

APPENDIX A

First and foremost, we would like to thank the Critical Materials Institute (CMI) who saw the value of the exhibit and approved its concept. Without CMI’s insight, technical and intellectual provision to review exhibit ideas and components, and financial support to pursue museum quality specimens, this exhibit would not exist. CMI readily bequeathed the critical materials exhibit to the CSM Geology Museum, delighted that approximately 40,000 visitors would experience the exhibit annually.

Additionally, the following is a list of all who have made this exhibit possible, including CMI and CSM faculty and staff, volunteers, donors, and partners.

CMI

- **Alex King and Ms. Cynthia Feller** - project approval, material reviews, support
- **Roderick Eggert** – CMI/CSM support and review
- **Carol Berger** - CMI budget oversight
- **Vitalij Pecharsky** CMI/ISU phosphor display photo contributions and recommendations
- **Melinda Thach** - CMI web support and review, communications with CMI members
- **Cynthia Howell** – CMI/CSM exhibit idea developer/ planner, graduate student mentor
- **Mandi Hutchinson** – CSM graduate student, CMI exhibit designer and creator, education and outreach assistant, museum liaison
- **Ames Laboratory: Ikenna Nledbedim, Denis Prodius, Anja Mudring** - magnet recycling samples and video

CSM Geology Museum staff and volunteers

- **Bruce Geller** - project developer, exhibit oversight, allowance of space in the museum for the exhibit, recommended team members for exhibit development
- **Ed. Raines** - display curator, mineral acquisition oversight and negotiations
- **Dan Wray** - volunteer, construction of display staging props, and secure display housing
- **Ken Kucera** - volunteer, social media promotor
- **Wesley Buchanan** – assistance with setup and open house prep
- **Edward Pancost** - assistance with setup and open house prep
- **Philip Persson** – assistance with open house tours
- **Lilly Wavering** – assistance with open house
- **Jessica Wolf** – assistance with open house

CSM faculty/staff/student donors, facilitators, and volunteers:

- **CMI: Maureen Allen** - incandescent light (CMI)
- **KIEM: Mark Strauss** – RE-oxide powders
- **KIEM: Alyaa Elramady** – RE-oxide powders
- **KIEM: Patrick Eduafo** – metallurgical extraction samples and flowsheet from CFL recycling research
- **Tim Ohno** - CdTe and thin film research samples and solar tech advising
- **Katherina Pfaff** – SEM-based quantitative mineralogical analysis and mineral map
- **Robert Lee** – facilitation of solar PV system installation
- **Mike Ray** - facilitation of solar PV system installation
- **Edward Brown** - facilitation of solar PV system installation
- **Rueben Collins** - solar tech. advising
- **Marcello Simoes** - wind tech advising
- **Daniel Mawhirter** – video display programming
- **CCIT: Jeff Loker** – video display setup and assistance
- **Melody Francisco** – assistance with acquisitions and events
- **Kristi Hall** – assistance with acquisitions and events
- **Chris Caldwell** – assistance with budget and events
- **Trevor Hall** – video and social media support

Donor Partners:

- **Primus Windpower: Ken Kotalik and Randall Brodsky** – demo Air Silent X wind turbine with “quiet blue blades” showing cut-out of nacelle with magnets
- **EPRI: Cara Libby** - Solar Frontier CIGS PV module
- **First Solar: Gang Xiong** – First Solar CdTe PV module
- **CSM and Starfire Energy: Joe Beach** – Facilitating donation of two PV modules, recommendations
- **RRCC and Solar Energy Environments: Troy Wanek** – time and expertise for installation of solar PV system to power the exhibit
- **RRCC and Voltking Electric: Tim Kjensrud** – energy monitoring system, advising for display staging
- **Straightedge, Inc. – William Brunner**
- **Rare Element Resources: George Byers, John Ray, Henry Kasaini, Robin Lee** – REE metallurgical process samples, flow sheet, and video
- **USGS: Brad Van Gosen** - Mountain Pass REE deposit samples, permission to use photo of Mtn. Pass mine, and advising
- **Rockwood Lithium: Jeff Davis:** spodumene ore samples and lithium info book

- **FIPR: Patrick Zhang** - phosphate ore materials and information (CMI member)
- **Matthias Johnson** – Hard disk drives
- **Best Buy in Lakewood** – display demo phones
- **Earth Science Museum: Harvey Jong** – permission to use smartphone minerals infographic

Vendors who contributed a little extra with time, expertise, and discounts:

- **Collectors Edge Fine Minerals: Steve Behling** – discount on high quality RE-mineral specimens
- **Crystal Classics Fine Minerals Ltd.: Ian and Diana Bruce** – discount on high quality RE-mineral specimens
- **Rattlesnake Magnets: Dale Young** – RE-magnet spinning icosahedron concept and kit
- **Great Circle Promotions: Kevin Shaw** – recommending Blue Goose Inc. for this project
- **Blue Goose Inc.: Don Woodard** – video display stand design and construction
- **Mr. Graham Sutton** – exhibit cases
- **ITS West** – exhibit lighting

Loans:

Marsh Minerals: Sherman Marsh –monazite specimen from Colorado

Kent Havens - aeschynite specimen from Colorado

Stephen Zahony –crystalline lab-grown rare earth sulfate and acetate specimens