

El grupo de trabajo del Plan de Acción Tecnológica “PAT 18” promociona la Ingeniería Naval y Oceánica en el campo de las Energías Renovables Marinas (ENERMAR). Una de sus actividades cumbre es el desarrollo de sus Jornadas Técnicas, que se realizan anualmente. Las Jornadas Técnicas congregan a un numeroso grupo de asociados, colegiados y profesionales de otras especialidades, relacionados con las ENERMAR. Su programa incluye ponencias y mesas redondas sobre aspectos tecnológicos y empresariales de máximo interés profesional en el ámbito de las ENERMAR. Paralelamente se organiza un almuerzo de trabajo que permite la relación personal y la proximidad entre los asistentes.

La Asociación y el Colegio de Ingenieros Navales y Oceánicos de España, en colaboración con la Plataforma Oceánica de Canarias (PLOCAN) y el Clúster Marítimo de Canarias organizan los próximos días 26 y 27 de junio en Gran Canaria, la 5ª edición de estas jornadas. Se está planificando además una visita en barco a la zona del Banco de Ensayos Marino de PLOCAN y visita al aerogenerador G128 5MW en el Puerto de Arinaga.

The working group of the Technological Action Programme "PAT 18", is promoting Naval and Oceanic Engineering in the field of Marine Renewable Energies (ENERMAR). One of its core activities is the organization of Technical Sessions, which are carried out every year. These Technical Sessions congregate a numerous group of associates, college members and professionals from other specialties, related to ENERMAR. The programme includes talks and round tables on technological and business management aspects of maximum professional interest in the scope of ENERMAR. Parallel to this, a business lunch will take place to facilitate networking.

The Association and the College of Naval and Oceanic Engineers of Spain, in collaboration with the Oceanic Platform of the Canary Islands (PLOCAN) and the Canarian Maritime Cluster are organizing the Fifth Edition of these Technical Sessions next June the 26th and 27th, in Gran Canaria. Furthermore, a boat visit has been arranged to the zone of the PLOCAN Marine Test Site, and a visit to the wind turbine G128 5MW at the Port of Arinaga.



Ingenieros Navales y Oceánicos de España

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JORNADA TÉCNICA DE INGENIERÍA NAVAL



5^{as} Jornadas “El mar y las energías renovables”

La aportación de la Ingeniería Naval y Oceánica.

Lugar: INSTALACIONES DE PLOCAN
Ctra. de Taliarte s/n, 35214 Telde - Gran Canaria, España
Fecha: 26 y 27 Junio - 2014
Hora: 09:00 h

ASOCIACIÓN DE INGENIEROS NAVALES Y OCEÁNICOS DE ESPAÑA
COLEGIO OFICIAL DE INGENIEROS NAVALES Y OCEÁNICOS



Se ruega y agradece confirmación de asistencia

JUNTOS CONSTRUIMOS FUTURO



Navantia



26 JUNIO 2014



09.00h. APERTURA Y PRESENTACIÓN

Presentación del PAT 18. D. Juan Moya. Responsable del PAT 18 de la AINE
Presentación de las Jornadas. D. Roberto Reyes. Presidente Territorial de la AINE en las islas Canarias

09.30h. PANEL 1. Desarrollos avanzados de Energías Renovables Marinas



Evolución de la plataforma Offshore 5MW de Gamesa: De G128 a G132



D. Juan Moya. Naval Architect. ETSIN. UPM.   After more than a decade working as Technical Director in some Tier2 automotive companies in Spain and France, he moved into the R&D Headquarters of Gamesa, in Pamplona where, as Product Development Project Manager, he was in charge of the design & industrialization of the onshore 2MW wind turbines: G83, G87 & G90. In 2006 he was appointed first Director of the U.S. Engineering Department, in Philadelphia. After the completion of his expatriation in 2009, he spearheaded the landing of Gamesa onto the offshore wind. Since then, he has been involved in the development of two offshore models : G14X (6/7MW) and G11X (5MW). He has been the responsible of the industrialization of the first offshore windturbine in Gamesa, the prototype at Arinaga. Besides, since 2011 he leads the PAT18.



Advanced monitoring in marine renewable energies, an enabling technology



D. Pedro Mayorga. Founder and Chief Technology Officer of EnerOcean.   Industrial Engineer, he has worked as Manufacturing and Maintenance Engineer in General Motors and as Technological Area Manager in the Electrical Technology Institute (Valencia). Since 2001, he has been involved in, or co-ordinated, near 30 R&D projects. From 2007, he is the CTO of EnerOcean, responsible for several projects in offshore renewable energy. Pedro has served on Technology Platforms for Hydrogen & Fuel cells and Electricity Networks "Smartgrids". Author of several technical publications in these fields and inventor of several patents. As EnerOcean CTO he has participated in FP7 Tidalsense and TROPOS as main researcher. Former researcher in WAVEPORT and SEAMAR projects as well as in Eurostars Q-SAIL and MARINET testing rounds of W2Power concept.

Langlee Robusto wave surge converter, a norwegian-spanish cooperation





D. Simone Memé. Business Development Manager en Langlee Wave Power.   He holds a Ms and Bs in Environmental Engineering from the University of Rome La Sapienza and a postgraduate in Renewable Marine Energy and Sustainability from the University of Hawaii at Manoa. He is R&D coordinator and responsible of the business development of Langlee Wave Power, a wave energy developer of semi-submerged wave energy device. He has experience working at international level in the energy and environmental industry.

El Proyecto UNDIGEN:

Un convertidor de energía de las olas basado en un generador lineal directamente acoplado



D. Luis García-Tabarés. Head of CIEMAT's Electrical Engineering Unit.   PhD Marine Engineer at the Universidad Politécnica de Madrid. His professional activity started at the Centro de Estudios y Experimentación de Obras Públicas (CEDEX), where he created the Applied Superconductivity Group, and at CIEMAT, where he established the Particle Accelerator Group. Nowadays, both Groups merged into the Electrical Engineering Unit. This Unit also deals with generation and storage of energy.

11.00h. CAFÉ



11.30h. PANEL 2. Logística y Planificación del Espacio Marítimo

27 JUNIO 2014

09:00h. PANEL 3: Proyectos flotantes eólica offshore



WINDFLOAT: A real case of an operative floating offshore wind turbine



Dña. Alla Weinstein. CEO Principle Power.   BE in Electrical Engineering from Stevens Institute of Technology and an MBA from Thunderbird, the Garvin School of International Management. Co-founder, CEO& President of Principle Power, a company that provides deep-water offshore wind solutions with its floating support structure, WindFloat. Formerly, Alla was co-founder and CEO of AquaEnergy Group (AEG), a developer of a wave energy converter. AEG was acquired by a TSXV, where Alla was the General Manager and Director. She brings over 35 years of industry experience, building global engineering projects for multinationals like Honeywell and Boeing. Usual speaker in the US and Europe on the development of RES, she was a founder and the 1st President of the European Ocean Energy Association.

NAUTILUS: Design Considerations for a Semi-sumersible Offshore Wind Platform



D. Antonio Rico Rubio. Naval Architec. ETSIN. UPM.   Working as Naval Architecting Group Coordinator in Marine Renewable Energy Area of TECNALIA Research & Innovation. With 15 years experience in marine and offshore constructions, first in oil tanker shipbuilding, and later in offshore fish farming structural calculations, mooring and installations. Antonio arrived to Marine Renewable Energy Area of TECNALIA R & I in 2010, basing his main contribution to the marine energy field in his practical knowledge of shipbuilding and offshore structures. Author of two patents relating to underwater electrical connection, patents which TECNALIA has successfully licensed to various companies interested in commercializing devices based on these. Participating in various development projects of marine energy converters, such as NAUTILUS.

A multi-turbine solution for offshore wind power



D. Marcus Thor. Project Director Hexicon AB.   He is a Master of Science, Naval Architecture, Royal Institute of Technology, Sweden. Currently, he is the Project Director at Hexicon AB. Formerly he held Project Management positions at Ericsson and Epsilon. He was Project Manager at GVA Consultants and Design Engineer and Hydrodynamics Specialist at GVA Consultants, floating offshore structure



10.30h. CAFÉ

11.00h. MESA REDONDA Y COLOQUIO: "Sinergias en la transición hacia un nuevo modelo energético: la integración de los diferentes sectores industriales en el desarrollo de las Energías Marinas."

Moderada por el Presidente del Clúster Marítimo Canarias: **D. Vicente Marrero Domínguez**
D. José Romero Bernabeu, Astilleros Canarios (ASTICAN)
D. Francisco de Borja Garaygordobil Tajada, Zamakona Yards
Dña. Julieta C. Schallenberg Rodríguez (Universidad de Las Palmas)
Pau Revert Peris. Congenio. Universidad de La Laguna.

13.00h. Conferencia de cierre de las Jornadas Técnicas



D. Octavio Llinás González. PLOCAN General Manager and President of Innovamar   He has dedicated more than 20 years to marine research in the area of physical and chemical oceanography. He has been director of the Canary Islands Institute of Marine Sciences for over a decade. He has worked as Director of Planning and Development at the Canary Islands Government, and General Director of the Spanish Institute of Oceanography - IEO. He has also been main researcher in dozens of national projects and Group Coordinator in several international projects including some of the 7th Framework Programme.



13.45h. CONCLUSIONES Y CLAUSURA

D. Luis Vilches Collado. Presidente de la AINE
D. Octavio Llinás González. Director General de PLOCAN y Presidente de INNOVAMAR
D. José Miguel Bravo de Laguna Bermúdez. Presidente del Cabildo de Gran Canaria

14.00h. COPA DE DESPEDIDA



Proyecto Leanwind y sinergias con el proyecto TROPOS, planificación y logística del espacio marítimo



D. Joaquín Hernández Brito. PLOCAN Chief Executive Officer.   PhD in Chemistry. He has been responsible for over twenty national and international projects. He held several R & D management positions at the University of Las Palmas de Gran Canaria, such as Dean of the Faculty of Marine Science, Director of the Research Results Transfer Office (TTO), Director of the Scientific and Technological Park, and Research Vice-Rector. Former Director of the Canary Institute of Marine Science, since 2009 he is the Manager of PLOCAN. He is the Coordinator of the European project TROPOS and coordinator of European projects like LEANWIND or OCEANERA-NET.



Desarrollo de plataformas logísticas portuarias para atender la fabricación, instalación y mantenimiento de infraestructuras de parques eólicos marinos



D. Ignacio Pajares Gutiérrez. Surface Ships' Manouvers Head at Navantia.   After several positions within the Maritime and Naval sector, Ignacio joins Navantia in 1989 where he works in different projects from foreign shipyards' audits to consultant of design of maneuvers in Scottish and Moroccan shipyards. Currently he belongs to the "Energía Eólica de la Bahía de Cádiz"'s group and he's responsible of the "Desarrollo de Nuevas Técnicas de Logística Portuaria, Transporte, Montaje y Mantenimiento, y Análisis de Costes " activity of the CDTI-funded R&D&I Project SEAMAR (Andalusian wind solutions for the sea).



Planificación de los usos sostenibles de las áreas marinas en Canarias



Dña. Julieta Schallenberg.   Doctor and Industrial Engineer. Currently she is lecturer at the ULPGC. Former project manager in the Technological Institute of the Canary Islands. Research stages in the Fraunhofer Institute, Technological University of Vienna and Edinburgh University. Coordinator of 5 European projects and partner in more than 10, all in the field of Renewable Energy Sources (RES). She has been working in RES for nearly 20 years, considering aspects of their deployment, either technical or non-technological ones. Director of various courses related to RES. Several awards in the energy field. Numerous scientific papers. Independent expert for the European Commission.

Posibilidades de explotación de la energía eólica Offshore en la isla de Gran Canaria



D. Sergio Velázquez Medina.   PhD in Industrial Engineering. Professor at the University of Las Palmas de Gran Canaria (ULPGC), he is currently working in his research in the wind-energy section within the Mechanical Engineering research group of the University of Las Palmas de Gran Canaria. Throughout the years 2001 - 2006, he has been in charge of the wind Energy Exploitation Section at the Canarian Technological Institute (Instituto Tecnológico de Canarias – ITC). Moreover, he has taken an active part in various different research projects, both at national and international level, in relation to wind-energy field. He has also released several articles on the wind energy resource and its exploitation, which have been published in well-known journals.

13.00h. ALMUERZO

14:15h. SALIDA hacia las VISITAS TÉCNICAS

14:30h. VISITAS TÉCNICAS

14:30 - 16:30h => Banco de ensayos de PLOCAN –en barco. Convertidor UNDIGEN

17:00 - 18:00h => Visita al aerogenerador Gamesa G1280FS 5.0MW en el puerto de Arinaga.