

Towards resilient climate-proof towns: urban and territorial projects and strategies

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Book of Abstracts

SISC ANNUAL CONFERENCE

**CLIMATE
CHALLENGES
AND SOLUTIONS
UNDER THE
2°C TARGET**

CAGLIARI / 19-20 OCTOBER 2016

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BOOK OF ABSTRACTS

SISC Annual Conference Climate challenges and solutions under the 2°C target

Cagliari (Italy), October 19-20, 2016

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The Annual Conference of the Italian Society for Climate Sciences (SISC) takes place on October 19-20, 2016 at Cagliari, Italy.

The conference, entitled “**Climate challenges and solutions under the 2°C target**”, is organized by SISC in cooperation with other Italian Institutions. It aims to foster the scientific debate among scientists, policy and decision makers (Italians and foreigners), NGOs members and other stakeholders whose activities are focused on climate change and its relationships with the environment and socioeconomic systems, opportunities and solutions helping in respecting the recent Paris agreement.

The main objective of the Conference is to summarize the Italian experience on climate research, and policy action within the international setting, and specifically:

- To promote an interdisciplinary platform for sharing and discussing on climate risk for the environment and the society;
- To highlight the scientific advances made to address the different aspects of climate change;
- To explore possible solutions to cope with climate change by promoting a dialogue on policies and strategies regarding adaptation, mitigation, and sustainable growth.

The program of the 2016 SISC Annual Conference consists of:

- plenary lectures
- parallel sessions of high profile invited talks
- contributing posters sessions
- workshop sessions

The Conference is open to:

- scientists
- policy and decision makers
- entrepreneurs
- NGOs
- others stakeholders

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Towards resilient climateproof towns: urban and territorial projects and strategies

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ABSTRACT

In the last years the effects of the climate change have led reduction of safety and livability, especially in coastal and delta river towns, consequently subject to the dynamics of the latter.

In 2013 Bernardo Secchi proposed a “new urban question” (Secchi, 2013) to describe the set of environmental, economic and social changes affecting the European cities: among which the effects of climate change that push national and local governments to develop new strategies able to respond to the increasing level of risks due to climate change. These pressures are more detectable in some “sensible” territories, such as water urban landscapes, that rely project and plan the task to put at the end “the permanent emergency approach, the irresistible weight of the previous questions, the autonomy seemingly irreconcilable interests” (Palermo, 1998). In these conditions, the urban project takes a strategic role, linking the determinism of the usual rules about what you can do with the rules on how and which principle must be taken the decision (Portas, 1998).

In this contest, the development of climatic and risk scenarios in the urban built area, can produce initiatives to limit risks, as well as could include urban strategic projects, in order to identify evolutionary scenarios that focus the relationship between environmental structure and urban project, identifying design alternatives and sequences that can develop a new *forma Urbis*, adaptive and more resilient, able to limit risks, keeping the economic activities, integrating in the landscape and in search of an order.

The abstract proposes an adaptation process to the effects of climate change in waterfronts areas (Lisbon), through strategies, urban scenario projects and economic assessment models.

Keywords: adaptation; climate change; urban planning; sensible urban areas.

References

1. Palermo P.C. (1998), "L'autonomia del progetto e il problema della visione condivisa", *Urbanistica*, n. 110.
2. Portas N. (1998), "Interpretazioni del progetto urbano", *Urbanistica*, n. 110.
3. Secchi, B. (2013), *La città dei ricchi e la città dei poveri*, Roma: GLF editori Laterza.

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