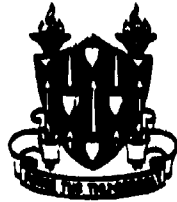


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VEHICLE CHARACTERISTICS

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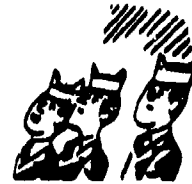
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SPEAKING OF
CHARACTERISTICS...



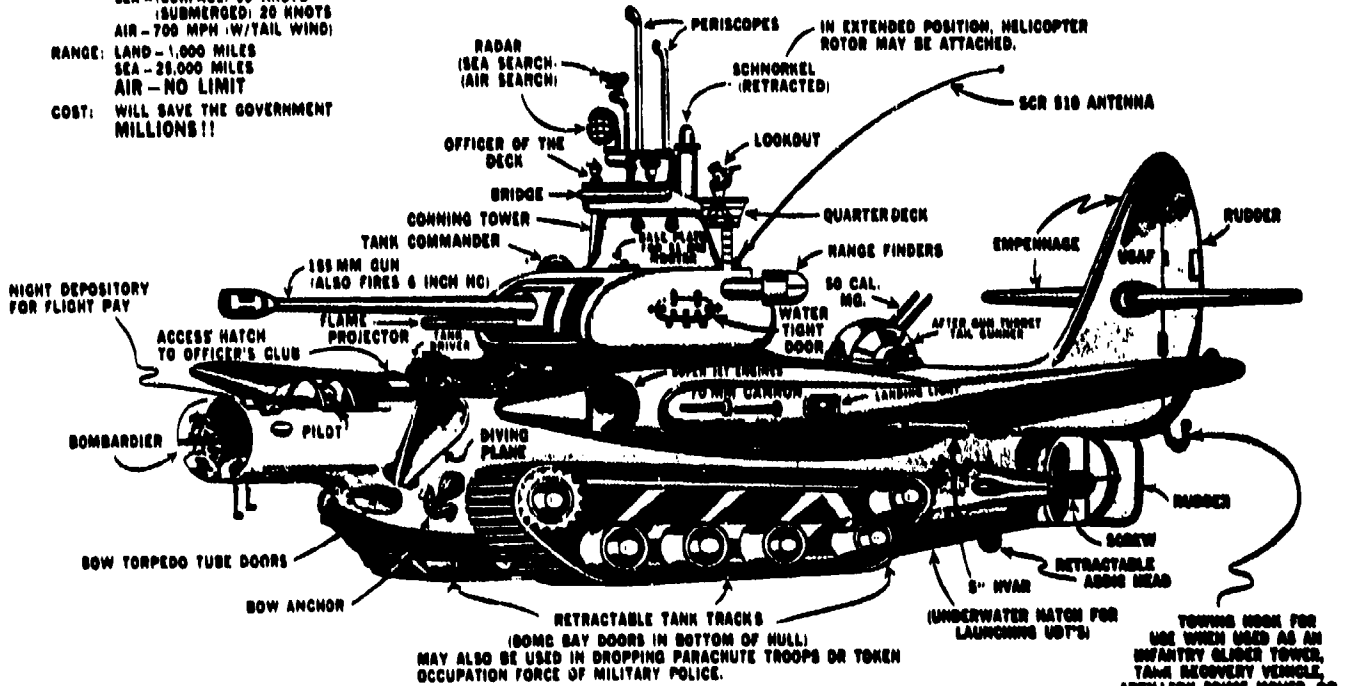
Dream Weapon



SPEED: LAND - 50 MPH
SEA - (SURFACE) 30 KNOTS
(SUBMERGED) 20 KNOTS
AIR - 700 MPH (W/TAIL WIND)

RANGE: LAND - 1,000 MILES
SEA - 25,000 MILES
AIR - NO LIMIT

COST: WILL SAVE THE GOVERNMENT MILLIONS!!



NOTE: DOZER BLADE AND HEAD DIGGER MAY BE ATTACHED, THUS RENDERING ENGINEERS UNNECESSARY.

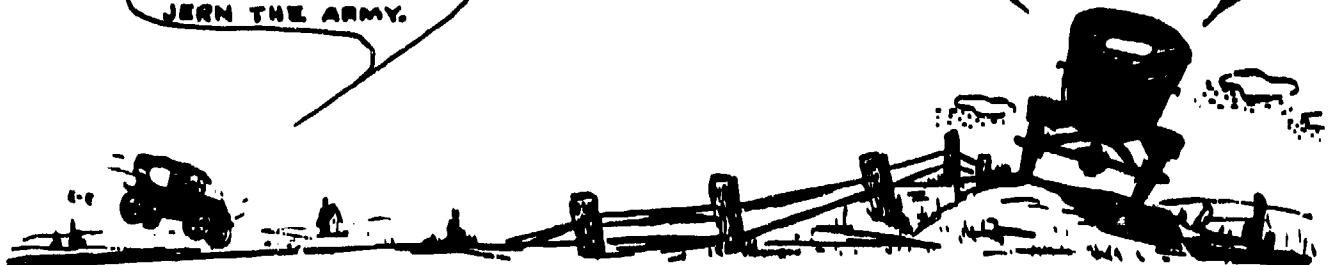
NOTE: HOOD MAY BE ROTATED FOR USE AS GARNER ARRESTING HOOD; USE NOT ANTICIPATED AT THIS TIME.

NOTE: DEVELOPMENT OF THIS WEAPON IS NOT TO BE CONTINUED AS INTENTION TO ABOLISH THE COAST GUARD.

HURRY, PAW! IF'N WE DONT KETCH'EM HE'LL JERN THE ARMY.

DERN THOUGHTY OF OUR BOY, GETTIN IN THAT DREAM WEAPON OUTFIT.

I'M SO PROUD OF OUR SUN, PAW, SINCE HE'S A DREAM WEAPON COMMANDER.



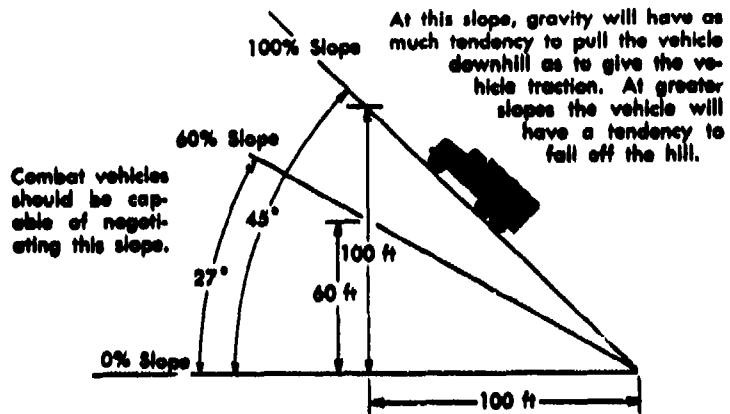


Figure 1. Gradability scale.

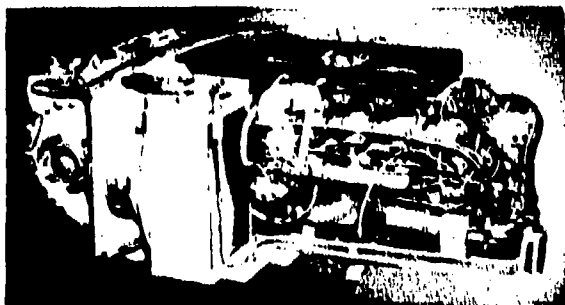


Figure 2. Typical power package utilizing the new family-type engine.

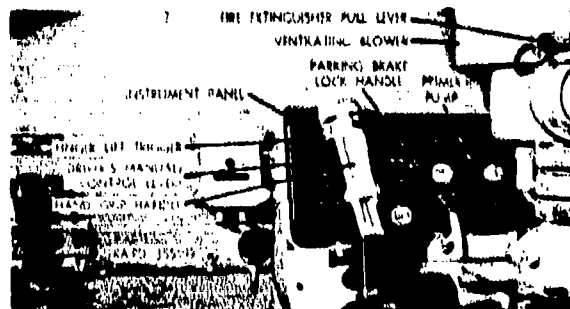


Figure 4. Wobble-stick control for full-track vehicles using cross-drive transmission.

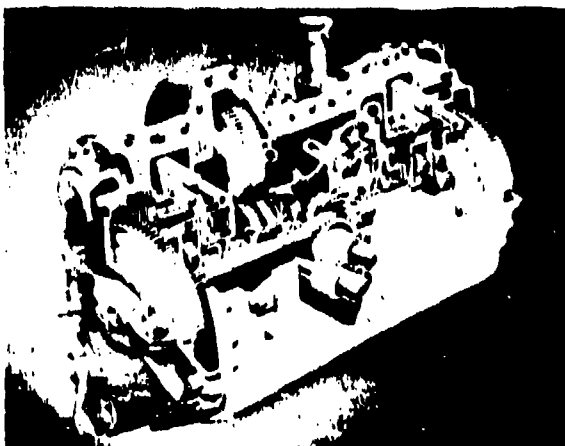


Figure 3. Cross-drive transmission.

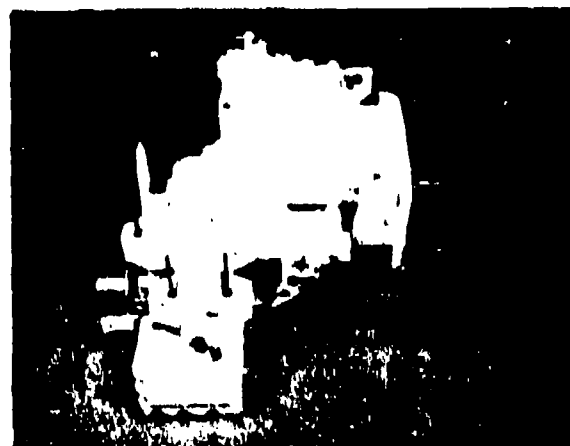


Figure 5. Planetary converter.

VEHICLE CHARACTERISTICS

This text supersedes unnumbered pamphlet, The Armored School, entitled, *Vehicle Characteristics and Installations*

INTRODUCTION

1. **SCOPE.** This text is a compilation of characteristics and data of combat vehicles organic to units of the various ground combat arms. It is intended to familiarize students attending The Armored School with the combat vehicles included in their course or instruction and which are or may soon be organic to their parent organizations. The pictorial review, including silhouettes, will enable you to more easily recognize the vehicles when you see them. As a student you must realize that this text is furnished to you as a unit of instruction, or it may be preliminary to a unit of instruction. In either case it is your duty to study each and every vehicle included. *Do not attempt to remember all data, but do study each vehicle nomenclature, picture, and silhouette relating them so as to be able to intelligently discuss them in class.* The data presented may be used as a basis for tactical problems included in various courses at The Armored School.

2. TERMS AND SYMBOLS.

a. Model Numbers.

(1) "M" numbers. Vehicles assigned model numbers with the prefix "M" are or have been standard and are filling a requirement as organic equipment.

(2) "T" numbers. Vehicles assigned model numbers with the prefix "T" are new vehicles in development stages. These vehicles are usually intended to replace some existing standard vehicle. In such a case the classification portion of the vehicle data sheet will explain the development status and which vehicle it will replace.

b. *Unknown or doubtful information.* In some cases a description or specification item will be marked "unknown." At the time this text was compiled, this information was either not available or was classified too high to be included. Specifications marked "estimated" are not verified but were either computed from existing information or estimated from comparison with like vehicles.

c. *Maximum computed gradability.* This is the steepest slope, measured in per cent, which

a vehicle can negotiate. Per cent of slope is defined as the ratio between the vertical rise and the horizontal distance traveled. In other words, a 100 per cent grade is the grade angle at which the force of gravity has as much tendency to drag the vehicle back down the grade as it does to hold the vehicle against the ground and provide traction (fig 1).

d. *Turning radius.* Radius of minimum circle within which vehicle can negotiate a complete turn.

e. *Cruising range.* Average distance vehicle will travel on one full tank of fuel at rated consumption. *Warning:* Do not depend on these figures as being accurate on every vehicle under all conditions. Fuel mileages are inconsistent due to terrain, vehicle, driver, and weather difference. Give yourself a liberal margin on these figures.

f. *Classification.* Normally vehicles are classified from the standpoint of suitability for use. The ratings are: standard, substitute standard, limited standard, and obsolete. Due to the rapid change-over of vehicle models, no attempt is made to classify the vehicle in this text other than to give the general classification, which includes such information as whether or not the vehicle is being used, if it is to be replaced soon, and if it is to be replaced what vehicle will replace it. This will give the student a general idea of current distribution of vehicles and what to expect in the future.

3. VEHICLE DEVELOPMENT TRENDS.

In order to offset the rapid changes in tables of equipment and to prolong the useful life of this text, vehicles which are now under development and likely to be made standard in the very near future are included in this text. Their status will be clarified under *Classification* on each characteristics sheet.

NOTE: The statements made under "Classification" are based on tables of equipment, field requirements, and trends. They are not based on official plans. Classification and specifications of experimental vehicles are subject to change frequently.

These "T"-model vehicles will be studied and discussed in class for comparison purposes only. Do not count on using all of these vehicles because very often "T"-model vehicles never make the "M" grade. Before we look into the "T" vehicles let us consider the present development trends in combat vehicles.

a. *Power plant.* An out-and-out program is being launched to standardize all engines in future Army vehicles. These engines are called the Army family of engines, consisting of three major cylinder barrel sizes using various numbers of cylinders and arrangements. These engines are of the air-cooled type utilizing individual cylinders (barrels) with the valves overhead. This means only three sizes of valves, cylinders, pistons, pins, rings, etc., must be stocked for replacement parts to supply all sizes of vehicles. The space limitations of engine compartments in vehicles and the need for more powerful engines is provided by this new family of engines; they will be supplied in horizontally and vertically opposed and "V" types in various sizes capable of filling most any requirement. These engines are equipped with quick release fuel, oil, and electrical connections allowing quick removal of entire power packages (fig 2). Another interesting feature is that hot oil is provided by the engine for heating crew compartments with core-type heaters.

b. *Power train.* All power trains will utilize some type of torque converter which will eliminate the need for a clutch and reduce the number of gear changes in the transmission. Transmissions will utilize planetary gears with servo shifting or engaging mechanisms controlled either automatically or manually through remote controls.

(1) Full-track vehicles will utilize a family of combination transmission, differential, and steering mechanisms called "cross-drive" transmissions; they will be supplied in four sizes to

meet various requirements (fig 3). These cross-drive transmissions are controlled by a remote control called the "wobble stick." This wobble stick provides two speeds forward, a neutral, a neutral steer, and a reverse by moving the lever forward or back. To steer the vehicle to the right the lever must be moved to the right. To steer the vehicle to the left, move the lever to the left. The vehicle will pivot to infinity by placing the lever in neutral steer position and then moving it in the direction you desire to turn (fig 4).

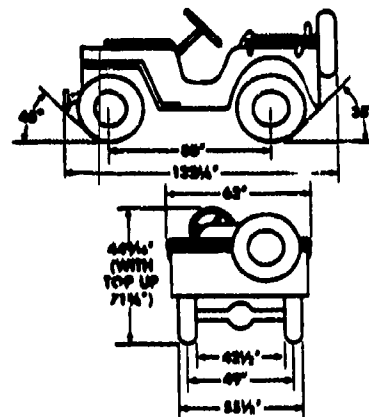
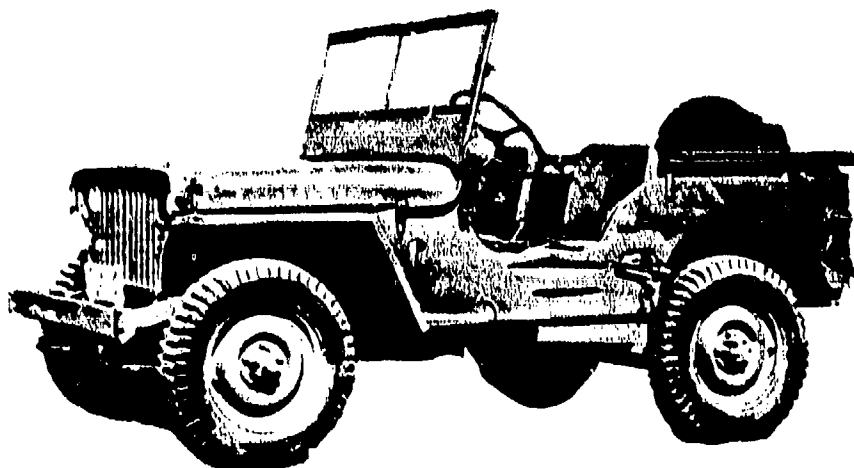
(2) Wheeled vehicles will utilize a series of five transmissions and transfer case combinations called "planetary converters." The five sizes make sufficient combinations to provide for all wheeled vehicles (fig 5).

c. *Accessories.* Generators, starters, batteries, and instruments will all be standard 24-volt and will be waterproofed. Magnetoes will be standardized and waterproofed. A similar standardization and interchangeability program is also in effect on other units to reduce replacement part stocks and simplify repairs.

d. *Ease of maintenance.* In general, the new vehicles will be easier to maintain. It is true that some of the parts are not as yet readily accessible, but accessibility (in general) is greatly improved over old-type vehicles. An example is the T44 cargo tractor, in which the power package rolls out on rails for accessibility. The engine may be started and tested while pulled out of the compartment. The mechanic may stand on the floor and reach most any part of the power package.

4. CLASSIFIED MATTER. You are reminded of Army Regulation 385-5, *Safeguarding Military Information*. Information contained in this text will not be made available to the general public. It will be entrusted only to those individuals whose official duties require such knowledge or possession.

TRUCK, 1/4-TON, 4x4, COMMAND RECONNAISSANCE



GENERAL DATA

Purpose: To carry personnel, primarily for reconnaissance; to transport light cargo; to tow trailer or light field piece.

Classification: At printing date, this vehicle is standard in all organizations requiring such a vehicle. However, improvements are in order and have been applied to the projected model, the Truck, Utility, M38, which will eventually replace the 1/4-ton truck.

Manufacturer: Willys or Ford. Willys Overland Company held the primary contract, Ford Motor Company manufactured the vehicle under a subcontract to Willys. Both vehicles are the same except for model numbers. The Willys Model number is MB. The Ford model number is GPW.

Technical manuals: 9-808, 9-1808A, 9-1808B.

Lubrication order: DA LO 9-808.

Parts list: ORD 7 SNL G508, ORD 8 SNL G508, ORD 9 SNL G508.

Price of vehicle*	.....\$1051
Crew (number of personnel)	.....2
Weight, combat loaded	.....5885-5974 lb
Length, over-all	.....11 ft
Width, over-all	.....5.14 ft
Height, over-all	.....5.81 ft
Shipping dimensions	.....331 cu ft; 87 sq ft
Wheelbase	.....80 in
Tread (center to center of wheels):	
Front	.....49 in
Rear	.....49 in
Approach angle	.....45 deg
Departure angle	.....35 deg
Ground clearance	.....8.75 in
Electrical system	.....8-volt

PERFORMANCE

Gross horsepower to weight ratio	.....33.9 hp per ton
Cruising range	.....300 mi
Fuel consumption	.....20 mpg
Maximum allowable speed	.....65 mph
Maximum gradability	.....60 per cent

* Price based on vehicle with equipment.

Turning radius (right or left)	.....17.5 ft
Fording depth	.....21 in
Pay load	.....800 lb
Towed load	.....1000 lb

ENGINE

Make (manufacturer)	.....Willys or Ford
Model number	.....Willys 442
Brake horsepower	.....54
Torque	.....105 ft lb @ 3000 rpm
Rated speed (not governed)	.....4000 rpm
Construction and design	.....In-line, L-head
Number of cylinders	.....4
Displacement, total	.....164.2 cu in
Compression ratio	.....6.48:1
Cooling system	.....Liquid
Ignition	.....Battery, distributor

CHASSIS AND POWER TRAIN

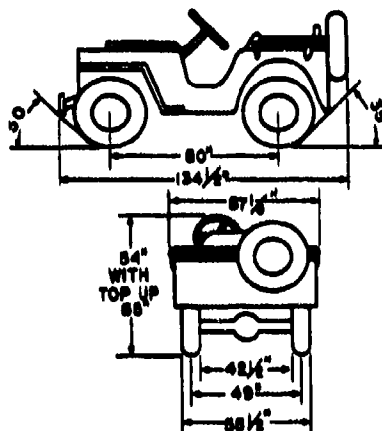
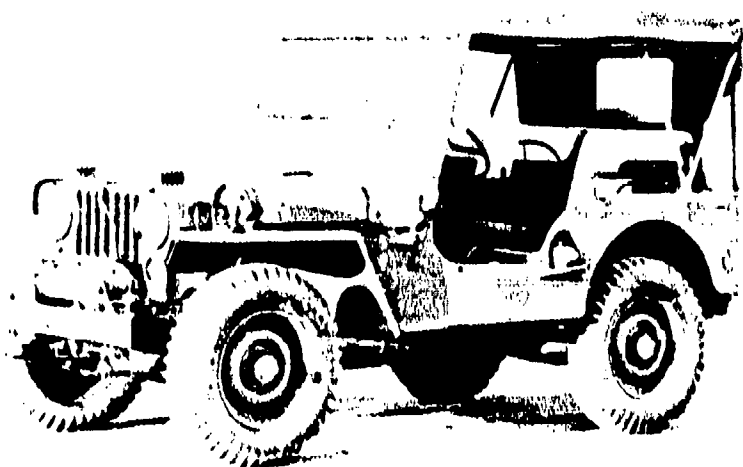
Clutch	.....Single disc
Transmission	.....Synchronesh
Control	.....Direct, hand lever
Speeds forward	.....3
Speeds reverse	.....1
Transfer case	.....Selective sliding gear
Control	.....Direct, hand lever
Speeds	.....2
Differential	.....Conventional (hypoid)
Steering control	.....Steering wheel
Brakes:	
Operating principle	.....Hydraulic
Control	.....Foot
Drive	.....All wheel (Hotchkiss)
Number of wheels	.....4 (single)
Suspension	.....Four semielliptic springs

CAPACITIES

Fuel:	
Total	.....15 gal
Cooling system	.....11 qt
Crankcase, with filter	.....8 qt
Engine air cleaner (each)	.....1 qt
Transmission	.....7.5 qt
Differential	.....1.25 qt
Transfer case	.....1.8 qt

ADDITIONAL DATA

TRUCK, 1/4-TON, 4x4, UTILITY, M38



GENERAL DATA

NOTE: These specifications are tentative and subject to change.

Purpose: To carry personnel, primarily for reconnaissance; to transport light cargo; to tow trailer or light field piece.

Classification: This is the future standard 1/4-ton truck. It is now under accelerated tests. In event of an emergency this vehicle would probably be put into production. It would replace the 1/4-ton shown on page 3.

Manufacturer: Willys.

Technical manuals: 9-804, 9-1804A, 9-1804B.

Lubrication order: DA LO 9-804.

Parts list: ORD 7 SNL G740, ORD 8 SNL G740, ORD 9 SNL G740.

Price of vehicle	.....	\$2659
Crew (number of personnel)	.....	2
Weight, combat loaded	.....	3480 lb
Length, over-all	.....	11.19 ft
Width, over-all	.....	4.76 ft
Height, over-all	.....	5.41 ft
Shipping dimensions (estimated)	.....	301 cu ft; 57 sq ft
Wheelbase	.....	80 in
Tread (center to center of wheels):		
Front	.....	49 in
Rear	.....	49 in
Approach angle	.....	50 deg
Departure angle	.....	35 deg
Ground clearance	.....	5.6 in
Electrical system	.....	24-volt

PERFORMANCE

Gross horsepower to weight ratio	.....	34.8 hp per ton
Cruising range (estimated)	.....	180 mi
Fuel consumption (estimated)	.....	20 mpg
Maximum all-weather speed	.....	60 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	20 ft
Fording depth (estimated)	.....	21 in
Pay load	.....	800 lb

*Price without winch and with equipment.

Towed load (estimated)	.....	1000 lb
Winch load (estimated)	.....	500 lb

ENGINE

Make (manufacturer)	.....	Willys
Model number	.....	Willys MC
Brake horsepower	.....	60
Torque	.....	105 ft lb @ 2000 rpm
Rated speed	.....	4000 rpm
Construction and design	.....	In-line, L-head
Number of cylinders	.....	4
Displacement, total	.....	134.2 cu in
Compression ratio	.....	6.5:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

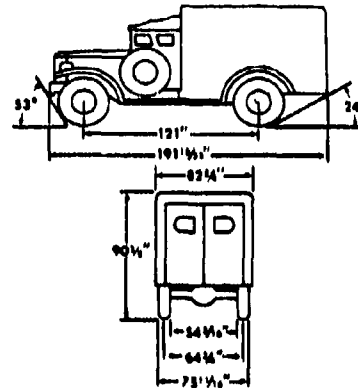
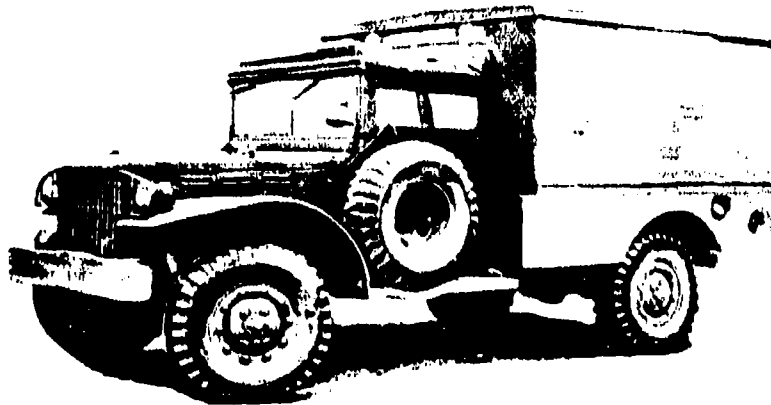
Clutch	.....	Single disc
Transmission	.....	Synchromesh
Control	.....	Direct, hand lever
Speeds forward	.....	5
Speeds reverse	.....	1
Transfer case	.....	Selective sliding gear
Control	.....	Direct, hand lever
Speeds	.....	2
Differential	.....	Conventional (hypoid)
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Hydraulic
Control	.....	Foot
Drive	.....	All-wheel (Hotchkiss)
Number of wheels	.....	4 (single)
Suspension	.....	Four semielliptic springs

CAPACITIES

Fuel:		
Total	.....	19 gal
Cooling system	.....	11 qt
Crankcase	.....	5 qt
Engine air cleaner (each)	.....	5.2 qt
Transmission	.....	7.5 qt
Differential	.....	1.25 qt
Transfer case	.....	1.5 qt
Winch gear case (estimated)	.....	5 qt

ADDITIONAL DATA

TRUCK, 3/4-TON, 4x4, AMBULANCE, KD



GENERAL DATA

Purpose: To transport sick and wounded personnel in the field and on the highway.

Classification: This is the current standard field ambulance. It supercedes Ambulance, WC 54. A new Ambulance, M40, is being developed to replace the one shown here.

Manufacturer: Chrysler Corporation, Dodge Division.

Technical manuals: 9-808, 9-1808A, 9-1808B, 9-1829A.

Lubrication order: DA LO 9-608.

Parts list: ORD 7 SNL G-502, ORD 8 SNL G-502, ORD 9 SNL G-502.

Price of vehicle *	\$1671
Crew (number of personnel)	2
Weight, combat loaded	8080 lb
Length, over-all	15.9 ft
Width, over-all	6.8 ft
Height, over-all	7.5 ft
Shipping dimensions	888.0 cu ft
	110 sq ft
Tread (center to center of wheels)	64.75 in
Ground clearance	10.5 in
Electrical system	6-volts

PERFORMANCE

Gross horsepower to weight ratio	21.5 hp per ton
Cruising range (loaded)	240 mi
Fuel consumption	8 mpg
Maximum allowable speed	54 mph
Maximum gradeability	32.3 per cent
Turning radius	26.7 ft
Fording depth	34 in
Angle of approach	53 deg
Angle of departure	24 deg
Pay load	1500 lb
Towed load	1000 lb
Winch load	5000 lb

*Price based on basic vehicle less equipment.

ENGINE

Make (manufacturer)	Dodge
Model number	T214
Brake horsepower	99 hp
Torque	180 ft lb @ 1200 rpm
Maximum governed speed	3200 rpm
Construction and design	In-line, L-head
Number of cylinders	6
Displacement, total	300.8 cu in
Compression ratio	6.7:1
Cooling system	Liquid
Ignition	Battery, distributor

CHASSIS AND POWER TRAIN

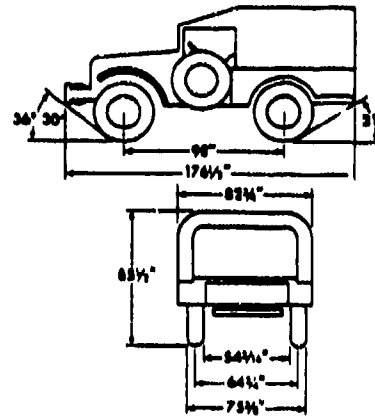
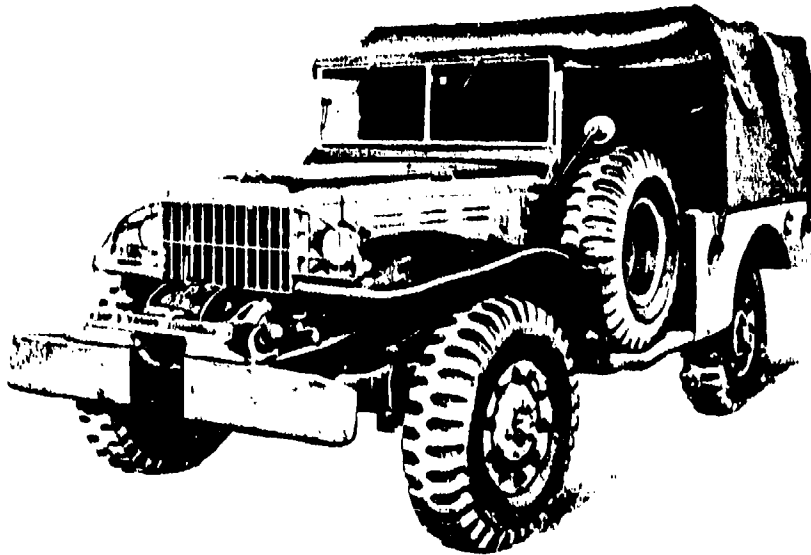
Clutch	Single dry disc
Transmission	Selective sliding
Control	Direct hand lever
Speeds forward	4
Speeds reverse	1
Transfer case	Constant mesh
Control	Hand lever for front wheels
Speeds	1
Differential	Conventional
Steering control	Steering wheel
Brakes	
Operating principle	Hydraulic
Control	Foot-pedal
Drive	All-wheel

CAPACITIES

Fuel	30 gal
Total	
Cooling system	17 qt
Crankcase	5 qt
Engine air cleaner	1 qt
Transmission	2 1/2 qt
Differential	3 qt
Transfer case	1.5 qt
Winch gear case	1 qt

ADDITIONAL DATA

TRUCK, 3/4-TON, 4x4, WEAPONS CARRIER AND COMMAND WEAPONS CARRIER



GENERAL DATA

Purpose: To transport weapons, tools, equipment, and personnel; also used for command and reconnaissance.

Classification: At printing date, these vehicles are standard; however, improvements are in order and will be incorporated in the following projected models: Truck, 3/4-Ton, 4x4, Cargo, M37, which will eventually replace the weapons carrier and truck, 3/4-Ton, 4x4, Utility, M42, which will replace the command weapons carrier.

Manufacturer: Dodge Division, Chrysler Corporation.

Technical manuals: 9-802, 9-1808A, 9-1808B, 9-1829A.

Lubrication order: DA LO 9-808.

Parts list: ORD 7 SNL G502, ORD 8 SNL G502, ORD 9 SNL G502.

Price of vehicle* \$1890

Crew (number of personnel) 2

Weight, combat loaded 7740 lb

Length, over-all 14.70 ft

Width, over-all 6.84 ft

Height, over-all 7.12 ft

Shipping dimensions 722.66 cu ft; 101.40 sq ft

Wheel base 98 in

Tread (center to center of wheels):

Front 64 3/4 in

Rear 64 3/4 in

Approach angle 37 deg

Departure angle 31 deg

Ground clearance 10.62 in

Electrical system:

Command weapons carrier 12-volt

Weapons carrier 6-volt

Communication system (command weapons carrier only) Radio

PERFORMANCE

Gross horsepower to weight ratio 21.6 hp per ton

Cruising range 210 mi

Fuel consumption 8 mpg

Maximum allowable speed 55 mph

Maximum gradability 60 per cent

* Price based on basic price of vehicle less equipment.

** NOTE: Last production equipped with 7500-pound load capacity winch.

Turning radius	.....	21.16 ft
Fording depth	.....	34 in
Pay load	.....	1800 lb
Towed load	.....	1000 lb
Winch load**	.....	5000 lb

ENGINE

Make (manufacturer)	.....	Dodge
Model number	.....	T-214
Brake horsepower	.....	92
Torque	.....	180 ft lb @ 1200 rpm
Maximum governed speed	.....	3200 rpm
Construction and design	.....	In-line L-head
Number of cylinders	.....	6
Displacement, total	.....	200.2 cu in
Compression ratio	.....	6.7: 1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

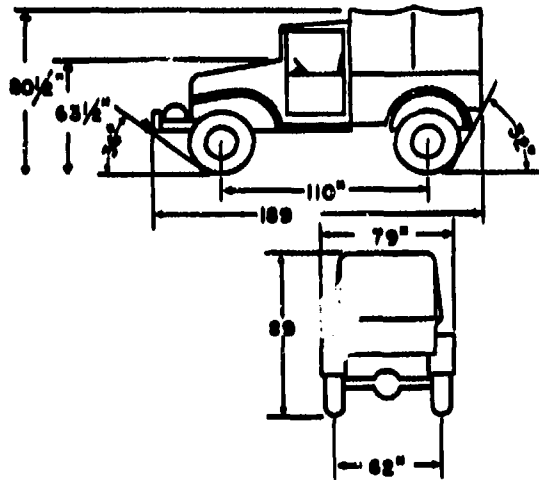
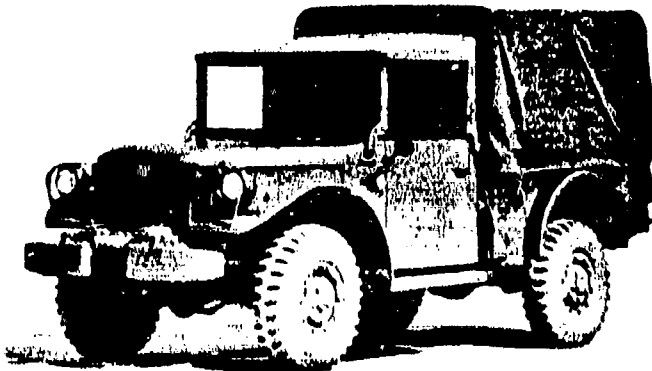
Clutch	.....	Single disc
Transmission	.....	Selective sliding gear
Control	.....	Direct hand lever
Speeds forward	.....	4
Speeds reverse	.....	1
Transfer case	.....	Constant mesh
Control	.....	Direct hand lever
Speeds	.....	1
Differential	.....	Conventional (hypoid)
Steering control	.....	Steering wheel
Brakes:	.....
Operating principle	.....	Hydraulic
Control	.....	Foot
Drive	.....	All-wheel
Number of wheels	.....	4 (single)
Suspension	.....	Four semielliptic springs

CAPACITIES

Fuel:	.....
Total	.....	30 gal
Crankcase	.....	5 qt
Cooling system	.....	17 qt
Engine air cleaner (each)	.....	1 qt
Transmission	.....	3.5 qt
Differential (front or rear)	.....	3 qt
Transfer case	.....	1.5 qt
Winch gear case	.....	1 qt

ADDITIONAL DATA

TRUCK, 3/4-TON, 4x4, CARGO, M37



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To transport weapons, tools, equipment, and personnel.
Classification: This is the future 3/4-ton truck. It is being tested and in event of an emergency would probably be put into production. It would replace the weapons carrier shown on page 6.
Manufacturer: Dodge Division, Chrysler Corporation.
Technical manuals: 9-840, 9-1840A, 9-1840B.
Lubrication order: DA LO 9-840.
Parts list: ORD 7 SNL G741, ORD 8 SNL G741, ORD 9 SNL G741.

Price of vehicle*	.....	\$4469
Crew (number of personnel)	.....	2
Weight, combat loaded	.....	5350 lb
Length, over-all	.....	18.91 ft
Width, over-all	.....	6.98 ft
Height, over-all	.....	7.41 ft
Shipping dimensions (estimated)	.....	723 cu ft
		101 sq ft
Wheel base	.....	112 in
Tread (center to center of wheels):		
Front	.....	62 in
Rear	.....	62 in
Approach angle	.....	44 deg
Departure angle	.....	52 deg
Ground clearance	.....	10.75 in
Electrical system	.....	24-volt

PERFORMANCE

Gross horsepower to weight ratio	.....	22.5 hp per ton
Cruising range (estimated)	.....	340 mi
Fuel consumption (estimated)	.....	8 mpg
Maximum allowable speed (estimated)	.....	55 mph
Maximum gradeability	.....	60 per cent
Turning radius	.....	25.25 ft
Turning depth (estimated)	.....	34 in
Pay load (estimated)	.....	1800 lb
Towed load (estimated)	.....	1000 lb
Winch load	.....	7500 lb

*Price with winch and equipment.

ENGINE

Make (manufacturer)	.....	Dodge
Model number	.....	T345
Brake horsepower	.....	54 hp
Torque	.....	185 ft lb @ 1500 rpm
Maximum governed speed	.....	3500 rpm
Construction and design	.....	In-line, L-head
Number of cylinders	.....	6
Displacement, total	.....	230.5 cu in
Compression ratio	.....	6.5:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

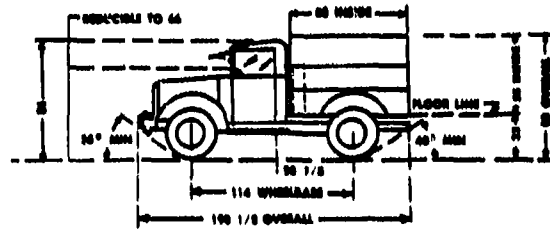
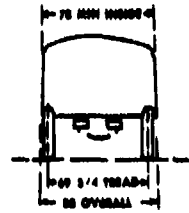
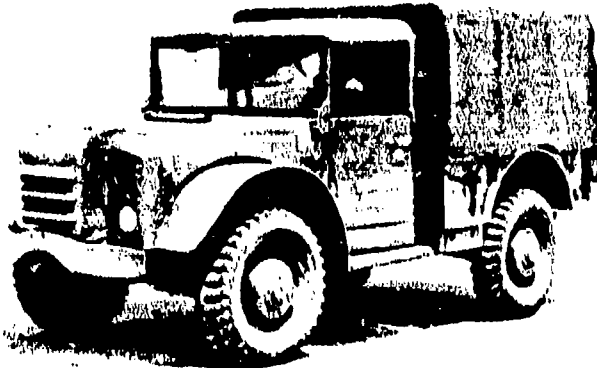
Clutch	.....	Single disc
Transmission	.....	Selective sliding gear
Control	.....	Direct, hand lever
Speeds forward	.....	4
Speeds reverse	.....	1
Transfer case	.....	Selective sliding gear
Control	.....	Direct, hand lever
Speeds	.....	2
Differential	.....	Conventional (hypoid)
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Hydraulic
Control	.....	Foot
Drive	.....	All wheel (Hotchkiss)
Number of wheels	.....	4 (single)
Suspension	.....	Four semielliptic springs

CAPACITIES

Fuel:		
Total	.....	30 gal
Cooling system	.....	25 qt
Crankcase	.....	5 qt
Engine air cleaner (each)	.....	1 qt
Transmission (estimated)	.....	6.5 qt
Differential (front or rear) (estimated)	.....	3 qt
Transfer case (estimated)	.....	2 qt
Winch gear case (estimated)	.....	1 qt

ADDITIONAL DATA

CARRIER, CROSS-COUNTRY, 3/4-TON, 4x4, T53



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To provide a 3/4-ton cross-country carrier with a 1-1/4-ton highway capacity incorporating new design features providing improved performance and riding characteristics. It is in line with the standardization program utilizing the family line of air-cooled engines and hydraulic torque converters.

Classification: This vehicle is not standard. It is in the experimental stage. If issued it will probably replace the 3/4 ton Weapons Carrier or the proposed M37 3/4 ton cargo truck.

Manufacturer: Chrysler Corp.
Technical manuals: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of Vehicle	Unknown
Crew (number of personnel)	2
Weight, combat loaded	8000 lb
Length, over-all	18.8 ft
Width, over-all	8.9 ft
Height, over-all	7.4 ft
Shipping dimensions (estimated)	722 sq ft
	101 in
Wheelbase	114 in
Tread (center to center of wheel):	
Front	69.75 in
Rear	69.75 in
Approach angle	38 deg
Departure angle	40 deg
Ground clearance	14 in
Electrical system	24-volt

PERFORMANCE

Gross horsepower to weight ratio	85 hp per ton
Cruising range (estimated)	300 mi
Fuel consumption (estimated)	10 mpg
Maximum allowable speed	60 mph
Maximum gradeability	65 per cent
Turning radius	25 ft
Fording depth	42 in
Pay load	1800 lb
Towed load	4000 lb
Winch load	7500 lb

ENGINE

Make (manufacturer)	Continental
Model number	AO-402-1
Brake horsepower	152
Torque	340 ft lb @ 1400 rpm
Maximum governed speed	3000 rpm
Construction and design	Opposed I-head
Number of cylinders	6
Displacement, total	403.2 cu in
Compression ratio	8.3:1
Cooling system	Air cooled
Ignition	Magneto

CHASSIS AND POWER TRAIN

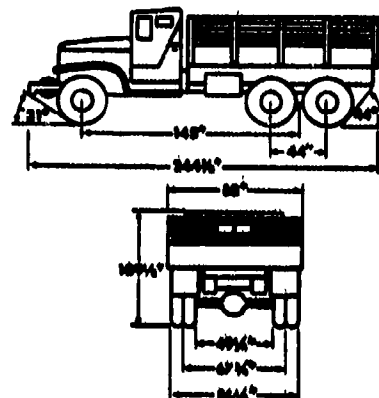
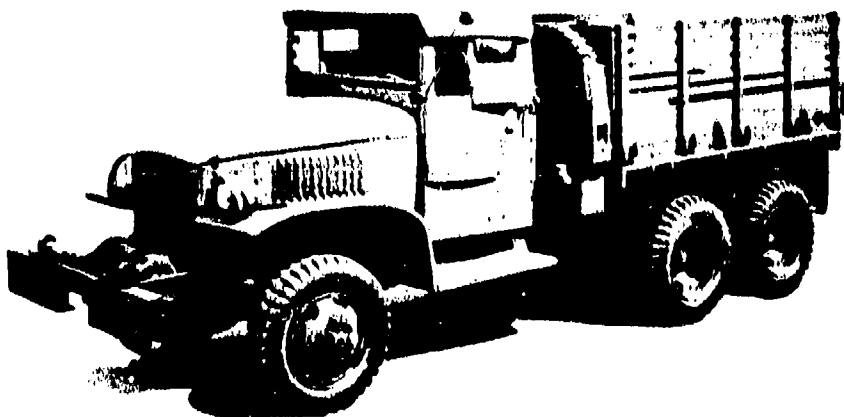
Clutch	None
Transmission	Torque converter
Control	Automatic
Speeds forward	2
Speeds reverse	1
Transfer case	Constant mesh
Control	None
Speeds	1
Differential	Automatic locking
Steering control	Steering wheel
Brakes:	
Operating principle	Hydraulic (sealed)
Control	Foot
Drive	All-wheel
Number of wheels	4 (single)
Suspension	Independent torsion bar

CAPACITIES

Fuel:	
Total	40 gal
Cooling system	None
Crankcase	14 qt
Engine air cleaner (estimated)	1 qt
Transmission	Unknown
Differential (each) (estimated)	3 qt
Transfer case	Unknown
Winch gear case (estimated)	1 qt

ADDITIONAL DATA

TRUCK, 2½-TON 6x6, CARGO, CCKW 352, SWB



GENERAL DATA

Purpose: To transport personnel or cargo and to act as a light prime mover. It is also used for mounting special bodies such as the shop truck body, dump body, searchlight, decontaminator, and air compressor.

Classification: This vehicle is standard in all current tables of equipment. The Truck, 2½-Ton, Cargo, M34, will be manufactured as a replacement for this vehicle in the future.

Manufacturer: General Motors Truck and Coach Company.
Technical manuals: G-801, G-1801, G-1802-A, G-1825-A, G-1826-C, G-1827-B, G-1827-C, G-1828-A.

Lubrication order: DALO G-801.

Parts list: ORD 7, SNL G-508, ORD 8, SNL G-508, ORD 9, SNL G-508.

Price of vehicle*	.....	\$4317
Crew (number of personnel)	.....	2
Weight, combat loaded**	.....	18,700 lb
Length, over-all	.....	30.4 ft
Width, over-all	.....	7.8 ft
Height, over-all	.....	6.08 ft
Shipping dimensions (uncrated)	.....	897 cu ft
	.....	141.1 sq ft

Tread (center to center of wheels):***

Front	.....	62.25 in
Rear	.....	67.75 in
Ground clearance	.....	9-½ in
Electrical system	.....	6-volt

PERFORMANCE

Gross horsepower to weight ratio	.....	18.6 hp per ton
Cruising range	.....	500 mi
Fuel consumption	.....	7.5 mpg
Maximum allowable speed	.....	45 mph
Maximum gradeability	.....	61 per cent
Turning radius	.....	34 ft
Fording depth	.....	30 in
Pay load	.....	5350 lb
Towed load	.....	4500 lb
Winch load	.....	10,000 lb

* Price based with winch and without equipment.

** For winch, add 700 pounds to weight.

*** Tread data based on equipment with banjo axles.

ENGINE

Make (manufacturer)	.....	GMC
Model number	.....	870
Brake horsepower	.....	51.8
Torque	.....	218 ft lb @ 1400 rpm
Maximum governed speed	.....	2750 rpm
Construction and design	.....	In-line, I-head
Number of cylinders	.....	6
Displacement, total	.....	389.5 cu in
Compression ratio	.....	6.75:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

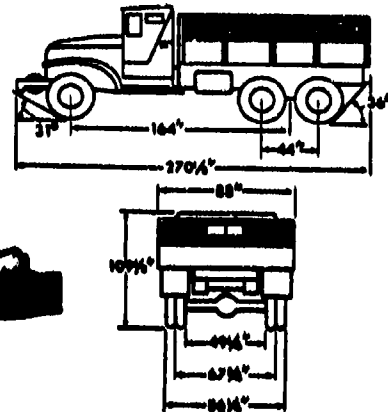
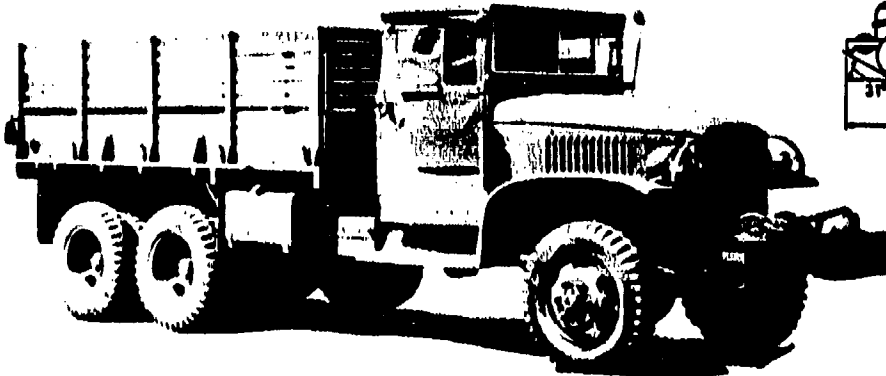
Clutch	.....	Single disc
Transmission	.....	Selective sliding, overdrive
Control	.....	Direct, hand lever
Speeds forward	.....	4
Speeds reverse	.....	1
Transfer case	.....	Selective sliding
Control	.....	Direct, hand lever
Speeds	.....	4
Differential	.....	Conventional
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Hydraulic, booster
Control	.....	Foot pedal
Drive	.....	All-wheel
Number of wheels	.....	6 (4 dual, 2 single)
Suspension:		
Front	.....	Semielliptic springs
Rear	.....	Leaf, inverted semielliptic springs

CAPACITIES

Fuel:		
Total	.....	40 gal
Cooling system	.....	19 qt
Crankcase:		
Old sump (shallow)	.....	7.5 qt
New sump (deep)	.....	10 qt
Engine air cleaner (each)	.....	1 qt
Transmission	.....	5.5 qt
Differential	.....	6.5 qt
Transfer case	.....	2.25 qt
Winch gear case	.....	1-¼ qt

ADDITIONAL DATA

TRUCK, 2½-TON 6x6, CARGO, CCKW 353, LWB



GENERAL DATA

Purpose: To transport personnel or general cargo on the highway and cross-country. It is also used for mounting special bodies such as the shop truck, dump body, searchlight, decontaminator, and air compressor.

Classification: This vehicle is standard in all current tables of equipment. The Truck, 2½ Ton, 6x6, M34, will be manufactured and issued in place of this vehicle in the future.

Manufacturer: General Motors Truck and Coach Division (GMC).
Technical manuals: 9-801, 9-1801, 9-1802A, 9-1828A, 9-1828C, 9-1827B, 9-1827C, 9-1828A, 9-1829A.

Lubrication order: DA LO 9-801.

Parts list: ORD 7 SNL G-508, ORD 8 SNL G-508, ORD 9 SNL G-508.

Price of vehicle*	.....	\$2247
Crew (number of personnel)	.....	2
Weight, combat loaded**	.....	18,700 lb
Length, over-all	.....	27.3 ft
Width, over-all	.....	7.3 ft
Height, over-all	.....	9.08 ft
Shipping dimensions	.....	99 cu ft
	.....	168 sq ft
Wheelbase	.....	104 in
Track, (center to center of wheels): ***		
Front	.....	60 in
Rear	.....	67.5 in
Approach angle	.....	31 deg
Departure angle	.....	36 deg
Ground clearance	.....	9.87 in
Electrical system	.....	8-volt

PERFORMANCE

Gross horsepower to weight ratio	.....	18.6 hp per ton
Cruising range	.....	300 mi
Fuel consumption	.....	7.8 mpg
Maximum allowable speed	.....	45 mph
Maximum gradeability	.....	65 per cent
Turning radius	.....	85 ft
Fording depth	.....	30 in
1½ y load	.....	5550 lb

* Price based on vehicle without equipment and with winch.
 ** For winch add 700 pounds to weight.
 *** Tread data based equipment with banjo axles.

Towed load	.....	4500 lb
Winch load	.....	10,000 lb

ENGINE

Make (manufacturer)	.....	GMC
Model number	.....	870
Brake horsepower	.....	91.5
Torque	.....	216 ft lb @ 1400 rpm
Maximum governed speed	.....	2750 rpm
Construction and design	.....	In-line, I-head
Number of cylinders	.....	6
Displacement, total	.....	335.5 cu in
Compression ratio	.....	6.75:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

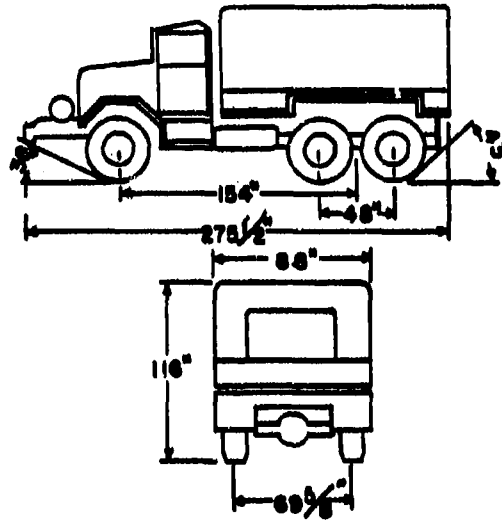
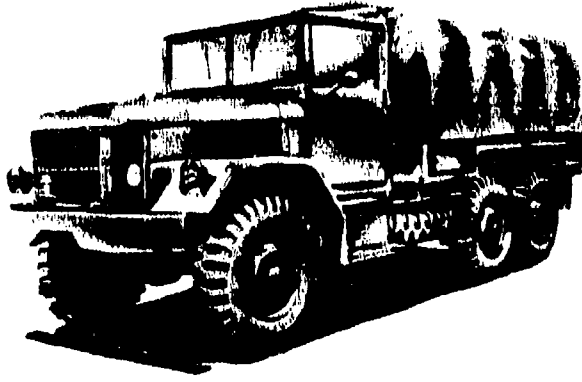
Clutch	.....	Single disc
Transmission	.....	Selective sliding, overdrive
Control	.....	Direct, hand lever
Speeds forward	.....	5
Speeds reverse	.....	1
Transfer case	.....	Selective sliding
Control	.....	Direct, hand lever
Speeds	.....	2
Differentials	.....	Conventional
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Hydraulic, booster
Control	.....	Foot pedal
Drive	.....	All-wheel
Number of wheels	.....	6 (4 dual, 2 single)
Suspension:		
Front	.....	Semielliptic springs
Rear	.....	Bogie, inverted semielliptic springs

CAPACITIES

Fuel:		
Total	.....	40 gal
Cooling system	.....	19 qt
Crankcase:		
Old sump	.....	7.5 qt
New sump	.....	10 qt
Engine air cleaner	.....	1 qt
Transmission	.....	5.5 qt
Differential (each)	.....	6.5 qt
Transfer case	.....	2.55 qt
Winch gear case	.....	1-½ qt

ADDITIONAL DATA

TRUCK, 2½-TON, 6x6, CARGO, M34



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To transport personnel and general cargo on the highway and cross-country.

Classification: This vehicle is scheduled to replace the Truck, 2½-Ton, GMC. In case of emergency it would probably be produced in quantity as was the GMC model during World War II.

Manufacturer: Reo Motor Company.

Technical manuals: 9-819, 9-1819A, 9-1819B.

Lubrication order: DA LO 9-819.

Parts list: ORD 7 SNL G748, ORD 8 SNL G748, ORD 9 SNL G748.

Price of vehicle*	.....\$2675
Crew (number of personnel)	.....3
Weight, combat loaded	.....17,500 lb
Length, over-all (with winch)	.....275½ ft
Width, over-all	.....88 ft
Height, over-all	.....116 ft
Shipping dimensions	.....660 cu ft; 180 sq ft
Wheelbase	.....154 in
Tread (center to center of wheels):	
Front	.....69.62 in
Rear	.....69.62 in
Approach angle	.....35 deg
Departure angle (estimated)	.....35 deg
Ground clearance	.....14 in
Electrical system	.....24-volt

PERFORMANCE

Gross horsepower to weight ratio	.....15.75 hp per ton
Cruising range (estimated)	.....575 mi
Fuel consumption	.....7.5 mpg
Maximum allowable speed (estimated)	.....45 mph
Maximum gradeability (estimated)	.....65 per cent
Turning radius (estimated)	.....34 ft
Fording depth (estimated)	.....35 in
Pay load	.....5000 lb
Towed load (estimated)	.....4500 lb
Winch load (estimated)	.....10,000 lb

* Price with winch and equipment.

ENGINE

Make (manufacturer)	.....Reo
Model number	.....OH381
Brake horsepower	.....144
Torque	.....280 ft lb @ 1400 rpm
Maximum governed speed	.....3400 rpm
Construction and design	.....In-line, I-head
Number of cylinders	.....6
Displacement, total	.....651 cu in
Compression ratio	.....6.75:1
Cooling system	.....Liquid
Ignition	.....Battery, distributor

CHASSIS AND POWER TRAIN

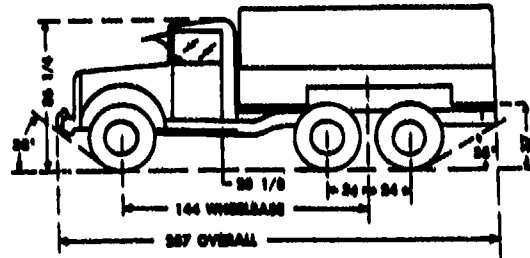
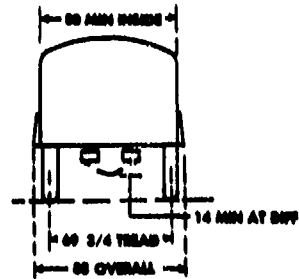
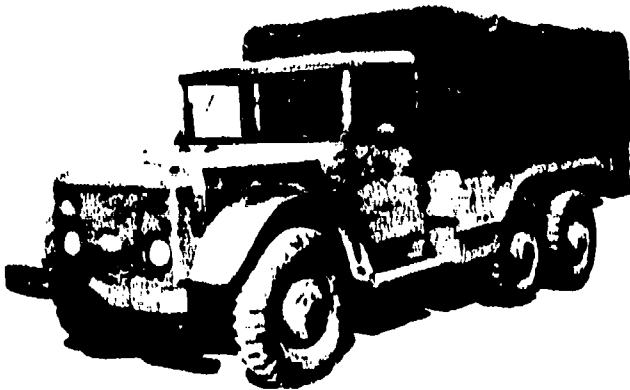
Clutch	.....Single disc
Transmission	.....Selective sliding gear
Control	.....Direct, hand lever
Speeds forward	.....3
Speeds reverse	.....1
Transfer case	.....Selective sliding gear
Control	.....Direct, hand lever
Speeds	.....2
Differential	.....Conventional
Steering control	.....Steering wheel
Brakes:	
Operating principle	.....Hydraulic, booster
Control	.....Foot
Drive	.....All-wheels
Number of wheels	.....6 (single)
Suspension:	
Front	.....Semielliptic springs
Rear	.....Bogie, inverted semielliptic springs

CAPACITIES

Fuel:	
Total	.....50 gal
Cooling system	.....21 qt
Crankcase (estimated)	.....10 qt
Engine air cleaner (each)	.....3 qt
Transmission (estimated)	.....3 qt
Differential (estimated)	.....3 qt
Transfer case (estimated)	.....3 qt
Winch gear case (estimated)	.....1.75 qt

ADDITIONAL DATA

TRUCK, 2½-TON, 6x6, CARGO, T55



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: For transporting cargo and personnel cross-country and over highways. Primarily intended as a lightweight, compact vehicle practical for transporting by air.

Classification: This vehicle is in development stages. It may in some cases replace the Truck, 2½-Ton, GMC, but is not intended as an over-all replacement. A definite requirement exists for a lightweight vehicle of this size for airborne units.

Manufacturer: Chrysler Corporation.

Technical Manual: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	2
Weight, combat loaded	13,500 lb
Length, over-all	21.4 ft
Width, over-all	7.55 ft
Height, over-all	6.15 ft
Shipping dimensions	1027.7 cu ft; 136.2 sq ft
Tread (center to center of wheels):	
Front	69.75 in
Rear	69.75 in
Ground clearance	18.25 in
Electrical system	24-volt

PERFORMANCE

Gross horsepower to weight ratio	45.6 hp per ton
Cruising range	500 mi
Fuel consumption	7.50 mpg
Maximum allowable speed	Unknown
Maximum gradability	65 per cent
Turning radius	20 ft
Fording depth	42 in
Pay load	5000 lb
Towed load	5000 lb
Winch load	7500 lb

ENGINE

Make (manufacturer)	Continental
Model number	AO-402-B

Brake horsepower	187
Torque	555 ft lb @ 2500 rpm
Maximum governed speed	3000 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	408 cu in
Compression ratio	6.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

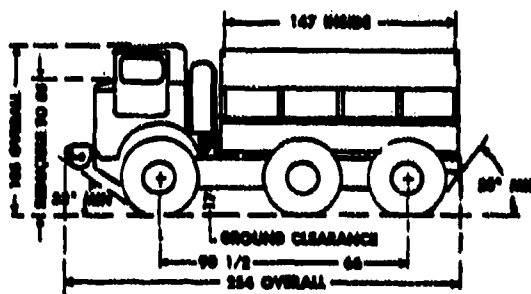
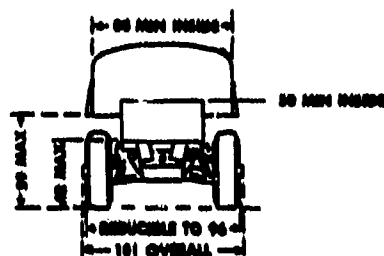
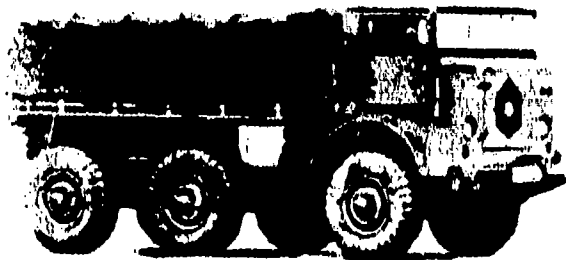
Clutch	None
Transmission	Torque converter and planetary gear
Control	Automatic
Speeds forward	8
Speeds reverse	1
Transfer case	Transmission mounted
Control	None
Speeds	1
Differential	Automatic locking
Steering control	Steering wheel
Brakes:	
Operating principle	Hydraulic (sealed)
Control	Foot pedal
Drive	All-wheel
Number of wheels	6 (single)
Suspension:	
Front	Independent, torsion bar
Rear	Bogie, inverted semielliptic springs

CAPACITIES

Fuel:	
Total	40 gal
Cooling system	None
Crankcase	14 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Unknown
Transfer case	Unknown
Winch gear case	Unknown

ADDITIONAL DATA

CARRIER, CROSS-COUNTRY, 5-TON, 6x6, T51



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To transport personnel and general cargo cross-country and over highways.

Classification: This vehicle incorporates the most desirable design features available. These features are being tested and in the future may be built into T/O&E vehicles. To date the vehicle is not standard.

Manufacturer: General Motors Corporation.

Technical manual: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle*	.....	\$18,540
Crew (number of personnel)	.....	2
Weight, combat loaded	.....	26,800 lb
Length, over-all	.....	21.16 ft
Width, over-all	.....	8.1 ft
Height, over-all	.....	8.7 ft
Shipping dimensions	.....	Unknown
Wheelbase	.....	136.6 in
Tread (center to center of wheels):		
Front	.....	88 in
Rear	.....	82 in
Approach angle	.....	30 deg
Departure angle	.....	30 deg
Ground clearance	.....	15.5 in
Electrical system	.....	24 volts

PERFORMANCE

Gross horsepower to weight ratio (estimated)	.....	15.27 hp per ton
Cruising range	.....	600 mi
Fuel consumption (estimated)	.....	6.18 mpg
Maximum allowable speed	.....	55 mph
Maximum gradability	.....	65 per cent
Turning radius	.....	35 ft
Fording depth	.....	7.9 in
Pay load:		
Highway	.....	10,000 lb
Cross-Country	.....	5000 lb
Towed load	.....	7500 lb
Winch load	.....	10,000 lb

* Price with winch and equipment.

ENGINE

Make (manufacturer)	.....	Continental
Model number	.....	AO-584-B
Brake horsepower	.....	800 hp
Torque	.....	450 ft lb @ 1400 rpm
Maximum governed speed	.....	3000 rpm
Construction and design	.....	Vertical, opposed, I-head
Number of cylinders	.....	6
Displacement, total	.....	587.6 cu in
Compression ratio	.....	8.5:1
Cooling system	.....	Air cooled
Ignition	.....	Magneto

CHASSIS AND POWER TRAIN

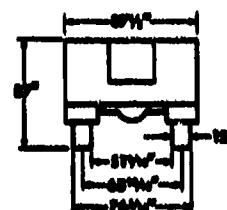
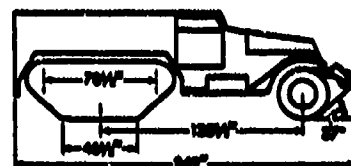
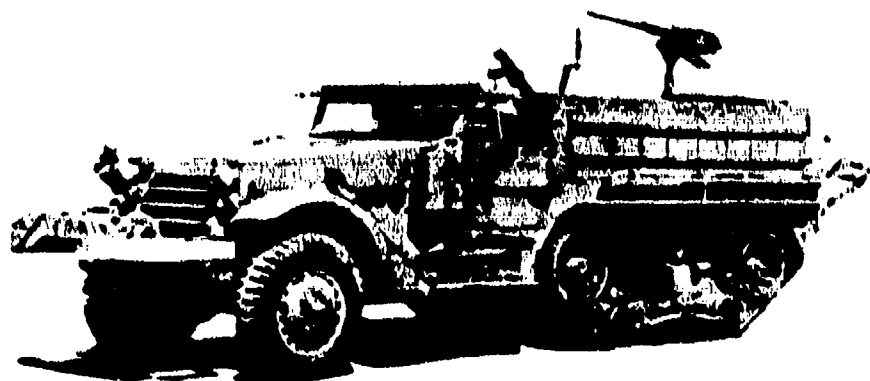
Clutch	.....	None
Transmission	.....	Torque converter
Control	.....	1st to 3d, manual remote; 3d to 6d, automatic
Speeds forward	.....	6
Speeds reverse	.....	1
Transfer case	.....	Constant mesh
Control	.....	None
Speeds	.....	1
Differential	.....	Automatic locking
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Air hydraulic (sealed)
Control	.....	Foot
Drive	.....	All-wheel
Number of wheels	.....	6 (single)
Suspension	.....	Independent torsion bar

CAPACITIES

Fuel:		
Total	.....	70 gal
Cooling system	.....	None
Crankcase	.....	16 qt
Engine oil cleaner (each)	.....	Unknown
Transmission	.....	Unknown
Differential	.....	Unknown
Transfer case	.....	Unknown
Winch gear case	.....	Unknown

ADDITIONAL DATA

CARRIER, HALF-TRACK, MORTAR, 81-MM, M21



GENERAL DATA

Purpose: To provide a self-propelled mount for the 81-mm mortar.
Classification: The armored division infantry battalion has a requirement for motor carriages for the 81-mm mortar. The half-track must fill this requirement until a better vehicle is developed.
Manufacturer: White Motor Company.
Technical manuals: 9-710, 9-710A, 9-711, 9-1827B, 9-1827C, 9-1828A, 9-1829A.
Lubrication order: DALO 9-710.
Parts list: ORD 7 SNL G-102, ORD 8 SNL G-102, ORD 9 SNL G-102.

Price of vehicle	84,183
Crew (number of personnel)	3
Weight, combat loaded	20,000 lb
Length, over-all	20.75 ft
Width, over-all	7.25 ft
Height, over-all	7 ft
Shipping dimensions (uncrated)	1096.8 cu ft
	151.6 sq ft
Tread center to center of:	
Track on Rear	60-13/16 in
Front wheels	64 1/4 in
Ground clearance	17 1/4 in
Electrical system	12-volt
Communication system	Radio

PERFORMANCE

Gross horsepower to weight ratio	14.2 hp per ton
Cruising range	200 mi
Fuel consumption	3.4 mpg
Maximum allowable speed	15 mph
Maximum gradability	60 per cent
Turning radius	30 ft
Fording depth	62 in
Approach angle	37 deg with roller; 32 deg with winch
Departure angle	35 deg
Pay load	45,000 lb
Towed load	4500 lb
Winch load	10,000 lb

ENGINE

Make (manufacturer)	White
Model number	180 AX
Brake horsepower	142
Torque	620 ft lb @ 1000 rpm
Maximum governed speed	Not governed
Construction and design	In-line, L-head
Number of cylinders	6
Displacement, total	686 cu in
Compression ratio	6.44:1
Cooling system	Liquid
Ignition	Battery, distributor

CHASSIS AND POWER TRAIN

Clutch	Single dry disc
Transmission	Selective sliding
Control	Direct hand lever
Speeds forward	4
Speeds reverse	1

* Price based on unit price basic vehicle plus artillery equipment.

Transfer case	Selective sliding
Control	Direct hand lever
Speeds	4
Differential	Conventional
Steering control	Steering wheel
Brakes:	
Operating principle	Booster hydraulic
Control	Foot pedal
Drive	Front sprocket on tracks. All tracks and wheels drive.
Number of wheels	2
Suspension	Bogie, vertical valve springs.
Tracks:	
Construction	Endless band, rubber
Width	12 in

ARMAMENT

Primary armament	Mortar, 81-mm
Traverse:	
Right	65 mils
Left	65 mils
Elevation	40 to 85 deg
Secondary armament:	
Cal .50, MG	1

ARMOR

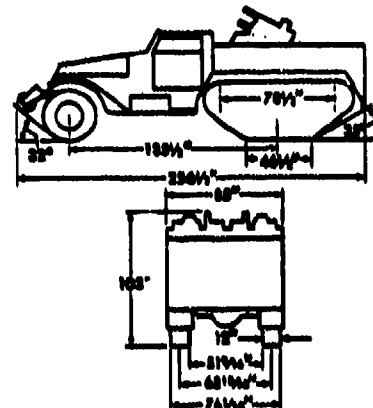
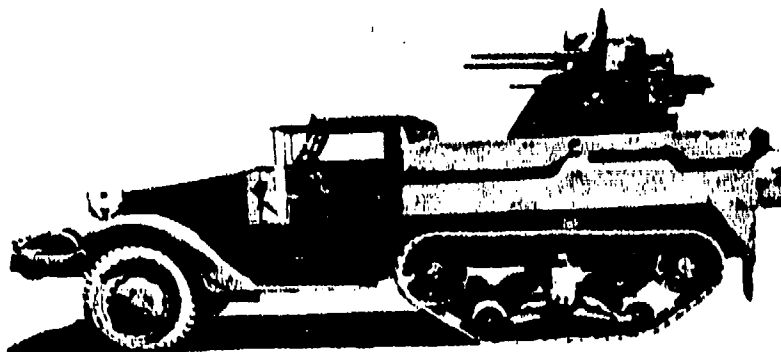
Hull:	
Construction	Homogeneous plate
Thickness:	
Front windshield	1/4 in
Sides	1/4 in
Rear	1/4 in
Top	None
Floor	None

CAPACITIES

Fuel:	
Total	60 gal
Right tank	30 gal
Left tank	30 gal
Cooling system	60 qt
Crankcase	12 qt
Engine air cleaner (each)	(estimated) 1 1/2 qt
Transmission	7 1/2 qt
Differential:	
Rear	9 qt
Front	5 1/2 qt
Transfer case	9 qt
Winch gear case	4 qt
Ammunition:	
Primary weapon	97 rounds
Secondary weapons:	
Cal .50	400 rounds

ADDITIONAL DATA

CARRIAGE, MOTOR, MULTIPLE GUN, M16



GENERAL DATA

Purpose: To provide mobility for multiple machine guns for anti-aircraft protection.

Classification: A requirement exists for armored motor carriages for multiple machine guns in armored artillery units. The Half-Track, M16, will fill this requirement until the T77 multiple-gun motor carriage is in production and meets the demand.

Manufacturer: White Motor Company.

Technical manuals: 9-710; 9-1710; 9-1710A; 9-1711; 9-1887B; 9-1887C; 9-1888A; 9-1889A.

Lubrication order: DA LO 9-710.

Parts list: ORD 7, SNL G-102, ORD 8 SNL G-102, ORD 9 SNL G-102.

Price of vehicle*	.....	\$10,551
Crew (number of personnel)	.....	4
Weight, combat loaded	.....	11,640 lb
Length, over-all	.....	18 1/2 ft
Width, over-all	.....	7 1/2 ft
Height, over-all	.....	8 1/2 ft
Shipping dimensions (unpacked)	.....	120 cu ft; 151.4 sq ft
Tread center to center of:		
Tracks on rear	.....	68-10/16 in
Front wheels	.....	64-1/2 in
Ground clearance	.....	17-1/4 in
Electrical system	.....	12-volt
Communication system	.....	Radio

PERFORMANCE

Gross horsepower to weight ratio	.....	14.2 hp per ton
Cruising range (loaded)	.....	200 mi
Fuel consumption (loaded)	.....	3.1 mpg
Maximum allowable speed	.....	45 mph
Maximum gradability	.....	30 per cent
Turning radius	.....	Right, 90 ft; left, 90 ft
Fording depth	.....	62 in
Approach angle	.....	Roller, 37 deg; winch, 32 deg
Departure angle	.....	32 deg
Pay load	.....	5000 lb
Towed load	.....	4500 lb
Winch load	.....	10,000 lb

ENGINE

Make (manufacturer)	.....	White
Model number	.....	190 AX
Brake horsepower	.....	148 @ 3000 rpm
Torque	.....	320 ft lb @ 1300 rpm
Maximum governed speed	.....	Not governed
Construction and design	.....	L-head, in-line
Number of cylinders	.....	6
Displacement, total	.....	586 cu in
Compression ratio	.....	6.44:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

Clutch Single dry disc.

* Price based on unit price basic vehicle plus artillery equipment.

Transmission	.....	Selective sliding
Control	.....	Direct hand lever
Speeds forward	.....	4
Speeds reverse	.....	1
Transfer case	.....	Selective sliding
Control	.....	Direct hand lever
Speeds	.....	2
Differential	.....	Conventional
Steering control	.....	Steering wheel
Brakes:		
Operating principle	.....	Booster, hydraulic
Control	.....	Foot pedal
Drive	.....	Front sprocket on tracks; all tracks and wheels drive
Number of wheels	.....	3
Suspension	.....	Boogie, vertical valve springs
Tracks:		
Construction	.....	Endless band, rubber
Width	.....	12 in

ARMAMENT

Cal .50 MG 4

ARMOR

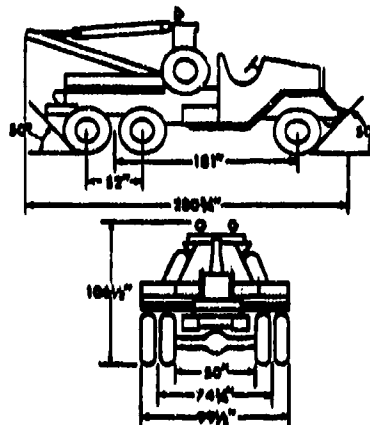
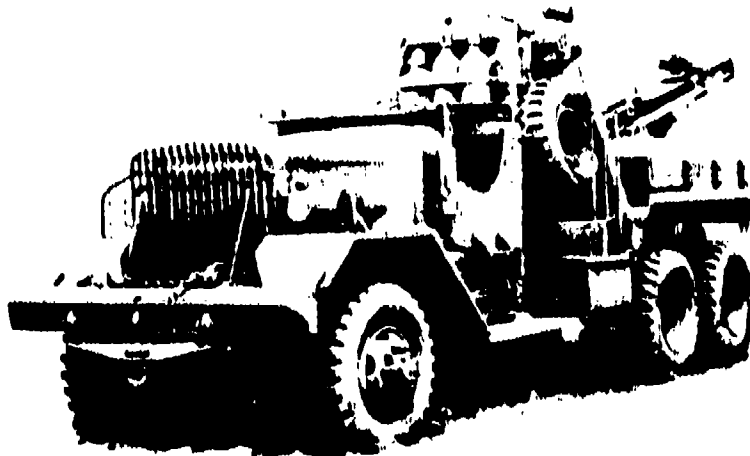
Hull:		
Construction	.....	Homogeneous plate
Thickness:		
Front (windshield cover)	.....	1/2 in
Sides	.....	1/2 in
Rear	.....	None
Top	.....	None
Floor	.....	None

CAPACITIES

Fuel:		
Total	.....	90 gal
Right tank	.....	50 gal
Left tank	.....	40 gal
Cooling system	.....	12 qt
Crankcase	.....	12 qt
Engine air cleaner (each)	.....	1 1/2 qt (estimated)
Transmission	.....	1 1/2 qt
Differential	.....	3/4 qt, front; 9 qt, rear
Transfer case	.....	1 qt
Winch gear case	.....	1 qt
Ammunition:		
Cal .50	.....	5000 rounds

ADDITIONAL DATA

TRUCK, WRECKING, HEAVY, M1A1



GENERAL DATA

Purpose: For towing, salvaging, and recovering vehicles and heavy equipment. Also for various jobs requiring heavy hoisting and winching.

Classification: Standard. As yet no vehicle is in production to replace this vehicle.

Manufacturer: Ward-La France Truck Division and Kenworth Motor Truck Company.

Technical manuals: 9-795, 9-796, 9-1795A, 9-1795B, 9-1795C, 9-1795D, 9-1796, 9-1825B, 9-1826B, 9-1827A, 9-1829A.

Lubrication order: DA LO 9-795.

Parts list: ORD 7 SNL G116, ORD 8 SNL G116, ORD 9 SNL G116.

Price of vehicle*	\$14,087
Crew (number of personnel)	2
Weight, combat loaded	31,500 lb
Length, over-all	20.4 ft
Width, over-all	8.8 ft
Height, over-all	9.7 ft
Shipping dimensions	178.6 cu ft; 207.5 sq ft
Wheelbase	151 in
Trac (center to center of wheels):	
Front	70.6 in
Rear	74.7 in
Approach angle	50 deg
Departure angle	50 deg
Ground clearance	11 in
Electrical system	12-volt

PERFORMANCE

Gross horsepower to weight ratio	9.8 hp per ton
Cruising range	250-300 mi
Fuel consumption	9 mpg
Maximum allowable speed	45 mph
Maximum gradability	54 per cent
Turning radius	95 ft
Fording depth	5.4 ft
Pay load	5000 lb
Towed load	50,000 lb
Winch load:	
Front	20,000 lb
Rear	47,500 lb
Buom load	16,000 lb

* Price based on vehicle and equipment.

ENGINE

Make (manufacturer)	Continental
Model number	22K
Brake horsepower	145
Torque	540 ft lb @ 1200 rpm
Maximum governed speed	2400 rpm
Construction and design	In-line, I-head
Number of cylinders	6
Displacement, total	80 cu in
Compression ratio	8.5:1
Cooling system	Liquid
Ignition	Battery, distributor

CHASSIS AND POWER TRAIN

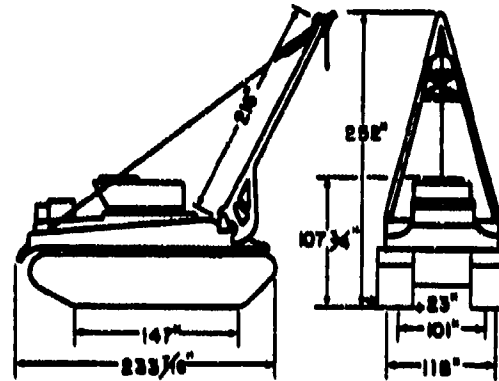
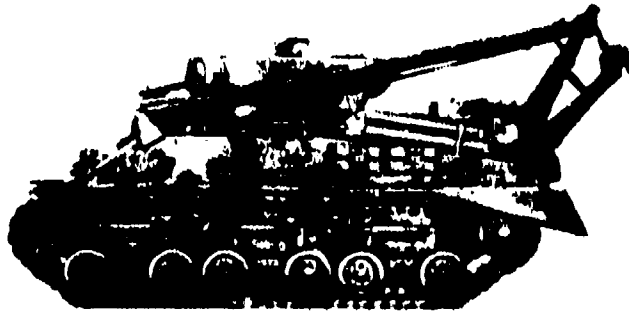
Clutch	Single disc
Transmission	Selective sliding gear with overdrive
Control	
Speeds forward	Direct, hand lever
Speeds reverse	1
Transfer case	Selective sliding gear
Control	
Speeds	Direct, hand lever
Differential	Conventional
Steering control	Steering wheel
Brakes:	
Operating principle	Air
Control	Foot
Drive	All-wheel
Number of wheels	6 (2 single, 4 dual)
Suspension:	
Front	Semielliptic springs
Rear	Bogie, inverted semielliptic springs

CAPACITIES

Fuel:	
Total	100 gal
Cooling system	95 qt
Crankcase	14 qt
Engine air cleaner	1 qt
Transmission	12 qt
Differential:	
Front	8 qt
Rear	7 qt
Transfer case	0 qt
Winch gear case:	
Front	1 1/2 qt
Rear	0 qt

ADDITIONAL DATA

VEHICLE, TANK RECOVERY, M32A1B3



GENERAL DATA

Purpose: To recover disabled tanks and mechanized equipment.
Classification: This vehicle is standard and no replacement has as yet been developed.

Manufacturer: Lima Locomotive Works.

Technical manual: 9-738.

Lubrication order: DA LO 9-738.

Parts list: ORD 7 SNL G-187, ORD 8 SNL G-187, ORD 9 SNL G-187.

Price of vehicle*	.....	\$56,087
Crew (number of personnel)	.....	5
Weight, combat loaded	.....	33 tons
Length, over-all:		
Boom in up position (estimated)	.....	26 ft
Boom in down position (estimated)	.....	20 ft
Width, over-all	.....	9.76 ft
Height, over-all (travel position) (estimated)	.....	9.7 ft
Shipping dimensions (estimated)	.....	2416 cu ft
	.....	318 sq ft
Tread (center to center of track)	.....	101 in
Ground clearance	.....	17.2 in
Ground pressure	.....	10.3 lb/sq in
Electrical system	.....	24-volt
Communication system	.....	Radio and Interphone

PERFORMANCE

Gross horsepower to weight ratio	.....	13.3 hp per ton
Cruising range	.....	100 mi
Fuel consumption	.....	9 mpg
Maximum allowable speed	.....	26 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	31 ft
Fording depth	.....	36 in
Maximum trench vehicle will cross	.....	90 in
Maximum vertical obstacle can negotiate	.....	24 in
Winch load	.....	60,000 lb
Boom load	.....	30,000 lb

ENGINE

Make (manufacturer)	.....	Ford
Model number	.....	GAA
Brake horsepower	.....	500
Torque	.....	950 ft lb @ 1100 rpm
Maximum governed speed	.....	2800 rpm
Construction and design	.....	V, I-head
Number of cylinders	.....	6
Displacement, total	.....	1100 cu in
Compression ratio	.....	7.5:1
Cooling system	.....	Liquid
Ignition	.....	Magneto

* Price based on vehicle without armament.

CHASSIS AND POWER TRAIN

Clutch	.....	Multiple disc
Transmission	.....	Synchromesh
Control	.....	Direct, hand lever
Speeds forward	.....	5
Speeds reverse	.....	1
Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes:		
Operating principle	.....	Mechanical band
Control	.....	Two hand levers
Drive	.....	Front sprocket
Number of wheels	.....	18 (dual)
Suspension	.....	Horizontal volute spring
Tracks:		
Construction	.....	Center guide rubber and steel
Shoes or blocks	.....	79 sq
Width	.....	30 in

ARMAMENT

MG, ring mounted	.....	50 cal (1 ea)
MG, bow mounted	.....	30 cal (1 ea)

ARMOR

Hull:		
Construction	.....	Homogeneous plate
Thickness:		
Front	.....	2.5 in
Sides	.....	1.5 in
Rear	.....	1.5 in
Top	.....	1.5 in
Floor	.....	1.0-1.5 in
Fixed turret:		
Ring diameter	.....	69 in
Construction	.....	Open top, homogeneous plate
Thickness (estimated)	1 in

VISION AND SIGHTING EQUIPMENT

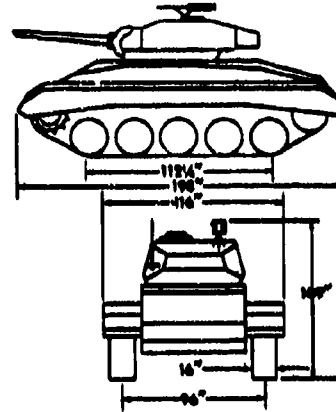
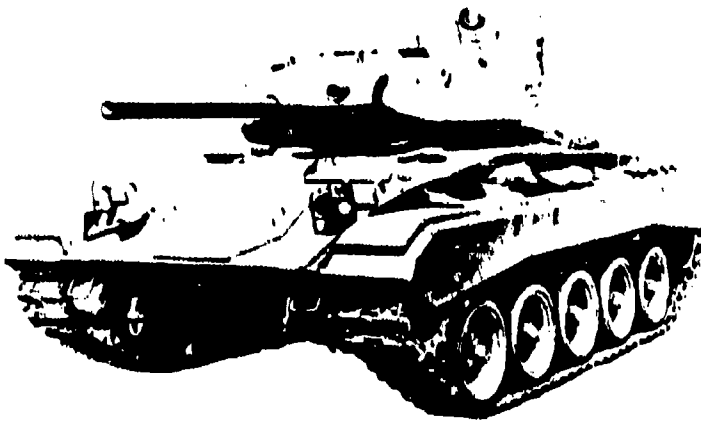
Periscope, vision	M6
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CAPACITIES

Fuel:		
Total	168 gal
Right tank	84 gal
Left tank	84 gal
Cooling system	14 gal
Crankcase	.....	32 qt
Engine air cleaner (each)	.....	0.5 qt
Transmission	.....	164 qt
Differential	.....	Integral with transmission
Final drive (each)	.....	Integral with transmission
Winch gear case	.....	5 qt
Ammunition:		
Cal .50	.....	600 rounds
Cal .30	.....	6250 rounds

ADDITIONAL DATA

TANK, LIGHT, M24



GENERAL DATA

Purpose: To provide mobile firepower and crew protection for offensive combat.

Classification: At present this vehicle is the standard light tank. Eventually to be superseded by the new Light Tank, T41.

Manufacturer: Cadillac Motor Car Division (GMC).

Technical manuals: 9-729, 9-1727A, 9-1729A, 9-1729B, 9-1729C, 9-1825A, 9-1826A, 9-1829A.

Lubrication order: DA LO 9-729.

Parts list: ORD 7 SNL G-200, ORD 8 SNL G-200, ORD 9 SNL G-200.

Price of vehicle*	.....	\$39,653
Crew (number of personnel)	.....	4 or 5
Weight, combat loaded	.....	20 tons
Length, over-all:		
Gun in firing position	.....	18.0 ft
Gun in traveling position	.....	18.0 ft
Width, over-all	.....	9.00 ft
Height, over-all	.....	7.25 ft
Shipping dimensions	.....	1440 cu ft
		180 sq ft
Tread (center to center of track)	.....	96 in
Ground clearance	.....	17.75 in
Ground pressure	.....	11.08 lb/sq in
Electrical system	.....	24-volt
Communication system	.....	Radio and interphones

PERFORMANCE

Gross horsepower to weight ratio	.....	11.0 hp per ton
Cruising range	.....	100 mi
Fuel consumption	.....	4 mpg
Maximum allowable speed	.....	35 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	20 ft
Fording depth	.....	48 in
Maximum vertical obstacle can negotiate	.....	36 in
Maximum trench vehicle will cross	.....	36 in
Range of primary armament:		
With HE shell or WP smoke at 45° 37' or 811 mils	.....	10,995 yds
With APC-T projectile at 45° or 800 mils	.....	10,870 yds
Velocity of primary armament:		
With HE shell or WP smoke at 45° 37' or 811 mils	.....	1950 fps
With APC-T projectile, at 45° or 800 mils	.....	2030 fps
With HVAP-T shot or HEAT	.....	2800 fps

ENGINE

NOTE: This vehicle has two engines as described below

Make (manufacturer)	.....	Cadillac
Model number	.....	44T24
Brake horsepower	.....	110
Torque	.....	240 ft lb @ 1200
Rated speed (Not governed)	.....	940 rpm
Construction and design	.....	V, L-head
Number of cylinders	.....	6
Displacement, total (each engine)	.....	346 cu in
Compression ratio	.....	7.0:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

Clutch	.....	None
Transmission	.....	Hydra-Matic
Control	.....	Automatic
Speeds forward	.....	4
Speeds reverse	.....	None

* Price based on vehicle and artillery equipment.

Transfer case	.....	Synchromesh
Control	.....	Remote, hand lever
Speeds forward	.....	2
Speeds reverse	.....	1
Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes:		
Operating principle	.....	Mechanical, band
Control	.....	Two hand levers
Drive	.....	Front sprocket
Number of wheels	.....	10 (dual)
Suspension	.....	Individual torsion bar
Tracks:		
Construction	.....	Center guide, rubber and steel
Shoes or blocks	.....	74 sq in
Width	.....	16 in

ARMAMENT

Primary armament	.....	Gun, 75-mm; M6
Turret:		
Right	.....	300 deg
Left	.....	300 deg
Elevation	.....	15 deg
Depression	.....	10 deg
Recoil mechanism	.....	Concentric
Stabilizer system	.....	Gyro on elevation only
Secondary armament:		
Caliber .50 MG	.....	1 (AA)
Caliber .30 MG	.....	1 (bow); 1 (coaxial)

ARMOR

Hull:		
Construction	.....	Homogeneous plate
Thickness:		
Front	.....	1 in
Sides	.....	1 in
Rear	.....	7/8 in
Top	.....	5/8 in
Floor	.....	5/8 in
Turret:		
Ring diameter	.....	60 in
Construction	.....	Homogeneous plate
Thickness:		
Front	.....	1.5 in
Sides	.....	1 in
Rear	.....	1 in
Top	.....	5/8 in

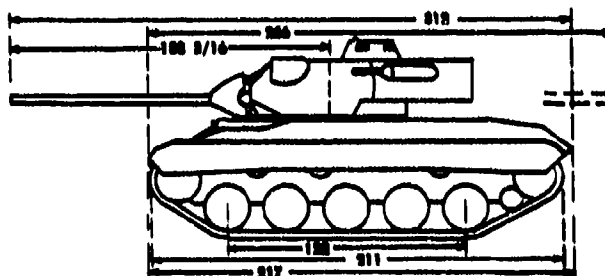
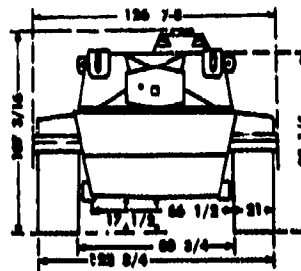
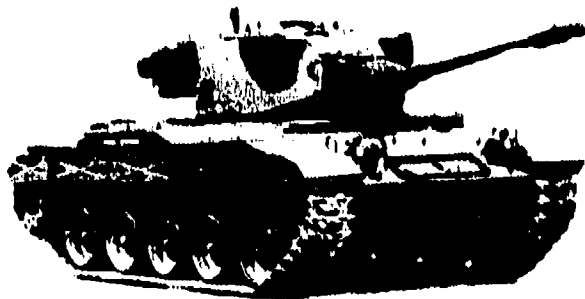
VISION AND SIGHTING EQUIPMENT

Periscope, vision	.....	M6
Periscope, commander's	.....	M6
Quadrant elevation	.....	M9
Telescope, gunner's	.....	M7C
Periscope, gunner's	.....	M10C

CAPACITIES

Fuel:		
Total	.....	110 gal
Right tank	.....	55 gal
Left tank	.....	55 gal
Cooling system	.....	10 gal
Crankcase (each)	.....	8 qt
Engine air cleaner (each)	.....	3 qt
Transmission (each)	.....	15 qt
Differential	.....	20 qt
Transfer case	.....	4 1/2 qt
Final drive (each)	.....	4 qt
Ammunition:		
Primary weapon	.....	48 rounds
Secondary weapons:		
Caliber .50	.....	480 rounds
Caliber .30	.....	8750 rounds

TANK, LIGHT, T41



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
 Purpose: To provide mobile fire power and crew protection for offensive combat. To provide a tank with complete azimuth and elevation stabilization together with a range finder.
 Classification: This vehicle may eventually replace the M24 light tank. To date it is not standard.
 Manufacturer: Detroit Arsenal.
 Technical manuals: Not assigned.
 Lubrication order: Not assigned.
 Parts list: Not assigned.

Price of vehicle	.....\$285,000
Crew (number of personnel)	.....4
Weight, combat loaded	.....25.8 tons
Length, over-all:	
Gun in firing position	.....26.0 ft
Gun in traveling position	.....21.93 ft
Width, over-all	.....10.80 ft
Height, over-all	.....8.9 ft
Shipping dimensions (estimated)	.....1440 cu ft
160 sq ft	
Tread (center to center of track)	.....101.75 in
Ground clearance	.....17.8 in
Ground pressure	.....10 lb/sq in
Electrical system	.....24-volt
Communication system	.....Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	.....19.0 hp per ton
Cruising range	.....150 mi
Fuel consumption (estimated)	.....1 mpg
Maximum allowable speed	.....41.8 mph
Maximum gradability	.....46 per cent
Turning radius	.....Pivot to infinity
Fording depth	.....44 in
Maximum trench vehicle will cross	.....66 in
Maximum vertical obstacle can negotiate	.....86 in
Range of primary armament:	
With HE shell or WP smoke at 45° 37' or 811 mils	.....Unknown
With APC-T projectile at 45° or 800 mils	.....Unknown
Velocity of primary armament:	
With HE shell or WP smoke at 45° 37' or 811 mils	.....Unknown
With APC-T projectile, at 45° 37' or 800 mils	.....Unknown
With HVAP-T shot or HEAT	.....Unknown

ENGINE

Make (manufacturer)	.....Continental
Model number	.....AOS-895-1
Brake horsepower	.....500
Torque	.....945 ft lb @ 2400 rpm
Maximum governed speed	.....2800 rpm
Construction and design	.....Opposed, I-head
Number of cylinders	.....6
Displacement, total	.....895 cu in
Compression ratio	.....5.5: 1
Cooling system	.....Air
Ignition	.....Magneto

CHASSIS AND POWER TRAIN

Clutch	.....None
Transmission	.....Cross-drive, with torque converter
Control	.....wobble stick
Speeds forward	.....2

Speeds reverse	.....1
Differential	.....Cross-drive
Steering control	.....wobble stick
Brakes:	
Operating principle	.....Multiple disc
Control	.....Foot pedal
Drive	.....Rear sprocket
Number of wheels	.....10 (dual)
Suspension	.....Individual torsion bar
Tracks:	
Construction	.....Center guide, steel
Shoes or blocks	.....78 ea
Width	.....21 in

ARMAMENT

Primary Armament	.....Gun, 76-mm, T91
Traverse:	
Right	.....160 deg
Left	.....160 deg
Elevation	.....30 deg
Depression	.....9 deg
Recoil mechanism	.....Concentric
Stabilizer system	.....Complete azimuth and elevation by Vickers.
Secondary armament:	
Cal .50 MG	.....2 (1-AA; 1-coaxial)
Cal .30 MG	.....2 (turret blisters)

ARMOR

Hull:	
Construction	.....Homogeneous plate
Thickness:	
Front	.....1 in
Sides	.....1 in
Rear	......78 in
Top	......50 in
Floor	.....1.25-.375 in
Turret:	
Ring diameter	.....69 in
Construction	.....Homogeneous plate
Thickness:	
Front	.....1.7 in
Sides	.....1 in
Rear	.....1 in
Top	......80 in

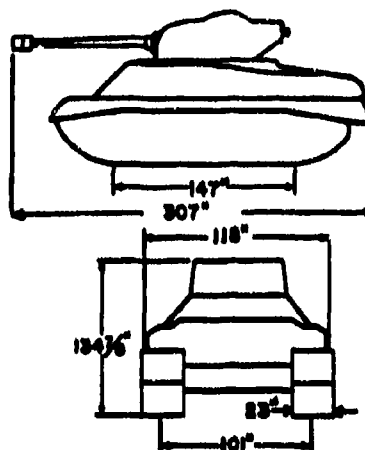
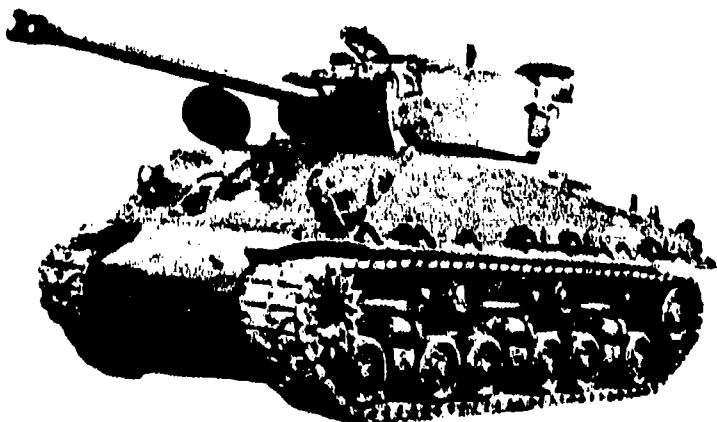
VISION AND SIGHTING EQUIPMENT

Periscope, vision	.....M17
Periscope, commander's	.....M15
Range finder	.....Coincidence
Quadrant elevation	.....M9
Periscope, gunner's	.....M10

CAPACITIES

Fuel:	
Total	.....148 gal
Cooling system	.....None
Crankcase	......88 qt
Engine air cleaner (each)	.....Unknown
Transmission	.....Unknown
Final drive	.....Unknown
Ammunition:	
Primary weapon	.....40 rounds
Secondary weapons:	
Cal .50	.....1540 rounds
Cal .30	.....3500 rounds

TANK, MEDIUM, M4A3E8



GENERAL DATA

Purpose: To provide mobile fire power and crew protection for offensive combat.

Classification: To date this vehicle is one of the standard medium tanks. Its design has been made obsolete by medium tanks M46, M48, and T48, but for issue it remains standard. Eventually the new T48 or a similar designed tank will replace it.

Manufacturer: Detroit Tank Arsenal (Chrysler).

Technical manuals: 9-750, 9-1731B, 9-1701G, 9-1701K, 9-1750B, 9-1750K, 9-1825A, 9-1825B, 9-1825A, 9-1825A.

Lubrication order: DA LO 9-750.

Parts list: ORD 7 SNL G-204 and G-205, ORD 8 SNL G-204 and G-205, ORD 9 SNL G-204 and G-205.

Price of vehicle* \$54,838

Crew (number of personnel) 5

Weight, combat loaded 37.79 tons

Length, over-all:

Gun in firing position 24.75 ft

Gun in traveling position 24.75 ft

Width, over-all 9.76 ft

Height, over-all 9.76 ft

Shipping dimensions 2416 cu ft; 218 sq ft

Tread (center to center of track) 101.0 in

Ground clearance 17.12 in

Ground pressure 10.5 lb/sq in

Electrical system 24-volt

Communication system Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio 13.2 hp per ton

Cruising range 100 mi

Fuel consumption6 mpg

Maximum allowable speed86 mph

Maximum gradeability 60 per cent

Turning radius81 ft

Fording depth 36 in

Maximum trench vehicle will cross 30 in

Maximum vertical obstacle can negotiate 24 in

Range of primary armament:

With HE shell or WP smoke at 45° 37' or 811 mds 14,560 yds

With APC-T projectile at 45° or 800 mds 16,100 yds

Velocity of primary armament:

With HE shell or WP smoke at 45° 37' or 811 mds 2700 fps

With APC-T projectile at 45° or 800 mds 2600 fps

With HVAP-T shot or HEAT 2400 fps

ENGINE

Make (manufacturer) Ford

Model number GAA

Brake horsepower 500

Torque 950 ft lb @ 2160 rpm

Maximum governed speed 2800 rpm

Construction and design V, I-head

Number of cylinders 6

Displacement, total 1100 cu in

Compression ratio 7.5:1

Cooling system Liquid

Ignition Magneto

CHASSIS AND POWER TRAIN

Clutch Multiple disc

Transmission Synchromesh

Control Direct, hand lever

Speeds forward 5

Speeds reverse 1

* Price based on vehicle and artillery equipment.

Differential	Controlled
Steering control	Two hand levers
Brakes:	
Operating principle	Bands on differential
Control	Two hand levers
Drive	Front sprocket
Number of wheels	12 (dual)
Suspension	Horizontal volute spring
Tracks:	
Construction	Center guide, rubber and steel
Shoes or blocks	70 ea
Width	28 in

ARMAMENT

Primary armament	Gun, 76-mm, M1A2
Traverse:	
Right	360 deg
Left	360 deg
Elevation	25 deg
Depression	10 deg
Recoil mechanism	Hydro-Spring
Stabilizer system	Gym on elevation only
Secondary Armament:	
Cal .50 MG	1 (AA)
Cal .30 MG	1 (Coaxial) 1 (bow)

ARMOR

Hull:	Construction	Homogeneous, plate
Thickness:		
Front	3.5 in	
Sides	1.5 in	
Rear	1.5 in	
Top	.75 in	
Floor	1.0-1.5 in	
Turret:		
Ring diameter	69 in	
Construction	Homogeneous, cast	
Thickness:		
Front	2.5 in	
Sides	2.5 in	
Rear	2.5 in	
Top	1 in	

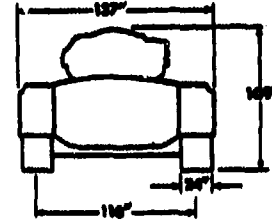
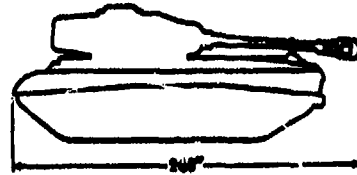
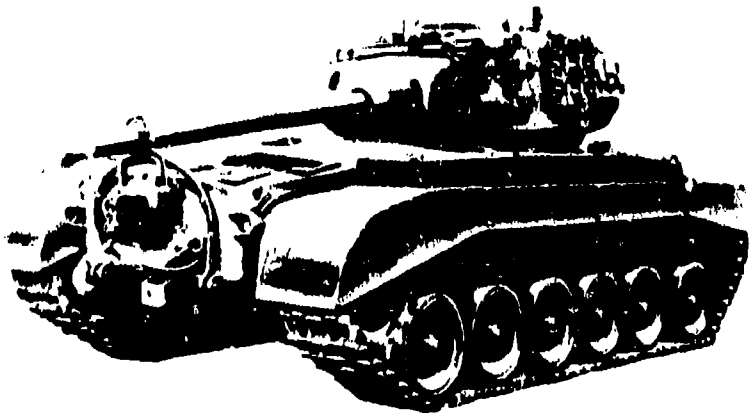
VISION AND SIGHTING EQUIPMENT

Periscopes, vision	M6
Periscopes, commander's	M6
Quadrant elevation	M6
Telescope, gunner's	M71D
Periscopes, gunner's	M4A1

CAPACITIES

Fuel:	
Total	168 gal
Right tank	84 gal
Left tank	84 gal
Cooling system	14 gal
Crankcase	32 qt
Engine air cleaner (each)	0.5 qt
Transmission	104 qt
Differential	Integral with transmission
Final drives	Integral with transmission
Ammunition:	
Primary weapon	71 rounds
Secondary weapons:	
Cal .50	600 rounds
Cal .30	6250 rounds

TANK, MEDIUM, M26



GENERAL DATA

Purpose: To provide mobility and crew protection for 90-mm gun for offensive combat.

Classification: To date this vehicle is one of the standard medium tanks. Its design has been superseded by the Medium Tank, M46, which is a major modification of the M26 tank. Eventually Medium Tank, T42, will replace these present standard medium tanks.

Manufacturer: Fisher Tank Division (GMC); Detroit Tank Arsenal.
Technical manuals: 9-735, 9-1701B, 9-1701G, 9-1705A, 9-1705F, 9-1705C, 9-1899A.

Lubrication order: DA 9-735.

Parts list: ORD 7 SNL G226, ORD 8 SNL G226, ORD 9 SNL G226.

Price of vehicle*	.....	\$81,024
Crew (number of personnel)	.....	5
Weight, combat loaded	.....	46 tons
Length, over-all:		
Gun in firing position	.....	27.9 ft
Gun in traveling position	.....	28.5 ft
Width, over-all	.....	11.5 ft
Height, over-all	.....	9.09 ft
Shipping dimensions	.....	2515.9 cu ft; 234.9 sq ft
Tread (center to center of track)	.....	110 in
Ground clearance	.....	17.2 in
Ground pressure	.....	11.99 lb/sq in
Electrical system	.....	24-volt
Communication system	.....	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	.....	9.2 hp per ton
Cruising range	.....	100 mi
Fuel consumption	.....	6 mpg (approx)
Maximum allowable speed	.....	30 mph
Maximum grade/climb	.....	60 per cent
Turning radius	.....	61 ft
Fording depth	.....	48 in
Maximum trench vehicle will cross	.....	95 in
Maximum vertical obstacle can negotiate	.....	46 in
Range of primary armament:		
With HE shell or WP smoke at 45° or 811 mils	.....	19,560 yd
With APC-T projectile at 45° or 500 mils	.....	21,400 yd
Velocity of primary armament:		
With HE shell or WP smoke at 45° or 811 mils	.....	2700 fps
With APC-T projectile, at 45° or 500 mils	.....	2670 fps
With HVAP-T shot or HEAT	.....	3350 fps

ENGINE

Make (manufacturer)	.....	Ford
Model number	.....	GAF
Brake horsepower	.....	500
Torque	.....	950 ft lb @ 2100 rpm
Maximum governed speed	.....	2800 rpm
Construction and design	.....	V, I-head
Number of cylinders	.....	8
Displacement, total	.....	1100 cu in
Compression ratio	.....	7.5:1
Cooling system	.....	Liquid
Ignition	.....	Magneto

CHASSIS AND POWER TRAIN

Clutch	.....	None
Transmission	.....	Torquatic
Control	.....	Remote, hand lever

* Price based on vehicle plus auxiliary equipment.

Speeds forward	.....	3
Speeds reverse	.....	1
Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes:		
Operating principle	.....	Band on differential
Control	.....	Two hand levers
Drive	.....	Rear sprocket
Number of wheels	.....	12 (dual)
Suspension	.....	Torsion bar
Tracks:		
Construction	.....	Center guide, rubber and steel
Shoes or blocks	.....	82 ea
Width	.....	25 in

ARMAMENT

Primary armament	.....	Gun, 90-mm, M3
Traverse:		
Right	.....	380 deg
Left	.....	380 deg
Elevation	.....	10 deg
Depression	.....	10 deg
Recoil mechanism	.....	Hydro-Spring
Stabilizer system	.....	None
Secondary armament:		
Cal 50 MG	.....	1 (AA)
Cal 50 MG	.....	1 (coaxial) 1 (bow)

ARMOR

Hull:		
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	4 in
Sides	.....	2-3 in
Rear	.....	2 in
Top	.....	3.75 in
Floor	.....	1.0-3.5 in
Turret:		
Ring diameter	.....	69 in
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	4 in
Sides	.....	3 in
Rear	.....	3 in
Top	.....	3.75 in

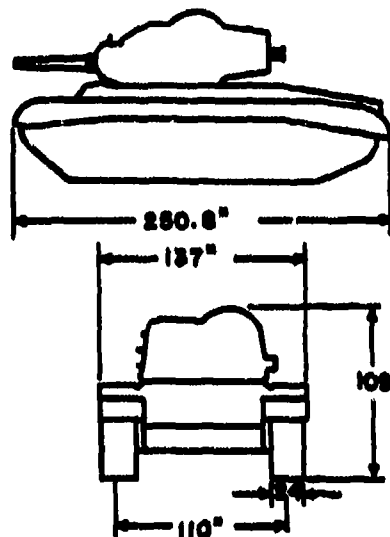
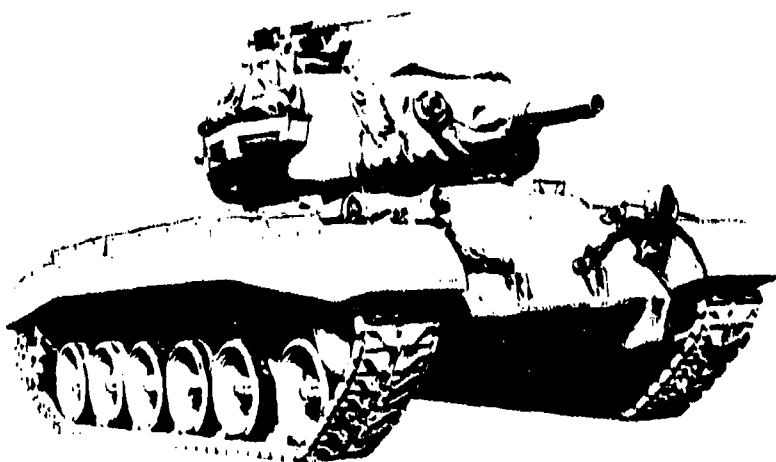
VISION AND SIGHTING EQUIPMENT

Periscope, vision	.....	M6
Periscope, commander's	.....	M6
Quadrant elevation	.....	M9
Telescope, gunner's	.....	M71C
Periscope, gunner's	.....	M10F

FUEL CAPACITIES

Total	.....	191.5 gal
Right tank	.....	75.5 gal
Left tank	.....	116 gal
Cooling system	.....	22 gal
Crankcase	.....	.82 qt
Engine air cleaner (each)	.....	0.5 qt
Transmission	.....	.54 qt
Differential	.....	.18 qt
Final drive (each)	.....	1.75 qt
Ammunition:		
Primary weapon	.....	70 rounds
Secondary weapons:		
Cal 50	.....	550 rounds
Cal 30	.....	5000 rounds

TANK, MEDIUM, M45



GENERAL DATA

Purpose: To provide mobility and crew protection for the 105-mm howitzer for offensive combat.

Classification: This vehicle is standard. In design it supercedes the M4A3E8 equipped with 105-mm howitzer. To date no newer design tank carrying the 105-mm howitzer has been made for issue.

Manufacturer: Fisher Tank Division (GMC), Detroit Tank Arsenal.
Technical manuals: 9-735, 9-1735A, 9-1735B, 9-1735C, 9-1731B, 9-1731C.

Lubrication order: DA LO 9-735.
Parts list: ORD 7 SNL G236, ORD 8 SNL G236, ORD 9 SNL G236.

Price of vehicle*	.....	\$78,577
Crew (number of personnel)	.....	5
Weight, combat loaded	.....	46.25 tons
Length, over-all	.....	30.0 ft
Gun in firing position	.....	30.0 ft
Gun in traveling position	.....	11.5 ft
Width, over-all	.....	9.09 ft
Height, over-all	.....	9.09 ft
Shipping dimensions (estimated)	.....	2315.0 cu ft (estimated) 254.0 sq ft
Tread (center to center of track)	.....	110 in
Ground clearance	.....	17.3 in
Ground pressure	.....	11.99 lb/sq in
Electrical system	.....	24-volt
Communication system	.....	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	.....	9.3 hp per ton
Cruising range	.....	100 mi
Fuel consumption	.....	.6 mpg (approx)
Maximum allowable speed	.....	30 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	31 ft
Fording depth	.....	45 in
Maximum trench vehicle will cross	.....	45 in
Maximum vertical obstacle can negotiate	.....	46 in
Range of primary armament:		
With HE shell or WP smoke at 45° or 811 mils	.....	12,205 yds
Velocity of primary armament:		
With HE shell or WP smoke at 45° or 811 mils	.....	1550 fps
With HVAP-T shot or HEAT	.....	1250 fps

ENGINE

Make (manufacturer)	.....	Ford
Model number	.....	GAF
Brake horsepower	.....	500
Torque	.....	950 ft lb @ 2100 rpm
Maximum governed speed	.....	3600 rpm
Construction and design	.....	V, I-head type
Number of cylinders	.....	8
Displacement, total	.....	1100 cu in
Compression ratio	.....	7.5:1
Cooling system	.....	Liquid
Ignition	.....	Magneto

CHASSIS AND POWER TRAIN

Clutch	.....	None
Transmission	.....	Toromatic
Control	.....	Remote, hand lever
Speeds forward	.....	3
Speed, reverse	.....	1

*Price based on vehicle plus artillery equipment.

Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes:		
Operating principle	.....	Band on differential
Control	.....	Two hand levers
Drive	.....	Rear sprocket
Number of wheels	.....	12 (Dual)
Suspension	.....	Torsion bar
Tracks:		
Construction	.....	Center guide Rubber and Steel
Shoes or blocks	.....	23 ea
Width	.....	23 in

ARMAMENT

Primary armament	.....	Howitzer, 105-mm, M4
Traverse:		
Right	.....	640 deg
Left	.....	640 deg
Elevation	.....	35 deg
Depression	.....	10 deg
Recoil mechanism	.....	Hydro-Spring
Stabilizer system	.....	None
Secondary armament:		
Cal .50 MG	.....	1 (AA)
Cal .50 MG	.....	1 (Bow) 1 (Coastal)

ARMOR

Hull:		
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	4 in
Sides	.....	3 in
Rear	.....	3 in
Top	.....	3.75 in
Floor	.....	1.0-5.0 in
Turret:		
Ring diameter	.....	69 in
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	4 in
Sides	.....	3 in
Rear	.....	3 in
Top	.....	3.75 in

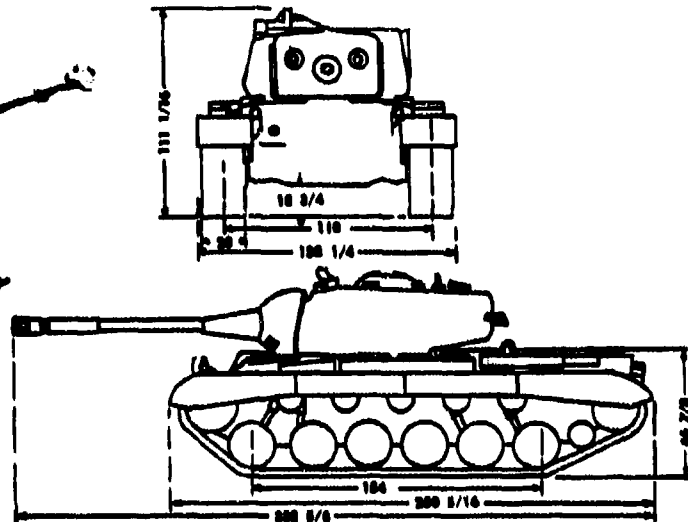
VISION AND SIGHTING EQUIPMENT

Periscope, vision	.....	M16
Periscope, commander's	.....	M15
Quadrant, elevation	.....	M9
Periscope, gunner's	.....	M76C
Periscope, gunner's	.....	M10D
Periscope, panoramic	.....	M39A1

CAPACITIES

Fuel:		
Total	.....	191.5 gal
Right tank	.....	75.5 gal
Left tank	.....	116 gal
Cooling system	.....	22 gal
Crankcase	.....	32 qt
Engine air cleaner	.....	3.5 qt
Transmission	.....	34 qt
Differential	.....	18 qt
Final drive (each)	.....	7 qt
Ammunition:		
Primary weapon	.....	74 rounds
Secondary weapons:		
Cal .50	.....	440 rounds
Cal .30	.....	5000 rounds

TANK, MEDIUM, M46



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To provide mobility and crew protection for the 90-mm gun for offensive combat. To provide increased performance characteristics, reliability, and mobility in a medium tank.
Classification: This vehicle is the standard medium tank. At present it is under accelerated field tests. Approximately 800 M46 tanks were modified to provide them. Due to the limited number available only part of the medium tank units will receive them. Others will remain equipped with M46, M45, or M4A3E8 medium tanks.

Manufacturer: Detroit Arsenal.
Technical manuals: 9-718, 9-1718A, 9-1718B.
Lubrication order: DA LO 9-718.
Parts list: ORD 7 SNL G-244, ORD 8 SNL G-244, ORD 9 SNL G-244.

Price of vehicle* Unknown
Crew (number of personnel) 5
Weight, combat loaded 46 tons
Length, over-all:
 Gun in firing position 27.7 ft
 Gun in traveling position 20.1 ft
Width, over-all 11.5 ft
Height, over-all 10.4 ft
Shipping dimensions 2466 cu ft; (estimated) 228 sq ft
Tread (center to center of track) 110 in
Ground clearance 18.75 in
Ground pressure 13.5 lb/sq in
Electrical system 24-volt
Communication system Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio 17.0 hp per ton
Cruising range 90.0 mi
Fuel consumption 4 mpg
Maximum allowable speed 30 mph
Maximum gradability 60 per cent
Turning radius Pivot to infinity
Fording depth 48 in
Maximum trench vehicle will cross 102.0 in
Maximum vertical obstacle can negotiate 48 in
Range of primary armament:
 With HE shell or WP smoke at 45° or 811 mils 19,860 yd
 With APC-T projectile at 45° or 800 mils 21,400 yd
Velocity of primary armament:
 With HE shell or WP smoke at 45° or 811 mils 2700 fps
 With APC-T projectile at 45° or 800 mils 3670 fps
 With HVAP-T shot or HEAT 3380 fps

ENGINE

Make (manufacturer) Continental
Model number AV-1790-B
Brake horsepower 510
Torque 1610 ft lb @ 2200 rpm
Maximum governed speed 2800 rpm
Construction and design V, I-head
Number of cylinders 12
Displacement, total 1790 cu in
Compression ratio 6.5:1
Cooling system Air
Ignition Magneto

CHASSIS AND POWER TRAIN

Clutch None
Transmission Cross-drive
Control Remote, wobble stick
Speeds forward 2
Speeds reverse 1

Differential Cross-drive
Steering control Wobble stick
Brakes:
 Operating principle Mechanical, multiple disc
 Control Manual, foot pedal
Drive Rear sprocket
Number of wheels 12 (dual)
Suspension Individual torsion bar
Tracks:
 Construction Center guide, rubber and steel
 Shoes or blocks 82 ea
 Width 83 in

ARMAMENT

Primary armament Gun, 90-mm, M5A1
Traverse:
 Right 660 deg
 Left 660 deg
Elevation 50 deg
Depression 10 deg
Recoil mechanism Hydro-spring
Stabiliser system None
Secondary Armament:
 Cal .50 MG 1 (AA)
 Cal .30 MG 1 (Bow) 1 (Coaxial)

ARMOR

Hull:
Construction Homogeneous cast
Thickness:
 Front 4 in
 Sides 2-3 in
 Rear 3 in
 Top 5.75 in
 Floor 1.0-5.0 in
Turret:
Ring diameter 69 in
Construction Homogeneous cast
Thickness:
 Front 4 in
 Sides 3 in
 Rear 3 in
 Top 1 in

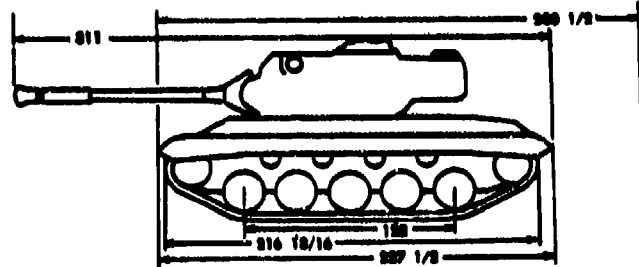
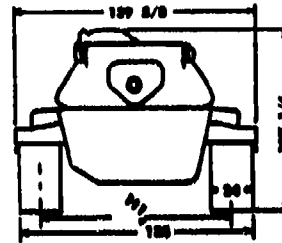
VISION AND SIGHTING EQUIPMENT

Periscope, vision M10
Periscope, commander's M18
Quadrant elevation M9
Telescope, gunner's T178
Periscope, gunner's M10F

CAPACITIES

Fuel:
 Total 270 gal
 Right tank 110 gal
 Left tank 160 gal
Cooling system None
Crankcase 7.2 qt
Engine air cleaner (each) 3.5 qt
Transmission 100 qt
Differential None
Final drive (each) 8 qt
Ammunition:
 Primary weapon 70 rounds
 Secondary weapons:
 Cal .50 550 rounds
 Cal .30 5000 rounds

TANK, MEDIUM, T42



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To provide mobility and crew protection for the 90-mm gun for offensive combat. To provide a medium tank with all the latest technological developments in weapons, fire control, armor, power trains, and running gears.
Classification: This tank is not standard. It is being developed at present and if proven satisfactory will supersede present medium tanks.
Manufacturer: Detroit Arsenal.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	4
Weight, combat loaded	38.45 tons
Length, over-all:	
Gun in firing position	35.0 ft
Gun in traveling position	33.3 ft
Hull	11.5 ft
Width, over-all	8.9 ft
Height, over-all	Unknown
Shipping dimensions	Unknown
Tread (center to center of track)	111 in
Ground clearance	10.76 in
Ground pressure	15 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	18 hp per ton
Cruising range	100 mi
Fuel consumption	Unknown
Maximum allowable speed	30 mph
Maximum gradability	80 per cent
Turning radius	Pivot to infinity
Fording depth	4.5 in
Maximum trench vehicle will cross	7.5 in
Maximum vertical obstacle negotiable	50 in
Range of primary armament:	
With HE shell or WP smoke at 45° or 811 mils	Unknown
With APC-T projectile at 45° or 800 mils	Unknown
Velocity of primary armament:	
With HE shell or WP smoke at 45° or 811 mils	Unknown
With APC-T projectile, at 45° or 800 mils	Unknown
With HVAP-T shot or HEAT	Unknown

ENGINE

Make (manufacturer)	Continental
Model number	AOS-895-1
Brake horsepower	500
Torque	945 ft lb @ 2400 rpm
Maximum governed speed	2800 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	895 cu in
Compression ratio	5.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Remote, wobble stick
Speeds forward	3
Speeds reverse	1

Differential	Cross-drive
Steering control	Remote, wobble stick
Brakes:	
Operating principle	Multiple disc
Control	Foot pedal
Drive	Rear sprocket
Number of wheels	10 (Dual)
Suspension	Independent torsion bar
Tracks:	
Construction	Center guide steel
Shoes or blocks	76 ea
Width	34 in

ARMAMENT

Primary armament	Gun, 90-mm, T119
Traverse:	
Right	360 deg
Left	360 deg
Elevation	30 deg
Depression	10 deg
Recoil mechanism	Concentric
Stabilizer system	Vickers on elevation
Secondary armament:	
Cal .50 MG	1 (AA) 1 (Coaxial)
Cal .30 MG	None

HULL: ARMOR

Construction	Homogeneous cast
Thickness:	
Front	4 in
Sides	3-0 in
Rear	1 in
Top	1 in
Floor	1.0-50 in
Turnout:	
Ring diameter	60 in
Construction	Homogeneous cast
Thickness:	
Front	4 in
Sides	3 in
Rear	3 in
Top	1 in

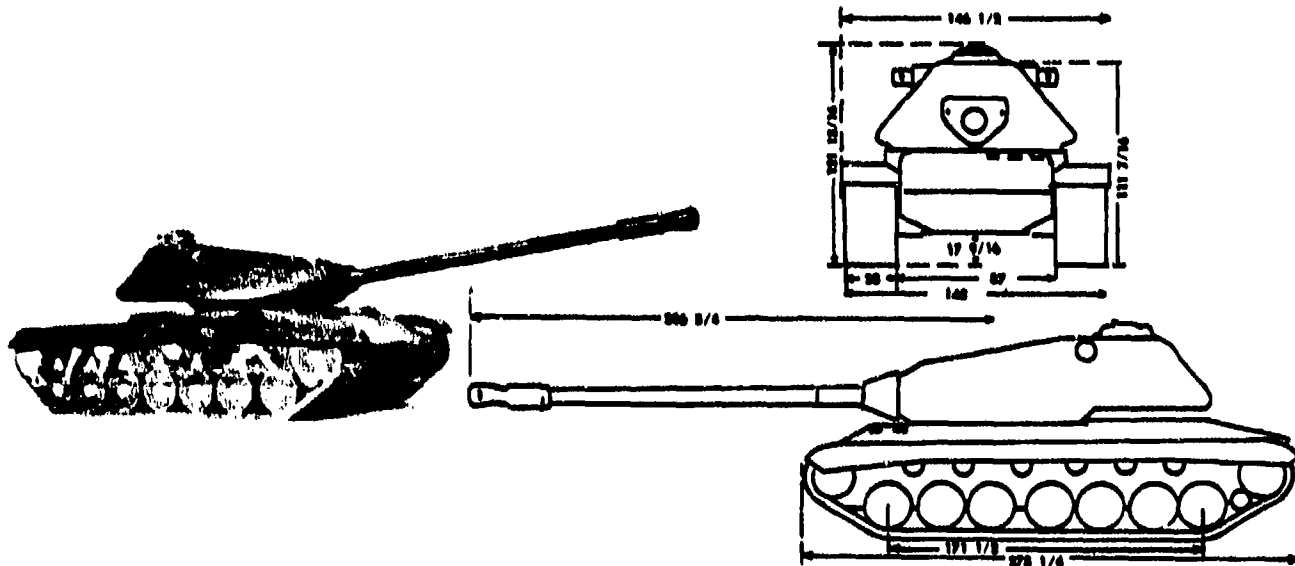
VISION AND SIGHTING EQUIPMENT

Periscopes, vision	Unknown
Periscopes, commander's	M15
Range finder	Stereo
Quadrant elevation	M9
Telescope, gunner's	Unknown
Periscopes, gunner's	M10

FUEL: CAPACITIES

Total	Unknown
Cooling system	None
Crankcase	55 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Final drive (each)	Unknown
Ammunition:	
Primary weapon	60 rounds
Secondary weapons:	
Cal .50	1950 rounds

TANK, HEAVY, T43



GENERAL DATA

Purpose: To provide mobility and crew protection for the 150-mm gun for offensive combat. To provide in a heavy tank all the latest developments in weapons, fire power, armor, power train, and running gear.

Classification: This is not yet a standard tank. It is being developed and if proved satisfactory will supersede all existing heavy tanks. To date no suitable heavy tank is available for issue.

Manufacturer: Detroit Arsenal.

Technical manual: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle Unknown

Crew (number of personnel) 5

Weight, combat loaded 58 tons

Length, over-all:

Gun in firing position 37.6 ft

Gun in traveling position 33.5 ft

Width, over-all 11.9 ft

Height, over-all 10.1 ft

Shipping dimensions Unknown

Tread (center to center of track) 117 in

Ground clearance 17.51 in

Ground pressure 18 lb/sq in

Electrical system 24-volt

Communication system Radio and Interphone

PERFORMANCE

Gross horsepower to weight ratio 14.0 hp per ton

Cruising range 100 mi

Fuel consumption Unknown

Maximum allowable speed 33.3 mph

Maximum gradability 60 per cent

Turning radius Pivot to infinity

Fording depth 48 in

Maximum trench vehicle will cross 60 in

Maximum vertical obstacle can negotiate 60 in

Range of primary armament:

With HE shell or WP smoke at 45° or 811 mls Unknown

With APC-T projectile at 45° or 800 mls Unknown

Velocity of primary armament:

With HE shell or WP smoke at 45° or 811 mls Unknown

With APC-T projectile at 45° or 800 mls Unknown

With HVAP-T shot or HEAT Unknown

ENGINE

Make (manufacturer) Continental

Model number AV 1790-5

Brake horsepower 810

Torque 1610 ft lb @ 3300 rpm

Maximum governed speed 3300 rpm

Construction and design V, I-head

Number of cylinders 12

Displacement, total 1790 cu in

Compression ratio 6.5:1

Cooling system Air

Ignition Magneto

CHASSIS AND POWER TRAIN

Clutch None

Transmission Cross-drive

Control Remote, wobble stick

Speeds forward 3

Speeds reverse 1

Differential	.....	Cross-drive
Steering control	.....	Remote, wobble stick
Brakes:		
Operating principle	.....	Mechanical, multiple disc
Control	.....	Manual, foot pedal
Drive	.....	Near sprocket
Number of wheels	.....	14 (dual)
Suspension	.....	Independent, torsion bar
Tracks:		
Construction	.....	Center guide, steel
Shoes or blocks	.....	30 ea
Width	.....	33 in

ARMAMENT

Primary armament	.....	Gun, 150-mm, T155
Traverse:		
Right	.....	390 deg
Left	.....	390 deg
Elevation	.....	15 deg
Depression	.....	8 deg
Recoil mechanism	.....	Concentric
Stabilizer system	.....	None
Secondary armament:		
Cal .50 MG	.....	1 (AA) 1 (coaxial)

Hull: ARMOR

Construction	.....	Homogeneous cast
Thickness:		
Front	.....	5 in
Sides	.....	3.5 in
Rear	.....	1.5 in
Top	.....	1.0 in
Floor	.....	1.0-3.0 in
Turret:		
Ring diameter	.....	80 in
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	5 in
Sides	.....	3.5 in
Rear	.....	1.5 in
Top	.....	1.5 in

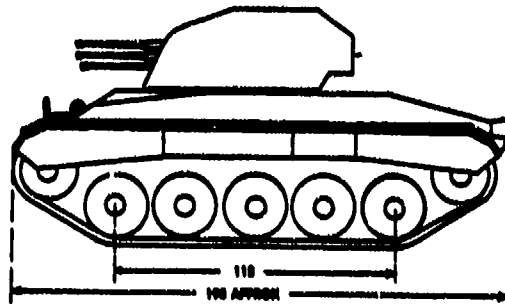
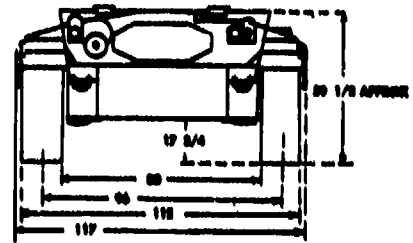
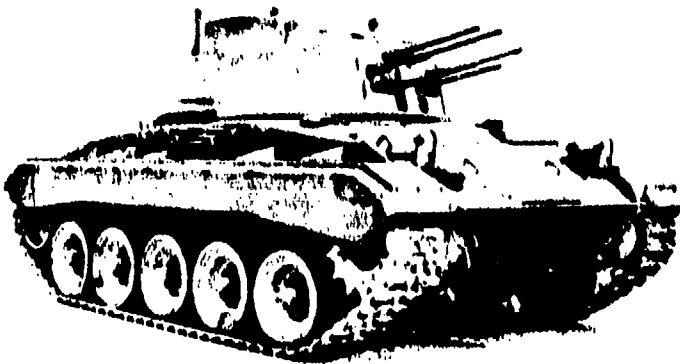
VISION AND SIGHTING EQUIPMENT

Periscope, vision	.....	Unknown
Periscope, commander's	.....	M15
Range finder	.....	Stereo
Quadrant elevation	.....	M9
Periscope, gunner's	.....	M10

Fuel: CAPACITIES

Total	.....	Unknown
Cooling system	.....	None
Crankcase	.....	73 qt
Engine air cleaner (each)	.....	Unknown
Transmission	.....	Unknown
Differential	.....	Integral with transmission
Final drive (each)	.....	Unknown
Ammunition:		
Primary weapon	.....	60 rounds
Secondary weapons:		
Cal .50	.....	1980 rounds

CARRIAGE, MOTOR, MULTIPLE GUN, T77



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: Highly mobile armored, multiple, caliber .50 antiaircraft weapon capable of accompanying armored units.
Classification: A definite requirement exists in the armored division for a vehicle of this type. This vehicle is undergoing field tests at present and will probably fill the requirement.
Manufacturer: United Shoe Machinery Corporation.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	.....	Unknown
Crew (number of personnel)	.....	4
Weight, combat loaded	.....	19 tons
Length, over-all	.....	19.8 ft
Width, over-all	.....	9.75 ft
Height, over-all (estimated)	.....	9 ft
Shipping dimensions (estimated)	.....	148 1/2 cu ft; 139 sq ft
Tread (center to center of track)	.....	66 in
Ground clearance	.....	17.75 in
Ground pressure	.....	10.6 lb/sq in
Electrical system	.....	24-volt
Communication system	.....	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	.....	11.1 hp per ton
Cruising range	.....	150 mi
Fuel consumption	.....	1.9 mpg
Maximum allowable speed	.....	38 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	85 ft
Fording depth	.....	40 in
Maximum trench vehicle will cross	.....	78 in
Maximum vertical obstacle can negotiate	.....	66 in

ENGINE

NOTE: This vehicle has two engines as described below.

Make (manufacturer)	.....	Cadillac
Model number	.....	44724
Brake horsepower (each)	.....	110
Torque	.....	240 ft lb @ 1300 rpm
Brake horsepower (each)	.....	110
Construction and design	.....	V, L-head
Number of cylinders (each)	.....	8
Displacement, total (each engine)	.....	346 cu in
Compression ratio	.....	7.08:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

Clutch	.....	None
Transmission	.....	Hydra-Matic
Control	.....	Automatic
Speeds	.....	4
Transfer case	.....	Synchromesh
Control	.....	Remote, hand lever
Speeds forward	.....	4
Speeds reverse	.....	1
Differential	.....	Controlled
Steering control	.....	Two-hand levers
Brakes:		
Operating principle	.....	Mechanical, band
Control	.....	Two hand levers

Drive	.....	Front sprocket
Number of wheels	.....	10 (dual)
Suspension	.....	Individual torsion bar
Tracks:		
Construction	.....	Center guide, steel
Shoes or blocks	.....	78 ea
Width	.....	16 in

ARMAMENT

Primary armament	.....	MG, Cal .50 (6 each)
Traverse:		
Right	.....	600 Deg
Left	.....	600 Deg
Elevation	.....	85 Deg
Depression	.....	10 Deg
Secondary armament:		
Cal .30 MG	.....	1 (bow)

ARMOR

Hull:		
Construction	.....	Homogeneous plate
Thickness:		
Front	.....	1 in
Sides	.....	1 in
Rear	.....	1 in
Top	.....	1/2 in
Floor	.....	1/2 in
Turret:		
Ring diameter	.....	60 in
Construction	.....	Homogeneous cast
Thickness:		
Front	.....	1/2 in
Sides	.....	1/2 in
Rear	.....	1/2 in
Top	.....	1/2 in

VISION AND SIGHTING EQUIPMENT

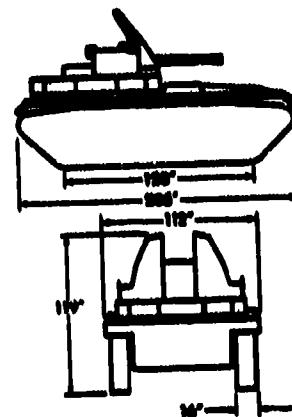
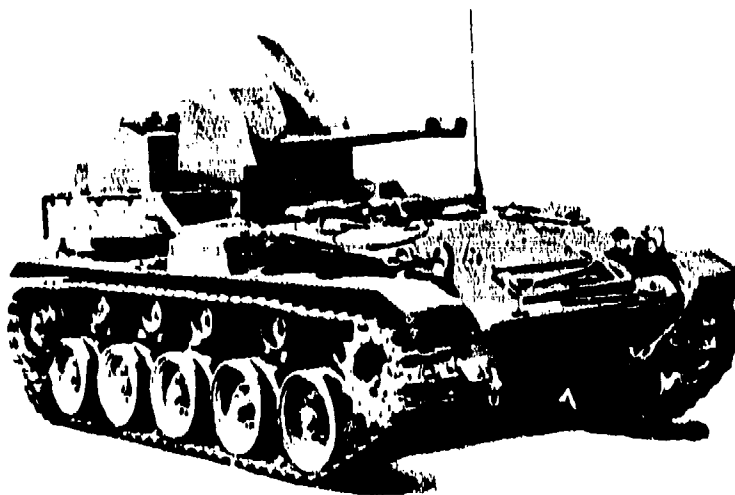
Periscope, vision	.....	M6 (8 ea)
Computing, sights	.....	T8M1 (8 ea)

CAPACITIES

Fuel:		
Total	.....	110 gal
Right tank	.....	55 gal
Left tank	.....	55 gal
Cooling system	.....	10 gal
Crankcase (each)	.....	8 qt
Engine air cleaner (each)	.....	0 qts
Transmission (each)	.....	18 qts
Differential	.....	20 qts
Transfer case	.....	4 1/2 qts
Final drive (each)	.....	1 qt
Ammunition:		
Cal .50	.....	6700 rounds
Cal .30	.....	2500 rounds

ADDITIONAL DATA

CARRIAGE, MOTOR, TWIN 40-MM GUN, M19A1



GENERAL DATA

Purpose: To provide mobility for the twin 40-mm guns for anti-aircraft protection. To provide armor protection for driver and crew.

Classification: This vehicle is standard. At present only a limited number are available for issue. Detroit Arsenal is now assembling these vehicles.

Manufacturer: Detroit Arsenal.
Technical manuals: 9-787, 9-1727K, 9-1729A, 9-1729B, 9-1729C, 9-1828A, 9-1828B, 9-1829A.

Lubrication order: DA LO 9-787

Parts list: ORD 7 SNL G200, ORD 8 SNL G200, ORD 9 SNL G200.

Price of vehicle* \$55,751

Crew (number of personnel) 6

Weight, combat loaded 19.5 tons

Length, over-all 19.0 ft

Gun in firing position 19.0 ft

Gun in traveling position 9.78 ft

Width, over-all 9.9 ft

Height over-all 19.1 cu ft

Shipping dimensions 159.4 cu ft

Tread (center to center of track) 17.75 in

Ground clearance 9.4 in

Ground pressure 24 lb/sq in

Electrical system Radio and interphone

Communication system Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio 11.6 hp per ton

Cruising range 100 mi

Fuel consumption 6 mpg

Maximum allowable speed 60 mph

Maximum gradability 60 per cent

Turning radius 80 ft

Fording depth 48 in

Maximum trench 66 in

Maximum vertical obstacle can negotiate 66 in

Range of primary armament:

With HE shell or WP smoke at 45° or 811 mils 8800 yd

With APC-T projectile at 45° or 800 mils 9475 yd

Velocity of primary armament:

With HE shell or WP smoke at 45° or 811 mils 2870 fps

With APC-T projectile, at 45° or 800 mils 2870 fps

ENGINE

NOTE: This vehicle has two engines as described below.

Make (manufacturer) Cadillac

Model number 44724

Brake horsepower 110

Torque 240 ft lbs @ 1500 rpm

Rated speed (not governed) 1400 rpm

Construction and design V, L-head

Number of cylinders 8

Displacement, total (each engine) 646 cu in

Compression ratio 7.06 : 1

Cooling system Liquid

Ignition Battery, distributor

CHASSIS AND POWER TRAIN

Clutch None

Transmission Hydra-Matic

Control Automatic

* Price based on vehicle plus artillery equipment.

Speeds	.....	Synchromesh
Transfer case	.....	Remote, hand lever
Control	.....	.....
Speeds forward	.....	.....
Speeds reverse	.....	.....
Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes	.....	Band
Operating principle	.....	.....
Control	.....	Two hand levers
Drive	.....	Front sprocket
Number of wheels	.....	10 (dual)
Suspension	.....	Torsion bar
Tracks	.....	Center guide, steel, rubber
Construction	.....	.....
Shoes or blocks	.....	14 ea
Width	.....	18 in

ARMAMENT

Primary armament	.....	Gun, 40-mm (2 ea)
Traverse:	.....	.....
Right	.....	80 deg
Left	.....	80 deg
Elevation	.....	60 deg
Depression	.....	.....
Record mechanism	.....	Hydro-spring
Stabilizer system	.....	None
Secondary armament	.....	None

ARMOR

Hull:	.....	Homogeneous plate
Construction	.....	.....
Thickness:	.....	.....
Front	.....	80 in
Sides	.....	80 in
Rear	.....	80 in
Top	.....	80-87.5 in
Floor	.....	80-87.5 in
Turret:	.....	Unknown
Ring diameter	.....	.....
Construction	.....	Homogeneous plate
Thickness:	.....	.....
Front	.....	80 in
Sides	.....	80 in
Rear	.....	81 in
Top	.....	None

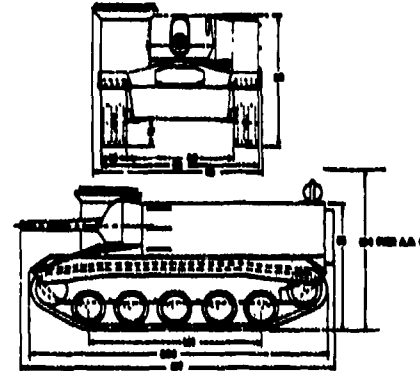
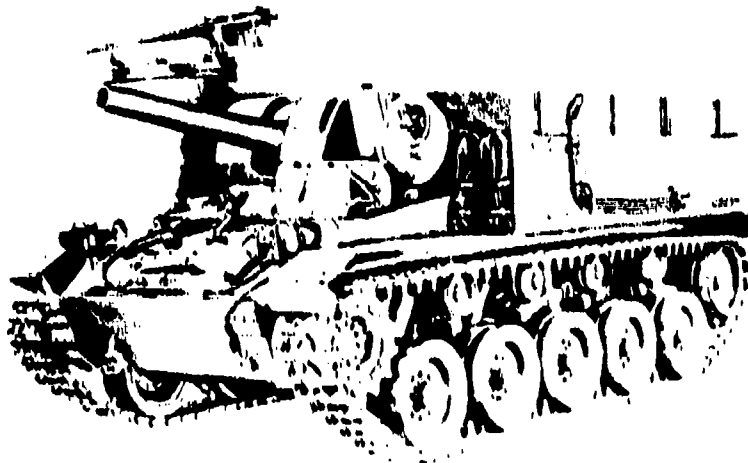
VISION AND SIGHTING EQUIPMENT

Periscope, vision (2 ea)	.....	M10 or M6
Sight, computing	.....	M10
Quadrant, gunner's	.....	M1

CAPACITIES

Fuel:	.....	110 gal
Total	.....	.....
Right tank	.....	55 gal
Left tank	.....	55 gal
Cooling system (each)	.....	10 gal
Crankcase (each)	.....	8 qts
Engine air cleaner (each)	.....	8 qts
Transmission	.....	18 qts
Differential	.....	20 qts
Transfer case	.....	4.8 qts
Final drive (each)	.....	2 qts
Ammunition:	.....	.....
Primary weapon	.....	358 rounds
Secondary weapons	.....	None

CARRIAGE, MOTOR, 105-MM HOWITZER, M37



GENERAL DATA

Purpose: To provide a mobile 105-mm howitzer with crew protection for artillery units of an armored division.

Classification: At present this vehicle is standard. Eventually it will be superseded by the T95 motor gun carriage which includes all the latest improvements.

Manufacturer: Cadillac Motor Car Division, GMC.

Technical manual: 9-717.

Lubrication order: DA LO 9-717.

Parts list: ORD 7 SNL G288, ORD 8 SNL G288, ORD 9 SNL G288.

Price of vehicle*\$40,088

Crew (number of personnel)4

Weight, combat loaded21.8 tons

Length, over-all:

 Gun in firing position18.1 ft

 Gun in traveling position18.1 ft

Width, over-all9.9 ft

Height, over-all9.8 ft

Shipping dimensions1652 cu ft; 159.4 sq ft

Tread (center to center of track)66 in

Ground clearance18.08 in

Ground pressure9.8 lb/sq in

Electrical system24-volt

Communication systemRadio and interphone

PERFORMANCE

Gross horsepower to weight ratio10.8 hp per ton

Cruising range100 mi

Fuel consumption4 mpg

Maximum allowable speed38 mph

Maximum gradability60 per cent

Turning radius23 ft

Fording depth48 in

Maximum trench vehicle will cross66 in

Maximum vertical obstacle can negotiate66 in

Range of primary armament:

 With HE Shell or WP smoke at 45° 37' or 811 mls12,208 yd

Velocity of primary armament:

 With HE shell or WP smoke at 45° 37' or 811 mls1880 fps

ENGINE

NOTE: This vehicle has two engines as described below.

Make (manufacturer)Cadillac

Model number44T84

Brake horsepower110

Torque240 ft lb @ 1800 rpm

Rated speed (not governed)3400 rpm

Construction and designV, L-head

Number of cylinders8

Displacement, total (each engine)346 cu in

Compression ratio7.08:1

Cooling systemLiquid

IgnitionBattery, distributor

CHASSIS AND POWER TRAIN

ClutchNone

TransmissionHydra-Matic

ControlAutomatic

Speeds1

Transfer caseSynchromesh

ControlRemote, hand lever

* Price based on vehicle plus artillery equipment.

Speeds forward8

Speeds reverse1

DifferentialControlled

Steering controlTwo hand levers

Brakes:

Operating principlesBand

ControlTwo hand levers

DriveFront sprocket

Number of wheels10 (dual)

SuspensionTorsion bar

Tracks:

ConstructionCenter guide, Steel, Rubber

Shoes or blocks80 ea

Width18 in

ARMAMENT

Primary armamentHowitzer, 105-mm M4

Traverse:

 Right28.5 deg

 Left28.5 deg

Elevation48 deg

Depression10 deg

Recoil mechanismHydro-spring

Stabilizer systemNone

Secondary armament:

 Cal 50 MG1 (AA)

ARMOR

Hull:

ConstructionHomogeneous plate

Thickness:

 Front50 in

 Sides80 in

 Rear80 in

 Top50 in

 Floor50-37 1/2 in

VISION AND SIGHTING EQUIPMENT

Periscope, visionM18

Quadrant, elevationT15

Telescope, gunner'sM78G

Telescope, panoramicM12AR

CAPACITIES

Fuel:

Total130 gal

 Right tank88 gal

 Left tank88 gal

Cooling system (each)10 gal

Crankcase (each)5 qt

Engine air cleaner (each)3 qt

Transmission (each)15 qt

Differential20 qt

Transfer case4.5 qt

Final drive (each)2 qt

Ammunition:

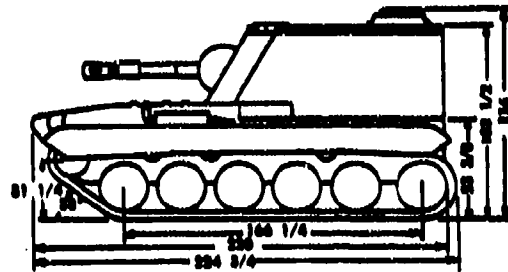
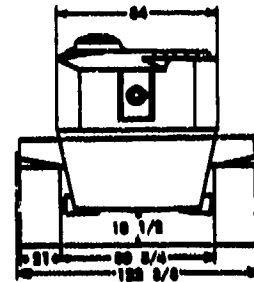
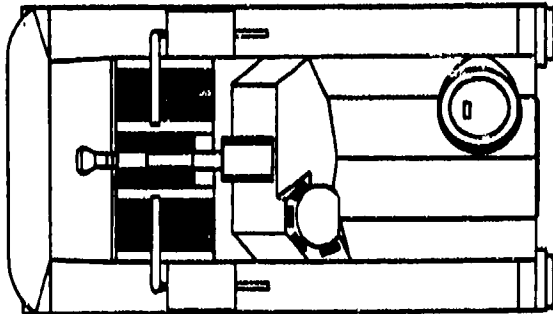
 Primary weapon120 rounds

 Secondary weapons:

 Cal .50900 rounds

ADDITIONAL DATA

CARRIAGE, MOTOR, 105-MM HOWITZER, T98



GENERAL DATA

NOTE: The specifications are tentative and subject to change.
Purpose: To provide an improved type, full-track, light, armored, highly maneuverable 105-mm howitzer motor carriage to give close support both to rapidly moving armored columns and standard infantry divisions.
Classification: This vehicle is not as yet standard. When put into production it will replace the Carriage, Motor, M37.
Manufacturer: Detroit Arsenal.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	5
Weight, combat loaded	85 tons
Length, over-all	18.6 ft
Gun in firing position	18.6 ft
Gun in traveling position	10.8 ft
Width, over-all	10.8 ft
Height, over-all	9.8 ft
Shipping dimensions (estimated)	2890 cu ft; 248 sq ft
Tread (center to center of track)	101 in
Ground clearance	18.5 in
Ground pressure	7.85 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	20 hp per ton
Cruising range	150 mi
Fuel consumption (estimated)	9 mpg
Maximum allowable speed	38.8 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	48 in
Maximum trench	78 in
Maximum vertical obstacle	60 in
Range of primary armament:	
With HE or WP smoke at 45° 07' or 811 mils	12,205 yd
Velocity of primary armament:	
With HVAP-T shot or HEAT	1250 fps

ENGINE

Make (manufacturer)	Continental
Model number	AOB 895-1
Brake horsepower	500
Torque	945 ft lbs @ 1400 rpm
Maximum governed speed	2800 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	895 cu in
Compression ratio	5.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Remote, wobble stick
Speeds forward	3
Speeds reverse	1
Differential	Cross-drive

Steering control	Remote, wobble stick
Brakes:	
Operating principle	Mechanical, multiple disc
Control	Manual, foot pedal
Drive	Front sprocket
Number of wheels	10, (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide steel, rubber
Shoes or blocks	78 ea
Width	21 in

ARMAMENT

Primary armament	Howitzer, 105-mm
Traverse:	
Right	90 deg
Left	90 deg
Elevation	90 deg
Depression	10 deg
Recoil mechanism	Concentric hydro-spring
Stabilizer system	None
Secondary armament:	1
Cal .50 MG	

ARMOR

Hull:	
Construction	Homogeneous plate
Thickness:	
Front	8 in
Sides	8 in
Rear	8 in
Top	8 in
Floor	8 in
Turret:	
Ring diameter	69 in
Construction	Homogeneous plate
Thickness:	
Front	8 in
Sides	8 in
Rear	8 in
Top	8 in

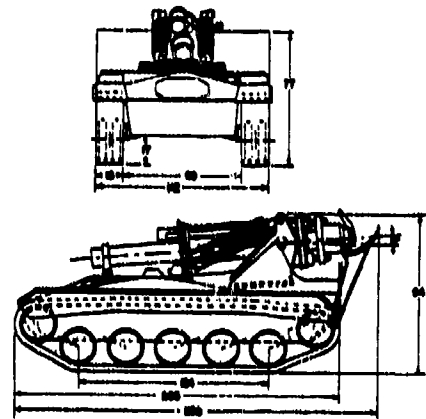
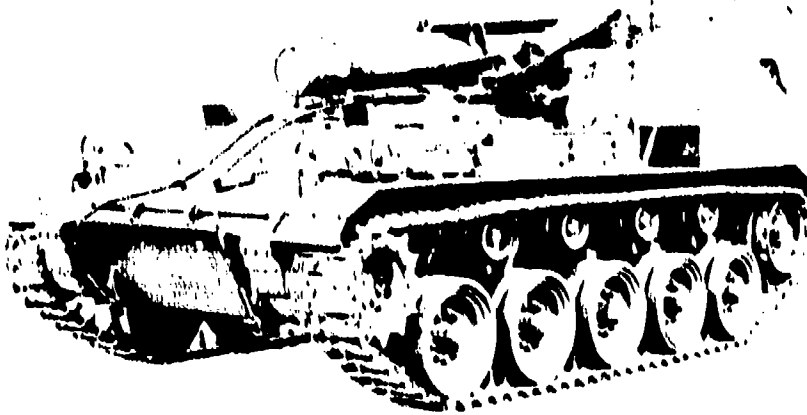
VISION AND SIGHTING EQUIPMENT

Periscope, vision	M17
Periscope, commander's	M18
Quadrant elevation	Unknown
Telescope, gunner's	T178
Telescope, panoramic	T148

CAPACITIES

Fuel:	
Total	160 gal
Cooling system	None
Crankcase	58 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Unknown
Final drive (each)	Unknown
Ammunition:	
Primary weapon	100 rounds
Secondary weapons:	
Cal .50	1100 rounds

CARRIAGE, MOTOR, 155-MM HOWITZER, M41



GENERAL DATA

Purpose: To provide a mobile 155-mm howitzer with crew protection for units of an armored division.

Classification: At present this vehicle is standard. It will eventually be superseded by the T-99 motor gun carriage.

Manufacturer: Cadillac.

Technical manuals: 9-744.

Lubrication order: DA LO 9-744.

Parts list: ORD 7 ENL G356, ORD 8 ENL G356, ORD 9 ENL G356.

Price of vehicle*\$44,150

Crew (number of personnel)4 for travel; 15 for firing

Weight, combat loaded21.85 tons

Length, over-all:

 Gun in firing position (estimated)80 ft

 Gun in traveling position19.16 ft

Width, over-all9 ft

Height, over-all8 ft

Shipping dimensions1468 cu ft; 179 sq ft

Tread (center to center of track)58 in

Ground clearance17.78 in

Ground pressure8.818 lb/sq in

Electrical system24-volt

Communication systemRadio and interphones

PERFORMANCE

Gross horsepower to weight ratio10.8 hp per ton

Cruising range100 mi

Fuel consumption9 mpg

Maximum allowable speed35 mph

Maximum gradability60 per cent

Turning radius80 ft

Fording depth48 in

Maximum trench vehicle will cross108 in

Maximum vertical obstacle can negotiate40 in

Range of primary armament:

 With HE shell or WP smoke at 45° 07' or 811 mils10,355 yd

 Velocity of primary armament:

 With HE shell or WP smoke at 45° 07' or 811 mils1850 fps

ENGINE

NOTE: This vehicle has two engines as described below.

Make (manufacturer)Cadillac

Model numberT44

Brake horsepower110

Torque840 ft lb @ 1800 rpm

Rated speed (not governed)2400 rpm

Construction and designV, L-head

Number of cylinders8

Displacement, total (each engine)348 cu in

Compression ratio7.08:1

Cooling systemLiquid

IgnitionBattery, distributor

* Price based on vehicle plus artillery equipment.

CHASSIS AND POWER TRAIN

ClutchNone

TransmissionHydra-Matic

ControlAutomatic

Speeds4

Transfer caseSynchromesh

ControlRemote, hand lever

Speeds forward3

Speeds reverse1

DifferentialControlled

Steering controlTwo hand levers

Brakes:

 Operating principleBand

 ControlTwo hand levers

DriveFront sprocket

Number of wheels10 (dupl)

SuspensionTorsion bar

Tracks:

 ConstructionCenter guide, steel, rubber

 Shoes or blocks80 ea

 Width16 in

ARMAMENT

Primary armamentHowitzer, 155-mm M1

Traverse:

 Right80.5 deg

 Left17.0 deg

Elevation48 deg

Depression48 deg

Recoil mechanismHydra-Pneumatic

Secondary armamentNone

ARMOR

Hull:

ConstructionHomogeneous plate

Thickness:

 Front80 in

 Sides80 in

 Rear80 in

 Top80 in

 Floor30-37.5 in

VISION AND SIGHTING EQUIPMENT

Periscope, visionM19

Quadrant, gunner'sM1

Telescope, panoramicM18A6

CAPACITIES

Fuel:

 Total110 gal

 Right tank88 gal

 Left tank88 gal

Cooling system (each)10 gal

Crankcase (each)8 qt

Engine air cleaner (each)8 qt

Transmission (each)18 qt

Differential20 qt

Transfer case4.8 qt

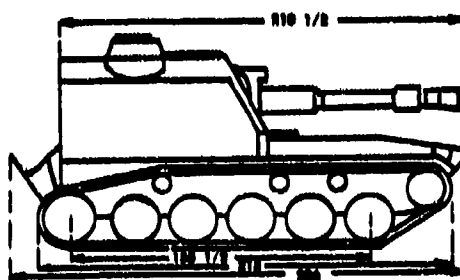
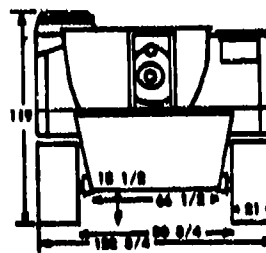
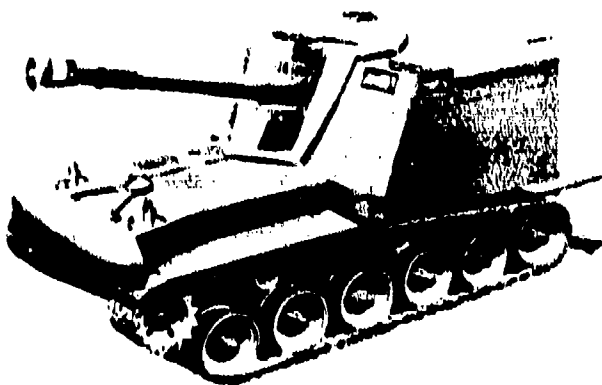
Final drive (each)8 qt

Ammunition:

 Primary weapon82 rounds

ADDITIONAL DATA

CARRIAGE, MOTOR, 155-MM HOWITZER, T99



GENERAL DATA

NOTE: The specifications are tentative and subject to change.
Purpose: To provide an improved type, full-track, lightly armored, highly mobile 155-mm gun carriage, to give close support to both rapidly moving armored columns and standard infantry divisions.

Classification: This vehicle is not as yet standard. When perfected it will supersede the M41 motor gun carriage.

Manufacturer: Detroit Arsenal.

Technical manual: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	5
Weight, combat loaded	29.25 tons
Length, over-all:	
Gun in firing or traveling position	19.8 ft
Width, over-all	10.1 ft
Height, over-all	9.9 ft
Shipping dimensions	Unknown
Tread (center to center of track)	101.73 in
Ground clearance	16.5 in
Ground pressure	5.9 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphones

PERFORMANCE

Gross horsepower to weight ratio	17.0 hp per ton
Cruising range	150 mi
Fuel consumption	9 mpg
Maximum allowable speed	36.5 mph
Maximum gradability	30 per cent
Turning radius	Pivot to infinity
Fording depth	48 in
Maximum trench vehicle will cross	72 in
Maximum vertical obstacle can negotiate	36 in
Range of primary armament:	
With HE shell or WP smoke at 45°07' or 811 mils	16,033 yd
Velocity of primary armament:	
With HE shell or WP smoke at 45°07' or 811 mils	1870 fps

ENGINE

Make (manufacturer)	Continental
Model number	AOS-893-1
Brake horsepower	500
Torque	945 ft lb @ 2400 rpm
Maximum governed speed	2900 rpm
Construction and design	Opposed, 1-head
Number of cylinders	6
Displacement, total	695 cu in
Compression ratio	5.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Remote, wobble stick
Speeds forward	3
Speeds reverse	1

Differential	Cross-drive
Steering control	Remote, wobble stick
Brakes:	
Operating principle	Mechanical (multiple disc)
Control	Foot pedal
Drive	Front sprocket
Number of wheels	10 (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide, steel, rubber shoes or blocks
Width	21 in

ARMAMENT

Primary armament	Howitzer, 155-mm
Traverse:	
Right	80 deg
Left	80 deg
Elevation	84 deg
Depression	4 deg
Recoil mechanism	Hydro-spring
Stabilizer system	None
Secondary armament:	
Cal .50 MG	1

ARMOR

Hull:	
Construction	Homogeneous plate
Thickness:	
Front	30 in
Sides	30 in
Rear	30 in
Top	30 in
Floor	37 1/2 in
Turret:	
Ring diameter	Unknown
Construction	Homogeneous, plate
Thickness:	
Front	30 in
Sides	30 in
Rear	30 in
Top	30 in

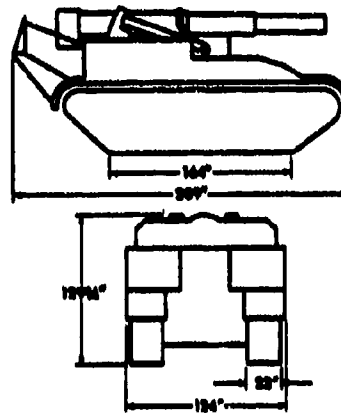
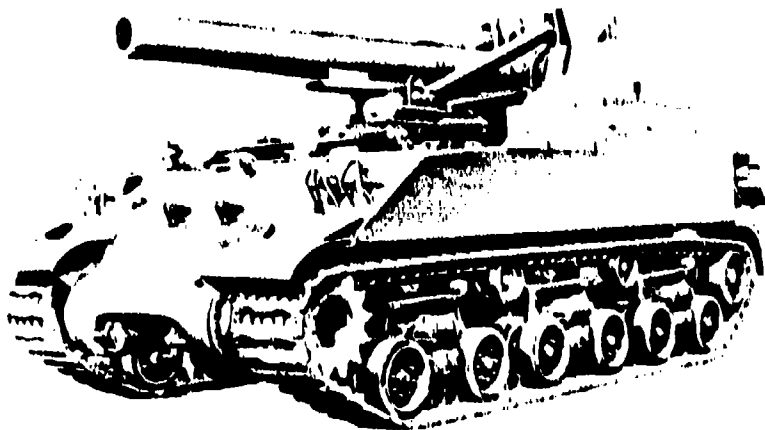
VISION AND SIGHTING EQUIPMENT

Periscope, vision	M17
Periscope, commander's	M18
Quadrant, elevation	Unknown
Telescope, gunner's	T186
Telescope, panoramic	T146

CAPACITIES

Fuel:	
Total	160 gal
Cooling system	None
Crankcase	35 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Unknown
Final drive (each)	Unknown
Ammunition:	
Primary weapon	80 rounds
Secondary weapons:	
Cal .50	1100 rounds

CARRIAGE, MOTOR, 155-MM GUN, M40, AND CARRIAGE, MOTOR, 8-INCH HOWITZER, M43



GENERAL DATA

Purpose: To provide fire power mobility and crew protection as supporting artillery for offensive combat.

Classification: At present this vehicle is standard. It will eventually be superseded by a vehicle with torsion bar suspension, air cooled engine, cross-drive transmission, and turret-type gun mount similar to the T97, 155-mm motor gun carriage.

Manufacturer: Pressed Steel Car Company.

Technical manuals: 9-747, 9-1725, 9-1701K, 9-1747A, 9-1750B, 9-1750C, 9-1750D, 9-1751, 9-1825A, 9-1825B, 9-1825C, 9-1825D, 9-1825E, 9-1825F, 9-1825G, 9-1825H, 9-1825I, 9-1825J, 9-1825K, 9-1825L, 9-1825M, 9-1825N, 9-1825O, 9-1825P, 9-1825Q, 9-1825R, 9-1825S, 9-1825T, 9-1825U, 9-1825V, 9-1825W, 9-1825X, 9-1825Y, 9-1825Z.

Lubrication order: DA LO 9-747.

Parts list: ORD 7 SNL G888, ORD 8 SNL G888, ORD 9 SNL G888.

Price of vehicle Unknown

Crew (number of personnel) 8 in travel, 15 for firing

Weight, combat loaded 40 tons

Length, over-all, in firing or travel position:

M40, 155-mm gun 39.84 ft

M40, 8-in howitzer 34 ft

Width, over-all 10.55 ft

Height, over-all 10.75 ft

Shipping dimensions 3000.8 cu ft, 248.8 sq ft

Tread (center to center of track) 101 in

Ground clearance 17 in

Ground pressure 10.8 lb/sq in

Electrical system 24-volt

Communication system Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio 11.7 hp per ton

Cruising range 100 mi

Fuel consumption 8 mpg

Maximum allowable speed 24 mph

Maximum gradability 60 per cent

Turning radius 41.5 ft

Fording depth 36 in

Maximum trench vehicle will cross 98 in

Maximum vertical obstacle can negotiate 64 in

Range of primary armament:

With HE 155-mm shell or WP smoke at 45° 37' or 811 mile 25,715 yds

With HE 8-in shell or WP smoke at 45° 37' or 811 mile 18,810 yds

Velocity of primary armament:

With HE 155-mm shell or WP smoke at 45° 37' or 811 mile 2745 fps

With HE 8-in shell or WP smoke at 45° 37' or 811 mile 1980 fps

ENGINE

Make (manufacturer) Continental

Model number R978-C4

Brake horsepower 400

Torque 940 ft lb @ 1700 rpm

Maximum governed speed 2000 rpm

Construction and design Radial, I-head

Number of cylinders 9

Displacement, total 975 cu in

Compression ratio 5.7, 1

Cooling system Air

Ignition Magneto

CHASSIS AND POWER TRAIN

Clutch Multiple disc

Transmission Synchronesh

Control Direct, hand lever

Speeds forward 5

Speeds reverse 1

Differential Controlled

Steering control Two hand levers

Brakes:

Operating principle Band

Control Two hand levers

Drive Front sprocket

Number of wheels 12 (dual)

Suspension Horizontal volute spring

Tracks:

Construction Center guide, steel, rubber

Shoes or blocks 67 ea

Width 23 in

ARMAMENT

Primary armament:

M40 Gun, 155-mm

M43 Howitzer, 8-inch

Traverse:

Right 18 deg

Left 18 deg

Elevation 88 deg

Depression 8 deg

Recoil mechanism Hydraulic

ARMOR

Null:

Construction Homogeneous plate

Thickness:

Front 50 in

Side 50 in

Rear 50 in

Top 50 in

Floor 1.50 in

VISION AND SIGHTING EQUIPMENT

Periscope, vision None

Periscope, commander's None

Range finder None

Quadrant, elevation M1

Telescope, gunner's (M40 only) M59F

Telescope, gunner's (M43 only) M59C

Telescope, panoramic M18

CAPACITIES

Fuel:

Total 215 gal

Cooling system None

Crankcase 58 qt

Engine air cleaner (each) 0.5 qt

Transmission 164 qt

Differential Integral with transmission

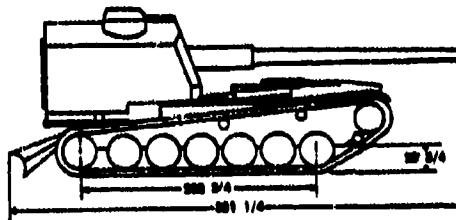
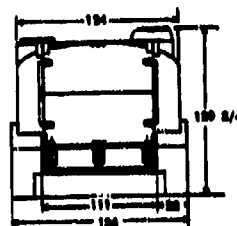
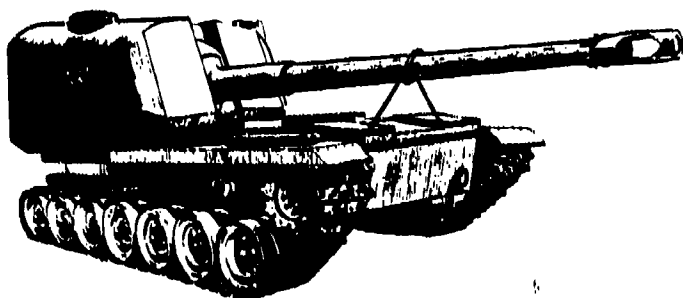
Final drive (each) Integral with transmission

Armament:

Primary weapon 12 rounds

ADDITIONAL DATA

CARRIAGE, MOTOR, 155-MM GUN, T97



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To provide an improved mobile and maneuverable gun motor carriage, capable of acting as general support artillery and also capable of giving close support to armored columns.
Classification: This vehicle is not as yet standard. When put into production it will replace the M40 motor gun carriage.
Manufacturer: Pacific Car and Foundry Company.
Technical manuals: Not assigned.
Lubrication Order: Not assigned.
Parts list: Not assigned.
Price of vehicle: Unknown
Crew (number of personnel): 8
Weight, combat loaded: 45 tons
Length, over-all: 81.77 ft
 Gun in firing position, or traveling 11.1 ft
Width, over-all: 10.8 ft
Height, over-all: 10.8 ft
Shipping dimensions: Unknown
Tread (center to center of track): 111 in
Ground clearance (estimated): 10.8 ft/3.8 m
Ground pressure: 10.8 lb/sq in
Electrical system: 4-volt
Communication system: Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio: 18.8 hp per ton
Cruising range: 150 mi
Fuel consumption: 6 mpg
Maximum allowable speed: 35 mph
Maximum gradability: 65 per cent
Turning radius: Pivot to infinity
Fording depth: 48 in
Maximum trench vehicle will cross: 68 in
Maximum vertical obstacle can negotiate: 48 in
Range of primary armament:
 With HE shell or WP smoke at 45° or 811 miles 25,715 yd
 With APC-T projectile at 45° or 800 miles 24,075 yd
Velocity of primary armament:
 With HE shell or WP smoke at 45° or 811 miles 2800 fps
 With APC-T projectile at 45° or 800 miles 2775 fps

ENGINE

Make (manufacturer): Continental
Model number: AV-1790-3
Brake horsepower: 810
Torque: 1810 ft lb @ 2800 rpm
Maximum governed speed: 2800 rpm
Construction and design: V, I-head
Number of cylinders: 12
Displacement, total: 1790 cu in
Compression ratio: 6.5: 1
Cooling system: Air
Ignition: Magneto

CHASSIS AND POWER TRAIN

Clutch: None
Transmission: Cross-drive
 Control: Remote, wobble stick
Speeds forward: 2
Speeds reverse: 1

Differential: Cross-drive
Steering control: Remote, wobble stick
Brakes: Mechanical, multiple disc
 Operating principle: Manual, foot pedal
 Control: Front sprocket
Drive: Front sprocket
Number of wheels: 12 (dual)
Suspension: Torsion bar
Tracks:
 Construction: Center guide, rubber
 Shoes or blocks: Unknown
 Width: 23 in

ARMAMENT

Primary armament: Gun, 155-mm
Traverse:
 Right: 80 deg
 Left: 80 deg
Elevation: 68 deg
Depression: 8 deg
Recoil mechanism: Hydro-spring
Stabilizer system: None
Secondary armament:
 Cal .50 MG 1

ARMOR

Hull: Homogeneous plate
Construction: Homogeneous plate
Thickness:
 Front: 1 in
 Sides: 1 in
 Rear: 1 in
 Top: 1 in
 Floor: 50 in
Turret:
 Ring diameter: 68 in
 Construction: Homogeneous plate
Thickness:
 Front: 50 in
 Sides: 50 in
 Rear: 50 in
 Top: 50 in

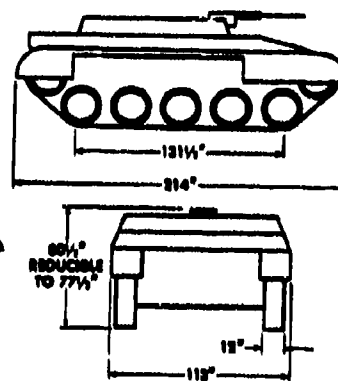
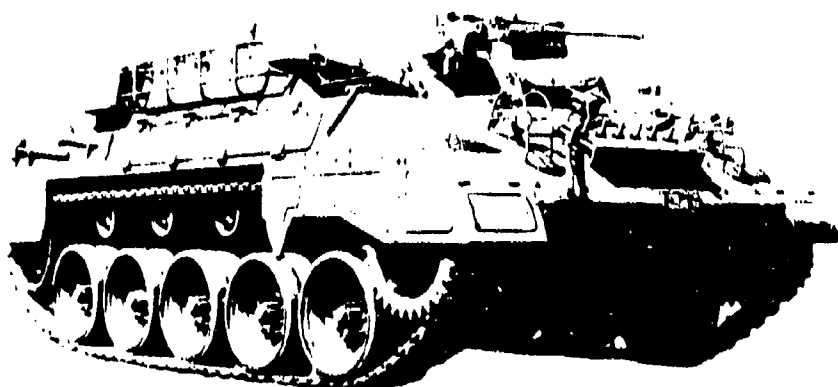
VISION AND SIGHTING EQUIPMENT

Periscope, vision: M17
Periscope, commander's: M18
Quadrant elevation: Unknown
Telescope, gunner's: Unknown

CAPACITIES

Fuel: 250 gal
Total: 250 gal
Cooling system: None
Crankcase: 72 qt
Engine air cleaner (each): Unknown
Transmission: Unknown
Differential: Unknown
Final drive (each): Unknown
Ammunition:
 Primary weapon: 20 rounds
 Secondary weapons: 1100 rounds
 Cal .50 MG

VEHICLE, UTILITY, ARMORED, M39



GENERAL DATA

Purpose: To transport cargo and personnel in combat and for use as prime mover for light field artillery.

Classification: At present this vehicle is limited standard. Its power train and power plant are not in line with the standardization program. This vehicle will be superseded by either the T18 utility vehicle or T43 cargo tractor.

Manufacturer: Buick Motor Car Division, GMG.

Technical manuals: 9-755, 9-1725, 9-1701C, 9-1750D, 9-1755A, 9-1755B, 9-1888B, 9-1828A, 9-1829A.

Lubrication order: DA LO 9-755.

Parts list: ORD 7 SNL G160, ORD 8 SNL G160, ORD 9 SNL G160.

Price of vehicle	Unknown
Crew (number of personnel)	10
Weight, combat loaded	17.75 tons
Length, over-all	17.8 ft
Width, over-all	9.4 ft
Height, over-all	6.0 ft
Shipping dimensions	1126.5 cu ft; 168 sq ft
Tread (center to center of track)	98.6 in
Ground clearance	14.85 in
Ground pressure	11.35 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	27.3 hp per ton
Cruising range	150 mi
Fuel consumption	9 mpg
Maximum allowable speed	60 mph
Maximum gradability	60 per cent
Turning radius	30 ft
Fording depth	48 in
Maximum trench vehicle will cross	74 in
Maximum vertical obstacle can negotiate	36 in
Pay load	4000 lb
Towed load	24,500 lb

ENGINE

Make (manufacturer)	Continental
Model number	R675C4
Brake horsepower	485
Torque	940 ft lb @ 1700 rpm
Maximum governed speed	2400 rpm
Construction and design	Radial, I-head
Number of cylinders	6
Displacement, total	975 cu in
Compression ratio	5.7:1

Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Torquematic
Control	Remote, hand lever
Speeds forward	6
Speeds reverse	1
Transfer case	Constant mesh
Control	None
Speeds	1
Differential	Controlled
Steering control	Two hand levers
Brakes:	
Operating principle	Band
Control	Two hand levers
Drive	Front sprocket
Number of wheels	10 (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide steel
Shoes or blocks	48 ea
Width	12 in

ARMAMENT

Cal .50 MG	1
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ARMOR

Hull:	
Construction	Homogeneous plate
Thickness:	
Front	80 in
Side	60 in
Rear	60 in
Top	60 in
Floor	18 in

VISION AND SIGHTING EQUIPMENT

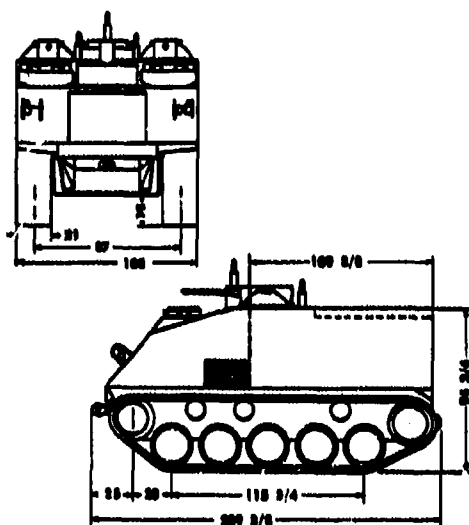
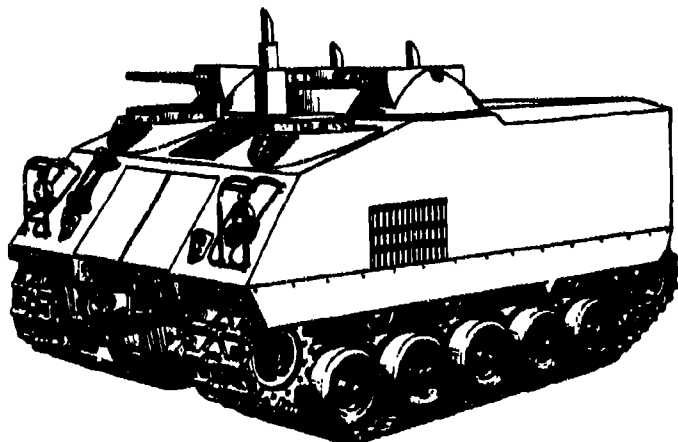
Periscope, vision	M18
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CAPACITIES

Fuel:	
Total:	165 gal
Right tank	82.5 gal
Left tank	82.5 gal
Cooling system	None
Crankcase	4 qt
Engine air cleaner (each)	1 qt
Transmission	26 qt
Differential and transfer case	20 qt
Final drive (each)	5 qt
Ammunition:	
Primary weapon (Cal .50 MG)	900 rounds

ADDITIONAL DATA

VEHICLE, UTILITY, ARMORED, T18



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: Armored personnel carrier, armored cargo carrier, litter carrier, prime mover, reconnaissance vehicle, and command post vehicle.

Classification: This vehicle is in development stage. It was primarily intended to fill the requirement for a 14-man armored personnel carrier for armored infantry.

Manufacturer: International Harvester Company.

Technical manuals: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew and passengers (number of personnel)	14
Weight, combat loaded	17 tons
Length, over-all	17.4 ft
Width, over-all	9 ft
Height, over-all (estimated)	9 ft
Shipping dimensions	1410 cu ft; 156 ft
Tread (center to center of track)	47 in
Ground clearance	18 in
Ground pressure	6.8 lbs/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	22 hp per ton
Cruising range (estimated)	150 mi
Fuel consumption	1 mpg
Maximum allowable speed	0.7 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	48 in
Maximum trench vehicle will cross	66 in
Maximum vertical obstacle	18 in
Pay load	Unknown
Towed load	Unknown

ENGINE

Make (manufacturer)	Continental
Model number	AO-895
Brake horsepower	375
Torque	786 ft lb
Maximum governed speed	2800 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	895 cu in

Compression ratio	5.75:1
Cooling system	Air cooled
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive (GD 800)
Control	Wobble stick
Speeds forward	1
Speeds reverse	1
Differential	Cross-drive
Brakes:	
Operating principle	Mechanical, multiple disc
Control	Manual, foot pedal
Drive	Front sprocket
Number of wheels	10 (dual)
Suspension	Individual torsion bar
Tracks:	
Construction	Steel chevron, center guide
Shoes or blocks	76 ea
Width	21 in

ARMAMENT

Cal .50 MG	2 (remote controlled, one on each side of front roof)
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HULL: ARMOR

Construction	Homogeneous plate
Thickness:	
Front	1/2 in
Sides	1/2 in
Rear	1/2 in
Top	1/2 in
Floor	1 in under engine

VISION AND SIGHTING EQUIPMENT

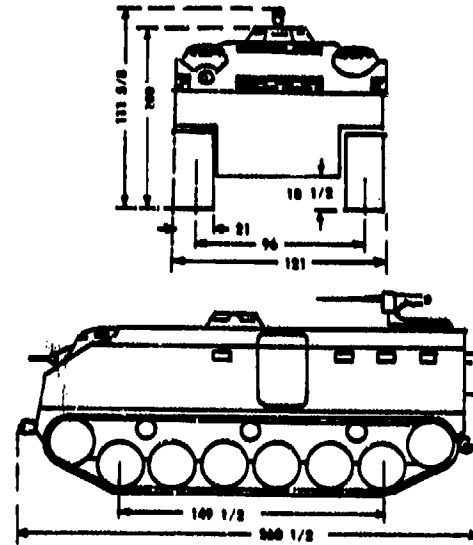
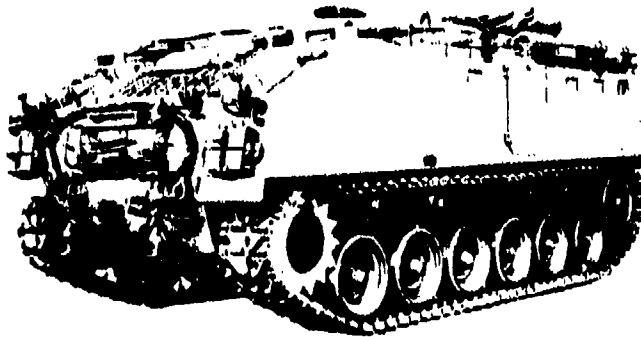
Periscope, vision	M17 (22 ea)
Sight, periscope	T91 (4 ea)

Fuel: CAPACITIES

Total	150 gal
Cooling system	None
Crankcase	58 qt
Engine air cleaner (each) (estimated)	0.5 qt
Transmission	Unknown
Differential	Integral w/ transmission
Final drive (each)	Unknown
Ammunition:	
Cal .50	3000 rounds

ADDITIONAL DATA

VEHICLE, UTILITY, ARMORED, M44



GENERAL DATA

Purpose: Armored cargo and personnel carrier, reconnaissance vehicle, command post, prime mover, and armored maintenance vehicle.

Classification: The vehicle at present is T/O&E standard in armored units. As only six of these vehicles exist, they are not available for issue to field troops. The M44E1 will supersede the M44 in the future. It has the common component power train.

Manufacturer: Cadillac Motor Car Division.

Technical manual: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew and passengers (number of personnel)	27
Weight, combat loaded	26.05 tons
Length, over-all	21.65 ft
Width, over-all	10.09 ft
Height, over-all	9.31 ft
Shipping dimensions	2034.23 cu ft; 218.5 sq ft
Tread (center to center of track)	96 in
Ground clearance	18.25 in
Ground pressure	8.3 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	13.5 hp per ton
Cruising range	130 mi
Fuel consumption	.8 mpg
Maximum allowable speed	32 mph
Maximum gradability	60 per cent
Turning radius (estimated)	31 ft
Fording depth	40 in
Maximum trench vehicle will cross	84 in
Maximum vertical obstacle can negotiate	30 in
Pay load (estimated)	10,000 lb
Towed load	32,000 lb

ENGINE

Make (manufacturer)	Continental
Model number	R975-D4
Brake horsepower	475
Torque	1075 ft lbs @ 1900 rpm
Maximum governed speed	2400 rpm
Construction and design	Radial, I-head
Number of cylinders	9
Displacement, total	973 cu in
Compression ratio	5.7: 1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Torgmatic
Control	Remote, hand lever
Speeds forward	9
Speeds reverse	1
Transfer case	Angle, 1.29:1 ratio
Differential	Controlled
Steering control	Two hand levers
Brakes:	
Operating principle	Band
Control	Two hand levers
Drive	Front sprocket
Number of wheels	12 (dual)
Suspension	Individual torsion bar
Tracks:	
Construction	Steel chevron, center guide
Shoes or blocks	64 sq in
Width	21 in

ARMAMENT

Cal .50 MG	1 (ring mount)
Cal .30 MG	1 (bow)

ARMOR

Hull:	
Construction	Homogeneous plate
Thickness:	
Front	1/2 in
Sides	1/2 in
Rear	1/2 in
Top	1/2 in
Floor	5/16 in

VISION AND SIGHTING EQUIPMENT

Periscope, vision	M17 (14 ea)
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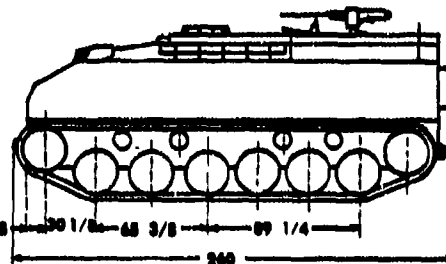
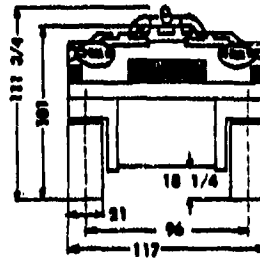
CAPACITIES

Fuel:	
Total	225 gal
Cooling system	None
Crankcase	48 qt
Engine air cleaner (each) (estimated)	3.5 qt
Torque converter	34 qt
Transmission	28 qt
Differential	Integral with transmission
Final drive (each)	10 qt
Ammunition:	
Cal .50	550 rounds
Cal .30	1000 rounds

ADDITIONAL DATA

VEHICLE, UTILITY, ARMORED, M44E1

NO PHOTO
AVAILABLE



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: A full-track armored carrier capable of transporting personnel or cargo. It will serve as a prime mover, command post, reconnaissance vehicle, or maintenance vehicle.
Classification: This vehicle is an improved version of the current standard M44 armored utility vehicle. It contains standard components such as the cross-drive transmission and air cooled (family) engines. Eventually it will replace the M44.
Manufacturer: Detroit Arsenal.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned

Price of vehicle	Unknown
Crew and passengers (number of personnel)	27
Weight, combat loaded	25.5 tons
Length, over-all	21.66 ft
Width, over-all	9.75 ft
Height, over-all	9.81 ft
Shipping dimensions	1964.4 cu ft, 211.1 sq ft
Tread (center to center of track)	96 in
Ground clearance	18.25 in
Ground pressure	6.3 lbs/sq in
Electrical system	24-volt
Communication system	Radios and interphone

PERFORMANCE

Gross horsepower to weight ratio	19.6 hp per ton
Cruising range	180 mi
Fuel consumption	2.6 mpg
Maximum allowable speed	44.4 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	40 in
Maximum trench vehicle will cross	84 in
Maximum vertical obstacle can negotiate	30 in
Pay load	10,000 lb
Tractive effort	42,100 lb

ENGINE

Make (manufacturer)	Continental
Model number	AOS-895-1
Brake horsepower	500
Torque	855 ft lb @ 2400 rpm
Maximum governed speed	2900 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	895 cu in

Compression ratio	6.5:1
Cooling system	Air cooled
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Wobble-stick
Speeds forward	8
Speeds reverse	1
Differential	Cross-drive
Steering control	Wobble stick
Brakes:	
Operating principle	Mechanical, multiple disc
Control	Foot pedal
Drive	Front sprocket
Number of wheels	12 (dual)
Suspension	Individual torsion bar
Tracks:	
Construction	Steel chevron, center guide
Shoes or blocks	84 ea
Width	21 in

ARMAMENT

Cal .50 MG	1 (ring mount)
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ARMOR

Hull:	
Construction	Homogeneous plate
Thickness:	
Front	5/8 in
Sides	1/2 in
Rear	1/2 in
Top	3/4 in
Floor	5/16 in

VISION AND SIGHTING EQUIPMENT

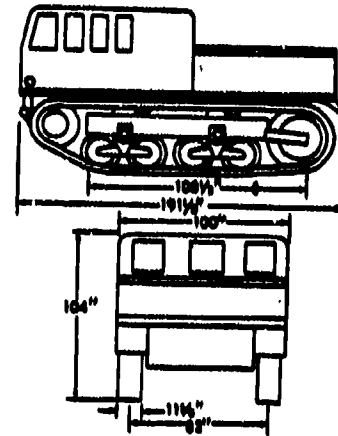
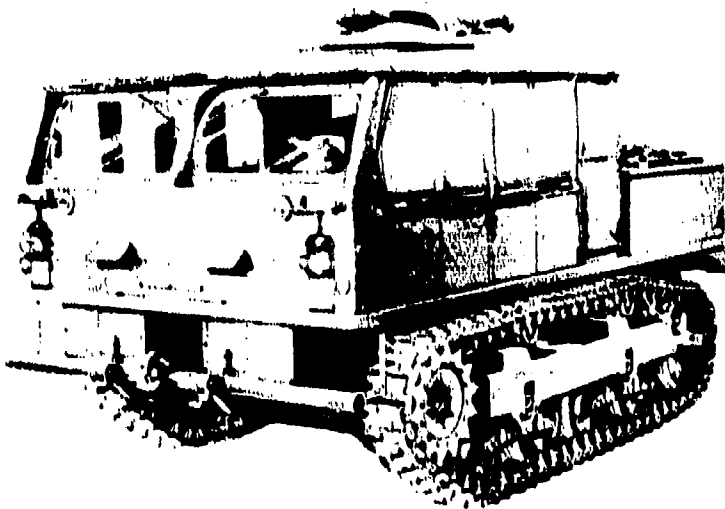
Periscope, vision	M17 (14 each)
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CAPACITIES

Fuel:	
Total	225 gal
Cooling system	None
Crankcase	5.8 qt
Engine air cleaner (each) (estimated)	3.5 qt
Transmission	Unknown
Differential	Integral with transmission
Ammunition:	
Cal .50	550 rounds

ADDITIONAL DATA

TRACTOR, 13-TON, HIGH SPEED, M5A1



GENERAL DATA

Purpose: To tow artillery over rough terrain and transport gun crews and ammunition.

Classification: This vehicle at present is standard; however, it will eventually be superseded by the T40E1 cargo tractor.

Manufacturer: International Harvester Company.
Technical manuals: 9-786, 9-1786A, 9-1786B, 9-1835A, 9-1886C, 9-1886A.

Lubrication order: DA LO 9-786.
Parts list: ORD 7 SNL G162, ORD 8 SNL G162, ORD 9 SNL G162.

Price of vehicle	.....\$11,925
Crew (number of personnel)	.....11
Weight, combat loaded	.....13.72 tons
Length, over-all	.....16.8 ft
Width, over-all	.....8.3 ft
Height, over-all	.....8.3 ft
Shipping dimensions	.....1175.8 cu ft; 135.6 sq ft
Tread (center to center of track)	.....60.15 in
Ground clearance	.....19.75 in
Ground pressure	.....11.1 lb/sq in
Electrical system	.....12-volts

PERFORMANCE

Gross horsepower to weight ratio	.....16.0 hp per ton
Cruising range	.....125 mi
Fuel consumption	.....1 to 2 mpg
Maximum allowable speed	.....35 mph
Maximum gradability	.....67 per cent
Turning radius	.....20 ft
Fording depth	.....45 in
Maximum trench vehicle will cross	.....36 in
Maximum vertical obstacle can negotiate	.....18 in
Towed load	.....20,000 lb
Winch load	.....15,000 lb

ENGINE

Make (manufacturer)	.....Continental
Model number	.....R-6572

* Price based on vehicle plus artillery equipment.

Brake horsepower	.....305
Torque	.....455 ft lb @ 1600 rpm
Maximum governed speed	.....2000 rpm
Construction and design	.....In-line, I-head
Number of cylinders	.....6
Displacement, total	.....572 cu in
Compression ratio	.....6.5:1
Cooling system	.....Liquid
Ignition	.....Battery, distributor

CHASSIS AND POWER TRAIN

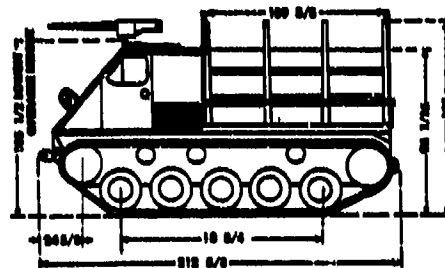
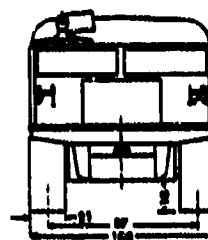
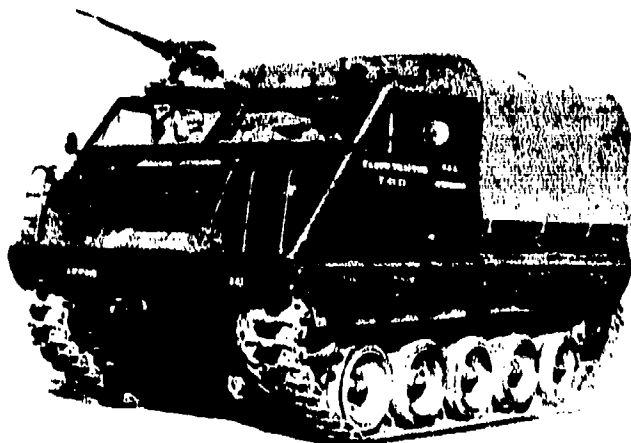
Clutch	.....Dual range, disc
Transmission	.....Constant mesh
Control	.....Direct, hand lever
Speeds forward	.....4
Speeds reverse	.....1
Differential	.....Controlled
Steering control	.....Two hand levers
Brakes:	
Operating principle	.....Band
Control	.....Two hand levers
Drive	.....Front sprocket
Number of wheels	.....8 (single)
Suspension	.....Vertical volute spring
Tracks:	
Construction	.....Outside guide, steel
Shoes or blocks	.....62 ea
Width	.....11-1/2 in

CAPACITIES

Fuel:	
Total	.....102.75 gal
Right tank	.....56.07 gal
Left tank	.....56.07 gal
Cooling system	.....20 gal
Crankcase	.....22 qt
Engine air cleaner (each)	.....5 qt
Transmission	.....26 qt
Differential	.....168 qt
Final drive (each)	.....5 qt
Winch gear case	.....62 qt

ADDITIONAL DATA

TRACTOR, CARGO, T43E1



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: Cross-country prime mover for 185-mm howitzer and lighter loads; also used as cargo or personnel carrier where no armor is required.

Classification: This vehicle is not as yet standard. When put into production it will supersede the M5 and M5A1 18-ton high-speed tractor.

Manufacturer: International Harvester Company.

Technical manuals: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	3
Weight, combat loaded	18.8 tons
Length, over-all	17.6 ft
Width, over-all	9.0 ft
Height, over-all	9.4 ft
Shipping dimensions	Unknown
Tread (center to center of track)	87 in
Ground clearance	18 in
Ground pressure	6.9 lb/sq in
Electrical system	24-volt

PERFORMANCE

Cross horsepower to weight ratio	33.0 hp per ton
Cruising range	150 mi
Fuel consumption (estimated)	1 mpg
Maximum allowable speed	37 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	48 in
Maximum trench vehicle will cross	66 in
Maximum vertical obstacle will negotiate	18 in
Pay load	8000 lb
Towed load	Unknown
Winch load	Unknown

ENGINE

Make (manufacturer)	Continental
Model number	AO 885-B
Brake horsepower	375
Torque	788 ft lb
Maximum governed speed	1800 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	853 cu in
Compression ratio	6.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

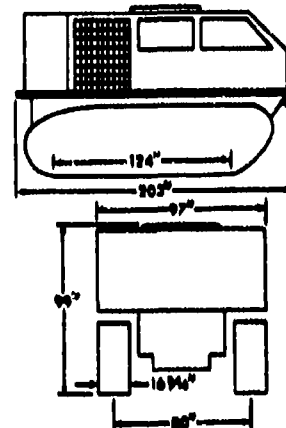
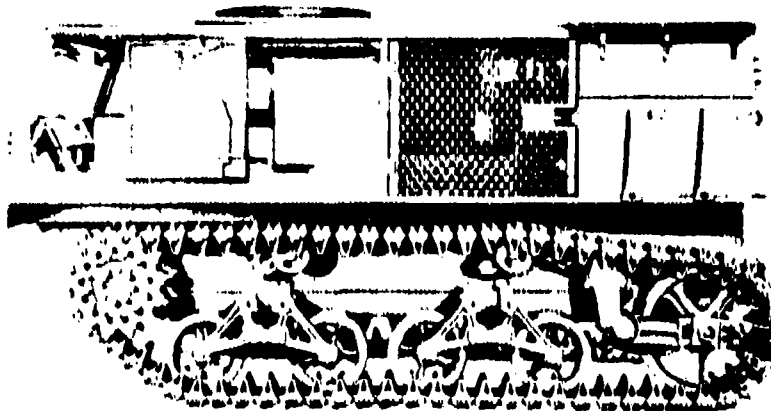
Clutch	None
Transmission	Cross-drive
Control	Wobble stick
Speeds forward	3
Speeds reverse	1
Differential	Cross-drive
Steering control	Wobble stick
Brakes:	
Operating principle	Mechanical (multiple disc)
Control	Foot pedal
Drive	Front sprocket
Number of wheels	10 (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide, steel
Shoes or blocks	76 ea
Width	21 in

CAPACITIES

Fuel:	
Total	150 gal
Cooling system	None
Crankcase	56 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Unknown
Final drive (each)	Unknown
Winch gear case	Unknown

ADDITIONAL DATA

TRACTOR, HIGH SPEED, 18-TON, M4 AND M4C



GENERAL DATA

Purpose: To tow heavy artillery over rough terrain, transport gun crews, and ammunition.

Classification: This vehicle is substitute standard. It has been superseded by Cargo Tractor, M8. Both vehicles will eventually be superseded by the T40E1 or T44 cargo tractors.

Manufacturer: Allis-Chalmers Manufacturing Company.

Technical manuals: 9-783, 9-1788A, 9-1788B, 9-1788A, 9-1826C, 9-1827A, 9-1828A, 9-1829A.

Lubrication order: 9-785.

Parts list: ORD 7 SNL G180, ORD 8 SNL G180, ORD 9 SNL G180.

Price of vehicle*	.....	\$15,097
Crew (number of personnel)	.....	11
Weight, combat loaded	.....	14 tons
Length, over-all	.....	16.9 ft
Width, over-all	.....	8.0 ft
Height, over-all	.....	8.1 ft
Shipping dimensions	.....	112.8 cu ft; 107.6 sq ft
Tread (center to center of track)	.....	60 in
Ground clearance	.....	80 in
Ground pressure	.....	7.6 lb/sq in
Electrical system	.....	12-volt

PERFORMANCE

Gross horsepower to weight ratio	.....	15.4 hp per ton
Cruising range	.....	180 mi
Fuel consumption	.....	.8 mpg
Maximum allowable speed	.....	35 mph
Maximum gradability	.....	60 per cent
Turning radius	.....	18.5 ft
Fording depth	.....	41 in
Maximum trench vehicle will cross	.....	60 in
Maximum vertical obstacle can negotiate	.....	29 in
Towed load	.....	33,700 lb
Winch load	.....	30,000 lb

* Price based on vehicle plus artillery equipment. M4C is a M4 modified to carry 48 rounds of 155-mm ammunition and 8 passengers.

ENGINE

Make (manufacturer)	.....	Waukesha
Model number	.....	145GZ
Brake horsepower	.....	210
Torque	.....	555 ft lb @ 1200 rpm
Maximum governed speed	.....	2100 rpm
Construction and design	.....	In-line, I-head
Number of cylinders	.....	6
Displacement, total	.....	517 cu in
Compression ratio	.....	5.85:1
Cooling system	.....	Liquid
Ignition	.....	Battery, distributor

CHASSIS AND POWER TRAIN

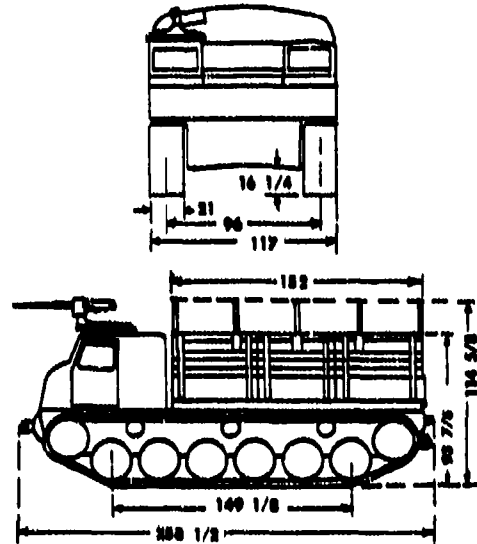
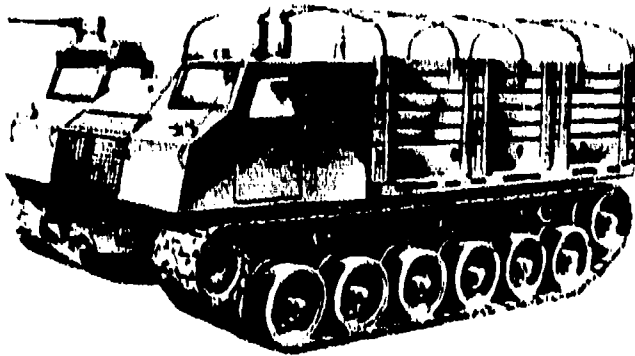
Clutch	.....	Single disc
Transmission	.....	Selective sliding gear with torque converter
Control	.....	Direct, hand lever
Speeds forward	.....	5
Speeds reverse	.....	1
Differential	.....	Controlled
Steering control	.....	Two hand levers
Brakes:		
Operating principle	.....	Band
Control	.....	Two hand levers
Drive	.....	Front sprocket
Number of wheels	.....	8 (single)
Suspension	.....	Horizontal volute spring
Tracks:		
Construction	.....	Outside guide, rubber and steel
Shoes or blocks	.....	68 ea
Width	.....	16.80 in

CAPACITIES

Fuel, total	.....	125 gal
Cooling system	.....	18 gal
Crankcase	.....	18 qt
Engine air cleaner (each)	.....	18 qt
Transmission	.....	Integral with differential
Differential	.....	28 qt
Torque converter (each)	.....	34 qt
Final drive (each)	.....	10 qt
Winch gear case	.....	3 qt

ADDITIONAL DATA

TRACTOR, CARGO, M8



GENERAL DATA

Purpose: Prime mover and cargo carrier capable of towing loads from 18,000 to 32,000 pounds. For transporting personnel, ammunition, or miscellaneous equipment totaling 10,000 pounds or more.

Classification: This vehicle was to be standard; however, only six of them were manufactured before the war terminated and the contract for 2000 was canceled. The requirement will eventually be filled by the new Tractor Cargo, M8E1.

Manufacturer: Buick Division, GMC.

Technical manuals: Not assigned.

Lubrication order: Not assigned.

Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	2
Weight, combat loaded	17.75 tons
Length, over-all	21.5 ft
Width, over-all	6.7 ft
Height, over-all	6.5 ft
Shipping dimensions	Unknown
Tread (center to center of track)	96 in
Ground clearance	18.25 in
Ground pressure	7.88 lb/sq in
Electrical system	24-volt

PERFORMANCE

Gross horsepower to weight ratio	19.8 hp per ton
Cruising range	500 mi
Fuel consumption	9 mpg
Maximum allowable speed	35 mph
Maximum gradability	50 per cent
Turning radius	28 ft
Fording depth	40 in
Maximum trench vehicle will cross	24 in
Maximum vertical obstacle can negotiate	30 in
Pay load	10,000 lb
Towed load	32,000 lb
Winch load	50,000 lb

ENGINE

Make (manufacturer)	Continental
Model number	R-978D4

Brake horsepower	475
Torque	1078 ft lb @ 1500 rpm
Maximum governed speed	1400 rpm
Construction and design	Radial, I-head
Number of cylinders	6
Displacement, total	578 cu in
Compression ratio	5.7:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Torquatic
Control	Remote, hand controller
Speeds forward	6
Speeds reverse	1
Differential	Controlled
Steering control	Two hand levers
Brakes:	
Operating principle	Mechanical bands
Control	Two hand levers
Drive	Front sprocket
Number of wheels	2 (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide, steel
Shoes or blocks	24 ea
Width	21 in

ARMOR

Hull	For structural strength only
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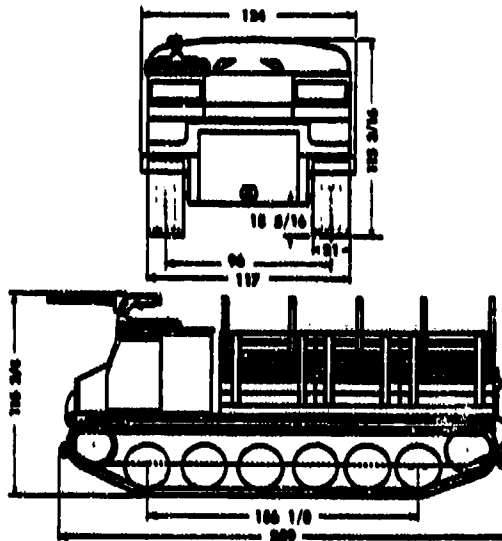
CAPACITIES

Fuel total	225 gal
Cooling system	None
Crankcase	48 qt
Engine air cleaner (each)	4 qt
Transmission	48 qt
Differential	20 qt
Final drive (each)	5 qt
Winch gear case	Unknown

ADDITIONAL DATA

TRACTOR, CARGO, M8E1

NO PHOTO
AVAILABLE



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: An improved full-track, high-speed prime mover for artillery loads of 15,000 to 25,000 pounds and having a payload capacity of 15,000 pounds for transporting personnel, ammunition, or miscellaneous cargoes over all types of terrain.
Classification: This vehicle is an improved version of the current standard M8 cargo tractor. It contains all the modern components such as cross-drive transmission and in-line air-cooled engine. Eventually it will replace the M8 cargo tractor.
Manufacturer: Detroit Arsenal.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	2
Weight, combat loaded	48,750 lbs
Length, over-all	28.5 ft
Width, over-all	10.5 ft
Height, over-all	3.5 ft
Shipping dimensions	2520 cu ft; 208 sq ft
Tread (center to center of track)	95 in
Ground clearance	15-5/16 in
Ground pressure	8.17 lb/sq in
Electrical system	24-volt
Communication system	None

PERFORMANCE

Gross horsepower to weight ratio	18.85 hp per ton
Cruising range	180 mi
Fuel consumption	8 mpg
Maximum allowable speed	44 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	40 in
Maximum trench vehicle will cross	84 in
Maximum vertical obstacle can negotiate	60 in
Pay load	15,000 lb
Towed load	18,000 lb
Winch load	48,000 lb

ENGINE

Make (manufacturer)	Continental
Model number	AO8 895-1

Brake horsepower	500
Torque	955 ft lb @ 2400 rpm
Maximum governed speed	2500 rpm
Construction and design	Opposed, I-head
Number of cylinders	6
Displacement, total	392 cu in
Compression ratio	6.75:1
Cooling system	Air cooled
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Wobble stick
Speeds forward	8
Speeds reverse	1
Differential	Cross-drive
Steering control	Wobble stick
Brakes:	
Operating principle	Mechanical, multiple disc
Control	Manual, foot pedal
Drive	Front sprocket
Number of wheels	18 (dual)
Suspension	Independent torsion bar
Tracks:	
Construction	Steel chevron, center guide
Shoes or blocks	84 sq
Width	81 in

ARMAMENT

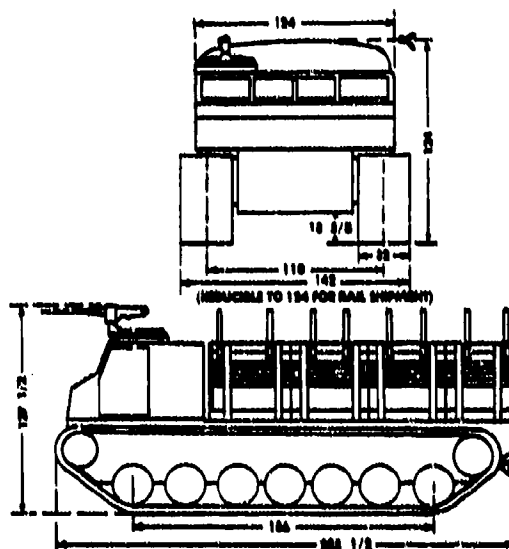
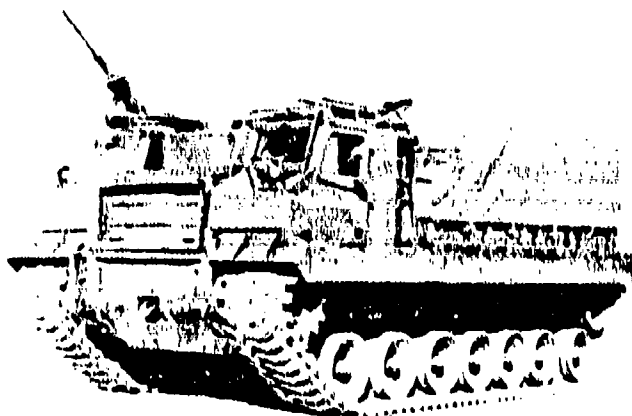
Cal .50 MG	1 (ring mount)
Armor (for structural strength only)	

CAPACITIES

Fuel:	
Total	225 gal
Cooling system	None
Crankcase	58 qt
Engine air cleaner (each) (estimated)	5.5 qt
Transmission	Unknown
Differential	Integral with transmission
Final drive (each)	Unknown
Winch gear case	Unknown
Ammunition:	
Cal .50	500 rounds

ADDITIONAL DATA

TRACTOR, CARGO, T44



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: An improved full-track high speed prime mover for artillery loads of 40,000 to 85,000 pounds and having a payload capacity of 30,000 pounds for transporting personnel, ammunition, or miscellaneous cargo over all types of terrain.
Classification: This vehicle is not yet standard. When developed and put into production, it will replace Cargo Tractor, M4; Tractor, High Speed, M6; and possibly Cargo Tractor, High Speed, M4C.

Manufacturer: Detroit Arsenal.
Technical manuals: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	2
Weight, combat loaded	49.55 tons
Length, over-all	30.7 ft
Width, over-all	11.8 ft
Height, over-all	10.8 ft
Shipping dimensions	Unknown
Tread (center to center of track)	110 in
Ground clearance	18.62 in
Ground pressure	Unknown
Electrical system	24-volt

PERFORMANCE

Gross horsepower to weight ratio	16.09 hp per ton
Cruising range	100 mi
Fuel consumption	8 mpg
Maximum allowable speed	35 mph
Maximum gradability	30 per cent
Turning radius	90 ft
Fording depth	32 in
Maximum trench vehicle will cross	35 in
Maximum vertical obstacles can negotiate	36 in
Pay load	30,000 lb
Towed load	85,000 lb
Winch load	30,000 lb

ENGINE

Make (manufacturer)	Continental
Model number	AV-1750-B
Brake horsepower	810
Torque	1610 ft lb @ 2500 rpm
Maximum governed speed	3800 rpm
Construction and design	V, I-head
Number of cylinders	6
Displacement total	1790 cu in
Compression ratio	6.8:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

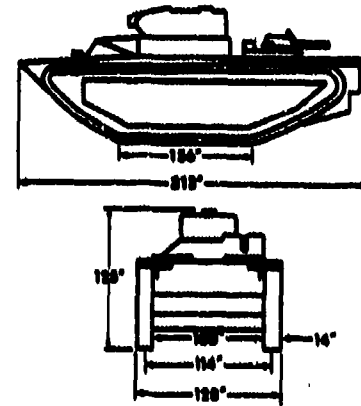
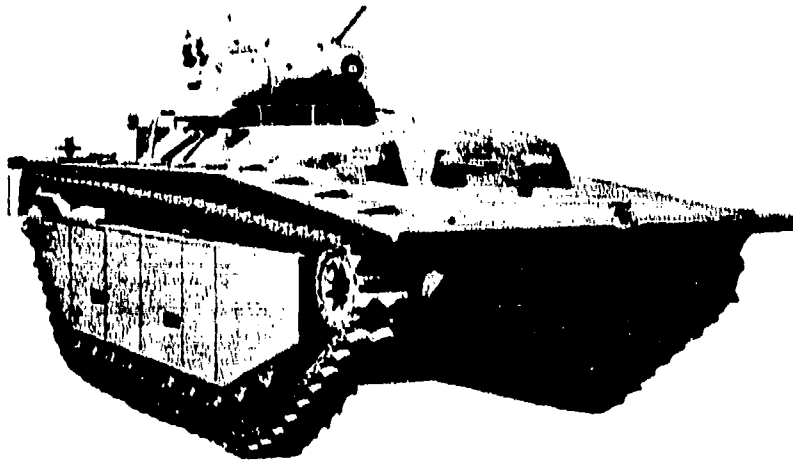
Clutch	None
Transmission	Cross-drive
Control	Remote, wobble stick
Speeds forward	1
Speeds reverse	1
Differential	Cross-drive
Steering control	Remote, wobble stick
Brakes:	
Operating principle	Mechanical, multiple disc
Control	Manual, foot pedal
Drive	Front sprocket
Number of wheels	14 (dual)
Suspension	Torsion bar
Tracks:	
Construction	Center guide, steel
Shoes or blocks	36 ea
Width	32 in

CAPACITIES

Fuel, total	330 gal
Cooling system	None
Crankcase	7.8 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Integral with transmission
Final drive (each)	Unknown
Winch gear case	Unknown

ADDITIONAL DATA

VEHICLE, LANDING, TRACKED (ARMORED), LVT (A) (4)



GENERAL DATA

Purpose: For use in rough terrain, swamp land, and self-propulsion in exposed waters. Also for landing on beach through surf.

Classification: To date no vehicle has been put into production to supersede the LVT. In event more tracked landing vehicles are manufactured, they will follow the development trends using common components such as air cooled engines and cross-drive transmissions.

Manufacturer: Ford Machinery Corporation, St. Louis Car Company.

Technical manuals: 9-776, 9-1728A, 9-1728C, 9-1728, 9-1775, 9-1828A, 9-1829A.

Lubrication order: DA LO 9-776.

Parts list: ORD 7 SNL G-209 ORD 8 SNL G-209, ORD 9 SNL G-209.

Price of vehicle	\$41,001
Crew (number of personnel)	6
Weight, combat loaded	20 tons
Length, over-all	36.0 ft
Width, over-all	10.8 ft
Height, over-all	10.8 ft
Shipping dimensions	3896.5 cu ft, 277.5 sq ft
Tread (center to center of track)	110.8 in
Ground clearance	18 in (hard surface)
Ground pressure	6.0 lb/sq in
Electrical system	12-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	12.7 hp per ton
Cruising range (land)	150 mi
Fuel consumption (land) (estimated)	1 mpg
Maximum allowable speed: (land) 21 mph; (water) 6 mph	
Maximum gradability	20 per cent
Turning radius (land)	30 ft
Fording depth	Amphibious
Maximum trench vehicle will cross	60 in
Maximum vertical obstacle can negotiate	36 in
Range of primary armament:	
With HE shell or WP smoke at 45° 07' or 811 mils	2850 yds
Velocity of primary armament:	
With HE shell or WP smoke at 45° 07' or 811 mils	1850 fps

ENGINE

Make (manufacturer)	Continental
Model number	W670-9A
Brake horsepower	250
Torque	578 ft lb @ 1600 rpm
Maximum governed speed	2400 rpm
Construction and design	Radial, I-head
Number of cylinders	7
Displacement, total	667.60 cu in
Compression ratio	6.1:1
Cooling system	Air
Ignition	Magneto

*Price based on vehicle less equipment.

Loaded waterline length	27.0 in
Loaded freeboard (min)	27 in
Loaded draft:	
Front	11.75 in
Rear	37.25 in

CHASSIS AND POWER TRAIN

Clutch	Multiple disc
Transmission	Selective sliding
Control	Direct, hand lever
Speeds forward	5
Speeds reverse	1
Differential	Controlled
Steering control	Two hand levers
Brakes:	
Operating principle	Band
Control	Manual
Drive	Front sprocket
Number of wheels	22 (single)
Suspension	Torsional rubber
Tracks:	
Construction	Steel
Shoes or blocks	70 (grousers and cross-chain)
Width	14.58 in

ARMAMENT

Primary armament	Howitzer, 75-mm
Traverse:	
Right	90 deg
Left	90 deg
Elevation	30 deg
Depression	20 deg
Recoil mechanism	Hydro-spring
Stabilizer system	Cyro
Secondary armament:	
Cal .50 MG	2 (or .50 caliber)
Cal .30 MG	6 (5 may be .50 caliber)

ARMOR

Hull:	
Construction	Boiler plate with homogeneous plate attached.
Thickness:	
Front	1.5 in
Sides	1.5 in
Rear	1.5 in
Top	1.5 in
Floor	None
Turret:	
Construction	Homogeneous, welded, combination plate and cast
Thickness:	
Front	1.5 in
Sides	1 in
Rear	1 in
Top	None

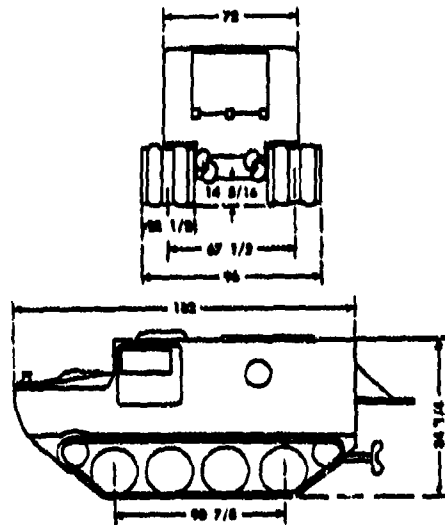
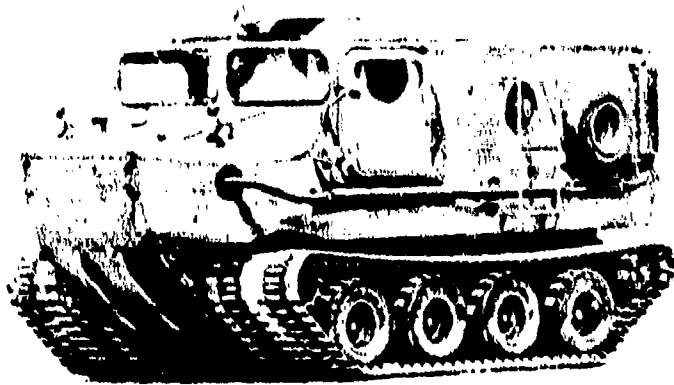
VISION AND SIGHTING EQUIPMENT

Quadrant, elevation	M9
Telescope, gunner's	M70A
Telescope, panoramic	M15A5

CAPACITIES

Fuel:	
Total	140 gal (8)
Right tank	70 gal
Left tank	70 gal
Cooling system	None
Crankcase	Reservoir-5.7 gal
Engine air cleaner (each) (estimated)	0 qt
Transmission	0 qt
Differential	Integral with transmission
Final Drive (each)	0 qt
Ammunition:	
Primary weapon	100 rounds
Secondary weapons:	
Cal .50	4000 rounds (5 .50 cal MGs)

CARRIER, CARGO, AMPHIBIOUS, T46



GENERAL DATA

NOTE: These specifications are tentative and subject to change.
Purpose: To provide a light amphibian cargo carrier and prime mover, convertible to a winterized vehicle, suitable for cargo or personnel and capable of being transported by air.
Classification: This vehicle is in development stage. When put into production it will replace Cargo Carrier, M20C, and some of the requirements for the LVT(4).
Manufacturer: General Motors Corporation.
Technical manual: Not assigned.
Lubrication order: Not assigned.
Parts list: Not assigned.

Price of vehicle	Unknown
Crew (number of personnel)	8
Weight, combat loaded	6 tons
Length, over-all	18.16 ft
Width, over-all	6.0 ft
Height, over-all	7.0 ft
Shipping dimensions	Unknown
Tread (center to center of track)	67.8 in
Ground clearance	14.0 in
Ground pressure	5.1 lb/sq in
Electrical system	24-volt
Communication system	Radio and interphone

PERFORMANCE

Gross horsepower to weight ratio	80.8 hp per ton
Cruising range	300 mi
Fuel consumption	8.8 mpg
Maximum allowable land speed	27.5 mph
Maximum allowable water speed	4.5 mph
Maximum gradability	60 per cent
Turning radius	Pivot to infinity
Fording depth	Amphibious
Maximum trench vehicle will cross	60 in
Maximum vertical obstacle can negotiate	18 in
Pay load	3000 lb
Towed load	Unknown
Winch (Capstan) load	Unknown

ENGINE

Make (manufacturer)	Continental
Model number	AO-885-B
Brake horsepower	125
Torque	335 ft lb @ 2400 rpm
Maximum governed speed	3000 rpm
Construction and design	Opposed, I-head
Number of cylinders	4
Displacement, total	366.80 cu in
Compression ratio	6.5:1
Cooling system	Air
Ignition	Magneto

CHASSIS AND POWER TRAIN

Clutch	None
Transmission	Cross-drive
Control	Remote, wobble stick
Speeds forward	5
Speeds reverse	1
Differential	Cross-drive
Steering Control	Remote, wobble stick
Brakes:	
Operating principle	Mechanical
Control	Foot-mechanical
Drive	Front sprocket drive
Number of wheels	8 (dual)
Suspension	Torsion bar
Track:	
Construction	(Belt with cross links; link recess for tire as guide)
Shoes or blocks	80 ea
Width	28.5 in

CAPACITIES

Fuel, total	60 gal
Cooling system	None
Crankcase	12 qt
Engine air cleaner (each)	Unknown
Transmission	Unknown
Differential	Integral with transmission
Final drive (each)	Unknown
Winch (Capstan) gear case	Unknown

ADDITIONAL DATA
