



**XXXIV INTERNATIONAL CONFERENCE ON  
INTERACTION OF INTENSE ENERGY FLUXES WITH MATTER  
MARCH 1–6, 2019, ELBRUS, KABARDINO-BALKARIA, RUSSIA**

**Conference Program, March 5, 2019**

**Oral Session 16:00**

Chairman

*Prof. L.G.Dyachkov*

- 16:00 Diffusion in ultracold strongly coupled multiply charged plasma  
*Zelener Boris Borisovich (JIHT RAS, Moscow, Russia), Bobrov A. A., Bunkov A. M., Bronin S. Ya., Klyarfeld A. B., Zelener B. V.*
- 16:15 Study of the spectra of Calcium-40 Rydberg atoms in magneto-optical trap  
*Vilshanskaya Evgeniya Vladimirovna (JIHT RAS, Moscow, Russia), Saakyan S. A., Sautenkov V. A., Bobrov A. A., Zelener B. B., Zelener B. V.*
- 16:30 Plasma phase transition in warm dense hydrogen  
*Norman Genri Edgarovich (JIHT RAS, Moscow, Russia), Saitov I. M.*
- 16:45 Metastable conducting solid hydrogen at high pressures  
*Saitov Ilnur (HSE, Moscow, Russia)*

17:00  **COFFEE-BREAK**

Chairman

*Prof. B.B.Zelener*

- 17:15 Stopping power and velocity diffusion for a proton moving in a gas of super magnetized electrons  
*Bobrov Andrei Alexandrovich (JIHT RAS, Moscow, Russia)*
- 17:30 Low bond viscosity limit for strongly coupled systems under shock wave loading  
*Naimark Oleg (ICMM UB RAS, Perm, Russia)*
- 17:45 Betatron oscillations, synchrotron radiation and emittance of electron bunches accelerated in guiding structures  
*Veysman Mikhail Efimovich (JIHT RAS, Moscow, Russia), Andreev N. E., Kuznetsov S. V.*
- 18:00 Rotation of the dust structure in the region of the narrowing of the dc glow discharge current channel in a strong magnetic field  
*Dyachkov Lev Gavrilovich (JIHT RAS, Moscow, Russia), Dzlieva E. S., Ermolenko M. A., Novikov L. A., Pavlov S. I., Karasev V. Yu.*
- 18:15 Effect of the non-linear screening on thermodynamics of complex plasmas  
*Martynova Inna Aleksandrovna (JIHT RAS, Moscow, Russia), Iosilevskiy I. L.*
- 18:30 Melting of dusty plasma structures in a trap  
*Nikolaev Vladislav Sergeevich (MIPT, Dolgoprudny, Russia), Timofeev A. V.*
- 18:45 Charge of a single grain and the grain in a cloud: Theory and experiments  
*Zobnin Andrey Vjacheslavovich (JIHT RAS, Moscow, Russia), Usachev A. D., Lipaev A. M., Molotkov V. I., Pustyl'nik M. Y., Thoma M. A., Thomas H. M.*

**19:00– CLOSING CEREMONY**

- 19:15 Concluding words by K. V. Khishchenko, V. G. Sultanov