WHAT IS CLAIMED IS:

1. A weapons training assembly (WTA) for use with a weapon, comprising:

a) a magazine; and

b) a small arms transmitter (SAT),

wherein the magazine comprises magazine optical detectors for detecting that a laser virtual shot of another weapon has hit the weapon, and wherein the SAT comprises SAT optical detectors.

2. The WTA of claim 1, further comprising one or more bolt detectors.

3. The WTA of claim 2, further comprising a weapon adaptor and wherein the one or more bolt detectors are positioned on the weapon adaptor.

4. The WTA of any one of the above claims, further comprising a trigger detector and/or a fire selector detector.

5. The WTA of any one of claims 3-4, wherein the weapon adaptor is adapted for installation in the weapon.

6. The WTA of any one of the above claims, wherein the magazine is sized and adapted for insertion into a magazine well of the weapon.

7. The WTA of any one of the above claims, wherein the SAT comprises a barrel mount for mounting on a barrel of the weapon.

8. The WTA of any one of the above claims, wherein the SAT comprises a shot-flash light.

9. The WTA of any one of the above claims, wherein the magazine comprises a component selected from the group consisting of a GPS receiver, a mobile data communication device, a short range communication device, an audio amplifier, a battery, a speaker, and a virtual-ammunition count indicator.

10. The WTA of any one of claims 3-8, wherein the weapon adaptor comprises a virtual round loaded indicator.

11. The WTA of any one of the above claims, wherein the magazine optical detectors and the SAT optical detectors are Multiple Integrated Laser Engagement System (MILES) compatible laser detectors.

12. A method for weapons training, comprising:

a) attaching the WTA of any one of claims 4-11 to a weapon;

b) inserting the magazine into the magazine well of the weapon to load virtual rounds; and

c) charging the weapon with a bolt of the weapon to chamber one of the virtual rounds.

13. The method of claim 12, further comprising detecting a trigger press by the trigger detector and firing one of the virtual rounds.

14. The method of claim 13, wherein the firing of one of the virtual rounds comprises one or more of: decreasing the number of available virtual rounds in the magazine, causing a laser transmission from a laser transmitter on the SAT, causing a sound from the speaker, or causing a light flash from shot-flash light.

15. The method of claim 14, further comprising when the virtual rounds are exhausted, requiring removal and reinsertion of the magazine for reloading virtual rounds.

16. The method of claim 15, further comprising, charging of the bolt for chambering one of the virtual rounds for firing.

17. The method of any one of claims 12-16, further comprising detecting a hit by one of the magazine optical detectors or SAT optical detectors.

18. The method of claim 17, wherein when a hit is detected, performing one or more of: emitting a sound, preventing further virtual shooting from the weapon, or flashing a light source.

19. A weapons training assembly (WTA) for use with a real weapon comprising a plurality of optical detectors, wherein the plurality of optical detectors are adapted for attachment to the real weapon.

20. The WTA of claim 19, further comprising:

a) a magazine; and

b) a small arms transmitter (SAT),

wherein the plurality of optical detectors are provided on one or both of the magazine and/or the SAT, wherein the magazine optical detectors are for detecting that a laser virtual shot of another weapon has hit the weapon, and wherein the magazine and the SAT are adapted for attachment to the real weapon.

21. A weapons training assembly (WTA) for use with a real weapon comprising a bolt detector for attachment to the real weapon.

22. The WTA of claim 21, further comprising a plurality of optical detectors for attachment to the real weapon.

23. The WTA of claim 22, further comprising:

a) a magazine; and

b) a small arms transmitter (SAT),

wherein the plurality of optical detectors are provided on one or both of the magazine and/or the SAT, wherein the magazine optical detectors are for detecting that a laser virtual shot of another weapon has hit the weapon, and wherein the bolt detector is provided on the magazine, and wherein the magazine and the SAT are adapted for attachment to the real weapon.

24. The WTA of claim 23, further comprising a weapon adaptor attached to the magazine, wherein the bolt detector is provided on the weapon adaptor.