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Livingston Gem and Mineral Society

July 2014

# **President's Message**

A big thank-you to Sheila York for hosting our June picnic. We had a very large turnout. This month's picnic will be at Epley Park in Hartland. It is only 2 or 3 miles from the shop. Directions will be in this newsletter and on the bulletin board.

Thank you to Gayland, Chuck, and Bob K. for keeping the saws running and the oil changed. Chuck has also replaced several of the sanding belts so pay attention to the dates when you go to use them. Also, a big thank you to Janel Layton who brought cleaning supplies from her home and scrubbed the floor by the wheels, and under the floor mats. She also cleaned the office and some sinks. She made the sinks look as good as new.

Lastly, it is July, and time to start thinking about our show in September. Please think about where best to use your talents.

#### Bryant

# **Holiday Closing**

The shop will be closed on Friday, July 4.

Happy 4<sup>th</sup> of July!



# **Workshop Hours**

Monday: 10 a.m. to 1 p.m. Tuesday: 9 a.m. to 9 p.m. Wednesday: 10 a.m. to 9 p.m. Friday: 10 a.m. to 2 p.m.

#### **Our Mission**

The Livingston Gem and Mineral Society is a nonprofit organization and member of the Midwest Federation of Mineralogical Societies and the American Federation of Mineralogical Societies.

Our purpose is to promote, through educational means, public interest and increased knowledge in the fields of mineralogy, archaeology, paleontology, and the lapidary arts.

## **An Important Reminder**

In the June issue of MWF News, our president, Tony Kapta, reminded all rockhounds about the critical importance of adhering to the AFMS Code of Ethics. This problem is particularly significant in Michigan's Upper Peninsula where most of the old mines are located on private property. Because of past trespassing and lack of common courtesy, people who do properly ask permission to collect minerals, are often not being allowed. Please follow the AFMS Code of Ethics and be considerate of other rockhounds and property owners.

#### **AFMS Code of Ethics**

- \* I will respect both private and public property and will do no collecting on privately owned land without permission from the owner.
- \* I will keep informed on all laws, regulations or rules governing collecting on public lands and will observe them.
- \* I will, to the best of my ability, ascertain the boundary lines of property on which I plan to collect.
- \* I will use no firearms or blasting material in collecting areas.
- \* I will cause no willful damage to property of any kind such as fences, signs, buildings, etc.
- \* I will leave all gates as found.
- \* I will build fires only in designated or safe places and will be certain they are completely extinguished before leaving the area.

- \* I will discard no burning material matches, cigarettes, etc.
- \* I will fill all excavation holes which may be dangerous to livestock.
- \* I will not contaminate wells, creeks, or other water supplies.
- \* I will cause no willful damage to collecting material and will take home only what I can reasonably use.
- \* I will practice conservation and undertake to utilize fully and well the materials I have collected and will recycle my surplus for the pleasure and benefit of others.
- \* I will support the rockhound project H.E.L.P. (Help Eliminate Litter Please) and will leave all collecting areas devoid of litter, regardless of how found.
- \* I will cooperate with field-trip leaders and those in designated authority in all collecting areas.
- \* I will report to my club or federation officers, Bureau of Land Management or other authorities, any deposit of petrified wood or other materials on public lands which should be protected for the enjoyment of future generations for public educational and scientific pruposes.
- \* I will appreciate and protect our heritage of natural resources.



#### 2014 Officers and Chairpersons

President: Bryant Hiiter, 248-889-3974 Vice President: Gayland Allen, 810-275-3444 Secretary: Sheila York, 810-695-0509 Treasurer: Peggy Petito, 248-887-8847

First year Director: Margaret Edmundson, 248-634-5046

Paul McEwen, 810-735-5832

Second year Directors: Ed Oller, 810-241-8801 Third year Director John Petito, 248-887-8847

Hospitality: Venus Sage, 810-458-4290 Sunshine: Isla Mitchell, 248-685-7804

Shop Chairperson: Chuck Amberger, 248-787-6586

Newsletter and Membership:

Isla Mitchell, 248-685-7804 imvm.1@netzero.com

Show Chairman and Historian:

Chuck Amberger, 248-787-6586

Library: Bryant Hiiter, 248-889-3974

General Membership Meetings are held monthly on the 3<sup>rd</sup> Tuesday at 6 p.m. (Except in January and February when board meetings are held in

the shop at 1 p.m.)

The difference between stumbling blocks and stepping stones is how one uses them.

Via MMS Tumbler 6/92

Men stumble over pebbles, never over mountains.

Via Scribe, winter 1992



# **Upcoming Events**

### August 5-9, 2014 Keweenaw Mineral Days hosted by the A.E. Seaman Mineral Museum, Keweenaw Gem & Gift and Red Metal Minerals

Museum is at Michigan Technological University 1404 E, Sharon Ave, Houghton, MI

# September 5-7, 2014 Toledo Gem & Rockhound Club Jewelry, Gem & Mineral Show & Sale

Stranahan Great Hall, 4645 Heatherdowns Blvd., Toledo, Ohio Fri. 2-8, Sat. 10-6, Sun. 11-5;



# The **2014 LGMS Show** is scheduled for **September 20 and 21**

(Setup on September 19)
Thanks for helping to distribute the flyers which are available in the shop.

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LGMS, Hartland Consolidated Schools, 9525 E. Highland Rd. Howell, Michigan 48843-9098.

#### What's in it?

Future editions of our newsletter will list the common names of rocks <u>and</u> their composition. We all have looked at a rock and said "What is it?" There is a common name and names for all the elements in it.

We are familiar with the common names of a lot of rocks we cut and polish. But many of us are not familiar with the elements that make up the composition of those rocks.

These element names and their symbols are found in the periodic table of elements. They are all the known basic elements in single and compounds that make up everything on earth.

Elements occur as gas, vapor, liquid, solid and crystal depending on temperature and pressure and take form as a single element or with other elements as a compound. For example, consider these rocks and their contents: hematite (Fe<sub>2</sub>O<sub>3</sub>,), opal (SiO<sub>2</sub>nH<sub>2</sub>O), and jadeite (NaAlSi<sub>2</sub>O<sub>6</sub>). The subscript number refers to the number of atoms of each element.

#### **Elements**

Reference: Element Distribution in the Earth's Crust, http://ww2.wpunj.edu/cos/envsci-geo/distrib\_resource.htm

What Is a Chemical Element? A chemical element, or an element, is a material which cannot be broken down or changed into another substance using chemical means. Elements may be thought of as the basic chemical building blocks of matter. Depending on how much evidence you require to prove a new element has been created, there are 117 or 118 known elements.

What Is the Most Abundant Element? The most abundant element in the universe is hydrogen, which makes up about 3/4 of all matter! Helium makes up most of the remaining 25%. Oxygen is the third most abundant element in the universe. All of the other elements are relatively rare.

The chemical composition of the earth is quite a bit different from that of the universe. The most abundant element in the earth's crust is oxygen, making up 46.6% of the earth's mass. Silicon is the second most abundant element (27.7%), followed by aluminum (8.1%), iron (5.0%), calcium (3.6%), sodium (2.8%), potassium (2.6%). and magnesium (2.1%). These eight elements account for approximately 98.5% of the total mass of the earth's crust. Of course, the earth's crust is only the outer portion of the earth. Future research will tell us about the composition of the mantle and core.

The most abundant element in the human body is oxygen, making up about 65% of the weight of each person. Carbon is the second more abundant element, making up 18% of the body. Although you have more hydrogen atoms than any other type of element, the mass of a hydrogen atom is so much less than that of the other elements that its abundance comes in third, at 10% by mass.

#### **CHART OF COMMON ELEMENTS**

Symbol	Name	Symbol	Name
Ag	Silver	Li	Lithium
Al	Aluminum	Mg	Magnesium
Ar	Argon	Mn	Manganese
As	Arsenic	Мо	Molybdenum
Au	Gold	N	Nitrogen
В	Boron	Na	Sodium
Ba	Barium	Ne	Neon
Ве	Beryllium	Ni	Nickel
Br	Bromine	0	Oxygen
С	Carbon	P	Phosphorus
Ca	Calcium	Pb	Lead
Cd	Cadmium	Pd	Palladium
CI	Chlorine	Pt	Platinum
Со	Cobalt	Rn	Radon
Cr	Chromium	S	Sulfur
Cu	Copper	Se	Selenium
F	Fluorine	Si	Silicon
Fe	Iron	Sn	Tin
Н	Hydrogen	Ti	Titanium
He	Helium	U	Uranium
Hg	Mercury	W	Tungsten
	Iodine	Xe	Xenon
K	Potassium	Zn	Zinc
Kr	Krypton	Zr	Zirconium

Livingston Gem and Mineral Society 9525 E. Highland Road Howell, MI 48843-9098





Potluck Gathering on Tuesday, July 15, 2014 at Epley Park in Hartland

Directions: From the shop, take M59 east to Old US 23; turn north or left and go about 1 ½ miles; turn east or right on Crouse Road and go a short distance over US 23 to Hartland Road; turn north or left on Hartland Road and go one block to Hibner (Maple); turn right or east and go 3 blocks to the park on the right or south side of road.