University of California, Riverside

No. 20, Autumn 2003

Friends of the Entomology Research Museum

Newsletter

Editor: Rick Vetter Proofing Editors: G. Ballmer, D. Hawks, D. Yanega

Entomological Quotes

"Consider well the proportion of things. It is better to be a young June-bug than an old bird of paradise"

Mark Twain

"The difference between the right word and the almost right word is the difference between lightning and the lightning bug"

Mark Twain

The FERM Newsletter is published quarterly and contains articles written by FERM members. If you would like to submit an article, please send it as a Word/Wordperfect file using one of the following two methods: (1) an attachment via email to the editor (see below) or (2) a hard copy version on disk. Submissions will be published in the order they are received in accordance with space availability and relevancy to the FERM general readership. If you have questions please contact the FERM Newsletter editor:

Rick Vetter (vetter@citrus.ucr.edu)

FERM field trip to the Coso Mountains

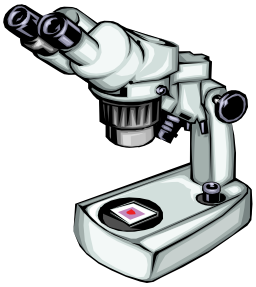
August 8-10, 2003

by G.R.Ballmer

Gordon Pratt's annual FERM field trip to the China Lake Naval Air Weapons Station (CLNAWS) began with a rendezvous of four elite participants at the Bangkok Chef Restaurant in Ridgecrest at 4:30 pm on Friday the 8th of August. Following a feast of Thai delicacies, the over-stuffed crew consisting of Gordon Pratt, Cecilia Pierce, Greg Ballmer, and Lisa Pierce chugged off to the Coso Hot Springs area on the central western edge of the North Range. CLNAWS consists of two tenuously linked ranges in the western Mojave Desert, each the size of Orange County. The North Range includes both the Argus and Coso Mountain Ranges, which rise in elevation to nearly 9000 and 8400 feet, respectively.

Coso Hot Springs is an extinct spa at the edge of an active geothermal area currently exploited by the Southern California Edison Company for generation of electrical energy. The stony spa ruins are situated in a vast low landscape surrounded by ancient lava flows, bare rocky slopes, and sparse desiccated desert scrub. Rusty pipes lead to an adjacent field of vigorously boiling mud cauldrons and hissing fumaroles. In spite of abundant sulfurous steam, this barren land is gripped in drought. We pushed onward a few miles and upward to a moister canyon wherein lies Haiwee Spring, a permanent source of water that nurtured former Native American inhabitants. They inscribed their hungry desires on the basalt boulders in the wash, depicting a covey of quail, deer, and bighorn sheep. They were also careless litterbugs, leaving liberal quantities of obsidian flakes, the imported basis for their hunting lifestyle.

Continued on page 6



NEWS FROM THE MUSEUM

by Doug Yanega

The summer has been hot, and the collecting rather sparse, but things move along in the Museum. Ali Al-Wahaibi is still working through the parasitic wasps point-mounted by Apostolis Kapranas, and a few loans have gone out while others have come in. We've also had a few visitors, notably Bob Zuparko, an expert on parasitic wasps, and Allen Sanborn, a cicada expert. Allen went through our entire cicada collection in half a day, and sorted out over three drawers' worth of undetermined specimens for us, quite a marvel of efficiency!

We also recently had our first repairs on the compactor system, when a few of the chain-driven mechanisms started to fall apart. It turns out that even minor repairs require the removal of at least one or two cabinets from the system, meaning a team of four or more people. Then again, at least the repairs are strictly mechanical, as opposed to an electronic or motorized compactor system, where the repairs can be vastly more complicated. It still seems as if we're coming out ahead on the deal.

The Deep Canyon databasing grant submission had to be deferred until next year, but should still be going ahead. The Museum database's authority file has seen a substantial amount of activity recently, as I've made a few more contacts with people who control major electronic taxonomic resources - as a result, over the last month the number of species names in the file has skyrocketed to over 123,000. That's over 10% of all the known species in the world, and it's mostly compiled and converted from extant electronic resources that I've tracked down by various means. A figure of 10% may not seem like much, but it's entirely possible that the ERM now has the largest single database of insect names in the world. There are several such resources, in fact, that I have not yet been able to incorporate (such as the world Diptera, Orthoptera, Neuroptera, Collembola, and ants), which would add considerably to the present file, so the ultimate number stands to be much, much higher if things continue as they're going.

Got an idea for a FERM article???

Do you have anything buggy-related that might be of interest for the FERM newsletter? We really would be tickled pinkish if you would send “stuff” in. Remember, this newsletter won’t have much in it unless we have material submitted from you folks that we can publish. Feel free to send in photos, articles, recent publications related to insect taxonomy or natural history and even stories about how the Entomology Research Museum has assisted you in your bug-related endeavors. Send them to vetter@citrus.ucr.edu, preferably as attachments (not in email text). Additional information is on the front page of this newsletter.

*****Deadline for submission of material for next Newsletter is Dec 15th*****

More Entomological Quotes

“Ants are so much like humans as to be an embarrassment. They farm fungus, raise aphids as livestock, launch armies into war, use chemical sprays to alarm and confuse enemies, capture slaves, engage in child labor, and exchange information ceaselessly. They do everything but watch television.”

Lewis Thomas "The Lives of a Cell"

“A human being should be able to change a diaper, plan an invasion, butcher a hog, conn a ship, design a building, write a sonnet, balance accounts, build a wall, set a bone, comfort the dying, take orders, give orders, cooperate, act alone, solve equations, analyze a new problem, pitch manure, program a computer, cook a tasty meal, fight efficiently and die gallantly. Specialization is for insects.”

Robert Heinlein

2003 FERM Collect-a-thon Extravaganza, Sept. 20-21!!!!!

Dave Hawks has made arrangements for FERM to use Francis Ford Coppola's old cabin at Lake Arrowhead (presently belonging to Martin Barnes' sister, Martha Jane Dowds) as a base camp for the third FERM Collect-a-thon, which will be held the weekend of September 20-21. This event is open to all FERM members. Two-person teams (determination of which is likely to be by semi-lottery to avoid "super-teams") will collect as many families of insects as possible over a 24-hour period from noon of the 20th to noon of the 21st. The rules are adult specimens only, and no passive collecting techniques (i.e., traps). All collecting will be confined to within a five mile radius of the base camp. In order to prevent undue advantage to any team having multiple black lights and/or mercury vapor lights, only one black or MV light will be permitted per team and each team may collect insects only from its own light. Although it is expected that most participants will try to avoid sleep, the cabin will be available for those who simply must crash. Participants can sign up by contacting a FERM officer: Greg Ballmer (gregory.ballmer@ucr.edu), Jeremiah George (jeremiah.george@ucr.edu), Dave Hawks (david.hawks@ucr.edu), or Dale Powell (DAJRPOWELL@msn.com). Participants are expected to provide their own insect collecting equipment and food. The winning team will be that which brings in the greatest number of insect families, as confirmed by our panel of experts headed by the ERM curator, Doug Yanega. The grand prize will be bragging rights until the next FERM Collect-a-thon, plus one six-pack of the beverage of choice for each of the winning team members.

SIGN UP NOW IF YOU ARE INTERESTED!!!

Friends of the Entomology Research Museum
Membership Form

☐ Check here if you are renewing (renew by July each year)

Name _____

Address _____

Interests _____

Telephone _____Email_____

MEMBERSHIP CATEGORIES:		**Please Check**
Basic Membership	$10.00	☐
Sustaining Member	$25.00+	☐
Donor	$100.00+	☐
Benefactor	$500.00+	☐
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Submit your membership form and dues to:

David C. Hawks, Treasurer
Friends of the Entomology Research Museum
Department of Entomology - 041
University of California
Riverside, CA 92521-0314

Dues and other contributions are payable by check to the **UCR Foundation,** noting "**Entomology Museum**" on the memo line on your check. (It is very important to note "Entomology Museum" in order for your donation to be deposited in the Friends' UCR Foundation account.)

Citizen Chicanery: the spider genus *Orsonwelles*

By Rick Vetter

Recently, I got hold of a taxonomic spider publication by Gustavo Hormiga of the Smithsonian Institute involving a new genus of linyphiid, *Orsonwelles* (Linyphiidae) from Hawaii. This newly erected genus describes many new species of a fairly large linyphiid spider. (Most linyphiids are about 2 mm long, these are 14 mm long in body length.) Hormiga's choice of species names all revolve around the huge body (no pun intended) of works of Orson Welles, famous Hollywood director and movie personality. Below are the species names and their etymology.

O. malus – meaning evil for the movie "Touch of Evil"
O. calx – meaning lime, the mineral, after Harry Lime, character in "The Third Man"
O. ventus – meaning wind, from "The Other Side of the Wind"
O. bellum – meaning war, for the infamous radio broadcast, "The War of the Worlds"
O. iudicum – noun in apposition for "The Trial"
O. polites – meaning citizen, for "Citizen Kane"
O. ambersonorum – for "The Magnificent Ambersons". For those not familiar with species epithet style, if named after a male, the name ends in "-i" or "-ii" such as "ambersoni", if named after a female, it would be "ambersonae" and if named after two people, you add "-orum".
O. arcanus – meaning hidden or concealed for "Mr. Arkadin/Confidential Report"
O. othello – named after movie of the same title
O. macbeth – named after movie of the same title
O. falstaffus – named after Falstaff, a character played by Welles in "Chimes at Midnight"

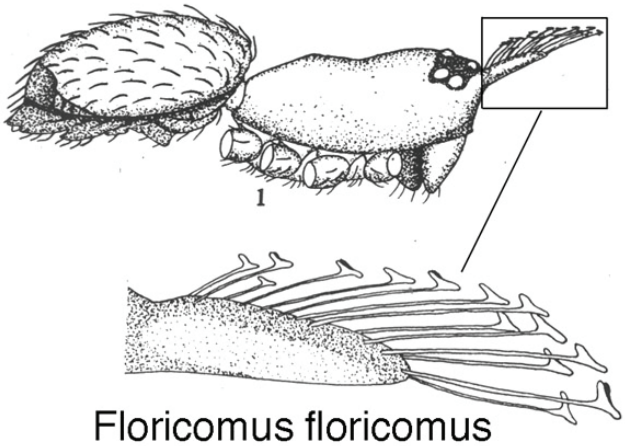
Hormiga, G. 2002. *Orsonwelles*, a new genus of giant linyphiid spiders (Araneae) from the Hawaiian Islands. *Invertebrate Systematics* **16**:369-448.

So how good of a taxonomic collector are you?

In going through some taxonomic papers, I came across the following which describes two new species of *Floricomus* spider (Family: Linyphiidae) from Georgia and Florida with a very unique collector.

Crosby, C. R. and S. C. Bishop. 1925. A new genus and two new species of spiders collected by *Bufo quercicus* (Holbrook). Florida Entomologist 9:33-36.

For those of you not familiar with non-entomological taxonomy, *Bufo* is a genus of toad and the spiders were removed from stomach contents to determine what they ate. There are similar cases of new species of spiders collected only from the nests of mud dauber wasps because the wasps are collecting from all different habitats and heights not explored by arachnologists.



Floricomus floricomus

PINE : PARTNERS IN NATURE EDUCATION

FERM members are entitled to 20% discounts* on the following UCR Extension field nature study courses:

A Field Study of Birds: Fall $185 (EDP 32P23)
Tue. 7:30-9:30 pm, Sept. 16/Field trips all day Sat., Sept. 20, Oct. 4, 18, Nov. 1, 15

Geology and Natural History of Yosemite $125 (EDP 32N20)
Sat. 9 am-6 pm, Sept. 20/Sun. 8 am-4 pm, Sept. 21

********Spider Identification** $215 (EDP 32P03)
Sat. 9 am-4 pm, Oct. 4-Nov. 8

Birds of Anza-Borrego $155 (EDP 32P25)
Fri. 7-9 pm, Oct. 10/Sat. 7 am-5 pm, Oct. 11/Sun. 8 am-2 pm, Oct. 12

Venomous Animals of the North American Desert $185 (EDP 32N55)
Fri. 5-9 pm, Nov. 7/Sat., Sun. 8 am-5 pm, Nov. 8, 9

Geology of Northern Death Valley $150 (EDP 32N21)
Sat. 9 am-6 pm, Nov. 8/Sun. 8 am-3 pm, Nov. 9

Creation of the Joshua Tree Landscape (Enroll through The Desert Institute: 760-367-5535)
Fri. 6-9 pm, Nov. 21/Sat. 9 am-4 pm, Nov. 22/Sun. 7 am-1 pm, Nov. 23

Field Study of the San Andreas Fault: San Bernardino to Mecca Hills $95 (EDP 32N22)
Sat. 8 am-6 pm, Dec. 6

ALSO OF INTEREST:

Archaeology of Joshua Tree National Park (Enroll through The Desert Institute: 760-367-5535) Fri. 7-9 pm, Oct. 17/Sat. 9 am-4 pm, Oct. 18/Sun. 9 am-noon, Oct. 19

Fluvial Geomorphology: Principles and Applications (For more information, visit www.wmrs.edu/geomorph2003, e-mail geomorph@wmrs.edu or call 760-872-4214) Oct. 5-10

For current listing of courses at any time, bookmark www.unex.ucr.edu/ns/fns1/classes in your web browser.
For further information, contact: Natural Sciences UCR Extension 909.787.5804 909.787.2456 (fax)
*some restrictions apply

Printer for making alcohol labels

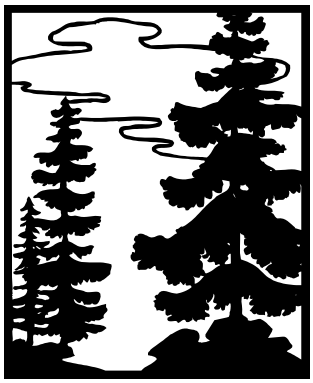
For most entomologist types who make out itsy bitsy labels for their specimens, a laserprinter might be an okey-dokey thing. However, for labels that are submerged with alcohol specimens, using a laserprinter is not the best method because apparently they use alcohol to clean the ink off of the machine and the ink is indeed alcohol-soluble. However, apparently there is a printer out there that does make completely alcohol-resistant labels. Below is an email that I received from a colleague.

"The Lexmark Z54SE printer is on sale at Staples.com for $69 with a $40 rebate and free shipping. The reason I mention this is because this is the printer with the ink that holds up in alcohol. This is the same ink that the Canadians first cited in their label brief and picked up on by several US museums including the Field Museum. I am only a recent convert, but it certainly looks to work, and is so much nicer than the dot matrix labels I have been using. It is no problem creating a sharp 5 pt type with this printer. I ended up getting one printer for home and one for work. Do not get talked into another model unless it uses the #70 black ink."

Continued from page 1

We camped at the end of a very rough ranch road (before the Navy took this area by eminent domain, it was cattle country) on a rocky terrace above the willows, which line the springs. The night was warm and dry; Mars was prominent in the eastern sky, but the nearly full moon blotted out many stars and probably reduced our catch at the mercury vapor lights. As Gordon's primary reason for this trip was to sample the insects associated with water sources, as per his contract with the CLNAWS, we were especially keen to collect aquatic and riparian species. Among the more interesting non-insect visitors to our sheets was a tiny black-headed snake, which quickly retreated into the brush, and a couple of large specimens of a local variety of the Western Toad.

Saturday morning we explored the springs and as the heat of the day set in, we broke camp and began the circuitous journey to the higher (northernmost) elevations of the Coso Mountains in the northwestern corner of the North Range. Initially, we backtracked south (largely via Hwy US 395) to Ridgecrest, where the temperature was in the 100s. After a frantic search for a misplaced security badge and scrutiny by security personnel at the main North Range entry gate, we proceeded north along the east edge of China (dry) Lake and gradually ascended to higher and cooler environments.

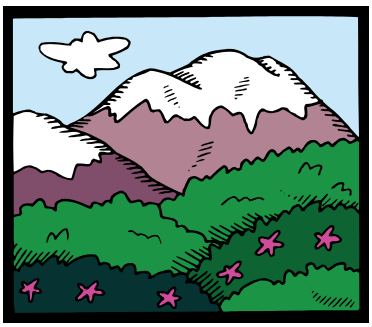


In late afternoon we arrived at a site amid pinyon pines and *Ceanothus* (elevation *ca* 7500 feet), where we cooked an early dinner and then packed up our camp gear and hiked down slope to Mill Creek (el. *ca* 7000 feet). There we set up camp and a mercury vapor light at a moist spot in the creek bed surrounded by pinyons. The evening was cooler, the moon brighter, and the insect activity sparser than the previous night. Nevertheless, we were able to attract several green and brown lacewings, some moths and caddis flies, several small Diptera and Hymenoptera and one big ten-lined June beetle. Gordon lamented the bright moon, which he credited with greatly reducing the catch compared to the teeming masses of insects (including one specimen of a new species of June beetle and a rare parasitic pyrgotid fly) he found at the same site a few weeks earlier.

Sunday morning we hiked back to our vehicles and drove to an unnamed spring at the western base of Silver Peak, a singular granite prominence clad in pinyon pines and southernmost of the Coso peaks exceeding 6000 feet in elevation. There, we sampled the riparian insects and documented the condition of vegetation, which has increased markedly following the removal of cattle which, until recently, dined on it excessively. The springs support a rich cover of grasses, rushes, and flowering phorbs, surrounded by dense willow thickets. Through it all, the insect activity was intense, with numerous tarantula hawks (*Pepsis*), other wasps, beetles, and bees prominent on the milkweed and other blossoms.

Our next stop was Coso Village, a ghost town in the northeastern Coso Range. Its most prominent feature now is a tiny pond created to support the former mining operations (and cattle) and now hosting several gold fish and largely choked with emergent aquatic vegetation. The pond is a tiny green oasis in a dry landscape of eroded granite bedrock and rounded boulders. Scattered Joshua trees and junipers dominate the vegetation. Overflow from the pond supports a narrow carpet of grasses and phorbs for several meters before disappearing into the gravelly soil. The mid-afternoon solar radiation was so intense it drove Lisa over the edge and into the cool water, while the rest of us chased elusive dragonflies.

The last stop on our tour of the North Range was Little Petroglyph Canyon, a popular site for observing Native American rock art. This site is a narrow gorge in a lava flow set in a treeless desert landscape. Although currently an unlikely site for human habitation, the polished basalt bedrock and abundant white sand in the bottom of the gorge indicate that water once flowed there in abundance. One can imagine that long ago the gorge was lined with cottonwoods and willows supporting a diverse animal community. Over a period of *ca* 6000 years, Native Americans inhabiting the site scratched images of animals, people, and more enigmatic subjects on the rock walls. Perhaps harried mothers seeking respite from child-tending asked their children to take some rocks and scratch pictures on the wall. Public tours of this site are sponsored by the Maturango Museum in Ridgecrest.



Medflies

By Jack W. Beardsley
(18 November 1993)

Medflies come and medflies go.
Here forever? Who's to know?

L.A. Ag. says "temporary",
But no consensus do they carry.

Up against C. D. F. A
Jim Carey says they're here to stay.

He may be right; he may be wrong.
But to prove it takes too long.

Every month more flies we trap.
Infested townships dot the map.

Seems they're out there still to mate,
Despite our cry "eradicate".

Helicopters having fun,
Spreading steriles by the ton.

These are flies irradiated.
Is their sex drive thus abated?

Do they mate? I often wonder.
Perhaps its all a dreadful blunder.

Do sterile flies decline to mate,
While the fertile procreate?

Bait spray as the best solution,
Carried out with resolution,

Is seen by some the only hope,
The medfly threat with which to cope.

It is a curse both dire and bleak,
With consequence we dare not speak.

If the flies at last do gain,
Access to the farm domain,

A major loss which then is seen
Is crops denied by quarantine.

But the talk of malathion
Evokes a cause for which to die on.

Awful stuff that's in the spray
Causes cancer, so they say.

Citizens with righteous ire
Will come together to conspire

Against the devil of the spray,
To hold the spewing planes at bay.

And before we solve that mess
They'll demand an E. I. S.

So while the farmers time must bide,
And politicians seek to hide,

The Ag boys curse and fret and worry
Why no one else is in a hurry.

Their cries for help no one is heeding,
And all the while the Medfly's breeding.

This problem has no quick solution;
It's much like our air pollution.

It'll be here many years,
Despite our efforts, toil, and tears.

So the Medfly, small and pretty
Is part of life 'round L. A. City.

An Obsession with Butterflies
by Sharman Apt Russell

This book was reviewed by the Los Angeles Times (4 July 2003) and should be of keen interest to FERM members of all levels. It is not a scientific book but rather a discourse on the allure that butterflies have had for humans for centuries. It mentions how, in the Middle Ages, butterflies were considered fairies that would steal dairy products and how one woman, Lady Eleanor Glanville in the early 1700s, was considered to be insane because, as quoted by an entomologist of that time, "None but those deprived of their Senses would go in Pursuit of butterflyes". How true. It also mentions recent butterflyophiles such as famous novelist, Vladimir Nabokov, and his passion.

The book sounds like it would be a very nice read for every level of entomology interest and would make a nice holiday gift at year's end.

Published by Perseus Books: 228 pp., $24.

A Quest for Caseyi

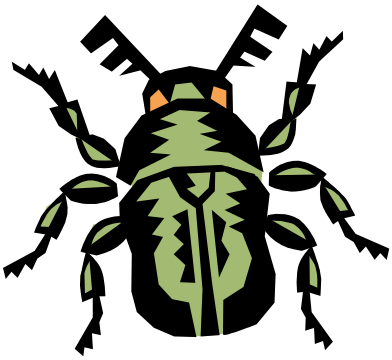
by Zachary Porcu

It was a quest, a mission: find the elusive, melolonthine scarab beetle *Dinacoma caseyi*. I met Alexis Park, Doug Yanega, Matthew Van Dam, Dave Hawks, Martin Barnes, Andy Carmichael, and a few other entomologists at 4:30 p.m. at the UCR Entomology Museum. By 5:00 we had formed carpools and we made ready to caravan to our destination.

A couple of hours, 362 questions about *Dinacoma*, and several hundred windmills later, we arrived at a Jack-in-the-Box near Palm Springs. After purchasing some victuals, we met the rest of the gang (which included other entomologists and a bunch of people from the UCR Conservation Biology Program) in a nearby parking lot. I expressed my sarcastic opinion on how practical it was to have our mission briefing in a parking lot where the wind tore by at a rate incompatible with the maps in our hands. Dave provided an effective wind-block for Alexis and me, the former telling me to dispense with logical thinking now that I was in the field. The group's goal was to simultaneously check as many potential sites as possible for the highly localized *Dinacoma caseyi*. This beetle presently is known from only a few square miles in the vicinity of the Palm Canyon floodplain in Palm Springs, and is being considered for Federal listing as an Endangered Species. After some further discussion and planning, we split into several groups in order to check multiple locations for this notorious beetle. Dave, Alexis, Martin, and I headed off to the sandy, horse-dung-infested wasteland. Sounds like the perfect place!

After setting up a mercury-vapor light and a blacklight, we passed the time by poking around the brush. Dusk came, and with it two things: the howling of a coyote, and insects, of course! Collecting was fair, not a huge amount of diversity but interesting enough. There were many little Tenebrionids (darkling beetles), and a good deal of Mutillids (velvet ants). Dave spotted the first *Dinacoma*. Correction: He didn't see it, he heard it. Like most scarabs in flight, they sound like lawnmowers. A few more *Dinacoma* later, and Dave and Alexis went to check the lights at a nearby parking lot. Martin and I defended the camp from the ravenous coyote pack while munching on snacks. Dave and Alexis returned with several more *Dinacoma*, for a total of eight for the night. We considered ourselves successful, and it was time to head out. As we packed up, Alexis found a pair of large, predatory Carabids (ground beetles) of the genus *Calosoma* for me. I now have them in a Tupperware container and feed them pastrami and butterflies.

On the way back, Alexis spotted some lights and wanted to check them out. Dave and Martin waited in the car while I accompanied Alexis. The lights were in the middle of a structure of horse stables or something similar. All was quiet until the sound of our boots on the gravel attracted the attention of a nearby yokel and his dogs. I had previously speculated what we would say if anyone found us here or back at the campsite. Alexis responded by saying that we should just tell them we were on a *Dinacoma* survey. He hypothesized that we might get away with it for we would be using "at least one word they didn't understand." This was another case, and the tall man greeted us with unfriendly suspicion. "Can I help you?" he asked with an accent that retained the slight ring of a hillbilly. Alexis responded: "We're doing a *Dinacoma* survey and we were wondering if we could check those lights over there." The man raised and eyebrow and asked, "A what?" So we explained, as best we could, and I showed him one of the live specimens that we had collected. He nicely led us over to the lights, and on the way asked what importance this "bug" had. Without explaining the entire structure of insects in the grand scheme of things, we convinced him of their importance simply by pointing out that they were endangered. Though this is incorrect, technically, and as of now, but close enough. The horses were more excited than us, for all we found was a small Tenebrionid. This I grabbed as Alexis thanked the man and we left.



One pastrami sandwich and ten minutes later, we were back at the parking lot. Doug frantically flipped his thumbs up and then down, wondering of our success in acquiring those elusive beetles. After some yelling over the noise of the wind, it turned out that ours was the only team to get *Dinacoma*. After a conclusion council, Dave, Martin, Alexis, Andy and I carpooled back to Riverside. On the way to my house there was some confusion of the directions to turn (I was half-asleep and thought we were in a spaceship going up and not left or right). Flopping sleepily through the front door, I reflected on the successful trip. Another mission complete, another half-night's sleep wasted. Such is the saga of the entomologist.