

Tuesday, March 22, 2016
POSTER SESSION I: CHONDRITES: CLASTS
 6:00 p.m. Town Center Exhibit Area

[T333]

Dobrica E. Brearley A. J. Ebel D. S. Weisberg M. K. Ziegler K. **POSTER LOCATION #505**
[A Highly Unusual Clast in Semarkona with a Complex Evolutionary History: Further Evidence of the Diversity of Solar Nebula Materials and Processes](#) [#2317]

We have discovered a complex clast in Semarkona. This object appears to be the first documented example of such clastic material in this meteorite.

Ruzicka A. M. Schepker K. L. Greenwood R. C. Franchi I. A. **POSTER LOCATION #506**
[Combined Chemical-Oxygen Isotope Study of Large Igneous Inclusions in Ordinary Chondrites](#) [#2230]

A combined geochemical and O isotope study of large igneous inclusions in ordinary chondrites suggest a variety of formation processes and settings.

Ebel D. S. Weisberg M. K. Dobrica E.
 Bigolski J. N. Brearley A. J. et al. **POSTER LOCATION #507**
[Micro-Inclusions in a Layered Clast in Semarkona](#) [#1779]

A unique ~6 mm diameter object in Semarkona (LL3.00) shows complex metal+Fe-oxide+FeS+FeO-free silicates core, a sulfide + oxide-free layer, and accreted micro-CAIs.

Niihara T. Misawa K. Yokoyama T. **POSTER LOCATION #508**
[Petrology and Mineralogy of an Igneous Clast in Northwest Africa 1665: Comparison with Alkali-Rich Igneous rock Fragments in Yamato-74442](#) [#1891]

We performed mineralogy and petrography of clasts in Northwest Africa 1685 comparison with those of alkali-rich rock fragments in Yamato-74442.

Corrigan C. M. Lunning N. G. **POSTER LOCATION #509**
[A Variety of Melt Clasts in Ordinary Chondrite Breccia Meteorite Hills 01004](#) [#2729]

Melted by impact / Antarctic meteorite / Many different clasts.

Goodrich C. A. Kring D. A. **POSTER LOCATION #510**
[A Large Igneous Clast in the Northwest Africa 092 Chondrite \(L3.7\): Xenolith from a Differentiated Parent Body or Product of an Ordinary Chondrite-Related Melt?](#) [#1233]

We describe a new 1-cm melt clast in L3.7 NWA 092 and investigate whether it is a xenolith from a differentiated body or a product of an OC-related melt.

Kuehner S. M. Wittke J. H. Ziegler K. Irving A. J. **POSTER LOCATION #511**
[Mineralogy and Oxygen Isotopic Composition of Exotic F6 Chondrite Clasts in the Cumberland Falls Aubrite](#) [#2304]

Black shock-melted F6 chondrite clasts in the Cumberland Falls aubrite contain distinctive sulfides and phosphides. Oxygen isotopes match those in NWA 7135.

Cervantes de la Cruz K. E. Ortega Gutiérrez F. Alba Aldave L. A.
 Reyes Salas A. M. Ángeles García B. S. et al. **POSTER LOCATION #512**
[Impact Origin of Dark Inclusion: Nuevo Mercurio \(c\) H5-6 Ordinary Chondrite](#) [#2992]

We show a dark inclusion in an equilibrated meteorite Nuevo Mercurio (c) and prove that it originated from a melt pocket-like fragment.

Johnson J. M. Zolensky M. E. Chan Q. Kring D. A.

POSTER LOCATION #513

[Intriguing Dehydrated Phyllosilicates Found in an Unusual Clast in the LL3.15 Chondrite Northwest Africa 6925 \[#1608\]](#)

Dehydrated clays abundant in an OC indicate wet past.

Greshake A. Hoppe P. Wirth R.

POSTER LOCATION #514

[D/H-Ratio and Microstructure of a Strongly Hydrated Microclast in the Rumuruti Chondrite Northwest Africa 6828 \[#1026\]](#)

The D/H ratio and microstructure of a hydrous microclast in the R chondrite NWA 6828 support an asteroidal origin of the Earth's water and volatile content.