## <u>The Small Arms of the World Wars</u> <u>\$200</u> <u>Continuing ed only-not for college credit</u>

When it comes to the topic of preserving vintage firearms (including those used in combat in both WWI and WWII), opinions tend to be highly polarized.

One school of thought insists that NOTHING be done to any firearm over about 50 years old, and even the critical age is subject to spirited discussion. According to the fundamental underlying theory of this group, these are "historical relics" and, thus, it is our responsibility to preserve each of these firearms, as is, for posterity. Thus, we should do nothing beyond the barest minimum to arrest any serious corrosion of the metal components or decay of the wooden components ... and some extremists consider even this "intervention" to be unacceptable. The second school of thought tends to be more pragmatic, focusing more on the original "form, fit and function" of each specimen than its current condition. According to the fundamental underlying philosophy of this group, it is wholly unrealistic to assume that any of these firearms is still in a condition comparable to when it was in its prime. Rather, it is considered more reasonable to assume that, in its passage though a long chain of possessors, at least one has, in some way, significantly altered the original nature of the firearm, sometimes due to simple failure to maintain the gun in proper working order, but more often in various attempts to adapt the gun to somewhat different purposes than was originally intended. Thus, it is deemed entirely acceptable to perform any of a number of "conservation" measures in an effort to restore the firearm, to the extent reasonably possible, to its original "form, fit and function."

While I, personally, can fully respect the first approach, I have chosen to subscribe to the second approach, especially in view of the fact that most, if not all, of the really "vintage" firearms that are not already hidden away in private collections, have been grossly modified in an effort to enhance their marketability to gullible consumers. Not only are these "bastards" unworthy of treatment like authentic originals, I submit that they deserve to be returned to as close to original condition as reasonably possible.

<u>Note 1</u>: I will NOT demonstrate ANY blueing or browning techniques as I deem this action to be beyond the legitimate scope of "conservation".

**Prerequisites:** Knowledge of basic rules of firearm safety. Basic skills employing standard hand tools useful in disassembling and reassembling firearms. Although not required, I encourage all students to bring at least one WWI or WWII firearm, especially handguns!

**Course Description:** I shall introduce my students to the primary mainstream infantry rifles used in combat during WWI, including:

USA:

Springfield Model 1903, a bolt action rifle chambered in .30-06 Springfield;

United States Rifle, Model of 1917 (Enfield), an Enfield P14 bolt action rifle, rechambered from .303 British to .30-06 Springfield;

British Empire:

Enfield Pattern 14 (P14), a bolt action rifle chambered in .303 British; France:

Chassepot, a bolt action rifle, rechambered from a 11 mm paper-cartridge needle-gun to a 11 mm Gras metal cartridge;

Lebel, a bolt action rifle chambered in 8x50mmR; Italy:

Carcano, a bolt action rifle chambered in several calibers, including 6.5x52mm Carcano\* and 7.92x55mm Mauser;

Russia:

Mosin-Nagant, a bolt action rifle chambered in several calibers, including 7.62x54mmR; Germany:

Gewehr 98, a bolt action rifle chambered in 7.92x57mm Mauser and WWII:

USA:

M1 Garand, a semi-automatic rifle chambered in .30-06 Springfield; British Empire:

Enfield Pattern 14 (P14), a bolt action rifle chambered in .303 British; Russia:

Mosin-Nagant, a bolt action rifle chambered in several calibers, including 7.62x54mmR; Germany:

Gewehr 98, a bolt action rifle chambered in 7.92x57mm Mauser;

Karabiner 98\*, a shortened version of the Gewehr 98;

Italy:

Carcano, a bolt action rifle chambered in both 6.5x52mm Carcano\* and 7.35x51mm Carcano; Japan:

Arisaka Type 38\*, a bolt action rifle chambered in 6.5x50mm Arisaka;

Arisaka Type 99, a bolt action rifle chambered in 7.7x58mm Arisaka.

\* <u>Note 2</u>: I do not, at present, have one of these in my collection. I invite my students to bring one if possible.

I have only a few vintage handguns, but DO have a nice Webley Model V chambered in .455 Webley (but, unfortunately, the cylinder has been "shaved" to accommodate .45 Auto Rimmed).

We will fully disassemble each of these, and discuss techniques for detecting problems in each of the mechanical components. To the extent possible, I will describe techniques and sources for returning many of these components to functional condition. However, great care MUST be taken if you decide to actually fire a truly vintage firearm. I will discuss techniques for doing so, with the primary goal of protecting YOU from possible injury, but also to minimize the risk that the gun will incur irreparable damage or possible destruction.

Since the wooden stocks of many current examples of these fine weapons have been "refinished" using modern coatings, *e.g.*, varnish or (Heaven forbid!) *polyurethane*, I will demonstrate my preferred techniques for removing these inappropriate finishes and restoring the original <u>RAW</u> Linseed or Tung Oil finishes.

<u>Note 3</u>: some of these chemicals are considered moderately hazardous (at least in California) - students should advise me of any sensitivity to these types of solvents. If in doubt, ASK!

## **Instructor: Jeffrey Van Myers**

**Tools:** Basic hand tools, preferably of smith quality, especially the screwdrivers and drift punches (I use and recommend both Grace and Wheeler Engineering). If you bring something special to share with the class and you happen to have any unique tools for your "old friend", please bring them as I may not have what we need to fully disassemble it.

## **Supplies:**

---RAW (not "boiled") linseed oil, approximately 1 qt. per project; this is rarely sold in normal hardware/lumber stores, so I special order it on-line; "Sunnyside" brand is what I use:

http://www.sunnysidecorp.com/product.php?p=cf&b=s&n=873G5

Note 4: however, see, https://thecmp.org/wood-cleaning-article/

*—Minwax Antique Furniture Refinisher*, approximately 1 qt. per project - should be easy to get at your local *Home Depot*:

http://www.minwax.com/wood-products/preparation/minwax-antique-furniture-refinisher

-Mineral spirits - approximately 1 qt per project - may be furnished by the school.

*—Ballistol* - 4 oz bottle of liquid - I am a dealer and may be able to obtain samples for each student.

- *—Froglube* 4 oz paste I am a dealer and may be able to obtain samples for each student: <u>http://shop.froglube.com/FrogLube-CLP-Paste-4-oz-Jar-FLP-P412.htm</u>
- —Steel wool #0000 1 pkg, available at most hardware/lumber stores.
- -Wet/dry sandpaper 220 and 400 grit; available in the Trinidad campus book store.

—Nitrile (or equivalent) gloves - 1 pkg (we will go through these pretty quickly, depending on the condition of the wood components).

-A US nickel - this, plus the Froglube, does an amazing job of removing surface rust!

## **Optional:**

1. Given the difficulty of finding ammo for these really old guns, I am prepared to teach the class how to cast bullets and then re-size to correct diameter, provided that we have access to the bluing room during this portion of the class.

2. I may also have time to teach how to make a darn good bullet lube from the following:

—Bee's wax - 45% by weight;

-Castor Wax (saponified castor oil) - 5% by weight;

—Castor Oil - 50% by weight;

If no lubri-sizer press is available in our class room, we can use a cookie pan/sheet (needs a rim around all 4 sides) - used to immerse the lube groove(s) of a batch of cast bullets, base down, in liquefied lube; when cooled and hardened, the bullets can be extracted with the lube grooves full of the lube mix; something like this (but does not need to be non-stick):

https://www.walmart.com/ip/Wilton-Bake-It-Better-10-x-15-Cookie-Sheet/25420423