Tuesday, July 24, 2018
POSTER SESSION I: DUST FROM ASTEROIDS AND COMETS
5:30 p.m. Foyer

Djouadi Z. Maupin R. Brunetto R.
Vis-NIR Reflectance Micro-Spectroscopy of Interplanetary Dust Particles **[#6049]**
In this work we performed visible mid-infrared (Vis-NIR) micro-spectroscopy on IDPs and different minerals and meteorites. We report and discuss here the obtained preliminary results.

Vinnikov V. V. Gritsevich M.
Atmospheric Dynamics Simulation for Finely Dispersed Meteoric Dust **[#6164]**
We describe a model for simulation of meteoric dust dispersion in the atmosphere. The model could potentially facilitate probing meteoric particle clouds for spectral analysis as well as improve sample acquisition via high altitude weather balloons.

Sungatullin R. Kh. Glukhov M. S. Galiullin B. M. Sungatullina G. M. Bakhtin A. I. Vishnykov A. K. Vafina M. S. Gusev A. V. Kuzina D. M.
First Finds of Space Microspheres in the Evaporites of the Urals Foredeep, Russia **[#6291]**
In of salts of the Verkhnekamskoe deposit metal microspheres have been discovered, which are considered by as cosmic dust. The finds of magnetite microspheres can be related to external cosmic events and impact bombings in the Kungurian age.

Bakhtin A. I. Sungatullin R. Kh. Sonin G. V. Gusev A. V. Kuzina D. M. Sungatullina G. M.
Braking of Meteor Particles in the Atmosphere of the Earth and Creation of Magnetic Microspheres **[#6296]**
Calculations of the atmospheric braking (with a step of 2 km in height) of meteoric particles of native iron of spherical shape for different radiuses from 0.1 μm to 250 μm have been made.

Kuzina D. M. Yusupova A. R. Markov G. P. Nurgaliev D. K. Lemazina Yu. A. Vorob'ev V. V. Kadyrov R. I.
Micrometeorites from Lake Turgoyak, South Ural, Russia **[#6306]**
Micrometeorites from Lake Turgoyak, Russia studied using scanning electron microscopy and computed X-ray tomography. Difference in morphology, elemental composition and internal structure is shown.

Bulat S. A. Bulat E. S. Grokhovsky V. I. Muftakhetdinova R. F. Kolunin R. N. Tselmovich V. A. Sekatski S. K. Smirnov A. A. Ekaykin A. A. Petit J.-R.
Search for Antarctic Micrometeorites in Blue Ice Field, Lomonosov Mountains, Voltat Massive, Queen Maud Land, East Antarctica **[#6138]**
Antarctic micrometeorites, blue ice, Voltat massif. SEM and AFM. Treatment at IGE, CNRS-UGA. The sample 1–10 × more 2–3 μm particles (202–425 ppb) as compared to the sample #2 of 54 microparticles analyzed - no carbonaceous chondrites.

MacArthur J. L. Hicks L. J. Bridges J. C. Price M. C. Wickham-Eade J. E. Burchell M. J. Hansford G. M.
Comparing Aqueous Alteration in Comet Wild 2 and Carbonaceous Chondrites **[#6342]**
Our work strengthens the evidence for similarities between Comet Wild 2 and the carbonaceous chondrite parent bodies, not just in high temperature fragments like chondrules described previously, but also minerals resulting from aqueous alteration.

Muftakhetdinova R. F. Smirnov A. Bulat S. A. Grokhovsky V. I. Dietler G. Sekatskii S. K.
Atomic Force Microscope Studies of Micrometeorites Collected in Blue Ice Field of Antarctica **[#6058]**
In this work, we study two samples of cosmic dust entrapped into the blue ice collected nearby Wohlthat Mountains in Queen Maud Land, East Antarctica, were studied using an atomic force microscope-Bruker's Dimension FastScan AFM system.

Danilenko I. A. Baglaeva E. M. Petrova E. V. Yakovlev G. A. Seleznev A. A.
Identification of the Cosmic Spherules in the Modern Urban Sediments **[#6226]**
The study describes an attempt to check whether there are particles of extraterrestrial origin in the sediment of the industrial city of Ekaterinburg.

Ipatov S. I.
Migration of Interplanetary Dust Particles to the Earth and the Moon **[#6075]**
Probabilities of collisions of migrating interplanetary dust particles with the Earth, the Moon, and their embryos are studied for particles launched from asteroids, trans-Neptunian objects, and comets.

Bakhtin A. I. Sungatullin R. Kh. Tsel'movich V. A. Bakhmutov V. G. Sungatullina G. M. Gusev A. V. Kuzina D. M.
Differentiation Processes of Substance in Impact Events **[#6127]**
On the border of Lower Devonian deposits in the south-west of Ukraine, a zone with high values of remanent magnetization and magnetic susceptibility was identified. Microparticles of native iron and nickel, iron-nickel intermetallides are found.

Glukhov M. S. Sungatullin R. Kh. Galiullin B. M. Sungatullina G. M. Bakhtin A. I. Gusev A. V. Kuzina D. M.
Metallic Microspheres of Cosmic and Technogenic Origin **[#6202]**
The differences between technogenic and cosmic microspheres in chemical (presence/absence of carbon, wide/primitive composition of elements, absolute content of O) and mineral composition are revealed.

Frontasyeva M. V. Tselmovich V. A. Steinnes E.
Atmospheric Deposition of Cosmic Dust Studied by Moss Analysis **[#6160]**
Experimental observations of particles considered as cosmic dust in moss samples (Sanionia uncinata) collected in King George Island, highlands of Georgia, lowlands of Belarus and Tver Region of Russia are presented.