

Information and Instructions

This individual shop manual is one unit of a series on wheel type tractors. Contained in it are the necessary specifications and the brief but terse procedural data needed by a mechanic when repairing a tractor on which he has had no previous actual experience.

The material is arranged in a systematic order beginning with an index which is followed immediately by a Table of Condensed Service Specifications. These specifications include dimensions, fits, clearances and timing instructions. Next in order of arrangement is the procedures paragraphs.

In the procedures paragraphs, the order of presentation starts with the front axle system and steering and proceeding toward the rear axle. The last paragraphs are devoted to the power take-off and power lift systems. Interspersed where needed are additional tabular specifications pertaining to wear limits, torquing, etc.

HOW TO USE THE INDEX

Suppose you want to know the procedure for R&R (remove and reinstall) of the engine camshaft. Your first step is to look in the index under the main heading of ENGINE until you find the entry "Camshaft." Now read to the right where under the column covering the tractor you are repairing, you will find a number which indicates the beginning paragraph pertaining to the camshaft. To locate this wanted paragraph in the manual, turn the pages until the running index appearing on the top outside corner of each page contains the number you are seeking. In this paragraph you will find the information concerning the removal of the camshaft.

INDEX (By Starting Paragraph) Except Series MTA & W6TA

★ See page 5 for Series MTA & W6TA index ★

	Series A	Series B	Series C	Cub	Series H & 4	Non-Diesel Ser. M&6	Diesel Ser. M&6	Non-Diesel Series 9	Diesel Series 9
BELT PULLEY	499	499	499	500	505	505	505	505	505
BRAKES	490	490	494	490	494	494	494	494	494
CARBURETOR (Not LP Gas).....	101	101	101	102	102	102	102	102	102
CARBURETOR (LP Gas)						110			
CLUTCH	188	188	188	188	188	188	188	188	188
COOLING SYSTEM									
Fan	168	168	168	168	169	169	169	169	169
Radiator	165	165	165	165	(H)166 (4)167	(M)166 (6)167	(M)166 (6)167	167	167
Water Pump			173		174	174	174	174	174
DIESEL FUEL SYSTEM									
Filters & bleeding							122		122
Injection pump							130		130
Nozzles							126		126
Precombustion chambers							129		129
Quick checks							121		121
DIFFERENTIAL	453	453	455	453	458	458	458	460	460
ENGINE									
Cam followers	46	46	46	46	47	47	47	47	47
Camshaft	69	69	69	70	71	71	71	71	71
Conn. rods & bearings.....	88	88	88	88	88	88	88	88	88
Crankshaft	90	90	90	90	90	90	90	90	90
Cylinder head	30	30	30	31	32	32	33	34	35
Engine removal	25	25	25	25	(H)26 (4)27	(M)26 (6)27	(M)26 (6)27	28	28
Flywheel	94	94	94	94	94	94	94	94	94
Ignition timing	178	178	178	178	178	178	178	178	178
Injection timing							130		130
Main bearings	90	90	90	90	90	90	90	90	90
Oil pump	96	96	96	97	96	96	96	96	96
Pistons & rings	74	74	74	77	79	79	82	79	82
Piston pins	86	86	86	86	86	86	86	86	86
Piston removal	73	73	73	73	73	73	73	73	73
Rear oil seal	92	92	92	92	92	92	92	92	92
Rocker arms	48	48	48		48A (H)59 (4)60	48A (M)59 (6)60	48B (M)59 (6)60	48A 60	48B 60
Timing gear cover	58	58	58	58					
Timing gears	62	62	62	62	65	65	65	65	65
Valves & seats	38	38	38	38	38	39	40	39	40
Valve guides & springs.....	43	43	43	43	43	43	43	43	43
Valve timing	55	55	55	55	55	55	55	55	55
FINAL DRIVE									
Axle shafts	463	463	470	465	475	475	475	482	482
Bull gears	463	463	469	465	474	474	474	482	482
Bull pinions	462	462	468	465	473	473	473	481	481
FRONT SYSTEM									
Axle main member	3		3	3	4	4	4	4	4
Steering knuckles	6		6	6	6	6	6	6	6
Tie rods & drag link.....	5		5	5	5	5	5	5	5
Tricycle type		1	1		2	2	2		
GOVERNOR	155	155	155	158	161	161	144	161	144
L.P.-GAS SYSTEM									
Adjustments						110			
Carburetor						111			
Regulator						112			
"LIFT ALL"									
Power Cylinders					526	526	526		
Pump					520	520	520		
POWER TAKE-OFF	499	499	499	500	508	508	508	508	508
REAR AXLE	463	463	470	465	475	475	475	482	482
STARTING SYSTEM (DIESEL)									
Adjustments							150		150
Intake manifold							152		152
STEERING GEAR	7	9	9	12	(H)15 (4)18	(M)15 (6)18	(M)15 (6)18	19	19
"TOUCH CONTROL"									
Adjustment	537		537	537					
Cylinder & valves unit.....	542		542	542					
Lubrication & bleeding	535		535	535					
Pump	539		539	539					
Trouble shooting	536		536	536					
TRANSMISSION									
Basic procedure	221	221	252	240	261	261	261		
Overhaul	226	226	257	245	268	268	268	286	286

Series MTA-W6TA INDEX (By Starting Paragraph)

	Non-Diesel Series Super MTA	Diesel Series Super MTA	Non-Diesel Series Super W6TA	Diesel Series Super W6TA
BELT PULLEY	505	505	505	505
BRAKES	497	497	497	497
CARBURETOR	102	102	102	102
CLUTCH	214A	214A	214A	214A
COOLING SYSTEM				
Fan	169	169	169	169
Radiator	166	166	167	167
Water pump	174	174	174	174
DIESEL FUEL SYSTEM				
Filters and bleeding		122		122
Injection pump		130		130
Nozzles		126		126
Precombustion chambers		129		129
Quick checks		121		121
DIFFERENTIAL	458	458	458	458
ENGINE				
Cam followers	47	47	47	47
Camshaft	71	71	71	71
Connecting rod and bearings	88	88	88	88
Crankshaft	90	90	90	90
Cylinder head	32	33	32	33
Engine removal	26	26	27	27
Flywheel	94	94	94	94
Ignition timing	178	178	178	178
Injection timing		130		130
Main bearings	90	90	90	90
Oil pump	96	96	96	96
Oil relief valve	99	99	99	99
Pistons and rings	79	82	79	82
Piston pins	86	86	86	86
Piston removal	73	73	73	73
Rear oil seal	92	92	92	92
Rocker arms	48	48	48	48
Timing gear cover	59	59	60	60
Timing gears	65	65	65	65
Valves and seats	39	40	39	40
Valve guides and springs	43	43	43	43
Valve rotators	53	53	53	53
Valve timing	55	55	55	55
FINAL DRIVE				
Axle shafts	475	475	475	475
Bevel gears	300	300	300	300
Bull gears	474	474	474	474
Bull pinions	473	473	473	473
FRONT SYSTEM				
Axle main member	4	4	4	4
Steering knuckles	6	6	6	6
Tie rods and drag link	5	5	5	5
Tricycle type	2	2	2	2
GOVERNOR	161	144	161	144
HYDRAULIC LIFT				
Control valves	513	513	514	514
Lubrication	510	510	510	510
Pump	512	512	512	512
System checks	511	511	511	511
PTO Non-Continuous	508	508	508	508
PTO Independent Type				
Drive shaft	509C	509C	509C	509C
Driven shaft	509B	509B	509B	509B
Extension shaft	509A	509A	509A	509A
Overhaul rear unit	508D	508D	508D	508D
Reactor bands	508B	508B	508B	508B
REAR AXLE	475	475	475	475
STEERING GEAR	15	15	18	18
TORQUE AMPLIFIER				
Clutch adjustment	215	215	215	215
Clutch overhaul	216	216	216	216
Planetary unit	217	217	217	217
TRANSMISSION				
Countershaft	281	281	281	281
Driving shaft	277	277	277	277
Main shaft	280	280	280	280
Rear frame cover	275	275	275	275
Reverse idler	282	282	282	282
Shifter rails and forks	276	276	276	276