

MICHELSON

~~man for~~  
cal mcm  
mcc

Does D+PS have  
copy. No

TECHNICAL MEMORANDUM REPORT NO. 2-69

36-JA

RESULTS OF A DISPERSION TEST OF 2,000,  
1:12 and 1:14 TWIST M16A1 RIFLE BARRELS

OFFICE OF THE PROJECT MANAGER, RIFLES  
U. S. ARMY MATERIEL COMMAND  
ROCK ISLAND, ILLINOIS

April 1969

Reviewed By:

*Wm C Davis, Jr*

WM. C. DAVIS, JR.  
Chief, Tech Management Division

Prepared By:

*James B. Ackley*

JAMES B. ACKLEY  
Mechanical Engineer

Digitized by:

## FOREWORD

This memo report has been prepared to document for permanent record some previously unrecorded detailed data on dispersion characteristics of M16A1 production rifles. The data have previously been summarized, and subjected to detailed analysis for a specific purpose, by the U. S. Army Ballistic Research Laboratories, as reported in Carn, R. E. - "Effectiveness Comparison of 1:12 and 1:14 Inch Barrel Twist Rates for M16A1 Rifle" Report No. 1886, BRL, November 1968. However, the BRL report presents the data in summarized form, suitable for the specific intended purpose, but does not record the detailed results obtained with each individual rifle. This memo report contains the detailed dispersion data, which are unclassified, for permanent record and convenient retrieval in the event these data might be useful for other purposes in the future.

A. DESCRIPTION OF MATERIAL:

1. Rifles: The following rifles were used in this test:

a. One thousand production M16A1 rifles manufactured by Colt's having barrels with the standard 1:12 twist of rifling.

b. One thousand production M16A1 rifles manufactured by Colt's having barrels of standard configuration except for a change of rifling twist to 1:14.

2. Ammunition:

The following two cartridge lots of 5.56mm, M193, ball ammunition were used in this test:

a. Cartridge lot RA 5287 representing a lot of "average" dispersion performance with an acceptance mean radius of 1.29 inches at 200 yards.

b. Cartridge lot RA 5242 representing a lot of "marginal" dispersion performance with an acceptance mean radius of 1.77 inches at 200 yards.

B. PROCEDURES:

1. Four 10-shot groups were obtained with each of the 2,000 M16A1 rifles. The test procedures followed for firing each group were the same for routine rifle acceptance tests as required under SAPD-253B. The test was conducted using Colt's rifle acceptance test personnel, equipment and ranges.

2. The test consisted of firing from each rifle three 10-shot groups at a range of 100 yards using cartridge lot RA 5287 and an additional 10-shot group using cartridge lot RA 5242. Extreme spread measurements were obtained for each 10-shot group for 999 rifles of each twist rate, making a total of 7972 extreme spread values. The detailed extreme spread results are attached as Inclosure 1.

C. RESULTS:

1. The Ballistic Research Laboratories performed the following analysis of the resulting data. The extreme spread values were first compiled in eight frequency tables for intervals of extreme spread, one table for each twist and shot-group combination, and are attached as Inclosure 2. The mean and standard deviation, as well as the coefficient of skewness,  $\alpha_3$ , and coefficient of peakedness,  $\alpha_4$ , were computed for each case. Table I summarizes the obtained results. The notations used in

in Tables I and II and attached detailed data are as follows: A-average dispersion lot RA 5287; M-marginal dispersion lot RA 5242; 12 and 14 - 1:12 inch and 1:14 inch twist rates: 1 or 2 or 3 - first, second, or third shot group.

TABLE I

	<u>Sample Mean Extreme Spread (ES)</u>	<u>Sample Std. Dev.</u>	<u><math>\alpha_3</math></u>	<u><math>\alpha_4</math></u>
A-12-1	3.57	1.00	1.12	6.29
A-12-2	4.05	1.41	1.89	12.64
A-12-3	4.47	1.89	3.14	23.22
M-12-1	6.42	3.46	1.80	6.68
A-14-1	7.53	2.49	.72	4.31
A-14-2	8.42	2.60	.63	3.58
A-14-3	9.22	2.78	.48	3.17
M-14-1	12.67	4.14	.54	3.51

2. The variation of the individual extreme spreads is presented in Table II in the form of observed 50% and 90% bands about the mean values.

TABLE II

	<u>50% Bands About the Mean</u>	<u>90% Bands About the Mean</u>
A-12-1	2.9 $\angle$ ES $\angle$ 4.3	2.1 $\angle$ ES $\angle$ 5.1
A-12-2	3.2 $\angle$ ES $\angle$ 5.0	2.1 $\angle$ ES $\angle$ 6.1
A-12-3	3.5 $\angle$ ES $\angle$ 5.5	2.2 $\angle$ ES $\angle$ 6.8
M-12-1	4.3 $\angle$ ES $\angle$ 8.5	1.8 $\angle$ ES $\angle$ 11.0
A-14-1	5.8 $\angle$ ES $\angle$ 9.2	3.6 $\angle$ ES $\angle$ 11.4
A-14-2	6.6 $\angle$ ES $\angle$ 10.2	4.3 $\angle$ ES $\angle$ 12.5
A-14-3	7.3 $\angle$ ES $\angle$ 11.1	4.8 $\angle$ ES $\angle$ 13.6
M-14-1	10.4 $\angle$ ES $\angle$ 15.0	6.0 $\angle$ ES $\angle$ 19.4

INCLOSURE 1

SER NO	TW	MARG: AMMO			SER NO	TW	MARG: AMMO		
		1	2	3			1	2	3
792698	12	3.00	2.30	2.70	788365	12	5.30	3.70	3.20
791761	12	2.50	2.80	4.30	790180	12	3.60	2.50	4.60
792594	12	4.10	5.00	3.50	790485	12	3.10	2.70	2.80
790215	12	4.30	3.70	2.60	792679	12	4.20	6.20	5.10
792874	12	2.70	2.60	5.00	790430	12	4.50	4.30	8.40
792781	12	3.30	3.40	3.60	793007	12	2.80	4.20	4.00
792584	12	2.80	2.70	3.10	788853	12	3.50	1.80	3.20
792775	12	3.50	3.30	3.40	788804	12	4.30	6.80	5.60
790909	12	4.70	7.00	6.40	792872	12	2.70	2.80	5.10
788787	12	3.80	5.30	6.30	788829	12	3.50	3.60	3.70
790366	12	2.70	4.20	5.60	792912	12	3.60	3.90	3.40
792579	12	3.60	4.00	5.60	792776	12	3.20	4.10	2.20
792979	12	3.90	4.70	3.70	791360	12	3.30	1.50	1.80
792464	12	1.90	4.90	3.40	792442	12	5.40	1.60	3.50
791215	12	3.80	4.30	3.30	791204	12	4.70	2.30	2.50
791762	12	4.00	2.90	3.50	791747	12	4.70	3.20	3.90
791480	12	2.40	2.90	4.30	789318	12	2.30	3.30	2.80
790800	12	5.00	2.50	2.80	791098	12	2.60	4.30	3.30
791774	12	4.00	2.40	2.70	787428	12	3.20	4.00	6.10
791089	12	4.50	3.90	6.20	788581	12	2.80	3.20	4.10
791474	12	5.60	6.70	3.90	788341	12	6.70	3.70	3.90
791223	12	2.60	2.70	1.90	790226	12	4.30	3.70	4.70
791205	12	2.50	2.50	3.80	792449	12	4.30	2.90	6.40
792455	12	2.70	3.90	2.70	791037	12	2.80	2.20	3.80
791714	12	2.90	4.20	3.00	791771	12	3.10	2.30	3.20
791207	12	2.90	3.50	2.20	791804	12	1.70	10.20	15.40
788192	12	2.70	2.90	3.20	791076	12	2.80	4.70	2.70
791103	12	3.30	4.10	4.30	792489	12	2.70	3.30	4.60
791144	12	1.80	7.40	2.80	790303	12	2.90	4.80	3.40
792394	12	3.10	2.70	3.10	792432	12	2.90	3.70	3.10
791464	12	4.20	3.50	3.50	790312	12	4.70	6.20	9.40
789297	12	2.80	3.80	4.90	790524	12	3.70	4.60	4.40
791985	12	3.10	3.80	4.30	790775	12	3.80	5.70	6.10
790696	12	2.90	5.20	4.00	790974	12	2.90	3.60	2.30
791034	12	4.40	2.30	3.20	790970	12	1.30	2.80	9.10
764614	12	3.60	2.80	3.30	787744	12	3.00	3.20	2.60
791125	12	2.90	3.00	4.20	791814	12	3.40	3.60	2.90
791800	12	4.30	2.10	2.80	792009	12	2.30	3.50	4.30
791822	12	2.10	3.70	3.60	792006	12	2.50	3.50	2.70
790781	12	3.90	3.00	6.50	790760	12	3.60	2.20	3.60
790750	12	3.40	2.80	3.10	790968	12	2.50	3.70	2.80
792480	12	3.00	4.30	4.30	787427	12	2.90	2.70	2.90
791679	12	2.30	4.00	2.90	787444	12	5.00	4.30	5.80
792470	12	4.80	4.20	4.00	792503	12	3.70	2.90	2.70
791185	12	5.70	5.40	4.30	790388	12	4.20	4.00	3.50
790255	12	4.10	1.70	4.60	790396	12	3.30	5.00	3.00
790982	12	4.00	2.60	3.90	787645	12	5.00	3.30	3.10
792769	12	2.70	3.50	2.70	790966	12	3.20	3.10	3.70
791013	12	2.40	2.80	3.40	791657	12	2.80	3.20	2.90
764139	12	3.20	3.40	4.50	791094	12	4.10	4.00	4.70

SER NO	TW	AVE. AMMO			SER NO	TW	AVE. AMMO			SER NO	TW	AVE. AMMO			SER NO	TW	AVE. AMMO		
		1	2	3			1	2	3			1	2	3			1	2	3
792450	12	2.80	2.90	3.30	790221	12	4.40	2.40	4.50	790221	12	4.40	2.40	4.50	790221	12	4.40	2.40	4.50
790774	12	4.60	8.30	8.10	790964	12	4.20	3.40	2.90	790964	12	4.20	3.40	2.90	790964	12	4.20	3.40	2.90
790977	12	2.70	5.00	4.40	791285	12	3.20	1.80	2.50	791285	12	3.20	1.80	2.50	791285	12	3.20	1.80	2.50
790663	12	4.10	3.10	2.70	791696	12	2.40	2.60	1.90	791696	12	2.40	2.60	1.90	791696	12	2.40	2.60	1.90
791443	12	3.10	4.40	5.00	791283	12	2.60	2.90	3.00	791283	12	2.60	2.90	3.00	791283	12	2.60	2.90	3.00
790991	12	3.90	2.50	3.00	788518	12	4.90	3.40	5.60	788518	12	4.90	3.40	5.60	788518	12	4.90	3.40	5.60
790806	12	3.10	4.20	2.50	788589	12	3.70	3.40	4.60	788589	12	3.70	3.40	4.60	788589	12	3.70	3.40	4.60
763497	12	2.50	3.40	3.30	763795	12	2.20	3.40	6.00	763795	12	2.20	3.40	6.00	763795	12	2.20	3.40	6.00
790493	12	2.20	4.40	2.30	791667	12	3.00	3.60	5.10	791667	12	3.00	3.60	5.10	791667	12	3.00	3.60	5.10
790876	12	2.60	3.10	3.50	792529	12	2.70	3.10	3.80	792529	12	2.70	3.10	3.80	792529	12	2.70	3.10	3.80
792905	12	2.30	3.80	3.40	789663	12	2.50	4.40	3.60	789663	12	2.50	4.40	3.60	789663	12	2.50	4.40	3.60
788322	12	4.20	4.50	3.50	790860	12	2.20	4.10	2.80	790860	12	2.20	4.10	2.80	790860	12	2.20	4.10	2.80
790910	12	2.30	2.60	2.80	790897	12	3.50	4.50	3.40	790897	12	3.50	4.50	3.40	790897	12	3.50	4.50	3.40
791646	12	2.60	5.10	4.00	787736	12	3.70	3.30	3.90	787736	12	3.70	3.30	3.90	787736	12	3.70	3.30	3.90
790821	12	1.90	2.00	2.80	790875	12	2.40	2.90	3.60	790875	12	2.40	2.90	3.60	790875	12	2.40	2.90	3.60
790837	12	4.00	3.30	3.50	791705	12	3.30	3.70	4.00	791705	12	3.30	3.70	4.00	791705	12	3.30	3.70	4.00
790501	12	2.80	5.10	4.30	765324	12	3.30	3.60	3.60	765324	12	3.30	3.60	3.60	765324	12	3.30	3.60	3.60
790730	12	4.20	2.30	3.10	790958	12	2.60	2.90	2.40	790958	12	2.60	2.90	2.40	790958	12	2.60	2.90	2.40
790983	12	2.30	2.20	2.50	791826	12	2.80	4.00	4.20	791826	12	2.80	4.00	4.20	791826	12	2.80	4.00	4.20
792008	12	3.00	3.00	3.60	790658	12	3.00	5.70	6.00	790658	12	3.00	5.70	6.00	790658	12	3.00	5.70	6.00
791798	12	3.50	3.00	3.70	790482	12	4.10	4.10	6.70	790482	12	4.10	4.10	6.70	790482	12	4.10	4.10	6.70
790511	12	2.40	4.40	2.80	763537	12	2.40	3.40	2.70	763537	12	2.40	3.40	2.70	763537	12	2.40	3.40	2.70
763058	12	1.90	3.70	3.00	765546	12	3.80	2.20	2.10	765546	12	3.80	2.20	2.10	765546	12	3.80	2.20	2.10
791664	12	4.50	4.00	6.00	787413	12	2.90	3.90	2.20	787413	12	2.90	3.90	2.20	787413	12	2.90	3.90	2.20
790896	12	2.60	2.40	3.50	790811	12	3.30	3.00	3.70	790811	12	3.30	3.00	3.70	790811	12	3.30	3.00	3.70
791700	12	3.50	2.80	4.20	791121	12	3.50	3.80	2.90	791121	12	3.50	3.80	2.90	791121	12	3.50	3.80	2.90
791429	12	3.20	3.50	3.20	792474	12	2.60	3.50	4.40	792474	12	2.60	3.50	4.40	792474	12	2.60	3.50	4.40
790035	12	4.30	3.50	2.50	791067	12	5.40	5.50	4.10	791067	12	5.40	5.50	4.10	791067	12	5.40	5.50	4.10
791369	12	3.10	3.60	5.30	791490	12	2.80	2.80	3.80	791490	12	2.80	2.80	3.80	791490	12	2.80	2.80	3.80
789823	12	3.20	3.70	3.30	765332	12	3.40	2.60	3.60	765332	12	3.40	2.60	3.60	765332	12	3.40	2.60	3.60
765501	12	5.40	3.60	4.20	765319	12	3.50	3.70	3.60	765319	12	3.50	3.70	3.60	765319	12	3.50	3.70	3.60
790340	12	3.10	2.70	5.20	791702	12	3.60	3.30	3.50	791702	12	3.60	3.30	3.50	791702	12	3.60	3.30	3.50
791206	12	3.20	2.70	2.70	791236	12	4.10	3.60	2.70	791236	12	4.10	3.60	2.70	791236	12	4.10	3.60	2.70
791087	12	3.30	2.60	1.70	791158	12	2.20	3.30	2.20	791158	12	2.20	3.30	2.20	791158	12	2.20	3.30	2.20
791033	12	3.50	2.20	2.80	791072	12	2.90	2.50	2.70	791072	12	2.90	2.50	2.70	791072	12	2.90	2.50	2.70
791459	12	3.30	4.40	4.30	789834	12	3.50	5.20	3.50	789834	12	3.50	5.20	3.50	789834	12	3.50	5.20	3.50
764817	12	2.40	3.50	3.20	790842	12	2.10	5.00	4.70	790842	12	2.10	5.00	4.70	790842	12	2.10	5.00	4.70
790376	12	3.10	7.40	2.90	787414	12	3.30	2.30	4.30	787414	12	3.30	2.30	4.30	787414	12	3.30	2.30	4.30
787401	12	3.60	4.10	4.30	790315	12	3.80	3.60	4.80	790315	12	3.80	3.60	4.80	790315	12	3.80	3.60	4.80
790354	12	3.60	2.20	2.60	790359	12	3.80	3.20	3.40	790359	12	3.80	3.20	3.40	790359	12	3.80	3.20	3.40
792681	12	1.90	2.90	4.30	790815	12	3.10	3.50	5.40	790815	12	3.10	3.50	5.40	790815	12	3.10	3.50	5.40
792915	12	2.20	3.70	5.80	792582	12	2.70	3.60	2.60	792582	12	2.70	3.60	2.60	792582	12	2.70	3.60	2.60
788878	12	2.20	3.30	3.30	791669	12	3.60	4.20	2.70	791669	12	3.60	4.20	2.70	791669	12	3.60	4.20	2.70
790887	12	3.60	2.20	3.70	792465	12	2.40	6.10	3.30	792465	12	2.40	6.10	3.30	792465	12	2.40	6.10	3.30
792767	12	2.30	4.20	4.80	792602	12	4.10	4.10	3.70	792602	12	4.10	4.10	3.70	792602	12	4.10	4.10	3.70
792504	12	1.70	2.60	3.50	787696	12	2.60	4.10	4.20	787696	12	2.60	4.10	4.20	787696	12	2.60	4.10	4.20
792688	12	4.00	3.80	3.30	787680	12	3.30	2.00	3.10	787680	12	3.30	2.00	3.10	787680	12	3.30	2.00	3.10
790502	12	3.30	5.40	5.00	784347	12	3.20	3.70	4.60	784347	12	3.20	3.70	4.60	784347	12	3.20	3.70	4.60
792628	12	5.00	4.40	5.40	788340	12	2.80	4.30	3.30	788340	12	2.80	4.30	3.30	788340	12	2.80	4.30	3.30
793085	12	4.90	3.20	3.70	788703	12	3.00	3.60	3.60	788703	12	3.00	3.60	3.60	788703	12	3.00	3.60	3.60
790516	12	1.60	2.80	3.30	790371	12	2.80	2.80	7.40	790371	12	2.80	2.80	7.40	790371	12	2.80	2.80	7.40

SER NO	TW	MARG. AMMO			AVE. AMMO		
		1	2	3	1	2	3
78879	12	4.00	3.20	3.00	3.80	2.10	6.40
793144	12	4.10	4.30	4.80	2.30	3.20	3.00
793133	12	3.70	4.30	3.20	5.50	6.30	7.20
791673	12	3.80	4.60	4.60	2.70	2.80	2.70
788562	12	3.10	3.90	5.40	4.10	1.80	4.00
789655	12	1.60	3.50	4.60	3.50	3.10	3.40
791041	12	3.70	6.00	6.80	4.50	9.40	4.70
789754	12	4.70	6.00	6.70	5.00	5.70	5.80
790525	12	4.20	4.90	7.00	4.10	7.10	3.70
791170	12	4.70	2.20	9.00	2.70	3.60	6.00
792678	12	2.90	5.00	7.40	3.30	4.30	3.90
391955	12	4.10	3.90	20.10	4.70	3.70	6.00
792706	12	3.70	5.00	3.50	4.20	5.50	5.00
791760	12	3.90	4.90	16.60	2.70	4.40	4.80
792562	12	4.60	5.90	5.40	5.00	9.10	5.70
790809	12	3.40	4.70	6.00	4.20	5.10	7.10
787805	12	3.50	4.00	3.70	5.00	4.90	4.70
789700	12	3.30	3.50	4.80	10.00	9.50	8.10
787489	12	2.00	3.20	3.00	3.50	4.40	5.70
792982	12	3.60	7.30	4.20	4.30	4.10	4.80
0	12	3.20	4.30	2.50	4.00	3.40	3.50
791435	12	3.10	2.40	4.60	4.60	3.80	3.40
790995	12	2.60	4.10	8.50	4.60	5.00	6.30
790042	12	2.50	3.70	3.20	5.10	8.00	5.70
792761	12	2.30	3.80	3.10	3.30	3.30	5.30
790460	12	4.40	5.60	5.40	2.10	1.40	2.40
788473	12	3.50	2.40	7.20	5.60	5.60	7.00
787389	12	4.30	7.30	7.30	3.20	6.30	6.20
787395	12	4.40	5.40	4.00	2.90	3.00	4.10
792821	12	3.20	3.00	3.70	3.10	3.70	5.30
791953	12	2.40	4.30	3.40	4.10	4.10	6.90
791995	12	2.30	4.30	5.50	3.20	4.60	2.90
787396	12	4.80	7.00	6.50	7.70	6.10	6.50
790857	12	4.50	5.00	4.60	4.00	4.30	4.90
789251	12	2.90	2.70	3.50	3.30	2.20	4.50
788988	12	3.20	3.30	6.70	7.00	4.80	4.80
788637	12	5.30	8.50	12.20	3.60	3.40	3.20
790337	12	3.00	5.30	7.50	5.10	6.10	6.40
787377	12	4.80	4.90	4.80	3.20	6.10	4.50
790313	12	4.20	4.00	7.40	4.40	4.90	4.80
792456	12	2.90	3.00	3.80	2.50	4.20	8.20
784658	12	4.10	4.30	6.80	4.20	3.90	4.90
790032	12	4.20	3.30	4.30	4.30	10.50	7.50
790018	12	5.50	3.90	4.80	3.30	2.10	4.70
790627	12	4.10	3.20	4.00	3.50	3.10	4.70
790214	12	3.30	1.70	3.30	3.00	4.10	7.10
789308	12	3.80	6.20	6.20	2.10	1.90	4.00
788273	12	3.60	3.80	2.70	3.80	5.50	5.60
792454	12	3.10	3.80	4.20	4.40	3.80	4.20
788948	12	3.70	3.60	3.90	3.10	5.90	3.60

SER NO	TW	AVE.		MARG.	AMMO	SER NO	TW	AVE.		MARG.	AMMO
		1	2					1	2		
787469	12	2.80	6.30	9.60	3	789492	12	3.20	4.50	3.80	3
789019	12	3.90	3.10	3.80	3	789589	12	3.80	4.20	3.80	3
788301	12	5.40	7.80	12.70	3	790026	12	2.50	3.40	4.40	3
787513	12	3.60	5.40	6.60	3	787513	12	4.60	4.20	6.50	3
787506	12	4.20	3.70	4.70	3	787501	12	4.80	5.10	6.20	3
790037	12	5.30	17.10	21.70	3	790031	12	3.60	3.70	3.20	3
790029	12	3.70	3.00	4.10	3	790098	12	3.10	6.70	4.80	3
790006	12	4.20	3.30	4.90	3	787519	12	5.70	6.70	7.40	3
790100	12	3.30	2.50	4.10	3	792577	12	2.60	3.50	3.10	3
764884	12	4.20	4.80	7.30	3	790311	12	4.60	4.30	4.80	3
792992	12	3.10	4.90	5.60	3	788789	12	3.60	3.60	3.50	3
790553	12	3.50	4.30	5.30	3	788899	12	3.70	3.30	7.10	3
790362	12	7.30	6.20	10.30	3	788794	12	3.80	5.20	4.30	3
790365	12	3.50	3.60	6.70	3	790883	12	4.10	2.80	4.60	3
790888	12	2.40	3.90	6.60	3	791645	12	3.40	2.10	3.90	3
790845	12	2.00	3.30	4.10	3	791294	12	4.50	2.80	6.90	3
789921	12	2.50	6.20	9.10	3	791584	12	2.70	4.20	3.20	3
791592	12	3.50	2.70	4.40	3	790997	12	5.00	4.30	6.50	3
790176	12	1.70	3.60	3.60	3	789859	12	2.40	3.10	4.90	3
789778	12	3.10	3.50	5.40	3	786546	12	4.20	8.80	9.50	3
790659	12	5.30	5.40	8.90	3	790721	12	4.70	3.80	8.10	3
791676	12	3.60	2.60	6.00	3	787524	12	3.80	3.30	2.90	3
787365	12	4.70	5.60	7.30	3	791684	12	3.70	4.70	8.60	3
790448	12	2.80	4.10	5.00	3	790437	12	3.30	3.70	2.70	3
792881	12	4.90	4.20	4.80	3	790994	12	5.00	7.20	6.10	3
791338	12	2.70	4.00	4.90	3	790486	12	4.30	3.30	3.00	3
792633	12	6.10	6.20	7.10	3	790731	12	5.10	5.70	10.60	3
790480	12	5.00	5.00	5.00	3	790132	12	4.70	2.90	4.30	3
789024	12	4.50	4.90	7.00	3	790963	12	4.40	4.80	4.20	3
792738	12	3.40	5.20	16.40	3	763823	12	4.00	3.20	3.60	3
792973	12	3.90	12.10	15.40	3	763826	12	3.20	2.80	4.90	3
792873	12	3.00	3.20	5.50	3	790558	12	1.70	1.80	2.80	3
792876	12	2.40	4.00	6.10	3	788861	12	2.50	3.90	2.60	3
792989	12	3.20	4.80	5.20	3	790900	12	5.50	4.50	3.20	3
790556	12	4.60	3.30	12.60	3	790828	12	3.80	4.20	6.10	3
792778	12	1.70	2.50	4.50	3	792578	12	2.80	4.70	5.50	3
792882	12	4.50	3.80	4.70	3	790649	12	4.30	3.60	3.60	3
792488	12	3.10	4.30	12.90	3	792585	12	6.30	5.90	3.70	3
788881	12	4.40	4.40	13.90	3	790552	12	4.40	5.90	5.50	3
792875	12	3.80	3.00	3.00	3	792990	12	3.80	2.80	4.50	3
792573	12	2.50	4.20	5.60	3	792240	12	3.10	4.50	6.90	3
792894	12	3.70	5.80	6.70	3	790639	12	3.30	3.40	3.20	3
792576	12	2.60	3.20	18.00	3	790434	12	4.10	5.50	3.20	3
793059	12	2.60	4.20	5.80	3	790523	12	3.90	2.90	4.50	3
792977	12	3.80	5.90	4.50	3	790847	12	3.80	3.90	5.30	3
793022	12	3.00	3.10	14.40	3	790533	12	4.20	4.70	4.20	3
791835	12	2.30	3.80	5.50	3	793062	12	5.70	4.10	2.80	3
789026	12	1.80	8.20	6.20	3	789261	12	3.50	3.10	4.30	3
788875	12	5.30	4.00	4.40	3	791189	12	4.80	4.00	5.30	3
791472	12	2.50	3.50	3.40	3	790619	12	3.40	3.70	4.20	3
791049	12	4.40	3.40	6.10	3	791427	12	3.10	2.20	3.60	3

SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO		
		1	2	3			1	2	3
790153	12	2.40	1.60	7.40	791250	12	5.30	5.70	3.60
790988	12	4.80	5.30	5.00	792440	12	4.50	2.50	2.30
791332	12	4.40	3.20	3.20	790041	12	2.50	3.00	2.40
790763	12	2.80	3.10	3.90	791523	12	4.00	6.10	2.90
789727	12	5.60	4.40	6.30	791347	12	6.20	5.80	4.60
791532	12	3.70	3.80	5.50	791363	12	4.30	6.50	7.10
789259	12	2.30	3.40	3.40	790154	12	5.60	5.10	6.30
789680	12	3.70	3.10	2.90	789250	12	4.90	4.50	5.60
790918	12	3.60	5.20	3.10	790552	12	3.40	3.40	4.80
789347	12	3.90	4.80	2.70	790145	12	3.40	3.00	3.80
791186	12	4.80	5.00	5.00	790541	12	3.00	2.20	2.90
791162	12	3.80	7.20	7.30	793010	12	3.10	3.60	3.30
765326	12	2.20	3.40	3.10	791662	12	4.80	6.20	6.20
789411	12	3.30	3.10	4.80	797520	12	5.90	8.60	8.30
791893	12	2.90	3.80	4.40	789160	12	6.20	4.90	4.90
792815	12	4.00	2.60	2.90	789662	12	3.00	4.00	3.60
789358	12	2.90	2.90	4.50	793078	12	3.30	4.30	4.90
791854	12	2.90	4.60	4.80	791968	12	3.20	5.60	2.90
789653	12	4.30	2.60	2.60	793051	12	3.50	5.30	4.70
791181	12	2.00	2.70	2.00	791829	12	2.70	3.10	9.40
791704	12	4.20	3.40	4.60	789747	12	2.30	4.30	4.50
765317	12	3.00	3.70	3.40	791188	12	2.90	4.90	5.70
790429	12	2.30	5.20	3.60	790892	12	3.00	4.80	3.50
788629	12	3.20	3.00	3.40	788279	12	4.70	5.50	3.80
791973	12	3.50	4.80	4.50	793021	12	2.80	4.50	3.70
790211	12	4.60	5.20	7.70	792528	12	2.70	5.90	7.20
792365	12	3.30	6.10	6.00	792413	12	2.20	4.50	4.60
790206	12	3.30	4.00	3.70	790940	12	2.90	5.00	3.60
792534	12	3.20	3.30	6.70	791966	12	4.70	3.80	3.00
792350	12	3.00	5.90	3.60	790948	12	2.90	2.80	3.30
791425	12	4.60	3.50	3.60	791003	12	2.90	3.40	3.80
790770	12	3.40	6.10	6.30	791586	12	4.40	6.80	6.00
790936	12	3.80	5.20	4.90	792587	12	4.00	5.40	5.40
790385	12	4.60	3.70	4.00	792568	12	5.30	2.60	4.30
788639	12	4.00	4.10	3.10	787702	12	2.00	7.00	3.60
791728	12	3.20	4.50	6.40	787465	12	2.00	4.20	4.00
790513	12	3.10	3.30	2.40	792554	12	5.20	4.20	3.60
790846	12	6.40	3.70	7.40	790856	12	4.20	3.80	3.90
791773	12	2.50	2.30	5.20	791997	12	2.70	2.60	2.90
790521	12	3.30	3.60	5.50	790532	12	3.00	4.40	1.90
790534	12	4.50	3.90	7.50	791909	12	3.00	4.50	5.80
793055	12	3.50	5.90	10.20	793060	12	4.20	3.30	4.70
763789	12	3.10	3.60	3.60	791006	12	3.50	2.00	5.20
791861	12	3.70	6.50	3.60	792995	12	3.70	2.40	6.20
791858	12	4.20	4.70	3.50	791648	12	4.70	4.50	4.20
792787	12	4.90	5.90	7.50	791866	12	2.60	1.40	5.00
763712	12	2.70	2.60	4.60	791775	12	3.50	6.70	7.90
764881	12	3.10	3.20	4.60	790935	12	3.10	3.80	5.00
791433	12	5.20	5.60	5.40	790758	12	3.00	2.90	2.40
790921	12	4.80	3.50	4.70	789187	12	4.30	4.20	7.00
789253	12	5.30	4.00	4.40	791420	12	3.10	3.70	4.20

SER NO	TW	MARG. AMMO			AVE. AMMO			MARG. AMMO			
		1	2	3	1	2	3	1	2	3	
787723	12	4.20	5.50	5.70	10.40	12	2.70	4.70	4.00	1	3.50
791951	12	2.80	3.20	2.70	6.90	12	4.30	5.70	5.20	3	8.80
792707	12	5.80	3.90	6.90	11.50	12	3.70	4.40	3.40	3	4.90
792676	12	3.00	3.60	4.10	11.50	12	4.70	3.80	5.10	3	7.20
791682	12	3.90	2.70	4.80	8.30	12	3.30	3.60	3.30	3	3.10
791100	12	3.20	3.80	4.50	6.40	12	3.80	4.60	13.50	3	12.90
790228	12	4.10	4.70	4.20	3.90	12	3.40	2.20	3.40	3	3.80
791426	12	3.80	3.10	2.70	2.90	12	4.70	3.90	6.50	3	8.30
791099	12	3.90	4.50	3.20	3.70	12	3.30	4.30	4.00	3	5.90
791209	12	3.20	3.80	5.50	7.40	12	3.60	2.80	5.30	3	6.80
789094	12	2.70	4.00	5.60	4.60	12	3.70	3.00	5.70	3	4.60
791766	12	2.70	3.50	3.70	6.50	12	4.50	3.50	4.50	3	3.50
790436	12	3.80	5.40	10.60	8.60	12	4.10	3.00	5.10	3	7.60
792680	12	3.90	3.40	4.30	4.90	12	2.10	2.60	3.60	3	4.80
790899	12	4.60	5.10	6.40	7.30	12	3.20	3.30	2.30	3	3.30
792668	12	3.90	5.80	8.30	7.20	12	3.80	5.00	4.40	3	3.50
790814	12	3.20	3.10	6.80	5.20	12	2.70	3.10	3.20	3	3.70
788535	12	3.70	5.00	4.20	4.10	12	4.50	3.60	7.60	3	5.10
790426	12	3.80	8.70	8.30	12.00	12	3.30	3.60	3.50	3	4.40
789295	12	3.00	4.00	6.20	7.30	12	5.10	6.80	7.20	3	10.80
787500	12	2.40	2.50	2.50	3.50	12	2.80	3.80	4.40	3	5.10
792687	12	4.30	3.40	3.70	2.90	12	2.30	2.50	3.10	3	15.90
688655	12	2.30	3.90	5.10	4.50	12	3.50	3.50	5.30	3	6.10
787803	12	3.40	7.30	9.10	14.90	12	2.20	4.60	5.30	3	7.20
788204	12	4.30	4.00	6.10	5.00	12	2.60	3.10	4.20	3	4.10
787536	12	2.90	3.00	4.10	3.90	12	3.90	6.20	2.40	3	4.70
788718	12	3.10	5.50	7.20	8.90	12	3.70	6.50	3.90	3	6.80
787754	12	3.70	3.20	6.90	6.40	12	3.10	5.20	3.90	3	7.40
789491	12	2.90	5.00	4.30	4.50	12	4.40	5.20	4.20	3	4.40
790043	12	4.80	4.60	5.40	6.20	12	2.10	7.00	5.60	3	5.20
790520	12	3.70	4.10	4.00	7.20	12	2.20	3.60	4.80	3	4.10
790425	12	2.70	4.60	3.50	4.60	12	2.40	2.20	4.60	3	4.60
792686	12	3.00	4.20	4.90	5.60	12	5.00	9.50	7.60	3	9.50
790508	12	4.20	4.50	4.90	8.10	12	2.10	3.20	4.30	3	6.90
792692	12	3.50	4.00	3.30	6.00	12	3.10	3.30	5.40	3	5.40
790526	12	3.50	4.60	7.50	7.10	12	2.30	5.40	5.20	3	5.00
790505	12	3.20	4.50	4.20	10.30	12	4.60	3.70	5.10	3	11.00
790428	12	2.50	3.80	7.00	4.80	12	2.20	3.70	4.50	3	10.60
791685	12	3.40	7.60	7.80	9.20	12	5.00	5.20	5.50	3	10.60
793004	12	3.20	3.20	5.10	5.00	12	2.20	2.90	2.40	3	13.00
789109	12	3.30	3.30	4.40	4.10	12	5.00	3.40	5.40	3	7.60
789112	12	6.20	8.80	9.20	8.40	12	2.90	3.50	3.80	3	2.60
791004	12	3.40	3.80	5.40	8.20	12	3.30	3.70	4.70	3	2.60
792816	12	4.50	8.70	8.40	4.80	12	3.10	3.20	4.80	3	8.50
790522	12	3.60	3.70	5.40	4.90	12	3.50	4.90	6.90	3	8.70
789110	12	5.60	4.10	5.40	6.40	12	3.10	3.80	4.10	3	4.70
791683	12	5.00	6.40	8.80	6.10	12	3.40	3.80	5.10	3	7.50
792945	12	2.90	2.90	5.80	4.40	12	3.50	4.90	4.90	3	3.50
791999	12	4.20	4.30	7.20	6.20	12	4.80	6.50	5.10	3	10.20
791958	12	4.20	3.00	3.80	6.40	12	4.10	6.70	5.60	3	10.30
787794	12	1.80	3.70	4.80	5.90	12	4.80	9.50	6.60	3	6.20

SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO		
		1	2	3			1	2	3			1	2	3
787333	12	4.60	8.60	8.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
787757	12	4.80	8.90	4.20	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
788666	12	5.20	6.50	9.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791758	12	3.70	3.80	4.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
788895	12	4.60	4.20	4.20	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791755	12	4.10	2.50	3.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789352	12	4.50	2.90	3.20	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789301	12	3.80	3.80	4.60	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789299	12	3.10	4.60	3.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791834	12	3.10	3.40	2.80	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790979	12	4.30	4.30	3.80	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791437	12	4.80	4.20	4.10	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790405	12	3.00	2.40	4.40	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790643	12	3.80	4.00	3.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790152	12	3.20	5.10	7.40	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789665	12	4.40	4.70	4.30	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
787269	12	2.90	2.90	4.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789943	12	3.50	4.60	2.40	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
787514	12	3.60	3.60	4.50	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
787366	12	3.90	6.50	10.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790119	12	4.20	5.10	6.50	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789333	12	3.00	5.10	5.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789879	12	2.30	4.60	3.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789884	12	3.30	5.30	3.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790412	12	3.10	2.20	3.60	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790084	12	3.50	3.90	3.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790057	12	4.40	4.30	4.70	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790062	12	3.10	5.20	5.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789664	12	4.00	5.80	4.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789877	12	2.00	4.50	4.20	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789303	12	3.30	5.30	4.50	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790648	12	3.90	3.50	3.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
789939	12	3.30	3.20	5.00	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791290	12	3.00	5.70	3.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
763616	12	3.50	3.80	3.20	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791002	12	5.10	4.20	3.40	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790965	12	3.80	4.50	5.60	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790981	12	3.70	1.70	2.80	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791015	12	3.30	1.90	4.10	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790980	12	4.80	4.20	3.80	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790640	12	2.50	2.40	2.60	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790986	12	3.80	4.80	4.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790370	12	3.80	5.30	3.40	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791950	12	2.90	4.30	2.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790395	12	4.30	4.20	6.80	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
764862	12	2.80	4.80	4.10	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
791212	12	2.70	3.60	4.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
788572	12	6.70	4.60	5.60	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790840	12	2.60	3.80	4.30	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790906	12	3.80	2.90	6.90	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30
790503	12	3.20	4.80	4.30	788309	12	3.80	4.50	4.10	790084	12	3.50	4.70	4.30

SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO		
		1	2	3			1	2	3
791979	12	5.00	5.30	6.50	790939	12	2.50	3.10	3.90
790950	12	4.50	4.70	4.60	790866	12	2.70	3.30	4.10
790227	12	3.80	5.40	3.40	792641	12	3.00	2.50	4.60
790343	12	4.00	5.00	4.00	790348	12	2.20	4.40	4.20
790879	12	4.70	3.20	5.50	787706	12	5.10	5.10	5.30
790891	12	5.20	4.90	4.20	790355	12	4.60	3.40	3.40
790885	12	3.40	2.90	3.80	790878	12	4.80	4.90	6.00
790803	12	5.80	5.30	5.30	790347	12	4.00	2.80	4.00
790884	12	2.70	2.90	2.90	790889	12	2.90	4.20	3.50
790826	12	2.00	3.60	5.40	790463	12	3.00	2.90	3.70
790890	12	2.40	3.80	3.20	790350	12	4.00	4.50	5.00
791155	12	3.00	3.00	3.60	790688	12	4.00	3.30	2.50
791856	12	3.70	3.20	3.40	793002	12	2.40	3.00	4.90
764877	12	3.10	4.60	4.20	790603	12	3.70	3.50	3.90
791851	12	5.30	4.50	4.90	789726	12	3.10	2.80	3.70
791764	12	4.70	4.50	4.50	789080	12	2.00	3.50	3.40
791763	12	3.20	5.60	3.00	791341	12	3.30	4.10	3.40
791725	12	4.00	4.60	4.20	791242	12	3.30	2.00	2.60
791300	12	3.30	4.70	3.60	791407	12	2.40	2.30	2.50
791738	12	4.00	2.10	2.60	791736	12	3.60	3.80	3.50
791751	12	3.40	2.80	5.90	790881	12	3.60	2.00	3.40
789740	12	3.90	3.90	5.20	789315	12	6.30	3.30	2.80
790368	12	2.80	3.50	2.40	764786	12	3.10	4.20	3.50
789985	12	2.60	3.80	1.70	790873	12	4.00	4.00	5.20
793000	12	2.80	3.40	3.10	764608	12	4.00	3.50	12.80
791907	12	5.10	4.80	4.70	791969	12	2.30	3.00	1.90
790914	12	4.40	3.00	3.20	789771	12	3.50	2.60	3.10
787716	12	3.40	3.40	3.10	790506	12	3.90	3.80	4.40
790807	12	2.90	3.50	3.50	792999	12	3.80	3.00	2.50
788670	12	3.10	3.60	4.60	788719	12	4.10	2.70	3.10
787793	12	3.90	3.90	5.20	788524	12	3.20	4.80	5.80
787527	12	2.80	4.30	3.50	788706	12	4.50	3.50	4.60
787773	12	3.80	3.20	3.40	790053	12	3.40	2.90	2.50
789619	12	3.90	4.10	3.00	787779	12	3.20	4.60	6.90
788099	12	3.00	4.10	3.00	791892	12	3.00	4.10	3.60
791964	12	2.80	4.10	2.60	787995	12	2.80	7.80	5.60
791767	12	4.00	4.80	4.30	788675	12	3.20	3.90	4.20
790836	12	2.80	2.60	2.80	793009	12	3.30	6.30	3.10
788207	12	3.00	1.60	4.40	791891	12	2.30	4.10	2.30
787640	12	3.00	2.60	3.00	787369	12	3.50	4.50	3.60
789313	12	2.80	3.70	3.50	790203	12	2.30	5.80	4.60
790928	12	2.60	3.90	3.50	787362	12	3.10	2.90	3.70
763118	12	2.10	2.40	3.60	792002	12	2.70	3.30	2.60
792784	12	2.40	2.10	2.50	763094	12	3.00	2.60	3.40
788990	12	4.50	4.80	3.20	788573	12	2.20	4.30	4.90
789348	12	3.60	3.00	4.20	793070	12	3.00	6.00	4.50
787588	12	4.90	4.30	5.80	792826	12	2.90	2.50	2.30
792944	12	4.30	3.80	3.90	790938	12	4.00	2.80	3.60
784672	12	2.80	5.10	2.70	789650	12	3.30	3.30	3.80
788471	12	4.30	4.10	4.80	792941	12	3.80	4.20	3.80
					791967	12	2.70	3.00	4.20

SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO		
		1	2	3			1	2	3
792677	12	3.60	3.90	4.10	790859	12	3.00	3.80	2.60
790858	12	3.60	3.80	3.00	792978	12	3.20	2.90	3.30
787580	12	3.90	4.00	4.60	790527	12	3.50	3.30	4.00
793142	12	4.30	6.60	5.40	790537	12	3.90	4.10	5.10
791903	12	3.10	2.00	2.00	788584	12	4.20	4.10	4.50
790947	12	7.00	6.50	6.30	790147	12	3.90	4.80	4.50
784346	12	3.40	4.50	3.50	784352	12	6.80	5.00	4.00
789114	12	2.50	4.30	3.50	788997	12	2.10	2.30	1.80
793023	12	3.80	3.60	3.40	791865	12	2.70	5.00	3.70
792998	12	3.20	5.40	3.10	789721	12	4.30	4.70	5.60
793079	12	3.10	6.00	4.20	791899	12	3.00	3.40	4.70
792629	12	2.70	2.80	3.80	793131	12	3.70	2.80	3.40
788530	12	3.80	3.90	3.60	764882	12	2.50	3.00	4.80
791419	12	3.40	4.30	8.00	790517	12	3.80	3.80	3.70
788326	12	2.30	2.60	3.60	792643	12	3.10	3.40	4.20
790344	12	3.40	2.20	4.80	791855	12	2.70	2.00	4.60
793080	12	4.80	5.00	13.40	789741	12	3.60	2.30	4.00
790886	12	2.80	2.60	2.50	763491	12	3.80	2.30	4.40
791980	12	4.50	3.40	3.30	790530	12	4.60	5.80	5.20
763093	12	7.00	17.40	24.90	792748	12	3.50	3.00	3.10
792605	12	3.90	3.00	3.00	790101	12	8.20	5.00	5.70
793073	12	2.50	3.70	4.80	764883	12	2.80	2.40	2.80
792785	12	3.70	4.90	3.00	790369	12	3.10	3.90	3.20
763800	12	2.80	2.70	2.90	787432	12	2.80	2.80	4.90
789319	12	5.30	3.80	4.40	790212	12	2.20	3.50	2.30
791110	12	2.40	4.60	3.10	793011	12	2.00	3.00	2.20
791820	12	4.70	3.50	8.60	763486	12	4.40	2.20	4.10
788585	12	2.60	7.20	3.40	787368	12	3.30	3.20	3.30
787655	12	3.90	3.60	2.70	789306	12	2.90	2.60	3.20
787363	12	7.10	6.80	4.80	788334	12	4.80	5.30	5.10
790310	12	2.80	5.30	3.70	790898	12	2.40	3.90	2.80
793057	12	3.70	4.50	3.00	792591	12	3.70	4.30	3.50
762897	12	3.70	3.50	3.30	790380	12	2.30	2.30	2.80
790498	12	2.90	3.80	3.70	793050	12	4.40	8.70	3.40
790903	12	4.30	6.60	4.30	790304	12	3.90	7.40	2.70
790838	12	3.00	2.90	3.60	791785	12	2.70	2.70	4.10
790870	12	2.70	4.10	4.90	789676	12	3.00	3.50	2.80
788798	12	3.60	4.20	2.40	765321	12	3.20	2.50	4.40
789498	12	3.50	2.50	3.80	789159	12	3.40	3.20	3.50
788802	12	4.60	2.11	5.20	788891	12	2.90	3.50	4.00
792898	12	3.90	4.60	5.10	792571	12	3.70	3.20	3.60
792580	12	9.20	4.30	7.60	790895	12	3.70	3.00	3.80
788826	12	4.50	4.60	5.30	788717	12	3.30	3.60	3.00
787505	12	2.80	3.90	3.90	791647	12	3.20	4.10	4.00
792583	12	2.80	2.50	3.70	764887	12	3.50	3.00	2.80
792566	12	2.70	5.60	2.80	789657	12	4.00	3.80	2.70
790372	12	3.50	3.60	3.10	792993	12	3.30	2.00	4.10
787584	12	2.00	3.40	2.90	763817	12	2.30	4.10	3.20
791636	12	4.30	3.10	3.10	791897	12	2.60	3.30	4.10
798018	12	3.50	3.30	3.50	790865	12	2.30	2.80	3.30
791864	12	3.20	3.50	4.10	788869	12	3.60	3.10	15.60

SER NO	TW	MARG. AMMO			AVE. AMMO			SER NO	TW	MARG. AMMO			AVE. AMMO		
		1	2	3	1	2	3			1	2	3	1	2	3
788521	14	10.00	9.80	11.30	13.30	13.30	792572	14	5.80	11.40	5.90	11.40	5.90	11.20	
788657	14	7.10	9.20	8.40	12.50	12.50	790944	14	7.20	7.50	11.40	7.20	7.50	10.70	
788351	14	6.30	10.70	9.00	11.50	11.50	788664	14	4.90	7.10	9.80	4.90	7.10	16.10	
789784	14	6.00	9.80	10.60	9.60	9.60	788548	14	10.20	8.50	14.30	10.20	8.50	8.80	
790432	14	13.70	11.80	9.40	13.50	13.50	792598	14	8.40	8.20	12.70	8.40	8.20	15.40	
789791	14	7.20	11.20	10.40	12.60	12.60	792570	14	11.00	7.70	16.70	11.00	7.70	16.90	
789071	14	14.90	13.60	14.00	8.40	8.40	788945	14	9.20	8.00	11.40	9.20	8.00	13.90	
790678	14	9.50	9.20	10.10	13.20	13.20	792994	14	9.70	9.30	4.90	9.70	9.30	8.00	
789158	14	5.20	6.10	8.50	13.40	13.40	791971	14	10.80	12.10	13.80	10.80	12.10	16.60	
790908	14	5.40	3.60	7.50	11.90	11.90	789380	14	5.00	10.30	13.60	5.00	10.30	16.80	
787717	14	10.70	7.10	7.00	10.80	10.80	792005	14	5.20	8.40	6.30	5.20	8.40	12.40	
787641	14	8.50	5.90	9.40	14.40	14.40	880055	14	5.00	7.30	10.70	5.00	7.30	13.40	
790713	14	8.40	5.60	10.60	13.40	13.40	880143	14	5.40	6.00	4.70	5.40	6.00	11.80	
789416	14	8.80	6.80	6.90	14.00	14.00	789002	14	6.10	7.20	10.90	6.10	7.20	8.00	
789052	14	7.00	8.80	9.80	12.20	12.20	789763	14	9.30	7.20	13.20	9.30	7.20	10.80	
791272	14	6.10	7.00	6.70	17.10	17.10	791259	14	8.00	5.40	5.50	8.00	5.40	8.30	
791177	14	10.30	7.30	14.20	18.20	18.20	790179	14	7.40	8.00	8.80	7.40	8.00	17.30	
787707	14	5.80	5.50	9.80	12.20	12.20	790073	14	6.50	6.10	8.10	6.50	6.10	13.00	
789713	14	6.90	8.00	9.00	17.80	17.80	787713	14	6.60	8.00	8.20	6.60	8.00	10.00	
790069	14	7.00	6.80	6.60	13.10	13.10	791194	14	4.50	9.00	8.40	4.50	9.00	8.40	
787709	14	7.50	12.40	8.80	10.90	10.90	791078	14	7.10	7.00	15.00	7.10	7.00	12.90	
791232	14	6.60	5.50	7.50	8.10	8.10	791746	14	9.70	12.80	13.10	9.70	12.80	14.40	
791582	14	8.80	9.40	6.60	6.60	6.60	791315	14	8.20	9.20	8.50	8.20	9.20	11.40	
791263	14	5.30	9.30	6.60	11.00	11.00	791349	14	10.30	8.70	9.40	10.30	8.70	16.30	
791812	14	8.00	6.70	14.70	13.20	13.20	791329	14	7.10	9.80	5.30	7.10	9.80	9.00	
791368	14	8.40	8.70	12.10	19.60	19.60	790762	14	11.30	9.80	8.00	11.30	9.80	10.50	
791244	14	8.50	8.50	10.70	11.80	11.80	790667	14	12.50	6.30	15.00	12.50	6.30	12.00	
784979	14	6.60	9.90	12.50	12.90	12.90	793061	14	6.80	6.40	6.90	6.80	6.40	15.20	
791454	14	5.90	7.90	6.70	10.20	10.20	782193	14	9.10	16.60	21.10	9.10	16.60	18.60	
781533	14	4.60	7.20	7.10	12.20	12.20	791219	14	7.00	10.10	12.60	7.00	10.10	8.80	
790959	14	11.70	9.40	11.30	13.60	13.60	791318	14	7.20	10.00	11.80	7.20	10.00	18.20	
790427	14	4.70	8.30	8.10	9.60	9.60	791668	14	4.10	3.70	8.50	4.10	3.70	15.70	
791780	14	3.40	4.30	9.20	17.30	17.30	790723	14	4.80	6.50	8.40	4.80	6.50	5.20	
790672	14	6.60	11.60	7.80	15.70	15.70	790469	14	5.60	8.20	9.30	5.60	8.20	13.70	
790729	14	7.30	8.20	8.90	17.20	17.20	790665	14	2.30	8.90	8.20	2.30	8.90	16.80	
790484	14	6.70	7.50	9.10	8.60	8.60	790490	14	8.30	7.60	7.50	8.30	7.60	11.80	
790418	14	8.50	6.30	5.30	7.50	7.50	790402	14	6.30	8.30	7.10	6.30	8.30	10.90	
790666	14	9.30	7.60	12.40	13.00	13.00	790415	14	9.10	6.30	8.40	9.10	6.30	10.30	
790027	14	7.20	7.00	9.70	12.80	12.80	790173	14	8.10	8.10	12.90	8.10	8.10	8.90	
790045	14	6.60	5.80	11.70	11.90	11.90	790543	14	7.50	8.50	5.70	7.50	8.50	7.80	
790128	14	4.50	5.40	8.60	9.90	9.90	790086	14	5.90	5.70	9.30	5.90	5.70	13.20	
790177	14	2.70	7.40	7.00	13.00	13.00	790669	14	5.90	6.30	8.20	5.90	6.30	8.60	
790033	14	9.60	7.40	10.60	15.50	15.50	790411	14	3.30	4.40	5.00	3.30	4.40	9.50	
790025	14	8.20	7.60	10.90	20.40	20.40	790972	14	5.40	6.70	6.50	5.40	6.70	11.70	
790741	14	9.10	4.20	7.10	13.70	13.70	788265	14	8.60	11.40	13.60	8.60	11.40	13.40	
791693	14	3.40	7.10	4.30	9.30	9.30	793053	14	3.50	6.20	12.40	3.50	6.20	11.70	
791171	14	8.10	8.90	11.50	6.30	6.30	788668	14	3.40	7.40	10.60	3.40	7.40	10.10	
788651	14	10.80	6.80	7.60	9.60	9.60	765541	14	11.70	12.20	12.70	11.70	12.20	9.90	
789072	14	7.30	7.40	10.70	12.40	12.40	791623	14	9.00	14.00	11.20	9.00	14.00	8.50	
790789	14	9.60	10.30	10.80	16.50	16.50	764257	14	6.50	8.40	9.00	6.50	8.40	10.70	
791282	14	12.60	9.40	9.70	14.10	14.10	765535	14	11.40	7.90	11.60	11.40	7.90	11.90	

SER NO	TW	MARG. AMMO			AVE. AMMO			SER NO	TW	MARG. AMMO			AVE. AMMO		
		1	2	3	1	2	3			1	2	3	1	2	3
790401	14	6.00	8.70	10.60	11.70	10.60	11.70	790932	14	16.60	7.00	9.50	10.80	10.80	
789161	14	5.80	5.60	10.20	15.60	10.20	15.60	787773	14	6.70	6.30	8.20	18.70	18.70	
789210	14	9.20	10.00	7.70	12.90	7.70	12.90	792581	14	5.40	7.10	6.30	15.40	15.40	
790677	14	10.80	8.30	9.50	11.90	9.50	11.90	792756	14	7.30	4.70	15.40	14.10	14.10	
790703	14	3.30	6.50	8.60	8.70	8.60	8.70	789500	14	10.70	3.70	9.10	16.00	16.00	
791622	14	7.00	8.90	10.50	18.50	10.50	18.50	789066	14	8.20	8.60	7.10	12.50	12.50	
792751	14	8.00	12.00	12.40	26.70	12.40	26.70	789751	14	7.10	8.50	7.00	20.10	20.10	
791477	14	6.80	10.70	10.00	8.00	10.00	8.00	791321	14	8.50	10.10	6.90	8.80	8.80	
790036	14	4.00	8.20	3.50	10.10	3.50	10.10	791021	14	9.50	6.50	11.00	18.20	18.20	
790720	14	9.20	11.80	12.40	13.70	12.40	13.70	791458	14	5.30	9.10	7.50	8.00	8.00	
791470	14	7.10	11.30	12.50	12.70	12.50	12.70	790736	14	9.20	6.40	9.10	16.00	16.00	
791221	14	16.30	9.40	6.80	9.50	6.80	9.50	791367	14	12.60	9.20	5.50	17.40	17.40	
790023	14	8.50	13.20	7.30	14.90	7.30	14.90	790039	14	2.90	6.40	5.50	10.50	10.50	
790664	14	7.30	6.70	11.40	6.30	11.40	6.30	790660	14	9.90	7.60	7.50	10.20	10.20	
791690	14	10.00	12.30	14.20	11.50	14.20	11.50	791174	14	8.70	9.30	9.90	12.10	12.10	
791310	14	14.50	8.90	7.70	6.50	7.70	6.50	788263	14	5.30	3.20	9.60	11.10	11.10	
790973	14	8.50	8.60	14.50	12.10	14.50	12.10	788262	14	8.30	6.80	7.60	21.60	21.60	
790934	14	5.50	7.90	7.40	14.40	7.40	14.40	789586	14	11.80	10.00	16.50	16.80	16.80	
788388	14	10.00	12.00	11.40	15.20	11.40	15.20	790670	14	7.90	10.20	12.90	8.60	8.60	
790178	14	8.60	5.50	11.00	13.50	11.00	13.50	790127	14	3.70	9.40	16.90	15.00	15.00	
791687	14	15.70	15.00	9.20	16.40	9.20	16.40	791444	14	8.30	9.10	8.50	16.00	16.00	
791447	14	8.40	9.30	12.50	7.80	12.50	7.80	788927	14	11.20	12.00	14.00	14.40	14.40	
790689	14	10.20	9.30	11.00	12.00	11.00	12.00	791453	14	8.40	8.30	8.30	6.80	6.80	
788417	14	7.60	9.80	10.30	6.90	10.30	6.90	790091	14	8.60	7.90	9.90	7.80	7.80	
788503	14	6.10	6.10	10.50	8.40	10.50	8.40	787707	14	9.20	6.70	6.70	8.20	8.20	
787703	14	9.70	6.90	10.20	16.40	10.20	16.40	790927	14	4.70	4.70	11.80	14.60	14.60	
790668	14	6.70	9.40	8.70	7.70	8.70	7.70	790711	14	3.90	12.40	10.60	15.70	15.70	
790441	14	14.80	10.00	12.80	17.40	12.80	17.40	790744	14	10.00	12.40	10.60	16.50	16.50	
790740	14	10.70	5.30	11.70	8.00	11.70	8.00	790406	14	6.70	7.10	7.30	6.70	6.70	
790685	14	5.20	4.70	8.10	8.30	8.10	8.30	791442	14	9.40	19.60	9.70	16.00	16.00	
790694	14	8.40	10.60	6.80	4.80	6.80	4.80	790710	14	8.20	11.20	7.60	8.40	8.40	
790701	14	6.00	7.50	10.80	8.50	10.80	8.50	789139	14	8.40	6.10	7.60	7.40	7.40	
790451	14	7.20	9.30	13.60	19.00	13.60	19.00	790779	14	11.20	9.20	10.80	16.40	16.40	
791974	14	7.30	8.80	9.00	21.80	9.00	21.80	790700	14	9.40	8.10	8.20	9.70	9.70	
790714	14	8.60	7.70	9.80	10.70	9.80	10.70	791975	14	13.20	11.60	14.80	18.00	18.00	
790683	14	8.60	11.90	8.40	23.70	8.40	23.70	790680	14	11.50	8.20	7.50	10.60	10.60	
789781	14	4.70	7.30	13.20	14.50	13.20	14.50	790702	14	7.10	13.30	6.70	11.90	11.90	
789128	14	6.50	10.30	6.50	19.90	6.50	19.90	789973	14	12.60	10.80	10.50	13.70	13.70	
789984	14	7.10	6.90	3.80	10.40	3.80	10.40	790780	14	8.50	8.40	5.00	10.00	10.00	
790797	14	6.60	9.40	6.60	6.60	6.60	6.60	789717	14	9.40	8.10	9.40	10.60	10.60	
790090	14	8.60	11.30	12.70	20.40	12.70	20.40	791166	14	9.90	13.40	18.20	18.00	18.00	
791468	14	9.60	10.80	11.40	15.30	11.40	15.30	790070	14	8.30	11.40	11.60	14.20	14.20	
791069	14	11.30	9.60	6.50	11.90	6.50	11.90	790662	14	5.50	5.60	9.10	6.60	6.60	
790737	14	10.50	6.00	9.50	13.30	9.50	13.30	790998	14	9.10	13.40	12.10	11.60	11.60	
790976	14	7.60	7.00	11.80	11.80	7.00	11.80	790409	14	9.30	10.40	12.80	15.30	15.30	
788648	14	10.90	11.90	7.00	11.70	7.00	11.70	788369	14	8.70	9.00	8.90	14.20	14.20	
788651	14	7.30	7.30	9.50	8.50	9.50	8.50	788655	14	8.00	10.20	8.10	8.50	8.50	
797867	14	3.40	9.40	9.10	17.30	9.10	17.30	790705	14	15.80	13.40	16.30	18.00	18.00	
790706	14	8.90	11.50	6.00	12.40	6.00	12.40	789979	14	9.50	11.00	9.20	21.40	21.40	
790064	14	11.80	12.20	10.90	14.30	10.90	14.30	789909	14	10.90	8.40	8.00	13.40	13.40	
791971	14	9.50	9.20	13.00	19.90	9.20	19.90	788538	14	11.70	9.40	8.70	11.40	11.40	



SER NO	TW	MARG. AMMO			AVE AMMO			SER NO	TW	MARG. AMMO			AVE AMMO		
		1	2	3	1	2	3			1	2	3	1	2	3
791187	14	9.20	15.90	11.80	17.60	17.80	791082	14	8.10	5.70	7.00	15.90	15.90		
791230	14	5.90	6.40	8.90	19.90	19.90	791838	14	5.50	8.20	11.80	12.20	12.20		
791417	14	5.80	10.70	8.00	10.40	10.40	791052	14	4.30	3.80	4.30	15.40	15.40		
791175	14	7.40	6.20	5.60	12.10	12.10	791237	14	7.10	6.10	9.40	10.60	10.60		
791493	14	6.40	7.20	9.00	11.50	11.50	789709	14	10.50	10.50	7.20	13.60	13.60		
791075	14	10.30	10.30	13.70	14.60	14.60	791229	14	5.10	7.00	5.80	5.90	5.90		
788330	14	7.80	7.60	11.30	7.10	7.10	791306	14	9.50	8.20	9.20	16.40	16.40		
789777	14	4.50	4.90	8.90	11.50	11.50	788256	14	5.00	6.70	8.40	8.80	8.80		
789003	14	4.40	4.80	5.50	12.60	12.60	786712	14	5.30	5.30	7.60	8.40	8.40		
789723	14	9.40	12.50	7.90	13.60	13.60	791073	14	4.80	7.50	8.20	9.10	9.10		
790160	14	9.70	11.00	14.10	24.40	24.40	791257	14	5.90	4.70	6.50	9.70	9.70		
790159	14	4.60	9.40	8.10	14.30	14.30	791295	14	5.90	7.30	7.10	9.50	9.50		
791195	14	11.40	10.20	13.30	16.80	16.80	791366	14	6.10	11.70	9.50	12.60	12.60		
791039	14	3.30	11.40	10.60	7.40	7.40	789774	14	4.60	5.30	5.60	9.20	9.20		
791335	14	7.20	11.50	12.90	18.80	18.80	791234	14	4.80	6.30	9.40	8.90	8.90		
791317	14	8.60	5.50	6.90	13.70	13.70	791265	14	9.30	10.90	7.40	13.70	13.70		
791068	14	6.30	9.50	10.30	11.80	11.80	791192	14	4.30	9.90	5.80	18.60	18.60		
791303	14	7.50	6.20	7.00	4.30	4.30	791269	14	5.20	7.10	6.00	7.70	7.70		
789924	14	5.10	5.40	5.90	9.20	9.20	791019	14	5.10	6.70	7.10	11.50	11.50		
791274	14	9.70	8.30	11.40	15.10	15.10	791276	14	6.60	6.30	8.70	12.40	12.40		
791807	14	5.70	11.00	8.80	14.10	14.10	791311	14	11.30	15.50	10.80	11.90	11.90		
791355	14	5.10	4.70	8.10	9.20	9.20	791748	14	4.70	9.90	16.20	15.20	15.20		
791314	14	6.90	8.90	9.50	11.70	11.70	791744	14	6.40	12.40	10.70	17.10	17.10		
791308	14	10.60	9.80	6.60	7.00	7.00	791733	14	5.40	8.70	9.20	12.40	12.40		
791842	14	10.10	13.00	13.00	19.50	19.50	791324	14	8.00	9.90	9.20	25.30	25.30		
791754	14	7.90	6.20	7.60	21.70	21.70	791327	14	8.00	4.80	7.70	7.40	7.40		
791600	14	4.40	6.00	7.60	10.00	10.00	791740	14	5.80	8.70	12.80	17.00	17.00		
791409	14	4.80	8.00	6.80	8.80	8.80	791337	14	5.20	3.30	12.10	8.30	8.30		
791399	14	6.60	13.60	14.10	16.60	16.60	791022	14	10.70	10.00	12.20	16.60	16.60		
791319	14	5.80	6.00	8.90	19.60	19.60	791608	14	9.70	5.50	5.80	15.30	15.30		
791752	14	9.80	6.40	12.50	20.80	20.80	791825	14	5.30	8.80	5.40	12.10	12.10		
791695	14	6.70	7.00	9.50	11.80	11.80	791821	14	5.30	5.20	8.00	6.30	6.30		
791708	14	9.70	6.90	5.70	7.30	7.30	791739	14	6.90	13.80	7.00	8.10	8.10		
791732	14	9.70	8.80	9.20	16.60	16.60	791273	14	10.40	10.10	9.40	13.00	13.00		
791264	14	9.20	6.60	9.80	7.40	7.40	791178	14	7.20	10.80	11.10	11.20	11.20		
791074	14	7.60	10.80	12.00	10.60	10.60	791260	14	10.30	9.30	8.60	9.00	9.00		
790725	14	11.00	13.30	11.20	15.60	15.60	791173	14	12.10	14.10	11.30	17.50	17.50		
791476	14	4.60	8.60	7.90	9.20	9.20	787853	14	5.50	5.20	14.80	11.10	11.10		
787854	14	8.10	8.60	9.20	14.30	14.30	791193	14	4.20	6.20	7.70	18.40	18.40		
791438	14	7.30	9.70	14.60	7.00	7.00	782337	14	13.50	8.60	13.60	16.50	16.50		
791358	14	2.60	12.60	10.00	18.50	18.50	791267	14	7.80	9.30	6.90	11.80	11.80		
791065	14	9.10	12.70	13.80	17.90	17.90	790024	14	11.50	9.00	9.70	11.50	11.50		
790773	14	10.80	6.20	7.30	6.80	6.80	787701	14	7.70	6.20	13.20	8.70	8.70		
782235	14	7.10	6.90	8.20	12.90	12.90	787708	14	6.60	7.20	12.40	13.70	13.70		
782187	14	8.90	15.50	10.60	9.20	9.20	782141	14	15.80	13.50	13.00	13.70	13.70		
782154	14	5.60	6.00	8.50	6.20	6.20	783099	14	8.50	9.30	8.40	14.40	14.40		
782247	14	10.70	9.50	10.20	12.80	12.80	782305	14	5.00	9.90	9.90	7.60	7.60		
782321	14	7.80	10.10	10.90	14.00	14.00	783130	14	8.30	6.90	6.60	9.70	9.70		
790012	14	6.50	9.90	11.90	14.50	14.50	793063	14	9.30	10.70	11.30	10.70	10.70		
783060	14	9.90	9.90	11.90	14.50	14.50	790138	14	3.10	13.20	10.40	8.50	8.50		
							782142	14	3.70	6.40	8.50	9.80	9.80		

SER NO	TW	MARG. AMMO			SER NO	TW	AVE. AMMO			MARG. AMMO
		1	2	3			1	2	3	
782561	14	5.80	5.90	4.50	787867	14	6.60	14.50	6.30	14.60
790117	14	11.00	8.00	6.00	790016	14	6.40	6.50	8.20	8.10
791241	14	8.80	4.70	6.80	789224	14	5.50	5.50	6.10	11.30
791451	14	7.00	5.40	7.30	791837	14	6.40	10.80	11.10	18.60
791277	14	5.70	6.10	6.50	792559	14	6.10	7.20	7.30	8.20
789078	14	8.50	8.00	7.70	791446	14	5.70	6.60	16.50	21.40
788434	14	7.30	8.20	12.30	790083	14	7.20	8.40	9.70	8.70
791868	14	4.70	13.60	9.50	790361	14	7.40	7.10	5.40	5.90
789866	14	4.80	4.50	5.30	790468	14	6.20	11.00	12.40	6.50
791339	14	5.30	5.40	4.90	789150	14	5.50	5.20	3.50	8.20
783132	14	5.70	6.00	8.10	790021	14	3.10	6.30	10.00	10.10
790071	14	2.60	4.90	8.40	787714	14	7.20	8.90	7.00	9.60
782306	14	3.60	4.10	5.80	880324	14	6.50	7.60	6.90	10.10
790080	14	8.60	8.80	7.10	783131	14	6.30	4.10	3.80	7.50
790097	14	4.90	5.50	5.30	790172	14	5.90	4.50	11.40	18.00
789953	14	7.10	7.10	4.80	790048	14	5.20	9.10	10.50	12.10
782086	14	5.50	7.30	7.20	789714	14	4.50	8.90	6.70	19.00
791674	14	4.70	4.40	11.20	791448	14	6.50	5.20	9.20	5.80
789606	14	8.00	7.00	7.50	788134	14	5.50	8.20	8.70	14.40
789594	14	5.30	8.70	5.00	790104	14	6.00	7.50	10.80	15.50
789593	14	6.70	6.60	5.70	788650	14	4.80	9.00	5.70	5.90
781281	14	4.90	8.80	8.10	790017	14	7.30	5.40	6.60	8.60
789951	14	6.10	8.60	4.90	790751	14	5.90	9.50	8.90	14.70
790999	14	9.40	7.80	9.20	791776	14	5.40	5.80	5.80	10.70
791589	14	6.10	14.90	8.70	790726	14	6.90	11.20	8.60	10.00
787712	14	11.60	10.00	9.60	789732	14	7.70	12.90	12.30	14.70
790718	14	7.60	6.40	6.80	790978	14	4.10	6.40	7.20	11.20
789085	14	9.80	6.50	9.50	789206	14	4.80	8.20	5.10	7.00
790996	14	6.00	8.10	5.50	791287	14	6.00	6.30	4.60	8.60
792997	14	6.60	5.50	7.50	792560	14	6.90	9.50	7.90	21.80
788536	14	7.20	5.10	7.00	790790	14	6.20	5.20	9.40	24.60
789803	14	8.10	7.20	9.20	791620	14	4.90	7.60	5.70	8.80
789734	14	6.50	8.00	6.20	790465	14	9.00	9.30	7.50	10.40
791788	14	6.70	6.90	9.90	791511	14	6.00	8.30	6.90	11.00
791093	14	10.10	16.10	9.30	791626	14	6.40	9.10	8.80	12.00
792780	14	8.50	7.50	10.60	791525	14	8.20	5.40	7.40	7.00
792604	14	9.40	7.80	7.40	791618	14	9.40	5.30	10.00	14.20
788525	14	6.30	4.70	6.90	791406	14	8.40	7.60	14.20	13.20
788352	14	5.90	9.00	8.60	790472	14	6.50	12.00	10.30	16.20
791595	14	12.10	12.60	12.90	791030	14	10.10	10.00	8.40	14.20
788928	14	7.70	11.20	12.30	791123	14	4.40	4.20	8.50	13.70
791256	14	8.40	5.70	9.90	791408	14	7.80	6.20	11.50	16.40
791536	14	6.60	13.70	10.80	791817	14	2.70	4.10	7.10	16.20
791048	14	5.30	6.30	12.00	791805	14	6.50	11.10	15.80	16.00
791735	14	6.90	8.00	6.70	791701	14	3.70	5.40	6.00	21.30
791818	14	5.40	4.70	5.10	791084	14	5.60	3.90	6.40	5.40
791806	14	8.30	7.00	5.50	791530	14	5.70	6.00	5.70	16.00
791703	14	4.80	5.60	5.70	791709	14	11.20	9.50	14.00	17.50
791258	14	6.50	5.60	4.60	790443	14	4.50	7.10	7.00	9.20
791111	14	5.70	9.00	9.30	791336	14	5.80	5.50	4.50	6.00
791770	14	5.40	5.50	8.40	790985	14	6.80	11.70	9.20	16.40

SER NO	TW	MARG. AMMO			AVE. AMMO			SER NO	TW	MARG. AMMO			AVE. AMMO			SER NO	TW	MARG. AMMO			AVE. AMMO			
		1	2	3	1	2	3			1	2	3	1	2	3			1	2	3	1	2	3	
791603	14	11.30	11.80	11.60	15.90	15.90	15.90	791288	14	7.10	8.90	9.00	791354	14	6.60	7.40	9.50	11.70	13.80	12.20	11.40	7.40	9.50	11.80
790960	14	5.60	7.70	12.50	12.80	12.80	12.80	790076	14	8.30	8.40	8.60	788649	14	10.00	6.40	11.60	10.00	6.40	11.60	10.00	6.40	11.60	9.90
791380	14	5.80	6.20	9.20	18.80	18.80	18.80	790661	14	11.60	11.20	12.00	791412	14	11.20	11.20	9.60	11.20	11.20	9.60	11.20	11.20	9.60	18.40
791378	14	4.20	5.90	8.80	7.10	7.10	7.10	791398	14	6.40	11.20	12.20	791486	14	10.50	4.10	10.00	10.50	4.10	10.00	10.50	4.10	10.00	13.40
791344	14	8.10	8.50	10.70	12.70	12.70	12.70	791391	14	6.20	13.80	13.30	791357	14	5.40	7.20	10.20	5.40	7.20	10.20	5.40	7.20	10.20	8.50
791832	14	9.10	6.00	5.10	6.00	6.00	6.00	791583	14	7.70	5.80	18.10	791445	14	7.20	10.20	8.10	7.20	10.20	8.10	7.20	10.20	17.90	
790724	14	5.40	7.70	9.80	5.40	5.40	5.40	792996	14	10.50	9.70	11.80	791354	14	6.60	7.40	9.50	6.60	7.40	9.50	6.60	7.40	9.50	11.80
789497	14	8.50	11.20	12.70	10.40	10.40	10.40	788649	14	10.00	6.40	11.60	791405	14	11.70	13.80	12.20	11.70	13.80	12.20	11.70	13.80	12.20	17.40
792469	14	5.60	13.30	10.20	15.40	15.40	15.40	788647	14	10.30	6.90	11.30	791345	14	5.50	4.50	4.80	5.50	4.50	4.80	5.50	4.50	4.80	8.50
787865	14	4.60	6.50	5.00	12.60	12.60	12.60	791412	14	11.20	11.20	9.60	790709	14	6.20	8.70	9.30	6.20	8.70	9.30	6.20	8.70	9.30	14.20
776420	14	5.40	9.60	7.40	12.40	12.40	12.40	791486	14	10.50	4.10	10.00	782150	14	4.60	7.70	12.90	4.60	7.70	12.90	4.60	7.70	12.90	17.70
791364	14	10.50	8.70	8.50	10.00	10.00	10.00	791357	14	5.40	7.20	10.20	792586	14	6.70	4.90	8.10	6.70	4.90	8.10	6.70	4.90	8.10	15.90
787980	14	6.40	7.40	8.50	9.80	9.80	9.80	791445	14	7.20	10.20	8.10	791827	14	6.40	5.50	4.60	6.40	5.50	4.60	6.40	5.50	4.60	14.10
791304	14	12.80	8.30	11.80	21.40	21.40	21.40	791354	14	6.60	7.40	9.50	783774	14	4.00	5.20	6.50	4.00	5.20	6.50	4.00	5.20	6.50	5.80
789189	14	9.50	7.20	7.00	10.10	10.10	10.10	791405	14	11.70	13.80	12.20	783749	14	5.80	7.30	10.40	5.80	7.30	10.40	5.80	7.30	10.40	15.40
792485	14	10.40	11.40	13.20	15.90	15.90	15.90	791345	14	5.50	4.50	4.80	784228	14	5.20	5.50	8.20	5.20	5.50	8.20	5.20	5.50	8.20	20.30
791440	14	6.20	5.50	7.70	7.40	7.40	7.40	790709	14	6.20	8.70	9.30	791625	14	8.80	12.50	12.40	8.80	12.50	12.40	8.80	12.50	12.40	9.60
790674	14	10.30	11.80	7.60	4.50	4.50	4.50	789782	14	9.00	7.20	11.40	782699	14	9.50	9.00	13.00	9.50	9.00	13.00	9.50	9.00	13.00	14.30
790542	14	16.40	8.00	6.40	18.70	18.70	18.70	782150	14	4.60	7.70	12.90	790704	14	6.40	6.00	6.50	6.40	6.00	6.50	6.40	6.00	6.50	6.50
789730	14	5.80	6.30	6.30	6.30	6.30	6.30	792586	14	6.70	4.90	8.10	791196	14	5.30	5.20	8.20	5.30	5.20	8.20	5.30	5.20	8.20	20.30
789760	14	8.70	7.20	9.10	13.00	13.00	13.00	791827	14	6.40	5.50	4.60	790704	14	6.40	9.70	9.70	6.40	9.70	9.70	6.40	9.70	9.70	17.10
790060	14	11.60	5.30	7.50	11.20	11.20	11.20	783572	14	3.80	7.00	7.60	791071	14	5.60	9.40	3.60	5.60	9.40	3.60	5.60	9.40	3.60	15.60
791255	14	6.10	5.50	7.80	8.20	8.20	8.20	783774	14	4.00	5.20	6.50	791533	14	9.40	8.60	12.80	9.40	8.60	12.80	9.40	8.60	12.80	17.40
791520	14	5.60	7.80	12.20	16.60	16.60	16.60	783749	14	5.80	7.30	10.40	791374	14	6.30	14.30	13.20	6.30	14.30	13.20	6.30	14.30	13.20	13.20
784109	14	7.00	11.70	17.50	16.70	16.70	16.70	784228	14	5.20	5.50	8.20	791106	14	8.20	9.30	12.10	8.20	9.30	12.10	8.20	9.30	12.10	18.80
784127	14	8.50	9.20	9.20	16.80	16.80	16.80	791625	14	5.20	9.00	10.80	790949	14	3.50	4.70	9.30	3.50	4.70	9.30	3.50	4.70	9.30	10.20
784231	14	9.10	12.40	7.70	27.90	27.90	27.90	782699	14	9.50	9.00	13.00	791395	14	5.60	5.60	12.80	5.60	5.60	12.80	5.60	5.60	12.80	15.60
790717	14	9.50	11.00	10.10	16.30	16.30	16.30	790704	14	4.60	6.00	6.50	787730	14	7.20	7.20	11.40	7.20	7.20	11.40	7.20	7.20	11.40	7.20
791141	14	6.70	6.60	8.80	16.40	16.40	16.40	791196	14	6.40	9.70	9.70	791784	14	7.70	3.10	6.80	7.70	3.10	6.80	7.70	3.10	6.80	10.00
782923	14	5.50	7.20	7.70	13.00	13.00	13.00	790704	14	6.40	9.70	9.70	790957	14	7.60	7.40	7.90	7.60	7.40	7.90	7.60	7.40	7.90	11.60
790435	14	7.50	6.60	7.10	18.90	18.90	18.90	791071	14	5.60	9.40	3.60	790719	14	8.30	9.00	11.70	8.30	9.00	11.70	8.30	9.00	11.70	9.30
790439	14	5.30	5.40	9.00	7.50	7.50	7.50	791533	14	9.40	8.60	12.80	791233	14	9.10	10.70	12.40	9.10	10.70	12.40	9.10	10.70	12.40	15.70
791322	14	10.30	17.50	11.80	14.30	14.30	14.30	791374	14	6.30	14.30	13.20	791496	14	7.10	9.30	7.10	7.10	9.30	7.10	7.10	9.30	7.10	10.30
791783	14	21.20	8.50	14.50	13.10	13.10	13.10	791106	14	8.20	9.30	12.10	789772	14	8.40	6.40	6.90	8.40	6.40	6.90	8.40	6.40	6.90	7.40
789588	14	9.50	6.50	8.90	13.80	13.80	13.80	790949	14	3.50	4.70	9.30	791387	14	5.70	10.30	5.70	5.70	10.30	5.70	5.70	10.30	5.70	6.80
789767	14	6.10	7.60	7.30	14.20	14.20	14.20	791395	14	5.60	5.60	12.80	791159	14	4.00	7.50	5.50	4.00	7.50	5.50	4.00	7.50	5.50	9.40
791449	14	8.60	6.90	12.50	11.60	11.60	11.60	787730	14	7.20	7.20	11.40	791377	14	5.90	9.80	10.50	5.90	9.80	10.50	5.90	9.80	10.50	10.60
790745	14	6.20	7.10	9.90	9.20	9.20	9.20	791395	14	5.60	5.60	12.80	781836	14	5.90	8.30	9.00	5.90	8.30	9.00	5.90	8.30	9.00	13.70
791199	14	4.80	5.30	7.40	5.00	5.00	5.00	790945	14	8.00	10.80	9.90												
790699	14	10.70	10.40	9.90	14.60	14.60	14.60	787730	14	7.20	7.20	11.40												
791176	14	4.40	5.80	7.10	9.90	9.90	9.90	791784	14	7.70	3.10	6.80												
790014	14	8.30	9.40	7.70	11.40	11.40	11.40	790691	14	7.10	6.00	7.30												
791117	14	11.30	5.80	8.00	8.50	8.50	8.50	790957	14	7.60	7.40	7.90												
789885	14	4.20	6.50	5.00	8.30	8.30	8.30	790719	14	8.30	9.00	11.70												
788428	14	6.10	12.10	11.50	6.70	6.70	6.70	791233	14	9.10	10.70	12.40												
791334	14	8.90	12.60	7.20	12.10	12.10	12.10	791496	14	7.10	9.30	7.10												
791302	14	6.00	5.20	11.30	8.60	8.60	8.60	789772	14	8.40	6.40	6.90												
791373	14	5.00	6.20	6.20	10.80	10.80	10.80	791387	14	5.70	10.30	5.70												
789715	14	4.10	7.00	9.30	20.60	20.60	20.60	791159	14	4.00	7.50	5.50												
789780	14	2.70	6.20	5.90	5.20	5.20	5.20	791377	14	5.90	9.80	10.50												
791224	14	5.70	5.60	8.90	9.70	9.70	9.70	781836	14	5.90	8.30	9.00												

SER NO	TW	MARG. AMMO			AVE. AMMO		
		1	2	3	1	2	3
791828	14	8.80	6.70	2.90	10.10	8.70	9.80
789907	14	8.80	7.20	6.50	8.10	10.50	13.40
790732	14	8.50	6.50	10.20	18.20	4.30	6.60
791107	14	9.10	7.80	7.50	8.80	9.80	10.00
789041	14	17.30	9.80	12.30	13.50	8.10	10.60
789613	14	7.90	6.80	9.20	13.10	5.20	10.30
789212	14	5.50	12.80	11.00	12.50	7.30	12.70
782237	14	8.20	9.80	12.80	16.80	7.20	11.90
781575	14	3.50	7.40	7.40	6.20	6.20	21.20
790734	14	7.90	12.30	12.10	13.90	8.20	9.40
784668	14	5.80	11.30	14.80	16.70	7.20	16.20
781566	14	4.50	8.40	12.70	14.70	9.60	16.20
790742	14	6.10	6.90	7.30	13.70	11.50	13.60
790747	14	5.40	7.10	7.90	8.90	7.80	12.80
790749	14	7.40	6.20	11.20	14.20	5.00	6.00
791227	14	6.30	6.80	8.40	10.60	9.00	8.60
790698	14	7.20	10.60	9.10	16.00	6.60	10.30
791614	14	7.50	4.50	9.00	11.80	8.70	8.40
791245	14	10.60	18.60	10.60	17.90	9.40	15.90
791118	14	3.40	12.10	6.80	13.10	9.30	11.20
790496	14	9.30	11.10	8.20	6.30	12.70	17.50
791383	14	6.20	12.10	7.40	8.80	7.80	8.80
791535	14	4.30	6.10	8.40	7.90	8.10	8.90
791610	14	7.10	6.40	10.30	15.10	7.20	6.60
790841	14	5.70	10.60	8.90	5.00	9.00	11.40
788252	14	7.60	12.50	11.20	13.60	8.20	13.90
787704	14	7.50	11.30	7.30	12.50	9.80	10.20
791423	14	6.20	9.40	6.30	12.10	7.20	14.10
791456	14	5.20	6.40	8.30	11.90	5.90	14.70
791431	14	9.90	10.90	12.80	13.70	11.00	16.60
790542	14	6.00	10.80	10.40	15.10	10.40	9.10
789134	14	7.60	15.30	14.50	18.30	7.90	16.60
790118	14	8.40	8.20	6.10	11.50	10.80	19.60
790142	14	6.90	7.80	5.00	6.70	7.00	13.00
791460	14	5.60	5.30	5.70	11.20	6.80	8.80
789729	14	7.90	11.50	7.40	14.90	7.90	7.30
791139	14	6.00	5.60	7.70	10.90	6.20	13.40
783133	14	9.70	5.50	9.60	9.50	7.80	16.50
783087	14	5.30	9.30	9.80	8.40	12.60	10.70
788247	14	7.40	6.30	10.50	16.10	8.60	15.40
790139	14	6.00	7.10	5.80	6.30	7.50	9.30
790137	14	10.30	11.00	11.60	11.10	6.30	10.80
790457	14	10.60	8.50	15.20	17.30	7.60	22.10
790015	14	4.60	10.70	7.40	9.40	10.50	10.80
790114	14	8.90	4.80	5.30	10.50	7.40	8.30
788243	14	11.00	8.40	9.30	15.10	2.70	7.90
790144	14	6.70	9.80	10.20	11.20	5.80	13.20
791096	14	6.60	7.40	5.80	14.00	10.30	12.50
791379	14	5.60	9.90	8.10	21.50	9.30	14.70
790741	14	9.50	16.20	7.90	18.20	11.40	7.10
791249	14	4.30	6.20	6.20	19.90	7.30	9.90

SER NO	TW	MARG. AMMO			AVG.			MARG. AMMO		
		1	2	3	1	2	3	1	2	3
791350	14	5.90	9.10	8.90	12.00	8.90	9.50	5.60	9.50	9.30
791372	14	12.20	15.20	16.00	17.70	17.70	9.30	6.10	9.30	19.90
791911	14	14.30	9.80	9.20	10.20	9.20	10.50	10.80	7.50	12.40
790715	14	7.80	10.90	13.90	11.20	11.20	12.80	7.10	11.00	13.20
790952	14	8.10	7.50	7.00	10.20	9.80	7.20	9.80	8.40	9.00
791392	14	11.00	9.70	10.30	15.60	15.60	7.40	7.70	8.80	6.60
789766	14	5.80	10.20	10.40	7.30	7.30	9.80	7.20	8.20	13.70
788543	14	4.70	6.80	7.20	16.20	16.20	7.90	6.70	9.40	13.20
791587	14	1.90	3.00	3.10	12.60	12.60	5.50	8.40	6.60	9.90
791293	14	5.70	6.70	9.00	17.80	17.80	7.90	7.00	12.50	15.20
788944	14	7.30	8.60	9.00	9.30	9.30	7.90	3.90	6.50	9.40
787724	14	7.20	3.80	7.00	21.40	21.40	6.80	7.90	11.10	15.60
787236	14	8.80	7.30	6.10	14.60	14.60	10.00	9.00	8.10	15.40
787725	14	8.60	8.90	9.60	15.50	15.50	4.40	3.30	4.80	5.90
793058	14	9.70	5.80	6.10	13.40	13.40	8.70	7.40	6.80	11.20
790990	14	7.10	10.10	8.80	12.30	12.30	10.40	9.40	11.10	15.40
787243	14	8.10	9.70	7.30	11.00	11.00	5.00	7.60	6.50	10.30
791631	14	8.50	10.80	10.20	19.30	19.30	8.90	5.30	7.90	14.80
791179	14	8.30	12.30	13.10	18.70	18.70	10.50	11.90	8.70	2.50
789076	14	3.70	4.50	4.80	6.40	6.40	13.30	9.20	5.00	11.60
788531	14	4.70	5.50	4.40	12.00	12.00	7.70	4.10	8.90	20.80
788542	14	5.00	7.80	5.10	20.40	20.40	8.30	6.40	5.30	5.30
791326	14	10.60	10.20	11.60	18.30	18.30	8.40	7.40	6.30	8.50
788534	14	9.30	11.60	14.50	5.90	5.90	10.00	3.40	4.10	7.90
790782	14	3.60	8.00	7.80	11.50	11.50	11.70	7.30	6.70	13.20
790093	14	7.70	5.30	7.60	7.90	7.90	10.20	9.80	10.20	17.30
787670	14	8.10	7.30	5.30	9.40	9.40	9.20	6.20	4.30	7.10
791352	14	15.00	6.40	15.40	12.60	12.60	6.10	9.30	8.70	10.50
791330	14	4.70	8.50	10.50	7.60	7.60	7.50	6.00	8.50	6.40
791815	14	4.60	5.90	8.00	6.40	6.40	10.10	6.70	6.50	10.60
791362	14	11.50	10.70	11.20	14.70	14.70	10.00	7.20	7.40	10.40
791036	14	6.70	7.50	8.90	11.00	11.00	10.90	6.60	6.80	17.50
791085	14	6.90	6.30	14.00	13.60	13.60	7.40	7.10	8.50	7.20
790687	14	8.70	12.50	13.50	16.10	16.10	9.40	7.60	9.50	15.70
791281	14	6.80	4.90	10.60	7.90	7.90	5.80	7.60	8.50	10.10
791351	14	2.50	9.20	10.00	12.70	12.70	7.60	8.20	6.60	15.60
791299	14	6.70	12.30	12.40	24.10	24.10	8.80	6.40	7.30	17.60
791371	14	12.40	9.10	9.30	11.80	11.80	11.70	5.10	3.20	13.60
791130	14	7.00	6.70	7.40	7.80	7.80	10.20	3.70	10.20	19.00
790783	14	6.00	6.80	9.80	23.40	23.40	7.60	4.00	10.50	12.30
791455	14	9.50	9.80	13.50	24.50	24.50	6.90	4.30	6.70	8.30
790757	14	4.20	4.30	7.50	11.70	11.70	12.00	5.80	9.20	16.80
791981	14	8.00	7.10	6.30	6.30	6.30	7.50	4.80	13.20	9.50
790708	14	3.20	8.50	5.70	15.30	15.30	6.30	4.90	4.20	5.20
791050	14	7.20	8.50	8.30	13.20	13.20	7.90	9.20	10.50	12.90
791617	14	9.90	12.10	13.00	15.20	15.20	7.10	7.80	8.60	7.50
787643	14	7.20	6.00	7.70	9.10	9.10	7.50	6.20	3.00	11.70
783729	14	7.50	5.80	6.50	9.20	9.20	8.90	9.30	9.10	15.80
789084	14	12.00	11.70	11.60	10.50	10.50	9.10	9.60	11.00	13.20
790422	14	9.30	6.80	8.80	8.50	8.50	7.90	7.70	10.80	16.80
791262	14	8.30	6.50	7.30	13.60	13.60	6.70	6.10	6.80	12.00

SER NO	TW	MARG. AMMO			SER NO	TW	MARG. AMMO		
		1	2	3			1	2	3
790911	12	3.40	3.80	2.60	790504	12	4.60	5.90	5.50
790510	12	3.40	5.20	8.00	788349	12	4.50	5.30	6.80
791200	12	4.70	3.60	8.00	791793	12	5.40	4.80	3.80
791239	14	5.50	9.80	6.60	791032	14	7.40	8.40	7.40
790787	14	15.30	15.50	13.30	791238	14	8.60	9.50	11.60
791471	14	4.00	6.00	8.80	790149	14	11.90	10.10	6.60
791254	14	9.30	10.70	9.30	788268	14	7.60	9.30	7.30
791989	14	5.80	6.90	9.40	791188	14	5.00	3.80	10.80
788929	14	11.10	11.10	6.80	791040	14	3.90	6.40	9.50
790716	14	8.70	7.30	14.40	791441	14	11.80	10.40	15.30
735339	14	6.90	10.10	19.60	788932	14	6.60	12.70	8.70
989082	14	6.10	7.60	10.80	791792	14	4.60	6.00	7.10
789395	14	3.40	6.90	5.60	783050	14	7.40	10.50	5.10
790072	14	4.30	5.80	6.80	782151	14	5.80	5.30	4.20
783023	14	5.90	4.10	4.70	790019	14	4.40	3.50	5.90
790075	14	5.00	10.10	6.40	788753	14	5.40	10.60	6.60
782149	14	10.00	5.80	10.30	790096	14	7.60	8.00	7.90
790058	14	6.20	6.80	5.40	790738	14	6.90	5.80	5.50
791707	14	7.30	7.00	7.80	791112	14	6.70	5.60	7.30
791218	14	4.40	7.70	7.00	791070	14	6.90	7.80	8.10
791115	14	10.90	9.00	11.20	791847	14	9.60	9.00	15.80
791862	14	8.60	8.20	7.90	791619	14	8.90	9.10	10.10
792771	14	8.80	8.40	10.30	791291	14	5.30	4.70	4.20
790399	14	4.40	4.90	4.20	793048	14	5.60	10.60	9.10
790410	14	7.60	5.50	5.80	790681	14	3.90	4.90	10.70
791027	14	13.70	9.00	13.70	781133	14	8.60	10.30	9.30
789919	14	7.50	7.40	7.30	791393	14	9.00	8.00	7.80
791243	14	5.20	6.00	7.80	790759	14	8.90	10.20	8.20
791831	14	7.50	11.40	10.10	791810	14	8.20	13.10	11.60
789511	14	6.30	15.10	5.40	791562	14	6.60	7.50	7.90
791051	14	8.50	8.20	10.50	791261	14	12.20	8.20	7.20
791063	14	7.30	14.50	12.40	880038	14	7.30	9.00	14.30
791143	14	7.20	9.60	7.50	781530	14	8.60	10.40	7.50
788979	14	6.00	8.00	13.30	789597	14	9.70	8.00	7.90
789612	14	10.70	11.90	7.50	788939	14	7.80	8.70	6.80
789602	14	10.10	6.00	11.20	789077	14	6.00	10.20	11.90
788936	14	4.70	8.20	7.40	791681	14	8.70	9.00	8.60
788938	14	6.00	6.90	8.30	789916	14	6.20	9.90	10.20
791680	14	7.20	7.40	8.10	790671	14	6.90	9.20	9.10
789648	14	7.80	5.30	15.20	790164	14	8.70	7.00	5.50
790554	14	6.10	6.40	12.30	791226	14	7.80	12.30	11.50
790735	14	9.80	8.80	8.30	790755	14	7.80	8.20	7.70
791266	14	11.40	9.50	6.30	790946	14	7.80	14.50	8.40
790495	14	9.60	9.90	9.20	790748	14	9.30	5.80	7.60
790941	14	9.90	10.70	12.40	791136	14	12.10	6.30	11.50
790778	14	6.40	7.40	9.70	782140	14	9.60	15.20	11.50
782432	14	6.70	14.60	5.70	791045	14	7.60	6.80	7.60
782368	14	6.00	5.40	6.90	791403	14	10.30	10.10	11.70
790697	14	9.20	8.90	7.80	791203	14	9.40	4.20	9.70
791061	14	6.70	8.30	10.20	791016	14	10.00	6.80	9.00
791246	14	7.00	6.10	5.80					

SER NO	TW	MARG. AMMO			AVE			SER NO	TW	MARG. AMMO			AVE		
		1	2	3	1	2	3			1	2	3	1	2	3
761607	14	3.40	7.00	3.20	6.10	11.10	789706	14	12.10	8.60	11.20	10.60	11.20		
791515	14	7.40	13.70	12.20	13.30	11.60	791439	14	11.60	13.90	11.50	17.00	11.50		
790693	14	7.80	6.80	9.10	11.30	2.60	790529	12	2.60	4.40	3.80	3.80	3.80		
790864	12	4.40	4.30	5.20	5.10	3.20	787694	12	3.20	3.00	3.80	8.10	3.80		
790499	12	3.60	6.50	3.60	9.40	3.00	790352	12	3.00	3.30	3.90	5.30	3.90		
793130	12	5.10	5.00	3.20	8.00	4.00	790336	12	4.00	5.10	4.00	5.00	5.00		
790871	12	3.00	4.40	4.00	3.90	4.20	791651	12	4.20	2.60	3.50	3.90	3.90		
790855	12	2.90	2.90	4.40	2.70	10.00	791428	14	10.00	11.50	12.90	13.40	13.40		
790686	14	5.00	14.50	10.30	11.10	3.10	790969	14	3.10	4.40	5.00	11.00	11.00		
791457	14	6.50	11.10	11.00	13.10	6.40	790695	14	6.40	11.20	11.00	9.90	9.90		
790984	14	6.20	10.10	8.80	11.70	7.00	791972	14	7.00	3.90	3.80	9.10	9.10		
791988	14	8.00	7.40	6.90	9.90	9.40	789211	14	9.40	10.20	8.90	10.60	10.60		
791594	14	8.40	16.00	13.40	15.20	9.30	790907	14	9.30	10.30	5.10	14.30	14.30		
792607	14	8.10	7.40	10.70	16.70	6.30	791988	14	6.30	5.30	9.80	14.30	14.30		
792765	14	9.10	8.60	9.40	10.60	8.20	880037	14	8.20	10.30	12.10	22.10	22.10		
791593	14	12.10	11.00	9.30	7.50	11.90	788423	14	11.90	14.80	13.20	17.50	17.50		
791588	14	6.10	7.70	7.10	13.40	7.90	791581	14	7.90	11.40	12.20	14.90	14.90		
791611	14	12.10	12.30	8.80	10.00	4.10	788422	14	4.10	7.50	16.30	21.10	21.10		
791579	14	10.80	13.10	13.10	8.80	5.00	792763	14	5.00	6.10	7.70	16.10	16.10		
792764	14	8.30	8.40	8.60	10.60	3.70	792266	14	3.70	4.30	10.90	14.20	14.20		
789208	14	9.20	8.00	8.10	10.70	5.40	791982	14	5.40	6.40	8.60	16.20	16.20		
792606	14	12.40	6.30	9.30	15.80	14.10	792606	14	14.10	9.40	9.20	11.10	11.10		
790424	14	12.30	11.50	5.70	16.60	13.90	788655	14	13.90	8.20	13.10	13.00	13.00		
790905	14	9.20	11.20	10.60	11.70	8.80	790727	14	8.80	9.00	10.50	13.60	13.60		
791986	14	5.40	5.60	16.80	21.30	10.60	789733	14	10.60	7.70	9.50	16.00	16.00		
791977	14	8.30	6.70	4.00	11.90	9.30	789749	14	9.30	10.20	12.60	17.30	17.30		
790382	14	9.80	10.80	11.80	13.90	7.00	790116	14	7.00	7.00	7.20	16.20	16.20		
790794	14	9.00	9.40	10.80	13.50	7.30	791271	14	7.30	2.70	10.20	17.30	17.30		
791333	14	6.90	11.80	10.90	23.40	6.30	791142	14	6.30	5.60	7.50	13.20	13.20		
790756	14	7.60	8.50	9.20	13.60	6.20	790481	14	6.20	10.30	6.50	13.50	13.50		
790455	14	3.80	6.10	6.40	9.40	4.00	790761	14	4.00	3.20	7.50	9.70	9.70		
790777	14	8.60	10.50	9.10	7.80	7.00	791022	14	7.00	8.00	8.40	13.20	13.20		
791029	14	6.70	7.60	7.00	6.00	7.60	791222	14	7.60	9.30	7.90	7.80	7.80		
791752	14	5.90	7.20	9.10	22.70	4.90	791816	14	4.90	9.00	6.10	6.20	6.20		
790414	14	8.90	10.70	9.00	11.20	9.40	790767	14	9.40	6.30	8.50	11.20	11.20		
790743	14	8.60	9.60	11.30	15.00	7.20	791113	14	7.20	6.50	9.50	15.50	15.50		
790488	14	7.90	10.50	10.60	12.20	4.00	782183	14	4.00	10.30	9.20	12.30	12.30		
789605	14	8.30	5.60	6.80	5.80	5.50	782324	14	5.50	8.60	8.00	8.30	8.30		
783093	14	9.30	10.60	14.60	21.10	9.40	782878	14	9.40	8.70	11.90	11.70	11.70		
782110	14	7.40	4.80	7.80	16.30	7.80	791750	14	7.80	6.40	8.50	12.80	12.80		
790953	14	9.10	7.80	7.80	14.10	8.00	788433	14	8.00	9.50	5.60	8.60	8.60		
782437	14	9.60	8.50	6.80	12.40	8.60	788424	14	8.60	3.20	6.90	13.00	13.00		
791797	14	13.00	9.10	14.60	13.30	6.30	781492	14	6.30	6.60	6.10	12.30	12.30		
783094	14	11.90	9.30	9.50	10.80	5.40	783127	14	5.40	9.00	15.20	19.50	19.50		
782559	14	5.50	6.80	12.40	21.90	9.00	791677	14	9.00	8.10	12.00	15.70	15.70		
791340	14	10.80	9.10	9.10	15.10	3.70	788251	14	3.70	7.20	5.50	7.70	7.70		
788537	14	6.40	15.10	13.10	19.50	4.70	791404	14	4.70	3.60	4.40	7.00	7.00		
791598	14	7.90	7.80	12.20	7.90	9.10	788345	14	9.10	11.60	5.90	9.40	9.40		
788549	14	8.10	8.90	13.00	12.20	3.50	790476	12	3.50	2.80	3.30	12.80	12.80		
791962	12	2.40	2.50	3.60	1.90	2.70	791896	12	2.70	2.30	2.60	11.10	11.10		
790766	12	3.20	2.60	3.00	3.30	2.20	790954	12	2.20	3.00	3.50	3.30	3.30		

INCL 2

Frequency Table For 2000 Barrel Dispersion Test Firings

A-12-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	1.000000	.001001	.001001
1.45- 1.65	3.000000	.003003	.004004
1.65- 1.85	9.000000	.009009	.013013
1.85- 2.05	16.000000	.016016	.029029
2.05- 2.25	27.000000	.027027	.056056
2.25- 2.45	56.000000	.056056	.112112
2.45- 2.65	48.000000	.048048	.160160
2.65- 2.85	77.000000	.077077	.237237
2.85- 3.05	86.000000	.088088	.325325
3.05- 3.25	93.000000	.093093	.418418
3.25- 3.45	79.000000	.079079	.497497
3.45- 3.65	81.000000	.081081	.578579
3.65- 3.85	85.000000	.085085	.663664
3.85- 4.05	59.000000	.059059	.722723
4.05- 4.25	54.000000	.054054	.776777
4.25- 4.45	51.000000	.051051	.827828
4.45- 4.65	41.000000	.041041	.868869
4.65- 4.85	42.000000	.042042	.910911
4.85- 5.05	23.000000	.023023	.933934
5.05- 5.25	15.000000	.015015	.948949
5.25- 5.45	13.000000	.013013	.961962
5.45- 5.65	10.000000	.010010	.971972
5.65- 5.85	5.000000	.005005	.976977
5.85- 6.05	3.000000	.003003	.979980
6.05- 6.25	5.000000	.005005	.984985
6.25- 6.45	3.000000	.003003	.987988
6.45- 6.65	.000000	.000000	.987988
6.65- 6.85	3.000000	.003003	.990991
6.85- 7.05	3.000000	.003003	.993994
7.05- 7.25	1.000000	.001001	.994995
7.25- 7.45	1.000000	.001001	.995996
7.45- 7.65	.000000	.000000	.995996
7.65- 7.85	1.000000	.001001	.996997
7.85- 8.05	.000000	.000000	.996997
8.05- 8.25	1.000000	.001001	.997998
8.25- 8.45	.000000	.000000	.997998
8.45- 8.65	.000000	.000000	.997998
8.65- 8.85	.000000	.000000	.997998
8.85- 9.05	.000000	.000000	.997998
9.05- 9.25	1.000000	.001001	.998999
9.25- 9.45	.000000	.000000	.998999
9.45- 9.65	.000000	.000000	.998999
9.65- 9.85	.000000	.000000	.998999
9.85- 10.0	1.000000	.001001	1.000000

A-12-2

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	2.00000	.002002	.002002
1.45- 1.65	4.00000	.004004	.006006
1.65- 1.85	7.00000	.007007	.013013
1.85- 2.05	10.0000	.010010	.023023
2.05- 2.25	26.0000	.026026	.049049
2.25- 2.45	28.0000	.028028	.077077
2.45- 2.65	42.0000	.042042	.119119
2.65- 2.85	42.0000	.042042	.161161
2.85- 3.05	66.0000	.066066	.227227
3.05- 3.25	60.0000	.060060	.287287
3.25- 3.45	72.0000	.072072	.359359
3.45- 3.65	83.0000	.083083	.442442
3.65- 3.85	83.0000	.083083	.525526
3.85- 4.05	50.0000	.050050	.575576
4.05- 4.25	66.0000	.066066	.641642
4.25- 4.45	52.0000	.052052	.693694
4.45- 4.65	52.0000	.052052	.745746
4.65- 4.85	34.0000	.034034	.779780
4.85- 5.05	36.0000	.036036	.815816
5.05- 5.25	31.0000	.031031	.846847
5.25- 5.45	28.0000	.028028	.874875
5.45- 5.65	16.0000	.016016	.890891
5.65- 5.85	15.0000	.015015	.905906
5.85- 6.05	17.0000	.017017	.922923
6.05- 6.25	16.0000	.016016	.938939
6.25- 6.45	4.00000	.004004	.942943
6.45- 6.65	11.0000	.011011	.953954
6.65- 6.85	10.0000	.010010	.963964
6.85- 7.05	5.00000	.005005	.968969
7.05- 7.25	3.00000	.003003	.971972
7.25- 7.45	6.00000	.006006	.977978
7.45- 7.65	1.00000	.001001	.978979
7.65- 7.85	2.00000	.002002	.980981
7.85- 8.05	1.00000	.001001	.981982

A-12-2

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
8.05- 8.25	.000000	.000000	.981982
8.25- 8.45	1.000000	.001001	.982983
8.45- 8.65	3.000000	.003003	.985986
8.65- 8.85	5.000000	.005005	.990991
8.85- 9.05	1.000000	.001001	.991992
9.05- 9.25	1.000000	.001001	.992993
9.25- 9.45	1.000000	.001001	.993994
9.45- 9.65	3.000000	.003003	.996997
9.65- 9.85	.000000	.000000	.996997
9.85- 10.0	.000000	.000000	.996997
10.0- 10.2	1.000000	.001001	.997998
10.2- 10.4	.000000	.000000	.997998
10.4- 10.6	1.000000	.001001	.998999
10.6- 10.8	.000000	.000000	.998999
10.8- 11.0	.000000	.000000	.998999
11.0- 11.2	.000000	.000000	.998999
11.2- 11.4	.000000	.000000	.998999
11.4- 11.6	.000000	.000000	.998999
11.6- 11.8	.000000	.000000	.998999
11.8- 12.0	.000000	.000000	.998999
12.0- 12.2	.000000	.000000	.998999
12.2- 12.4	.000000	.000000	.998999
12.4- 12.6	.000000	.000000	.998999
12.6- 12.8	.000000	.000000	.998999
12.8- 13.0	.000000	.000000	.998999
13.0- 13.2	.000000	.000000	.998999
13.2- 13.4	.000000	.000000	.998999
13.4- 13.6	.000000	.000000	.998999
13.6- 13.8	.000000	.000000	.998999
13.8- 14.0	.000000	.000000	.998999
14.0- 14.2	.000000	.000000	.998999
14.2- 14.4	.000000	.000000	.998999
14.4- 14.6	.000000	.000000	.998999
14.6- 14.8	.000000	.000000	.998999
14.8- 15.0	.000000	.000000	.998999
15.0- 15.2	.000000	.000000	.998999
15.2- 15.4	.000000	.000000	.998999
15.4- 15.6	.000000	.000000	.998999
15.6- 15.8	.000000	.000000	.998999
15.8- 16.0	.000000	.000000	.998999
16.0- 16.2	.000000	.000000	.998999
16.2- 16.4	.000000	.000000	.998999
16.4- 16.6	.000000	.000000	.998999
16.6- 16.8	.000000	.000000	.998999
16.8- 17.0	.000000	.000000	.998999
17.0- 17.2	.000000	.000000	.998999
17.2- 17.4	1.000000	.001001	1.000000

A-12-3

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	4.00000	.004004	.004004
1.85- 2.05	6.00000	.006006	.010010
2.05- 2.25	6.00000	.006006	.016016
2.25- 2.45	20.0000	.020020	.036036
2.45- 2.65	30.0000	.030030	.066066
2.65- 2.85	53.0000	.053053	.119119
2.85- 3.05	48.0000	.048048	.167167
3.05- 3.25	60.0000	.060060	.227227
3.25- 3.45	66.0000	.066066	.293293
3.45- 3.65	83.0000	.083083	.376376
3.65- 3.85	58.0000	.058058	.434434
3.85- 4.05	56.0000	.056056	.490490
4.05- 4.25	67.0000	.067067	.557558
4.25- 4.45	55.0000	.055055	.612613
4.45- 4.65	50.0000	.050050	.662663
4.65- 4.85	43.0000	.043043	.705706
4.85- 5.05	34.0000	.034034	.739740
5.05- 5.25	30.0000	.030030	.769770
5.25- 5.45	28.0000	.028028	.797798
5.45- 5.65	26.0000	.026026	.823824
5.65- 5.85	23.0000	.023023	.846847
5.85- 6.05	16.0000	.016016	.862863
6.05- 6.25	16.0000	.016016	.878879
6.25- 6.45	17.0000	.017017	.895896
6.45- 6.65	10.0000	.010010	.905906
6.65- 6.85	7.00000	.007007	.912913
6.85- 7.05	11.0000	.011011	.923924
7.05- 7.25	11.0000	.011011	.934935
7.25- 7.45	8.00000	.008008	.942943
7.45- 7.65	9.00000	.009009	.951952
7.65- 7.85	3.00000	.003003	.954955
7.85- 8.05	5.00000	.005005	.959960
8.05- 8.25	6.00000	.006006	.965966
8.25- 8.45	5.00000	.005005	.970971
8.45- 8.65	4.00000	.004004	.974975
8.65- 8.85	2.00000	.002002	.976977
8.85- 9.05	1.00000	.001001	.977978
9.05- 9.25	3.00000	.003003	.980981
9.25- 9.45	3.00000	.003003	.983984
9.45- 9.65	1.00000	.001001	.984985
9.65- 9.85	.000000	.000000	.984985
9.85- 10.0	.000000	.000000	.984985
10.0- 10.2	1.00000	.001001	.985986
10.2- 10.4	.000000	.000000	.985986
10.4- 10.6	2.00000	.002002	.987988

A-12-3

<u>Extreme Spread Intervals</u>	<u>Observations</u>	<u>Observed Frequency</u>	<u>Cumulative Observed Frequency</u>
10.6- 10.8	.000000	.000000	.987988
10.8- 11.0	1.000000	.001001	.988989
11.0- 11.2	.000000	.000000	.988989
11.2- 11.4	.000000	.000000	.988989
11.4- 11.6	.000000	.000000	.988989
11.6- 11.8	.000000	.000000	.988989
11.8- 12.0	1.000000	.001001	.989990
12.0- 12.2	2.000000	.002002	.991992
12.2- 12.4	.000000	.000000	.991992
12.4- 12.6	.000000	.000000	.991992
12.6- 12.8	1.000000	.001001	.992993
12.8- 13.0	.000000	.000000	.992993
13.0- 13.2	.000000	.000000	.992993
13.2- 13.4	1.000000	.001001	.993994
13.4- 13.6	1.000000	.001001	.994995
13.6- 13.8	.000000	.000000	.994995
13.8- 14.0	.000000	.000000	.994995
14.0- 14.2	.000000	.000000	.994995
14.2- 14.4	.000000	.000000	.994995
14.4- 14.6	.000000	.000000	.994995
14.6- 14.8	.000000	.000000	.994995
14.8- 15.0	.000000	.000000	.994995
15.0- 15.2	.000000	.000000	.994995
15.2- 15.4	1.000000	.001001	.995996
15.4- 15.6	2.000000	.002002	.997998
15.6- 15.8	.000000	.000000	.997998
15.8- 16.0	.000000	.000000	.997998
16.0- 16.2	.000000	.000000	.997998
16.2- 16.4	.000000	.000000	.997998
16.4- 16.6	.000000	.000000	.997998
16.6- 16.8	.000000	.000000	.997998
16.8- 17.0	.000000	.000000	.997998
17.0- 17.2	1.000000	.001001	.998999
17.2- 17.4	.000000	.000000	.998999
17.4- 17.6	.000000	.000000	.998999
17.6- 17.8	.000000	.000000	.998999
17.8- 18.0	.000000	.000000	.998999
18.0- 18.2	.000000	.000000	.998999
18.2- 18.4	.000000	.000000	.998999
18.4- 18.6	.000000	.000000	.998999
18.6- 18.8	.000000	.000000	.998999
18.8- 19.0	.000000	.000000	.998999
19.0- 19.2	.000000	.000000	.998999
19.2- 19.4	.000000	.000000	.998999
19.4- 19.6	.000000	.000000	.998999
19.6- 19.8	.000000	.000000	.998999
19.8- 20.0	.000000	.000000	.998999
20.0- 20.2	.000000	.000000	.998999

M12-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	.000000	.000000	.000000
1.85- 2.05	3.00000	.003003	.003003
2.05- 2.25	.000000	.000000	.003003
2.25- 2.45	2.00000	.002002	.005005
2.45- 2.65	15.0000	.015015	.020020
2.65- 2.85	16.0000	.016016	.036036
2.85- 3.05	23.0000	.023023	.059059
3.05- 3.25	26.0000	.026026	.085085
3.25- 3.45	31.0000	.031031	.116116
3.45- 3.65	37.0000	.037037	.153153
3.65- 3.85	45.0000	.045045	.198198
3.85- 4.05	36.0000	.036036	.234234
4.05- 4.25	47.0000	.047047	.281281
4.25- 4.45	41.0000	.041041	.322322
4.45- 4.65	42.0000	.042042	.364364
4.65- 4.85	45.0000	.045045	.409409
4.85- 5.05	42.0000	.042042	.451451
5.05- 5.25	39.0000	.039039	.490490
5.25- 5.45	32.0000	.032032	.522523
5.45- 5.65	33.0000	.033033	.555556
5.65- 5.85	24.0000	.024024	.579580
5.85- 6.05	28.0000	.028028	.607608
6.05- 6.25	23.0000	.023023	.630631
6.25- 6.45	17.0000	.017017	.647648
6.45- 6.65	10.0000	.010010	.657658
6.65- 6.85	25.0000	.023023	.680681
6.85- 7.05	24.0000	.024024	.704705
7.05- 7.25	19.0000	.019019	.723724
7.25- 7.45	23.0000	.023023	.746747
7.45- 7.65	12.0000	.012012	.758759
7.65- 7.85	7.00000	.007007	.765766
7.85- 8.05	12.0000	.012012	.777778
8.05- 8.25	15.0000	.015015	.792793
8.25- 8.45	9.00000	.009009	.801802
8.45- 8.65	14.0000	.014014	.815816
8.65- 8.85	15.0000	.015015	.830831
8.85- 9.05	10.0000	.010010	.840841
9.05- 9.25	8.00000	.008008	.848849
9.25- 9.45	9.00000	.009009	.857858
9.45- 9.65	7.00000	.007007	.864865
9.65- 9.85	7.00000	.007007	.871872
9.85- 10.0	3.00000	.003003	.874875
10.0- 10.2	3.00000	.003003	.877878

M-12-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
10.2- 10.4	8.00000	.008000	.885886
10.4- 10.6	9.00000	.009000	.894895
10.6- 10.8	1.00000	.001001	.895896
10.8- 11.0	4.00000	.004004	.899900
11.0- 11.2	6.00000	.006006	.905906
11.2- 11.4	2.00000	.002002	.907908
11.4- 11.6	6.00000	.006006	.913914
11.6- 11.8	2.00000	.002002	.915916
11.8- 12.0	5.00000	.005005	.920921
12.0- 12.2	3.00000	.003003	.923924
12.2- 12.4	1.00000	.001001	.924925
12.4- 12.6	2.00000	.002002	.926927
12.6- 12.8	4.00000	.004004	.930931
12.8- 13.0	4.00000	.004004	.934935
13.0- 13.2	2.00000	.002002	.936937
13.2- 13.4	2.00000	.002002	.938939
13.4- 13.6	3.00000	.003003	.941942
13.6- 13.8	1.00000	.001001	.942943
13.8- 14.0	7.00000	.007007	.949950
14.0- 14.2	2.00000	.002002	.951952
14.2- 14.4	2.00000	.002002	.953954
14.4- 14.6	4.00000	.004004	.957958
14.6- 14.8	.000000	.000000	.957958
14.8- 15.0	2.00000	.002002	.959960
15.0- 15.2	4.00000	.004004	.963964
15.2- 15.4	3.00000	.003003	.966967
15.4- 15.6	2.00000	.002002	.968969
15.6- 15.8	2.00000	.002002	.970971
15.8- 16.0	4.00000	.004004	.974975
16.0- 16.2	1.00000	.001001	.975976
16.2- 16.4	3.00000	.003003	.978979
16.4- 16.6	2.00000	.002002	.980981
16.6- 16.8	.000000	.000000	.980981
16.8- 17.0	1.00000	.001001	.981982
17.0- 17.2	1.00000	.001001	.982983
17.2- 17.4	2.00000	.002002	.984985
17.4- 17.6	2.00000	.002002	.986987
17.6- 17.8	.000000	.000000	.986987
17.8- 18.0	1.00000	.001001	.987988
18.0- 18.2	.000000	.000000	.987988
18.2- 18.4	.000000	.000000	.987988
18.4- 18.6	1.00000	.001001	.988989
18.6- 18.8	1.00000	.001001	.989990
18.8- 19.0	.000000	.000000	.989990
19.0- 19.2	1.00000	.001001	.990991
19.2- 19.4	.000000	.000000	.990991
19.4- 19.6	1.00000	.001001	.991992
19.6- 19.8	1.00000	.001001	.992993
19.8- 20.0	.000000	.000000	.992993
20.0- 20.2	1.00000	.001001	.993994

A-14-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	.000000	.000000	.000000
1.85- 2.05	1.00000	.001001	.001001
2.05- 2.25	1.00000	.001001	.002002
2.25- 2.45	1.00000	.001001	.003003
2.45- 2.65	3.00000	.003003	.006006
2.65- 2.85	4.00000	.004004	.010010
2.85- 3.05	3.00000	.003003	.013013
3.05- 3.25	5.00000	.005005	.018018
3.25- 3.45	14.0000	.014014	.032032
3.45- 3.65	7.00000	.007007	.039039
3.65- 3.85	12.0000	.012012	.051051
3.85- 4.05	11.0000	.011011	.062062
4.05- 4.25	11.0000	.011011	.073073
4.25- 4.45	16.0000	.016016	.089089
4.45- 4.65	17.0000	.017017	.106106
4.65- 4.85	22.0000	.022022	.128128
4.85- 5.05	20.0000	.020020	.148148
5.05- 5.25	18.0000	.018018	.166166
5.25- 5.45	33.0000	.033033	.199199
5.45- 5.65	30.0000	.030030	.229229
5.65- 5.85	29.0000	.029029	.258258
5.85- 6.05	37.0000	.037037	.295295
6.05- 6.25	34.0000	.034034	.329329
6.25- 6.45	33.0000	.033033	.362362
6.45- 6.65	35.0000	.035035	.397397
6.65- 6.85	27.0000	.027027	.424424
6.85- 7.05	32.0000	.032032	.456456
7.05- 7.25	43.0000	.043043	.499499
7.25- 7.45	30.0000	.030030	.529530
7.45- 7.65	33.0000	.033033	.562563
7.65- 7.85	26.0000	.026026	.588589
7.85- 8.05	23.0000	.023023	.611612
8.05- 8.25	26.0000	.026026	.637638
8.25- 8.45	30.0000	.030030	.667668
8.45- 8.65	37.0000	.037037	.704705
8.65- 8.85	19.0000	.019019	.723724
8.85- 9.05	19.0000	.019019	.742743
9.05- 9.25	29.0000	.029029	.771772
9.25- 9.45	31.0000	.031031	.802803
9.45- 9.65	21.0000	.021021	.823824
9.65- 9.85	22.0000	.022022	.845846
9.85- 10.0	16.0000	.016016	.861862
10.0- 10.2	8.00000	.008008	.869870

A-14-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
10.2- 10.4	12.0000	.012012	.881882
10.4- 10.6	11.0000	.011011	.892893
10.6- 10.8	14.0000	.014014	.906907
10.8- 11.0	10.0000	.010010	.916917
11.0- 11.2	7.00000	.007007	.923924
11.2- 11.4	10.0000	.010010	.933934
11.4- 11.6	11.0000	.011011	.944945
11.6- 11.8	8.00000	.008008	.952953
11.8- 12.0	5.00000	.005005	.957958
12.0- 12.2	8.00000	.008008	.965966
12.2- 12.4	3.00000	.003003	.968969
12.4- 12.6	6.00000	.006006	.974975
12.6- 12.8	1.00000	.001001	.975976
12.8- 13.0	1.00000	.001001	.976977
13.0- 13.2	1.00000	.001001	.977978
13.2- 13.4	1.00000	.001001	.978979
13.4- 13.6	1.00000	.001001	.979980
13.6- 13.8	3.00000	.003003	.982983
13.8- 14.0	1.00000	.001001	.983984
14.0- 14.2	1.00000	.001001	.984985
14.2- 14.4	1.00000	.001001	.985986
14.4- 14.6	1.00000	.001001	.986987
14.6- 14.8	2.00000	.002002	.988989
14.8- 15.0	2.00000	.002002	.990991
15.0- 15.2	.000000	.000000	.990991
15.2- 15.4	1.00000	.001001	.991992
15.4- 15.6	.000000	.000000	.991992
15.6- 15.8	3.00000	.003003	.994995
15.8- 16.0	.000000	.000000	.994995
16.0- 16.2	.000000	.000000	.994995
16.2- 16.4	2.00000	.002002	.996997
16.4- 16.6	1.00000	.001001	.997998
16.6- 16.8	.000000	.000000	.997998
16.8- 17.0	.000000	.000000	.997998
17.0- 17.2	.000000	.000000	.997998
17.2- 17.4	1.00000	.001001	.998999
17.4- 17.6	.000000	.000000	.998999
17.6- 17.8	.000000	.000000	.998999
17.8- 18.0	.000000	.000000	.998999
18.0- 18.2	.000000	.000000	.998999
18.2- 18.4	.000000	.000000	.998999
18.4- 18.6	.000000	.000000	.998999
18.6- 18.8	.000000	.000000	.998999
18.8- 19.0	.000000	.000000	.998999
19.0- 19.2	.000000	.000000	.998999
19.2- 19.4	.000000	.000000	.998999
19.4- 19.6	.000000	.000000	.998999
19.6- 19.8	.000000	.000000	.998999
19.8- 20.0	.000000	.000000	.998999
20.0- 20.2	.000000	.000000	.998999

A-14-2

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	.000000	.000000	.000000
1.85- 2.05	.000000	.000000	.000000
2.05- 2.25	.000000	.000000	.000000
2.25- 2.45	.000000	.000000	.000000
2.45- 2.65	.000000	.000000	.000000
2.65- 2.85	2.000000	.002002	.002002
2.85- 3.05	2.000000	.002002	.004004
3.05- 3.25	5.000000	.005005	.009009
3.25- 3.45	1.000000	.001001	.010010
3.45- 3.65	4.000000	.004004	.014014
3.65- 3.85	5.000000	.005005	.019019
3.85- 4.05	3.000000	.003003	.022022
4.05- 4.25	10.0000	.010010	.032032
4.25- 4.45	7.000000	.007007	.039039
4.45- 4.65	6.000000	.006006	.045045
4.65- 4.85	15.0000	.015015	.060060
4.85- 5.05	10.0000	.010010	.070070
5.05- 5.25	10.0000	.010010	.080080
5.25- 5.45	25.0000	.025025	.105105
5.45- 5.65	31.0000	.031031	.136136
5.65- 5.85	17.0000	.017017	.153153
5.85- 6.05	22.0000	.022022	.175175
6.05- 6.25	28.0000	.028028	.203203
6.25- 6.45	39.0000	.039039	.242242
6.45- 6.65	23.0000	.023023	.265265
6.65- 6.85	36.0000	.036036	.301301
6.85- 7.05	32.0000	.032032	.333333
7.05- 7.25	36.0000	.036036	.369369
7.25- 7.45	32.0000	.032032	.401401
7.45- 7.65	31.0000	.031031	.432432
7.65- 7.85	21.0000	.021021	.453453
7.85- 8.05	32.0000	.032032	.485485
8.05- 8.25	31.0000	.031031	.516517
8.25- 8.45	23.0000	.023023	.539540
8.45- 8.65	32.0000	.032032	.571572
8.65- 8.85	24.0000	.024024	.595596
8.85- 9.05	32.0000	.032032	.627628
9.05- 9.25	26.0000	.026026	.653654
9.25- 9.45	39.0000	.039039	.692693
9.45- 9.65	17.0000	.017017	.709710
9.65- 9.85	24.0000	.024024	.733734
9.85- 10.0	19.0000	.019019	.752753
10.0- 10.2	25.0000	.025025	.777778
10.2- 10.4	19.0000	.019019	.796797

A-14-2

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
10.4- 10.6	14.0000	.014014	.810811
10.6- 10.8	25.0000	.025025	.835836
10.8- 11.0	17.0000	.017017	.852853
11.0- 11.2	17.0000	.017017	.869870
11.2- 11.4	12.0000	.012012	.881882
11.4- 11.6	9.00000	.009009	.890891
11.6- 11.8	10.0000	.010010	.900901
11.8- 12.0	9.00000	.009009	.909910
12.0- 12.2	10.0000	.010010	.919920
12.2- 12.4	10.0000	.010010	.929930
12.4- 12.6	9.00000	.009009	.938939
12.6- 12.8	6.00000	.006006	.944945
12.8- 13.0	3.00000	.003003	.947948
13.0- 13.2	5.00000	.005005	.952953
13.2- 13.4	6.00000	.006006	.958959
13.4- 13.6	4.00000	.004004	.962963
13.6- 13.8	6.00000	.006006	.968969
13.8- 14.0	2.00000	.002002	.970971
14.0- 14.2	1.00000	.001001	.971972
14.2- 14.4	1.00000	.001001	.972973
14.4- 14.6	5.00000	.005005	.977978
14.6- 14.8	2.00000	.002002	.979980
14.8- 15.0	2.00000	.002002	.981982
15.0- 15.2	4.00000	.004004	.985986
15.2- 15.4	1.00000	.001001	.986987
15.4- 15.6	3.00000	.003003	.989990
15.6- 15.8	1.00000	.001001	.990991
15.8- 16.0	2.00000	.002002	.992993
16.0- 16.2	2.00000	.002002	.994995
16.2- 16.4	.000000	.000000	.994995
16.4- 16.6	1.00000	.001001	.995996
16.6- 16.8	.000000	.000000	.995996
16.8- 17.0	.000000	.000000	.995996
17.0- 17.2	.000000	.000000	.995996
17.2- 17.4	1.00000	.001001	.996997
17.4- 17.6	1.00000	.001001	.997998
17.6- 17.8	.000000	.000000	.997998
17.8- 18.0	.000000	.000000	.997998
18.0- 18.2	.000000	.000000	.997998
18.2- 18.4	.000000	.000000	.997998
18.4- 18.6	1.00000	.001001	.998999
18.6- 18.8	.000000	.000000	.998999
18.8- 19.0	.000000	.000000	.998999
19.0- 19.2	.000000	.000000	.998999
19.2- 19.4	.000000	.000000	.998999
19.4- 19.6	1.00000	.001001	1.000000

A-14-3

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	.000000	.000000	.000000
1.85- 2.05	.000000	.000000	.000000
2.05- 2.25	.000000	.000000	.000000
2.25- 2.45	.000000	.000000	.000000
2.45- 2.65	.000000	.000000	.000000
2.65- 2.85	.000000	.000000	.000000
2.85- 3.05	1.000000	.001001	.001001
3.05- 3.25	2.000000	.002002	.003003
3.25- 3.45	1.000000	.001001	.004004
3.45- 3.65	4.000000	.004004	.008008
3.65- 3.85	4.000000	.004004	.012012
3.85- 4.05	1.000000	.001001	.013013
4.05- 4.25	4.000000	.004004	.017017
4.25- 4.45	7.000000	.007007	.024024
4.45- 4.65	5.000000	.005005	.029029
4.65- 4.85	5.000000	.005005	.034034
4.85- 5.05	12.0000	.012012	.046046
5.05- 5.25	11.0000	.011011	.057057
5.25- 5.45	14.0000	.014014	.071071
5.45- 5.65	17.0000	.017017	.088088
5.65- 5.85	24.0000	.024024	.112112
5.85- 6.05	12.0000	.012012	.124124
6.05- 6.25	10.0000	.010010	.134134
6.25- 6.45	13.0000	.013013	.147147
6.45- 6.65	27.0000	.027027	.174174
6.65- 6.85	21.0000	.021021	.195195
6.85- 7.05	31.0000	.031031	.226226
7.05- 7.25	27.0000	.027027	.253253
7.25- 7.45	34.0000	.034034	.287287
7.45- 7.65	37.0000	.037037	.324324
7.65- 7.85	26.0000	.026026	.350350
7.85- 8.05	25.0000	.025025	.375375
8.05- 8.25	26.0000	.026026	.401401
8.25- 8.45	23.0000	.023023	.424424
8.45- 8.65	27.0000	.027027	.451451
8.65- 8.85	22.0000	.022022	.473473
8.85- 9.05	34.0000	.034034	.507508
9.05- 9.25	39.0000	.039039	.546547
9.25- 9.45	32.0000	.032032	.578579
9.45- 9.65	26.0000	.026026	.604605
9.65- 9.85	23.0000	.023023	.627628

A-14-3

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
9.85- 10.0	18.0000	.018018	.645646
10.0- 10.2	21.0000	.021021	.666667
10.2- 10.4	18.0000	.018018	.684685
10.4- 10.6	29.0000	.029029	.713714
10.6- 10.8	22.0000	.022022	.735736
10.8- 11.0	18.0000	.018018	.753754
11.0- 11.2	14.0000	.014014	.767768
11.2- 11.4	19.0000	.019019	.786787
11.4- 11.6	19.0000	.019019	.805806
11.6- 11.8	17.0000	.017017	.822823
11.8- 12.0	11.0000	.011011	.833834
12.0- 12.2	16.0000	.016016	.849850
12.2- 12.4	20.0000	.020020	.869870
12.4- 12.6	10.0000	.010010	.879880
12.6- 12.8	14.0000	.014014	.893894
12.8- 13.0	14.0000	.014014	.907908
13.0- 13.2	12.0000	.012012	.919920
13.2- 13.4	8.00000	.008008	.927928
13.4- 13.6	7.00000	.007007	.934935
13.6- 13.8	6.00000	.006006	.940941
13.8- 14.0	7.00000	.007007	.947948
14.0- 14.2	5.00000	.005005	.952953
14.2- 14.4	8.00000	.008008	.960961
14.4- 14.6	7.00000	.007007	.967968
14.6- 14.8	4.00000	.004004	.971972
14.8- 15.0	3.00000	.003003	.974975
15.0- 15.2	3.00000	.003003	.977978
15.2- 15.4	4.00000	.004004	.981982
15.4- 15.6	.000000	.000000	.981982
15.6- 15.8	2.00000	.002002	.983984
15.8- 16.0	1.00000	.001001	.984985
16.0- 16.2	2.00000	.002002	.986987
16.2- 16.4	3.00000	.003003	.989990
16.4- 16.6	2.00000	.002002	.991992
16.6- 16.8	2.00000	.002002	.993994
16.8- 17.0	1.00000	.001001	.994995
17.0- 17.2	.000000	.000000	.994995
17.2- 17.4	.000000	.000000	.994995
17.4- 17.6	1.00000	.001001	.995996
17.6- 17.8	.000000	.000000	.995996
17.8- 18.0	.000000	.000000	.995996
18.0- 18.2	2.00000	.002002	.997998
18.2- 18.4	.000000	.000000	.997998
18.4- 18.6	.000000	.000000	.997998
18.6- 18.8	.000000	.000000	.997998
18.8- 19.0	.000000	.000000	.997998
19.0- 19.2	.000000	.000000	.997998
19.2- 19.4	.000000	.000000	.997998
19.4- 19.6	1.00000	.001001	.998999
19.6- 19.8	.000000	.000000	.998999
19.8- 20.0	.000000	.000000	.998999
20.0- 20.2	.000000	.000000	.998999

M-14-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
.050- .250	.000000	.000000	.000000
.250- .450	.000000	.000000	.000000
.450- .650	.000000	.000000	.000000
.650- .850	.000000	.000000	.000000
.850- 1.05	.000000	.000000	.000000
1.05- 1.25	.000000	.000000	.000000
1.25- 1.45	.000000	.000000	.000000
1.45- 1.65	.000000	.000000	.000000
1.65- 1.85	.000000	.000000	.000000
1.85- 2.05	.000000	.000000	.000000
2.05- 2.25	.000000	.000000	.000000
2.25- 2.45	.000000	.000000	.000000
2.45- 2.65	1.000000	.001001	.001001
2.65- 2.85	.000000	.000000	.001001
2.85- 3.05	.000000	.000000	.001001
3.05- 3.25	.000000	.000000	.001001
3.25- 3.45	.000000	.000000	.001001
3.45- 3.65	.000000	.000000	.001001
3.65- 3.85	.000000	.000000	.001001
3.85- 4.05	.000000	.000000	.001001
4.05- 4.25	.000000	.000000	.001001
4.25- 4.45	1.000000	.001001	.002002
4.45- 4.65	1.000000	.001001	.003003
4.65- 4.85	1.000000	.001001	.004004
4.85- 5.05	2.000000	.002002	.006006
5.05- 5.25	4.000000	.004004	.010010
5.25- 5.45	5.000000	.005005	.015015
5.45- 5.65	4.000000	.004004	.019019
5.65- 5.85	3.000000	.003003	.022022
5.85- 6.05	11.000000	.011011	.033033
6.05- 6.25	5.000000	.005005	.038038
6.25- 6.45	11.000000	.011011	.049049
6.45- 6.65	9.000000	.009009	.058058
6.65- 6.85	8.000000	.008008	.066066
6.85- 7.05	6.000000	.006006	.072072
7.05- 7.25	9.000000	.009009	.081081
7.25- 7.45	14.000000	.014014	.095095
7.45- 7.65	10.000000	.010010	.105105
7.65- 7.85	13.000000	.013013	.118118
7.85- 8.05	13.000000	.013013	.131131
8.05- 8.25	12.000000	.012012	.143143
8.25- 8.45	19.000000	.019019	.162162
8.45- 8.65	22.000000	.022022	.184184
8.65- 8.85	16.000000	.016016	.200200
8.85- 9.05	9.000000	.009009	.209209
9.05- 9.25	18.000000	.018018	.227227
9.25- 9.45	23.000000	.023023	.250250
9.45- 9.65	12.000000	.012012	.262262
9.65- 9.85	12.000000	.012012	.274274
9.85- 10.0	20.000000	.020020	.294294
10.0- 10.2	17.000000	.017017	.311311

M-14-1

Extreme Spread Intervals	Observations	Observed Frequency	Cumulative Observed Frequency
10.2- 10.4	11.0000	.011011	.322322
10.4- 10.6	20.0000	.020020	.342342
10.6- 10.8	16.0000	.016016	.360360
10.8- 11.0	12.0000	.012012	.372372
11.0- 11.2	21.0000	.021021	.393393
11.2- 11.4	10.0000	.010010	.403403
11.4- 11.6	19.0000	.019019	.422422
11.6- 11.8	23.0000	.023023	.445445
11.8- 12.0	23.0000	.023023	.468468
12.0- 12.2	22.0000	.022022	.490490
12.2- 12.4	15.0000	.015015	.505506
12.4- 12.6	17.0000	.017017	.522523
12.6- 12.8	13.0000	.013013	.535536
12.8- 13.0	18.0000	.018018	.553554
13.0- 13.2	25.0000	.025025	.578579
13.2- 13.4	18.0000	.018018	.596597
13.4- 13.6	21.0000	.021021	.617618
13.6- 13.8	17.0000	.017017	.634635
13.8- 14.0	12.0000	.012012	.646647
14.0- 14.2	18.0000	.018018	.664665
14.2- 14.4	20.0000	.020020	.684685
14.4- 14.6	17.0000	.017017	.701702
14.6- 14.8	10.0000	.010010	.711712
14.8- 15.0	9.00000	.009009	.720721
15.0- 15.2	14.0000	.014014	.734735
15.2- 15.4	14.0000	.014014	.748749
15.4- 15.6	17.0000	.017017	.765766
15.6- 15.8	10.0000	.010010	.775776
15.8- 16.0	17.0000	.017017	.792793
16.0- 16.2	14.0000	.014014	.806807
16.2- 16.4	18.0000	.018018	.824825
16.4- 16.6	15.0000	.015015	.839840
16.6- 16.8	13.0000	.013013	.852853
16.8- 17.0	5.00000	.005005	.857858
17.0- 17.2	8.00000	.008008	.865866
17.2- 17.4	15.0000	.015015	.880881
17.4- 17.6	9.00000	.009009	.889890
17.6- 17.8	6.00000	.006006	.895896
17.8- 18.0	9.00000	.009009	.904905
18.0- 18.2	5.00000	.005005	.909910
18.2- 18.4	6.00000	.006006	.915916
18.4- 18.6	6.00000	.006006	.921922
18.6- 18.8	10.0000	.010010	.931932
18.8- 19.0	5.00000	.005005	.936937
19.0- 19.2	10.00000	.010000	.936937
19.2- 19.4	2.00000	.002002	.938939
19.4- 19.6	7.00000	.007007	.945946
19.6- 19.8	1.00000	.001001	.946947
19.8- 20.0	7.00000	.007007	.953954
20.0- 20.2	2.00000	.002002	.955956