

NEMO

Next Generation Meta Operating System

D6.7 Dissemination & Standardization & Communities Liaison – Final version

Document Identification			
Status	Final	Due Date	30/09/2025
Version	1.0	Submission Date	21/10/2025

Related WP	WP6	Document Reference	D6.7
Related Deliverable(s)	D6.5, D6.6	Dissemination Level (*)	PU
Lead Participant	ECL	Lead Author	Rosaria Rossini
Contributors	UPM, TSG, ECL	Reviewers	Clio, Beruette, UPM Iraklis Bourantas, NOVO

Keywords:
Community Liaison, Dissemination, Standardization, Community Building

Disclaimer for Deliverables with dissemination level PUBLIC

This document is issued within the frame and for the purpose of the NEMO project. This project has received funding from the European Union's Horizon Europe Framework Programme under Grant Agreement No. 101070118. The opinions expressed and arguments employed herein do not necessarily reflect the official views of the European Commission.

The dissemination of this document reflects only the author's view, and the European Commission is not responsible for any use that may be made of the information it contains. This deliverable is subject to final acceptance by the European Commission.

This document and its content are the property of the NEMO Consortium. The content of all or parts of this document can be used and distributed provided that the NEMO project and the document are properly referenced.

Each NEMO Partner may use this document in conformity with the NEMO Consortium Grant Agreement provisions.

(*) Dissemination level: **(PU)** Public, fully open, e.g., web (Deliverables flagged as public will be automatically published in CORDIS project's page). **(SEN)** Sensitive, limited under the conditions of the Grant Agreement. **(Classified EU-R)** EU RESTRICTED under the Commission Decision No2015/444. **(Classified EU-C)** EU CONFIDENTIAL under the Commission Decision No2015/444. **(Classified EU-S)** EU SECRET under the Commission Decision No2015/444.

Document Information

List of Contributors	
Name	Partner
Rosaria Rossini	ECL
Philippe Krief	ECL
Clio Beruete	UPM
BEN JABALLAH Wafa	TSG
Luis Miguel Contreras	TID

Document History			
Version	Date	Change editors	Changes
0.1	09/04/2025	Rosaria Rossini (ECL)	ToC
0.2	29/09/2025	BEN JABALLAH Wafa (TSG)	Standards inputs
0.3	01/10/2025	Clio Beruette (UPM)	Final inputs
0.4	01/10/2025	Clio Beruette (UPM)	Review
0.5	02/10/2025	Philippe Krief (ECL)	Final inputs
0.7	16/10/2025	Rosaria Rossini (ECL)	Final version + TID contributions
0.8	17/10/2025	Illias Seitanidis (SYN)	Final review and refinements
0.9	20/10/2025	Lara López (ATOS)	Contributions in section 3 and final review.
1.0	21/10/2025	Rosana Valle (ATOS)	Quality check and submission to EC.

Quality Control		
Role	Who (Partner short name)	Approval Date
Deliverable leader	Rosaria Rossini (ECL)	02/10/2025
Quality manager	Rosana Valle (ATOS)	21/10/2025
Project Coordinator	Enric Pages (ATOS)	21/10/2025
Technical Manager	Illias Seitanidis (SYN)	17/10/2025

Table of Contents

Document Information	2
Table of Contents	3
List of Tables.....	4
List of Figures	5
List of Acronyms.....	6
Executive Summary	7
1 Introduction	8
1.1 Purpose of the document	8
1.2 Relation to other project work.....	8
1.3 Structure of the document	8
2 Dissemination & Communication Plan	9
2.1 Project website.....	10
2.2 Online Channels.....	23
2.3 Participation in Events	27
3 Standardization	34
4 Communities Liaisons	36
4.1 Gaia-X.....	36
4.2 AIOTI.....	36
4.3 DAIRI/BDVA.....	38
4.4 5GPPP	38
4.5 NGI	38
4.6 Eclipse IOT and Edge working groups	38
4.7 European Cloud, Edge & IoT Continuum cluster	39
5 NEMO Open Source.....	42
5.1 Open Source Development	42
6 Conclusions	44

List of Tables

Table 1 NEMO blogs	15
Table 2 List of NEMO publications	26
Table 3 Nemo events	27
Table 4 NEMO Open Source	43
Table 5 NEMO licences distribution	43

Pending EC approval

List of Figures

Figure 1 NEMO Dissemination & Communication strategy	9
Figure 2 NEMO Dissemination and communication strategy. Intensity increases each year.	9
Figure 3 Project website - Home	10
Figure 4 Project website - Pilots	11
Figure 5 Project website - Consortium	12
Figure 6 Project website - News	13
Figure 7 Project website - Media	14
Figure 8 Project website - Blog	14
Figure 9 NEMO Website statistics	23
Figure 10 Twitter profile	24
Figure 11 LinkedIn profile	24
Figure 12 YouTube channel	25
Figure 13 YouTube channel - Visuals	25
Figure 14 Meta OS booth at Tech Expo 2025	31
Figure 15 Meta OS promotional roll-up	32
Figure 16 Group Photo at Tech Expo 2025 (Amsterdam)	33
Figure 17 NEMO presented in AIOTI days 2024	36
Figure 18 NEMO presented and sponsored the Open Source Community Day 2025	37
Figure 19 NEMO presented and sponsored the Open Source Community Day 2025	37
Figure 20 Meta OS Expo 2025	39
Figure 21 NEMO at OCX2024 presenting a paper in eSAAM2024	40
Figure 22 ECEI's Open Continuum Final Conference	41
Figure 23 NEMO Eclipse Research Labs	42
Figure 24 The OSS license spectrum.	43

List of Acronyms

Abbreviation / acronym	Description
AG	Advisory Group
Dx.y	Deliverable number y belonging to WP x
EC	European Commission
IEC	International Electrotechnical Commission
IETF	Internet Engineering Task Force
IRTF	Internet Research Task Force
ISO	International Organization for Standardization
Neotec	Network Operations in Telecom Cloud
NMRG	Network Management Research Group
ONIONS	Operationalizing Network & service abstractIONS
RFC	Request for Comments
TCSP	Telecom Cloud Service Providers
WP	Work Package
YT	YouTube channel

Executive Summary

The current document, entitled “D6.7 Dissemination & Standardization & Communities Liaison – Final Version”, provides a summary of how the project has shared its work, built connections, and contributed to standardization during its lifetime. It brings together the main results of our communication, dissemination, and stakeholder engagement activities, showing how these efforts have helped the project make a lasting impact.

Since the beginning, the project focused on ensuring that its results reached the right audiences such as researchers, industry partners, policymakers, and the wider community. Using a mix of channels such as the project website, social media, newsletters, events, and scientific publications, it was made noticeable that project outcomes were visible, accessible, and understandable. The communication strategy evolved over time, adapting to new opportunities and feedback from stakeholders to maximize engagement and awareness.

Alongside outreach, the project played an active role in standardization landscape. By contributing to relevant working groups, the consortium helped ensure that the project’s technical outputs align with and inform emerging standards. This work strengthens the long-term usability and interoperability of our results beyond the project’s end.

Building and maintaining relationships with key communities, such as the Meta OS project alliance, has been another central goal. The project organized and participated in joint events, workshops, and collaborative initiatives to exchange knowledge and explore synergies with other EU and international projects.

In summary, this deliverable highlights how the project’s communication, standardization, and community efforts have worked together to increase visibility, promote knowledge sharing, and ensure the sustainability of results. Through an open, collaborative, and forward-looking approach, the project has contributed meaningfully to its field and to the broader European research and innovation ecosystem.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	7 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

1 Introduction

1.1 Purpose of the document

The purpose of this document is to present the final outcomes of activities carried out under Work Package 6 (WP6) "Impact Creation & Outreach". The main goal of WP6 is to enhance the visibility and long-term sustainability of the NEMO project by promoting its results, engaging early users, and fostering a vibrant community around NEMO technologies. Through these efforts, the work package aims to ensure that the project's impact extends beyond its duration and continues to evolve within both industrial and research communities.

This deliverable outlines the overall dissemination strategy, describes the actions undertaken to communicate and promote project results, and reports on achievements related to standardization and community liaison. Together, these activities have played a central role in strengthening the project's outreach, supporting adoption, and laying the foundations for continued collaboration and innovation beyond the project's lifetime.

1.2 Relation to other project work

This document is related to two tasks. The first one is the Task 6.4 "Liaison with Cluster, Open Source communities & standardization". The aim of this task is ensuring knowledge transfer and awareness of NEMO solution in selected Open source communities and foundation.

The second one is Task 6.3 "Dissemination, communication & training activities". The aim of this task is to setup and sustain the communication channels to disseminate the project outcomes; this includes the website, the logo and the various social media accounts.

1.3 Structure of the document

This document is structured in the following order:

- Section 2 presents the Dissemination and Communication plan identified by the consortium and the key messages delivered.
- Section 3 presents the Standardization synergies and results.
- Section 4 & Section 5 presents the community liaison actions and the strategy put in place by the consortium to sustain the project results as well as the Open Source overview in NEMO.
- Section 6 concludes the document.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	8 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

2 Dissemination & Communication Plan

NEMO's success will be evaluated by its market penetration and adoption across open-source communities, public authorities, and private enterprises, as well as its influence on key economic drivers; this is, SMEs. Therefore, the primary objective of NEMO's dissemination and communication efforts is to increase awareness of its technological and scientific advancements. Achieving meaningful impact requires the development and execution of a well-defined dissemination strategy. The key steps are depicted in Figure 1.

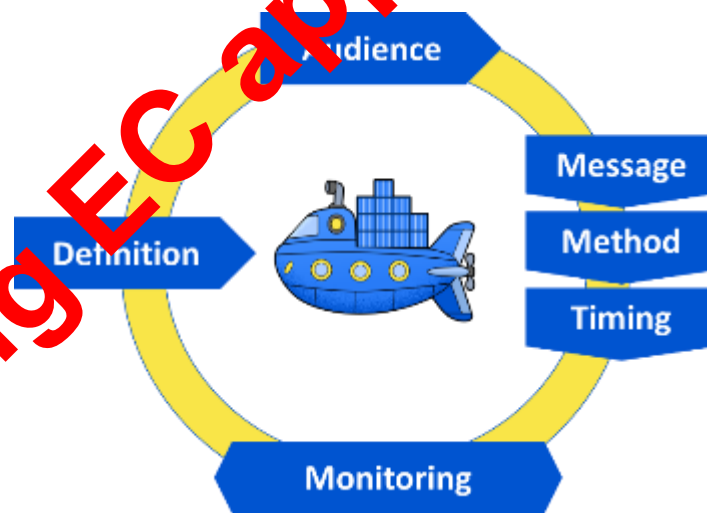


Figure 1 NEMO Dissemination & Communication strategy

The strategy will focus on:

- **Definition** of the dissemination/communication strategy and **target audience**.
- Fine tune the **message, methodology, activities and material** (e.g., press releases, research papers, white papers, videos, workshops, meetings, policy briefs, open days, Open Calls, promotional material) and the correct **timing**.
- **Monitor and evaluate** the public outreach activities, including redefinition and corrective actions.

All the activities of dissemination and communication strategy will be carried out using **three main phases** following the different phases of the project. Each of these phases has specific objectives and target groups and will therefore perform specific actions using specific channels during the phase. As shown in Figure 2, NEMO dissemination and communication activities are categorized based on the position of the target audience with respect to the time-to-market of the results:



Figure 2 NEMO Dissemination and communication strategy. Intensity increases each year.

- **Phase I (Months 1-18):** Selecting and establishing the dissemination channels, key messages, communication activities towards innovation, IoT/Edge ecosystems/communities (Long time-to-market).
- **Phase II (Months 19-30):** Policy fostering business innovation (Midterm time-to-market).
- **Phase III (Months 31-36):** Matching market analysis and Exploitation (Short time-to-market).

2.1 Project website

One of the key elements of the NEMO project's dissemination plan is the creation and maintenance of a dedicated project website. The website can be found at <https://meta-os.eu/>, and acts as the primary source of information for the project, offering in-depth insights into its purpose, objectives, and the consortium of partners contributing to its development.

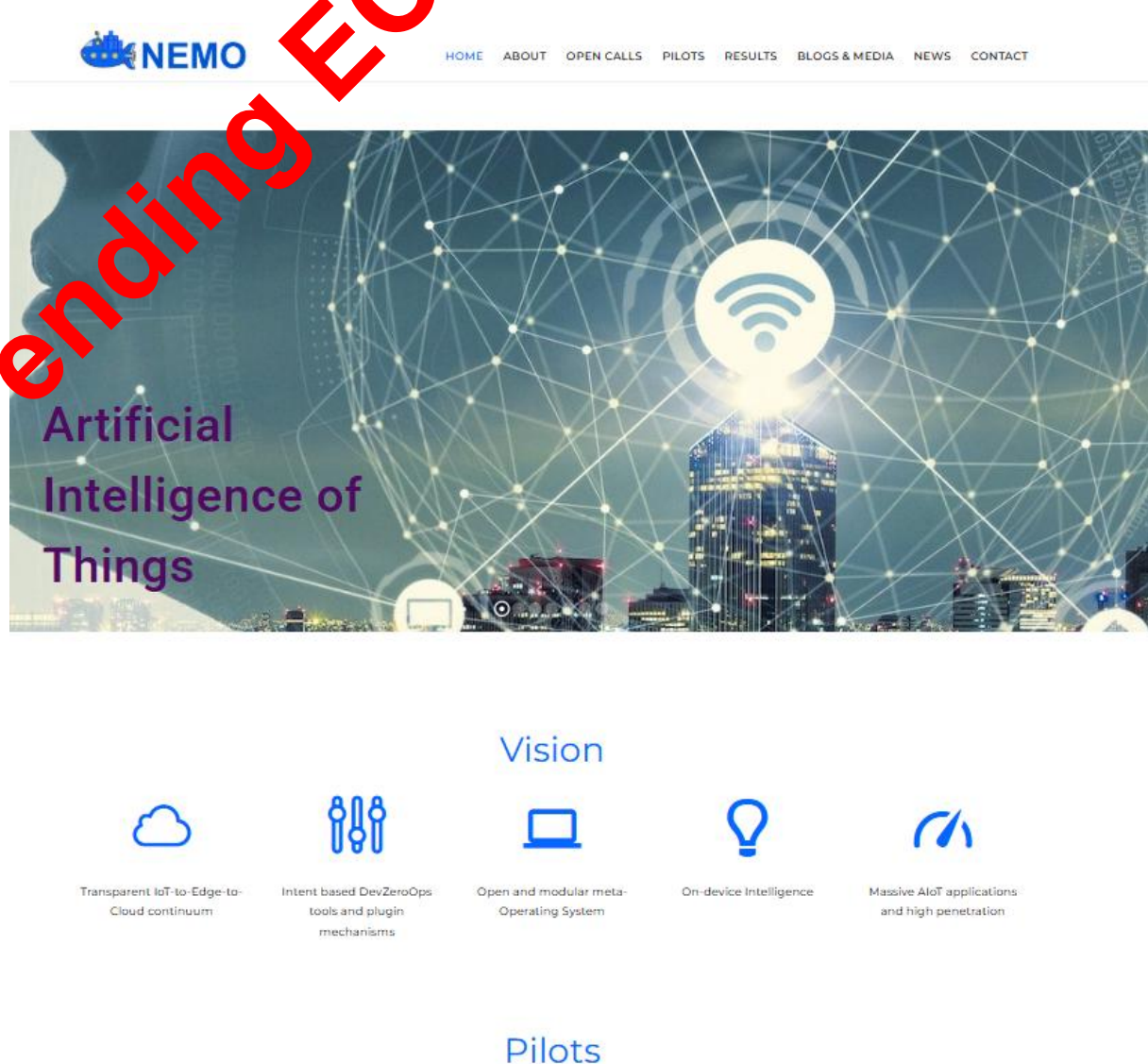


Figure 3 Project website - Home

The website also features a section dedicated to the project's pilots, which provides updates on their progress, as well as information about the results achieved. This section is designed to keep stakeholders informed about the project's progress and the impact it is making in the field.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	10 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 4 Project website - Pilots

Additionally, the website includes a blog where project partners and other stakeholders can share their thoughts and experiences related to the project. The blog provides a platform for the project team to communicate with the community and share their knowledge and insights.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	11 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final

Other features of the website include a news section that provides updates on project events and publications, as well as a section dedicated to project deliverables, which provides access to the project's technical documents, reports, and other materials.

Near to the end of the project's lifetime the total number of posts published is of 106, being distributed equally within the news (56) and blog (54) section.

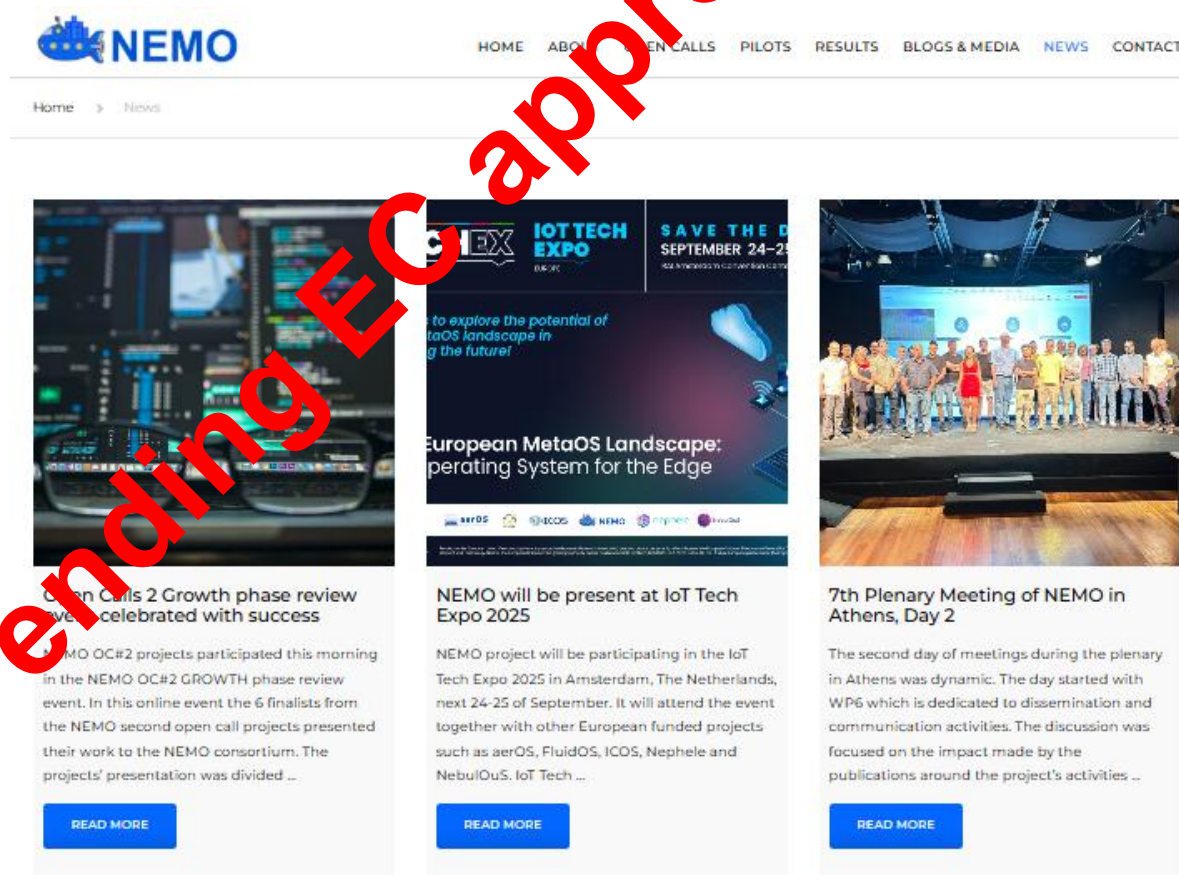


Figure 5 Project website - Consortium

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	12 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

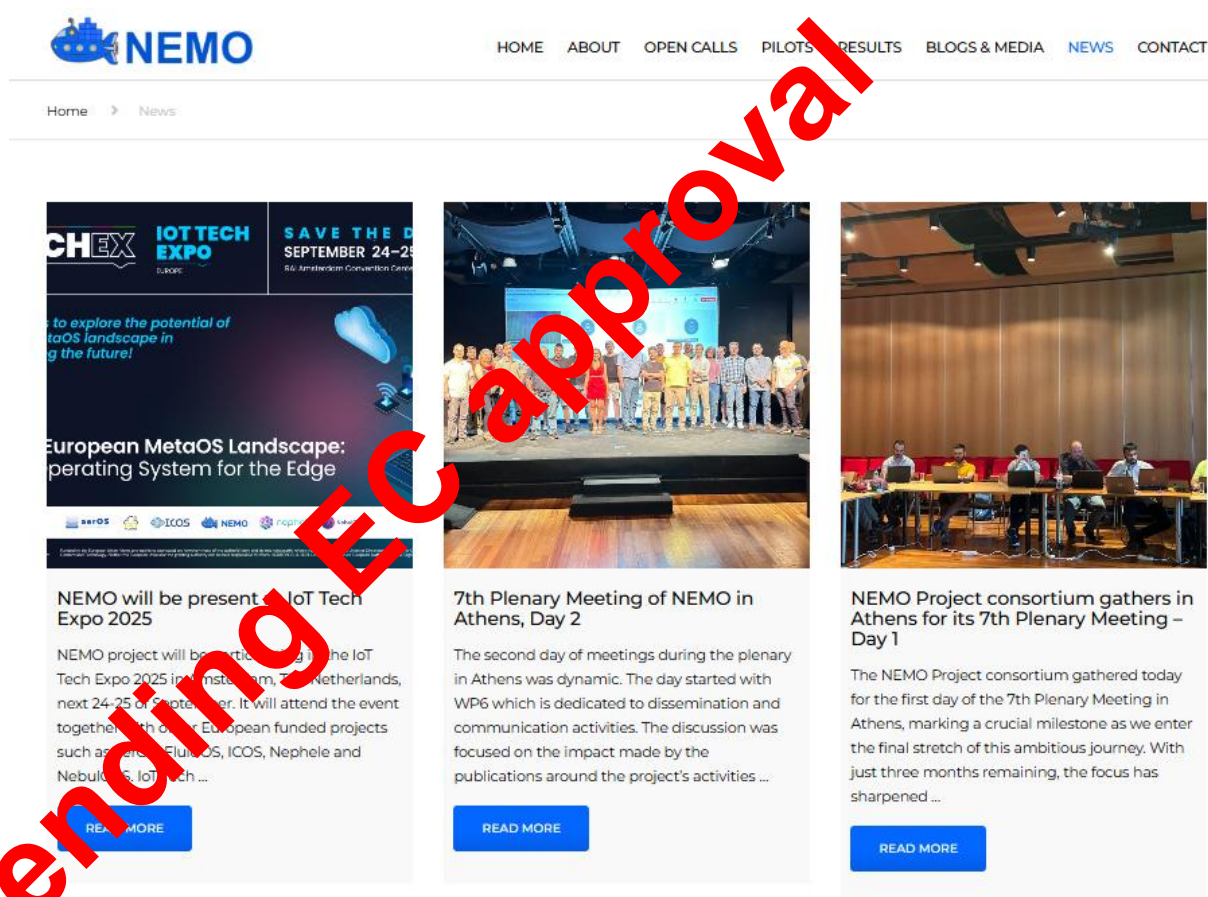


Figure 6 Project website - News

Along the project the section media has been created to showcase the materials submitted across the project. In this section there are 5 videos regarding the open calls webinars and some pilots. Also, there are uploaded 4 NEMO posters used throughout the project.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	13 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 7 Project website - Media

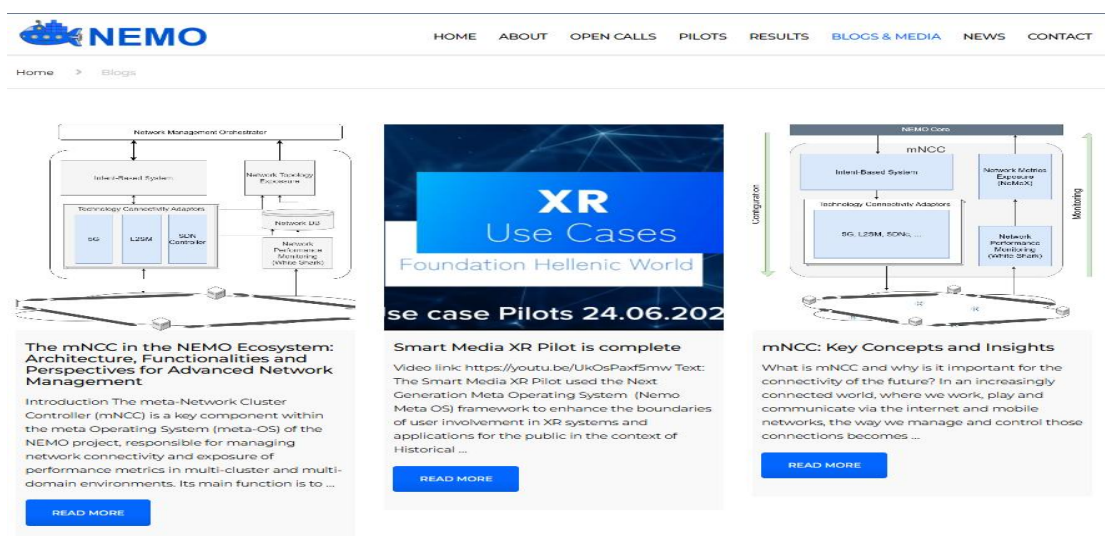


Figure 8 Project website - Blog

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	14 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final

In the current timeframe, the following blog entries are present:

Table 1 NEMO blogs

	Link	Title
1	https://meta-os.eu/index.php/2022/09/09/meta-os-fix-iot-edge-computing/	FUTURE EUROPEAN PLATFORMS FOR THE EDGE: META-OPERATING SYSTEMS
2	https://meta-os.eu/index.php/2022/10/27/our-public-repository-at-zenodo-is-live/	OUR PUBLIC REPOSITORY AT ZENODO IS LIVE!
3	https://meta-os.eu/index.php/2022/10/25/getting-started-with-nemo-introducing-cumucore/	Getting started with NEMO, introducing Cumucore
4	https://meta-os.eu/index.php/2022/12/05/emotion-in-nemo/	Emotion in NEMO
5	https://meta-os.eu/index.php/2023/01/27/nemo-youtube-channel-officially-opened/	NEMO YOUTUBE CHANNEL OFFICIALLY OPENED!
6	https://meta-os.eu/index.php/2023/01/27/nemo-at-eucloudedgeiot-workshop-in-toulouse/	NEMO at EUcloudedgeIoT workshop in Toulouse
7	https://meta-os.eu/index.php/2023/01/30/nemo-celebrates-the-international-data-protection-day/	NEMO celebrates the international data protection day
8	https://meta-os.eu/index.php/2023/02/10/special-issue-recent-advances-and-challenges-in-iot-cloud-and-edge-coexistence/	SPECIAL ISSUE: RECENT ADVANCES AND CHALLENGES IN IOT, CLOUD AND EDGE COEXISTENCE
9	https://meta-os.eu/index.php/2023/03/15/innovation-at-universidad-politecnica-de-madrid-the-role-of-gatv-in-artificial-intelligence-and-immersive-media/	Innovation at Universidad Politécnica de Madrid: The Role of GATV in Artificial Intelligence and Immersive Media
10	Our first newsletter is here! - META-OS	OUR FIRST NEWSLETTER IS HERE
11	https://meta-os.eu/index.php/2023/04/21/nemo-at-embedded-world/	NEMO AT EMBEDDED WORLD
12	https://meta-os.eu/index.php/2023/05/03/madrid-plenary-meeting/	MADRID PLENARY MEETING
13	https://meta-os.eu/index.php/2023/05/08/windtre-in-nemo/	Wind Tre in NEMO
14	https://meta-os.eu/index.php/2023/05/17/2997/	ABOUT MAGGIOLI

	Link	Title
15	https://meta-os.eu/index.php/2023/05/17/nemo-participated-in-the-concertation-and-consultation-on-computing-continuum-that-took-place-in-brussels-in-may/	NEMO PARTICIPATED IN THE “CONCERTATION AND CONSULTATION ON COMPUTING CONTINUUM” THAT TOOK PLACE IN BRUSSELS IN MAY
16	https://meta-os.eu/index.php/2023/05/23/nemo-project-explains-use-case-smart-farming-on-an-online-workshop-organised-by-eu-cloudegeio/	NEMO PROJECT EXPLAINS USE CASE SMART FARMING ON AN ONLINE WORKSHOP ORGANISED BY EU_CLOUDEGEIO T
17	http://www.space.gr/uploads/ff/172ab095d353e7b2be119084854doc3.pdf	Annual Analysts Update
18	https://meta-os.eu/index.php/2023/06/05/putting-intelligence-into-things-an-overview-of-current-architectures/	Putting Intelligence into Things: An Overview of Current Architectures
19	https://meta-os.eu/index.php/2023/06/23/nemo-participates-on-the-aiot-webinar-in-june/	
20	https://meta-os.eu/index.php/2023/06/23/space-hellas/	SPACE HELLAS
21	https://meta-os.eu/index.php/2023/06/30/continental/	CONTINENTAL
22	https://meta-os.eu/index.php/2023/07/13/telefonica/	TELEFÓNICA I+D
23	https://meta-os.eu/index.php/2023/07/13/sphynx-technology-solutions-sts/	SPHYNX TECHNOLOGICAL SOLUTIONS
24	https://meta-os.eu/index.php/2023/07/19/nemo-meeting-kong/	NEMO MEETING KONG
25	https://meta-os.eu/index.php/2023/07/31/netcompany-intrasoft/	INTRASOFT
26	https://meta-os.eu/index.php/2023/08/01/the-first-open-call-of-nemo-has-been-published-today/	THE FIRST OPEN CALL OF NEMO HAS BEEN PUBLISHED TODAY!
27	https://meta-os.eu/index.php/2023/08/02/synelixis/	SYNELIXIS
28	https://meta-os.eu/index.php/2023/08/11/iccs/	ICCS
29	https://meta-os.eu/index.php/2023/08/21/novomatix/	NOVOMATIX
30	https://meta-os.eu/index.php/2023/09/01/simavi/	SIMAVI
31	https://meta-os.eu/index.php/2023/09/01/the-submissions-portal-for-the-first-nemo-open-call-is-open/	THE SUBMISSIONS PORTAL FOR THE FIRST NEMO OPEN CALL IS OPEN

	Link	Title
32	https://meta-os.eu/index.php/2023/09/05/nemo-project-publishes-federated-resilience-enhanced-with-differential-privacy-fredy-in-the-journal-future-internet/	NEMO PROJECT PUBLISHES “FEDERATED RESILIENCE ENHANCED WITH DIFFERENTIAL PRIVACY (FREDY)” IN THE JOURNAL FUTURE INTERNET
33	https://meta-os.eu/index.php/2023/09/27/ote/	OTE
34	https://meta-os.eu/index.php/2023/09/12/3152/	NEMO project to present NEMO – Open Call #1 in EUCloudEdgeIoT.eu organized webinar
35	https://meta-os.eu/index.php/2023/09/22/eng/	ENG
36	https://meta-os.eu/index.php/2023/09/27/nemo-project-presentation-what-is-it/	NEMO PROJECT PRESENTATION, WHAT IS IT?
37	https://meta-os.eu/index.php/2023/09/27/nemo-project-open-calls-explained/	NEMO PROJECT OPEN CALLS EXPLAINED
38	https://meta-os.eu/index.php/2023/09/27/rwth/	RWTH
39	https://meta-os.eu/index.php/2023/09/29/nemo-partners-reunite-in-athens-for-their-4th-plenary-meeting/	NEMO PARTNERS REUNITE IN ATHENS FOR THEIR 4TH PLENARY MEETING
40	Our newsletter of September is now live - META-OS	OUR SEPTEMBER NEWSLETTER IS NOW LIVE
41	https://meta-os.eu/index.php/2023/10/03/atos/	ATOS
42	https://meta-os.eu/index.php/2023/10/10/unveiling-the-power-of-meta-orchestration-in-the-nemo-project/	UNVEILING THE POWER OF META-ORCHESTRATION IN THE NEMO PROJECT
43	https://meta-os.eu/index.php/2023/10/16/alto-the-protocol-designed-for-uninterrupted-netflix-viewing/	ALTO: THE PROTOCOL DESIGNED FOR UNINTERRUPTED NETFLIX VIEWING
44	https://meta-os.eu/index.php/2023/10/18/asm/	ASM
45	https://meta-os.eu/index.php/2023/10/23/nemo-project-was-present-in-esaam-2023/	NEMO PROJECT WAS PRESENT IN ESAAM 2023
46	https://meta-os.eu/index.php/2023/10/25/open-call-1-webinar/	OPEN CALL #1 WEBINAR
47	https://meta-os.eu/index.php/2023/10/26/about-sorbonne-university/	ABOUT SORBONNE UNIVERSITY

	Link	Title
48	https://meta-os.eu/index.php/2023/10/30/introducing-the-nemo-project-on-gitlab/	INTRODUCING THE NEMO PROJECT ON GITLAB
49	https://meta-os.eu/index.php/2023/11/03/foundation-of-the-hellenic-world-fhw/	ABOUT FWH
50	https://meta-os.eu/index.php/2023/11/06/empowering-smarter-cities-with-aiot-revolutionizing-urban-living-1/	EMPOWERING SMARTER CITIES: PART 1
51	https://meta-os.eu/index.php/2023/11/09/nemo-project-will-be-present-in-the-event-giving-energy-an-edge/	NEMO PROJECT WILL BE PRESENT IN THE EVENT “GIVING ENERGY AN EDGE”
52	https://meta-os.eu/index.php/2023/11/14/entersoft-s-a/	ENTERSOFT S.A
53	https://meta-os.eu/index.php/2023/11/14/empowering-smarter-cities-with-aiot-revolutionizing-urban-living-2/	EMPOWERING SMARTER CITIES: PART 2
54	https://meta-os.eu/index.php/2023/11/15/gpu-acceleration-in-unikernels-using-cricket-gpu-virtualization/	GPU Acceleration in Unikernels Using Cricket GPU Virtualization
55	https://meta-os.eu/index.php/2023/11/24/tsg/	tsg
56	https://meta-os.eu/index.php/2023/11/28/the-data-governance-act-entered-into-application-september-2023/	THE DATA GOVERNANCE ACT ENTERED INTO APPLICATION SEPTEMBER 2023
57	https://meta-os.eu/index.php/2023/12/13/navigating-the-future-understanding-the-new-european-law-on-artificial-intelligence/	NAVIGATING THE FUTURE: UNDERSTANDING THE NEW EUROPEAN LAW ON ARTIFICIAL INTELLIGENCE
58	https://meta-os.eu/index.php/2023/12/14/smart-energy-living-lab-in-terni/	SMART ENERGY LIVING LAB IN TERNI
59	https://meta-os.eu/index.php/2023/12/15/nemo-project-at-the-webinar-standards-ai-iot-and-digital-twin-in-the-making/	NEMO PROJECT AT THE WEBINAR “STANDARDS (AI, IOT AND DIGITAL TWIN) IN THE MAKING”
60	https://meta-os.eu/index.php/2023/12/21/aegis/	LIVING LABS: ENERGY
61	https://meta-os.eu/index.php/2024/01/08/eclipse-foundation/	ECLIPSE FOUNDATION
62	https://meta-os.eu/index.php/2024/01/25/nemo-co-organizes-mecc-2024-workshop-at-acm-eurosys-2024/	NEMO CO-ORGANIZES MECC 2024 WORKSHOP

	Link	Title
		AT ACM EUROSYS 2024
63	https://meta-os.eu/index.php/2024/02/08/nemo-was-presented-at-the-30th-anniversary-international-exhibition-agrotica-2024/	NEMO WAS PRESENTED AT THE 30TH ANNIVERSARY INTERNATIONAL EXHIBITION AGROTICA 2024.
64	Illustrating the Transformative Power of AI, IoT, Edge, and Cloud Convergence: Smarter Cities Use Cases - META-OS	ILLUSTRATING THE TRANSFORMATIVE POWER OF AI, IOT, EDGE, AND CLOUD CONVERGENCE: SMARTER CITIES USE CASES
65	https://meta-os.eu/index.php/2024/03/14/pi-a-very-special-number/	PI A VERY SPECIAL NUMBER
66	https://meta-os.eu/index.php/2024/03/15/nemo-5th-plenary-meeting-was-celebrated-in-madrid/	NEMO 5TH PLENARY MEETING WAS CELEBRATED IN MADRID
67	https://meta-os.eu/index.php/2024/03/18/breaking-boundaries-the-evolution-of-5g-access-in-integrated-networks/	"Breaking Boundaries: The Evolution of 5G Access in Integrated Networks"
68	https://meta-os.eu/index.php/2024/04/01/multisite-gaming-streaming-optimization-over-virtualized-5g-environment-using-deep-reinforcement-learning-techniques/	MULTISITE GAMING STREAMING OPTIMIZATION OVER VIRTUALIZED 5G ENVIRONMENT USING DEEP REINFORCEMENT LEARNING TECHNIQUES
69	Our April's newsletter is out! - META-OS	OUR APRIL'S NEWSLETTER IS OUT!
70	https://meta-os.eu/index.php/2024/04/17/nemo-in-the-1st-automation-robotics-expo/	NEMO IN THE 1ST AUTOMATION & ROBOTICS EXPO!
71	https://meta-os.eu/index.php/2024/04/22/review-on-the-communications-and-dissemination-activities-of-nemo/	Review on the Communications and Dissemination Activities of NEMO
72	https://meta-os.eu/index.php/2024/04/23/reviewing-nemo-living-labs-work-package/	REVIEWING NEMO LIVING LABS WORK PACKAGE

	Link	Title
73	https://meta-os.eu/index.php/2024/04/30/nemo-present-in-mecc-2024/	NEMO PRESENT IN MECC 2024
74	https://meta-os.eu/index.php/2024/05/08/call-for-papers-fedcsis-conference-2024/	CALL FOR PAPERS FEDCSIS CONFERENCE 2024
75	https://meta-os.eu/index.php/2024/06/02/nemo-project-was-present-in-the-regional-growth-conference-2024/	NEMO PROJECT WAS PRESENT IN THE REGIONAL GROWTH CONFERENCE 2024
76	https://meta-os.eu/index.php/2024/05/24/rd-eu-programme-for-smart-grids-asm-terni-experience/	R&D EU Programme for Smart Grids: ASM Terni's Experience
77	https://meta-os.eu/index.php/2024/05/30/challenger-blockchain-based-massively-multiplayer-online-game-architecture/	Challenger: Blockchain-based Massively Multiplayer Online Game Architecture
78	https://meta-os.eu/index.php/2024/06/18/a-software-defined-connectivity-service-for-multi-cluster-cloud-native-applications/	
79	https://meta-os.eu/index.php/2024/06/18/open-calls-2-now-open/	OPEN CALL #2 IS NOW OPEN
80	https://meta-os.eu/index.php/2024/06/19/nemo-attends-the-open-continuum-final-conference-2024/	NEMO ATTENDS THE OPEN CONTINUUM FINAL CONFERENCE 2024
81	https://meta-os.eu/index.php/2024/06/28/open-source-in-next-generation-meta-operating-systems-nemo/?_thumbnail_id=3808	OPEN SOURCE IN NEXT GENERATION META OPERATING SYSTEMS (NEMO)
82	https://meta-os.eu/index.php/2024/07/10/open-call-2-webinar/	OPEN CALL #2 WEBINAR
83	https://meta-os.eu/index.php/2024/07/18/nemo-open-calls-2-webinar/	NEMO OPEN CALLS #2 WEBINAR
84	https://meta-os.eu/index.php/2024/08/22/olive-tree-segmentation-from-uav-imagery/	OLIVE TREE SEGMENTATION FROM UAV IMAGINERY
85	NEMO celebrates its 6th General Meeting in Bolonga - META-OS	NEMO celebrates its 6th General Meeting in Bolonga
86	https://meta-os.eu/index.php/2024/09/26/nemo-was-present-at-the-unlock-cei-event-in-brussels/	NEMO was present at the Unlock CEI event in Brussels
87	https://meta-os.eu/index.php/2024/09/27/nemo-attends-aioit-days-2024/	NEMO attends AIOIT Days 2024
88	https://meta-os.eu/index.php/2024/09/27/nemo-smart-farming-use-case-voted-the-first-metaos-industrial-pilot/	NEMO Smart Farming Use Case voted the first MetaOS industrial pilot

	Link	Title
89	National Cybersecurity Awareness Month: A Call to Secure Our Digital Future - META-OS	National Cybersecurity Awareness Month: A Call to Secure Our Digital Future
90	https://meta-os.eu/index.php/2024/10/07/interview-with-terpsi-velivassaki-technical-aspects-of-nemo-explained/	Interview with Terpsi Velivassaki, technical aspects of NEMO explained
91	https://meta-os.eu/index.php/2024/11/05/nemo-metaos-and-data-spaces-a-vision-for-the-future/	NEMO metaOS and Data Spaces: A Vision for the Future
92	https://meta-os.eu/index.php/2024/11/14/smart-media-city-cloud-edge-iot-solutions-for-modern-day-media-at-infoworld-conference-2024/	Smart Media/City: Cloud-Edge-IoT Solutions for Modern-Day Media at Infoworld Conference 2024
93	Integrating Network & Service Management in the Cloud-Edge-IoT Continuum - META-OS	Integrating Network & Service Management in the Cloud-Edge-IoT Continuum - META-OS
94	Our newsletter is out! - META-OS	Our newsletter is out!
95	https://meta-os.eu/index.php/2025/01/23/nemo-online-general-meeting-a-milestone-looking-for-next-steps/	NEMO online General Meeting, a milestone looking for next steps
96	https://meta-os.eu/index.php/2025/02/08/nemo-attended-datamite-project-meetup-in-athens/	NEMO attended DATAMITE Project Meetup in Athens
97	https://meta-os.eu/index.php/2025/02/20/eviden-hosted-the-2-day-technical-meeting-in-madrid/	Eviden hosted the 2-day technical meeting in Madrid
98	https://meta-os.eu/index.php/2025/05/08/nemo-was-present-at-caa2025-conference-2025/	NEMO was present at CAA2025 Conference 2025
99	https://meta-os.eu/index.php/2025/05/10/nemo-project-accomplishes-the-smart-media-city-pilot/	NEMO project accomplishes the Smart Media City Pilot
100	https://meta-os.eu/index.php/2025/05/27/mncc-key-concepts-and-insights/	mNCC: Key Concepts and Insights
101	https://meta-os.eu/index.php/2025/07/01/nemo-project-consortium-gathers-in-athens-for-its-7th-general-meeting-day-1/	nemo CONSORTUI
102	https://meta-os.eu/index.php/2025/07/02/7th-plenary-meeting-of-nemo-in-athens-day-2/	7th Plenary Meeting of NEMO in Athens, Day 2
103	https://meta-os.eu/index.php/2025/07/07/nemo-will-be-present-at-iot-expo-2025/	NEMO will be present at IoT Expo 2025
104	https://meta-os.eu/index.php/2025/07/10/mncc-for-pros/	The mNCC in the NEMO Ecosystem: Architecture,

	Link	Title
		Functionalities and Perspectives for Advanced Network Management
105	https://meta-os.eu/index.php/2025/09/26/nemo-was-present-at-tech-expo-europe-2025-in-amsterdam/	NEMO was present at Tech Expo Europe 2025 in Amsterdam
106	https://meta-os.eu/index.php/2025/09/26/one-booth-a-meta-os-world/	One booth, a Meta-OS world
107	https://meta-os.eu/index.php/2025/09/26/meta-operating-systems-for-the-next-generation-iiot-and-edge-computing/	Meta-Operating Systems for the Next Generation IIoT and Edge Computing

All the features from the website could be found at NEMO's Deliverable D6.1 – Project Web site & Social Channels. Regarding the website, over the last month more than 10% of the users visited the NEMO website stayed for more than one page (they navigated through the several pages offered by the NEMO website).

In summary, along the project 110 blog post have been written.

Overall, during the last 12 months, we had a total of 468221 visits, I regret to say that over the last 1 month we had a decrease of 11426 visits compared to the previous one, (46614 total visits over the last month July 25). On average a user visits 12 pages each time he visits the NEMO website.

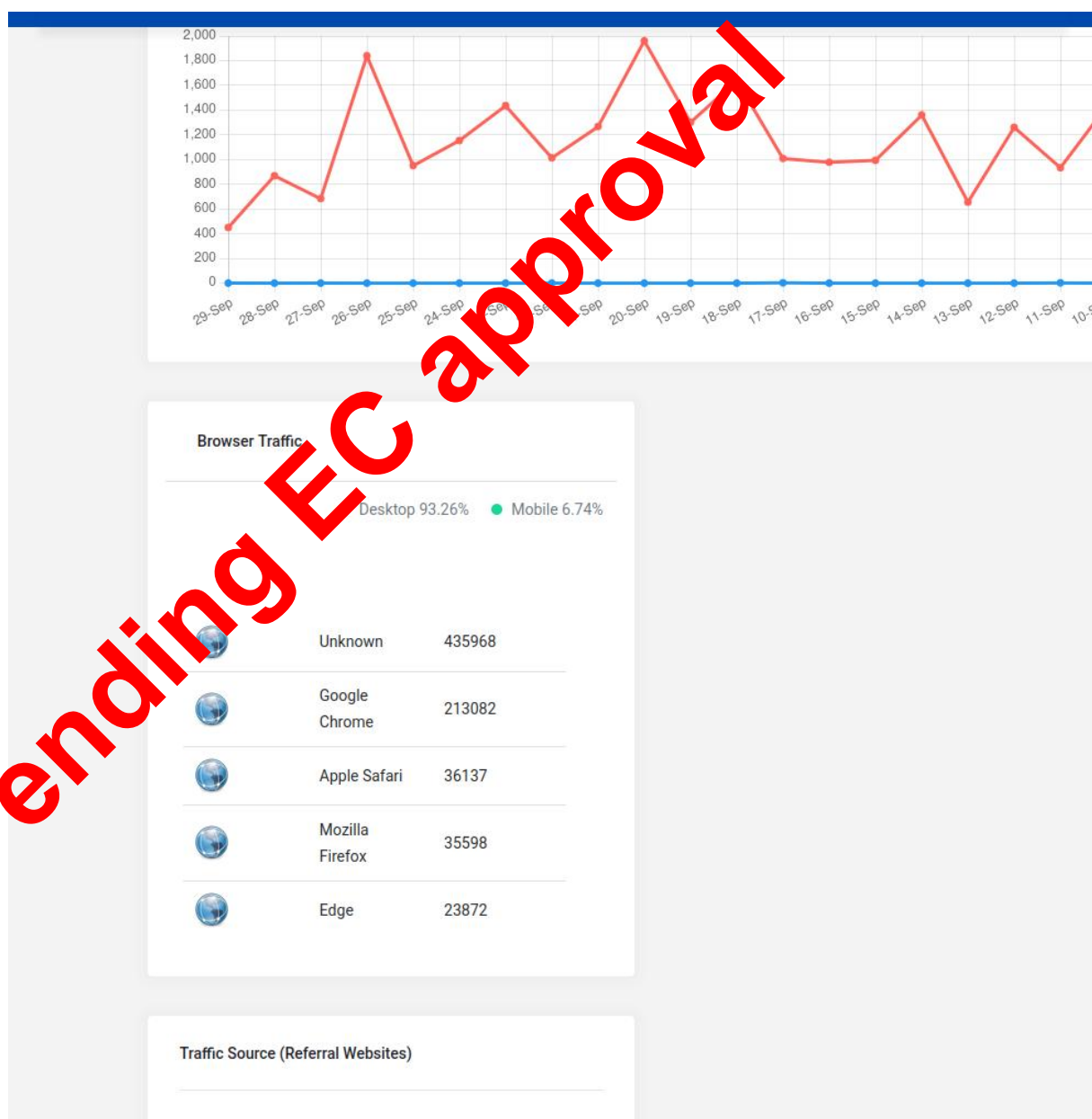


Figure 9 NEMO Website statistics

Concerning the online channels we have experienced a loss of followers in the X account. This has been experienced due to external projects aside of the project. This loss has not been extreme but accountable for the final numbers.

Within the whole community of NEMO, we have reached a potential cipher of 900 subscribers.

2.2 Online Channels

The NEMO project is present on several social media channels, including Twitter, LinkedIn, and YouTube, in order to reach a wider audience and increase visibility for the project.

Twitter: NEMO project uses Twitter to share daily news, updates, and other relevant information about the project, as well as to engage with the community by retweeting and responding to tweets from other users. NEMO's twitter account has 212 followers and 270 posts. YouTube account has 14 videos on the project and 34 followers.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	23 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final



Figure 10 Twitter profile

LinkedIn¹: Nemo project uses LinkedIn to connect with other professionals in the field, share information about the project, and to build relationships with potential collaborators. NEMO's LinkedIn account has 298 connections, 402 followers and 95 posts.



Figure 11 LinkedIn profile

¹ <https://www.linkedin.com/in/HE-NEMO/>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	24 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final

YouTube²: Nemo project uses YouTube to share videos about the project, such as project presentations, demos, and webinars. YouTube also allows the project to easily share the videos in other social media platforms. NEMO's YouTube account has 34 subscribers and 703 visualizations during the whole period of the project.

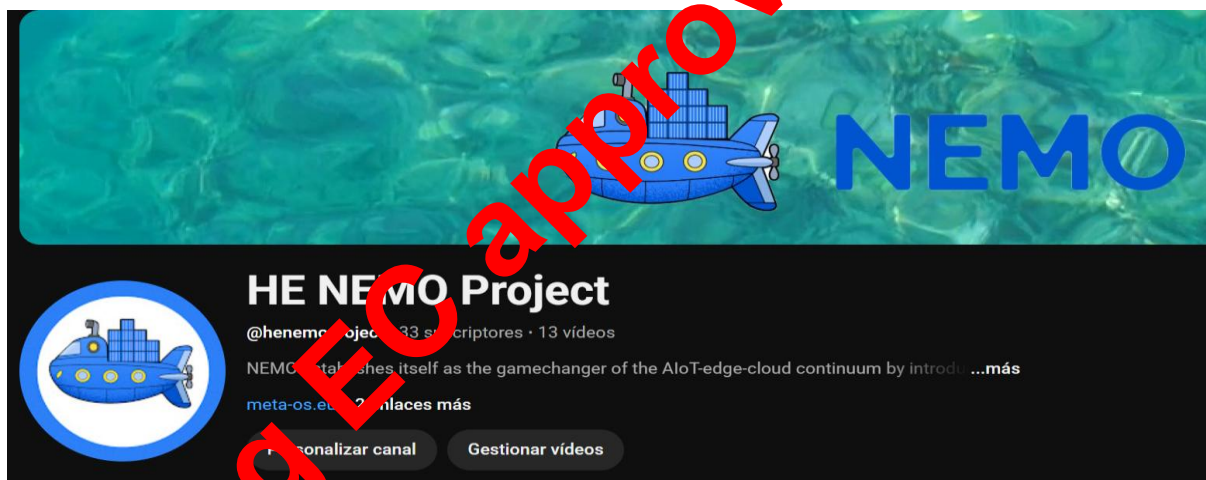


Figure 12 YouTube channel

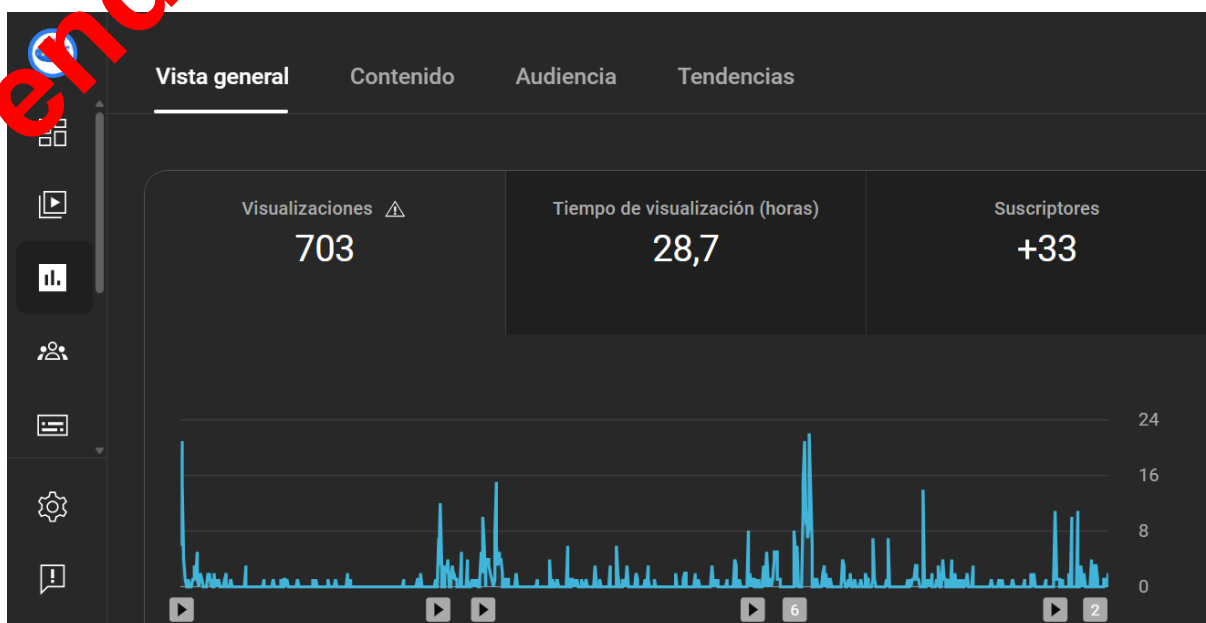


Figure 13 YouTube channel - Visualizations

Zenodo (<https://zenodo.org/communities/he-nemo/?page=1&size=20>) is a research data repository that provides a platform for researchers, scientists, and developers to store, share, and cite their research data. The Nemo project is using Zenodo to store and share all project deliverables and outputs, including research papers, reports, and datasets.

² <https://www.youtube.com/@henemoproject>

As **publications** along the project, you can find the following:

Table 2 List of NEMO publications

List of publications
Open Source approach in two metaOS projects Rosaria Rossini, Marco Jahn, Anastasios Zafeiropoulos, Nikos Filinis, Dimitrios Spatharakis, Ioannis Dimolitsas, Eleni Fotopoulou, Constantinos Vassilakis, Symeon Papavassiliou, Theodore Zahariadis, Ilias Nektarios Seitanidis, Enric Pages, Guillermo Gomez, Sergiy Remezov Grynchenko
Comparative Analysis of A3C and PPO Algorithms in Reinforcement Learning: A Survey on General Environments Albert del Rio, David Jimenez, Javier Serrano
Olive Tree Segmentation from UAV Imagery Konstantinos Pousalidis, Stavroula Bourou, Terpsichori-Helen Velivassaki, Artemis Voulkidis, Aikaterini Zachariadi, Vassilios Zachariadis
Open Source-defined connectivity service for multi-cluster cloud native applications Raul Martin, Ivan Vidal, Francisco Valera
Open Source in NEXt generation Meta Operating systems (NEMO) Rosaria Rossini , Terpsichori-Helen Velivassaki, Theodore Zahariadis, Panagiotis Karkazis, Dimitrios Skias, Enric Pere Pages Montanera, Artemis Voulkidis
Challenger: Blockchain-based Massively Multiplayer Online Game Architecture Boris Chan Yip Hon, Bilel Zaghdoudi, Maria Potop-Butucaru, Sébastien Tixeul, Serge Fdida
FREDY: Federated Resilience Enhanced with Differential Privacy Anastasakis Z, Velivassaki T-H, Voulkidis A, Bourou S, Psychogyios K, Skias D, Zahariadis T.
Multisite gaming streaming optimization over virtualized 5G environment using Deep Reinforcement Learning techniques A. del Rio, J. Serrano, D. Jimenez, Luis M. Contreras, F. Alvarez
Putting Intelligence into Things: An Overview of Current Architectures Maria Belesioti, Ioannis Chochliouros, Panagiotis Dimas, Manolis Sofianopoulos

List of publications

NEMO: Building the Next Generation Meta Operating System

Ioannis P. Chochliouros, Enric Pages-Montanera, Aitor Alcazar-Fernández, Theodore Zahariadis, Terpsichori-Helen Velivassaki, Charalabos Skianis, Rosaria Rossini, Maria Belesioti, Nikolaos Drosos, Emmanouil Bakiris, Prashanth Kumar Peddhoti, Panagiotis Karkazis, Astik Kumar Samal, Luis Miguel Contreras Murillo, Alberto Del Río, Javier Serrano, Dimitrios Skias, Olga E. Segou, and Sonja Waechter

On the Challenge of Sound Code for Operating Systems

Jonathan Klimt, Martin Kröning, Stefan Lankes, Antonello Monti

GPU Acceleration in Userernels Using Cricket GPU Virtualization

Niklas Eiling, Martin Kröning, Jonathan Klimt, Philipp Fensch, Stefan Lankes, Antonello Monti

Data Poisoning Attacks in Gossip Learning

Alexandre Mam, Maria Potop-Butucaru, Sébastien Tixeuil, Serge Fdida

2.3 Participation in Events

This section includes the following table that summarizes the events where the project has participated in the past. The table provides information about the event, including the date, and a brief description of the project's contribution.

Table 3 Nemo events

ID	Resp.	Type	Title	Contribution	Organizers	Date
1	SYN, ATOS	Cluster Meeting	Introduction one-to-one call with UNLOCK CEI to understand the tech to be developed and ambition related to market-readiness.	NEMO Presentation	UNLOCK CEI	October 21st 2022
2	ECL	Conference	EclipseCon 2022	Research Booth	Eclipse	October 24-27th 2022
3	ATOS, SYN	Workshop	aer_OS Workshop on State of Art and Market Analysis	Attendance	AerOS Project	November 29th 2022
4	SYN, ECL	Webinar	IoT and Edge at Eclipse: Making Sense of the Puzzle	NEMO presentation	Eclipse and EUCloudEdgeIoT CSA	December 7th 2022

ID	Resp.	Type	Title	Contribution	Organizers	Date
5	SYN	Workshop	LeADS Advanced Digital Skills Workshop	Attendance and participation	LeADS CSA	December 15th 2022
6	ECL, UPM	Congress	Embedded World 2023, Nuremberg	Booth	Embedded World	March 14th-16th 2023
7	ECL, UPM	Conference	Eclipse SAAM 2023	Conference Organization	Eclipse, UPM & UoM	October 2023
8	SYN, ATOS	Cluster Meeting	Introduction one-to-one call with UNLOCK CEI to understand the need to be developed and validation related to market-readiness.	NEMO presentation	UNLOCK CEI	October 21st 2022
9	SYN	Webinar	IoT, Cloud, Edge Computing Continuum From Research to Deployment	NEMO Smart Farming presentation	AIOTI/EUCloudEdgeIoT	November 30th 2022
10	OTE	Conference	24th Infocom World Conference	NEMO presentation	OTE	November 30th 2022
11	SYN	Cluster Meeting	EUCloudEdgeIoT TF4 and TF5 Kick-off meeting	NEMO use cases contribution	EUCloudEdgeIoT CSA	January 16th 2023
12	SYN, UPM	Info Day	Horizon Europe Info Day and Pitch Session on the Work Programme 2023-2024, destination “World leading data and computing technologies”	Questionnaires sent from UPM. SYN will attend the event.	EC, OpenContinuum CSA	January 30th 2023
13	SYN, UPM	Cluster Meeting	Concertation Meeting across all research and innovation projects in the Cloud-Edge-IoT community, to exchange ideas and find common views on research topics, challenges, and gaps for the next 2-4 years	Questionnaires sent from UPM.	EC, OpenContinuum CSA	February 8th 2023

ID	Resp.	Type	Title	Contribution	Organizers	Date
14	ECL, UPM	Congress	Embedded World 2023, Nuremberg	Booth	Embedded World	March 14th-16th 2023
15	ECL, ATOS	Congress	Concertation and Consultation on Computing Continuum: From Cloud to Edge to IoT	Pitch session	The Claridge, Brussels (Belgium)	May 9, 2023 - May 11, 2023
16	OTE	Conference /workshop	19th International Conference on Artificial Intelligence Applications and Innovations (AIAI 2023)/ 8th 5G-PINE Workshop	Paper Presentation acknowledging NEMO.	Democritus University of Thrace (D.U.Th.), University of Piraeus, Universidad de León	14 – 17 June, 2023
17	ECL, UPM	Conference	Eclipse SAAM 2023	Conference Organization	Eclipse, UPM & UoM	October 2023
18	OTE	Conference	eSAAM 2023 on Cloud-to-Edge Continuum	NEMO concept paper submission & presentation	Eclipse	October 17th 2023, Germany
19	OTE	Conference	25th Infocom World Conference	NEMO tutorial		December 14th 2023
20	UPM	Conference	HiPEAC 2024, High Performance, Edge And Cloud computing	Contribution to the discussion	HM Hochschule München University of Applied Sciences	January, 17-19 2024
21	SYN		Agrotica 2024	NEMO presentation Stand		February, 1-4 2024
22	SYN	Exhibition	1st Automation & Robotics Exhibition	Smart Farming		April, 12-14 2024
23	SYN	Panel Discussion	MECC 2024	Panel discussion “Meta operating Systems for The Edge Continuum: Current status, trends, and Challenges”.		April, 22nd, 2024
24		Workshop	Regional Growth Conference 2024	Workshop “Augmented Reality for the Industry: A hands-on session”	Peloponnisu Newspaper, Patras, Greece	May, 30th - June, 1st
25	UPM	Workshop	EuCNC & 6G Summit 2024	Workshop “Next Generation Meta-	Antwerp	3-6 June 2024

ID	Resp.	Type	Title	Contribution	Organizers	Date
				Operating System for AIoT Edge Cloud continuum		
26			Open Continuum Final Conference 2024	Presentation of NEMO project in Research Panel regarding META CE projects	Brussels (Belgium) EUCloudEdgeIoT .ee	18th, June 2024
27	ECL	Special session	SpaTech 2024	Special Session on Blockchain applications and Cybersecurity Solutions	Split-Bol	June, 25-28th
28	FHW	Presentation of pilot 5.5 Success Story	Unlock CEI 2024	Session: Supply demand dialogue. Smart Media City Pilot Project	Brussels, Belgium	September2 024
29	SYN	Panel discussion	AIOTI Days 2024	Cloud Edge -IoT technologies at the service of European sustainable Manufacturing Industries	Brussels, Belgium	24-25 September2 024
30	SYN	Panel discussion	Unlock CEI	Presentation of Smart Farming pilot	Brussels, Belgium	September2 024
31	INTRA	Workshop	eSAAM 2024	Participation in Data Spaces	Meinz, Germany	October, 2024
32	FHW	Presentation of pilot 5.5	26th Edition InfoWorld Conference 2024	Smart Media/City: Cloud Edge IoT solutions for modern-day Media	Athens, Greece	12th November, 2024
33	INTRA	Presentation NEMO	26th Edition InfoWorld Conference 2024	Network and Service Management in the Cloud Edge-IoT Continuum	Athens, Greece	12th November, 2024
34	OTE	Project Meetup	DATAMITE 2025	Booth	Athens, Greece	February, 6 2025
35	FHW	Workshop	52nd edition of the CAA International Conference	Presentation of NEMO and the Smart Media XR Pilot	University of West Attica, Athens, Greece	May, 9th 2025
36	ATOS, ALL	Final Event	Tech Expo 2025	Presentation of NEMO and its Use Cases along with other 5	Amsterdam	24-25 September 2025

ID	Resp.	Type	Title	Contribution	Organizers	Date
				META OS projects		
37	ECL, ATOS	OSCD	Open source community Day	Presentation of NEMO open source results	Madrid	23-24 September 2025

For the final event several representatives of the project's consortium partners attended. For this event promotional material was specially created such as a promotional video³ to showcase the project in a screen located in the booth, Figure 14. Also, a poster recollecting the findings of the project was delivered to the EU Commission. Besides this a roll-up was jointly created along with the other five META OS projects that were attending the venue, Figure 15.



Figure 14 Meta OS booth at IoTExpo 2025

³ <https://www.youtube.com/watch?v=RVHUiq4vgmE>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	31 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 15 Meta OS promotional roll-up

The event was an opportunity to show our work as a project and the solutions provided within the Use Cases, especially regarding Smart Farming, Smart City XR, Smart Industry and Mobility.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	32 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 16 Group Photo in Tech Expo 2025 (Amsterdam)

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	33 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

3 Standardization

NEMO followed the Standardization Strategy already developed by the European Commission for a greener and more digital economy within the Single Market. There are five main activities to be performed according to this:

- Support innovation at all levels.
- Leverage Europe as a reference in global standards.
- Improve the European standardization system.
- Identify, prioritise and address gaps in strategic areas.
- Enable the next generation of experts.

According to this, NEMO not only adopted some standards or de facto standards during the development, the consortium monitored and investigated any related standard, even if it is not being used within the project, to identify any gap or potential contribution from project results. In fact, TSG is co-chairing the 6G-IA security working group. In particular, the 6G-IA Security working group aims to bring together the projects within the 6G SNS-IA that have a common interest in the development and progression of topics related to 6G security. The group ensures that the projects are working in a complimentary manner towards consistent goals, exchanging ideas, minimizing the duplication of effort, contributing towards relevant standards and where possible cooperating on the development of compatible components, the exchange of expertise, experience and results. Through its presence in the WG, TSG has disseminated the results of NEMO mainly the usage of cybersecure federated deep reinforcement learning in the meta-orchestrator and its utility in decision making and optimal orchestrating workloads.

Finally, during NEMO development, the consortium was able to make contribution to some standards bodies such as IETF/IRTF and ISO/IEC:

- Y. Lee, X. Liu, L.M. Contreras, “DC aware TE topology model”, draft-llc-teas-dc-aware-topo-model-03 (work in progress), July 2023 (<https://www.ietf.org/archive/id/draft-llc-teas-dc-aware-topo-model-03.txt>). Relation to NEMO: This draft proposes a YANG model for describing the compute resources connected to a network topology. This can be used for upper control and management systems in order to select the more convenient edge/cloud environments for deployment of workloads taking into consideration not only compute capabilities but also networking ones in terms of traffic engineering. A new version of the document (<https://www.ietf.org/archive/id/draft-llc-teas-dc-aware-topo-model-04.txt>) served as basis for discussion in regards the formation of a potential working group within IETF. The initiative behind that, named Neotec (Network Operations in Telecom Cloud), proposes to address the emergence of "Telecom Cloud Service Providers (TCSPs)" in the era of cloud computing. The TCSPs refer to network operators who have deployed their own clouds infrastructure, particularly numerous edge clouds where services are hosted and have strict performance requirements, such as low latency or high bandwidth. The performance of cloud services delivery of TCSPs heavily relies on the efficient combined management and coordination between the clouds and the network infrastructure that interconnect them. Neotec has met in several side meetings in IETF (IETF 121 in November 2024 – see materials at <https://github.com/xiechf974/NeoTec-IETF121>), and IETF 122 in March 2025 – see materials at <https://github.com/xiechf974/NeoTec-IETF121>) and the activity has been considered for a new formed working group named ONIONS (Operationalizing Network & service abstractIONS).

⁴ <https://ec.europa.eu/docsroom/documents/48598>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	34 of 44	
Reference:	D6.7	Dissemination:	PII	Version:	1.0	Status:	Final

- L.M. Contreras, M. Boucadair, D. Lopez, C.J. Bernardos. “An Evolution of Cooperating Layered Architecture for SDN (CLAS) for Compute and Data Awareness”, draft-contreras-coinrg-clas-evolution-01 (work in progress), July 2023 (<https://www.ietf.org/archive/id/draft-contreras-coinrg-clas-evolution-01.txt>). Relation to NEMO: This draft proposes an architecture for inter-related control and management capabilities for services, connectivity and compute environments, where planes for control, resources and data (focusing AI/ML) are interconnected and collaboratively interacting. One of the scenarios of applicability is the cloud-edge continuum case. This document has produced two incremental versions in October 2023 and July 2024 (see <https://datatracker.ietf.org/doc/draft-contreras-coinrg-clas-evolution/>).
- Luis M. Contreras, Paolo Lucente. “Interconnection Intents” (work in progress) (<https://www.ietf.org/archive/id/draft-contreras-nmrg-interconnection-intents-04.txt>). Relation to NEMO: the contribution proposes the usage of intents for expressing evolved interconnection services, i.e., not simply peer-to-peer. For instance, need of connecting services / applications in different administrative domains, identification of resources on those domains, etc. These intents target similar high-level objectives as NEMO in regard to underlying technologies, addressing the edge-cloud continuum goals where NEMO is focused. Similar kind of intents could be used / defined in NEMO (on-going work).
- Luis M. Contreras, Paolo Lucente, Terpsichori Helen Velivassaki. “Interconnection Intents” (work in progress) (<https://www.ietf.org/archive/id/draft-contreras-nmrg-interconnection-intents-05.txt>). Relation to NEMO: the contribution extends the proposal for using intents for expressing interconnection among services running at different parts of the edge and cloud continuum. These intents can be combined with other intents within NEMO, addressing the edge-cloud continuum goals in both network and container management functions. Similar kind of intents are used / integrated in NEMO (on-going work).
- Furthermore, with the decision of the Network Management Research Group (NMRG) in IRTF of producing a single document with all the relevant intent-based use cases, the content of this draft has been moved to the “Use Cases and Practices for Intent-Based Networking” document (<https://www.ietf.org/archive/id/draft-irtf-nmrg-ibn-usecases-00.txt>) which has been adopted by NMRG and which can progress to become RFC. A new version of this document is being prepared for IETF 124 in November 2025.
- Thanks to its participation in EUCI TF3 Architecture, NEMO has contributed to the initial version of the taxonomy and reference architecture for the continuum. A request for opening a Preliminary Work Item was presented during an ISO meeting in Helsinki (June 2024). The work started in December 2024 and first results were presented during a plenary in Canada (June 2025). The ISO/IEC SC41 committee accepted them, and an extension of 2 years was approved in order to develop the needed material to start the process for developing a new standard.
- Additionally, NEMO has presented a set of development patterns, based on the implementations done for the use cases, to the Advisory Group (AG) 35. The main goal of this group is to set up a repository with development patterns that can be used by any external stakeholder who needs to implement a solution for their verticals. Thus, a development pattern is considered a technical document presenting a problem and an agreed standardised solution that can be further reused. All contributions received positive feedback, and further work was requested to develop a standardised pattern for developing these technical documents. This pattern will be presented during the next ISO/IEC meeting to be held in November in Berlin.

The full description of the contributions presented above can be found in NEMO website⁵.

⁵ <https://meta-os.eu/index.php/contributions-to-standardization/>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	35 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final

4 Communities Liaisons

In this section is presented the communities building activities put in place by the consortium to sustain the project results as well as objectives, their selection criteria, the action the consortium is putting in place to achieve these objectives.

The aim of the dissemination is to communicate the results, get to know the project, and build a strong network and interest in the NEMO project. On top of this, NEMO project can start building a community. Once the dissemination and the community building have played their role, the community liaison is the key to start creating the sustainability of the NEMO project.

For this reason, the consortium is in relationship with several business and development communities. Each of this communities provides us the opportunity to present and be challenged on the different facets of our project.

4.1 Gaia-X

GAIA-X is a European private sector initiative for developing an open, federated and interoperable data infrastructure built on top of digital sovereignty.

In this context, ATOS is a founding member of the global initiative and member of the Spanish Hub. Thus, ATOS promoted NEMO and leveraged on Gaia- X Association, the Gaia-X Hubs, and the Gaia-X Community.

4.2 AIOTI

RWTH pushed NEMO use cases at AIOTI WG 12: Smart Energy, CONTI to WG 11: Smart Manufacturing and SYN to WG 06: Smart Farming, aiming to engage early adopters, find prominent users and develop joint activities. A community building activity has been carried on with AIOTI during the AIOTI Days2024 and AIOTIDays2025⁶ in Madrid.



NEMO ATTENDS AIOIT DAYS 2024

SEPTEMBER 27, 2024

Figure 17 NEMO presented in AIOTI days 2024

⁶ <https://aioti.eu/aioti-days-2025/>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version	Page:	36 of 44
Reference:	D6.7	Dissemination:	PU
		Version:	1.0
		Status:	Final

NEMO presented and sponsored the Open Source Community Day 2025 ⁷



Figure 18 NEMO presented and sponsored the Open Source Community Day 2025



Figure 19 NEMO presented and sponsored the Open Source Community Day 2025

⁷ <https://www.eclipse.org/events/2025/oscd/>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	37 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

4.3 DAIRO/BDVA

DAIRO is the updated version of the BDVA community, now including not only data, but also AI and robotics within its target. ATOS is member of this community.

There are several ways of contributing to it, being the most relevant at this stage the participation in the EBDVF, as the reference annual event, where NEMO can organize or co-organize a workshop to show results in front of a multidisciplinary audience; or even participate within the BDVA Marketplace to offer tailored solutions for its community. ATOS, ESC, ENG, UPM are BDVA/DAIRO Board Members and lead SG13 Security (ENG), SG7 Mobility (INTRA), SG9 Agriculture (ATOS), SG4 Media (UPM), TF10 Data Sharing (INTRA).

4.4 5GPPP

Partners can heavily leverage the NEMO framework to set the roots for the coming 5G and Smart Networks and Services industrial partnerships as a key enabler of a trustworthy, resilient, sustainable and open next generation IoT.

Liaison with 5G PPP projects.

NEMO actively collaborated with other 5G PPP and non - 5GPPP projects. Several NEMO partners have been or are actively involved in 5G PPP Phase 1, Phase 2, and Phase 3 projects, and have long track record in establishing fruitful liaisons with other projects. As a matter of fact, NEMO builds up on the knowledge gained from previous work that the consortium has performed as part of the aforementioned projects.

The liaisons that will be established, will ensure a successful collaboration and a smoother integration of technologies and concepts.

4.5 NGI

NEMO is strongly aligned with the NGI core values and intends to collaborate in NGI community activities, such as outreach, event organisation and webinars

4.6 Eclipse IOT and Edge working groups

Eclipse Working Groups provide a vendor-neutral governance structure that allows organizations to freely collaborate on new technology development. Among all the Eclipse Working group, NEMO identified the Eclipse IoT Working Group as the most relevant for the topic. In particular, Eclipse IoT Working Group⁸ is an ecosystem of companies and individuals that are working together to establish an Internet of Things based on open technologies. It provides open source implementations of the standards, services and frameworks that enable an Open Internet of Things. Today the Eclipse IoT Working group has:

- 42 projects covering all the scope of the IoT from the device to the cloud, including gateway and edge devices;
- over 2.2 million Lines of Code;
- over 210 committers delivering the code;
- an average of 132K unique visitors per month.

⁸ <http://iot.eclipse.org>

Through newsletters and dedicated events, NEMO reached the Eclipse IoT community. Furthermore, the engagement with Eclipse IoT community has already started with the Open Continuum project, as detailed in the next subsection.

4.7 European Cloud, Edge & IoT Continuum⁹

NEMO has a strong collaboration with the European initiative called European Cloud, Edge & IoT Continuum⁹.

NEMO participated in IoTEXPO 2025 with the other MetaOS projects with a workshop and a booth as mentioned in the dissemination channel.



Figure 20 IoTEXPO 2025

⁹<https://eucloudedgeiot.eu/>

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	39 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 21 NEMO at OCX2024 presenting a paper in eSAAM2024

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	40 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final



Figure 22 EUCEI's Open Continuum Final Conference

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	41 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final

5 NEMO Open Source

A good open-source and community-building strategy should (i) draw and keep track of the open-source landscape of the project, (ii) create an environment that allows for open collaboration right from the start, (iii) implement sufficient Intellectual Property (IP) management and (iv) lay out measures for community-building.

5.1 Open Source Development

As the name suggests, open-source development is meant to be done in the open. In most cases, it is not a good idea to wait until the end of the project to release code, because *"the code needs polishing before it can be shown to the public"*, or *"it's not ready"*, for whatever reason. Developing behind closed doors is an open-source antipathy. It will slow the project down, and the effort to *"do it later"* will continue to grow. It will cause a lot of pain.

Infrastructure (i.e., a public repo) should be set up at the start of the project, and open-source best practices should be implemented from the start. This will allow everyone to become familiar with open-source development and will encourage knowledge transfer. It is a prerequisite for reaping all the benefits of open collaboration - something that should be a pillar of any research project.

Following the good practices, Nemo open source code is stored in the Eclipse Research Labs¹⁰, Figure 23.

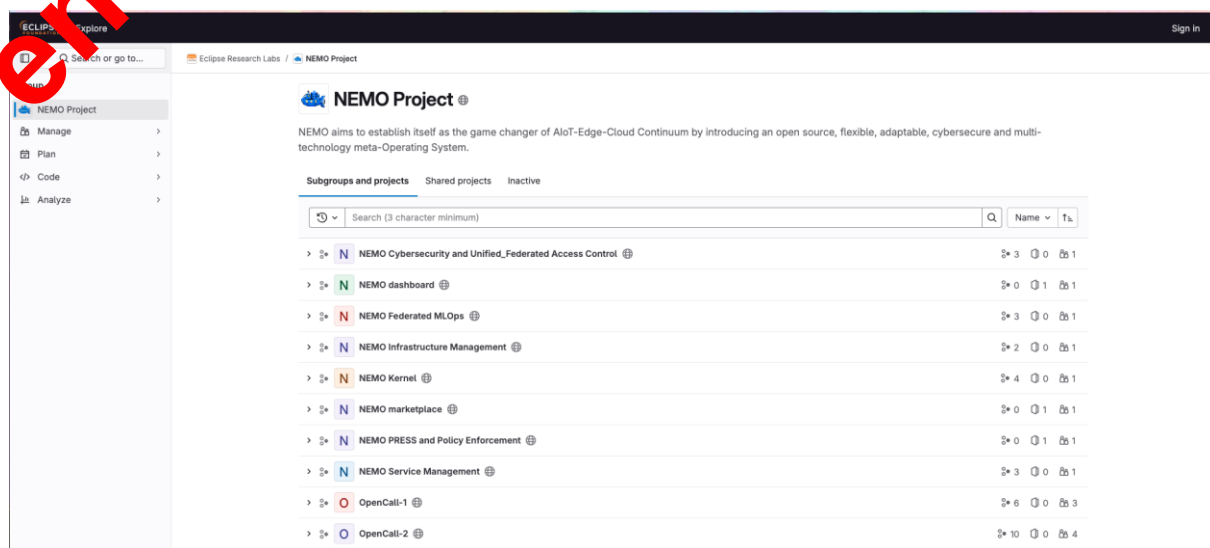


Figure 23 NEMO Eclipse Research Labs

It is also important to discuss open-source licences. The consortium should agree on (the types of) licences for the project results. For example, to allow commercial use of the open-source results, strong copyleft licences should not be brought into the project (at least not without prior agreement).

Moreover, as the project runs and code is developed, it is wise to keep track of all incoming IP and licenses. The aim is to identify problems as early as possible. For example, replacing a license-incompatible library will be much easier if it is caught early, rather than later, when a lot of code already depends on it. Typically, IP and licensing are not straightforward issues and require a certain amount of training, coordination and, ideally, tool support.

¹⁰ <https://gitlab.eclipse.org/eclipse-research-labs/nemo-project>

Figure 24 shows the license spectrum, ordered from strong copyright (or proprietary licenses, on the right) to permissive licenses (on the left), until the Public domain, which corresponds to an unlicensed piece of software.

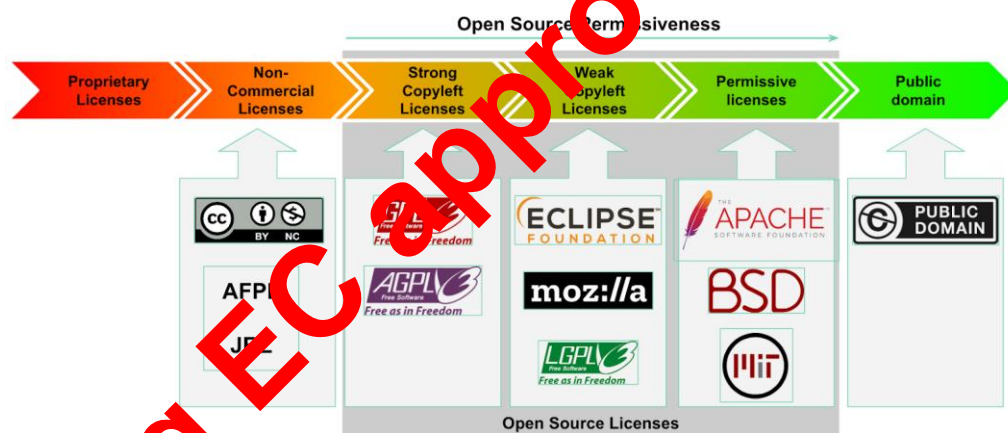


Figure 24 The OSS license spectrum.

NEMO consortium has 48 open source repositories distributed as Table 4 shows.

Table 4 NEMO Open Source

Repositories	#	Dependencies
NEMO	33	2336
Open Call#1	12	408
Open Call#2	3	1086

On the licence aspect, NEMO used 4 different licenses: Apache 2.0, EPL 2.0, MIT, MPL2.0. Table 5 shows the exact distribution.

Table 5 NEMO licences distribution

Licence	#
Apache 2.0	30
EPL 2.0	1
MIT	2
MPL 2.0	2
Dual: Apache 2.0 & MIT	1

6 Conclusions

Over the project's **three-year duration**, the combined strategy of dissemination, standardization, and community liaison proved highly effective, establishing a strong foundation for the project's long-term sustainability.

- **Dissemination:** We built **strong project visibility** by consistently reaching both expert and general audiences through events, publications, and digital channels. We successfully positioned our work within the European and global open source and research communities, creating valuable synergies.
- **Standardization:** Our proactive engagement led to several **key contributions** to relevant bodies, directly influencing discussions on interoperability, data spaces, and open digital infrastructures. This ensured alignment with EU policy and supported industry adoption.
- **Communities Liaison:** We fostered engagement with developers, SMEs, and industrial partners by creating effective bridges with major open source foundations. This facilitated **mutual learning, code reuse**, and created opportunities for sustainable adoption beyond the project's lifecycle.

Furthermore, **cross-project collaborations** with other initiatives amplified our overall impact and reinforced Europe's leading position in open innovation ecosystems.

Document name:	D6.7 Dissemination & Standardization & Communities Liaison – Final version				Page:	44 of 44
Reference:	D6.7	Dissemination:	PU	Version:	1.0	Status: Final