For immediate release
December 17, 2025

A High-Momentum End to the Year for 6GARROW

The first year of the 6GARROW project concluded at full pace, marked by a **face-to-face meeting**, a reception at the Finnish Ambassador's residence in Seoul, and two high-profile workshops.

The consortium gathered in Seoul, Republic of Korea, for its face-to-face meeting hosted at Yonsei University on 3–4 December. Meeting in person enabled deeper and more fluid exchanges, allowing partners to engage in detailed and highly constructive discussions, particularly on use cases and system architecture. Beyond the technical progress, the meeting reinforced collaboration across work packages, aligned partners on shared priorities, and further strengthened the collective vision driving the project forward.

During the Seoul visit, participants were invited to a networking event hosted at the **Finnish Ambassador's residence** on 3 December. The guests were warmly welcomed by Ambassador Jyri Järviaho and Deputy Head of Mission and Tech and Sustainability Diplomacy Specialist Antti Niemelä. The networking event brought together members of the 6GARROW and WISECOM projects with key representatives from the Korean 6G and AI-RAN ecosystem, providing a setting for exchange and relationship-building. The evening contributed to strengthening EU–Korea research cooperation, with a particular emphasis on Finnish–Korean collaboration in advanced communications, and enabled discussions on shared priorities and future opportunities in 6G and AI-RAN research.

6GARROW project has received funding from the Smart Networks and Services Joint Undertaking (SNS JU) under the European Union's Horizon Europe research and innovation programme under Grant Agreement No 101192194.

This project is also supported by the Institute for Information & Communications Technology Promotion (IITP) grant funded by the Korea government (MSIT) (No. RS-2024-00435652, 6GARROW: 6G Ai-native integrated RAN-Core networks). Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Commission (EC), IITP and MSIT. The EC, IITP and MSIT are not responsible for any use that may be made of the information.

Co-funded by the European Union

The **AI-RAN Workshop** in Seoul – 5 December – brought together consortium members and invited experts to share progress, align technical development, and explore new research directions in AI-driven wireless networks, with a particular focus on AI-RAN integration. Discussions highlighted significant progress across 6GARROW's technical domains, including network architecture design, machine learning for radio access and core network optimization, device-level intelligence, and performance validation. The event also extended participation to the broader research community, with keynote and invited talks by representatives from Nokia, NVIDIA, VIAVI, and DeepSig, as well as professors from leading universities in Korea, Hong Kong, and Singapore. The sessions emphasized the growing importance of AI as a transformative force in next-generation network design, interoperability, and energy-aware operations.

At **GLOBECOM 2025**, 6GARROW delivered the full-day workshop *"AI-Native Communications Systems: Towards Integrated, Intelligent and Highly Efficient Networks,"* dedicated to AI-native and semantic communications as key foundations for 6G, on 12 December. The workshop featured keynote presentations by Professor Seong-Lyun Kim of Yonsei University and Dr. Emilio Calvanese Strinati of CEA, France, who addressed AI-native architectures, semantic alignment, and the transition toward meaning-centric communication systems.

"One of the most stimulating parts of the session came from the audience's questions—all pointing to a core challenge: semantic misalignment. These discussions highlight a crucial reality: semantic alignment techniques are not optional—they are essential to unlock the real potential of semantic and goal-oriented communications for 6G. With proper alignment, we can finally move beyond bit-centric design toward networks that communicate meaning," Strinati summarizes. The technical program included twelve peer-reviewed papers covering topics such as AI-enabled massive MIMO, end-to-end learning for constellation shaping, semantic communication and representation, energy-efficient network optimization, diffusion-based channel estimation, and cooperative resource management.

6GARROW project has received funding from the Smart Networks and Services Joint Undertaking (SNS JU) under the European Union's Horizon Europe research and innovation programme under Grant Agreement No 101192194.

This project is also supported by the Institute for Information & Communications Technology Promotion (IITP) grant funded by the Korea government (MSIT) (No. RS-2024-00435652, 6GARROW: 6G Ai-native integrated RAN-Core networks). Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Commission (EC), IITP and MSIT. The EC, IITP and MSIT are not responsible for any use that may be made of the information.

Co-funded by the European Union

The workshop also featured a technical tutorial on the European Artificial Intelligence Act and a live demonstration of 6GARROW results on AI and semantic communication integration for future 6G systems.

Together, the workshops marked a significant milestone for 6GARROW, reinforcing its mission to develop AI-native, energy-aware, and resilient 6G network architectures that integrate intelligence across devices, radio access networks, and core systems. The insights gained from these discussions will continue to guide 6GARROW's ongoing research, validation, and standardization work as the project advances toward its next phase.

About IEEE GLOBECOM

The IEEE Global Communications Conference (GLOBECOM) is a flagship event of the IEEE Communications Society, annually bringing together thousands of researchers, innovators, and industry leaders from around the world. The 2025 edition, held in Taipei, Taiwan, from 8 to 12 December under the theme *"Sustainable Communications for Ubiquitous Intelligence,"* featured an extensive program of symposia, tutorials, workshops, and industry panels focused on shaping the future of global telecommunications.

About 6GARROW

6GARROW is a joint European–Korean research project supported by the Smart Networks and Services Joint Undertaking (SNS JU) and the Institute for Information & Communications Technology Promotion (IITP). Its mission is to develop AI-native, energy-aware, and resilient 6G network architectures that integrate intelligence across devices, radio access networks, and core systems. Through close collaboration between leading academic, research, and industry partners, 6GARROW is advancing technologies that will shape the future of global communication infrastructure.

The 6GARROW consortium includes CEA-Leti, Fraunhofer HHI, Aalto University, University of Oulu, Intel, Hewlett Packard Enterprise, Grenoble Ecole de Management, Orange, Yonsei University, Korea University, ETRI and LG.

For more information, visit https://6garrow.com/.

Media Contact:

Sallamaari Syrjä
Communications Manager
sallamaari.syrja@oulu.fi

6GARROW project has received funding from the Smart Networks and Services Joint Undertaking (SNS JU) under the European Union's Horizon Europe research and innovation programme under Grant Agreement No 101192194.

This project is also supported by the Institute for Information & Communications Technology Promotion (IITP) grant funded by the Korea government (MSIT) (No. RS-2024-00435652, 6GARROW: 6G Ai-native integrated RAN-Core networks). Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Commission (EC), IITP and MSIT. The EC, IITP and MSIT are not responsible for any use that may be made of the information.

Co-funded by the European Union