. The initial 25% prepayment had already been distributed. A table showing the total amounts already transferred to partners was presented. HS asked partners to confirm whether they require the next payment in the current or following year, and to verify the booking references and bank details so the payment process can begin. A mail on this topic has been sent out after the meeting.

Regarding RP02, most partners have completed their DCRT, and where the cumulative budget exceeds 650.000 €, cost certification is underway. Currently, the amendment procedure is open and needs to be finalised before RP02 can officially start. HS explained that the SyGMa platform cannot process both the amendment and reporting simultaneously.

Once the amendment is finalised - expected around June - the process will continue. Document uploads are planned for the first week of July, followed by sampling in July and completion by August.

Updates on MER RP01 & RP02 Process

HS explained that the amendment process officially began on May 14th 2025. The team is currently collecting input from project partners and updating the SyGMa system in accordance with amendment requirements. Once this preparation is complete, coordination with CINEA and BMDV will follow to formally amend the Grant Agreement. The amendment will primarily cover an updated project duration and eligibility period, along with related adjustments - such as a revised budget split. Additionally, a new Affiliated Entity will be added due to a shift in implementation responsibility for Germany.

Discussions have already taken place with the Project Officer, and once final inputs are received - especially from BMDV - the amendment will be ready for signature. This process is expected to conclude by mid-June 2025.

Budget Estimates and Shifts

Current financial projections show the benefits of an amendment. If the project were to end in 2025, spending would fall short of the total GA budget by approximately €8 million. However, with the extension of the eligibility period to the end of 2026, total expenditure could exceed the GA ceiling by roughly €10 million. For instance, the Netherlands has already exceeded its Task 2.07 allocation and continues to incur costs in RP02.

It is crucial to note that while the project allows for internal flexibility, the total GA budget cap remains fixed. Overperforming partners may receive redistributed funds from underspending partners at the end of the project, but no additional funds for specific partners beyond the GA ceiling can be guaranteed at this point. If some partners remain within budget while others exceed theirs, BMDV has to withhold interim payments exceeding the agreed GA limits to maintain overall compliance until the end of the Action.

HS explains that there is currently no procedure in place for what happens if multiple partners exceed their spending while multiple partners underspend their budget, all while the Action in total exceeds the GA-based budget. The partners agree that the procedure will only be defined once such a case arises. For now, funding is limited to what each partner is entitled to according to the GA.

Financial and Administrative Flexibility

CINEA has reiterated that the project benefits from full internal flexibility within the GA: partners may shift funds across cost categories (e.g. personnel to subcontracting) without formal amendment, provided the work is technically completed and remains within overall budget limits.

The partners have agreed to initially limit the funding payout by the BMDV to each partner's GA maximum, regardless of the reported cost amount. Further clarification will be provided once the final cost breakdown and approved funding is known.

Final budget redistributions - if any - will be addressed at the end of RP03 (2025–2026). Since reporting is based on reporting periods rather than calendar years, no adjustments are needed for previously submitted reports. The financial structure remains flexible, and how budgets are internally allocated is ultimately up to the consortium, as long as technical completion of tasks is ensured.

Presentation on BALM

The German Ministry for Digital and Transport (BMDV) has decided to revise its approach to truck parking by splitting the topic into two distinct areas: (1) truck parking information, and (2) the physical restructuring of parking spaces. A workshop was to explore how existing truck parking areas could be optimised by rearranging layouts to create additional capacity.

A new affiliated entity under BMDV the BALM (Federal Logistics and Mobility Office) has been nominated to handle the parking information component. BALM provided a presentation, parts of which BS shared during the meeting. Digital truck parking space detection will be handled by BALM, while the effective use and restructuring of existing

truck parking spaces will remain under the responsibility of the Autobahn. This division of responsibilities is outlined in the meeting slides.

BS announced that BALM will take over Task 2.02 from AB, along with the associated budget, milestones, and deliverables.

DGT Presentation (V-16)

Montserrat Estaca Gómez from the Spanish Road Authority (DGT) presented the new V-16 beacon, an IoT-based emergency signal device designed to improve safety when a vehicle is stopped on the road.

DGT's goal is to reduce traffic accidents. Since 2018, they've been working on a safer alternative to warning triangles. Although triangles are widely used, data shows that around 22 people per year are killed after exiting their vehicle to place them. This risk is especially high on highways, in poor weather, or at night. Triangles are also often blown over or left behind after towing.

The V-16 device is an orange flashing light placed on the roof of a broken-down vehicle. It can be activated from inside the car, making it safer for drivers, especially in dangerous conditions like rain, fog, or high-speed traffic. It becomes mandatory in Spain from January 1st 2026 for all vehicles.

Key features of the V-16 beacon:

- No need to exit the vehicle to use it.

- Provides physical visibility up to 1000 meters.

- Connects to DGT 3.0 (Spain's connected vehicle platform) and the National Access Point, sending real-time data to authorities and service providers.

- Allows "virtual visibility" for emergency services and traffic systems.

- Works for all vehicles, including older models and drivers with reduced mobility.

Legal Background: Spanish laws and regulations (e.g. Royal Decree 159/2021) require the use of V-16 beacon from 2026. V-16 devices must comply with technical and communication standards and be certified in accredited laboratories.

Technical Details:

- 360° flashing light, visible for 30+ minutes.

- Operates in temperatures from -10°C to 50°C.

- IP54 weather resistance and stable under strong wind.

- Uses 4G/5G communication with a non-removable SIM, sending signals every 100 seconds.

- Signals are ignored if the car is not near a road or if activated by mistake.

- Devices must be certified under MOV 3/2022 and pass periodic control checks (MOV 2024/06).

Data & Certification:

Manufacturers must use approved protocols (A & B) to send anonymised location data from the device to their own servers and then to DGT. Certification includes testing for light visibility, communication performance, and positioning accuracy.

Further details:

- Price: The device costs about 50 €.

- Implementation: The decision was made without large-scale data studies — DGT started the project based on road safety needs.

- Programming: Devices are programmed by manufacturers. Drivers only need to activate them.

- Tourists: Visitors can use triangles or buy a V-16 in Spain, but it's not legally valid in other countries unless their national laws accept it.

- Offline use: If there's no network, the light still works to warn other drivers.

- Future plans: The system may expand to send more detailed info to traffic centres.

- The V-16 beacon is part of a broader effort to enhance vehicle safety and promote connected mobility in Spain.

TF Smart Cycling

Stephanie Kleine introduced Smart Cycling initiatives within the MERIDIAN corridor, highlighting three implementations: Latvia (10 smart cameras for pedestrian and cyclist data), the Netherlands (software for cycling data quality and accessibility), and Trento (20 sensors integrated into the city's mobility platform).

She emphasised that now is the time for Smart Cycling, driven by factors like e-bikes, health and climate goals, political support, advancing tech (e.g. C-ITS), and alignment with EU strategies like the Green Deal. Smart Cycling involves the use of intelligent systems and digital services to improve cycling safety, experience, and data use—integrating bikes into smart cities and multimodal transport.

Key Challenges:

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- Safety: Requires complex implementation and human-machine interface (HMI) design.

- Data: Fragmented, with issues in quality, standardisation, and privacy.

- Legal: Needs better integration into regulatory frameworks.

- Funding: Lacks structural and dedicated funding; few business cases.

- Infrastructure Integration: Coordination and adaptation needed across stakeholders.

- Awareness: Limited knowledge among authorities and low public acceptance.

Key Actions Proposed:

- Policy Integration: Include Smart Cycling in mobility policies and EU frameworks (e.g., SUMPs, ITS Directive).

- Support Innovation: Allocate funds for R&D, pilots, and implementation; ensure minimum tech standards.

- Data Collection & Access: Request national cycling data plans; promote standards, quality, privacy; use National Access Points and EU Mobility Data Space.

- Raise Awareness: Create an EU Smart Cycling platform and foster collaboration with actors like NAPCORE and C-Roads; hold high-level political dialogues.

Examples of Smart Cycling Projects:

- Cycling App (NL): Encourages cycling with rewards and collects data via a mobile app.

- Variable Message Signs (Copenhagen): Informs and motivates cyclists using real-time data.

- Bike Parking System (Bruges): Guides users, detects abandoned bikes, and tracks parking usage.

- Sniffer Bikes (Zwolle): Measure air quality via sensors on 150 bikes.

- Priority for Bike Couriers: App-connected lights give couriers green-light priority.

- Bike Library (Withernsea): Residents borrow GPS-equipped bikes, supported by cycling mentors.

Additional Resources:

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- BITS Directory: Find and share Smart Cycling solutions at www.bitsdirectory.com.

- Closing Notes:

- NAPCORE will advance cycling data standardisation.

- C-Roads is open to integrating C-ITS cycling specifications in urban contexts.

- Insights were also gathered from recent EC booth and ITS Europe events.

Task 1.02 Communication

The MERIDIAN website (https://meridian-corridors.eu/) is regularly updated. All members are encouraged to contribute content. Please send materials to peter.van.dop@rws.nl and nora.boujddayn@rws.nl.

The LinkedIn page is active and currently has 57 followers. Members are asked to use the hashtag #meridianEU or tag @meridian-eu-corridor in their posts to increase visibility. Until October 9th, **all** members are encouraged to share at least one post using the hashtag or tag.

The next MERIDIAN newsletter will be sent out at the end of June or beginning of July. It will include updates on the website and LinkedIn page.

Task 1.04 Knowledge Building

Clara Rybin reported that since the last Steering Committee Meeting in Trento, a workshop on Artificial Intelligence was held with around 70 participants. The recording is available on MERIDIAN SharePoint.

A second, more technical workshop on Security and Privacy in C-ITS took place last week, with 30 participants. The recording will be uploaded to SharePoint in the coming week.

An upcoming workshop on Digital Infrastructure is planned for autumn 2025, with a focus on Digital Twin – digital models of real-life infrastructure or scenarios.

Participants are encouraged to contact Clara with suggestions for potential speakers for the Digital Twin workshop. There may also be opportunities for CEDR project involvement in this event.

Action Point: Partners involved in Digital Twin activities to send Clara suggestions for potential speakers for the autumn workshop on digital models of real-life infrastructure and scenarios.

Further, Francesco reported that Port of Ravenna is leading the Multimodal sub-activity, which has included three workshops so far. The most recent was held in Ravenna. These workshops aim to gather insights and experiences from both MERIDIAN partners and external stakeholders involved in other European projects. To collect feedback and lessons learned, a questionnaire is sent out after each workshop.

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The fourth workshop will take place in Munich on June 4th during the Transport Logistics fair. The agenda has been shared with partners via Björn. The workshop will primarily focus on two key topics related to logistics.

Task 1.03 Cross Corridor Cooperation

Sub-WG 1.03.01 – ITS Community

MERIDIAN continues to serve as a central hub for European corridor projects, supporting a unified European approach to (C-)ITS services by connecting various initiatives and communities. A Memorandum of Understanding was signed between C-Roads and the corridor projects (MATIS, X4ITS, SCALE, and MERIDIAN) during the ITS Congress in Seville, reinforcing this collaborative mission. MERIDIAN has also participated in the VIKING Group's quarterly exchange and the X4ITS Steering Committee, maintaining regular interaction with key stakeholders. The NAPCORE Partner DGT presented its V16 Beacon during the Steering Committee meeting. These activities demonstrate MERIDIAN's commitment to community outreach and strategic alignment across corridor projects.

Sub-WG 1.03.02 – Evaluation Cooperation

MERIDIAN continues close cooperation with C-Roads through alignment with C-Roads WG3 on the Evaluation and Assessment Plan, including the shared template for reporting C-ITS evaluation results. Together with MATIS and X4ITS, MERIDIAN is jointly contributing to Deliverable D1.03 titled "Proposal for a Harmonized ITS Benefit Assessment Methodology for European Fostered ITS Corridor Projects." This deliverable, while not part of MERIDIAN's official outputs, will be used as a foundational document and position paper for broader evaluation alignment. MERIDIAN will also join the MATIS Steering Committee meeting in Barcelona to present the project and take part in the MATIS Evaluation Workshop.

Sub-WG 1.03.03 – ITS Deployment Cooperation

In the area of ITS deployment, MERIDIAN emphasizes knowledge exchange and collaboration. Through Sub-WG 1.04.02 C-ITS, experts take part in workshops, discussions, and peer exchanges. Activities have included onsite visits, such as in Belgium, and attendance at C-ITS-related events in countries like Germany. The project also supports bilateral exchanges between countries, such as Germany with Denmark and Ireland, to share experiences and best practices. A prominent example includes collaboration under the Smart Cycling initiative to enhance cycling safety via C-ITS.

Several updates were reported. A review of the ITS Congress in Seville was shared, including sessions focused on corridor project collaboration and a session titled "Collaborating for a Smarter Future – Corridor Projects Commit to Using and Improving C-Roads Specifications." During the Congress, the European Commission expressed strong appreciation for MERIDIAN's progress and contributions. Joint declarations were signed between MATIS and X4ITS, and between MATIS and MERIDIAN, during the NAPCORE Mobility Data Days in Turin. Joint sessions were also held at both the Mobility Data Days and the ITS Congress.

MERIDIAN was presented at the second X4ITS Technical Workshop on RTTI, held in Zagreb. Regular exchanges continue with both MATIS and X4ITS, ensuring continued

alignment. C-Roads Extended is now operational, with the Grant Agreement signed and the first project meeting already conducted.

NAPCORE and NAPCORE X Updates

The final Steering Committee and event of the original NAPCORE project were held in Seville. Preparations are ongoing for NAPCORE X, which will run for 30 months and include 77 partners, covering all EU Member States along with Iceland, Moldova, Montenegro, Norway, Switzerland, and the United Kingdom. Non-profit partners include ITP, ITxPT, and ERTICO. The overall budget amounts to 11.176.439,00 € with a funding rate of 85 percent. While MERIDIAN is not a formal partner, national participation includes MUNV and Baden-Württemberg, and further details are expected to be provided by Vincent at the next Steering Committee Meeting.

Multimodal Travel Information Services (MMTIS)

NAPCORE published a data dictionary on October 7th and organised several sessions on MMTIS during the Mobility Data Days. These covered upcoming data flows from regional sources and the publication of standards such as OpRa for observed data. Relevant proceedings are publicly available at www.napcore.eu. The implementation analysis of the revised MMTIS Delegated Regulation will be addressed within NAPCORE X.

Real-Time Traffic Information Services (RTTI)

Work continues on the 5-star rating methodology, which aims to assess the quality of NAP-provided data for navigation services. By January 1st, 2025, all crucial data must be available for the entire network, with full data coverage required by January 1st, 2027. Discussions continue on definitions, formats, metadata, and quality indicators to support consistent and high-quality data delivery. Implications for private organisations include ensuring timely updates to maps, integration of temporary traffic measures, and collaboration with authorities to improve data accuracy and transparency.

Safety-Related Traffic Information (SRTI)

DG MOVE published the Terms of Reference for SRTI early in 2025 and has called on NAPCORE to provide input. Coordination is underway with the Data for Road Safety (DFRS) initiative and Traveller Information Services Association (TISA). A partner survey was distributed, and a joint statement summarising the results is planned for the second quarter of 2025.

ITS Directive Implementation

With the first data requirement under the revised ITS Directive approaching, Member State ministries are expected to begin transposing the Directive into national law. Stakeholders are encouraged to engage actively with national authorities to ensure their perspectives are considered. CROW, the Dutch non-profit organisation for road and transport standardisation, has published a comprehensive guide on the ITS Directive. The guide has been translated into English and is available upon request by contacting Vincent Lau (v.lau@amsterdam.nl).

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Next Steering Committee

Our next Steering Committee is scheduled to take place in Utrecht, The Netherlands on the 15th and 16th of October. Including an On-Site visit to the Dutch Traffic Centre. Hopefully we will see all our partners there!

Thank you for your continued support and interest in MERIDIAN! We look forward to sharing more updates with you in the next edition of the newsletter, on our MERIDIAN website. And did you know we have a new LinkedIn page! Follow us for more information.

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