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# SUSTAINABLE PLACES 2019 June 5-7 Cagliari, Italy

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# Welcome from the Organizers

On behalf of the organizers, sponsors, local supporting entities, partners and the local organizing committee, welcome to the Island of Sardegna, welcome to the city of Cagliari and welcome to Sustainable Places 2019. This 7th edition is once again a signature event and exciting step forward as the conference continues to grow, incorporate feedback from past editions, and build upon the path that brought us together again this year – the path toward a sustainable future.

This year's event is inclusive of all aspects of sustainability but has a focused tracks on Island Sustainability, Investing in EE retrofit, Demand Response, Smart Cities and the role of Sustainability Protocols. You'll find these themes across the keynotes, technical sessions and workshops. We are excited to again host an Infoday and Brokerage event dedicated to upcoming Energy Efficiency and Energy Systems topics in H2020 organized by the French and Italian NCP networks in collaboration with the European Commission. For local area professionals, we are excited to feature training in collaboration with GBC Italia on how to meet new environmental requirements in public works. An "Italian Day" local stakeholder session tackling retrofitting and smartening of the grid in Sardegna will also be an event highlight. In total, approximately 250 people will come together across the event to disseminate, cluster, network and take the next steps toward sustainability actions.

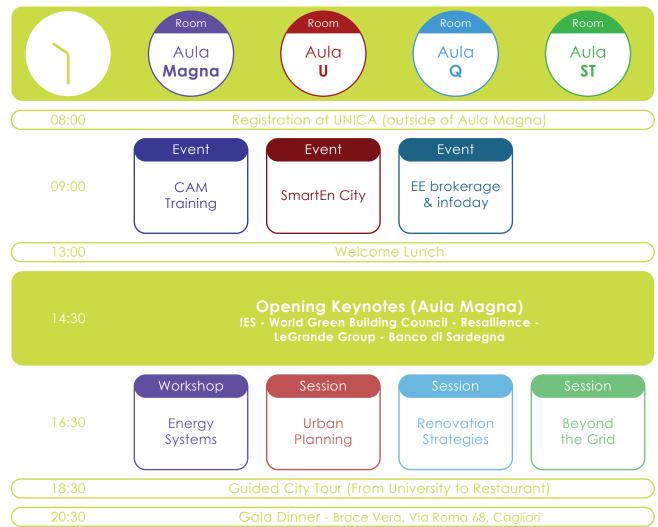
We wish you a great event and don't miss the Sustainability Bus (City Tour, Performance or Flamingo visit)!

Sincerely,

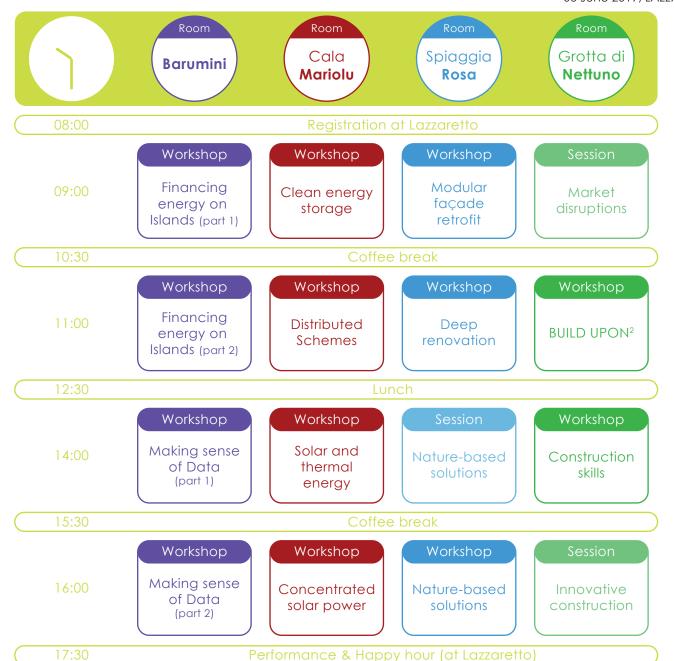
Carole Sentein, CEA LIST Etienne Wurtz, INES, CEA LITEN Thomas Messervey, R2M Solution

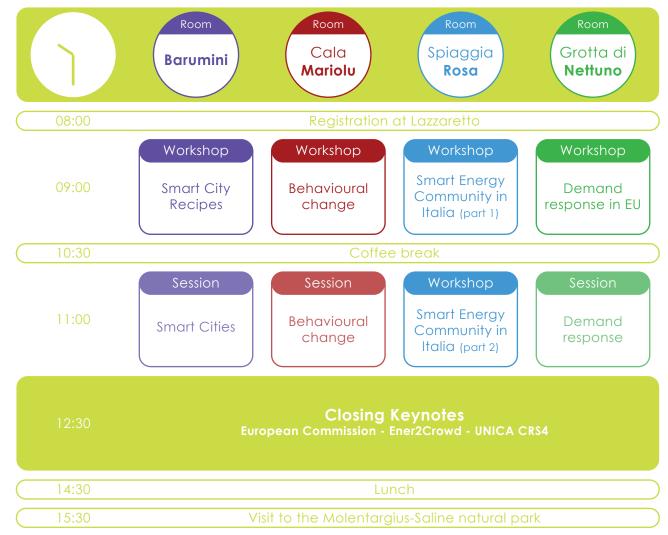














#### 16:30 - 18:30



"District and Building **ENERGY SYSTEMS:** A collaborative exchange of results on optimal system operation for energy efficiency" - workshop

3rd edition of this clustering workshop, organized by INDIGO, among EU funded projects to exchange results of work done in optimisation for District heating and Cooling as well as for Building Systems. Moderated by Raymond Sterling (R2M)

- INDIGO: Jesús Febres, IK4-Tekniker
- Thermoss: Federica Fuligni, Exergy
- **E2District**: Martin Klepal, Cork Institute of Technology
- OPTi: Khalid Atta or Johan Simonsson, LTU
- **RESPOND**: Nikola Tomasevic, Institute Mihajlo Pupin
- **REACT**: Federico Seri, NUI Galway



#### "URBAN PLANNING" - paper session

- "Urban Land Parcelization Based on Energy Efficiency Approach: The Case Study of Mahmoudabad City" Asareh Rashidi, Tarbiat Modares University
- "Geodesign: Applications Towards Smarter Planning and Urban Design Solutions" Nadia Amoroso, The University
  of Guelph School of Environmental Design and Rural Development
- "Investigating the Effect of Air Pollution on Cardiovascular Hospital Admissions in Ahvaz" (Azin Kianzad, National Iranian Drilling Company, Mina Nouri, National Iranian South Oil Company)



#### "RENOVATION STRATEGIES" - paper session

- "GEOFIT: Integrated design and delivery methods and digitalization as enablers to cost-effective and efficient aeothermal retrofittina" Thomas Messervey, R2M Solution
- "Review of human-based Inclusive approach for residential buildings retrofit, strategies and technologies" Ke Qu, University of Nottingham
- "The barriers and constraints of BIM implementation during the renovation process in the Italian market" (BIM4Ren) Carlotta Cocco, R2M Solution
- "Major Renovations of Historical Building and GBRS (LEED, BREAM. WELL) application for sustainable improvements: the case of Milan" Mario Pinoli, Greenwich Srl
- "Accelerating Energy renovation solution for Zero Energy buildings and Neighbourhoods" (RenoZEB) Michele Vavallo, SOLINTEL: Marco Arnesano, Università Politecnica delle Marche



#### "BEYOND THE GRID" - paper session

- "New combined solution to harness wave energy full renewable potential for sustainable electricity and fresh-water production" (W2EW) Michael Henriksen, Wavepiston; Massimo Lai, Simon Davide Piccioni, Ener.Med.
- "Smart Grid fleet Charging EV Facilities, Demand Side Response & Energy Storage" (inteGRIDy) Justice Agbo, Siemens Plc.
- "Improving power grid stability through a power to methane plant" (STORE&GO) Diego Arnone, Engineering Inaeaneria Informatica S.p.A.)
- "Opportunities for community-based Virtual Power Plants and the need for institutional innovation" (cVPP) Sylvia Breukers, Duneworks
- "Optimal planning of renewable generation for Local Energy Communities: the case of Berchidda Municipality (Italy)". Andrea Giordano, Emilio Ghiani and Fabrizio Pilo, Dipartimento di Ingegneria Elettrica ed Elettronica (DIEE), Università di Cagliari"

#### 09:00 - 12:30



"FINANCING Clean ENERGY ON ISLANDS / Buildings energy renovation on islands and in the coastal regions" - workshop

Discussing the challenge of investing in clean energy transition on islands in the context of the EU policy initiative "The Clean Energy for EU Islands" and its support tools. Special focus will be given to the very important role of local authorities as enablers for the success of these innovative financial tools.

- Welcome and general introduction to EU policy framework and funding Margot Pinault, European Commission, DG Energy, unit C3: Energy Efficiency Buildings and Financing
- The EU policy initiative "The Clean Energy for EU Islands" Feilim O'Connor, European Commission, DG Energy, Unit C2 New energy technologies, innovation and clean coal
- EU funding the dedicated support tools for islands:
  - Horizon 2020 islands related calls including the Islands Facility, Structural Funds Feilim O'Connor, European Commission, DG Energy, Unit C2 New energy technologies, innovation and clean coal
  - EIB- ELENA Facility Assen Gasharov, European Investment Bank, Projects Directorate, Energy Efficiency Division
- Mobilising financing for clean energy on islands with EU support- examples from ELENA and Jessica funds; how
  the Islands Facility can complement the EU support landscape? Andrea Martinez, SINLOC
- INNOVATE H2020 project on "one-stop-shop" for energy renovations of buildings. Case: Aradippou Municipality, Cyprus -Panayiotis Michael, EU Affairs Office Aradippou Municipality, Cyprus; National Technical University of Athens, Innovate Project Partner
- Mobilising investments in energy efficient building renovation in the Mediterranean region- the INTERREG project MEDNICE, Bernard Massabo, Secrétaire Général Réseau des Villes Euromed, METROPOLE NICE COTE D'AZUR, MEDNICE Project coordinator
- EU ongoing initiatives about capacity building to support island energy transition: SMART ISLAND Initiative, PACT OF ISLANDS – Kostas Komninos (DAFNI)
- Sardinia The European island where energy is going Smart Prof. Alfonso Damiano (Sardegna Ricerche)
- H2020 Project Showcases
  - SMILE project Stefano Barberis (RINA Consulting)
  - INSULAE Project Kostas Kominos (DAFNI)
  - REACT Project Raymond Sterling (R2M Solution)

#### 09:00 - 10:30



## "Added value of **CLEAN ENERGY STORAGE** in distribution systems"

Hosted by the STORY H2020 project, this workshop will deliver insights into technology integration and interoperability; market and regulatory barriers; and the importance of social acceptance and customer engagement in rolling out energy storage innovation.

- Martin Watson, Dimitri Weibel: Prospex Institute
- Jernej Zupancic, University of Ljubljana
- Mia Ala-Juusela, VTT
- Andreas Tuerk, Joanneum Research





#### "MODULAR FAÇADE RETROFIT with integrated renewable energy technologies" - workshop

Discussing the challenge of investing in clean energy transition on islands in the context of the EU policy initiative "The Clean Energy for EU Islands" and its support tools. Special focus will be given to the very important role of local authorities as enablers for the success of these innovative financial tools.

- Hu Du and Phil Jones, Cardiff University
- Tanja Osterhage, RWTH Aachen University
- Verena Dannapfel
- Laura Morcillo, Grupo Etra
- Rita Streblow, RWTH Aachen Univ
- Cristina Sendra, Eco Intelligent Growth



#### "MARKET DISRUPTIONS" - paper session

- "Hit2gap: BEMServer open source software as a market disruptor in energy management platforms" (Hit2Gap)
   Thomas Messervey, R2M Solution
- "Life cycle cost reduction and market acceleration for new nearly zero-energy buildings" (CRAVEzero) Roberta Pernetti, EURAC
- "Use of simulation tools for the analysis of energy concepts based on renewables and heat recovery for buildings and districts" (Thermoss & ReUseHeat) Peter Riederer, CSTB
- "Combined-Heat-and-Compute A Conceptual Approach to Sustainable Digital Infrastructure" Max Schulze, Lasse Schneppenheim; Sustainable Digital Infrastructure Alliance e.V.

#### 11:00 - 12:30



#### "DISTRIBUTED SCHEMES: Innovative solutions for smart grids. P2P, Blockchain, Multi-Agent Systems" - workshop

Clustering workshop of low TRL projects working on Smart Grids and Storage with focus on distributed schemes, such as P2P, blockchain, multi-agent systems, etc.

- DRIvE: Meritxell Vinvals, CEA
- FHP: Davy Geysen, VITO
- SHAR-Q: Ugo Stecchi, ATOS
- DELTA: Dimosthenis Ioannidis, ITI



#### "Exploitation of Business Models for **DEEP RENOVATION**" - workshop

A storytelling approach to recollect the customer journey in deep renovation practices of H2020 funded projects, for the characterization of intrinsic Key Exploitable Results (KERs).

- TripleA-reno: Simona d'Oca, Peter op 't Veld, Huygen Engineers and Consultants
- P2Endure: Oana Schippers-Trifan, DEMO Consultants
- ProGETone: Christoph Peters, LIMA Association. Annarita Ferrante, UNIBO
- 4RinEU: Roberta Pernetti, EURAC
- TURNKEY RETROFIT: Régis Decorme, R2M Solution
- STUNNING: Nicolas Peraudeau, DOWEL Management



#### "BUILD UPON2: launches the Italian cluster for building renovation initiatives in cities" - workshop

This workshop launches the Italian cluster of the BUILD UPON2 project, working with Cities to support the EU's goal of decarbonizing its building stock by 2050, by strengthening the effectiveness and implementation of the long-term building renovation strategies required under the EPBD. The experience of projects undertaken by cities will be presented and discussed to understand the impact of actions across multiple benefits areas for the renovation strategies at local, regional, national and EU level (e.g. on emissions reductions, increased jobs, decreased public health costs etc.).

- Welcome words: Thomas Messervey R2M/GBC Italia, Roberto Barracu Chapter Sardegna GBC Italia
- Introduction: Valentina Marino Green Building Council Italia
- BUILD UPON: Emilio Miguel Mitre Green Building Council Espana
- BUILD UPON2: Audrey Nugent World Green building Council
- PADOVA Fit and PADOVA Fit Expandet: Daniela Luise Municipality of Padova
- INNOVATE: Sebastiano Sali Municipality of Mantova
- MAKING-CITY: Emilio Miguel Mitre Green Building Council Espana
- Round table discussion: all presenters

14:00 - 17:30



"MAKING SENSE OF monitoring DATA: hands on demo on the Sensible Building Data Handler (powered by IES iSCAN)" - workshop

Buildings produce a lot of data, which can get cluttered and confusing easily. Transforming that data into actionable information is a tool out of 4RinEU called the Building Data Handler, powered by IES iSCAN, which gives insight on pre- and post-renovation performance to owners, designers, and users.

- Giulia Barbano, Adalberto Guerra Cabrera; Integrated Environmental Solutions Ltd (IES)
- Roberta Pernetti, EURAC

14.00 - 15.30



**"SOLAR AND THERMAL ENERGY**: Europe's precious energy sources for efficient industries and buildings" - workshop

An interactive session about social acceptance renewable energy technologies such as solar panels and heat pumps for both the residential and the industrial sectors.

- HYBUILD: Sergio Valentino Costa, COMSA
- SunHorizon: Alessandra Cuneo, RINA Spa
- HYCOOL: Andrea Frazzica, CNR ITAE
- SHIP2FAIR: Stefano Barberis, RINA Spa
- THERMOSS: Federica Fuligni, Exergy



#### "NATURE-BASED SOLUTIONS" - paper session

- "Subterranean to Skyline Street trees as potent boundary objects in transforming street section design. Findings from the Hug the Streets, Idelab Project, Oslo." (Idelab) Deborah Davies, Kiit Consultancy, Norway
- "Transformation of green areas in large housing estates: public participation and urban gardening. Examples from Riga and Tallinn." Alisa Korolova, Riga Technical University





#### "CONSTRUCTION SKILLS workshop, exploring the market demand on upskilling" - workshop

This workshop stimulates the demand for energy skills in the market, both from the supply side (construction sector) as demands side (building and homeowners)

- BIMplement: Peter Opt' Veld; Huygen Engineers
- BIMeet: Sylvain Kubicki, LIST
- CraftEdu: Jiri Karasek, SEVEn The Energy Efficiency Center, z.ú.
- Fit-to-NZEB: Jiri Karasek, SEVEn The Energy Efficiency Center, z.ú.
- NET-UBIEP: Giovanni Addamo
- BIMcert: Paul McCormack
- BIM4Ren: Thomas Messervey, R2M Solution

#### 16:00 - 17:30



#### "New generation of CONCENTRATED SOLAR POWER Technologies" - workshop

Hosted by NexTower H2020 project, this clustering workshop brings together market leaders in the field of CSP to share innovations and interact with the audience. Moderated by Elena Melotti (Warrant)

- Nextower: Claudio Testani, Calef
- InPower: Elena Torralba-Calleja, Leitat
- Reslag: Luca Turchetti, ENEA
- CySTEM: Manuel Blanco, Cyprus Institute
- Polyphem: Alain Ferriere, CNRS
- MOSAIC: Fabrizio Perrotta, Amires



# "Nature Based Solutions: Tools and Services for the Implementation of Nature Based Solutions (NBS)" - workshop

This workshop will provide Urban Planners, Architects, Contractors and other built environment stakeholders a holistic and thought-provoking view on how nature based solutions are increasingly a part of sustainable places and the tools and methods to maximize the impact of their implementation.

- Nature4Cities: R2M Solution, Rina Consulting, Colouree, LIST
- Operandum: Rina Consulting
- SUPREME: University of Cagliari
- ENI Bestmedgrape: University of Cagliari

# Grotta di Nettuno

#### "INNOVATIVE CONSTRUCTION" - paper session

- "IT platform to support information exchange about recycled materials for construction" (FiberEUse) Dena Arabsolgar, Holonix
- "Energy efficiency in early design of healthcare buildings. The result of the Streamer project from research to commercial market" (STREAMER) Andre van Delft, Oana Schippers Trifan, Rosamaria; DEMO Consultants
- "Certification for Ageing in place" (Homes4Life) Regis Decorme, R2M Solution

09:00 - 12:30



#### "SMART ENERGY COMMUNITY IN ITALIA" - workshop

This 2-part workshop includes a series of presentation and discussions in Italian focused on the technical and economic feasibility of Smart Grids in Italy.

#### 09:00 - 10:30



#### "SMART CITY RECIPES, a cookbook for the implementation" - workshop

Presenting key aspects, lessons learned, and challenges related to the emergence of smart cities and their indicators for status awareness – relevant to all SCC01 and future cities projects.

- +CxC: Giulia Carbonari, R2M Solution
- GrowSmarter: Federico Noris, IREC
- REACT: Dana Abi Ghanem, Teesside University
- MAKING-CITY: Emilio Miguel Mitre, GBC Spain
- SINFONIA: Adriano Bisello, EURAC
- SmartEnCity: Koldo Urrutia Azcona, Tecnalia Research & Innovation
- SmartEnCity Network Marie-Louise Lemgart, Hoje Taastrup



#### "How to achieve a BEHAVIOURAL CHANGE for energy saving through innovative IT solutions" - workshop

Four new innovative user-friendly solutions that focus on empowering consumers to engage and collaborate in achieving energy savings and allowing them to explore different means and measures to manage their energy needs over the longer term.

- MOBISTYLE: Rosamaria Olivadese, DEMO Consultants
- UTILITEE: Evangelos Zacharis, Hypertech Energy Labs
- ENCOMPASS: Ksenia Koroleva, European Institute for Participatory Media
- MOSAIC: Fabrizio Perrotta, Amires



#### "Interactive Workshop on Barriers and Progress for **DEMAND RESPONSE IN EUROPE**" - workshop

Hosted by the Sim4Blocks project, This workshop will facilitate discussions concerning the uptake of demand response in Europe and the market barriers that remain. Technological, Regulatory, Economic and Environmental factors will frame the debate and will be underpinned by the newest research results from the participating researchers.

- DR-BoB: Tracey Crosbie, Teesside University; Sylvia Breukers, Duneworks
- Sim4Blocks: Sam Davis, Insight Publishers; Malcolm Yadack, HfT Stuttgart
- NOVICE: Jo Southernwood, Solintel
- HOLISDER: Dawid Krysiński, ASM-Market Research and Analysis Centre; Laura Morcillo, Grupo Etra



#### 11:00 - 12:30



#### "SMART CITIES" - paper session

- "Methodology for the advanced integrated urban energy planning" (mySMARTLife) Eneko Arrizabalaga, Tecnalia Research & Innovation
- "Towards Positive Energy Districts The +CityxChange Approach" (+CxC) Giulia Carbonari, R2M Solution
- "Lighthouse MAKING CITY, PED, Positive Energy District development methodology and its replication potential" (MAKING-CITY) Emilio Miguel Mitre, GBC Spain
- "The ZeEUS demonstration in Cagliari" (ZeEUS) Roberto Murru, CTM Spa



#### "BEHAVIOURAL CHANGE" - paper session

- "BENEFFICE H2020 research project presentation: Affordable, Voluntarily Energy Efficiency at Home" (BENEFFICE) Anna Malamou, European Dynamics SA
- "Transforming energy efficiency into an entirely new customer experience An effective way to engage consumers" (UtilitEE) Evangelos Zacharis, HYPERTECH; Hanna Launonen, VaasaETT



#### "DEMAND RESPONSE" - paper session

- "Behaviour Demand Response in District Heating A simulation-based assessment of potential energy savings" (E2District) Christian Beder, Martin Klepal; Cork Institute of Technology, Ireland
- "Demand Responses: moving beyond the technical and physical context of buildings" (DR-BoB) Tracey Crosbie, Teesside University; Sylvia Breukers, Duneworks
- "Short-term Prediction of Energy Consumption in Demand Response for Blocks of Buildings: Dr-BoB approach" (DR-BoB) Nashwan Dawood, Teesside University



# **Keynote** presentations

Opening Ceremony (Aula Magna UNICA, 05 June 2019, 14:30 - 16:30)



## Dr Don McLean - Founder & MD of IES

**Keynote:** "Making communities sustainable - a manifesto for saving the planet" With the new digital twin technology we can now apply sustainable analysis to communities of any size or purpose, enabling people to look at energy use holistically at a much larger scale. To do this successfully we need leaders who can lead their community and evolve these smart concepts into truly intelligent solutions which will have a measurable and lasting impact upon climate change. If each leader looks after their built environment footprint, in time, we can cover the Earth.



## Audrey Nugent - Head of Advocacy World Green Building Council

**Keynote:** "Green Building Councils – Putting a sustainable built environment at the heart of Europe's future"

Green building councils make up the largest sustainability organization worldwide. We are present in over 70 countries and have over 49,000 members. Together, we work toward a more sustainable built environment through a series of actions that include the shaping and implementation of sustainability protocols, training to professionals, advocacy, the organizations of events and the networking of organizations and professionals dedicated to sustainability. This talk will discuss the role of GBC in Europe and beyond and share our thoughts and observations on the trends impacting the sector as we move beyond buildings and toward sustainable places in the digital age that are more energy efficient, that promote wellness, and that are more circular.



## Dr Karim Selouane - Founder & CEO of Resallience

Keynote: "How to make Infrastructures and Cities Relient towards Climate Change" In emerging economies, climate change threatens the development role of infrastructures. It is affecting all types of large-scale projects such as energy, transport, water and more generally buildings. Rising temperatures, increasing flood risks, and other climate hazards are already stressing reliable and efficient operations of these networks leading to large economic and social impacts. As such, the public and private sector, investors, and civil society must now address climate change risks and uncertainty when planning, building and operating infrastructure projects. By adopting a resiliency lens via a technical action framework which covers insurance, normalization and finance, stakeholders can implement tools and methodologies that lead to improved design, site selection and operations of infrastructures to increase the resilience of our cities and the infrastructures that support them.





## Andrea Raimondi - Business Developer Energy Efficiency for Legrand Group

**Keynote:** "Legrand Group: the strong engagement in Energy Efficiency"

Legrand Group, represented in Italy by Bticino, is the global specialist in electrical and digital infrastructures, offering high-value-added products and solutions for commercial, residential and industrial buildings.

Its technological expertise, its leading positions, the scope of its offering, its international presence and the power of its brands combine to make Legrand a global benchmark. With a presence in nearly 90 countries and a workforce of over 38,000 employees, Legrand generated total sales of close to €6.0 billion in 2018.

Directly integrated in the Group's activity, Corporate Social Responsibility is an essential ingredient in Legrand's growth. Situated at the crossroads between its business, its strategy, and the global challenges the Group faces, it involves the whole organisation; all the subsidiaries and entities are stakeholders in this CSR strategy, which they implement all over the world. One of the 3 pillars of the CSR strategy is the ENVIRONMENTS or how Legrand Group intends to limit the Group's environmental impact.



## Ing. Raffaele Cosenza - Energy Manager Banco di Sardegna

**Keynote:** "Switch- Off project: energy efficiency for Banco di Sardegna buildings"

The Switch – Off project for improved energy efficiency for the Banco di Sardegna was conceived in 2014 to deal effectively with the need to reduce costs, save energy and optimize consumption.

The goal was to explore the numerous opportunities related to low implementation costs, which would guarantee promising results both in terms of systems management and staff involvement.

Through the installation in over 150 sites of adequate software and equipment for measuring and controlling the main electrical loads in the most energy-intensive branches of the Banco di Sardegna, it was possible, remotely via the web, to monitor and optimize the global energy consumption, both electric and thermal. The results achieved in the 2015-18 three-year period have allowed savings of over 9,000 MWh with a consequent reduction of approximately 4,800 tons of CO2 emissions into the atmosphere.

# **Keynote** presentations

Closing Ceremony (Barumini LAZZARETTO, 07 June 2019, 12:30 - 14:30)



Margot Pinault - Policy Officer, European Commission, Directorate General for Energy, Unit C.3- Energy Efficiency, Buildings and Finance Team

**Keynote:** "Accelerating the transition to clean energy and sustainable buildings- the EU policy and funding"

The presentation will recall the EU Climate and Energy policy objectives for 2030 and the EU long-term decarbonisation strategy scenarios. It will further develop on the EU legislative framework to achieve these objectives. Finally it will go through the Commission proposals for the next Multiannual Financial Framework programmes adopted last year, with the specific focus on the support to energy transition and buildigns sustainability.



Eng. Niccolò Elia Sovico & Sergio Pedolazzi - Founders and Management Team of Ener2Crowd

**Keynote:** "Crowdsourcing Sustainable Places"

Financing should not be the barrier that blocks our ambitions toward meeting the sustainable development goals and our energy and emissions targets. Moreover, we believe the "average people" want to get involved, care and are willing to make a difference. For that reason, we founded and launched ENER2CROWD, a crowdsourcing platform dedicated to sustainability projects. Although new today, we believe crowdsourcing will be mainstream tomorrow. In this keynote, we'll tell you our ambitions for ENER2CROWD will disrupt the sustainability financing landscape and empower everyone to take an active role in the energy transition towards a completely green economy.



Annalisa Bonfiglio - President CRS4 – Centro di Ricerca, Sviluppo e Studi Superiori in Sardegna (Center for Advanced Studies, Research and Development in Sardinia)

**Keynote:** "From the Smart City to the Smart Island: life-improving projects based on digital technologies"

Since more than 25 yrs, CRS4 has been involved in several research projects focused on digital technologies applied to biosciences, energy, environmental sciences, cultural heritage, human interactions, etc. More recently, these research efforts have been focused on the development of technological projects for the smart city of Cagliari, trying to take into account the complexity deriving from applying digital technologies to the typical processes of a medium-size, ancient, Italian city, located in an island just in the middle of the Mediterranean Sea. The next challenge is to extend this approach to the entire island of Sardinia, trying to make a successful matching between technology and socio-economical aspects of the territory.



# **Performance and Park visit**



# Day 2: "Lughente e Sùtile Lughe"-Lucide Sottile performance

A woman has the supernatural gift of modifying the fate of people, by snatching them from the arms of death and giving them a new opportunity to live.

Elena, from the Ancient Greek "Elène" which means torch, shimmering, shining, is wrapped in her own destiny: the thread of life.

Together with the thread of life that she commands and that at the same time commands, dominates and imprisons her, she generates a tormented dance. Elena takes actions to graft herself into death and then block the outcome.

These actions weaken her: time after time she loses some of her life. Elena dies to save someone, then comes back to life and start over.

**Direction:** Tiziana Troja. **Choreographer:** Tiziana Troja, Valentina Puddu. **Assistant Choreographer:** Michela Laconi. **Performer:** Valentina Puddu. **Music:** Elena Ledda, Autechre. **Sound design:** Davide Sardo. **Production assistant:** Federica Troja. **Costumes:** Azzurra Miniti. **Photography:** Davide Sardo.



# Day 3: Parco Naturale Regionale Molentargius-Saline

Immediately following the event on the afternoon of 7th June, the organizing committee is making available a guided visit to the Molentargius-Saline natural park which covers over 1600 hectares and which is famous for the numerous colonies of flamingos that live there. Since the decommissioning of the salt extraction activities, the park has been redeveloped and transformed into what is now one of the richest birdlife park of Sardinia. The park is ideal for an experience in contact with nature, just five minutes away from the city centre and the guided tour will allow you to discover the characteristics and peculiarities of the area.

# Sponsors of Sustainable Places 2019

# La legrand blicing IME &

Legrand is the specialist in electrical and digital building infrastructure.

Legrand Group, represented in Italy by Bticino is the global specialist in electrical and digital infrastructures, offering high-value-added products and solutions for commercial, residential and industrial buildings. Every day Legrand works hard to enhance electrical and digital building infrastructures and help develop connected buildings around the world.

Its technological expertise, its leading positions, the scope of its offering, its international presence and the power of its brands combine to make Legrand a global benchmark. With a presence in nearly 90 countries and a workforce of over 38,000 employees, Legrand generated total sales of close to €6.0 billion in 2018.



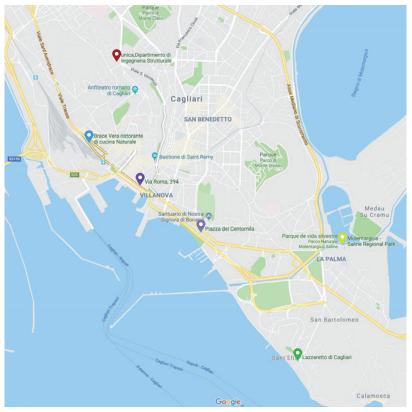
Axpo Italy, part of the Swiss group Axpo AG, works in all non-regulated activities in the energy supply chain:

- It has gas-fired combined-cycle generating plants for over 1800 MW of installed capacity
- It is among the first commodity traders
- It supplies electricity and gas to end customers (large consumers, SMEs and households)
- With a portfolio of around 1300 MW, it operates as a dispatching user in the prosumer (auto-producer and consumer) electricity market, produced by renewable and cogeneration plants

Axpo Energy Solutions Italia is an ESCo subsidiary of Axpo Italy active in the segment of energy efficiency and energy production from photovoltaic and cogeneration plants. Axpo Energy Solution also focuses on electric mobility and provides charging stations for private use for companies and domestic clients. The ESCo is collaborating with the Municipality of Rome for the installation of 150 public charging stations, supplying electricity to the only electric car sharing service operating in Rome.



# Points of Interest



## Venues

- UNICA, Facoltà di Ingegneria e Architettura. Via Marengo 2, Cagliari
- Lazzaretto di Cagliari. Via dei Navigatori 1, Cagliari

## Restaurant and Park

- Brace Vera Ristorante. Via Roma 68, Cagliari
- Parco Molentargius. Via la Palma, Cagliari

## SP19 BUS pickup points

- Via Roma, parking space in front of Palazzo Consiglio Regionale 8:10h and 8:40h
- Piazza dei Centomila 8:15h and 8:45h







