September 17, Monday Plenary Session Conference Hall of VBLHEP

10.00 Victor Matveev (JINR) Opening

Chairman V. Matveev

10.10 *Vladimir Kekelidze (JINR)* Welcome from VBLHEP Directorate

10.20 *Maxim Danilov (Dubna, Russia)* Welcome from Dubna City administration

Group photo, coffee break 10.30-11.10

Chairman L. Pondrom

11.10 Anton Baldin (JINR)

The ideas of A.M.Baldin on overcoming the reductionism principle in Relativistic Physics

11.50 *Viacheslav Kuvshinov (Minsk, Belarus)* Interaction of quantum systems with environment in QCD

12.20 Oleg Rogachevskiy (JINR) NICA project: status 13.00 Alexander Kovalenko (JINR)

Status of NICA-SPIN Program

Break 13.30-14.30

September 17, Monday Parallel Session I Conference Hall of VBLHEP

Quantum chromodynamics at large distances

Chairman G. Volkov

14.30 Alexey Zhevlakov (Tomsk, Russia)

Transition form-factor of pi gamma \rightarrow pi pi in nonlocal quark model

14.50 Elena Luschevskaya (Moscow, Russia)

Tensor polarizability of rho meson from lattice QCD

15.20 Nelly Konopleva (Moscow, Russia)

Physics architecture. Part two

15.40 Vyacheslav Yukalov (JINR)

Describing phase transitions in field theory by self-similar approximants

16:10 Ivanhoe Pestov (JINR)

Spin as an intrinsic form of top angular momentum

Coffee break 16.30-17.00

Chairman V. Yukalov

17.00 *Marina Kozhevnikova (JINR)* Hunting for QCD strings in e+e- annihilation 17.20 *Nikolay Ivanov (JINR)*

How to measure the linear polarization of gluons in unpolarized proton using the heavy-quark pair leptoproduction

17.50 Gennadii Volkov (Gatchina, Russia)

Ternary $S\widetilde{U}(3)$ group symmetry and its possible applications in hadron-quark substructure. Towards a new spinor-fermion structure

18:20 Olga Solovtsova (JINR)

Numerical evaluation of Mellin-Barnes integrals using efficient approximations to the contour of stationary phase

18:40 Oleg Kosmachev (JINR)

Structure of the Majorana's equation and its phisycal interpretation 19.00

19:20 Welcome party

September 17, Monday Parallel Session II Auditorium 347

Relativistic heavy ion collisions

Chairman A. Parvan

14.30 Kyrill Bugaev (Kiev, Ukraine)

Possible signals of two QCD phase transitions at NICA-FAIR energies

15.00 Victor Braguta (Moscow, Russia) Observation of deconfinement in a cold dense quark medium
15.20 Nataliya Topilskaya (Moscow, Russia) Proposed fixed target experiment at the LHC beams
15.40 Igor Altsybeev (Saint Petersburg, Russia)

Recent developments in particle yield fluctuation measurements

16:00 Aida Galoyan (JINR)

Simulation of neutron production in hadron-nucleus and nucleus-nucleus interactions in GEANT4

Coffee break 16.30-17.00

Relativistic heavy ion collisions

Chairman K. Bugaev

- 17.00 *Alexandru Parvan (JINR)* Relativistic local equilibrium statistical mechanics and the transverse momentum distributions of hadrons
 17.30 *Trambak Bhattacharyya (JINR)*
- Tsallis statistics and heavy quark transport in quark gluon plasma
- 17.50 *Vladimir Kovalenko (Saint Petersburg, Russia)* Strongly intensive fluctuations and correlations in ultrarelativistic nuclear collisions in the model with string fusion
- 18.10 *Genis Musulmanbekov (JINR)* Hadron modification in dense baryonic matter
- 18:40 *Maxim Martemianov (Moscow, Russia)*Fragmentation peak splitting of the light ions in 56Fe + 9Be collsions at 0.23 GeV/nucleon

19.00

19:20 Welcome party

September 17, Monday Parallel Session III NICA Hall

Applied use of relativistic beams

Chairman A. Baldin

14:30 Vladimir Voronko (Kharkov, Ukraine)

Beam power gain for massive uranium target under relativistic proton, deuteron and carbon nuclei irradiation

14:50 Mihaela Paraipan (JINR)

Beam and target optimization for energy production in accelerator driven systems 15:10 *Jindrich Adam (Brno, Czech Republic)*

Comparison of the spallation neutron field on the surface of carbon and lead targets under the 660-MeV proton irradiation

15:30 Krystsina Husak (Minsk, Belarus)

Calculation of neutron leakage for a quasi-infinite uranium target by the Monte Carlo method

16:00 Marcin Szuta (Otwock-Świerk, Poland)

Impact of average neutron energy on the fast neutron fluency measurement by Np237 fission to capture ratio and reverse dark current of planar silicon detector methods

Coffee break 16.30-17.00

Chairman M. Paraipan

17:00 Pavel Tichy (JINR)

Study and Monte Carlo simulations of central region of uranium target QUINTA irradiated with high-energy proton and deuteron beams

17:20 Stanislaw Kilim (Otwock-Świerk, Poland)

NP-237 transmutation effectiveness dependence on beam particle, energy and sample position in QUINTA setup

17:40 Stanislaw Kilim et al. (Otwock-Świerk, Poland)

 $^{\rm 241}{\rm Am}$ incineration measurements with activation method in the «QUINTA» neutron field

18:00 Vladimir Stegailov (JINR)

Investigation of the effect of coherent electromagnetic radiazion by radioactive decay of 239Np and 152Eu

18:30 Robert Holomb (Brno, Czech Republic)

Cross-sections of nuclear isomers in the interaction of protons on thin thorium target 19.00

19:20 Welcome party

September 18, Tuesday Plenary Session Conference Hall of VBLHEP

Chairman M. Barabanov

09:00 *Elena Santopinto (Genoa, Italy)* Pentaquark and hybrid states
09:40 *Tomasz Skwarnicki (Syracuse, USA)* Exotic hadrons with heavy quarks: experimental perspective

10:20 *Galina Pakhlova (Moscow, Russia)* Exotic quarkonium at e+e- colliders

11:00 - 11:30 Coffee break

Chairman E. Santopino

11:30 Alaa Dbeyssi (Mainz, Germany) Nucleon structure studies with the PANDA experiment at FAIR
12:00 Igor Boyko (JINR) Recent results from the BESIII experiment
12:40 Vladimir Nedorezov (Moscow, Russia) Progress in experimental studies of the BGO-OD collaboration at BONN
13:10 Grazia Cabras (Bologna, Italy) Probing QCD with the ATLAS detector

13:30 - 14:30 Lunch

September 18, Tuesday Parallel Session I Conference Hall of VBLHEP

Structure functions of hadrons and nuclei

Chairman A. Litvinenko

14:30 *Stefan Gmuca (Bratislava, Slovakia)* Relativistic density functional for nuclear matter
15:00 *Sergey Kulagin (Moscow, Russia)*

The nuclear EMC effect in the resonance and DIS transition region

15:30 Anatoly Kotikov (JINR)

EMC effect at small Bjorken x values

16:00 George Prokhorov (JINR)

Polarization in HIC: comparison of methods

16:30 - 17:00 Coffee break

Chairman S. Kulagin

17:00 Vladimir Zykunov (JINR)

NLO and FSR NNLO radiative corrections for Drell-Yan processes at LHC

17:30 Andrey Pikelner (JINR)

Analytical calculation of phase-space integrals in massless QCD

17:50 Anatoly Litvinenko (JINR)

The possibility of studying polarization observables in reactions of the production of pions by polarized beams of protons and deuterons at the JINR LHEP

18:20 Andrei Krutov (Samara, Russia)

1S-2S energy shift in muonic hydrogen

18:40 Alexey Eskin (Samara, Russia)

Bound states of dtmu pdmu tpmu mesomolecules in quantum electrodynamics 19:00

September 18, Tuesday Parallel Session II Auditorium 347

Dynamics of multiparticle production

Chairman E. Kokoulina

14:30 Mikhail Tokarev (JINR)

Spectra of negative particles in Au+Au collisions from BES-I at RHIC and z-scaling 15:00 *Imrich Zborovský (Řež, Czech republic)*

Fractality in hadron interactions: a conservation law and quantization of fractal dimensions

15:30 Tatiana Dedovich (JINR)

Incomplete fractal showers and restoration of dimension

15:50 Vladimir Vechernin (Saint Petersburg, Russia)

String model calculation of strongly intensive observable for multiplicities in two windows

16:10 Albert Loktionov (Almaty, Kazakhstan)

E-by-E fluctuations of initial conditions in interactions of light, intermediate and heavy nuclei at energies 4 - 200 GeV at nucleon

16:30 - 17:00 Coffee break

Chairman V. Vechernin

17:00 *Aleksandra Shipilova (Samara, Russia)* Angular correlations in gamma + 2 jet events at high energies in the parton Reggeization approach

17:30 *Alexander Jerusalimov (JINR)*

Study of multipion production in np-interaction at intermediate energies

18:00 Valery Lyuboshitz (JINR)

On the pair correlations of neutral K,D,B and B_s mesons with close momenta produced in inclusive multiparticle processes

18:20 Anatolii Panferov (Saratov, Russia)

Comparison two different description of the V-I characteristic of graphene: theory and experiment

18:40

September 18, Tuesday Parallel Session III NICA Hall

Relativistic heavy ion collisions

Chairman G. Feofilov

14:30 Arkadiy Taranenko (Moscow, Russia) Anisotropic Flow Measurements from LHC to SIS

- 15:10 *Grigory Nigmatkulov (Moscow, Russia)* Recent flow and femtoscopy results from STAR
- 15:30 *Boris Tomasik (Banska Bystrica, Slovakia)* Fluctuating shapes of the fireballs in heavy-ion collisions
- 15:50 Oleg Shishanin (Moscow, Russia)

Features of radiation of relativistic electrons in storage rings

- 16:10 *Ehtiram Shahaliev (JINR)* Coherence control of triple electromagnetically induced transparency and Autler-Townes effect using an atomic medium
- 16:30 17:00 Coffee break

NICA/MPD

Chairman G. Nigmatkulov

17:00 Ján Fedorišin (JINR)

Analysis of experimental data measured by BM@N drift chambers

17:20 Alexander Ivashkin (Moscow, Russia)

Determination of geometry of heavy ion collisions with Forward Hadron Calorimeter (FHCal) at MPD/NICA

17:40 Elina Baldina (JINR)

Self-similarity approach for prediction and analysis of experiments at the accelerator complex NICA

18:00 Dmitriy Sakulin (JINR)

Investigation of the electromagnetic calorimeter response function by cosmic muons 18:20 *Mircea Baznat, Genis Musulmanbekov (JINR)*

- Monte Carlo Generator DQGSM
- 18:40 Katherin Shtejer (JINR)

Prediction of the particle production in pp collisions with the MPD detector at the NICA collider

19:00

September 19, Wednesday Plenary Session Conference Hall of VBLHEP

Chairman H. Stoecker

09:00 *Yury Kudenko (Moscow, Russia)* Status of neutrino oscillations

- 09:40 *Gleb Pokatashkin (JINR)* Hyperons at BM@N experiment: first results
- 10:00 **Yasuhiro Yamaguchi (Wako, Japan)** pi J/psi-D bar-D* potential described by the quark exchange diagram

10:20 *Tobias Frederico (Sao Jose dos Campos, Brazil)* Exploring the relativistic bound state structure in Minkowski space: applications to

hadrons

11:00 - 11:30 Coffee break

<u>Chairman T. Frederico</u>

11:30 Sergo Gerasimov (JINR)

Quark correlation in the ground and excited nucleon states via the photo-absorption sum rules

- 12:00 *Alexander Dorokhov (JINR)* Proton radius puzzle: experiment vs theory
- 12:30 Egle Tomasi-Gustafsson (Saclay, France)
- Update on the search of two photon exchange in electron proton elastic scattering

13:00 Horst Stoecker (Frankfurt, Germany)

MAGIC - how Matter's extreme phases can be revealed in gravitational wave observations and in relativistic heavy ion collision experiments

13:30 Anatoly Zarubin (JINR)

Presentation of the book "The discovery of the Higgs Boson at the LHC"

13:35 - 14:30 Lunch

September 19, Wednesday Parallel Session I Conference Hall of VBLHEP

Hadron spectroscopy, multiquarks

Chairman I. Obukhovsky

14:30 *Rudolf Faustov (Moscow, Russia)* Heavy baryon spectroscopy

15:10 *Gurjav Ganbold (JINR)* Charmonium radiative transitions, meson and glueball particle properties with the effective strong coupling

- 15:40 *Aidos Issadykov (JINR)* Decays of Bc meson
- 16:00 *Boris Kostenko (JINR)* Coherent dibaryons

16:30 – 17:00 Coffee break

Chairman R. Faustov

17:00 Igor Obukhovsky (Moscow, Russia)

Electrocouplings for low lying nucleon resonances from a light front quark model

17:30 Khachik Abraamyan (JINR)

Check of the structure in photon pairs spectra at an invariant mass of about 38 $MeV/c^{\wedge}2$

18:00

19:00 Concert

September 19, Wednesday Parallel Session II Auditorium 347

Studies of exotic nuclei in relativistic beams

Chairman A. Stavinskiy

14:30 Davoud Dorranian (Tehran, Iran)
 Ion acoustic cnoidal waves in electron-positron-ion plasmas with q-nonextensive electrons and positrons and high relativistic ions

- 14:50 Sergei Afanasiev (JINR) The influence of collective effects on the eta-mesic nucleus formation
 15:10 Katarina Michalickova (Kosice, Slovakia)
- Eta-nuclei in the SCAN experiment
- 15:30 Dmitry Dryablov (JINR)

Search for eta-mesic nuclei in the SRC/BM@N experiment at the NUCLOTRON

16:00 Andrei Zaitcev (JINR)

Observation of the Hoyle-state in dissociation of relativistic 12C nuclei in nuclear track emulsion

16:30 - 17:00 Coffee break

Polarization phenomena, spin physics

Chairman S. Afanasiev

17:00 Olena Mezhenska (Kosice, Slovakia)

Study of the deuteron analyzing powers in dp-elastic scattering at the energy of 800 MeV

17:20 Yaroslav Skhomenko (JINR)

Deuteron beam polarimeter at nuclotron internal target

17:40 Alexander Isupov (JINR)

VME-based DAQ system for the deuteron spin structure setup at the NUCLOTRON internal target station

18:00

19:00 Concert

September 19, Wednesday Parallel Session III NICA Hall

NICA/MPD

Chairman O. Rogachevsky

14:30 Dmitry Zinchenko (JINR)

A track finding algorithm for the Inner Tracking System of MPD/NICA

15:50 Fedor Guber (Moscow, Russia)

Centrality and reaction plane determination at BM@N by new forward hadron calorimeter

15:10 Vasily Kushpil (Rez, Czech Republic)

Investigation of Electric field in SiPM active volume by Volt-Farad characteristics analysis

15:30 Elena Kulish (JINR)

GEM/CSC tracking system of the BM@N experiment at the Nuclotron

15:50 Peter Parfenov (Moscow, Russia)

Performance of Anisotropic Flow Studies at MPD (NICA)

16:10 *Mariya Ilieva (JINR)* Hypernuclei Reconstruction at NICA/MPD

16:30 - 17:00 Coffee break

NICA/MPD

Chairman V. Kushpil

17:00 Pavel Batyuk (JINR)

Event reconstruction in the BM@N experiment

17:20 Daria Prokhorova (Saint Petersburg, Russia)

Pseudorapidity dependence of multiplicity and transverse momentum fluctuations at the SPS energies

17:40 Ivan Tsakov (Sofia, Bulgaria)

Accelerating station electronic blocks of Nuclotron-NICA complex 18:00

19:00 Concert

September 20, Thursday Plenary Session Conference Hall of VBLHEP

Chairman V. Alexakhin

09:00 Georgy Melkumov (JINR)

Recent results from strong interaction program of NA61/SHINE experiment at CERN SPS

09:40 *Grigory Feofilov (Saint Petersburg, Russia)* Energy and system size dependence of multi-particle production in pp, p-PB, Xe-Xe and Pb-Pb collisions in ALICE

10:10 Evgeny Kryshen (Gatchina, Russia)

Overview of ALICE results on ultra-peripheral collisions

10:40 Phillip Lakaschus (Frankfurt, Germany)

Chiral study of the four-quark state f0(500) in pion-pion and pion-nucleon scattering

11:00 - 11:30 Coffee break

<u>Chairman M. Tokarev</u>

- 11:30 *Vadim Alexakhin (JINR)* CMS: Physics Overview
- 12:10 *Anatoly Efremov (JINR)* Semi-inclusive deep inelastic scattering in Wandzura-Wilczek-type approximation

12:50 *Vladimir Karmanov (Moscow, Russia)* Bound states of purely relativistic nature

13:20 **Yury Uzikov (JINR)** Delta-isobar contribution to the pion production in the reaction $pp \rightarrow \{pp\}_s pi0$

13:40 - 14:30 Lunch

September 20, Thursday Parallel Session I Conference Hall of VBLHEP

Dynamics of multiparticle production

Chairman I. Zborovský

14:30 Elena Kokoulina (JINR)

A look at hadronisation via high multiplicity

15:00 Stanislav Smolyansky (Saratov, Russia)

Closed system of equations for description of the e+e- χ plasma generated from vacuum by strong electric field

15:30 Oleg Golosov (Moscow, Russia)

Anisotropic flow measurement from NA61/SHINE and NA49 experiments at CERN SPS

16:00 Nugzar Makhaldiani (JINR)

Phase transitions in the extended particle systems, hagedorn temperature and critical density and the fractal dimension of space, as a confinement phase transition order parameter

16:30 - 17:00 Coffee break

Structure functions of hadrons and nuclei

Chairman S. Smolyansky

17:00 Alexei Martynenko (Samara, Russia)

Energy spectra of muonic atoms in quantum electrodynamics

17:20 Fedor Martynenko (Samara, Russia)

Hadronic contribution of light by light scattering in the energy spectrum of muonic hydrogen

17:40 Sergey Yurev (JINR)

Relativistic investigation of the triton in the Bethe-Salpeter-Faddeev approach

18:10 Nizami Abdulov (Moscow, Russia)

Determination of TMD gluon density in a proton using recent LHC data

18:30 Alexander Machavariani (JINR)

On the rho0-meson production in the inclusive proton-proton collision 19:00

September 20, Thursday Parallel Session II Auditorium 347

Polarization phenomena, spin physics

14:30 Alexander Kaloshin (Irkutsk, Russia)

Chairman N. Piskunov

Neutrino propagator in media: spin properties and spectral representation 15:00 Vladimir Saleev (Samara, Russia) Off-shell initial state effects in Drell-Yan process at hadron colliders 15:30 Sergey Goloskokov (JINR) Study of exclusive processes within GPD approach 16:00 Yuri Obukhov (Moscow, Russian) Quantum spin dynamics in external classical fields 16:30 - 17:00 Coffee break Chairman Yu. Obukhov 17:00 Alexander Silenko (JINR) Dynamics of an orbital polarization of twisted electron beams in electric and magnetic fields 17:40 Arkadiy Terekhin (JINR) The differential cross section for dp-elastic scattring at 500-900 MeV/n and large transverse momenta 18:00 Igor Sitnik (JINR) Deuteron breakup at zero angle in the Coulomb nuclear field 18:20 Michael Chavleishvili (Dubna, Russia) Symmetry and kinematic hierarchy for particle reactions 18:40 Roman Shindin (JINR) Right sign of spin rotation operator 19:00

September 20, Thursday Parallel Session III **NICA Hall**

Progress in experimental studies in high energy centers

Chairman M. Bielewicz

14:30 Mikhail Bogolyubsky (Protvino, Russia)
Measurements of the invarinat cross sections for forward production of secondary light
nuclei in CC-collisions at beam energy 20.5 GeV/n on the accelerator U-70 IHEP
14:50 Ivan Yudin (JINR)
Calculation of Field of Spectrometric Magnet with 0.13 m Gap
15:10 Gevorg Nazaryan (Yerevan, Armenia)
Medium-induced modification of kaons spectra measured in SIDIS at HERMES
15:30 Alla Maevskaya (Moscow, Russia)
The fast interaction trigger detector for the upgrade of the ALICE experiment at
CERN: design and performance
15:50 Vasily Mikhaylov (Rez, Czech Republic)
The very forward hadron calorimeter PSD for the future CBM FAIR experiment
16:10 Denis Artemenkov (JINR)
Study of light nuclei fragmentation in nuclear track emulsion and simulation in the
BECQUEREL experiment
16:30 - 17:00 Coffee break
NICA/MPD
<u>Chairman D. Artemenkov</u>
17:00 Vladimir Zherebchevsky (Saint Petersburg, Russia)
New pixel detectors for ALICE at LHC and for NICA experiments
17:30 Alexander Mudrokh (JINR)
Prospects for the study of event-by-event fluctuations at MPD/NICA project
17:50 Viacheslav Kulikov (Moscow, Russia)
MC simulation results for projective geometry version of MPD EMC at NICA
collider. Feasibility study of fragmentation method of luminosity measurement for
NICA collider
18:30 Marcin Bielewicz (Warsaw, Poland)
MCORD - MPD COsmic Ray Detector for NICA.
MCORD - MPD COsmic Ray Detector for NICA.

September 20, Thursday Parallel Session IV Building 3 Auditorium

Applied use of relativistic beams

Chairman P. Zarubin

14:30 Vladimir Ovsyannikov (JINR)

First experiments for deep ionisation of Ir, Ce and Xe atoms in a local ion trap in JINR

14:50 Aleksandr Bugay (JINR)

Recent progress in computational studies of radiation-induced disorders in the Central Nervous System

15:30 Elena Kolesnikova (JINR)

Modeling the influence of heavy ion beams on the neurogenesis and the functioning of hippocampal neural networks

15:50 Batmunkh Munkhbaatar (JINR)

Monte Carlo track structure simulation in studies of biological effects induced by accelerated charged particles in the central nervous system

16:10 - 17:00 Coffee break

September 21, Friday Plenary Session Conference Hall of VBLHEP

Chairman V. Ladygin

09:00 *Maria Patsyuk (Cambridge, USA)* Exclusive studies of short-range correlations in nuclei
09:40 *Andrej Kugler (Rez, Czech Republic)* The compressed baryonic matter experiment at FAIR

10:20 *Viktor Riabov (Gatchina, Russia)* Recent results from PHENIX at RHIC

11:00 - 11:30 Coffee break

<u>Chairman A. Kugler</u>

11:30 Alexey Aparin (JINR)

Highlights from the STAR experiment

12:10 Vladimir Ladygin (JINR)

Energy dependence of the vector Ay and tensor Ayy and Axx analyzing powers in deuteron-proton elastic scattering at large scattering angles

12:50 *Stanislav Dubnichka (Bratislava, Slovakia)*Fully solvable mathematical scheme for finding out the right mass and width values of f_0(500) and rho0(770) mesons

13:20 - 14:30 Lunch

September 21, Friday Parallel Session I Conference Hall of VBLHEP

Hadron spectroscopy, multiquarks

Chairman A. L'vov

14:30 Yury Surovtsev (JINR)

The effect of final state interactions in two-pion and $K\overline{K}$ transitions of charmonia and bottomonia

15:00 Sergey Dorkin (JINR)

Solving Dyson-Schwinger and Bethe-Salpeter equations at zero and finite temperatures 15:30 *Vadzim Haurysh (Gomel, Belarus)*

Poincare-invariant quark model of light mesons

16:00 Sergey Koshkarev (Tartu, Estonia)

Resolving the SELEX–LHCB double-charm baryon conflict: the impact of intrinsic heavy-quark hadroproduction and supersymmetric light-front holographic QCD

16:30 - 17:00 Coffee break

Chairman Yu. Surovtsev

17:00 Vladimir Kurbatov (JINR)

Analysis of the pp \rightarrow {pp}_s pi0 reaction at the energy range 0.8-2.8GeV

17:20 Anatoly L'vov (Moscow, Russia)

On a search for new light charged particles in photoproduction

17:40 Nurbek Tursunbayev (JINR)

Reaction of two pion production pd \rightarrow pd pi pi in resonance region 18:00

18:20 Banquet

September 21, Friday Parallel Session II Auditorium 347

Relativistic heavy ion collisions

Chairman A. D'vachenko

14:30 Alexey Kurepin (Moscow)

Determination of centrality in nucleus – nucleus collisions on the MPD/NICA installation

15:00 Sergey Kiselev (Moscow, Russia) Hadronic resonance production with ALICE at the LHC

15:30 Natalia Zhigareva (Moscow, Russia)

Sigma-hyperons in nuclear collisions at energy of few GeV/c

15:50 Eugenia Khyzhniak (Moscow, Russia)

Estimation of pion emission source in symmetric and asymmetric collisions using the UrQMD model

16:10 Viktar Kireyeu (JINR)

New results of the clusters and hypernuclei formation within PHQMD model

16:30 - 17:00 Coffee break

Chairman A. Kurepin

17:00 David Edwin Alvarez Castillo (JINR)

The symmetry energy in neutron stars: constraints from GW170817 and Direct Urca cooling

17:20 Alexander D'yachenko (Saint Petersburg, Russia)

Emission of high energy particles in heavy ion collisions and a non-equilibrium equation of state

17:50

18:20 Banquet

September 21, Friday Parallel Session III NICA Hall

Polarization phenomena, spin physics

Chairman B. Tseepeldorj

14:30 Marian Janek (Zilina, Slovakia)

Dp breakup reaction investigation under specific kinematic configurations at ITS of Nuclotron

- 15:00 *Anatoliy Kondratenko (Novosibirsk, Russia)* Feasibility of measuring EDM in spin transparent colliders
- 15:30 *Yury Filatov (Moscow, Russia)* Spin transparency mode in the NICA collider

16:00 Nikolay Piskunov (JINR)

Measurement of analyzing powers for neutrons scattering on CH2, CH, C and Cu targets at the momenta from 3.0 to 4.2 GeV/c

16:30 - 17:00 Coffee break

Structure functions

Chairman M. Janek

17:00 **Baatar Tseepeldorj (Ulaanbaatar, Mongolia)** Half masses of particles produced in pi-C interaction at 40 GeV/c and phase transition

17:30 Sergey Gevorgyan (JINR)

Hadronic structure of the photon

18:00

18:20 Banquet

September 22, Saturday Plenary Session Conference Hall of VBLHEP

Chairman S. Shimanskiy

09:00 Aleksandr Malakhov (JINR)

Analytical description of hadron production in hadron-hadron and nuclear-nuclear collisions in the mid rapidity region

- 09:20 *Gennady Lykasov (JINR)* Self-consistent analysis of hadron production in pp and AA collisions at mid-rapidity
- 09:50 Pavel Zarubin (JINR)

Overview of new exposures of nuclear track emulsion in the BECQUEREL experiment 10:20 *Peter Lukin (Novosibirsk, Russia)*

Recent results of the hadronic cross section measurements with the CMD-3 detector

10:40-11:00 Coffee break

Chairman E. Tomasi-Gustafsson

- 11:00 *Stepan Shimanskiy (JINR)* Multiquark configurations in baryons and nuclei
 11:40 *Alexey Stavinskiy (Moscow, Russia)* Dense cold matter
- 12:00 *Nikolai Nikolaev (Chernogolovka, Russia)* Spin dynamics for EDM at storage rings
- 12:30 *Rashid Nazmitdinov (JINR)* Quantum Dots: from theory to applications
- 13:10 *Alexander Karpov (JINR)* Superheavy elements research at Dubna: achievements and perspectives
- 13:50 Aleksandr Malakhov (JINR), Valery Burov (JINR) Closing
- 14:00
- 14:00 Pososhok