

Proposal for One Mile Shooting Events at RMSF

by Paul D. Rittmann, PhD Revision 2 May 23, 2009

Shooting at 1 mile is not new. David Tubb has a video about shooting 30 caliber bullets at 1 mile. The magazine *Very High Power* (published by the Fifty Caliber Shooters Association, or FCSA) from time to time covers very long range (1 mile or more) shooting. Given below are my thoughts on how this would be done at the 1000 yd Rifle Range.

The purpose for adding the 1 mile firing point is to be one of the few civilian ranges in the United States with some very long distance shooting.

The cost to the High Power Committee would be manageable. A gate of some kind would be added along the west boundary of the range. The gate would be due west of the 1 mile location. This would allow access from the BPA road to the 1 mile point. Some soil would need to be added to the proposed 1 mile location to provide a foundation for the concrete benches. Lee Rasmussen has already offered to make the benches.

In 2005 we added 10 new benches at the 1000 yd line. The cost for these benches was \$1701.03 as itemized below.

- 10 benches (delivered) -- \$1298.54
- gravel to build up the left side of the 1000 yd line -- \$148.65
- forklift rental -- \$253.84

A suitable starting point is 4 benches at 1 mile. Total cost should be less than \$1000.

Depending on the actual location for the 1 mile firing point, the path of the bullets may put them over the fence at the corner just west of the 900 yd line. To restrict access to this corner during a 1 mile event, the One Mile Shooters would put up a temporary fence outside the established fence. This would be set up the day before shooting and taken it down shortly afterward. The orange fence seen at construction sites would serve this purpose. About 100 yd of temporary fence would be needed.

Note that the proposed location for the 1 mile firing line is not on the property spelled out in the current TCSA lease with Benton County. However, it is within the current fenced area. Thus, if the new lease is based on the current fence, there should be no location issues.

Criteria the One Mile Shooters must meet are listed below. Each of these criteria is easy to measure. Meeting them will ensure a safe and satisfying shooting experience for the One Mile Shooters.

- experience with long range shooting (participates in FCSA or NRA long range events)

- able to shoot a 5-shot group inside 20 inches from 1000 yd with the equipment to be used at 1 mile
- bullets must be supersonic at the target, even after traveling 1 mile

Operation of the 1 mile firing point would follow the guidance listed below. The RO Committee would refine these as needed to ensure safe operation.

(1) The One Mile Shooters would schedule the Rose Range for the day that shooting was to take place, like any other group needing the facility. Visitors would be welcome, but shooting at the Rose Range would be prohibited while the One Mile Shooting event was in progress. One Mile Shooting events would only occur on a weekday and be advertised well in advance. Radio or phone communication between the person at the Rose Range, the people at the 1 mile position, and the people in the target pits is mandatory.

(2) To ensure no one can enter the 1000 yd Rifle Range while the 1 mile event is in progress the gate to the 1000 yd Rifle Range must be locked and posted.

(3) Shooters would meet in the target pits and set up targets. To qualify to shoot at 1 mile the shooters would have demonstrated the ability to shoot well at 1000 yd with the equipment to be used at 1 mile. The 1000 yd checkout can be done the day before.

(4) One Mile Shooters would travel west from the target pits along the north fence. They would go through the gate and follow the BPA road south until they were due west of the 1 mile firing point. They would then drive through the new gate in the west fence to the one mile point.

(5) One Mile Shooters do their shooting with the gate to the 1000 yd Rifle Range locked and the Rose Range secured. Target pullers are safe in the target pits due to the design of the pits. As long as the bullets are supersonic when they reach the target, the metal parts of the target frame are protected by the berm in front of the targets. This was verified using ballistics software.

(6) The bullets fired from 1 mile will be coming into the targets at steeper vertical angles than when fired from 1000 yd. Hence, the locations downrange (north) of the impact mound are less likely to see an errant bullet. Also, the shooters are not going to be the average joe with a long-range rifle. The entrance requirements (ammo, rifle and shooter) are demanding.

Please direct any questions or comments to me at PaulRittmann@gmail.com or 509-845-4900 or 509-783-1845.