

MILAN • IT

ASST Grande Ospedale Metropolitano Niguarda

CHINA-ITALY INNOVATION IN NUCLEAR MEDICINE



Scientific Rationale for the Sino-Italian meeting in Milan

SCIENTIFIC COMMITTEE:

Biao Li Gang Huang Jing Wang Hongchen Shi Arturo Chiti Claudio Rossetti Silvia Morbelli Martina Sollini

FACULTY:

Antonio Scarale Arturo Chiti Biao Li Claudio Rossetti Fei Kang Gang Huang Hongcheng Shi Hui Wang Kuangyu Shi Margarita Kirienko Martina Sollini Matteo Bauckneht Matthew Miller Rui An Selene Capitanio Silvia Morbelli Stefano Fanti Wei Mu Xiaoli Lan Xiaohua Zhu

Nuclear medicine is at the forefront of modern diagnostic and therapeutic innovation, offering transformative solutions for a wide range of diseases. Italy and China have significantly advanced the science and clinical practice of nuclear medicine. This congress seeks to unite nuclear medicine physicians from both countries to foster knowledge exchange, collaboration, and the development of joint strategies. Key themes include radiopharmaceutical developments, dosimetry, new PET scanners, and artificial intelligence in nuclear medicine.

Radiopharmaceutical Developments

Radiopharmaceuticals underpin the success of nuclear medicine by enabling precise diagnosis and targeted therapies. China is at the forefront of developing novel radiotracers and Italy is advanced in expanding their clinical applications. This congress will highlight cutting-edge research in radiochemistry, preclinical evaluations, and first-in-human studies of new radiopharmaceuticals. Emphasis will be placed on the development of theranostic agents, which combine diagnostic imaging and targeted therapy, and the optimization of production methods to address global demand. Discussions will also explore strategies to overcome regulatory and logistical challenges to ensure equitable access to these innovations.

Dosimetry

Accurate dosimetry is critical to maximizing the therapeutic efficacy of nuclear medicine while minimizing potential toxicities. Advances in personalized dosimetry have improved treatment planning for radiopharmaceutical therapies and contributed to better patient outcomes. This congress will highlight advances in dosimetry for therapeutic applications, focusing on precision medicine approaches and strategies for integrating these tools, including 3D imaging-based models and AI-enhanced predictions, into routine clinical practice.

New PET Scanner Technologies

The evolution of PET scanner technologies, including large field of view PET/CT and PET/MR, has significantly enhanced the sensitivity, resolution, and speed of imaging. These advancements have enabled earlier detection of diseases, improved quantification of biological processes, and reduced radiation exposure. Topics will include clinical implementation challenges, cost-effectiveness analyses, and the potential for widespread adoption of cutting-edge imaging technologies.

Artificial Intelligence in Nuclear Medicine

Artificial intelligence (AI) is transforming nuclear medicine by enhancing image analysis, streamlining workflows, and supporting clinical decision-making. Collaborative efforts in developing AI-driven tools for imaging and therapy optimization offer significant promise. This congress will explore AI applications in areas such as automated image reconstruction, disease detection, and dosimetry calculations. Ethical considerations, clinician training, and strategies to integrate AI into routine practice will also be key points of discussion.

Promoting International Collaboration

This congress represents a unique opportunity to strengthen ties between Italy and China, enabling participants to share knowledge, exchange ideas, and develop collaborative research initiatives. By addressing common challenges and leveraging the strengths of both nations, this event will catalyze innovation and advance the field of nuclear medicine globally. The insights gained will ultimately translate into improved patient care and outcomes, setting a benchmark for international cooperation in healthcare and science.

We eagerly anticipate welcoming esteemed colleagues from Italy and China to this landmark event, where together we will shape the future of nuclear medicine.

Programme **OCTOBER** 1

Arrival in Milan, congress registration and welcome dinner

OCTOBER 2

- 08.30 12.00 Round table: promoting intenational collaboration 12.00 - 13.00 Lunch 13.00 - 13.30 Welcome & opening speeches Claudio Rossetti, Alberto Zoli, Mario Melazzini, Gang Huang, Jing Wang, Maria Luisa De Rimini, Paola Erba, Arturo Chiti **SESSION 1** Chairs: Claudio Rossetti, Gang Huang
- 13.30 13.55 Innovations of LAFOV PET in oncology Hongcheng Shi
- Clinical impact of LAFOV PET 13.55 - 14.20 Stefano Fanti
- 14.20 14.45 GPC3 PET: tracer development and clinical translation Xiaoli Lan
- 14.45 15.00 Discussion
- 15.00 15.30 Tea and coffee break

SESSION

SESSION

SESSION 2 Chairs: Martina Sollini, Hui Wang

- Non oncological applications of dynamic imaging LAFOV PET 15.30 - 15.55 Antonio Scarale, Selene Capitanio
- Clinical impact of neuroimaging in dementia 15.55 - 16.20 Silvia Morbelli
- 16.20 16.30 Discussion
- Proton therapy verification using total-body PET/CT imaging 16.30 - 16.55 Xiaohua Zhu
- 16.55 17.20 Development and clinical application of AI-based respiratory and head motion correction algorithms in PET imaging Fei Kang
- 17.20 17.30 Discussion
- 18.30 22.00 Transfer to restaurant and social dinner

OCTOBER 3

	SESSION 3 Chairs: <i>Silvia Morbelli, Wei Mu</i>
8.30 - 8.55	Al in Nuclear Medicine <i>Biao Li</i>
8.55 - 9.20	The european vision for Al <i>Margarita Kirienko</i>
9.20 - 9.45	Al in dosimetry <i>Kuangyu Shi</i>
9.45 - 10.00	Discussion
10.00 - 10.30	Tea and coffee break
	SESSION 4 Chairs: <i>Arturo Chiti, Rui An</i>
10.30 - 10.55	Early phase clinical studies <i>Martina Sollini</i>
10.55 - 11.20	Radiopharmaceutical development - an industry perspective <i>Matthew Miller</i>
11.20 - 11.45	PSMA imaging in Europe: current status and future perspectives <i>Matteo Bauckneht</i>
11.45 - 12.00	Discussion
12.00 - 12.30	Closing remarks: Arturo Chiti, Claudio Rossetti
12.30 - 13.30	Lunch
13.30 - 17.00	Transfer and tour
18.30 - 22.00	Transfer to restaurant and dinner time
OCTOBER 4	

SESSION

SESSION



Conference Venue

ASST Grande Ospedale Metropolitano Niguarda Piazza dell'Ospedale Maggiore, 3, 20162 Milano MI

HOW TO REACH THE VENUE:

By public transportation

Bus:

- 41 Stop: Niguarda Pronto Soccorso
- 42 Stop: Niguarda Ospedale
- 51 Stop: Niguarda Ospedale or Via Benefattori dell'Ospedale
- 83 Stop: Ospedale Maggiore (Via Ausonio Zubiani) or Via Benefattori dell'Ospedale Tram:
- 4 Stop: Niguarda Ospedale
- 5 Stop: Niguarda Ospedale

Subway:

• Line M5 (purple) – Stop: Ca' Granda

By train

From Milano Centrale Railway Station:

• Line M3 (yellow) to Maciachini + Tram 4 to Niguarda Ospedale

or

• Tram 5 to Niguarda Ospedale

From Milano Garibaldi Railway Station:

• Line M5 (purple) to Ca' Granda + Tram 5 to Niguarda Ospedale

By car

From the A4 Torino-Trieste motorway, take the Cormano exit and follow directions to City Center – Niguarda.

Parking

- Visitors can enter the hospital by car by collecting a ticket at the entrance on Via Zubiani (access from 5:30 AM to 10:30 PM). Direct access to the Emergency Room is via Via Ettore Majorana. South Parking Lot with over 750 spaces at discounted rates:
- Up to 4 hours: €3.20
- From 4 to 24 hours: €4.00



Associazione Italiana di Medicina Nuclear Imaging Molecolare e Terapia 202

Patronage

Organising Secretariat

MZ Events Tel. 0266802323 General Information chiara.fiordimondo@MZevents.it Sponsor giorgio.mazzeo@mzevents.it



2025