

Curriculum Vitae

Munir Humayun

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General Information

University address: National High Magnetic Field Laboratory and Department of Earth, Ocean & Atmospheric Science
College of Arts and Sciences
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Florida State University
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Professional Preparation

1994 Ph.D., University Of Chicago. Major: Geophysical Sciences. Geochemistry.
Supervisor: Robert N. Clayton.

Unspecified Name. (1994). *Potassium isotope cosmochemistry: implications for volatile depletion and the origins of the Earth, Moon and meteorites*. Unpublished doctoral dissertation, University Of Chicago.

1987 B.S., University of Peshawar. Major: Geology. With Honors.

Postdegree Education and Training

1994–1996 Carnegie Postdoctoral Fellow, Department of Terrestrial Magnetism, Carnegie Institution of Washington.

Professional Experience

2010–present Professor, Earth, Ocean & Atmospheric Sci, Florida State University.

2004–2010 Associate Professor, Earth, Ocean & Atmospheric Science, Florida State University.

Honors, Awards, and Prizes

Llewellyn John and Harriet Manchester Award for Excellence in Undergraduate Teaching, The University of Chicago (2004).

F. W. Clarke Medal, Geochemical Society (1998).

Nathan Sugarman Award for Excellence in Graduate Student Research, The University of Chicago (1993). (\$2,000).

Robert R. McCormick Fellowship, The University of Chicago (1987). (\$2,000).

Gold Medal, University of Peshawar (1986).

Current Membership in Professional Organizations

American Geophysical Union

Geochemical Society

Meteoritical Society

Teaching

Courses Taught

Energy, Resources, and the Environment (GLY3039)

Learning Community Colloquium (HUM1921)

Advanced Topics in Geochemistry (GLY5297)

Laboratory Methods in Sedimentology (GLY4551-L)

Principles of Geochemistry (GLY4240)

Experiments in Modern Language (FOL3930)

Nuclear Geology (GLY5265)

Doctoral Seminar (GLY6982)

Graduate Seminar (GLY5931)

Planetary Geology (GLY1042)

Dynamic Earth (GLY1000)

Doctoral Committee Chair

Gaboardi, M. M., graduate. (2009).

Hu, L., doctoral candidate.

Yang, S., doctoral student.

Doctoral Committee Cochair

Tremaine, D. M., doctoral candidate. (2013).

Doctoral Committee Member

Mallick, S., graduate. (2011).
Tibbetts, N. J., graduate. (2010).
Roy, R., doctoral candidate.
Eller, V. A., doctoral student.
Wang, Z., doctoral student.

Doctoral Committee University Representative

McGlinchey, D. C., graduate. (2012).
Mitchell, J. P., graduate. (2012).
Bender, P. C., graduate. (2011).
Rojas, A., graduate. (2011).
Gihring, T. M., graduate. (2009).
Johnson, E. D., graduate. (2008).
Avila Coronado, M. L., doctoral candidate.
Tai, Pei-Luan, doctoral candidate.

Master's Committee Chair

Pekeroglu, E., graduate. (2012).
Deng, H., graduate. (2004).
Qin, L., graduate. (2004).

Master's Committee Member

Rolison, J. M., graduate. (2012).
Dial, A. R., student. (2013).
Lieberman, E. B., student. (2013).

Research and Original Creative Work

Publications

Refereed Journal Articles

- Horstmann, M., Humayun, M., Fischer-Gödde, M., & Bischoff, A. (submitted). Enstatite chondrite-like metal and sulfide in Almahata Sitta fine-grained ureilites and indications for partial metallic melts on the ureilite parent body. *Meteoritics and Planetary Science*. Manuscript submitted for publication.
- Niekirk, D., Keil, K., & Humayun, M. (submitted). Petrogenesis of anomalous Queen Alexandra Range enstatite meteorites and their relationship to enstatite chondrites, primitive enstatite achondrites, and aubrites. *Meteoritics and Planetary Science*. Manuscript submitted for publication.
- Goldberg, K., & Humayun, M. (submitted). Redox-sensitive elements in the Irati oil shales: Environmental controls on the deposition of organic-rich rocks. *Chemical Geology*. Manuscript submitted for publication.
- Horstmann, M., Humayun, M., Harries, D., Langenhorst, F., Chabot, N., Bischoff, A., & Zolensky, M. (in press). Wüstite in the fusion crust of Almahata Sitta sulfide-metal assemblage MS-166: Evidence for oxygen in metallic melts. *Meteoritics and Planetary Science*.
- Davis, F. A., Humayun, M., Hirschmann, M. M., & Cooper, R. S. (2013). Experimentally determined mineral/melt partitioning of first-row transition elements (FRTE) during partial melting of peridotite at 3 GPa. *Geochimica et Cosmochimica Acta*, 104, 232-260. doi:10.1016/j.gca.2012.11.009
- Humayun, M. (2013). A Unique Piece of Mars. *Science*, 339(6121), 771-772. doi:10.1126/science.1232490
- Lee, M.-K., Natter, M., Keevan, J., Guerra, K., Saunders, J., Uddin, A., Humayun, M., Wang, Y., & Keimowitz, A. R. (2013). Assessing effects of climate change on biogeochemical cycling of trace metals in alluvial and coastal watersheds. *British Journal of Environment and Climate Change*, 3, 44-66.
- Wittig, N., Humayun, M., Brandon, A. D., Huang, S., & Leya, I. (2013). Coupled W-Os-Pt isotope systematics in IVB iron meteorites: In situ neutron dosimetry for W isotope chronology. *Earth and Planetary Science Letters*, 361, 152-161. doi:10.1016/j.epsl.2012.10.013

- Humayun, M. (2012). Chondrule cooling rates inferred from diffusive profiles in metal lumps from the Acfer 097 CR2 chondrite. *Meteoritics & Planetary Science*, 47(7), 1191-1208. doi:10.1111/j.1945-5100.2012.01371.x
- Tenner, T. J., Hirschmann, M. M., & Humayun, M. (2012). The effect of H₂O on partial melting of garnet peridotite at 3.5 GPa. *Geochemistry Geophysics Geosystems*, 13, Q03016. doi:10.1029/2011GC003942
- van Acken, D., Humayun, M., Brandon, A. D., & Peslier, A. H. (2012). Siderophile trace elements in metals and sulfides in enstatite achondrites record planetary differentiation in an enstatite chondritic parent body. *Geochimica et Cosmochimica Acta*, 83, 272-291. doi:10.1016/j.gca.2011.12.025
- Davis, F. A., Hirschmann, M. M., & Humayun, M. (2011). The composition of the incipient partial melt of garnet peridotite at 3 GPa and the origin of OIB. *Earth and Planetary Science Letters*, 308(3-4), 380-390. doi:10.1016/j.epsl.2011.06.008
- Humayun, M. (2011). A model for osmium isotopic evolution of metallic solids at the core-mantle boundary. *Geochemistry Geophysics Geosystems*, 12, Q03007. doi:10.1029/2010GC003281
- Shirai, N., & Humayun, M. (2011). Mass independent bias in W isotopes in MC-ICP-MS instruments. *Journal of Analytical Atomic Spectrometry*, 26(7), 1414-1420. doi:10.1039/c0ja00206b
- van Acken, D., Brandon, A. D., & Humayun, M. (2011). High-precision osmium isotopes in enstatite and Rumuruti chondrites. *Geochimica et Cosmochimica Acta*, 75(14), 4020-4036. doi:10.1016/j.gca.2011.04.019
- Goldberg, K., & Humayun, M. (2010). The applicability of the Chemical Index of Alteration as a paleoclimatic indicator: An example from the Permian of the Parana Basin, Brazil. *Palaeogeography Palaeoclimatology Palaeoecology*, 293(1-2), 175-183. doi:10.1016/j.palaeo.2010.05.015
- Humayun, M., Davis, F. A., & Hirschmann, M. M. (2010). Major element analysis of natural silicates by laser ablation ICP-MS. *Journal of Analytical Atomic Spectrometry*, 25(7), 998-1005. doi:10.1039/c001391a
- Danielson, L. R., Richter, K., & Humayun, M. (2009). Trace element chemistry of Cumulus Ridge 04071 pallasite with implications for main group pallasites. *Meteoritics & Planetary Science*, 44(7), 1019-1032.
- Gaboardi, M., & Humayun, M. (2009). Elemental fractionation during LA-ICP-MS analysis of silicate glasses: implications for matrix-independent standardization. *Journal of Analytical Atomic Spectrometry*, 24(9), 1188-1197. doi:10.1039/b900876d

- Huang, S., Abouchami, W., Blichert-Toft, J., Clague, D. A., Cousens, B. L., Frey, F. A., & Humayun, M. (2009). Ancient carbonate sedimentary signature in the Hawaiian plume: Evidence from Mahukona volcano, Hawaii. *Geochemistry Geophysics Geosystems*, *10*, Q08002. doi:10.1029/2009GC002418
- Humayun, M. (2009). 2009 Leonard Medal for Lawrence Grossman Award. *Meteoritics & Planetary Science*, *44*, A5-A6.
- Righter, K., Humayun, M., Campbell, A. J., Danielson, L., Hill, D., & Drake, M. J. (2009). Experimental studies of metal-silicate partitioning of Sb: Implications for the terrestrial and lunar mantles. *Geochimica et Cosmochimica Acta*, *73*(5), 1487-1504. doi:10.1016/j.gca.2008.11.042
- Chabot, N. L., Campbell, A. J., McDonough, W. F., Draper, D. S., Agee, C. B., Humayun, M., Watson, H. C., Cottrell, E., & Saslow, S. A. (2008). The Fe-C system at 5 GPa and implications for Earth's core. *Geochimica et Cosmochimica Acta*, *72*(16), 4146-4158. doi:10.1016/j.gca.2008.06.006
- Ghosh, S., Xu, Y., Humayun, M., & Odom, L. (2008). Mass-independent fractionation of mercury isotopes in the environment. *Geochemistry Geophysics Geosystems*, *9*, Q03004-Q03004. doi:10.1029/2007GC001827
- Qin, L., & Humayun, M. (2008). The Fe/Mn ratio in MORB and OIB determined by ICP-MS. *Geochimica et Cosmochimica Acta*, *72*(6), 1660-1677. doi:10.1016/j.gca.2008.01.012
- Rankenburg, K., Humayun, M., Brandon, A. D., & Herrin, J. S. (2008). Highly siderophile elements in ureilites. *Geochimica et Cosmochimica Acta*, *72*(18), 4642-4659. doi:10.1016/j.gca.2008.07.003
- Righter, K., Humayun, M., & Danielson, L. (2008). Partitioning of palladium at high pressures and temperatures during core formation. *Nature Geoscience*, *1*(5), 321-323. doi:10.1038/geo180
- Huang, S., Humayun, M., & Frey, F. A. (2007). Iron/Manganese ratio and manganese content in shield lavas from Ko'olau Volcano, Hawai'i. *Geochimica et Cosmochimica Acta*, *71*(18), 4557-4569. doi:10.1016/j.gca.2007.07.013
- Humayun, M., & Brandon, A. D. (2007). S-Process Implications from Osmium Isotope Anomalies in Chondrites. *Astrophysical Journal*, *664*(1), L59-L62. doi:10.1086/520636
- Humayun, M., Simon, S. B., & Grossman, L. (2007). Tungsten and hafnium distribution in calcium-aluminum inclusions (CAIs) from Allende and Efremovka. *Geochimica et Cosmochimica Acta*, *71*(18), 4609-4627. doi:10.1016/j.gca.2007.07.014
- Puchtel, I. S., Humayun, M., & Walker, R. J. (2007). Os-Pb-Nd isotope and highly siderophile and lithophile trace element systematics of komatiitic rocks from the Volotsk suite, SE

- Baltic Shield. *Precambrian Research*, 158(1-2), 119-137.
doi:10.1016/j.precamres.2007.04.004
- Rankenburg, K., Brandon, A. D., & Humayun, M. (2007). Osmium isotope systematics of ureilites. *Geochimica et Cosmochimica Acta*, 71(9), 2402-2413.
doi:10.1016/j.gca.2007.02.015
- Chabot, N. L., Campbell, A. J., Jones, J. H., Humayun, M., & Lauer, H. V. (2006). The influence of carbon on the partitioning behavior of siderophile elements during planetary evolution. *Geochimica Cosmochimica Acta*, 70, 1322-1335.
- Chabot, N., Campbell, A., Jones, J., Humayun, M., & Lauer, H. (2006). The influence of carbon on trace element partitioning behavior. *Geochimica et Cosmochimica Acta*, 70(5), 1322-1335. doi:10.1016/j.gca.2005.11.011
- Torres, V. J., Pishchany, G., Humayun, M., Schneewind, O., & Skaar, E. P. (2006). *Staphylococcus aureus* IsdB is a hemoglobin receptor required for heme iron utilization. *Journal of Bacteriology*, 188(24), 8421-8429. doi:10.1128/JB.01335-06
- Brandon, A., Humayun, M., Puchtel, I., Leya, I., & Zolensky, M. (2005). Osmium isotope evidence for an s-process carrier in primitive chondrites. *Science*, 309(5738), 1233-1236. doi:10.1126/science.1115053
- Brandon, A., Humayun, M., Puchtel, I., & Zolensky, M. (2005). Re-Os isotopic systematics and platinum group element composition of the Tagish Lake carbonaceous chondrite. *Geochimica et Cosmochimica Acta*, 69(6), 1619-1631. doi:10.1016/j.gca.2004.10.005
- Campbell, A. J., & Humayun, M. (2005). Compositions of group IVB iron meteorites and their parent melt. *Geochimica et Cosmochimica Acta*, 69(19), 4733-4744. doi:10.1016/j.gca.2005.06.004
- Campbell, A., Humayun, M., & Weisberg, M. (2005). Compositions of unzoned and zoned metal in the CB₆ chondrites Hammadah al Hamra 237 and Queen Alexandra Range 94627. *Meteoritics & Planetary Science*, 40(8), 1131-1148.
- Puchtel, I., Brandon, A., Humayun, M., & Walker, R. (2005). Evidence for the early differentiation of the core from Pt-Re-Os isotope systematics of 2.8-Ga komatiites. *Earth and Planetary Science Letters*, 237(1-2), 118-134. doi:10.1016/j.epsl.2005.04.023
- Puchtel, I., & Humayun, M. (2005). Highly siderophile element geochemistry of ¹⁸⁷Os-enriched 2.8 ga kostomuksha komatiites, Baltic shield. *Geochimica et Cosmochimica Acta*, 69(6), 1607-1618. doi:10.1016/j.gca.2004.09.007

- Richter, K., Campbell, A., & Humayun, M. (2005). Diffusion of trace elements in FeNi metal: Application to zoned metal grains in chondrites. *Geochimica et Cosmochimica Acta*, 69(12), 3145-3158. doi:10.1016/j.gca.2005.01.010
- Rushmer, T., Petford, N., Humayun, M., & Campbell, A. (2005). Fe-liquid segregation in deforming planetesimals: Coupling Core-Forming compositions with transport phenomena. *Earth and Planetary Science Letters*, 239(3-4), 185-202. doi:10.1016/j.epsl.2005.08.006
- Campbell, A., & Humayun, M. (2004). Formation of metal in the CH chondrites ALH 85085 and PCA 91467. *Geochimica et Cosmochimica Acta*, 68(16), 3409-3422. doi:10.1016/j.gca.2003.11.007
- Humayun, M., & Koeberl, C. (2004). Potassium isotopic composition of Australasian tektites. *Meteoritics & Planetary Science*, 39(9), 1509-1516.
- Humayun, M., Qin, L., & Norman, M. (2004). Geochemical evidence for excess iron in the mantle beneath Hawaii. *Science*, 306(5693), 91-94. doi:10.1126/science.1101050
- Puchtel, I., Brandon, A., & Humayun, M. (2004). Precise Pt-Re-Os isotope systematics of the mantle from 2.7-Ga komatiites. *Earth and Planetary Science Letters*, 224(1-2), 157-174. doi:10.1016/j.epsl.2004.04.035
- Puchtel, I., Humayun, M., Campbell, A., Sproule, R., & Lesher, C. (2004). Platinum group element geochemistry of komatiites from the Alexo and Pyke Hill areas, Ontario, Canada. *Geochimica et Cosmochimica Acta*, 68(6), 1361-1383. doi:10.1016/j.gca.2003.09.013
- Richter, K., Campbell, A., Humayun, M., & Hervig, R. (2004). Partitioning of Ru, Rh, Pd, Re, Ir, and Au between Cr-bearing spinel, olivine, pyroxene and silicate melts. *Geochimica et Cosmochimica Acta*, 68(4), 867-880. doi:10.1016/j.gca.2003.07.005
- Skaar, E., Humayun, M., Bae, T., DeBord, K., & Schneewind, O. (2004). Iron-source preference of *Staphylococcus aureus* infections. *Science*, 305(5690), 1626-1628. doi:10.1126/science.1099930
- Brandon, A., Walker, R., Puchtel, I., Becker, H., Humayun, M., & Revillon, S. (2003). ¹⁸⁶Os-¹⁸⁷Os systematics of Gorgona Island komatiites: implications for early growth of the inner core. *Earth and Planetary Science Letters*, 206(3-4), 411-426. doi:10.1016/S0012-821X(02)01101-9
- Campbell, A., & Humayun, M. (2003). Formation of metal in Grosvenor Mountains 95551 and comparison to ordinary chondrites. *Geochimica et Cosmochimica Acta*, 67(13), 2481-2495. doi:10.1016/S0016-7037(00)01405-9

- Campbell, A., Simon, S., Humayun, M., & Grossman, L. (2003). Chemical evolution of metal in refractory inclusions in CV3 chondrites. *Geochimica et Cosmochimica Acta*, 67(17), 3119-3134. doi:10.1016/S0016-7037(02)00837-2
- Chabot, N., Campbell, A., Jones, J., Humayun, M., & Agee, C. (2003). An experimental test of Henry's Law in solid metal-liquid metal systems with implications for iron meteorites. *Meteoritics & Planetary Science*, 38(2), 181-196.
- Humayun, M., & O'Neil, J. (2003). A special issue dedicated to Robert N. Clayton. *Geochimica et Cosmochimica Acta*, 67(17), 3097-3099. doi:10.1016/S0016-7037(03)00381-8
- Jurewicz, A., Burnett, D., Wiens, R., Friedmann, T., Hays, C., Hohlfelder, R., Nishiizumi, K., Stone, J., Woolum, D., Becker, R., Butterworth, A., Campbell, A., Ebihara, M., Franchi, I., Heber, V., Hohenberg, C., Humayun, M., McKeegan, K., McNamara, K., Meshik, A., Pepin, R., Schlutter, D., & Wieler, R. (2003). The Genesis solar-wind collector materials. *Space Science Reviews*, 105(3-4), 535-560. doi:10.1023/A:1024469927444
- Kopp, R., & Humayun, M. (2003). Kinetic model of carbonate dissolution in Martian meteorite ALH84001. *Geochimica et Cosmochimica Acta*, 67(17), 3247-3256. doi:10.1016/S0016-7037(02)01114-6
- Mazmanian, S., Skaar, E., Gaspar, A., Humayun, M., Gornicki, P., Jelenska, J., Joachmiak, A., Missiakas, D., & Schneewind, O. (2003). Passage of heme-iron across the envelope of *Staphylococcus aureus*. *Science*, 299(5608), 906-909. doi:10.1126/science.1081147
- Campbell, A. J., Humayun, M., & Zanda, B. (2002). Partial condensation of volatile elements in Renazzo chondrules. *Geochimica et Cosmochimica Acta*, 66(15A), A117.
- Campbell, A., & Humayun, M. (2002). Condensation of metal in a CH chondrite. *Meteoritics & Planetary Science*, 37(7), A29.
- Campbell, A., Humayun, M., & Weisberg, M. (2002). Siderophile element constraints on the formation of metal in the metal-rich chondrites Bencubbin, Weatherford, and Gujba. *Geochimica et Cosmochimica Acta*, 66(4), 647-660. doi:10.1016/S0016-7037(01)00794-3
- Deng, H., Campbell, A., & Humayun, M. (2002). Platinum group elements in sulfides from Yangliuping Cu-Ni-Pt-Pd deposit in Sichuan, China. *Geochimica et Cosmochimica Acta*, 66(15A), A177.
- Humayun, M., & Campbell, A. (2002). The duration of ordinary chondrite metamorphism inferred from tungsten microdistribution in metal. *Earth and Planetary Science Letters*, 198(1-2), 225-243. doi:10.1016/S0012-821X(02)00500-9

- Puchtel, I. S., Humayun, M., Campbell, A. J., Sproule, R. A., & Leshner, C. M. (2002). PGEs in Abitibi komatiites. *Geochimica et Cosmochimica Acta*, *66(15A)*, A616.
- Righter, K., Campbell, A., & Humayun, M. (2002). Diffusion in metal: application to zoned metal grains in chondrites. *Geochimica et Cosmochimica Acta*, *66(15A)*, A639.
- Rushmer, T., Humayun, M., & Campbell, A. (2002). Siderophile elements in dynamically segregated metallic liquids. *Geochimica et Cosmochimica Acta*, *66(15A)*, A656.
- Zanda, B., Humayun, M., Hewins, R., Bourot-Denise, M., & Campbell, A. (2002). The relationship between volatile element patterns and chondrule textures in CRs and OCs. *Geochimica et Cosmochimica Acta*, *66(15A)*, A869-A869.
- Campbell, A., Humayun, M., Meibom, A., Krot, A., & Keil, K. (2001). Origin of zoned metal grains in the QUE94411 chondrite. *Geochimica et Cosmochimica Acta*, *65(1)*, 163-180. doi:10.1016/S0016-7037(00)00526-3
- Humayun, M. (2001). Comment on "Assessing the implications of K isotope cosmochemistry for evaporation in the preplanetary solar nebula" by E. Young. *Earth and Planetary Science Letters*, *192(1)*, 93-99. doi:10.1016/S0012-821X(01)00433-2
- Puchtel, I., & Humayun, M. (2001). Platinum group element fractionation in a komatiitic basalt lava lake. *Geochimica et Cosmochimica Acta*, *65(17)*, 2979-2993. doi:10.1016/S0016-7037(01)00642-1
- Campbell, A., & Humayun, M. (2000). Trace-siderophile-element distributions in Bencubbin metal. *Meteoritics & Planetary Science*, *35*, A38.
- Campbell, A., Humayun, M., & Weisberg, M. (2000). Siderophile-element distributions in zoned metal grains in Hammadah al Hamra 237. *Meteoritics & Planetary Science*, *35*, A38-A39.
- Humayun, M., & Campbell, A. (2000). Tungsten microdistribution in ordinary chondrite metal. *Meteoritics & Planetary Science*, *35*, A79.
- Puchtel, I., & Humayun, M. (2000). Platinum group elements in Kostomuksha komatiites and basalts: Implications for oceanic crust recycling and core-mantle interaction. *Geochimica et Cosmochimica Acta*, *64(24)*, 4227-4242. doi:10.1016/S0016-7037(00)00492-0
- Campbell, A., & Humayun, M. (1999). Trace element microanalysis in iron meteorites by laser ablation ICPMS. *Analytical Chemistry*, *71(5)*, 939-946. doi:10.1021/ac9808425
- Humayun, M. (1999). F. W. Clarke Award acceptance speech. *Geochimica et Cosmochimica Acta*, *63(16)*, 2479. doi:10.1016/S0016-7037(99)00147-7

- HUMAYUN, M., & CLAYTON, R. (1995). Potassium Isotope Cosmochemistry - Genetic-Implications of Volatile Element Depletion. *Geochimica et Cosmochimica Acta*, 59(10), 2131-2148. doi:10.1016/0016-7037(95)00132-8
- HUMAYUN, M., & CLAYTON, R. (1995). Potassium Isotopic Constraints on Nebular Processes. *Meteoritics*, 30(5), 522-523.
- HUMAYUN, M., & CLAYTON, R. (1995). Precise Determination of the Isotopic Composition of Potassium - Application to Terrestrial Rocks and Lunar Soils. *Geochimica et Cosmochimica Acta*, 59(10), 2115-2130. doi:10.1016/0016-7037(95)00131-X

Refereed Encyclopedia Entries

- Humayun, M. (1996). Solar System. In *McGraw-Hill Encyclopedia of Science and Technology Yearbook* (p. 140-141). McGraw-Hill.

Refereed Proceedings

- Campbell, T. J., & Humayun, M. (2012). Siderophile element abundances in the Ni-rich ataxites Gebel Kamil, Dumont and Tinnie. In *Lunar and Planetary Science Conference*. XLIII, Abstract #2833.
- Elmaleh, A., Zanda, B., Hewins, R. H., Goepel, C., Fieni, C., Pont, S., & Humayun, M. (2012). Early stages of hydrothermal alteration in anomalous primitive CCs NWA 5958 and Paris. In *75th Annual Meeting of the Meteoritical-Society, Cairns, Australia* (pp. A127). *Meteoritics & Planetary Science* (47).
- Horstmann, M., Humayun, M., Harries, D., Langenhorst, F., Chabot, N. L., & Bischoff, A. (2012). Wüstite in the Almahata Sitta polymict ureilite: implications for oxygen during asteroidal differentiation. In *Lunar and Planetary Science Conference*. XLIII, Abstract #1876.
- Horstmann, M., Humayun, M., Harries, D., Langenhorst, F., Chabot, N. L., Bischoff, A., & Zolensky, M. E. (2012). Wüstite in the Fusion Crust of the Ms-166 Almahata Sitta Metal-Sulfide Assemblage. In *75th Annual Meeting of the Meteoritical-Society, Cairns, Australia* (pp. A194). *Meteoritics & Planetary Science* (47).
- Humayun, M., Brandon, A. D., & Righter, K. (2012). Models for interpreting tungsten isotope anomalies in the Earth's crust. In *Fall Meeting, American Geophysical Union*. EOS Transactions of the American Geophysical Union (93).
- Humayun, M., Jurewicz, A. J. G., Olinger, C., & Burnett, D. S. (2012). Evidence for Unfractionated Magnesium Isotopes in Genesis SoS Wafers. In *75th Annual Meeting of*

- the Meteoritical-Society, Cairns, Australia* (pp. A202). *Meteoritics & Planetary Science* (47).
- Humayun, M., & Weisberg, M. K. (2012). A possible ordinary chondrite affinity for metal from the unique chondrite NWA 5492. In *Lunar and Planetary Science Conference. XLIII*, Abstract #1458.
- Humayun, M., Wittig, N., Brandon, A. D., Hu, L., Huang, S., & Leya, I. (2012). Better chronology and exposure history from *in situ* neutron dosimetry of IVB irons. In *75th Annual Meeting of the Meteoritical Society, Cairns, Australia* (pp. A203). *Meteoritics and Planetary Science* (47).
- Jambon, A., Humayun, M., Barrat, J.-A., Greenwood, R. C., & Franchi, I. (2012). Northwest Africa 6693: A unique achondritic cumulate. In *Lunar and Planetary Science Conference. XLIII*, Abstract #2099.
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Nonrefereed Book Chapters

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Contracts and Grants

Contracts and Grants Funded

- Humayun, M. (Feb 2013–Feb 2016). *Magnesium Isotopic Composition Of The Solar Wind By ICP*. Funded by National Aeronautics & Space A. (NNX13AD11G). Total award \$130,798.
- Landing, W. M., Salters, V. J., & Humayun, M. (Apr 2011–Mar 2013). *Acquisition of a Sector Magnet ICPMS*. Funded by National Science Foundation. (1061354). Total award \$250,000.
- Humayun, M. (Aug 2010–Jul 2013). *Siderophile Element Constraints on Solar System Process*. Funded by National Aeronautics & Space A. (NNX10AI37G). Total award \$345,000.
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Postdoctoral Supervision

Mayer, B. (2013–present).

Wittig, N. (2010–12).

Shirai, N. (2008–10).

Huang, S. (2005–08).

Rankenburg, K. (2006–07).

Gangopadhyay, A. (2005–06).

Puchtel, I. S. (1999–2004).

Campbell, A. J. (1998–2004).

Service

Florida State University

FSU Department Service

Chair, Admissions Committee, Geological Sciences (2006–present).

Member, Faculty Search Committee, Chemical Oceanography (2012–2013).

Member, Faculty Search Committee, Biogeochemistry (2011–2012).

Member, Faculty Search Committee, Petrology (2007–2008).

Member, Entrance Committee, Geological Sciences (2007).

The Profession

Reviewer or Panelist for Grant Applications

Deutsche Forschungsgemeinschaft (2013).

NASA (2013).

NSF (2012).

Deutsche Forschungsgemeinschaft (2011).

Deutsche Forschungsgemeinschaft (2011).

NASA (2010).

NASA (2004–2005).

NASA (2001–2002).

Service to Professional Associations

Chair, Joint Publications Committee, Geochemical Society, Meteoritical Society: Joint Publications Committee (2012–present).

Member, Joint Publications Committee, Geochemical Society, Meteoritical Society: Joint Publications Committee (2011–present).

Member, Joint Assembly Program Committee, American Geophysical Union, Joint Assembly Program Committee (2007–2008).