

SAGE faculty meeting  
01/21/2022

Lu: SFIS will tell us in March; doesn't seem good  
got a call from UNM Los Alamos - Betsy. Not sure if they'll be able to host us, also March.  
UNM Socorro? If whole state shut down, all campuses. Only way is to stay all private;  
Residence Inn?  
4 students per room, conference room...

---

Welcome Nadine! Seismic group: Complete  
weekly meetings on Monday; Moving along

Darcy: take a few minutes to introduce ourselves?

Akram: Hi there; good to see you again; talking on Monday. At Socorro in PASSCAL.

Danny: Reno; Ormat, SAGE 2009, former TA and manager, working in EM, helping with curriculum committee. Now that there's big seismic group together, will come to you with questions. Also on SAGE board. 501c3; have a board. Danny is secretary/treasurer.

John: VP of board. Founding member, still active, retired from UTD seismic. Gravity for SAGE.

Jared: USGS, Menlo Park CA. Expertise is EM, help with field work mainly.

Oliver: 2019 SAGEr, worked MTArray. webmaster, note-taker, camp manager, starting at Georgia Tech for PhD.

Lu: looking to post minutes publicly soon!

Darcy: potential fields and EM, currently doing program management for USGS

Paul: USGS Denver, EM geophysicist. SAGE since 2008 teaching EM, kind of the scientific/research director. Will talk later about permit going into Valles Caldera

Megan: still new, never been to SAGE yet; started as USGS doing potential fields mapping in CA, did grad work broadband with PASSCAL in S. America, did postdoc in USGS, 10 years of teaching, now at WGS doing gravity and mag mapping to map active faults and do preparedness work.

Shari: field geologist and geophysicist at NMBG; Heat flow-focused, manage geothermal assessment program. Temperature logging truck, now modernizing and using DTS in streams, trying to tie hot water to other geophysics. Mainly worked in the Jemez Mountains.

David: from British Columbia; met before, fellow Canadian. Joined in 2019 for vibroseis.

Nadine: excited to join, hoping to help with active seismic!

---

Shari: just notified of COVID exposure

Lu: UNM Los Alamo locking down; hot zone right now.

As we have a solid group, I know we all have lives and jobs and families, sometimes our presence waxes and wanes, but hopefully we can support each other. SAGE is a labor of love, and sometimes it can't always hit the top of the list. If something happens, let us know; sometimes it's hard to keep things straight otherwise.

Finances: pretty upbeat. Got email from Catherine, SEG, looking for final report. Wrote proposal for 2021, said ending in December; final report not due until February or so. However, need proposal for this year; Darcy, is next week good?

Darcy: Yes

Lu: only \$10,000 expected this year from SEG; do expect final report, but good thing because makes us do some tweaks, lines up with 501c3 report we need to do.

Chevron \$25,000

Exxon \$35,000 invoiced

got \$500 donation

preparing 2022 budget, for 1<sup>st</sup> Wednesday in February.

Alex at Exxon is real enthusiastic; awesome! Has set up a meeting next week with president of OTTP? (umbrella org for the trade organizations, formerly IAGC, now inter-geo alliance); will send link

basically speaking with president; interested in funding opportunity

meeting with Alex and Nicky (sp.?), plus or minus Darcy. John, interested? Noon your time, Friday, 28<sup>th</sup>.

John: Can try!

Lu: both spent a lot of time in Alaska!

other income sources not listed: charging \$1000, but can offer assistance

budgeting as \$25,000 for charging \$1000 per student.

Any questions?

Will get budget out before Feb. 2<sup>nd</sup>

David: We could get BP involved as a donor; do we have a package to send to prospective donors? If we get a bite, can connect Lu and Darcy. BP is doing experimental field work, might be willing to contribute similar amount to other companies.

Darcy: has SAGE done that with BP before?

John: not as such, but some SAGERS went there. Used to have a good personal relationship.

David: Geophys. director is interested. Doing low freq sources etc; worried about lack of students in the pipeline.

Darcy: Alex put together a thing about SAGE for intergeo

Lu: don't have packet but will; good to talk to trade organization

David: on IAGC, Maurice Naseem (sp.?), AGU rep, was president. Jim White, exec of SEG, wife was previous or current president.

Lu: always been concerned about being oil-rich, but need money where we can get it, should also talk about other energy companies

John: oil orgs ARE rebranding

Lu: also using existing expertise for alternatives

Alex's group bringing concern at talent pipeline. SAGE alums are often going to non-geophysics careers; how can we make geophysics more relevant to society?

Also heard from Kristin! Out of quarantine in NZ.

Jumping into operations:

Nobody worry about COVID speedbumps, but open to ideas; gov't things are going to be more iffy. Will check-in in March

TAs: Eva Smith, other Green members; Mit Shukla, Thomas Steele, Becca Prentice (Mines field camp).

Any questions, comments, concerns?

Handing over to Paul

---

Paul:

Have a draft of one piece of NPS proposal; overdue. Welcoming feedback in the next week or so. Before details, proposal to park will have 3 parts. Looking for permit, not research proposal, but we had one last time, so starting from that, working other things in; could be kernel of proposal to shop around, maybe to NSF; working with eye towards future. Not asking them for money. Cribbed from white paper by Shari; also from SEG foundation applications; may want to crib back off that. Recycling is our friend on this. Hoping that circulated draft captures main aspects of what we've done as well as what we'd like to do. one ofo things that accompanies application is annual operating plan, 3-4 pages of laundry list of what we intend to do at different times. Will need help fine-tuning, may flash map and see if we're on the same page. Kind of the main layout; on to a couple specifics. Sections about each technique independent of what we're doing; ground disturbance etc. could use some from active seismic group resources we might use over next 5 years. Paragraph or two, couple of pictures.

David: Lee and I were discussing; Lee will add paragraphs and photos, but should be on it next week.

Paul: Also need DTS; just a few sentences and a pictures.

Shari: sent short email just now; pretty simple.

Paul: Also, can you confirm where measured in 2019?

Shari: Redondo Creek; couldn't see much from snow melt.

Paul: Currently have some well logging description; still relevant?

Shari: no suitable wells within Caldera

Lu: was going to ask if continuing

Shari: funny thing; in Nov, got call from city of Santa Fe; logged production well while pump was out! They remembered our contribution. But no, nothing to log; deep geothermal are dangerous and PNA'd, shallow are getting plugged.

Paul: might leave in, but note nothing in Caldera for now.

Shari: if NPS drills, could include later

Paul: good point, might drop in "in discussion with NMWSC for multiple well drills later".

Also something generic about thermal methods to think about monitoring thermal features there; recall seeing something about thermal features in park got new protected status, might limit what we can and can't do

Shari: wasn't aware

Paul: happened in 2020; list of national thermal features, nothing within Valles I don't think

okay; anybody have any questions about it writ large, or things on that side?

Opening map for comment

David: need to extend map in NW

<POWER FLICKER; CONNECTION LOST>

Lu: disclaimer about "area subject to change"?

Sensors and Software? Geonics? Are we doing GPR/EM31 this year? Will need to check in with them soon.

Paul: removed EM31/GCM from proposal; old fort project too undefined to be fruitful, at least for now.

Lu: will update them

Paul: left GPR on there though!

Lu: might not have with S&S corporate reorganization

Curriculum committee? Not much recently  
need to know number of lectures; 3 seismic, how long, x EM, y potential fields? Rough time; 30 minutes minimal time? Multiple units of that; need to get that done for the schedule. Working on logistics

David: need 45 min. lecture plus 15 min. Q&A minimum; hard to cover much with questions, running over; what's previous experience been?

Lu: makes more sense

John: students are accustomed to that. Danny, need curriculum meeting; Megan and John are starting weekly meetings re: gravity, but inviting Darcy and other potential fields people.

Lu: what about EM? No meetings...

Paul: need to meet; have dots on map for MT, but worth getting together and discussing UNICAL data

Lu: also, thinking of Software

Paul: oh, true

Lu: Kristin was having a hard time with python; sent winlink dongle and went quick! Who's EM organizer?

Jared: Okay, will do it.

Lu: Any ideas about housing? Checking about college of Santa Fe or residence inn... santa fe shut down. If I get TAs who say yes, will grab 'em. Do we want to advertise through mailchimp, last three years of SAGE? Should start propagating want ads; Megan had some cool materials last week.

Do you guys think it's worth advertising TAing to former SAGERS?

[Several]: Check with connections first

floated idea, but no overwhelming "yes" yet; will put something together and circulate it

Paul: not sure if worth considering, but might want to think about staying in Los Alamos; if able to use facilities, that would be optimal.

Lu: again, Betsy said UNMLA closing, SFIS too  
could also check Santa Fe Suites; again, just hit in the last couple days.

Will let you go; sounds like lots of zooms and emails soon!