

**National Association of Geoscience Teachers  
Far Western Section "Fall" Conference**

**California State University Fresno  
October 8-10, 2010**

**Hosted by the CSU Fresno Earth and Environmental Sciences Department, Fresno  
California**

**Conference website: <http://nagt-fws.org>**

Administrative Coordinator: Paul R. Troop, Graduate Student, EES Department CSU Fresno 2576 E. Ramon Ave. MS ST24 Fresno, California 93740 Ph 559-278 8036

Speaker and Field Trip Coordinator: Keith Putirka PhD, EES Department CSU Fresno 2576 E. Ramon Ave

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**Field Trips: From the Mantle to the Surface, from the Carrizo Plains to the Sierra Nevada:**

We are very fortunate to have a stellar cast of field trip leaders for this year's NAGT. Field trips will cover a very wide range of the Earth Sciences. In the areas of ancient and active tectonics, we have trips to the Carrizo Plains to view the San Andreas Fault (Arrowsmith), to the southern Diablo Range, to view evidence of both ancient and modern subduction events in western CA, and to Kings Canyon, to examine the sedimentary record in caves that provide evidence for the recent uplift of the Sierra Nevada (Stock). The uplift history of the Sierra Nevada will also be covered in a trip to Table Mountain, not far from the Fresno State campus; this trip will also offer field trip ideas for secondary school teachers (Poole and Pluhar). Also on the topic of tectonics, we will have two trips to the foothills of the Sierra Nevada south of Fresno, to view the suturing of oceanic crust to the western margin of the Jurassic North American craton (Saleeby and Saleeby), and to look at subsidence in the San Joaquin Basin, and its relationship to mantle dynamics (Saleeby and Saleeby). Finally, in the area of igneous petrology, we will visit the foothills of the Sierra Nevada to view mafic magmas that are parental to the Sierra Nevada Batholith (Paterson and Putirka), and to Yosemite Valley, to examine magma mixing processes in the Yosemite Valley Intrusive Suite (Ratajeski).

**Not your normal Far Western Section Conference!**

An over night field trip is not new to our regional meetings but having two registration sites, all meals in the field and a campfire discussion with the field trip leader(s) is new. Ramon Arrowsmith will be leading this trip along the San Andreas fault in the Carrizo Plains National Monument where he and his graduate students have been working for the past several years.

The Carrizo Plains National Monument is in a remote area of California, and few motels and eating establishments exist in the area. Cell phones work here, but barely. Internet access, well.... We will be sleeping, hiking and eating outdoors! All meals will be provided at the group campground and transportation will be in POV's.

Our evening meal (s'mores for desert?) and a campfire talk will take place in the campground, with our field trip confined to the Carrizo Plains National Monument.

Because the park is so remote from most population centers where FWS members reside, we have scheduled the conference Friday and Saturday so time will not be wasted in traveling from Fresno. At the end of the field trip participants will drive to Fresno State for the traditional Saturday night dinner and featured speaker

## Schedule:

Friday, October 8th		
Time	Event	Location
4:00-7:00 pm	Registration	Vintage Room Restaurant
6:00-7:00 pm	Hors d' oeuvres	Vintage Room Restaurant
7:00-8:30 pm	Table Mountains and Tectonics: What Canyon-Filling Lavas of the Sierra Nevada Reveal about Miocene California	Vintage Room Restaurant
8:30-9:30 pm	Section Business Meeting	Vintage Room Restaurant

### Evening Speaker

**Chris Pluhar, CSU Fresno:** Table Mountains and tectonics: what canyon-filling lavas of the Sierra Nevada reveal about Miocene California

Saturday, October 9th		
Time	Event	Location
6:00-8:00 am	Registration and Breakfast	Vintage Room Restaurant
8:00* am-4:00 pm	Field Trips	
6:00-7:00 pm	Hors d' oeuvres	Vintage Room Restaurant
7:00-8:00 pm	Dinner	Vintage Room Restaurant
8:00-9:00 pm	Sierra Nevada Geology from the 225 Km Mantle Seismic Discontinuity to Mt. Whitney Summit Elevations	Classroom S2109

**\* All trips leave promptly at 8 AM except for Trip 1 which will begin at the Carrizo Plains National Monument Friday at 7PM; and Trip 6 which will leave at 7AM**

### **Saturday Field Trips:**

**Trip 1:** Field Trip along the San Andreas Fault at the Carrizo Plains National Monument with Ramon Arrowsmith from Arizona State University

**Trip 2:** Emplacement of oceanic lithosphere into the western Sierra Nevada and its welding into continental basement by batholith emplacement with Jason and Zorka Saleeby from Cal Tech

**Trip 3:** Topographic evolution of the Kings River Canyon: Fluvial, glacial and hillslope erosion in response to Late Cenozoic uplift and climate change with Greg Stock, Park Geologist, Yosemite National Park

**Trip 4:** Growth and internal evolution of Jurassic and Cretaceous Magmatic plumbing systems: an examination of the tilted Jurassic Guadalupe Igneous Complex and comparison to the Cretaceous Tuolumne Batholith with Scott Patterson from USC and Keith Putirka from CSU Fresno

**Trip 5:** Southern Diablo Range geology: Recorder of past subduction and current active tectonics with John Wakabayashi from CSU Fresno

**Trip 6:** Coeval mafic-felsic magmatism in the intrusive suite of Yosemite Valley with Kent Ratajeski from the University of Kentucky

### **Evening Speaker**

**Jason Saleeby, Cal Tech:** Sierra Nevada geology from the 225 Km mantle seismic discontinuity to Mt Whitney summit elevations

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### **Sunday, October 10th**

<b>Time</b>	<b>Event</b>	<b>Location</b>
7:00-8:00 am	Breakfast	Vintage Room Restaurant
8:00 am-12:00 pm	Field Trips	

### **Sunday Field Trips:**

**Trip 2:** Anomalous subsidence and uplift along the southwestern Sierra Nevada in relation to underlying mantle dynamics Day 2 with Jason and Zorka Saleeby from Cal Tech

**Trip 7:** Ice Age (Middle Pleistocene) fossils at Fairmead Landfill, a visit to the Madera County Fossil Discovery Center with Bob Dundas from CSU Fresno

**Trip 8:** The geology and natural history of the McKenzie Table Mountain Preserve, Fresno County, Ca with Craig Poole from Fresno City College and Craig Pluhar from CSU Fresno

**Note:** Most participants will leave directly from each field trip for home.

# Registration Form

Name: \_\_\_\_\_

Address: \_\_\_\_\_

State: \_\_\_\_\_ Zip: \_\_\_\_\_ Phone: \_\_\_\_\_

Email Address: \_\_\_\_\_

School Affiliation: \_\_\_\_\_

Note: Please include your email address so we can confirm your registration and provide updates as necessary.

Saturday (As space is limited, please number your 1<sup>st</sup> through 6<sup>th</sup> choices)

- \_\_\_\_\_ Trip 1 Friday and Saturday at Carrizo Plains National Monument
- \_\_\_\_\_ Trip 2
- \_\_\_\_\_ Trip 3
- \_\_\_\_\_ Trip 4
- \_\_\_\_\_ Trip 5
- \_\_\_\_\_ Trip 6

Sunday (please number your 1<sup>st</sup>, 2<sup>nd</sup>, and 3<sup>rd</sup>, choices)

- \_\_\_\_\_ Trip 2 Continued
- \_\_\_\_\_ Trip 7
- \_\_\_\_\_ Trip 8
- \_\_\_\_\_ I WILL NOT BE ATTENDING ANY NAGT EVENTS ON SUNDAY

PLEASE NOTE: A LIST OF **HOTELS** IS PROVIDED AT (and is listed below):

<http://nagt-fws.org>

THE CONFERENCE WEBSITE IS:

<http://nagt-fws.org>

**Meals:** Friday-- evening-Hors d' oeuvres  
Saturday—Continental breakfast

Saturday Lunch--Box lunch with drinks  
Ham \_\_\_\_\_  
Turkey \_\_\_\_\_  
Roast Beef \_\_\_\_\_  
Vegetarian \_\_\_\_\_

Saturday—Dinner Tri-tip/chicken buffet \_\_\_\_\_  
Vegetarian \_\_\_\_\_

Sunday—Continental breakfast

## Registration Options

**OPTION 1** – Member/Non-member

**OPTION 2** –Student discount: Includes all activities and meals. **PLEASE PROVIDE STUDENT ID WHEN CHECKING IN AT THE VINTAGE ROOM RESTAURANT.** (Note: For full-time students only.)

**PLEASE CHOOSE ONE (MARK “X” LEFT OF OPTION CHOICE):**

	<b>Option 1 (Registration before October 1<sup>st</sup>) \$115</b>
	<b>Option 1 (Late Registration after October 1st) \$125</b>
	<b>Option 2 \$35.00</b>

**MAKE CHECKS PAYABLE TO: NAGT-FWS**

**Note for Teachers:** For continuing education credit, you should check, in advance, with your district's personnel officer to insure credit satisfies your district's requirements.

**\*\*\*Please check website for parking arrangements before onsite registration. Friday night is football night and parking will be at a premium. GO DOGS!!!**

QUESTIONS?

CONTACT:

Paul R. Troop  
[paul.troop@sbcglobal.net](mailto:paul.troop@sbcglobal.net)  
(209) 848-0585 (home)  
(209) 614-9289 (mobile)

Mail registration form to:

Paul R. Troop/ NAGT Conference  
318 Romano Way  
Oakdale, CA 95361

## Hotels near Fresno State (5 Mile Radius)

### Holiday Inn Express and suites Clovis CA Hotel

650 West Shaw Avenue, Clovis, CA – (559) 297-0555

1.5 miles east of campus

Fresno State Rate \$79 + tax

### Best Western Hotels

480 East Shaw Avenue, Fresno, CA – (559) 229-5811

1.7 Miles west of campus

Fresno State Rate \$84 + tax

### Hilton Garden Inn Clovis

520 West Shaw Avenue, Clovis, CA – (559) 299-2203

1.7 miles east of campus

Fresno State Rate

### Ramada Inn

324 East Shaw Avenue, Fresno, CA – (559) 224-4040

1.9 Miles west of campus

Fresno State Rate \$78 + tax

### Comfort Suites

143 Clovis Avenue, Clovis, CA – (559) 299-9992)

4.3 miles from campus

Fresno State Rate \$69.99 + tax

### Best Western Clovis Cole

415 Clovis Avenue, Clovis, CA – (599) 299-1547

3.7 miles from campus

Fresno State Rate \$99 + tax

### Fairfield Inn and Suites by Marriott Fresno-Clovis

50 North Clovis Avenue, Clovis, CA – (559) 323-8080

4 miles from campus

Fresno State Rate 89 + tax