Scott Franz

From: Franz, Scott

Sent: 11/08/2000 11:51:25 AM

To: Keeney, Mike CC: Franz, Scott

BCC:

Subject: M/710 Path Forward

Mike, Please review for accuracy. Comments/ suggestions? Dale wants to publish ASAP.

Thanks, Scott

On Tuesday Mike Keeney and myself visited Mayfield to jointly investigate the issues raised during Trial & Pilot testing. A total of seven guns were brought back. The gun and the reason for return are listed below.

A-2 71001425 Headspace Won't close on E-town's Min. Gauge A-14 71001004 Fire Control - Follow Down A-26 71001136 Fire Control - Follow Down and fire on bolt closing A-5 71001287 Trigger location in stock A-13 71001132 Trigger location in stock A-18 71001439 Trigger location in stock A-25 71001393 Trigger location in stock	GUN	SERIAL NO.	ISSUE ((()))
A-26 71001136 Fire Control + Follow Down and fire on bolt closing A-5 71001267 Trigger location in stock A-13 71001132 Trigger location in stock A-18 71001439 Trigger location in stock	A-2	71001425	Headspace Won't close on E-town's Min. Gauge
A-5 71001267 Trigger location in stock A-13 71001132 Trigger location in stock A-18 71001439 Trigger location in stock	A-14	71001004	Fire Control - Follow Down
A-13 71001132 Trigger location in stock A-18 71001439 Trigger location in stock	A-26	71001136	Fire Control - Follow Down and fire on bolt closing
A-18 71001439 Trigger location in stock	A-5	71001267	
	A-13	71001132	
A-25 71001393 Trigger location in stock	A-18	71001439	Trigger location in stock
	A-25	71001393	Trigger location in stock

It was noticed during T & P that the location of the trigger in the trigger guard varied considerably both side to side and front to back. Guns A-5, A-13, A-18 and A-25 were chosen to show the extremes of this trigger location variation.

During this trip the following was discovered:

- 1. Gun A-2 was examined first. The bolt did close on Mayfield's GO gauge as it should. E-town's headspace gauges were never updated after dimensional changes were made to the .30-06 cal. chamber. This is no longer a T&P issue. E-town gauges will be updated.
- 2. Trigger location front to back was investigated next. It was determined that the trigger was bent. The cause of this bending was isolated to the proof test fixture that remotely fires the gun. Mayfield has already made a change to this fixture and the current setup does not bend triggers. Most of the T & P product was tested in the proof test fixture before this change was made. As a result a high percentage of triggers are bent.
- 3. Side to side trigger variation was attributed to stock deformation. A change to the stock mold cooling system has been made. Stocks run with this hot manifold modification exhibit less sink and distortion.
- 4. Gun A-14 was examined. Trigger pull was in specification when checked. It was noticed that loosening and retightening the support bracket screw did bind the sear. A very slight movement of the fire control was detected when the screw was tightened. The location of the tapped hole in the receiver was checked and this was determined to be out of specification. The insert assembly was checked on the adjustment and inspection setup and it was determined that the trigger was not fully returning to the fully engaged position. The force required to rotate the trigger to the fired position measured low on this sample.
 - 5. Gun A-26 was examined. Trigger pull on this gun was also in specification when checked.