SECOND BULLETIN



2022 CIGB ICOLD MARSEILLE

MARSEILLE
27 MAY-3 JUNE
2022

ICOLD
27TH CONGRESS
90TH ANNUAL MEETING

CIGB
27ÈME CONGRÈS
90ÈME RÉUNION ANNUELLE

CIGB ICOLD

Cfbr comité français des barrages et réservoirs

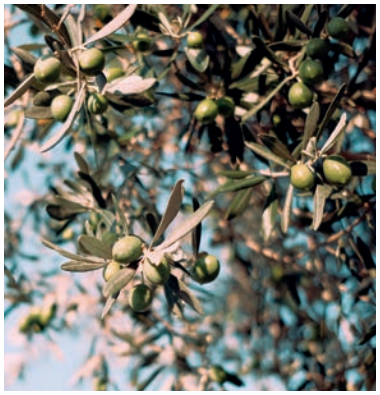
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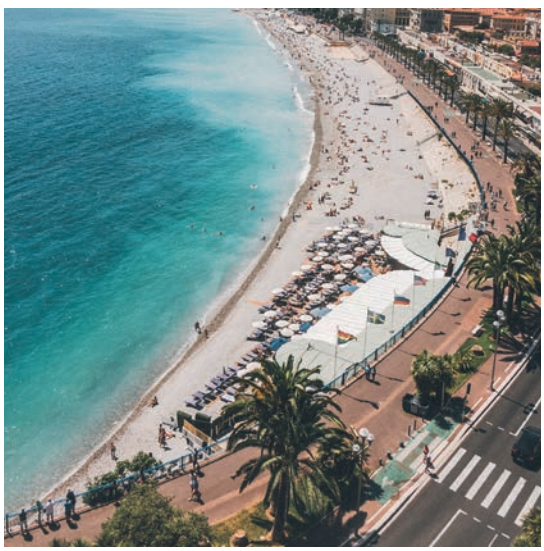
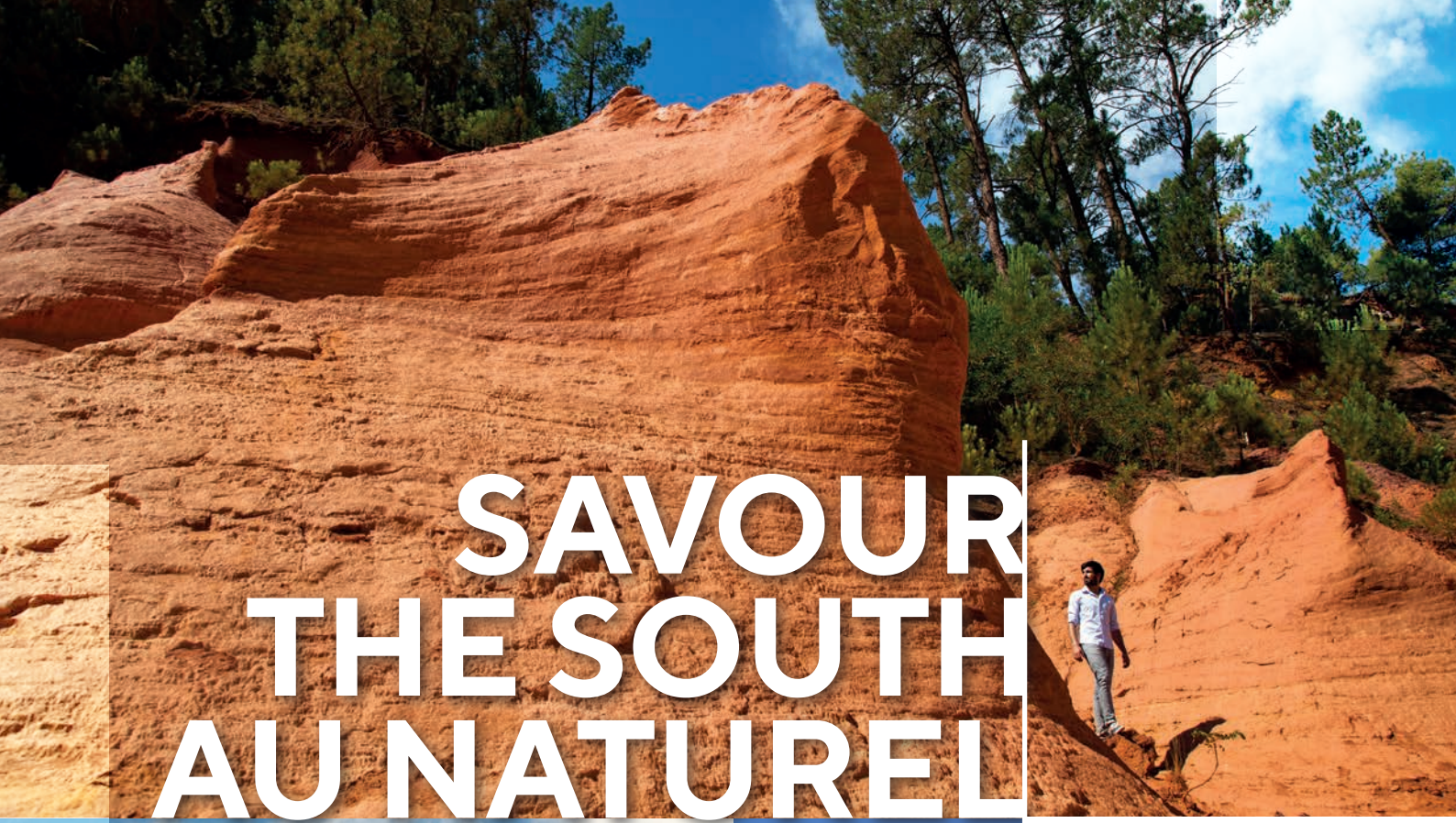


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ARTELIA

BRONZE

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EXHIBITORS

CAMPBELL SCIENTIFIC
GEOPHYCONSULT
HYDROPLUS
IC GROUP
INRAE
JAPANESE COMMISSION ON LARGE DAMS
RENESCO
SADZAFAR
SISGEO-HUGGENBERGER
SIXENSE
SOLEXPERTS
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UNDER THE HIGH PATRONAGE OF THE MINISTRY OF ECOLOGICAL TRANSITION AND THE REGION SUD - PROVENCE-ALPES-CÔTE D'AZUR

MINISTÈRE DE LA TRANSITION ÉCOLOGIQUE
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INVITATION FROM ICOLD PRESIDENT



Dear ICOLD Members, Colleagues, Ladies and Gentlemen,

On behalf of the International Commission of Large Dams/Commission Internationale des Grands Barrages (ICOLD/CIGB), it is an honor for me to invite our 104 National Committees to send delegates and their accompanying persons to the 27th Congress and 90th Annual Meeting of ICOLD. The meeting will be held from the 27th May to 3rd June 2022 in Marseille, France.

The Marseille Congress will be a very special gathering for our ICOLD family as the world emerges from the tragedies of the Global Pandemic. I can think of no place more special for ICOLD than to return to the country of our foundation – France. Our emergence from isolation will be celebrated in the historical city of Marseille - the second largest city in France. A beautiful city-gem along the Mediterranean Sea, Marseille welcomes ICOLD members and our families with open arms, grand vistas, and an exciting adventure awaiting our international travelers.

The French National Committee of ICOLD (Comité Français de Barrages et Réservoirs, CFBR) has worked hard to prepare a wonderful meeting, including many precautions for our personal safety. The technical aspects of our 27th Congress will be outstanding as we consider our latest four ICOLD Questions to our technical members for updates to the current state of the practice, including Concrete Dam Design Innovation and Performance; Incidents and Accidents Concerning Dams; Surveillance, Instrumentation, Monitoring and Data Acquisition; and Dams and Climate Change. These topics cover a wide range of interests to our members and our profession. I anxiously await the presentations and discussions of the authors to advance our professional knowledge as information to be shared by all nations.

Although the Marseille Congress has been postponed until May 2022, it remains very important for ICOLD to conduct annual technical and business meetings in November 2021. ICOLD Central Office, working with CFBR, have organized a full week of virtual ICOLD gatherings on November 15-19, 2021. The week will start on Monday (15-Nov) with a virtual meeting between the ICOLD Board and Technical Committee Chairs. On Tuesday (16-Nov), there will be an important virtual technical Symposium themed: Sharing Water: Multi-Purpose of Reservoirs and Innovations will cover modern topics challenging our modern dams and reservoirs, including Territorial and Water Multi-Purpose Issues; Governance and Funding; Innovative Solutions in Reservoir Uses; and Operating Multi-Purpose Facilities. Various active ICOLD Technical Committees will then hold workshops on Wednesday and Thursday (17-18-Nov). Finally, the ICOLD 89th Annual General Assembly Meeting will be held on Friday (19-November). Please watch the ICOLD website www.icold-cigb.org for announcements and registration for this important week in November to participate in these important ICOLD meetings and technical Symposium.

My friends, I am convinced that the Marseille Congress in 2022 will be our best and most memorable gathering in years. All of us are ready for a break-out from our confinement to experience the friendship and excitement of a reunion of our ICOLD family. We will gather safely in-person with excitement and expectations for the wonderful memories to be made in Marseille. We will celebrate many things, including the ICOLD Innovation Award for state of the practice insight in the progression of industry knowledge and recognize the hard work of our Technical Committees through publication of new bulletins. But most of all, we will again visit with our friends – in person – to renew and catch-up on our families and toast to new beginnings.

In closing, I am strongly confident of the resilience of ICOLD as an organization and as individual national committees after almost two years of hardship and challenges. Our ICOLD members have learned that we can continue our work and remain connected to continue our mission of safety for all dams and levees. I continued to be filled with hope that ICOLD has endured this challenge as we have endured other historical challenges over the last 93 years since our founding. I have been inspired by the hard work of our ICOLD Board, Central Office staff, Technical Committees, and Young Engineers to work together to meet our commitments to the industry and to each other. I am reminded of a favorite Confucius theme that "the gem cannot be polished without friction nor man without trial.". We have all been through a great trial and we emerge stronger and more polished for the future. Take care for your health and safety, and I look forward to seeing you – in person – in Marseille in May 2022.

Yours faithfully,

Michael F. ROGERS
President, International Commission on Large Dams (ICOLD)
Commission Internationale des Grands Barrages (CIGB)

INVITATION FROM CFBR PRESIDENT



Dear colleagues and friends of ICOLD,

The French Committee on Dams and Reservoirs (CFBR) and its five hundred members are honored and pleased to host in Marseille, in November 2021, the 27th Congress and 90th Annual Meeting of the International Commission on Large Dams (ICOLD), under the high patronage of the Minister of Ecological Transition and the President of the South Region.

Our Congress, initially scheduled for June 2021 will be held from May 27 to June 3, 2022. We hoped until the last moment to be able to hold the congress in the fall of 2021, but the evolution of the pandemic with its successive hopes and disappointments finally led the ICOLD and the CFBR to postpone the event to 2022. The reunion will be all the warmer as the wait will have been longer!

France and the ICOLD have a long history of friendship and shared passion for dams, and now also for levees, which have always been essential tools for development and for meeting the vital needs of humanity. The ICOLD was created in Paris in 1928 and France is proud to be one of the six founding members along with the United States, Italy, Romania, Great Britain and Switzerland. However, France has not hosted any event since the 1963 annual meeting in Paris. Therefore, we warmly thank the ICOLD and all its members for having chosen Marseille for this congress and annual meeting and for allowing us to reconnect with history.

Thanks to personalities such as André Coyne for the design of arch dams, Pierre Londe, one of the founders of rock mechanics and inventor of symmetrical hardfill dams, François Lempérière whose innovations in the field of spillways with fusegates and fuse blocks, and piano key weirs have become international references, French engineering has become one of the best in the world and has allowed our country to play a leading role in the development of dams and hydropower. A book has been prepared for the congress summarizing France's contributions to dam engineering. We will be happy to offer it to you.

As for each congress, the program, with its climax around the four questions debated by ICOLD experts from all over the world, will be dense and exciting.

The symposium, organized by the CFBR, will be devoted to the multi-purpose of reservoirs and innovations in their use. With the creation, as early as 1964, of Water Agencies for large river basins, France has a long and fruitful practice of management and conciliation of water uses, which we have largely exported. The symposium will be followed by a round table, with the participation of the World Water Council, allowing high-level actors from civil society to exchange with the participants on the theme of water and the new needs for dams in the 21st century. Please note that an introductory online session will be held in November 2021 as part of the 89th ICOLD Annual Meeting.

Climate change, dramatically illustrated by the disasters of the summer of 2021 with the exceptional floods in China and Europe, the megafires in California and in the Mediterranean basin, the unprecedented heat wave that hit the North of America and the Arctic, is already having a strong impact on water resources and reservoirs are an essential tool for managing this precious resource and regulating extreme drought and flood events. Beyond that, dams are part of the solutions to be deployed to adapt to climate change, both as a means of producing highly flexible renewable energy, and as storage tools for intermittent solar and photovoltaic energy through pumped storage stations.

Dams and their reservoirs are sometimes criticized for their environmental and biodiversity impacts. Certainly, the preservation of biodiversity or its restoration must be taken into account as a priority from the design phase, during construction and throughout operation, whether for water quality, the transit of migratory species or sediments. France is particularly attached to this approach.

Finally, I have no doubt that you will be charmed by Marseille, the oldest of our cities, founded by the Phocaeans on the shores of the Mediterranean in 600 BC, rich in original culture and open to the world, in the sumptuous setting of its bay. The social program and the program for accompanying persons are designed to help you discover and love Marseille, Provence and France. This congress will be an opportunity for the great family of ICOLD to meet again after the difficult months we have just gone through.

I warmly invite you to come to Marseille in May 2022. We are waiting for you!

Michel LINO
President of the French Committee on Dams and Reservoirs

INVITATION FROM THE CHAIRMAN OF MARSEILLE 2022 CONGRESS ORGANIZING COMMITTEE



Dear colleagues and friends from the world of dams and levees,

On behalf of the Congress Organizing Committee, I would like to express our enthusiasm and impatience to welcome you in Marseille from May 27 to June 3, 2022 for the 27th Congress and the 90th Annual Meeting of the International Commission on Large Dams.

From now on, with the scheduling of this event at the end of spring, you will be able to enjoy ideal conditions to discover Marseille, with its 26 centuries of existence since ancient Greece, as well as the region of Provence and the South-East of France. Located at the crossroads of Europe, Marseille has always been a place of exchange between civilizations. To its abundant cultural heritage, the city adds exceptional natural riches, such as the Parc national des Calanques that stretches right next to it.

The events will take place at the Parc des Expositions, located in the heart of the city and close to the Mediterranean Sea, with its many beaches. The conference and exhibition venue is easily accessible and will offer all the comfort and amenities that such an event warrants.

The program of the event, developed in conjunction with the ICOLD Board of Directors, is dense and attractive. In addition to the traditional highlights of the Congress, the General Assembly and the meetings and workshops of the 26 ICOLD technical committees, we are pleased to invite you to the Symposium organized by the French Committee (CFBR), whose title is: **Sharing water: multipurpose reservoirs and innovations**. This symposium will be extended by an International Round Table, in association with the World Water Council, on the theme: **Dams and reservoirs: the challenges of tomorrow**. Around the main world institutions concerned (ICOLD, ICID, WWC, IHA and World Bank) it will bring together international experts in the needs and uses of drinking water, irrigation and hydropower.

Like the training sessions proposed by the Canadian Committee on Dams in 2919 in Ottawa, we also propose to attend short courses on the recent recommendations produced by the French committee, with concrete cases of application in France and abroad. These sessions are intended for those who wish to enrich their knowledge of our practices and reflections.

As announced during our candidacy in Prague in 2017, a particular emphasis will be placed on activities dedicated to young engineers, around their Forum. A rich program is reserved for them. We expect them in number and encourage the national committees to encourage and promote their attendance.

The program also includes technical visits that will allow you to discover dams and hydraulic installations located in the Provence region.

For accompanying persons, we have worked to offer you a wide choice of visits and outings, for all tastes: museums, historical and architectural sites, glimpses of the Provencal way of life and many other discoveries.

Finally, we suggest that you complete your stay in France with study tours to visit a large number of structures and facilities and to discover the most beautiful regions of southeastern France. Two of these tours will be to Italy and Switzerland, with the kind contribution of our neighboring committees and friends, and another will allow you to discover the wonderful island of Corsica.

Please check our website - www.cigb-icold2022.fr - for all the details of this event.

See you soon in France and in Marseille!

Bernard REVERCHON
Vice-President of the ICOLD
Chairman of the Marseille 2022 Organizing Committee

ORGANIZING COMMITTEE



Bernard Reverchon
Chairman of the Organizing Committee, CFBR



Michel Lino
CFBR President, ISL



Laurent Peyras
Symposium Organizer, INRAE



Christine Noret
Symposium Organizer, Tractebel



Bruno Beullac
Junior Committee, INRAE



Agnès Bader
Communication, EDF



Paul Royet
Room Assignment, Social Events, Short Courses, CTPBOH



Patrick Le Delliou
CFBR Book and Website Manager, CTPBOH



Jean-Pierre PERSON
CNR



Jean-Michel Tinland
Liaison with CFBR Junior Group, CFBR

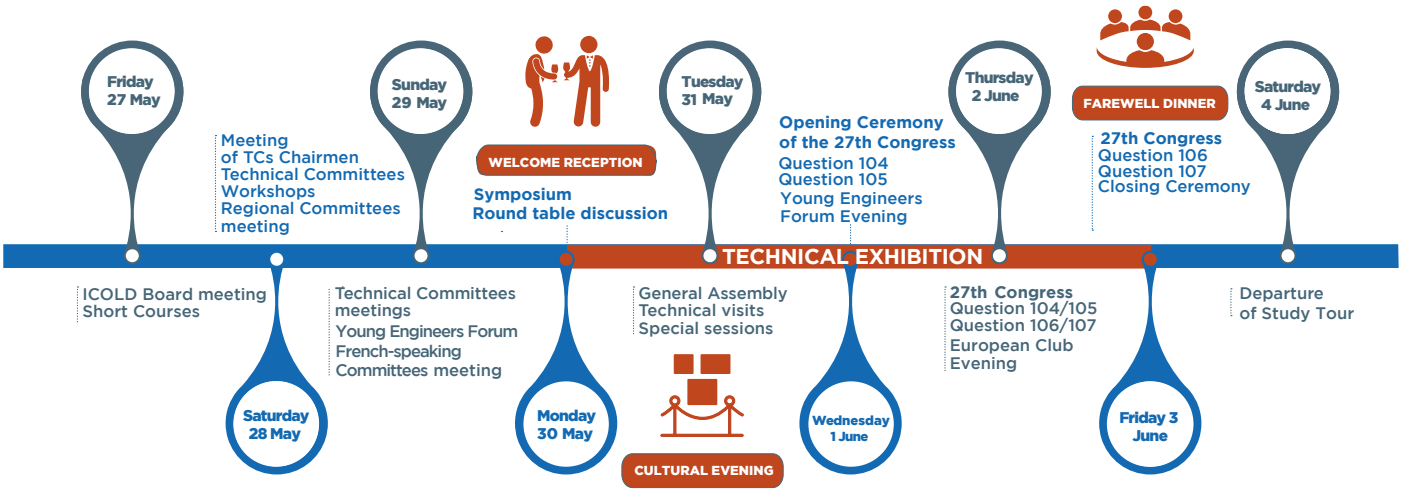


François Delorme
CFBR Book and Dam Monographs, independent expert



Laurent Bessadi
EDF

GENERAL AGENDA



ICOLD INFORMATION

The International Commission on Large Dams (ICOLD) was founded in 1928, the central office is located in Paris, to provide a forum for discussion and for the exchange of knowledge and experience in dam engineering for engineers and others concerned with the development of water resources. Its objectives are to encourage improvements in dam engineering in all its aspects, and in all phases of the planning, design, construction and operation of dams and associated works. With a present total of 104 member countries, ICOLD leads the profession in ensuring that dams are built and operated safely, efficiently, economically, and with a minimum environmental impact. For 40 years, ICOLD has been particularly concerned to enhance the profession's awareness of the social and environmental aspects of dams and reservoirs, and to broadening its perspective in such a way that these aspects receive the same attention and conscientious treatment as the technical aspects.

ICOLD board of directors



104 MEMBER COUNTRIES



ICOLD Technical Committees

To date, ICOLD includes 30 Technical Committees working on current technical issues related to water resource development and management. Each Technical Committee is given a mandate by the General Assembly and works for 3 to 4 years. Its work is published in the form of a «Technical Bulletin». 169 Technical Bulletins have been published and are therefore available for purchase on the ICOLD website. www.icold-cigb.org

A	Computational aspects of analysis and design of dams (2020-23)
B	Seismic aspects of dam design (2020-23)
C	Hydraulics for dams (2019-22)
D	Concrete dams (2018-21)
E	Embankment dams (2020-23)
F	Engineering activities with the planning process for water resources projects (2014-22)
G	Environment (2020-22)
H	Dam safety (2018-21)
I	Public safety around dams (2016-22)
J	Sedimentation of reservoirs (2020-21)
K	Integrated operation of hydropower stations and reservoirs (2015-23)
L	Tailings dams & waste lagoons (2020-23)
LE	Levees (2018-24)
M	Operation, maintenance and rehabilitation of dams (2020-23)
N	Public awareness and education (2018-21)
O	World register of dams and documentation (2020-21)
P	Cemented material dams (2020-25)
Q	Dam surveillance (2017-22)
RE	Resettlement due to reservoirs (2018-21)
RTS	Residual tropical soils (2020-23)
S	Flood evaluation and dam safety (2020-24)
T	Prospective and new challenges for dams and reservoirs in the 21st century (2020-23) (ad hoc committee)
U	Dams and river basin management (2018-21)
V	Hydromechanical equipment (2016-22)
X	Financial and advisory (ad hoc committee)
Y	Climate change (2017-21)
Z	Capacity building and dams (2017-21)
ZX1	Regional club
ZX2	Young engineers
ZX3	Icold board

ICOLD Technical Committees Meetings and Workshops

On **Saturday, May 28**, the **ICOLD Technical Committees Workshops** will be held. They aim to present and discuss the content of new work for technical committees in their start-up phase or to present the results of technical committees at the end of their mission (typically the publication of a Technical Bulletin). The list of workshops will be established in coordination with the chairs of the technical committees. We have two time slots for seven parallel sessions. Detailed information on www.cigb-icold2022.fr

On Sunday, May 29, the **ICOLD Technical Committees Meetings** will be held throughout the day (8:30 a.m. to 5:30 p.m.). We have twenty-six rooms available for these meetings, which will be allocated in consultation with the chairpersons, depending on the expected attendance.

Special Sessions

On Tuesday, May 31, starting at the end of the morning, the French committee, in connection with other committees, is organizing special workshops. Currently, the program includes 2 workshops, one on "Waves induced by landslides in reservoirs", the other on "PKWeir spillways". This program is likely to grow. Detailed information on: www.cigb-icold2022.fr

PROGRAM AT A GLANCE

FRIDAY 27/05	8:30am-5:30pm	SHORT COURSES • Risk analysis for dams: French practice through Safety Review Risk Assesment • Risk analysis for levee systems • Analysis methods of dam survey data • Justification of dams: French practice through the semi-probabilistic approach • Stochastic methods for flood estimation
SATURDAY 28/05	8:30-10:00am	ICOLD BOARD AND TECHNICAL COMMITTEES CHAIRMEN MEETING
	10-10:30am	COFFEE BREAK
	10:30-12:30am 2:00pm-4:00pm	TECHNICAL COMMITTEES WORKSHOPS 2 Time slots – maximum of 7 parallel workshops
	12:30am-2pm	LUNCH BREAK
	2pm-4pm	CONGRESS QUESTION OFFICERS MEETING
	4-4:30pm	COFFEE BREAK
	4:30-6:30pm	4 REGIONAL COMMITTEES MEETING
SUNDAY 29/05	8:30-10am 10:30-12:30am 2pm-3:30pm 4pm-5:30pm	TECHNICAL COMMITTEES MEETINGS 4 Time slots – 26 parallel meetings
	5:45-7:15pm	YOUNG ENGINEERS FORUM
	5:45-7:15pm	FRENCH-SPEAKING COMMITTEES MEETING
MONDAY 30/05	9-10am	SYMPOSIUM OPENING CEREMONY « SHARING WATER : MULTIPURPOSE RESERVOIRS AND INNOVATIONS »
	10-10:30am	EXHIBITION OPENING
	10-10:30am	COFFEE BREAK
	10:30-12:30am 2-4pm	SYMPOSIUM 2 Time slots – 3 parallel sessions THEME 1 : Territorial and water multipurpose issues THEME 2 : Governance and funding THEME 3 : Innovative solutions in reservoirs uses THEME 4 : Operating multipurpose facilities
	4-4:30pm	COFFEE BREAK
	4:30-6:30pm	ROUND TABLE DISCUSSION - DAMS AND RESERVOIRS: SOLUTIONS FOR TOMORROW
	6:30pm	PRESS CONFERENCE
	8:30-11:00pm	WELCOME RECEPTION
TUESDAY 31/05	Day	YOUNG ENGINEERS PROGRAMME : VISIT OF MALPASSET DAM RUINS
	Day	TECHNICAL TOURS - Bimont dam (SCP) and geomechanics laboratory INRAE, near Aix-en-Provence - Dardennes dam (City of Toulon) – upgrading works on the dam - Levees in Camargue and Arles (SYMADREM) : levee system on Rhône river - Gréoux and Quinson dams on Verdon river (EDF) - Vallon Dol dam (SCP) and main water supply network for city of Marseille (SEM) - Vallabrègues hydropower layout (CNR) - Ruins of Malpasset dam, near Fréjus (CFBR)
	9:00am-4:00pm	SPECIAL SESSIONS - Several workshops (programme to be confirmed)
	9:00-10:30am	90TH ICOLD ANNUAL MEETING & GENERAL ASSEMBLY
	10:30-11:00am	COFFEE BREAK
	11:00-12:30am	90TH ICOLD ANNUAL MEETING & GENERAL ASSEMBLY (CONTINUED)
	12:30am-2:00pm	LUNCH BREAK
	2:00-6:00pm	90TH ICOLD ANNUAL MEETING & GENERAL ASSEMBLY (CONTINUED)
	8:00-10:00pm	CULTURAL EVENING : DANCE SHOW « BAOBAB »

WEDNESDAY **01/06**	**8:30-10:00am**	27TH CONGRESS OPENING CEREMONY – INNOVATION AWARD
	10:00-10:30am	COFFEE BREAK
	10:30-11:30am	GENERAL REPORT : **Question 104** Concrete dams design innovations and performance
	11:30-12:30am	GENERAL REPORT : **Question 105** Incidents and accidents concerning dams
	12:30am-2:00pm	LUNCH BREAK
	12:45am-1:45pm	MENTORING PROGRAMME
	2:00-4:00pm	**Question 104** Concrete dams design innovations and performance **Question 105** Incidents and accidents concerning dams
	4:00-4:30pm	COFFEE BREAK
	4:30-6:30pm	**Question 104** Concrete dams design innovations and performance **Question 105** Incidents and accidents concerning dams
	7:30-10:30pm	YOUNG ENGINEERS EVENING
THURSDAY **02/06**	**8:00-10:00am**	**Question 104** Concrete dams design innovations and performance **Question 105** Incidents and accidents concerning dams
	10:00-10:30am	COFFEE BREAK
	10:30-12:30am	**Question 104** Concrete dams design innovations and performance **Question 105** Incidents and accidents concerning dams
	12:30am-2:00pm	LUNCH BREAK
	12:45am-1:45pm	MENTORING PROGRAMME
	2:00-3:00pm	GENERAL REPORT : **Question 106** Surveillance, instrumentation, monitoring, data acquisition & processing
	3:00-4:00pm	GENERAL REPORT : **Question 107** Dams and climate change
	4:00-4:30pm	COFFEE BREAK
	4:30-6:30pm	**Question 106** Surveillance, instrumentation, monitoring, data acquisition & processing **Question 107** Dams and climate change
	7:30-10:00pm	EUROPEAN CLUB EVENING
FRIDAY **03/06**	**8:00-10:00am**	**Question 106** Surveillance, instrumentation, monitoring, data acquisition & processing **Question 107** Dams and climate change
	10:00-10:30am	COFFEE BREAK
	10:30-12:30am	**Question 106** Surveillance, instrumentation, monitoring, data acquisition & processing **Question 107** Dams and climate change
	12:30am-2:00pm	LUNCH BREAK
	12:45am-1:45pm	MENTORING PROGRAMME
	2:00-4:00pm	**Question 106** Surveillance, instrumentation, monitoring, data acquisition & processing **Question 107** Dams and climate change
	4:00-4:30pm	COFFEE BREAK
	4:30-6:30pm	CLOSING CEREMONY – PRESIDENT AND VICE-PRESIDENTS AWARDS
	7:30-10:30pm	FAREWELL DINNER – HONORARY MEMBER AWARDS
SATURDAY **04/06**	**8:00am**	DEPARTURE OF STUDY TOURS

CONGRESS QUESTIONS

Q 104: Concrete Dams Design Innovation and Performance

a) Innovations for arch dam analysis, design and construction; including RCC arch and arch-gravity dams.
b) Innovations for design, construction materials and placement methods, flood management during construction and performance of concrete dams, including RCC and cemented material dams.
c) Innovations for raising existing concrete dams.
d) Innovations for extremely high concrete dams.
e) Operational performance of concrete dams during the life cycle, including under extreme conditions.

President:



Jose Marques Filho (Brasil)

Vice-President:



Jerzy Salomon (USA)

General Reporter:



Rafael Ibanez de Aldecoa (Spain)

Secretary:



Claire Jouy (France - Tractebel)

Q 105: Incidents and Accidents concerning dams

a) Recent lessons from incidents and accidents concerning dams during the life cycle, including during construction.
b) Evaluation of the flows and flood, estimation and quantification of the consequences, including social, economic and environmental aspects, in case of failure or incidents.
c) Emergency planning: regulation, organisation, information of the population and examples of implementation.
d) Governance of the safety: definition of the responsibilities, periodic reviews, implementation tests, organisation of lessons learned implementation.

President:



Laurent Mouvet (Switzerland)

General Reporters:



Tony Bennett (Canada)



Michel Poupart (France)

Secretary:



Anthony Mouyeaux (France - INRAE)

Q 106: Surveillance, Instrumentation, Monitoring and Data Acquisition and Processing

a) Long term performance of existing surveillance systems including reliability and accuracy ; importance of visual inspections.
b) New technologies in dam and foundation instrumentation and monitoring.
c) Data acquisition and processing to evaluate the behavior of dams, predict and identify incidents.
d) Understanding and handling of large quantity of data, including artificial intelligence approach.

President:	Vice-President:	General Reporter:	Secretary:
			
Pierre Choquet (Canada)	Ali Noorzad (Iran)	Louis Hattingh (South Africa)	Sophie Fretti (France - EDF)

Q 107: Dams and Climate Change

a) Impacts of climatic change on existing dams and reservoirs and remedies; case studies and costs.
b) Impacts of climatic change on needs and designs of dams, reservoirs and levees (water storage, floods mitigation, oceans raising).
c) Favourable impacts of dams on the climatic change, including greenhouse gases reduction by optimisation of hydroelectric generation. Needs, potential and cost of energy pumped storage.
d) Unfavourable impacts of dams and reservoirs on climatic change: evaluation of greenhouse gases emissions by reservoirs and dams construction.

President:	Vice-President:	General Reporter:	Secretary:
			
Harald Kling (Austria)	Guoxin Zhan (China)	Denis Aelbrecht (France)	Vincent Chanudet (France - EDF)

SYMPOSIUM

The symposium, which accompanies the congress, has been prepared by the French Committee on Dams and Reservoirs. Its theme is: **Sharing Water: multipurpose of reservoirs and innovations**. Both technical and societal, this theme fundamentally touches on the role of dams in our societies, in their traditional functions, such as water supply to populations, irrigation and electricity generation, but also protection against floods, support of low water levels and more recreational uses. We will exchange our experiences on multi-purpose reservoirs and their adaptation to today's new challenges such as the environment and climate change.
All these topics will be discussed and detailed during this symposium. For more information, you can visit the congress website: https://cigb-icold2022.fr/fr/symposium/themes

Sharing water: multi-purpose of reservoirs and innovations

THEME 1: TERRITORIAL AND WATER MULTI-PURPOSE ISSUES

Chair: Giovanni RUGGERI (Italy) and Joël GAILHARD (France)

- Evaluation of current and future resources and needs
- Evaluation of socio-environmental and biodiversity benefits and impacts, positive and negative externalities
- Analysis of resilience and adaptability of projects to respond to climate change and changing uses. Decision making methods for choosing a solution, cost-benefits analysis at a regional scale
- Lessons learnt from recent water resource crises (drought, floods...)

THEME 2: GOVERNANCE AND FUNDING

Chair: Julia LAASONEN (Finland) and Catherine CASTEIGTS (France)

- Institutional aspects, stakeholder commitments and inter-relationships
- Financial aspects, project funding
- Participatory approaches, stakeholders involvement
- Special cases of cross-border assets

THEME 3: INNOVATIVE SOLUTIONS IN RESERVOIR USES

Chair: Aries FIRMAN (Indonesia) and Jean-Pierre PERSON (France)

- Multi-purpose hydraulic projects: energy storage, hydropower, hybrid solutions with other renewable intermittent energies, irrigation, navigable waterways, water supply, floods mitigation, protection against marine submersions...
- Combining structural and non-structural solutions
- Integrating a project into a territory with multiple reservoirs
- Complementarities and synergies with intermittent renewable energy, related issues

THEME 4: OPERATING MULTI-PURPOSE FACILITIES

Chair: Henriette ANDERSON (South Africa) and Alain CARRERE (France)

- Hydrology for resource management at short and medium term
- Tools for operation related decision making including risk management
- Short, medium and long-term operation simulation and modelling
- Water sharing criteria, trade-off between uses, operation compatibility of additional uses
- Performance evaluation of asset management methods

Chairs

- **Christine NORET** - Tractebel
- **Laurent PEYRAS** - Institut National de Recherche pour l'Agriculture, l'Alimentation et l'Environnement - INRAE

Advisory Board

- **Loïc FAUCHON** - World Water Council, France
- **François LEMPÉRIÈRE** – Independent expert, France
- **Anne-Marie LEVRAUT** - Ministery of Ecological Transition, France
- **Bruno GRAWITZ** – French Association for Water, Irrigation and Drainage - AFEID, France
- **Laurent ROY** – Rhône Méditerranée Corse Water Agency
- **Satoru UEDA** - World Bank

International Scientific Committee

- **Henriette ANDERSON** - South Africa
- **Harry BLOHM** - USA
- **Alain CARRÈRE** - France
- **Catherine CASTEIGTS** - France
- **Enrique CIFRES** - Spain
- **François DELORME** - France
- **Luc DEROO** - France
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- **Guido MAZZA** - Italy
- **Ali NOORZAD** – Iran
- **Adama NOMBRE** - Burkina Faso
- **Jean-Pierre PERSON** - France
- **Michel POUPART** - France
- **Guirec PRÉVOT** - France
- **Alejandro PUJOL** - Argentina
- **Giovanni RUGGERI** - Italy
- **Craig SCOTT** – United Kingdom
- **Jean-Michel TINLAND** - France
- **Julien VERDONCK** - France

Organizing Committee

- **Olivier BORY** - CFBR
- **Aurore DAVY** – MCO Congrès
- **François DELORME** - Independent expert
- **Michel LINO** – CFBR chairman
- **Guirec PREVOT** - Ministery of Ecological Transition, France
- **Paul ROYE**T - Independent expert
- **Bernard REVERCHON** – Chairman of the organizing committee of the 27th ICOLD Marseille 2022 congress
- **Jean-Pierre PERSON** - CNR

Round Table Discussion

As an extension of the Symposium, the congress organizing committee is pleased to invite you to an international Round Table Discussion whose theme, related to that of the symposium, is: **Dams and Reservoirs: the Challenges of Tomorrow**. Organized in partnership with the World Water Council, this Round Table Discussion will bring together the major institutional actors concerned: the International Hydropower Association (IHA), the International Commission on Irrigation and Drainage (ICID), the World Bank and of course ICOLD. Non-governmental organizations and scientists will also be invited. The debate and presentations will focus on the place of dams and reservoirs as well as on the expectations they raise and on the solutions they can offer to face the challenges of today and tomorrow and to promote their acceptability by the greatest number.

SHORT COURSES

Short courses will be given on the side-lines of the ICOLD Congress in Marseille, inspired by those proposed by the Canadian Committee just before the Ottawa meeting in 2019. The five course themes are based on the practices of the profession, described, for the most part, in publications of French COLD and the French community.

COURSE FORMAT AND ORGANISATIONAL ASPECTS

- The date: Friday May 27, 2022.
- The place: Palais des Arts, building on the left as you enter Parc Chanot.
- Duration: one day (6 hours + breaks), starting at 9:00am and ending at 5:30pm.
- The number of trainees per course is limited to 30 to 40 persons to promote interaction.
- The educational content is adapted to an international audience (oral English language, bilingual powerpoint presentations). We develop the basics of methods and use examples, possibly through group exercises around a PC.
- Powerpoint presentations are provided in hard copy in the form of a binder, to facilitate note taking by trainees. A list of references is also provided.
- Training certificates are given to trainees at the end of the session.

PROGRAM OF EACH COURSE

More details on: www.cigb-icold2022.fr/en/programme/sessions-de-formation/

Course n°1: Risk analysis for dams: French practice through Safety Review Risk Assessment

Coordination: Laurent Peyras (INRAE) et Guirec Prévot (PoNSOH)
Speakers: Eric Vuillermet (BRL-i), Frédéric Laugier (EDF), Jean-Charles Palacios (SAFEGE).

French regulations in 2007 made it mandatory to carry out risk analyses for large dams (classes A and B – around 650 dams) through the dam Safety Review Risk Assessment (SaRRA). At the heart of the risk prevention system, the SaRRA is an essential working basis for the development of dam risk management strategies. Carried out under the responsibility of the owner of the structure, it is aimed at identifying risks, quantifying their occurrence and consequences and demonstrating how the risks of major accidents associated with the dam and related structures are managed.

This course aims to present the French approach to dam risk analysis. It is illustrated throughout the lectures by several examples from dam SaRRA and includes the development of different risk analysis methodologies.
Price: € 300 VAT INC, including a bookbinder containing the course materials

Course n°2: Risk analysis for levee systems

Coordination: Rémy Tourment, Bruno Beullac (INRAE)
Speakers: Ben Gouldby/Jonathan Simm (HR Wallingford, UK), Thibaut Mallet (SYMADREM, F), Sébastien Patouillard (DREAL Centre, F) et Sylvain Palix (ANTEA, F)

French regulation requires that structures protecting populations against floods or sea storms be considered not individually, but within levee systems. Risk analysis is mandatory for these structures. As for dams, it is framed by regulations on Hazard Studies enacted in 2007 and adapted in 2015.

Performed under the levee system manager's responsibility, SaRRA aims to identify the risks involved in relation of the system, quantifying their occurrence and their consequences and to demonstrate the relevance of their management.

This course presents the international approach to risk analysis of levee systems described in chapter 5 of «International Levee Handbook» and its French version developed in a guide published by INRAE in 2019 (guide in French, available as an option).
Price: € 300 VAT INC, including a bookbinder containing the course materials

Course n°3: Analysis methods of dam survey data

Coordination: Alexandre Simon (EDF), Claudio Carvajal (INRAE)
Speakers: Mathilde de Granrut (Artelia), Cyril Guidoux (Geophyconsult)

This course offers training on analytical methods that make it possible to exploit all the wealth of information contained in the survey measurements, with the objective of achieve the most precise diagnosis of the dam's civil engineering and of its evolution.

The course is aimed at dam managers and operators responsible for risk assessment and management, as well as engineering firms.

This course provides the theoretical and practical bases for analysing survey measurements with the help of tutorials that enable participants to apply learnings on real measurements.

A Windows 10 laptop PC, with course materials, software and data preinstalled will be made available for three participants

Price: € 370 VAT INCL, including a bookbinder containing the course materials and computer support

Course n°4: Justification of dams: French practice through the semi-probabilistic approach

Coordination: Guillaume Veylon (INRAE), Thomas Carlioz (DGPR)
Speakers: Matthieu Ferrière (CNR), Moez Jellouli (ISL), Frédéric Andrian (Artélia), Emmanuel Robe (EDF), Justine Faure (ISL), Eric Vuillermet (BRLi)

Faced with the observation of various practices in the justification of the structural safety of dams Fench COLD undertook to produce a common framework applicable to French hydraulic works. It results in the publication of a body of recommendations that apply to gravity dams (2012), embankment dams and levees (2015) and arch dams (2018).

Inspired by the semi-probabilistic approach of the Eurocodes, these recommendations successively examine the design situations and the actions on the structure, the determination of the characteristic values of the resistance parameters, the structural failure mechanisms and the associated limit states, the sets of partial coefficients and the safety factors to justify stability.

A Windows 10 laptop PC, with course materials, software and data preinstalled will be made available for three participants.

Price: € 370 VAT INCL, including a bookbinder containing the course materials and computer support

Course n°5: Stochastic methods for flood estimation

Coordination: Emmanuel Paquet (EDF), Patrick Arnaud (INRAE)
Intervenants: David Penot (EDF), Stéphanie Diss (ARTELIA), Yoann Aubert (BRLi), Didier Organde (HYDRIS)

The French methods for estimating the design floods of structures fall within the scope of probabilistic methods. This is a particularity on the international stage, which tends to be dominated by so-called «deterministic» methods of the Maximum Possible Rainfall-Maximum Probable Flood type.

Complementing «conventional» methods drawing on observed rainfall and discharge statistics (GRADEX & al), the 2000's saw the emergence of some more sophisticated methods based on stochastic rainfall generation and rainfall-runoff simulation (SCHADEX and SHYPRE-SHYREG).

The short course will be focused on those two stochastic methods. The objective is to understand the basic principles of those methods and to realize a simple application, with real data.

The session is open to a maximum of 30 trainees. Windows 10 laptop PC, with course materials, software and data preinstalled, will be made available for two participants.

Price: € 400 VAT INCL, including a bookbinder containing the course materials and computer support

TECHNICAL VISITS

During the annual meeting and congress week, technical visits are planned on Tuesday May 31, lasting all or part of the day. In order to ensure the best possible management of the logistics of these visits (reservation of bus, reception areas, meals, drinks), a participation of €50 is requested. The list of these technical visits open to the delegates and to the accompanying persons is as follows:



1. Visit of Bimont dam (operator SCP) and INRAE geomechanics laboratory near Aix-en-Provence.

A major rehabilitation program of the Bimont arch dam (H = 85m) has recently been completed. The INRAE laboratory is a unique consortium of test benches dedicated to ground erosion and to geosynthetics.

© SCP

2. Visit of Dardennes dam (operator City of Toulon).

A major rehabilitation program has been undertaken on the Dardennes gravity dam (H=31m): overall stability, spillway, etc.

© NGE





3. Visit of Camargue Rhône River levees (operator SYMADREM) near Arles.

The Camargue levees form one of France's largest levee systems. A global security program is in progress since several years.

©SYMADREM





4. Visit of Gréoux and Quinson dams (operator EDF), on the Verdon river.

The Gréoux earthfill dam (H=54m) and Quinson arch dam (H=45m) are key elements of the Durance/Verdon hydropower generation system.

© Gérard ALLOUIN





5. Visit of Vallon Dol dam (operator SCP) and Marseille main water supply plants (operator SEM).

The Vallon Dol dam is a rockfill dam (H=47m) entirely watertight (dam and reservoir) with asphalt concrete lining.

© François MOURA

6. Visit of Vallabrègres scheme (operator CNR), located north of Avignon.

This major run-of-river scheme on the Rhône River includes a main dam, several large dikes and an hydropower plant (6x35MW).

© CNR





7. Malpasset dam ruins near Fréjus.

This arch dam (H=66m) failed in December 1959 at the end of the filling period, causing 423 casualties. The technical visit will make it possible to understand the mechanism and the causes of this disaster.

© Paul Royet

10th YOUNG ENGINEERS FORUM

ARE YOU CONCERNED BY THE FORUM?

You are under 40 years old and an active member of your national committee?
You are involved in the profession and you are motivated to learn and improve your knowledge?
You wish to share your experiences with colleagues from different backgrounds and cultures?
You want to discover ICOLD as it is in the diversity of its members' backgrounds, the richness of their skills, and have a broad overview of the profession?

Then this forum is for YOU.

A LITTLE HISTORY

It was in 2009, during the Brasilia Congress, that the project of creating a group representing young engineers was proposed to the ICOLD Board of Directors. Seduced by this proposal, the Board agreed in September 2010 to the organization of a constitutive committee during the annual meeting in Lucerne (Switzerland) in 2011.
It is there that the Young Engineers Forum is officially born in the presence of about twenty young people from eleven countries representing the five continents (Albania, Australia, Austria, Czech Republic, Mozambique, Slovenia, Sri Lanka, South Korea, Sweden, Switzerland, United States). Marco Conrad from Switzerland was elected as the first president.

ITS OWN GOVERNANCE AND A CALL FOR CANDIDATES FOR MARSEILLE

The YEF Board of Directors is composed of seven young engineers: a president and six members with multipurpose missions. It animates the Forum and organizes its events. It is the natural link with the ICOLD Board of Directors to whom it presents the aspirations of young engineers and with whom it seeks the best means of integrating them into the work and reflections of the various ICOLD committees.
The members of the YEF Board of Directors are elected for three years, and each year two to three positions are to be filled. At the Marseille Congress, two positions will be open for the period 2021-2024. To reflect the diversity of the ICOLD, each region should be represented.
A call for applications is therefore launched to young engineers from the Americas, Europe, Africa, and Asia-Pacific committees.
Members interested in getting involved in the activities of the Forum are invited to send their candidacy, at least 2 weeks before the official meeting of the Forum and the date of the vote, to the following address: board.yef@gmail.com
Each candidate will have one minute to introduce himself before the vote.
Please note that each candidate must be supported by his/her national committee, which can only present one candidate. All young engineers attending the Forum meeting may vote.

BOARD OF DIRECTORS OF THE YOUNG ENGINEERS FORUM

President



Elias BAPTISTA
Mozambique
2019-2022

Members



Florent BACCHUS
France
2019-2023



Leila OUAHIT
Canada
2017-2021



Mateja KLUN
Slovenia
2019-2023



Tim IVANOV
Russia
2018-2022



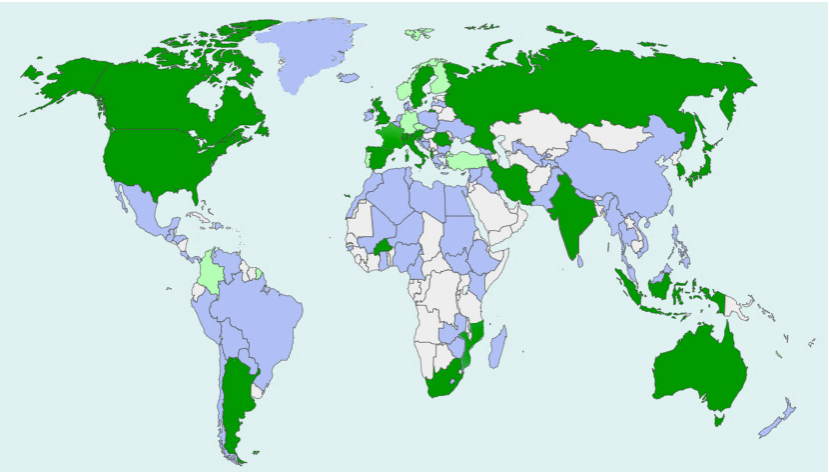
Giulia BUFFI
Italy
2018-2022



Amanda SUTTER
USA
2016-2021

10th YOUNG ENGINEERS FORUM

Today 23 national committees have created their own group of young engineers (see map below).



PREPARING THE NEXT GENERATION OF ENGINEERS AND ENSURING THE LONG-TERM FUTURE OF ICOLD

Encouraging young engineers to join ICOLD and to get involved in its work and offering them an opportunity for knowledge transfer have been the objectives since the creation of the forum. They are still relevant for young engineers who are actively involved in their national committees and who can attend, as observers, the meetings of the technical committees and their workshops.

This forum allows young engineers to connect with each other, to share their experiences and difficulties and to think together about the strategies to be put in place to promote the engineering and dams professions and to arouse vocations among young students.

The meetings, organized during the annual meetings and congresses, are unique events to discover each other and to constitute a network that will build ICOLD of the next decades.



Nearly one hundred young engineers participated in the 9th Forum organized during the annual meeting in Ottawa, Canada, in 2019. This is a testament to the vitality of a network that is eager to expand and become more and more involved in the work of ICOLD.

HOW TO BECOME A MEMBER OF THE YOUNG ENGINEERS' FORUM?

If you are under 40 years old and you are a member of a national committee, then you will automatically be able to join the Young Engineers Forum, and participate in the events it organizes, either during the congresses or the annual meetings of the ICOLD, or during the virtual meetings that take place several times a year. No admission fee will be charged.

A PRESENCE ON SOCIAL NETWORKS TO KEEP YOU INFORMED

You can follow the activities and news of the Young Engineers Forum on its Linkedin page. To access it, just click on the following link:
in https://www.linkedin.com/groups/4679910/

DO YOU STILL HAVE QUESTIONS?

You can ask them at the following address:
board.yef@gmail.com

10th YOUNG ENGINEERS FORUM

MARSEILLE 2022: A VERY PROFESSIONAL AND FESTIVE FORUM

To mark the 10th anniversary of the Young Engineers Forum, the French Committee's Youth Group is offering a number of events.

ON THE PROGRAM:

Sunday May 29th
5:45pm - 7:15pm MEETING OF THE YOUNG ENGINEERS FORUM

Tuesday May 31st
Day TECHNICAL VISIT TO THE MALPASSET DAM RUINS (pre-registration required)

Wednesday June 1st
7:00pm FESTIVE EVENING, WITH VARIOUS SURPRISES (pre-registration required)

June 01 - 02 - 03
12:30 - 13:45pm MENTORING PROGRAM

In order to encourage intergenerational exchanges, the mentoring action will be renewed for 3 days. It should allow experienced members to share their solid experience of their profession with young engineers, and young engineers to exchange on their perception of the professions, but also of dams and their place in a context of climate change.
If you are an experienced member and if you are interested, you can apply at the following address: icoldcigb2022@gmail.com

A YOUNG PEOPLE'S STAND AT THE ICOLD BOOTH

To encourage contacts between young and not so young people, surprise activities will be organized at the ICOLD booth and renewed regularly to make it attractive and become a lively and open point of exchange during the whole event.

EXHIBITION: DAMS AND MOOVIES

An exhibition will be devoted to the dams that have been used as a setting for the shooting of blockbuster moovies.
Posters from these moovies and photos of the dams will be on display and accessible to all participants during the event.

YOUNG ENGINEER AWARD

This prize, awarded by the French committee, will distinguish one or more young engineers among those who have proposed communications of particular interest to the Symposium.
It will be accompanied by a free registration for the next ICOLD annual meeting

A PERCEPTION SURVEY AMONG YOUNG PEOPLE

In order to better understand the image that young professionals have of the congress and of the events proposed in Marseille, of their national committee or of ICOLD, a perception survey will be carried out among this specific public via the event application with the objective of making improvements and improving future congresses, if necessary.



"Today, I had the wonderful opportunity to share my story with more than 300 young engineers in #ICOLD at the #ICOLD2020 Symposium on Sustainable Development of Dams & River Basins in New Delhi, India. I am thankful for this opportunity and I encourage our younger engineers to work together to prepare the future for our profession."
Michael Rogers, 27 February 2021, LinkedIn

CONGRESS STUDY TOURS

Study tours are provided after the congress. They will take place over a period of from 3 to 5 days. Five tours are organized, with programs combining technical visits of dams and cultural and tourist activities. In case of a too low number of registrants as of March 31st, we reserve the right to cancel a trip; registered people can then make another trip.



- Study Tour n°1 (4 days) Rhône Valley: Marseille, Arles, Avignon, Bollène, Vallon-Pont-d'Arc, Montélimar, Lyon, Génissiat, Geneva (Switzerland).
- Study Tour n°2 (5 days) Côte d'Azur Italy: Marseille, Fréjus, Nice, Italy: Savone, Entracque, Torino, Beauregard, Torino, Milan.
- Study Tour n°3 (5 days) Northern Alps: Marseille, Aix-en-Provence, Briançon, Grenoble, Beaufort, Megève, Switzerland: Orsières, Montreux, Gruyères, Geneva.
- Study Tour n°4 (4 days) Provence Southern Alps: Marseille, Quinson, Moustiers-Sainte-Marie, Castillon, Digne, Serre-Ponçon, Sisteron, Gréoux-les-Bains, Gordes, Marseille.
- Study Tour n°5 (3 days) Island of Corsica, its dams, its landscapes : Marseille-Bastia by boat - Calacuccia, Porto-Vecchio, Bonifacio, Ajaccio. Return to Ajaccio airport (planes to Marseille and Paris).

CULTURAL AND SOCIAL EVENTS

Welcome Reception – Monday, May 30
Duration: Around 2.5 hours
Parc Chanot: 7.30pm

The organizing committee of the 2022 Marseille Congress invites all delegates to the welcome reception at the Parc Chanot.



Cultural Evening – Tuesday May 31
Duration: around 1.5 hours/Le Silo, Marseille
The organizing committee of the 2022 Marseille Congress would like to introduce you to a creation from the Groupe Grenade – Josette Baïz. For a while now, children and teenagers have spoken in the media to alert adults and hold them accountable to the ecological danger facing humanity. They are astounding in their clarity and determination. This gave Josette Baïz the idea of imagining an "ecological fairytale" with the 14 youngest dancers of the Groupe Grenade (7 to 11 years old).
Through this performance they show the wealth and beauty of the world, as well as its programmed destruction. Like a people from the forests, they roam the earth to discover the extent of its transformation. A chaos of images and cultural shocks.

Club Europe Evening – Thursday, June 2
Duration : around 1.5 hours
Café Borély - 7:00pm
The European Club has the pleasure to offer you an evening on June 2 from 07:00 pm at Café Borely.
(registration form - €90 TTC)

Farewell Dinner – Friday, June 3
Duration : around 2.5 hours
Palais du Pharo - 07:30pm



Louis-Napoleon Bonaparte, prince-president who became Emperor Napoleon III, led a Mediterranean strategy that greatly contributed to the economic development of the city of Marseille, thanks to a policy of construction and modernization of its infrastructure. In gratitude, the city council offered him a plot of land on which the Emperor built the Palais du Pharo for his beloved wife, Empress Eugénie. Although the imperial couple was never able to live in it, the Palace will welcome the great family of the ICOLD for their farewell dinner. It will be an opportunity to enjoy an exceptional panorama and admire the sunset over Marseille, the Mucem, Fort Saint-Jean, the «Bonne-Mère» and the Old Port, while tasting the best Mediterranean specialties, in a musical and festive atmosphere. It is in this imperial setting that the prize of the honorary members will be awarded to close the 27th ICOLD Congress and that the French Committee for Dams and Reservoirs will take leave of its guests.

PROGRAM FOR ACCOMPANYING PERSONS

Discover Aix-en-Provence and its calissons - May 30 & June 2, 2022 (Paid event)
Duration: one day/Departure from the conference at 9am
Located 30 kilometres north of Marseille, Aix-en-Provence is well known for the narrow streets of its old town, its fountains, and its 17th and 18th century hotels. You will have the pleasure of visiting Cézanne's studio. You will have free time to stroll along the city's elegant avenues, lined with plane trees, and make the most of its traditional markets. The visit to the calisson museum "Roy René" will conclude with a tasting of this local speciality.



Old Marseille and the Panier neighbourhood - May 30 & June 1, 2022 (Paid event)
Duration: half-day/Departure from the Old Port at 9am or 2pm
From the city hall to the Vieille Charité this stroll through the Panier will reveal to you the oldest neighbourhood in France, 26 centuries of history to discover with every step to the rhythm of anecdotes from your guide. Walk the streets of the famous Panier neighbourhood and stop at various artisans to discover specialities from Marseille: the famous navettes and espérantine chocolate, olive oil, soap, the santons ornamental figurines, potters, galleries, wine caves, and cutlery.

Cooking class: Bouillabaisse at the Miramar – May 30 & 31, 2022 (Paid event)
Duration: half-day/Departure from the conference at 10.30am
Discover the original recipe of this traditional dish from Provence, fish cooked in a flavoured broth. How can you be sure to cook your bouillabaisse correctly? How will you find help? Who can give you real advice? Christian Buffa, chef at the Miramar, has decided to open the doors of his kitchen to solve these problems. He welcomes small groups of amateurs to whom he reveals the tricks and secrets he uses to make bouillabaisse. In his great kitchen, we prepare together and then we savour.



Nîmes and Arles – May 31 & June 1, 2022/Duration: one day/Departure from the conference at 9am (Paid event)
Nîmes is a deliriously charming city, renowned worldwide for the majesty and exceptional conservation of its Roman monuments. Within this 2,000-year-old city you'll find exceptional heritage with numerous unique hotels, wonders from the 16th, 17th, and 18th centuries, witnesses of a rich past valorised within a protected area that is among the most beautiful in France. Nîmes is labelled as a city of art and history. Arles is also a city of art and history, classified by UNESCO as a World Heritage site three times over:
- For its ancient centre and the entirety of its Roman and Romanesque monuments.
- For the the road to Santiago de Compostela, which since the Middle Ages has been one of the four one of the four routes through France and Europe to Santiago de Compostela.
- For the nearby Camargue, a natural space of worldwide interest and part of the global network of Biosphere Reserves.



Mucem Architectural walk – May 31 & June 2, 2022 (Paid event)
Duration: half-day/Departure from the Ombrière of the Old Port at 9am or 2pm
Departing from the Norman Foster-designed Ombrière, you will discover the new maritime front of Marseille within the cultural centre of the J4 stretching from the Mucem, to the Mediterranean Villa, and the renovated sanitary post Pouillon and Egger, which today hosts the Regards de Provence Foundation.

Around the Old Port and Le Corbusier – May 31 & June 1, 2022 (Paid event)
Duration: half-day/Departure from the Old Port at 9am or 2pm
For 26 centuries, the port of Marseille has been the prestigious theater around which the history of the city plays out: the acropolis of the Greco-Phocaean settlers, the abbey of the first Christians, the great arsenal of the galleys, the city hall, the imperial residence. The radiant city of the famous architect Le Corbusier, registered in the UNESCO World Heritage. Lead by a guide you will visit different spaces, halls, merchant streets, rooftops, and get exclusive access to an apartment classified as a historic monument.



Visit to Avignon – June 1 & 2, 2022 (Paid event)
Duration: one day/Departure from the conference at 9am
From Marseille to Avignon (97km), the city of the popes. You will visit the Papal Palace, the old city and its streets dating back to the Middle Ages, and the Saint-Bénézet bridge. Lunch in Avignon before heading out to visit a vineyard estate.

CONFERENCE VENUE

The Marseille Exhibition and Convention Centre is located at the heart of the city and is easy to join.



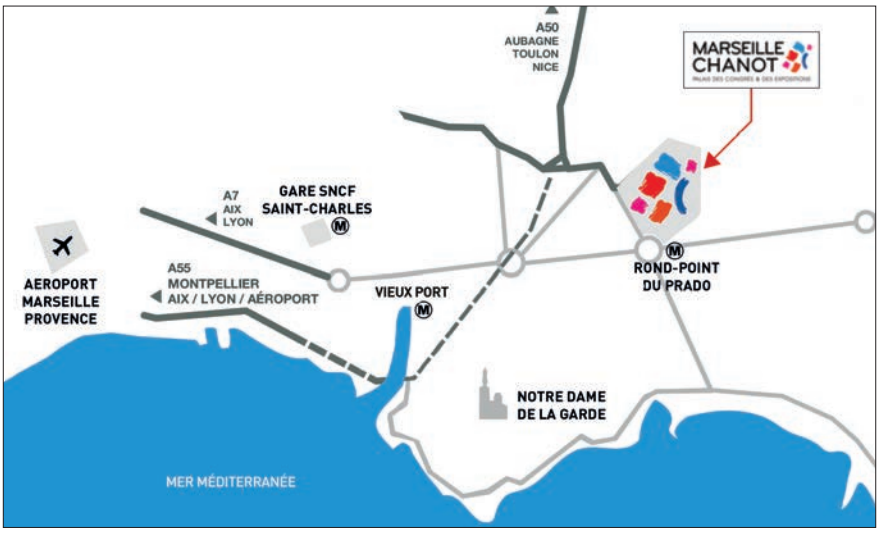
CONGRESS CENTER



2ND FLOOR | 1ST FLOOR | GROUND FLOOR

HOW TO GET TO MARSEILLE





Ⓜ Metro

By car:

A7 – northbound Autoroute du Nord (from Paris, Lyon, Brussels) – Exit N°36 head towards Menpenti, Cinq Avenues, Stade Vélodrome, Parc Chanot.
A55 – coastal motorway Autoroute du Littoral (from Arles, Montpellier, Barcelona, Toulouse) – take the tunnel Prado Carénage, towards Stade Vélodrome.
A50 – eastbound Autoroute de l'Est (from Toulon, Nice, Milan, Genoa) – head towards Centre-ville, la Plage.
Via the Tunnel Prado Carénage you have:
> A direct link between motorways A55 and A50,
> A fast access to the Rond-point du Prado when coming from the A55,
> An expressway crossing the city centre in less than 5 minutes.

By plane:

Marseille Provence Airport: The airport is about 30km from the city centre (30 minutes to drive). Airport shuttles take you to the central railway station Gare Saint-Charles in about 30 minutes (tel.: +33 (0)4 42 14 31 27 / +33 (0)4 91 50 59 34) – Airport taxis: +33 (0)4 42 14 24 44 / +33 (0)4 42 88 11 44

By train:

Marseille Saint-Charles railway station: direct access to the congress venue by metro (Parc Chanot).
Congress Center in 15 minutes by metro (Line 2).
3 hours from Paris by TGV (17 connections every days)
Direct trains from Frankfurt, Geneva, Barcelona...

By metro:

Underground line 2 (5 stations) – get off at Rond-point du Prado station, direct access to the congress venue's entrance through gate A.

By bus:

Direct bus lines for Rond-point du Prado station are nr. 19 / 21 / 23 / 41 / 44 / 45 / 72 / 83.

Taxi rank:

At the Rond-point du Prado, right next to the entrance to Parc Chanot.

GENERAL INFORMATION

Health conditions:

The conditions of entry into France depend on the country of origin of the travellers.
See details by country on the website of the Ministry of Europe and Foreign Affairs:
https://www.diplomatie.gouv.fr/en/coming-to-france/coronavirus-advice-for-foreign-nationals-in-france/

Visas:

If you are coming to Marseille from overseas, the French Government website provides useful information on the types of visas required to enter the country https://france-visas.gouv.fr/. Once your registration is complete, and the payment received, you will be able to request an invitation letter from the Congress Secretariat.

Language:

French is the national language of France but English is also spoken.

Weather:

In Marseille, in June, the average high-temperature is 25°C and the average low temperature is 16°C.

Electricity:

The typical main voltage in France is 220 Volts (alternating current). Plugs and Sockets are European standard with two round pins.

Water

It is safe to drink tap water everywhere in France. Quality standards are high, and it can be considered as an alternative to bottled mineral water.

Phone

Use +33 to call France from abroad.

Currency : euros (**€**)

Time Zone

In Marseille, Central European Time applies = UTC+1; During summer months (from 28 March 2022 to 31 October 2022) daylight saving time is implemented = UTC+2.

GENERAL INFORMATION

Key Figures about Marseille

- Surface area: 241 km²
- Population: 1 744 000 inhabitants
- Districts: 16
- Average age: 42 years
- Nationalities: over 200
- Highest point: 242 m asl (Les Trois-Lucs, 12th district)

Sustainable Meeting:

The Marseille 2022 Organizing Committee is sensitive to the need to protect the planet and is implementing a number of concrete actions to protect it during the event: responsible catering - from the preparation of meals to the packaging of dishes -, monitoring and recovery of waste produced, control of energy and water consumption, responsible mobility, etc.

These measures are fully in line with the South Region's Climate Plan, which makes the climate emergency its priority and whose main objectives are to encourage new forms of mobility, the development of renewable energies, support for companies wishing to act for the planet, the preservation of the natural heritage and the improvement of the well-being of its inhabitants.

A special agreement was signed on 3 May 2021 between the Southern Region and the CFBR.

Social Networks

The organizing committee is active on the social networks where it publishes all the useful information concerning your arrival in France, the organisation and the programme of the event.

Do not hesitate to subscribe or to consult our website regularly.

ICOLD-CIGB Marseille 2022 | @icold_cigb2022 | www.cigb-icold2022.fr

REGISTRATION AND INFORMATION

MCO Congrès SAS
CIGB ICOLD 2022

Villa Gaby - 285 Corniche JF Kennedy - 13007 Marseille, France
Tél. : +33 (0)4 9509 3800 / Fax: +33 (0)4 9509 3801

claire.bellone@mcocongres.com



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