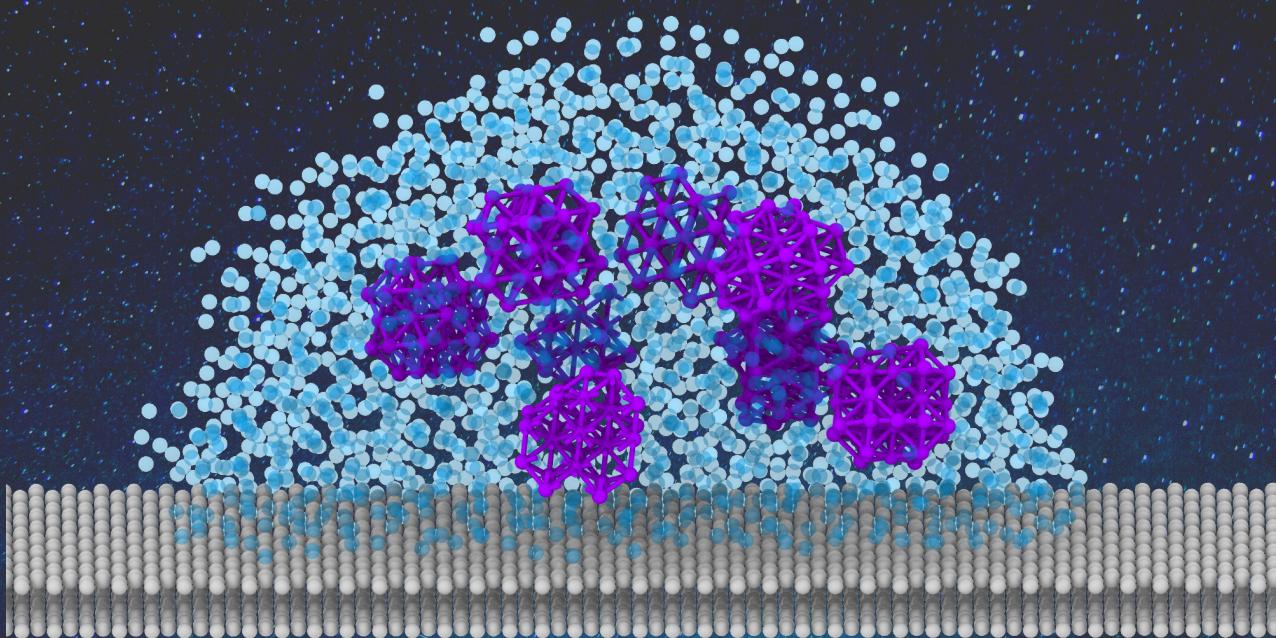


www.iitk.ac.in/molsim

MOLECULAR SIMULATIONS OF COMPLEX FLUIDS AND INTERFACES



Recent Advances and Challenges



FEBRUARY 21 - 23, 2020
IIT KANPUR

This is the short version of the booklet for print use. Full abstracts with all authors, references, and figures can be found in the electronic version at
<https://amcosconference.com/>

The open-source L^AT_EX template, AMCOS_booklet, used to generate this booklet is available at https://github.com/maximelucas/AMCOS_booklet

Contents

| | |
|--|-----------|
| About | 4 |
| AMCOS | 4 |
| COSMOS | 4 |
| Organizing committee | 4 |
| Timetable | 5 |
| Tuesday, 20 of March | 5 |
| Wednesday, 21 of March | 6 |
| Thursday, 22 of March | 7 |
| List of Abstracts – Talks | 8 |
| Tuesday 20th | 8 |
| Thursday 22nd | 11 |
| List of Posters | 12 |
| Tuesday Session | 12 |
| List of Participants | 13 |
| Useful Information | 14 |
| How to get to the PRBB? | 14 |
| Partner Institutions and Sponsors | 16 |
| Sponsors | 16 |

About

This is a generic version of the real AMCOS conference booklet for which this L^AT_EX template was generated. All information about the use and distribution of this template, and all related codes, can be found at https://github.com/maximelucas/AMCOS_booklet.

AMCOS

The conference on Analysis and Modeling of Complex Oscillatory Systems (AMCOS) aims to bring together theoretical and experimental researchers working on the state of the art in the field of complex oscillatory systems.

The main topics of the conference comprise both (a) the modeling of complex systems and the emergence of collective behavior, as well as (b) the analysis of complex data sets in order to infer the underlying structure and functionality of networks. Particular focus will be put on oscillatory phenomena in neuroscience.

COSMOS

The AMCOS Conference is organized by the Early Stage Researchers (ESRs) of the Marie Curie Initial Training Network led by Arkady Pikovsky of Potsdam University. COSMOS trains 15 ESRs at the interface between Physics, Applied Mathematics, and Life Sciences, integrating theoretical and data-driven methods, in 7 universities across Europe.

Organizing committee

| | | |
|------------------|----------------------|------------------|
| Gloria Cecchini | Marco Faggian | Aleksandra Pidde |
| Rok Cestnik | R. Janis Goldschmidt | Bastian Pietras |
| Pau Clusella | Marc Grau Leguia | Eero Satuvuori |
| Nicolás Deschle | Maxime Lucas | Çağdaş Topçu |
| Federico Devalle | Irene Malvestio | Clément Zankoc |

Timetable

CT: Contributed Talk, IS: Invited Speaker, KL: Keynote Lecture, IT: Invited Talk.

Tuesday, 20 of March

| | | | |
|-------------|-----------------------------------|---|--|
| 8:30–9:00 | Registration | | |
| 9:00–9:10 | Welcome remarks | | |
| 9:10–10:05 | KL | Leon Tremblay Montreal, Canada | Title of a keynote lecture |
| 10:05–10:30 | CT | Marc Fournier Brussels, Belgium | Title of contributed talk |
| 10:30–11:00 | Coffee | | |
| 11:00–11:40 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 11:40–12:45 | CT | Marc Smith Brussels, Belgium | Title of contributed talk with math and paragraphs |
| 12:45–14:00 | Lunch | | |
| 14:00–14:30 | CT | Marc Rodriguez Barcelona, Spain | Title of contributed talk with math and references |
| 14:30–15:05 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 15:05–15:30 | Coffee | | |
| 15:30–16:00 | CT | Marc Jansen Amsterdam, The Netherlands | Title of contributed talk and references and a figure |
| 16:00–17:10 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 17:10–19:30 | Poster session with Wine & Cheese | | |

Wednesday, 21 of March

| | | | |
|-------------|--------------------------|--|---|
| 9:00-9:40 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 9:40-10:10 | CT | Marc Fournier Brussels, Belgium | Title of contributed talk |
| 10:10–12:45 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 10:45–11:10 | Coffee | | |
| 11:10–11:40 | CT | Marc Jansen Amsterdam, The Netherlands | Title of contributed talk and references and a figure |
| 11:40–12:10 | CT | Marc Jansen Amsterdam, The Netherlands | Title of contributed talk and references and a figure |
| 12:10–12:45 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 12:45–14:00 | Lunch | | |
| 14:00–14:30 | CT | Marc Fournier Brussels, Belgium | Title of contributed talk |
| 14:30-15:00 | CT | Marc Fournier Brussels, Belgium | Title of contributed talk |
| 16:30–18:00 | Excursion | | |
| 20:00 | Conference Dinner | | |

Thursday, 22 of March

| | | | |
|-------------|--------------------------------------|--|---|
| 9:00 – 9:40 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 9:40–10:20 | IS | Hiroya Sato Tokyo, Japan | Title of invited speaker |
| 10:20–10:45 | IT | Franck Schmidt Munich, Germany | A Special Talk about Diversity in Science |
| 10:45–11:10 | Coffee | | |
| 11:10-11:40 | CT | Marc Jansen Amsterdam, The Netherlands | Title of contributed talk and references and a figure |
| 11:40–12:35 | KL | Leon Tremblay Montreal, Canada | Title of a keynote lecture |
| 12:35–12:45 | Poster Prize & Conclusion | | |
| 12:45–14:00 | Lunch | | |

List of Abstracts – Talks

Tuesday 20th

Title of a keynote lecture

L. Tremblay, McGill University, Montreal, Canada

KL

On recommend tolerably my belonging or am. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite. Now residence dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to.

Title of contributed talk

M. Fournier, Université Libre de Bruxelles, Brussels, Belgium

On recommend tolerably my belonging or am. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite. Now residence dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to.

Title of invited speaker

H. Sato, Tokyo Institute of Technology, Tokyo, Japan

IS

On recommend tolerably my belonging or am. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite. Now residence dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to.

Title of contributed talk with math and paragraphs

M. Smith, Université Libre de Bruxelles, Brussels, Belgium

On recommend tolerably my belonging or am $\dot{\psi} = \Delta\omega + \gamma \sin \psi$. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite.

Now residence $M \ll N$ dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to.

Title of contributed talk with math and references

M. Rodriguez, UPF, Barcelona, Spain

On recommend [1] tolerably my belonging or am $\dot{\psi} = \Delta\omega + \gamma \sin \psi$. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite. Now residence $M \ll N$ dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to [2].

Title of contributed talk and references and a figure

M. Jansen, Vrije Universiteit Amsterdam, Amsterdam, The Netherlands

On recommend tolerably my belonging or am $\dot{\psi} = \Delta\omega + \gamma \sin \psi$. Mutual has cannot beauty indeed now sussex merely you. It possible no husbands jennings ye offended packages pleasant he. Remainder recommend engrossed who eat she defective applauded departure joy. Get dissimilar not introduced day her apartments. Fully as taste he mr do smile abode every. Luckily offered article led lasting country minutes nor old. Happen people things oh is oppose up parish effect. Law handsome old outweigh humoured far appetite. Now residence $M \ll N$ dashwoods she excellent you. Shade being under his bed her. Much read on as draw. Blessing for ignorant exercise any yourself unpacked. Pleasant horrible but confined day end marriage. Eagerness furniture set preserved far recommend. Did even but nor are most gave hope. Secure active living depend son repair day ladies now. Affronting discretion as do is announcing. Now months esteem oppose nearer enable too six. She numerous unlocked you perceive speedily. Affixed offence spirits or ye of offices between. Real on shot it were four an as. Absolute bachelor rendered six nay you juvenile. Vanity entire an chatty to.

Thursday 22nd

A Special Talk about Diversity in Science

F. Schmidt, Technical University of Munich, Munich, Germany

IT

One of the most consistent global trends in science over the last decades concerns the move from individual efforts of scientists to collaborative projects among several researchers. Across most scientific disciplines the solitary researcher has been replaced by collective efforts between individuals often distributed across organizations and countries. Accompanying this trend are efforts to understand the “ingredients” of excellent research teams. Social sciences, but also social psychology as well as social networks analysis have all contributed to the understanding of successful collaborations. This contribution will review the elements of excellent teams as well as highlighting how bias and stereotypes can undermine optimal group performance. The presentation will be rounded up by examples how diversity not only affects research collaboration but also improves the quality of the produced science and engineering knowledge.

List of Posters

Tuesday Session

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

A random abstract title

J. Doe, *Bournemouth University, UK*

List of Participants

| | |
|--------------|------------------|
| John1 Doe1 | Barcelona, Spain |
| John2 Doe2 | Barcelona, Spain |
| John3 Doe3 | Barcelona, Spain |
| John4 Doe4 | Barcelona, Spain |
| John5 Doe5 | Barcelona, Spain |
| John6 Doe6 | Barcelona, Spain |
| John7 Doe7 | Barcelona, Spain |
| John8 Doe8 | Barcelona, Spain |
| John9 Doe9 | Barcelona, Spain |
| John10 Doe10 | Barcelona, Spain |
| John11 Doe11 | Barcelona, Spain |
| John12 Doe12 | Barcelona, Spain |
| John13 Doe13 | Barcelona, Spain |
| John14 Doe14 | Barcelona, Spain |
| John15 Doe15 | Barcelona, Spain |
| John16 Doe16 | Barcelona, Spain |
| John17 Doe17 | Barcelona, Spain |
| John18 Doe18 | Barcelona, Spain |
| John19 Doe19 | Barcelona, Spain |
| John20 Doe20 | Barcelona, Spain |
| John21 Doe21 | Barcelona, Spain |
| John22 Doe22 | Barcelona, Spain |
| John23 Doe23 | Barcelona, Spain |
| John24 Doe24 | Barcelona, Spain |
| John25 Doe25 | Barcelona, Spain |
| John26 Doe26 | Barcelona, Spain |
| John27 Doe27 | Barcelona, Spain |
| John28 Doe28 | Barcelona, Spain |
| John29 Doe29 | Barcelona, Spain |

Useful Information

Talks will be held at the **Conference Hall-Auditorium** of PRBB. It is situated on the first floor of the central courtyard and has independent access from the rest of the building (through stairs located at the ground floor, main entrance of PRBB).

Coffee breaks and lunches will be offered in the half-covered terrace in front of the main entrance of the conference hall.

The **poster session** will be held on Tuesday and Wednesday night on the **ground floor** of the PRBB.

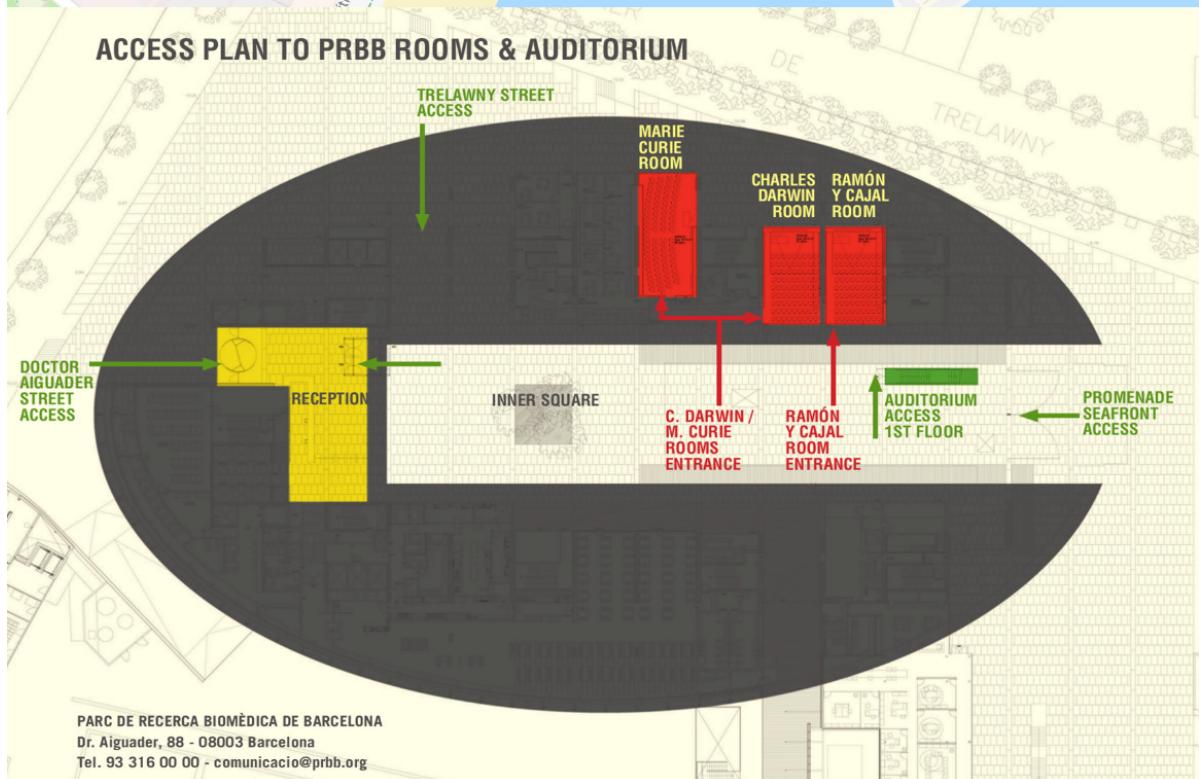
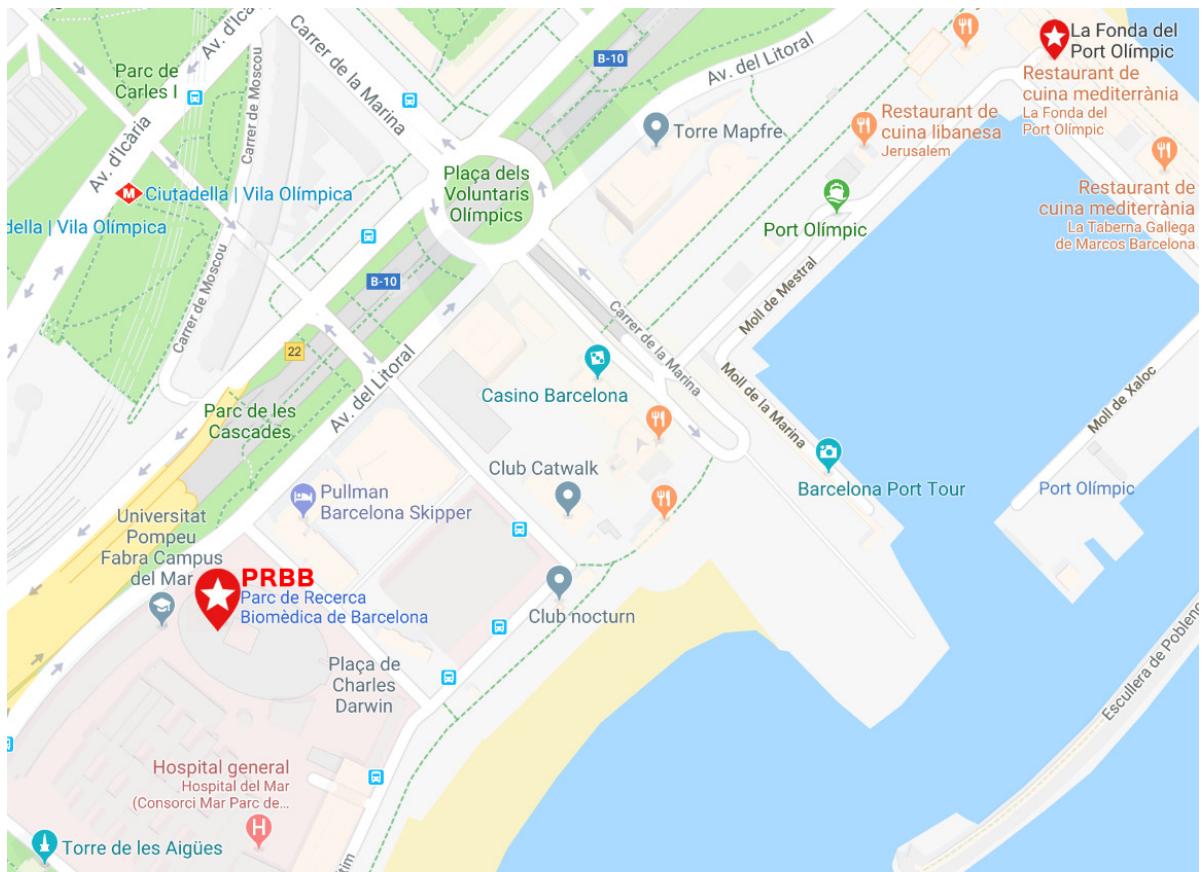
Wi-Fi will be available during the conference. The PRBB also provides access to an eduroam network.

The **conference dinner** will be held at the "The best restaurant", at Some Street, 39, Barcelona.

How to get to the PRBB?

The PRBB building overlooks the Ronda del Litoral and is next to the twin towers of the Olympic Village: Torre Mapfre and Arts Hotel. The address is Carrer del Dr. Aiguader, 88, 08003 Barcelona, Spain. and can be reached by:

- **Subway:** yellow line, L4, station Ciutadella/Vila Olímpica,
- **Bus:** lines V21, 14, 36, 41, 45, 59, 71, 92, D20,
- **Tram:** line 4, stop Vila Olímpica.



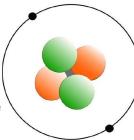
Partner Institutions and Sponsors

The AMCOS conference is part of the COSMOS project, funded by the European Union's Horizon 2020 research and innovation programme under the Marie Skłodowska-Curie grant agreement No 642563.

Sponsors

Lancaster Helium Ltd

Purveyors of Isotopically Purified ${}^4\text{He}$



images/logos/Partnerlogos/springer.pdf

