



International Workshop CO₂ Storage in Concrete CO2STO2019



24-26 June 2019, Marne la vallée, France

co2sto2019.ifsttar.fr



International Workshop CO₂ Storage in Concrete (CO₂STO2019)

Welcome & scope

Decreasing natural resources of sand and gravel and increasing problems with waste management support the recycling of the accumulating waste materials. If the vision of a sustainable material flow is to be realized, the amount of recycled waste has to be increased. The building industry in particular is a major consumer of materials and at the same time a major producer of waste and CO₂ emissions by production of Portland cement which represents 5 to 8% of CO₂ emissions worldwide. CO₂STO2019 « CO₂ storage in concrete » focuses on the ability of concrete to store CO₂ during its life cycle. Concrete undergoes natural carbonation during service life of structures. At the end of its service life, accelerated carbonation of recycled concrete as aggregates for new concretes can take place, to improve the properties of recycled concrete aggregates (RCA) and reduce the environmental impact of concrete.

This workshop is focused on the study of accelerated carbonation of recycled aggregates in laboratory and under realistic industrial conditions. Presentations of experimental studies and modelling are expected. Economic and environmental analyses are also necessary to implement a database of the manufacture of concretes based on carbonated recycled concrete aggregates. Impact of natural carbonation on existing structures will complete the topics of the workshop.

In conclusion, the workshop CO₂STO2019, which will take place in France, on 24-26 June 2019, will bring together experts in the field of carbonation of concrete and recycling of construction and demolition waste (CDW) from around the world.

Topics

- Natural CO₂ uptake in concrete structures
- Fast and Natural carbonation of RCA (experimental results and modelling, including improvement of RCA), Life Cycle Analysis (LCA).

Deadlines & submission

Abstracts submission: 31th October 2018

Abstract approval: 20th November 2018

Full papers submission: 31th January 2019

Papers approval: 28th February 2019

Final papers approval: 31th March 2019

Registration & fees

Paying categories	Early bird rate	Standard rate (from 2 nd March)	On site
AUGC, fib,RILEM Members	350 €	450 €	500€
Non members	400€	500€	550€
Students	150€	200€	200€
Accompanying person Gala dinner	85€	85€	100€

Registration fees include participation in the conference, proceedings, participation in coffee breaks, lunches and gala dinner, and compensation of CO₂ emissions due to travel.



International Workshop CO₂ Storage in Concrete (CO₂STO2019)

Keynote Lecturers

- Prof. Valérie Masson-Delmotte
IPCC – Université Paris Saclay
Cities and climate change science

- Prof. Chi Sun Poon
Hong Kong Polytechnic University
Enhancement of properties of recycled aggregate concrete by accelerated CO₂ curing

- Prof. Carmen Andrade
Polytechnic University of Catalonia
Substantial global carbon uptake by cement carbonation

- Prof. François De Larrard
LafargeHolcim
Concrete Recycling : Research and Practice

Organized by

IFSTTAR « The French institute of science and technology for transport, development and networks » and supported by Fastcarb project.

www.ifsttar.fr <http://fastcarb.fr>

Organizing committee

Dr. Assia Djerbi (IFSTTAR)
Dr. Othman Omikrine Metalssi (IFSTTAR)
Prof. Jean Michel Torrenti (IFSTTAR)
Prof. Teddy Fen-Chong (IFSTTAR)
Ms. Pauline Huart (IFSTTAR)
Ms. Marie Sereng (IFSTTAR)

Contacts

 (+33) 01 81 66 80 00
 co2sto2019@ifsttar.fr
 co2sto2019.ifsttar.fr

Scientific committee

Chair: Prof. Véronique Baroghel-Bouny
Members :

Prof. Karim	Aït-Mokhtar (LaSIE, France)
Prof. Carmen	Andrade (UPC, Spain)
Prof. Sudhirkumar	Barai (IITKGP, India)
Dr. Amor	Ben-fraj (CEREMA, France)
Dr. Stéphanie	Bonnet (GEM, France)
Dr. Marwen	Bouasker (LaMé, France)
Prof. Nicolas	Burlion (Polytech Lille, France)
Prof. Bogdan	Cazacliu (IFSTTAR, France)
Prof. Luc	Courard (ULIEGE, Belgium)
Prof. Martin	Cyr (INSA toulouse, France)
Prof. Patrick	Dangla (IFSTTAR, France)
Prof. Nele	De Belie (UGent, Belgium)
Prof. Frank	Dehn (KIT, Germany)
Dr. Assia	Djerbi (IFSTTAR, France)
Dr. Miren	Etxeberria (UPC, Spain)
Prof. Teddy	Fen-Chong (IFSTTAR, France)
Prof. Petr	Hájek (CVUT, Prague)
Dr. Bruno	Huet (LafargeHolcim, France)
Prof. Said	Kenai (U. Blida1, Algeria)
Prof. Abdelhafid	Khelidj (GeM, France)
Prof. Zoubeir	Lafhaj (Centrale Lille, France)
Prof. Kefei	Li (U. Tsinghua, China)
Prof. Ahmed	Loukili (GEM, France)
Dr. Jonathan	Mai-Nhu (CERIB, France)
Dr. Isabel	Martins (LNEC, Portugal)
Prof. Vanderley	Moacyr John (USP, Brazil)
Dr. Othman	Omikrine Metalssi (IFSTTAR, France)
Dr. Kevin	Paine (U. Bath, United Kingdom)
Prof. Vagelis G.	Papadakis (UPATRAS, Greece)
Prof. Chi Sun	Poon (POLYU, China)
Dr. Stephane	Poyet (CEA, France)
Dr. Marco	Quattrone (USP, Brazil)
Dr. Patrick	Rougeau (CERIB, France)
Dr. Emmanuel	Roziere (GeM, France)
Dr. Thierry	Sedran (IFSTTAR, France)
Dr. Marijana	Serdar (U. Zagreb, Croatia)
Prof. Mitsuhiro	Shigeishi (U. Kumamoto, Japan)
Dr. Mickaël	Thiery (MTES, France)
Prof. Jean-Michel	Torrenti (IFSTTAR, France)
Dr. Philippe	Turcry (LaSIE, France)

IFSTTAR, 14-20 Boulevard Newton
77420 Champs-sur-Marne, FRANCE

