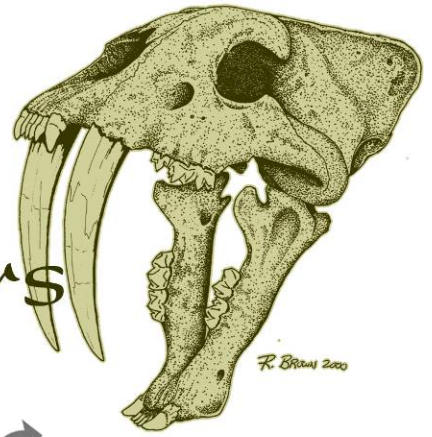


NEWS

Florida Fossil Hunters



Florida Prehistorical Museum, Inc. dba/ Florida Fossil Hunters
Volume 25, Number 1

January 2015

From the President.....

Hello and welcome to 2015. Wishing all a wonderful New Year. Boy, time goes faster and faster each year, just like our parents always said.

Hope you got what you wanted at Christmas and got to go out fossil hunting during the holiday break. Last month we met at OSC and held our Fossil Bucks Auction. There was a good crowd and I believe everyone went home with something. We had a great time and yummys to eat. After the auction, all the children got to pick something extra from my "treasure box".

This month the club will NOT be meeting at OSC. Instead we will participate in the opening of "A T-Rex Named Sue" on Saturday, January 24th, at the Florida Museum of Natural History in Gainesville. Our club was invited to display fossils and talk to the museum guests. Come join us at FLMNH, volunteer for a few hours at the tables, and tour the exhibits. (see details on page 2)

In February we will at Orlando Science Center, with a Kids' Fossil Blast program and then our meeting and a speaker. Please remember to renew your Florida Fossil Permits in January. The club will be going fossil hunting in the Peace River and maybe Yankeetown.

The same officers of the club were re-elected in December. We were thrilled to add two new members to the Board: Sal Sansone and George F Edwards, Jr. We welcome new blood and ideas and remind everyone that this is your club - and your involvement is always welcome.

The Peace River is one of its low stages, so I have to go. See you at the meetings.

Russell Brown
President

Join Our Facebook group, Search:
Florida Fossil Hunters



Coming Events

UPCOMING MEETINGS at the Orlando Science Center

Saturday, January 24th
- 10 am to 4 pm

FL Museum of Natural History
A T-rex Named Sue opening
celebration. *FFH will do this
INSTEAD of a January meeting*

Saturday, February 21st

2 pm Kids' Fossil Blast
3 pm Meeting & Speaker

Saturday, March 21st

2 pm - Kids' Fossil Blast
3 pm - Meeting & Speaker

More events listed on back page

For more info...

www.floridafossilhunters.com

Table of Contents

Fragments	2
Kids Fossil Blast	2
Peace River	2
January Meeting	2
More Events and Updates	3
Aquilops Americanus	4
550 Million Year Old Fossils ...	4
Vulcan Mine Trips	6
Contacts and Membership Info	7
Calendar	8

Florida Fossil Hunters News

Fragments

Instead of a meeting in January...

**FL Museum of Natural History
Gainesville
Saturday, January 24th**

The world's dinosaur "Sue"-perstar returns to the Florida Museum of Natural History on Jan. 24, 2015, in the featured exhibition "A T. rex Named Sue."

This bilingual exhibit presents the story of "Sue," the largest, most complete and best-preserved Tyrannosaurus rex ever unearthed. It features a life-size, 42-foot-long cast of the dinosaur and family-friendly interactive components exploring the paleontology that has helped scientists reconstruct Sue's life and legacy.



One of the largest flesh-eaters to have ever inhabited the Earth, Sue roamed North America about 67 million years ago. The T. rex is named for Sue Hendrickson, who discovered the dinosaur in 1990 near Faith, South Dakota.

The exhibit follows the dinosaur's extraordinary journey from the Cretaceous period and sedimentary rocks of South Dakota to the U.S. courts and finally the world. The exhibit explores T. rex's interactions with its Cretaceous environment, Sue's instrumental role in unlocking many secrets of the species and the often creative methods of fossil preparation and study.

About 50 T. rex specimens have been discovered to date and only about one-quarter of these are considered more than 50% complete. At 90 percent complete and extremely well-preserved, Sue is the most celebrated representative of its species, allowing new detailed studies of the biology, growth and behavior of T. rex.

Our club will be participating in the grand opening on Saturday, January 24th, from 10 am to 5 pm. We encourage as many members that can, to volunteer some time at our fossil display tables and talking to the Museum's guests. Then you can spend time touring all the wonderful exhibits at FLMNH. Please contact me if you are going to volunteer so that I can give them your name. (Usually they do NOT charge the small "special exhibit" fee to volunteers at the events).

Kids' Fossil Blast

Shells are more than just pretty objects. They hold lots of information on the ecology of the place and time. On Saturday, February 21st at 2 pm, we will examine all the ways that scientists have been able to pry the data from the fossil shells and how they use the data to re-create the environments of the past.

Kids' Fossil Blast is an informal, hands-on experience with real fossils, casts, etc. aimed at kids ages 5 through 14.

Piece on the Peace

Yes, the Peace has finally gone down far enough for diggers to wade in and hunt. Hope all of you get a chance to go hunting there soon.

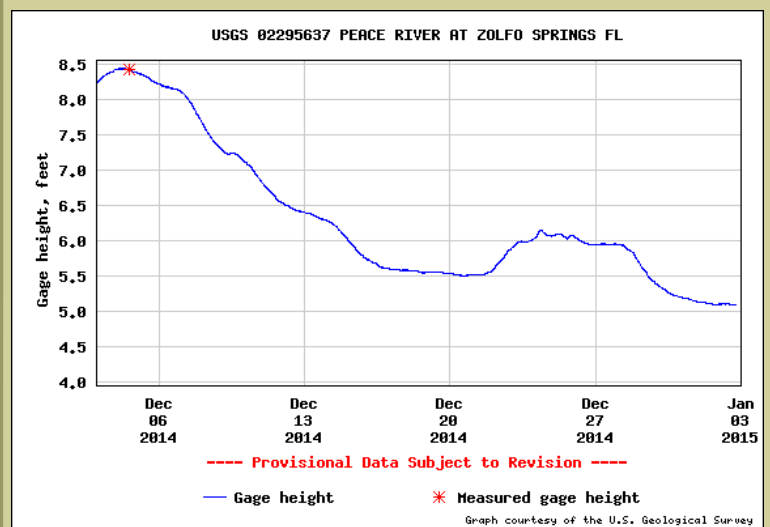
We plan on having many field trips to the Peace starting in March (weather and water level permitting). The plan is to start at the North end and make short downstream trips each weekend we set up a trip. i.e.

- 1) Bowling Green/Paynes Creek to Rea Rd.
- 2) Rea Rd. to Crews Park, Wauchula
- 3) Crews Park to Pioneer Park, Zolfo Springs

Of course, anyone who wants to lead a group down can come up with their own itinerary. Just keep in mind that not everyone is experienced with canoes/kayaks. Also, some of us are not as young as were and can't paddle upstream much.

Russell is off work on Saturdays -April 4th, so he will probably lead a group on that date. We need volunteers who have gone fossil hunting on the Peace, to lead groups on other Saturdays or Sundays.

Please contact Russell or Bonnie at bonnierussell62@gmail.com or call [352-429-1058](tel:352-429-1058), to volunteer or if you have questions.



Florida Fossil Hunters News

The FOSSIL Project

You can find out more about the FOSSIL project at my FOSSIL.org and on its Facebook page - Fossil Project.

Bruce MacFadden wrote about us in the December 2015 issue the FOSSIL newsletter:

"Representatives of the FOSSIL project including Kassie and Austin Hendy, Sharon Holte, and Adiel Klompemaker made presentations to fossil clubs throughout the fall. I presented on the Megalodon exhibit to the Florida Fossil Hunters in Orlando. During that trip, I toured the fossil exhibits at the Orlando Science Center and learned of the great activities sponsored by that club." - *Bruce MacFadden*



Bonnie Cronin of the Florida Fossil Hunters with her horse evolution module.

Attention Shark Enthusiasts

Santa didn't bring me the giant White shark jaw this year. Bonnie said I hadn't been THAT good. However, I did get a couple of new shark books for my library. One from my friend in Australia and another from Bonnie.

I've been using Collins Field Guide to Sharks of the World dated 2005. Now an updated book as come out. It is Sharks of the World; an Illustrated Pocket Guide, printed in 2014. It covers 501 species of sharks, with the new species confirmed, pictures, data on size, distribution, tooth guide, and much more.

If you like sharks, I highly recommend this book. It will be the one I carry with me from now on. It has new species that I hadn't even heard of and data that is easy to use.

It's illustrated by Marc Dando with text written by David A. Ebert, Sarah Fowler, and Leonard Compago. There are two versions: a pocket guide and a hardcover. Either would be a great help in studying the sharks of the world.

Russell Brown
Shark Crazy Man

Florida Museum of Natural History Events of Interest:

Jan. 24th- 10 am to 5 pm, A T-rex Named Sue, Opening Celebration

Jan. 31st- 2 to 5 pm, Talking with A T-rex Named Sue: Join Gregory Erickson, Ph.D. (Anatomy & Vertebrate Paleobiology) for a discussion.

Feb. 22nd- 2 to 4 pm, Archaeology Workshop: Hunting Technology (pre-registration required)

Mar. 8th- 1 to 4 pm, Ask a Scientist: Geology

Mar. 14th- 10 am to 3 pm, Can You Dig It?: Explore rocks, gems, fossils, and the Earth

For more info go to www.flmnh.ufl.edu

Women in Paleontology

Orlando Science Center | May 16, 2015

From 9 to 90 - you can touch the past and change the future.

Meet with female professionals in the fields of Paleontology, Anthropology, Archaeology, and Geology, as well as students from the University of Florida. Presentations will be from 11 am to 3:30 pm. Amateur fossil enthusiasts from the Florida Fossil Hunters and other organizations will have displays and women to answer your questions from 10 am to 4 pm.

Cindy Lockner is the point person for this event which will be part of the Orlando Science Center's "Women in Science" series in May. Please contact her if you would like to volunteer for this event or if you have questions. Her email is clockner@comcast.net

Tampa Bay Fossil Fest

The Tampa club will hold their annual show on March 21st & 22nd. There will be vendors, presentations, a kids' fossil mine, silent auctions, and more.

Hours: Sat. 9 am to 6 pm; Sun. 10 am to 4 pm

Adults \$7, kids 12 & under - free

Where: Florida State Fairgrounds, intersection of I-4 and Hwy. 301 just east of Tampa. There is a charge for parking.

For more info go to: www.tampabayfossilclub.com

Florida Fossil Hunters News

Aquilops americanus: Small Cat-Sized Dinosaur Discovered in Montana

Dec 11, 2014 by Sci-News.com

A group of paleontologists led by Dr Andrew Farke from Raymond M. Alf Museum of Paleontology has described a new genus and species of ceratopsian dinosaur that lived in what is now southern Montana during the Early Cretaceous epoch, about 108 million years ago.

The new dinosaur belongs to a group of herbivorous, beaked dinosaurs called Ceratopsia, better known as horned dinosaurs. Unlike its famous relatives, such as Triceratops, it lacked horns and a bony neck frill.

It is named *Aquilops americanus*, meaning American eagle face.

The genus name refers to the hook-like beak at the front of the skull, used to snip plants during feeding.

Aquilops americanus was about the size of a small cat, weighing around 1.6 kg and measuring around 60 cm in total length.

It is the oldest species of horned dinosaur known from North America, about 40 million years older than the iconic horned dinosaur Triceratops, which weighed up to 4,000 times more.

"This dinosaur lived nearly 20 million years before the North America's oldest previously known horned dinosaur," said Dr Farke, who is the lead author of the paper published in the journal PLoS ONE.

Aquilops americanus' partial skull and lower jaw were uncovered from the Cloverly Formation in Montana in 1997.

"The skull is comparatively small, measuring 8.4 cm long, and is distinguished by several features, including a strongly hooked rostral bone and an elongated and sharply pointed cavity over the cheek region," Dr Farke said.

He added: "*Aquilops americanus* is the first fossil to show what the earliest horned dinosaurs in North America looked like."

Surprisingly, the new dinosaur turns out to be more closely related to [ceratopsians](#) from Asia than to other ceratopsians from North America.

"We were surprised that it was more closely related to Asian animals than those from North America," Dr Farke said.

This is consistent with evidence from other animals, including carnivorous dinosaurs as well as early mammals, showing an immigration of species from



Asia into North America sometime between 115 and 105 million years ago.

Aquilops americanus will be stored in the vertebrate paleontology collection at the [Sam Noble Oklahoma Museum of Natural History](#) in Norman, Oklahoma.

Top Image:

Life restoration of Aquilops americanus.

Credit: Brian Engh / Raymond M. Alf Museum of Paleontology.

Lower image:

Reconstruction of Aquilops americanus in its environment. Credit: Brian Engh / Raymond M. Alf Museum of Paleontology.

550-million-year-old fossils provide new clues about fossil formation

A new study from University of Missouri and Virginia Tech researchers is challenging accepted ideas about how ancient soft-bodied organisms become part of the fossil record. Findings suggest that bacteria involved in the decay of those organisms play an active role in how fossils are formed -- often in a matter of just a few tens to hundreds of years. Understanding the relationship between decay and fossilization will inform future study and help researchers interpret fossils in a new way.

"The vast majority of the fossil record is composed of bones and shells," said James Schiffbauer, assistant professor of geological sciences in the College of Arts and Science at MU. "Fossils of soft-bodied animals like worms and jellyfish, however, provide our only views onto the early evolution of animal life. Most hypotheses as to the preservation of these soft tissues focus on passive processes, where normal decay is halted or impeded in some way, such as by sealing off the sediments where the animal is buried. Our team is instead detailing a scenario where the actual decay helped 'feed' the process turning the organisms into fossils -- in this case, the decay of the organisms played an active role in creating fossils."

Schiffbauer studied a type of fossil animal from the Ediacaran Period called Conotubus, which lived more than 540 million years ago. He noted that these fossils are either replicated by, or associated with, pyrite -- commonly called fool's gold. The tiny fossils are tube-shaped and believed to have been composed of substances similar at least in hardness to human fingernails. These fossilized tubes are all that remain of the soft-bodied animals that inhabited them and most likely resembled worms or sea anemone-like animals.

"Most of the animals that had once lived on the Earth -- with estimates eclipsing 10 billion species -- were never preserved in the fossil record, but in our study we have a spectacular view of a tinier fraction of soft-bodied animals," said Shuhai Xiao, professor of geobiology at Virginia Tech and a co-author on this study. "We asked the important questions of how, and under what special conditions, these soft-tissued organisms can escape the fate of complete degradation and be preserved in the rock record."

Schiffbauer and his team performed a sophisticated suite of chemical analyses of these fossils to determine what caused the pyrite to form. They found that the fool's gold on the organisms' outer tube formed when bacteria first began consuming the animal's soft tissues, with the decay actually promoting the formation of pyrite.

"Normally, the Earth is good at cleaning up after itself," Schiffbauer said. "In this case, the bacteria that helped break down these organisms also are responsible for preserving them as fossils. As the decay occurred, pyrite began replacing and filling in space within the animal's exoskeleton, preserving them. Additionally, we found that this process happened in the space of a few years, perhaps even as low as 12 to 800. Ultimately, these new findings will help scientists to gain a better grasp of why these fossils are preserved, and what features represent the fossilization process versus original biology, so we can better reconstruct the evolutionary tree of life."

44th ANNUAL JEWELRY, GEN MINERALS AND FOSSILS SHOW AND SALE

JANUARY 17TH & 18TH 2015
Saturday 10am-6pm
Sunday 10am-5pm

FREE Crystal or Sharks Tooth to Early Birds both Days
Short classes & demonstrations provided throughout the weekend

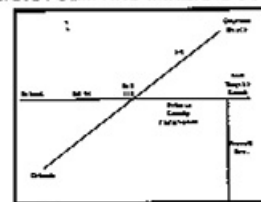
LOCATION
Volusia County Fairgrounds
Tommy Lawrence Building



Admission \$4.00

\$1.00 OFF

PER PERSON WITH THIS FLYER
FREE DAILY DRAWINGS
FREE PARKING—CHILDREN 12 & UNDER FREE
Presented by
TOMOKA GEM AND MINERAL SOCIETY



SEE: Lapidary & Jewelry, Demos, Supplies, Fine
Jewelry, Gems, Minerals & Fossils
www.tomokagms.org

The Tomoka Gem and Mineral Society

presents their 43rd Annual Jewelry,
Gem and Mineral, Fossils Show
and Sale on

Sat., Jan 17th, 2015

- 10am - 6pm and

Sun., Jan. 18th, 2015

- 10am - 5pm Volusia County Fair-
grounds

Tommy Lawrence Building

State Route 44, Deland, FL

(½ MILE EAST OF I-4,

EXIT 118)

For more info, go to:

www.tomokagms.org

Florida Fossil Hunters News

VULCAN MINE Field Trip

Vulcan Mine Field Trip near Brooksville

If you did not sign up at the September meeting, please call or email the trip leader at:

Jan. 10th trip leader - Joe Rossi,
jrgbsd@live.com | cell phone 321-303-3749

Feb. 14th trip leader - Bonnie Cronin,
bonnierussell62@gmail.com | 352-429-1058
(cell ph. for day of trip only 321-279-2592)

This is one of the few places where kids are allowed in to fossil hunt. Be sure to stay with them since there are steep cliffs, sharp rocks, and small sinkholes.

Meet on the driveway loop near the entrance to the Mine by 8:30 am to sign releases before we are escorted into the mine around 9 am. We get to drive our vehicles in so you can have your coolers, snacks, and equipment handy while you hunt. They usually allow us to dig until noon and sometimes people can stay till 2 pm.

All participants

MUST be escorted

into and out of the mine. Do not leave on your own since it is easy to become lost.

THERE ARE

NO RESTROOM FACILITIES AT VULCAN, other than the boulders and the hills.

Directions: The trip will take approximately 2 hours from Orlando to Vulcan Mine. Be sure to allow for extra time to stop at a restroom before you get there.

From Orlando take Hwy. 50 west (or the 408 west to the FL Turnpike, take exit 272 and then continue west on Hwy. 50) to Brooksville. Follow 50A/98 North through Brooksville and turn right on Ponce De Leon Blvd. (Hwy 98 North). Go approximately 10 miles. Vulcan/Cemex will be on your left. The address is 16313 Ponce De Leon Blvd, Brooksville, for those of you who want to download a map.

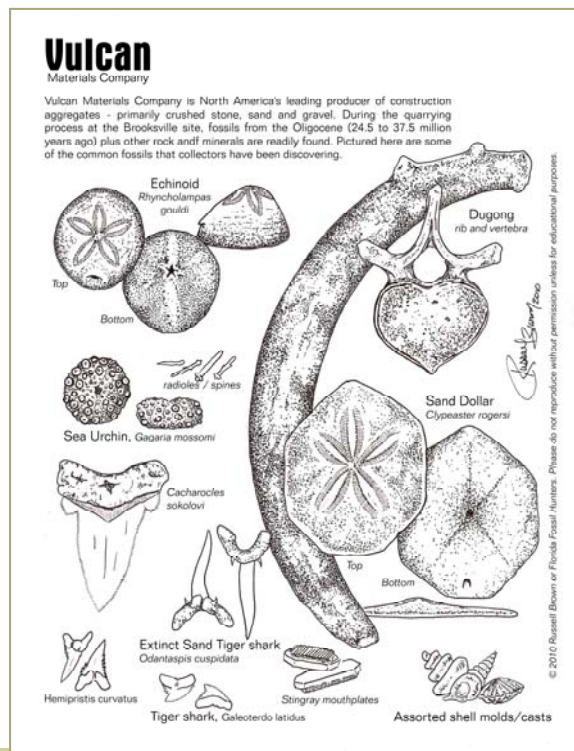
If you follow the truck route for Hwy. 50, you have to turn right onto 41, and then take the fork to the left to hook up with Ponce De Leon Blvd/98. There are several fast food places on 41 where you can take advantage of the bathroom facilities. Be sure NOT to keep following 41 north. You want to take 98 north from Brooksville.

This is mostly surface collecting with occasionally a little digging to pry out a specimen. Bring a small

trowel or screwdriver or rock hammer, and a bucket to put your fossils and rocks into. You may want to bring small containers and tissue for fragile fossils.

Wear a hat, sturdy shoes, long pants (some of the rocks are sharp), and sunscreen. Bring lots of water and/or drinks and some snacks or lunch to eat.

We find mostly echinoids and sometimes sea urchins, pieces of bone, or other fossils are found. We also find chert rocks. This is the material that the Indians used to make their arrowheads and tools.



ID Sheet above is available on the field trip and website.
floridafossilhunters.com/Field_Trips.htm

You MUST be a member of the club for insurance purposes to participate in this field trip.

Join Us
JAN 10th &
FEB 14th

Florida Fossil Hunters News

Florida Fossil Hunters

Membership Application

is a fun and educational group whose goal is to further our understanding of the prehistory of Florida. We encourage family participation and welcome explorers of all ages.

Membership is \$17 per year. Other household members may be included at no charge.

Meetings are usually held on the third Saturday of the month but may vary with club activities. Check the website for the date and location of the next meeting or call one of the officers.

Officers:

President	Russell Brown	(352) 429-1058
Vice President	Dave Dunaway	(407) 786-8844
Secretary	Bonnie Cronin	(352) 429-1058
Treasurer	Sara Morey	(619) 302-4863

Chairs:

Education	Bonnie Cronin	(352) 429-1058
Field Trips	OPEN	
Fossil Fair	Valerie First	(407) 699-9274
Fossil Auctions	Dave Dunaway	(407) 786-8844
Fossil Bucks	Dave Dunaway	(407) 786-8844
Fossil Lotto	Ed Metrin	(407) 321-7462
Membership	Bonnie Cronin	(352) 429-1058
Newsletter	Bonnie Cronin	(352) 429-1058
	Elise Cronin-Hurley	(407) 929-6297
Photography	John Heinsen	(407) 291-7672
Webmaster	Elise Cronin-Hurley	(407) 929-6297
	elise@lisedreams.com	

Board of Directors:

Melissa Cole	(407) 834-5615
Ed Metrin	(407) 321-7462
Dave Cass	(407) 409-9095
Shelley Zimmerman	(407) 891-1260
Marge Fantozi	
Marcia Wright	
Cindy Lockner	

Names: _____

Associate Members: _____

Address: _____

City: _____

State: _____ Zip: _____ Phone: _____

e-mail: _____

____ New ____ Renewal

Please list any interests, experience, talents or just plain enthusiasm, which you would like to offer to the club:

Membership is \$17 per year. Our membership year runs from January to December. All renewals are done in December and January.

Please make your checks payable to:

Florida Fossil Hunters
Post Office Box 540404
Orlando, Florida 32854-0404

Associate members are people in the same household, included at no extra charge, 2 adult votes per household.

Newsletter Policy

Articles must be submitted by the first of the month to be included in that month's newsletter. These can be mailed to the above Post Office Box or e-mailed to: bonnierussell62@gmail.com . Articles can be sent as text in the e-mail or in Microsoft Word files (.doc or .docx).

Please note in subject of email 'FFH'.

Florida Prehistorical Museum, Inc.
dba/ Florida Fossil Hunters

Florida Fossil Hunters News

Florida Fossil Hunters Mark Your Calendar

See inside for more information on events.

Saturday, January 10th
Vulcan Mine

January 17th & 18th
Tomoka Gem & Mineral show

Saturday, January 24th - 10 am to 4 pm
FL Museum of Natural History
A T-rex Named Sue opening celebration
FFH will do this INSTEAD of a January meeting

Saturday, February 14th
Vulcan Mine

Saturday, February 21st
2 pm Kids' Fossil Blast
3 pm Meeting & Speaker

Sunday, March 8th - 1 to 4 pm
FLMNH, Ask a Scientist: Geology

Saturday, March 14th
Vulcan Mine

Saturday, March 21st
2 pm - Kids' Fossil Blast
3 pm - Meeting & Speaker

March 21st & 22nd
Tampa Bay Fossil Fest

Saturday, May 16th
Women in Paleontology

Jan. 24 to Sept. 13, 2015 -
A *T. rex* Named Sue exhibit

Be Green

Email Bonnie at bonnierussell62@gmail.com
to receive the newsletter via email.



Join Our Facebook group, Search:

[Florida Fossil Hunters](#)

facebook

Visit us online at www.floridafossilhunters.com

Articles and comments should be sent to: bonnierussell62@gmail.com

Florida Fossil Hunters

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Florida Fossil Hunters News