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HEADQUARTERS 1ST TANK DESTROYER BRIGADE  
Office of the Brigade Commander

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SUBJECT: Characteristics of Tank Destroyer Ammunition.

TO : See Distribution.

Characteristics of 3-inch, 76mm, and 90mm tank destroyer ammunition is published for the information and guidance of all concerned.

For the Commanding Officer:

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CHARACTERISTICS OF 3-INCH TANK DESTROYER AMMUNITION

PROJECTILE					FUZE		PROPELLING CHARGE	MAXIMUM RANGE	VELOCITY	PENETRATION		Note Reference
Kind	Type	Model	Filler	Weight Complete Round	Type and Model	Action	Kind	Yards	Feet per Second	Face hardened Plate at 0-deg obliquity at 1000 yards. Inches	Homogeneous Plate at 0-deg obliquity at 1000 yards. Inches	
Shell	HE	M42A1	TNT	24.91 lb	PD M48A2	SQ & Del	FPH	14,780	2,600	-	-	-
Shell	HE	M42A1	TNT	21.13 lb	PD M48A2	SQ & Del	FPH	8,805	1,550	-	-	1
Shell	HE	M42A1	TNT	24.91 lb	PD M48A2	SQ & Del	FPH	14,780	2,600	-	-	-
Shell	HE Inat- ing	M42A1 Model 1	HC & TNT	24.15 lb	M54	T SQ		9,700	2,600			2
Shell	Smoke		Information not available.									
Shot	AP	M79	None	26.56 lb	None	-	FPH M1	12,770	2,400	3.1	4.5	3
Shot	HVAP	M4		21.21 lb					2,000	-	6.2	3
Projectile	APC	M62	Exp D	27.24 lb	BD M66A1	Delay	FPH M1	16,000	2,000	4.7	4.7	4
Projectile	APC	M62	None	26.71 lb	None	Delay	FPH M1	16,000	2,000	4.7	4.5	3

NOTES:

- 1 - This round assembled with a reduced charge of propellant.
- 2 - Burning time of flare approximately 25 seconds. Candle power of flare approximately 120,000.
- 3 - Tracer in base of projectile.
- 4 - Fuze contains tracer.

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CHARACTERISTICS OF 76MM TANK DESTROYER AMMUNITION

PROJECTILE					FUZE		PROPELLING CHARGE	MAXIMUM RANGE	MUZZLE VELOCITY	PENETRATION		Note Reference
Kind	Type	Model	Filler	Weight Complete Round	Type and Model	Action	Kind	Yards	Feet per Second	Face hardened Plate at 0-deg obliquity at 1000 yards. Inches	Homogeneous Plate at 0-deg obliquity at 1000 yards. Inches	
Shell	HE	M42A1	TNT	22.23 lb	PD M42A2	SQ & Del	FTH M1	14,200	2,700	-	-	1
Shell	HE Smoke	M42A1	TNT	19.62 lb	PD M42A2	SQ & Del	FTH M1	8,805	1,550	-	-	1-2
Shell	BI	M58	FC	13.43 lb	None	-	FTH M2	2,000	900	-	-	1
Shot	HWAP			18.9 lb					3,400		6.2	3
Projectile	APC	M62	Exp D	24.80 lb	TP M66A1	Delay	FTH M1	16,100	2,600	4.7	4.5	1-4-5
Projectile	APC	M62A1	Exp D	24.80 lb	BD M66A1	Delay	FTH M1	16,100	2,600	4.7	4.5	1-4-5-6

NOTES:

- 1 - Rounds of recent manufacture contain NH Propellant Powder.
- 2 - This round assembled with a reduced charge of propellant.
- 3 - Tracer in base of projectile.
- 4 - Fuze contains tracer.
- 5 - Rounds of recent manufacture contain both NH Propellant Powder and primer.
- 6 - Long primer.

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CHARACTERISTICS OF 90MM MAIN DESTROYER AMMUNITION

PROJECTILE					FUZE		PROPELLING CHARGE	MAXIMUM RANGE	MUZZLE VELOCITY	PENETRATION		Note Reference
Kind	Type	Model	Filler	Weight Complete Round	Type and Model	Action	Kind	Yards	Feet per Second	Face hardened Plate at 0-deg obliquity at 1000 yards. Inches	Homogeneous Plate at 0-deg obliquity at 1000 yards. Inches	
Shell	HE	1.71	TNT	42.04 lb	MT 43	Time to 30 sec.	FH M1	19,560	2,700	-	-	1
Shell	HE	1.71	TNT	42.04 lb	PD M48A2	SQ & Del	FH M1	19,560	2,700	-	-	-
Shell	ED	1.71	TNT	42.00 lb		Unfuzed. May be used with either M48 or Pozit fuze.	FH M1	19,560	2,700	-	-	2
Shell	HE	1.71	Red Smoke & TNT	42.04 lb	PD M48A2	SQ & Del	FH M1	19,560	2,700	-	-	-
Shell	ED	1.71	FC & TNT	42.04 lb	PD M48A2	SQ & Del	FH M1	19,560	2,700	-	-	-
Shot	AP	M77	None	42.04 lb	None		FH M1	12,790	2,700	4.5	5.5	3
Shot	HVAP-T	E16		36.00 lb (Approx)					3,350		8.2	3
Projectile	APC	ME2	Exp D	42.75 lb	BD M68	Delay	FH M1	13,540	2,650	6.0	5.5	4
Projectile	APC	ME2	Exp D	43.87 lb	BD M68	Delay	FH M1		2,850			4

NOTES:

- 1 - Effective maximum range limited by fuze time to around 13,000 yards.
- 2 - Usable minimum range with Pozit Fuze 6,000 yards.
- 3 - Projectile contains tracer.
- 4 - Fuze contains tracer.

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