

17th International Conference on Nuclear Reaction Mechanisms

Varenna, June 15-19, 2026

Monday morning

9.30-11

(10')

F. Cerutti	OPENING
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[Chairperson: E. Vigezzi]

Nuclear structure

(25'+5')

N. Tsoneva	Spectral properties of pygmy and giant resonances
D. Dell'Aquila	Structure of ^{14}N via $\alpha+^{10}\text{B}$ reactions at sub-barrier energies

(15'+5')

R. Lozeva	Probing nuclear excited-state properties
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COFFEE BREAK

11.30-12.40 [Chairperson: S. Pacetti]

Form factors and QCD

(25'+5')

A. Bianconi	How to "read" hadron timelike form factors
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(15'+5')

F. Rosini	Hyperon form factors in the complex plane
D. Laudicina	The H-dibaryon from lattice QCD

Monday afternoon

15-17 [Chairperson: **H. Sasaki**]
(25'+5')

Astrophysics

Y. Lashko	Astrophysical S factors for $p+{}^7\text{Li}$ -, $n+{}^7\text{Be}$ -, and $d+{}^6\text{Li}$ -induced reactions in a microscopic many-channel cluster model
S. Ogawa	Four-body reaction analysis of the astrophysical factor S_{18} of the ${}^8\text{B}(p, \gamma){}^9\text{C}$ reaction via ${}^9\text{C}$ breakup
S. Zavatarelli	Nuclear astrophysics at LUNA
G. Tagliente	Twenty-five years of nuclear astrophysics at the n_TOF facility

TEA BREAK

17.30-19.10 [Chairperson: **S. Zavatarelli**]
(25'+5')

Astrophysics and fusion

D. Logoteta	Nuclear reactions in neutron stars and binary neutron star mergers
K. Czerski	Thermal deuteron-deuteron fusion in accelerator experiments at sub-keV energies

(15'+5')

G. Das Haridas	Background-limited studies of low-energy deuteron–deuteron fusion using silicon detector telescope
R. Smolović	Relativistic QRPA calculation of neutrino–nucleus cross sections on ${}^{92}\text{Zr}$

Tuesday morning

9-10.50 [Chairperson: **H. Arellano**]
(25'+5')

Nuclear potential

G. Blanchon	Toward consistent nuclear level densities from the optical potential
P. Finelli	Microscopic optical potentials: new results and perspectives
P. Fraser	Collectivity and mass in nuclear scattering potentials

(15'+5')

T. Demartini	Beyond ADC(2): a multichannel Dyson equation approach to nuclear optical potentials
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COFFEE BREAK

11.20-13 [Chairperson: **G. Blanchon**]
(25'+5')

Nuclear potential

H. Arellano	Self-consistent microscopic folding-model approach for positive and negative energies
V. Somà	Towards optical potentials from ab initio theories

(15'+5')

D. Bhattacharyya	Low-energy nucleon–nucleus interactions in a quadrupole rotor framework using MCAS
N.J. Upadhyay	Application of the iterative perturbative approach to nonlocal and deformed potentials in N– α scattering and (α ,n) reactions

Tuesday afternoon

15-17.10 [Chairperson: **T. Kawano**]
(25'+5')

Reaction theory

H. Lenske	From nuclear double charge exchange reactions to lepton number violating electron scattering
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(10')

H. Lenske	Memories of Takeshi Udagawa
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(25'+5')

H. Sasaki	Application of a noniterative finite amplitude method to direct and pre-equilibrium processes in neutron-induced reactions
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(15'+5')

I. Abdurrahman	Investigating the validity of Hauser-Feshbach theory on compound nuclear reactions
K. Beyer	Towards predictive modeling for reactions on rare isotopes
B. Menant	Pre-equilibrium emission microscopic modelisation

TEA BREAK

17.40-19.10 [Chairperson: **N. Tsoneva**]
(25'+5')

Medical radioisotopes

A. Guertin	Medical radionuclides production at GIP ARRONAX and impact of systematic cross section measurements
I. Lombardo	Study of retention effects in radio-isotope production with the Szilard-Chalmers reaction
M. Żółtowska	Radioisotope Centre POLATOM at the National Centre for Nuclear Research (NCBJ): research and development programmes for novel radiopharmaceuticals

Wednesday morning

9-11.10 [Chairperson: **H. Lenske**]
(25'+5')

Reaction theory

E. Vigezzi	Pair strength, two-nucleon transfer reactions and many-body processes
A. Bulgac	Microscopic framework for multi-nucleon transfer reactions
P. Capel	Are breakup reactions sensitive to spectroscopic factors?

(15'+5')

A. Deltuva	Reactions in three-body nuclear and hypernuclear systems
E. Rule	Quantum computing: a novel framework for reaction theory

COFFEE BREAK

11.40-13.10 [Chairperson: **S. Marin**]
(25'+5')

Fission

G. Bélier	Prompt neutron and gamma emission in ^{238}U fast-neutron-induced fission
J. Wilson	Prompt and delayed γ -ray emission as an experimental probe of fission
P. Talou	Nuclear fission: connecting fundamental physics and real-world applications

Wednesday evening
Session in honor of Egle Tomasi

20.30 RECEPTION

21-23 [Chairperson: **B. Sulignano**]
(15')

V. Somà

(30')

S. Pacetti

A. Bianconi

E. Tomasi

Thursday morning

9-11 [Chairperson: **P. Talou**]
(25'+5')

Fission

N. Carjan

The multiple facets of mass division in nuclear fission: an inexhaustible source of inspiration

K.-H. Schmidt

Long relaxation times in fission dynamics in the mass-asymmetry degree of freedom

(15'+5')

M. Verriere

Characteristics of primary fission fragments from a microscopic perspective

A. Skouloudaki

Angular momentum in fission through $^{241}\text{Am}(2n_{\text{th}},f)$ isomeric ratio measurements with the LOHENGRIN spectrometer

S. Marin

A theoretical model for the angular correlations of gamma rays emitted by fission fragments

COFFEE BREAK

11.30-12.40 [Chairperson: **G. Tagliente**]
(25'+5')

Measurements

J. Cederkall

Quadrupole moments of the first 2+ state in the even-even Sn isotopes approaching ^{100}Sn

(15'+5')

A. De Rosa

Nucleon transfer in $^{12}\text{C}+^{12}\text{C}$ reaction at 105 MeV beam energy

G. Perfetto

Measurements of (n,cp) reactions for tritium breeding in fusion reactors at n_TOF

Thursday afternoon

15-16.40 [Chairperson: **G. Béliet**]
(25'+5')

Measurements and evaluations

S. Foertsch	ALICE Highlights
T. Stamatopoulos	Observed oscillations in neutron capture cross sections

(15'+5')

D. Fernandez	New measurements of capture gamma ray production cross sections at UMass Lowell research reactor
J. Barman	^{90}Zr in the nuclear data evaluation pipeline of Uppsala (NEPU): uncertainty quantification with model defect treatment

16.40-17
(20')

The mysteries of the proton

TEA BREAK

Thursday evening

19.30 [Chairperson: **L. Sihver**]

Ettore Gadioli wine party

Friday morning

9-10.50 [Chairperson: **E. Tomasi**]
(25'+5')

Heavy ions

G. Wolschin	Quarkonia spectroscopy in the quark-gluon plasma
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(15'+5')

L. Bégué-Guillou	Surrogate reactions in inverse kinematics at heavy-ion storage rings
C. Garofalo	Majorana-type heavy ion double charge exchange reactions
B. Kayumov	Dinuclear system description of capture, fusion and evaporation residues in superheavy element production
J. Chaves	Investigation of the fusion process for $^6\text{Li} + ^{196}\text{Pt}$ at energies near the Coulomb barrier

COFFEE BREAK

11.20-12.50 [Chairperson: **F. Cerutti**]
(25'+5')

Reaction models and transport codes

L. Sihver	Recent Improvements and educational use of the Particle and Heavy Ion Transport code System (PHITS)
J.-C. David	Antineutron and antideuteron as projectile in the INCL (IntraNuclear Cascade of Liège) code
J. Hirtz	Model bias and parameter optimisation with the example of INCL/ABLA