

C6636073

MODEL 700TM M24

Model **SMS** TM

Action

Barrel Length

Capacity

Order No. **5716**

*Includes 1 in chamber.






VERY IMPORTANT:
Instruction Book
enclosed to assure
safe use of this
firearm.

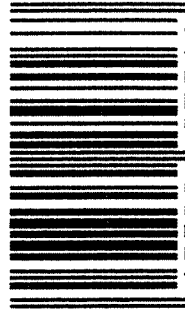
REG. U.S. PAT. & TM. OFF.

MODEL 700™	M24	SERIAL NO. C6636073
MADE IN ILION, N.Y. U.S.A. Reg. U.S. Pat & Tm. Off, Marca Registrada Marque Deposee.		ORDER NO. 5716



5716 C6636073

UPC



0 47700 25716 7

CONTRACT # DAAA21-87-C-0086

GUN SERIAL # **C 6636073**

OP. #	OP. NAME	READINGS	DATE	INIT
575 & 580	Assemble Action and Stock		4/9/91	K.S.
600	Proof		4/9/91	K.S.
607	Check Headspace		4/9/91	K.S.
610	Dis-assemble Gun		4/9/91	K.S.
612	Magnaflux Barrel Action		4/10/91	KR
	Magnaflux Bolt		4/10/91	U
615	Rollmark Caliber		4/10/91	Y.S.
617	Drill and Tap Sight Holes		APR 19 1991	LB
618	Polish Barrel		APR 19 1991	WB
620	Apply Coatings (Barrel Action)		5-10-91	PA
	Apply Coating (Bolt)			PA
625	Final Assembly A) Clean inside of Bolt Assembly		5-22-91	KS
	B) Inspect Rear Firing Pin Hole for Chamfer in Bolt Head		5-22-91	KS
	C) Inspect Ejector Hole for Chamfer		5-22-91	KS
	D) Oil Firing Pin Ass'y		5-22-91	KS
	E) Adjust Trigger Pull to Min Setting and Stake		5-23-91	DH

Op. #	Op. NAME	READINGS					DATE	INIT
625 cont.	F) Safety On Force	5	5	5			5-23-91	DH
	G) Safety Off Force	2 1/2	2 1/4	2 1/2			5-23-91	DA
	H) Trigger Pull Test & Retainability						5-23-91	D/H
	I) Firing Pin Indent	.020	.020	.020			5-23-91	D/H
	J) Assemble Stock						5/23/91	KS
	K) Assemble Swivel Studs						6-1-91	D/H
	L) Attach Front and Rear Sight Assemblies						5/23/91	KS
	M) Iron Sight Alignment						5/23/91	KS
	N) Detach Front & Rear Sights & place in numbered container						5/23/91	KS
	O) Attach Scope to Rifle						5/23/91	KS
	P) Detach & Attach Scope 20 Times						5/23/91	KS
640	Gallery Target & Test						5-24-91	NF
	A) Time						"	NF
	B) Malfunctions						"	NF
	C) Pierced Primers						"	NF
	D) Optical Clarity of Scope						"	NF
645	Inspect for Live Ammo						5-24-91	NF
655	Final Inspection							
	A) Headspace						6-1-91	D/H
	B) Trigger Pull	2.42	2.29	2.36	2.37	2.42	6-1-91	JK
	C) Function						6-1-91	D/H
660	Pack						6-20-91	NF

SWS TRIGGER PULL TEST

AVERAGE PULL FORCE BETWEEN
INITIAL & CYCLE TESTS

2.50# ± .50#

3.00# ± .75#

4.00# ± 1.00#

SERIAL NO. C6636073

DATE 5-23-91

TESTER D/H

	2.50# INITIAL	2.50# AFTER 50 CYCLES	FINAL TEST & TO RESET 2.50#		COMMENTS
PULL #1	2.53	2.93	2.55	2.42	MIN. SETTING, NO AVG. OF 5 READINGS ACCEPT- ABLE LESS THAN 2#
PULL #2	2.50	2.82	2.84	2.29	
PULL #3	2.52	2.79	2.83	2.36	
PULL #4	2.48	2.66	2.52	2.37	
PULL #5	2.38	2.64	2.84	2.42	
TOTAL					
AVG.					

	3.00# INITIAL	3.00# AFTER 20 CYCLES		COMMENTS
PULL #1	3.43	3.63		
PULL #2	3.50	3.70		
PULL #3	3.60	3.63		
PULL #4	3.70	3.62		
PULL #5	3.57	3.50		
TOTAL				
AVG.				

	4.00# INITIAL	4.00# AFTER 20 CYCLES	MAX SETTING GREATER THAN 4#	RESET TO 4# FOR TARGET & ACCURACY
PULL #1	4.54	4.61		4.19
PULL #2	4.43	4.68		4.11
PULL #3	4.57	4.70		4.17
PULL #4	4.42	4.68		4.13
PULL #5	4.39	4.53		4.27
TOTAL				
AVG.				

CENTROIDAL DISTANCE CALCULATIONS
FOR RIFLE # C6636073
24 May 1991

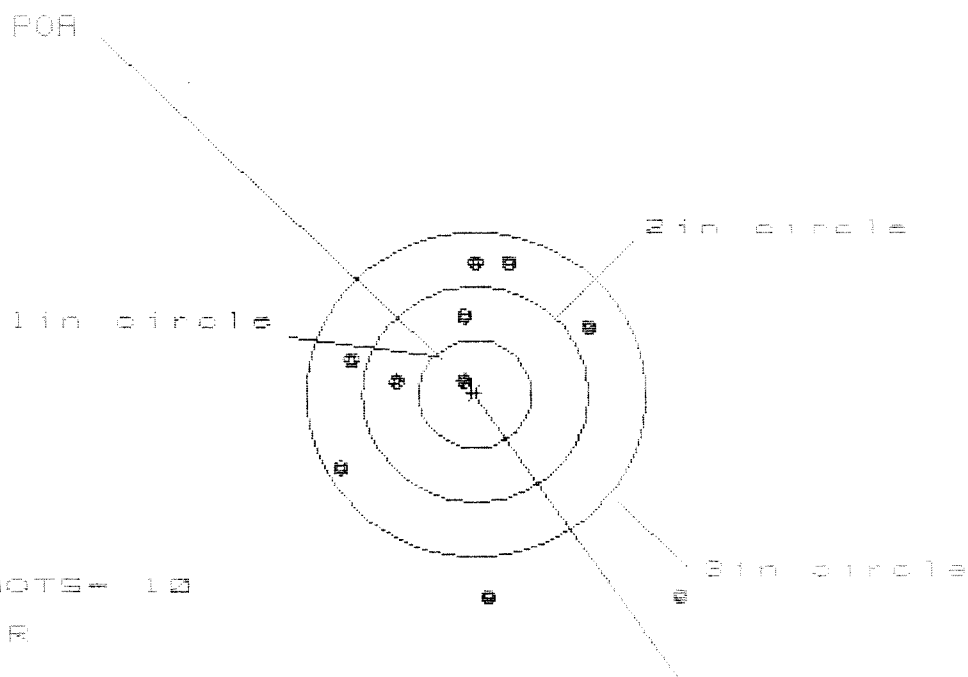
CENTROIDAL DISTANCES

0 TO	1	.156818
1 TO	2	.0814002
1 TO	3	.282878
1 TO	4	.431511
1 TO	5	.0134164

$\frac{4}{3}$ <----POA

THE AVERAGE X-COORDINATE FOR THIS RIFLE IS: $-.018$
THE AVERAGE Y-COORDINATE FOR THIS RIFLE IS: $-.0629$
THE RESULTING AVERAGE POI RADIUS FOR THIS RIFLE IS: $.0053287$
THE AMR FOR THIS RIFLE IS: $.9818$

CENTERFIRE PATTERNS # 1



OF SHOTS = 10

IN CIR

1 in = 1

2 in = 3

3 in = 6

HS = 3.044

VS = 3.138

GS = 3.659

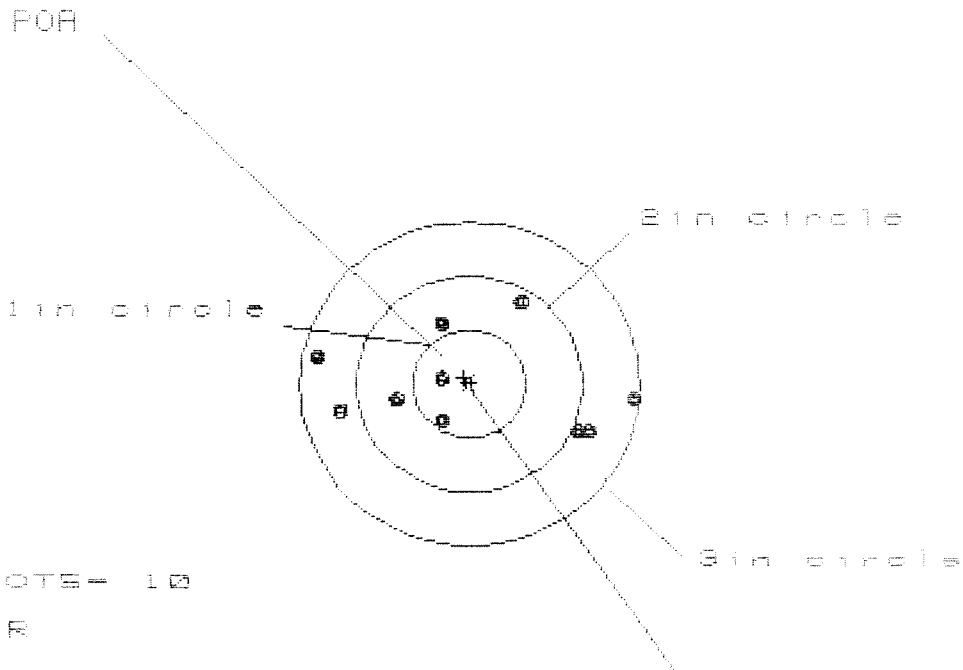
CENTROID #

PATTERN #	1	2	3
SHOTS (BEST OF)	10	9	8
MAXIMUM X	1.831	1.163	1.196
MINIMUM X	-1.214	-1.010	-.977
MAXIMUM Y	1.250	1.040	.783
MINIMUM Y	-1.888	-2.053	-1.160
CENTROID X	.096	-.107	-.140
CENTROID Y	-.124	.086	.343
POA TO CENTROID in.	.157	.137	.370
MIN RADIUS	.132	.163	.328
MEAN RADIUS	1.234	1.005	.840
MAX RADIUS	2.630	2.070	1.516
HORIZONTAL SPREAD	3.044	2.173	2.173
VERTICAL SPREAD	3.138	3.093	1.943
EXTREME SPREAD	3.659	3.098	2.555
NUMBER IN ONE INCH CIRCLE =	1		
NUMBER IN TWO INCH CIRCLE =	3		
NUMBER IN THREE INCH CIRCLE =	6		

24 May 1991

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CENTERFIRE PATTERNS # 2



OF SHOTS= 10

IN CIR

1in = 2

2in = 5

3in = 10

HG= 2.754

VG= 1.163

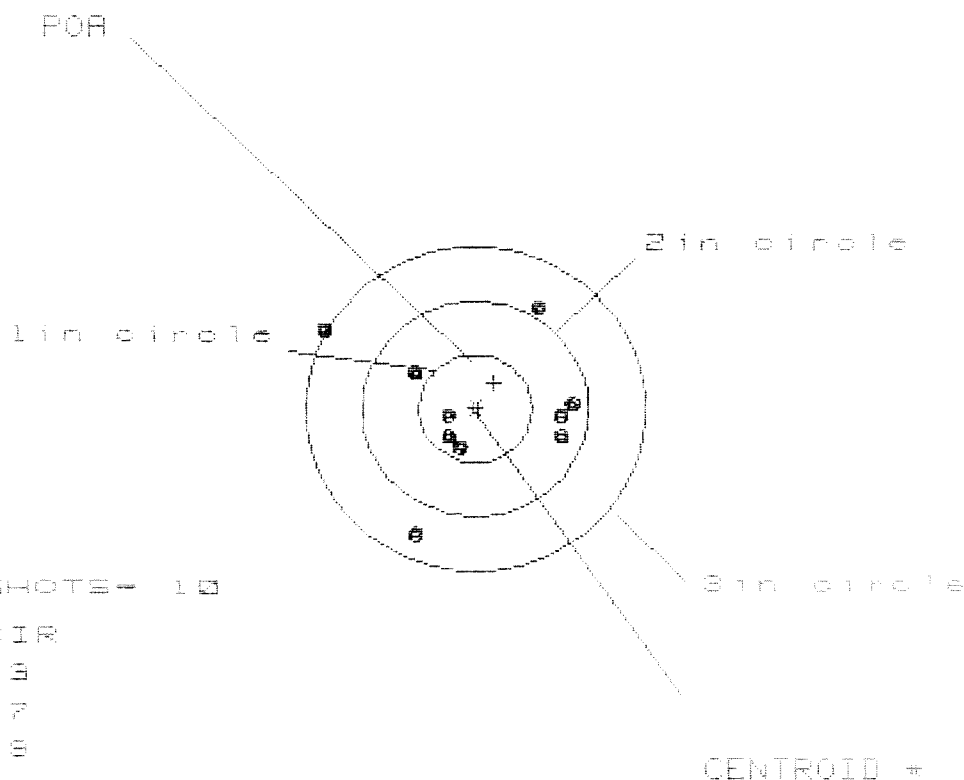
GG= 2.796

PATTERN #	:	2		
SHOTS (BEST OF)	:	10	9	8
MAXIMUM X	:	1.421	1.163	1.016
MINIMUM X	:	-1.333	-1.176	-1.103
MAXIMUM Y	:	.746	.725	.759
MINIMUM Y	:	-.417	-.438	-.404
CENTROID X	:	.047	-.110	.036
CENTROID Y	:	-.059	-.038	-.071
POA TO CENTROID in.	:	.075	.117	.080
MIN RADIUS	:	.205	.051	.198
MEAN RADIUS	:	.884	.786	.754
MAX RADIUS	:	1.433	1.243	1.127
HORIZONTAL SPREAD	:	2.754	2.339	2.119
VERTICAL SPREAD	:	1.163	1.163	1.163
EXTREME SPREAD	:	2.796	2.444	2.126
NUMBER IN ONE INCH CIRCLE	=		2	
NUMBER IN TWO INCH CIRCLE	=		5	
NUMBER IN THREE INCH CIRCLE	=		10	

24 May 1991

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CENTERFIRE PATTERNS # 3



OF SHOTS= 10

IN CIR

1in = 3

2in = 7

3in = 8

HS= 2.204

VS= 2.084

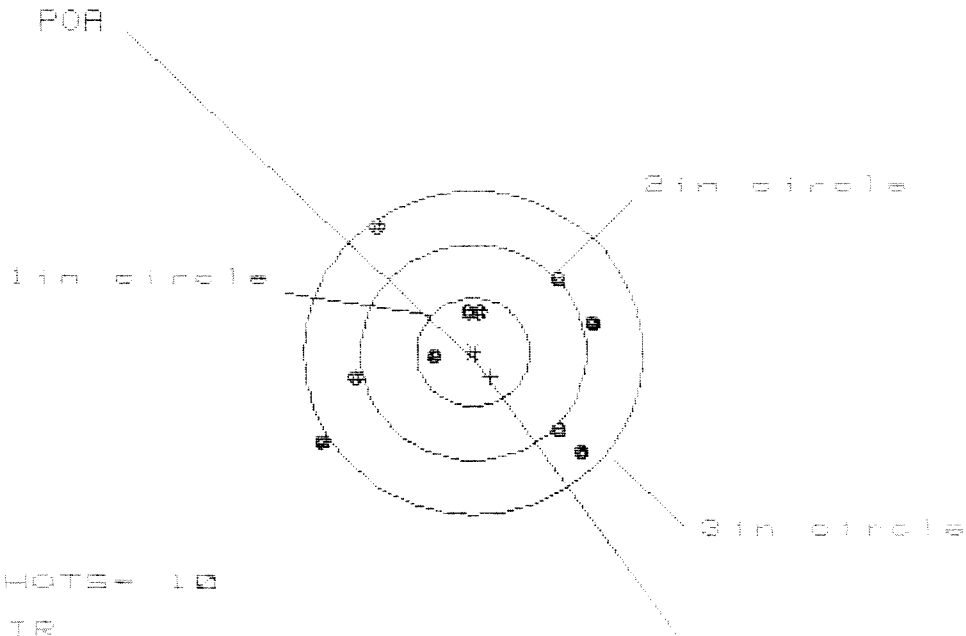
GS= 2.370

PATTERN #	3	3	3
SHOTS (BEST OF)	10	9	8
MAXIMUM X	.841	.690	.606
MINIMUM X	-1.363	-.734	-.818
MAXIMUM Y	.961	1.047	.918
MINIMUM Y	-1.123	-1.037	-.450
CENTROID X	-.162	-.011	.073
CENTROID Y	-.240	-.326	-.197
POA TO CENTROID in.	.289	.327	.210
MIN RADIUS	.242	.365	.481
MEAN RADIUS	.799	.706	.646
MAX RADIUS	1.571	1.234	.991
HORIZONTAL SPREAD	2.204	1.424	1.424
VERTICAL SPREAD	2.084	2.084	1.368
EXTREME SPREAD	2.370	2.370	1.546
NUMBER IN ONE INCH CIRCLE =	3		
NUMBER IN TWO INCH CIRCLE =	7		
NUMBER IN THREE INCH CIRCLE =	9		

24 May 1981

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CENTERFIRE PATTERNS # 4



OF SHOTS- 10

IN CIR

1 in = 3

2 in = 4

3 in = 9

HS= 2.455

VS= 2.062

QS= 2.780

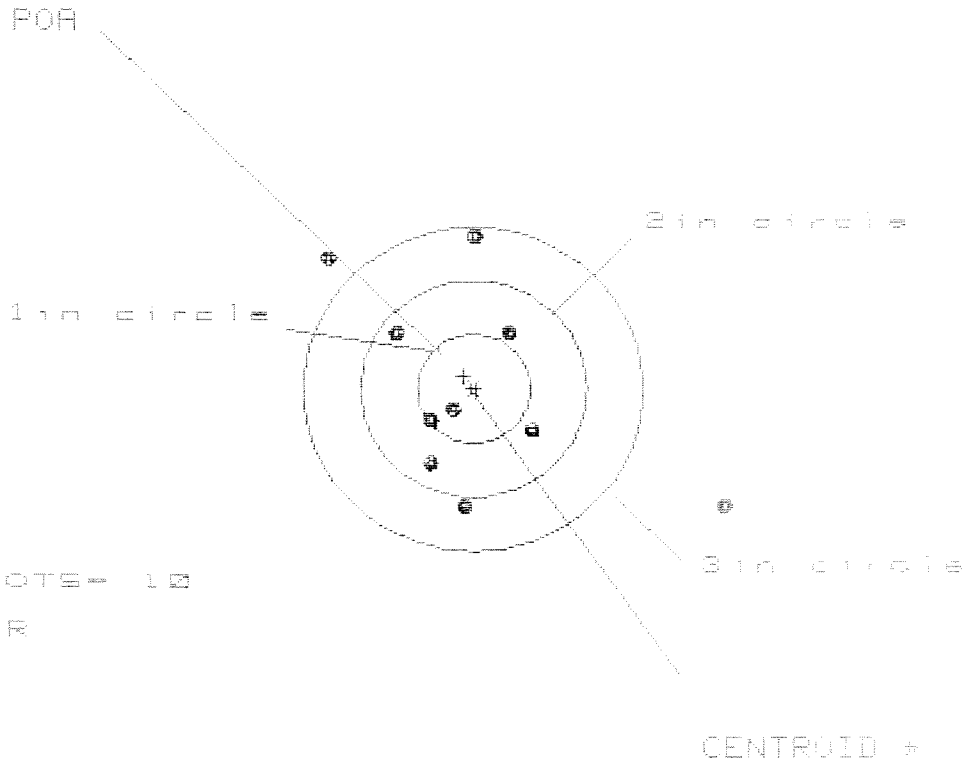
CENTROID *

PATTERN #	4	9	8
SHOTS (BEST OF)	10	9	8
MAXIMUM X	1.072	.918	.791
MINIMUM X	-1.383	-1.216	-1.343
MAXIMUM Y	1.146	1.059	.679
MINIMUM Y	-.916	-1.003	-.871
CENTROID X	-.155	-.001	.126
CENTROID Y	.227	.314	.182
POA TO CENTROID in.	.275	.314	.221
MIN RADIUS	.342	.248	.416
MEAN RADIUS	.978	.891	.834
MAX RADIUS	1.589	1.468	1.358
HORIZONTAL SPREAD	2.455	2.134	2.134
VERTICAL SPREAD	2.062	2.062	1.550
EXTREME SPREAD	2.780	2.780	2.189
NUMBER IN ONE INCH CIRCLE =	3		
NUMBER IN TWO INCH CIRCLE =	4		
NUMBER IN THREE INCH CIRCLE =	9		

24 May 1991

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CENTERFIRE PATTERNS # 5



OF SHOTS= 10

IN CIR

1 in = 2

2 in = 6

3 in = 8

HS= 3.531

VS= 2.476

GS= 4.192

PATTERN #	:	5		
SHOTS (BEST OF)	:	10	9	8
MAXIMUM X	:	2.281	.721	.585
MINIMUM X	:	-1.338	-1.885	-.579
MAXIMUM Y	:	1.385	1.264	1.395
MINIMUM Y	:	-1.091	-1.161	-1.030
CENTROID X	:	.084	-.161	-.025
CENTROID Y	:	-.118	.004	-.127
POA TO CENTROID in.	:	.144	.161	.130
MIN RADIUS	:	.219	.303	.159
MEAN RADIUS	:	1.014	.844	.723
MAX RADIUS	:	2.456	1.508	1.404
HORIZONTAL SPREAD	:	3.531	1.806	1.164
VERTICAL SPREAD	:	2.476	2.425	2.425
EXTREME SPREAD	:	4.192	2.512	2.432
NUMBER IN ONE INCH CIRCLE	=		2	
NUMBER IN TWO INCH CIRCLE	=		6	
NUMBER IN THREE INCH CIRCLE	=		8	