

**TM 5-3805-261-24P**

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**TECHNICAL MANUAL**

**UNIT, DIRECT SUPPORT, AND GENERAL SUPPORT  
MAINTENANCE REPAIR PARTS AND SPECIAL  
TOOLS LISTS (INCLUDING DEPOT  
MAINTENANCE REPAIR PARTS  
AND SPECIAL TOOLS LISTS)**

**GRADER, ROAD: HEAVY, DIESEL  
ENGINE DRIVEN**

**CATERPILLAR MODEL 130G**

**NSN 3805-01-150-4795**

This manual supersedes TM 5-3805-261-24P, dated 28 December 1990.

Approved for public release; distribution is unlimited.

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**HEADQUARTERS, DEPARTMENT OF THE ARMY**

**AUGUST 1993**

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**Currant as of 21 May 1993**

**REPORTING ERRORS AND RECOMMENDING IMPROVEMENTS**

You can help improve this manual. If you find any mistakes or if you know of a way to Improve the procedures, please let us know. Mail your letter, DA Form 2028 (*Recommended Changes to Publications and Blank Forms*), or DA Form 2028-2, located in the back of this manual, direct to: Commander, U.S. Army Tank-Automotive Command, ATTN: AMSTA-MB, Warren, MI 48397-5000. A reply will be furnished to you.

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# UNIT, DIRECT SUPPORT, AND GENERAL SUPPORT MAINTENANCE REPAIR PARTS AND SPECIAL TOOLS LISTS (INCLUDING DEPOT MAINTENANCE REPAIR PARTS AND SPECIAL TOOLS LISTS)

## SECTION I. INTRODUCTION

### 1. Scope

This RPSTL lists and authorizes spares and repair parts; special tools; special test, measurement, and diagnostic equipment (TMDE); and other special support equipment required for performance of Unit, Direct Support, and General Support Maintenance of the Heavy Road Grader. It authorizes the requisitioning, issue, and disposition Of spares, repair parts and special tools as indicated by the source, maintenance and recoverability (SMR) codes.

### 2. General.

In addition to Section I. Introduction, this Repair Parts and Special Tools List is divided into the following sections:

a. Section II. Repair Parts List. A list of spares and repair parts authorized by this RPSTL for use in the performance of maintenance. The list also includes parts which must be removed for replacement of the authorized parts. Parts lists are composed of functional groups in ascending alphanumeric sequence, with the parts in each group listed in ascending figure and item number sequence. Bulk materials are listed in item name sequence. Repair kits are listed separately in their own functional group within Section II. Repair parts for reparable special tools are also listed in the section. Items listed are shown on the associated illustration(s)/figure(s).

b. Section III. Special Tools Lists. A list of special tools, special TMDE, and other special support equipment authorized by this RPSTL (as indicated by Basis of Issue (BOI) information in DESCRIPTION AND USABLE ON CODE column) for the performance of maintenance.

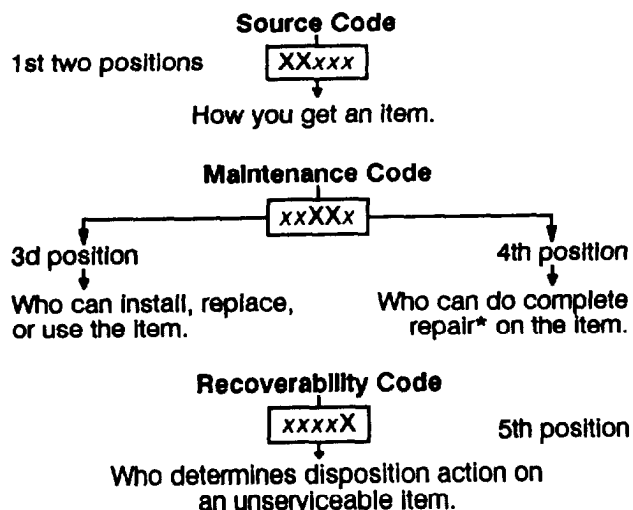
c. Section IV. Cross-reference Indexes. A list, in National Item Identification Number (NIIN) sequence, of all National stock numbered items appearing in the listing, followed by a list in alphanumeric sequence of all part numbers appearing in the listings. National stock numbers and part numbers are cross-referenced to each illustration/figure and item number appearance. The

figure and Item number index lists figure and item numbers in alphanumeric sequence and cross-references NSN, CAGE, and part numbers.

### 3. Explanation of Columns (Sections II and III).

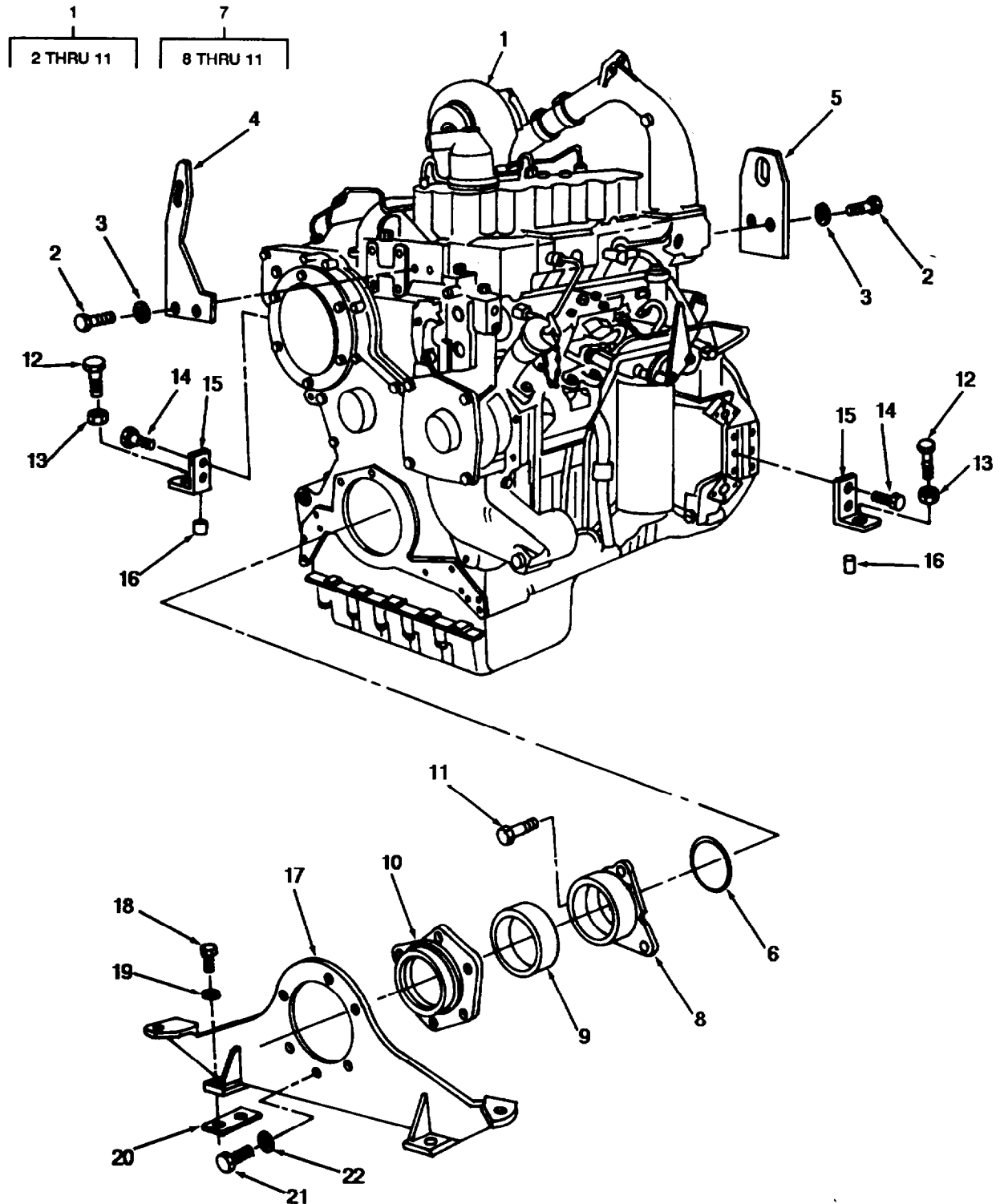
a. ITEM NO. (Column (1)). Indicates the number used to identify Items called cut in the Illustration.

b. SMR CODE (Column (2)). The Source, Maintenance, and Recoverability (SMR) code is a 5-position code containing supply/requisitioning information, maintenance category authorization criteria, and disposition instructions, as shown in the following breakout:



\* Complete Repair Maintenance capacity, capability, and authority to perform all corrective maintenance tasks of the "Repair" function in a use/user environment in order to restore serviceability to a failed item.

(1) Source Code. The source code tells you how to get an item needed for maintenance, repair, or overhaul of an end item/equipment. Explanations of source codes follows:

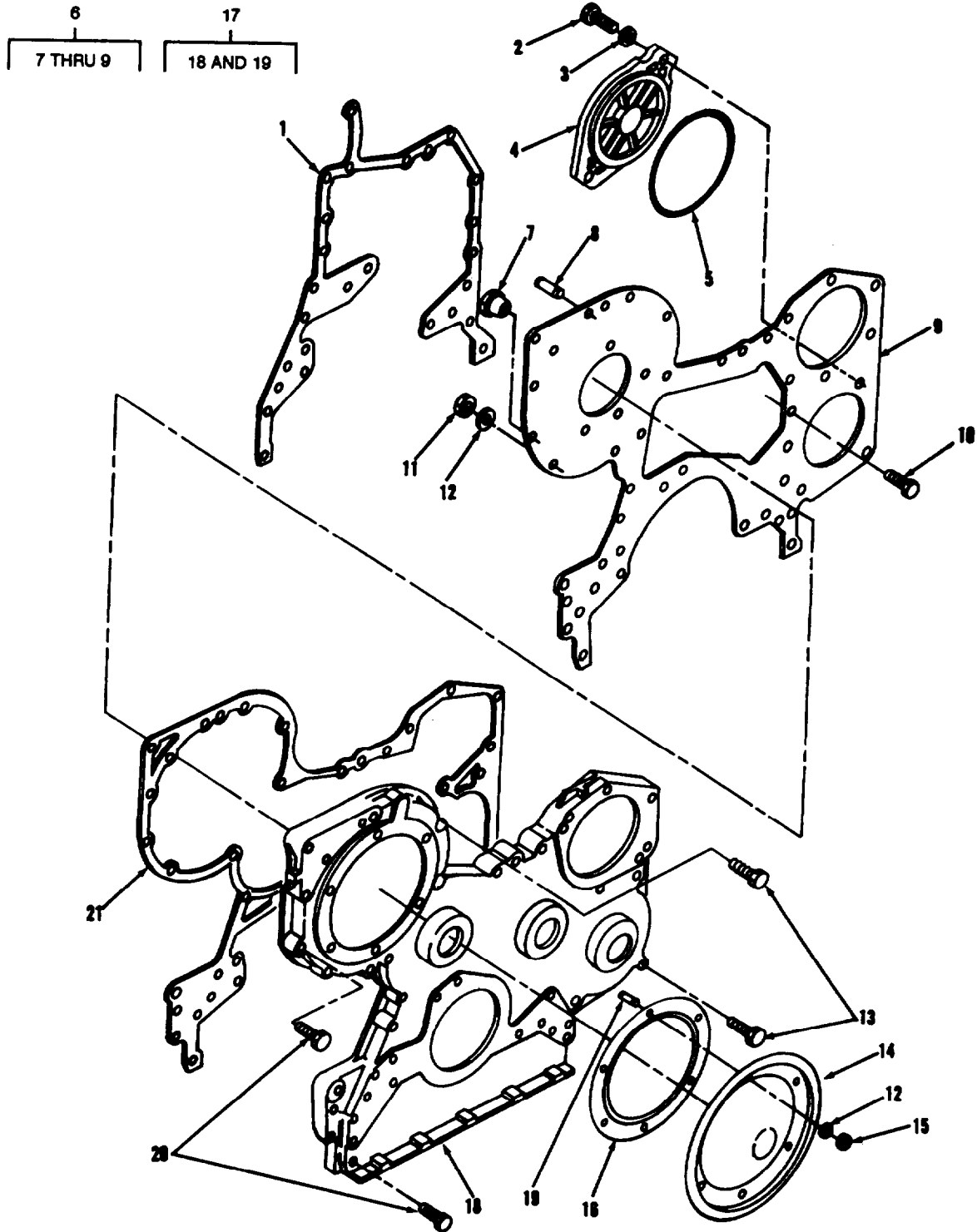


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FIGURE 1. ENGINE AND MOUNTING.

SECTION II			TM5-3805-261-24P			
(1)	(2)	(3)	(4)	(5)	(6)	
ITEM NO	SMR CODE	CAGEC	PART NUMBER	DESCRIPTION AND USABLE ON CODES (UOC)	QTY	
GROUP 01 ENGINE						
GROUP 0100 ENGINE ASSEMBLY						
FIG. 1 ENGINE AND MOUNTING						
1	PAFHD	11083	5R7277	ENGINE,DIESEL	1	
2	PFOZZ	96906	MS35307-462	.SCREW,CAP,HEXAGON	4	
3	PFOZZ	11083	8D5054	.WASHER,FLAT	4	
4	PFOZZ	11083	8N6827	.PLATE, LIFTING EYE	1	
5	PFOZZ	11083	8N8721	.PLATE, LIFTING EYE	1	
6	PFFZZ	11083	2P1692	.PACKING, PREFORMED PART OF KIT P/N 6V2248	1	
7	PFFZZ	11083	1W1219	.TRUNNION ASSEMBLY	1	
8	XAFZZ	11083	8N0081	..TRUNNION	1	
9	PFFZZ	11083	2P1487	..PACKING, PREFORMED PART OF KIT P/N 6V2248	1	
10	XAFZZ	11083	1W1217	..SUPPORT	1	
11	PFFZZ	11083	OL1329	.BOLT,MACHINE	3	
12	PFFZZ	11083	8H6508	SCREW,CAP,HEXAGON H	2	
13	PFFZZ	11083	1D5118	NUT,PLAIN,HEXAGON	2	
14	PFFZZ	11083	7B3235	BOLT,MACHINE	4	
15	PFFZZ	11083	6N6689	BRACKET,ANGLE	2	
16	PFFZZ	11083	4L3395	DOWEL	2	
17	PFFZZ	11083	8N5600	SUPPORT, ENGINE FRON	1	
18	PFFZZ	11083	8S9092	BOLT,MACHINE	4	
19	PFFZZ	96906	MS35340-50	WASHER,LOCK	4	
20	PAFZZ	11083	7B5530	SHIM 0.032 IN. THICK	V	
20	PAFZZ	11083	7B9677	SPACER,PLATE 0.065 IN. THICK	V	
20	PFFZZ	11083	7B5531	SHIM 0.014 IN. THICK	V	
21	PFFZZ	11083	OS1585	BOLT,MACHINE	6	
22	PFFZZ	96906	MS27183-17	WASHER,FLAT	6	

END OF FIGURE



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FIGURE 2. ENGINE FRONT COVERS AND MOUNTING.

## SECTION II

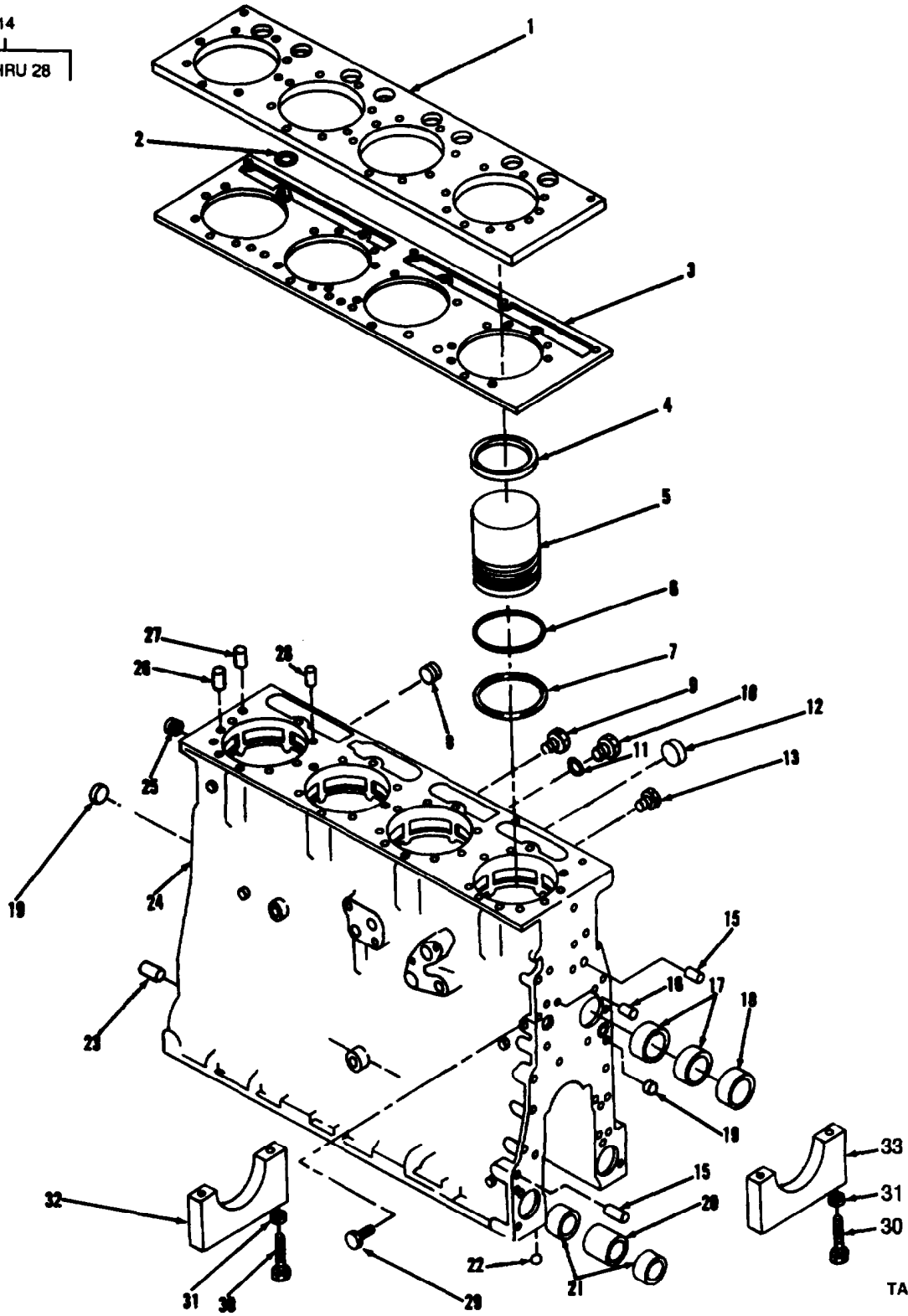
TM5-3805-261-24P

(1) ITEM NO	(2) SMR CODE	(3) CAGEC	(4) PART NUMBER	(5) DESCRIPTION AND USABLE ON CODES (UOC)	(6) QTY
GROUP 0101 CRANKCASE, BLOCK, CYLINDER HEAD FIG. 2 ENGINE FRONT COVERS AND MOUNTING					
1	PAHZZ	11083	8N110	GASKET PART OF KIT P/N 6V2248	1
2	PFHZZ	80204	B182IBH063C175N	SCREW,CAP,HEXAGON H	2
3	PFHZZ	11083	5P8247	WASHER,FLAT	2
4	PFHZZ	11083	7N8374	COVER,ACCESS	1
5	PAHZZ	11083	5F3106	PACKING, PREFORMED PART OF KIT P/N 6V2248	1
6	PFHZZ	11083	1W7816	PLATE ASSEMBLY	1
7	PFHZZ	11083	5M6214	.PLUG,PIPE	1
8	PFHZZ	11083	6HI92	.STUD,PLAIN	3
9	PFHZZ	11083	1W7110	.HOUSING,MECHANICAL	1
10	PFHZZ	03038	LH90725-59	BOLT,SELF-LOCKING	6
11	PFHZZ	11083	1D4717	NUT,HEXAGON	7
12	PFHZZ	11083	5M2894	WASHER,FLAT	7
13	PFHZZ	11083	1C2251	BOLT,MACHINE	2
14	PFHZZ	11083	9N5769	COVER,HOUSING	1
15	PFHZZ	96906	MS35690-624	NUT,PLAIN,HEXAGON	6
16	PAHZZ	11083	6N7887	GASKET PART OF KIT P/N 6V2248	1
17	PFHZZ	11083	8N0109	HOUSING ASSEMBLY, FR	1
18	XAHZZ	11083	8N0535	.HOUSING,FRONT	1
19	PFHZZ	11083	2S42	.STUD	6
20	PFHZZ	11083	L1143	BOLT,MACHINE 2.50 IN. LG	5
20	PFHZZ	11083	L2070	BOLT,MACHINE 2.25 IN. LG	13
20	PFHZZ	11083	0T0573	CAPSCREW,FUEL PUMP 2.75 IN. LG	1
21	PAHZZ	11083	1W3900	GASKET PART OF KIT P/N 6V2248	1

END OF FIGURE



14  
15 THRU 28



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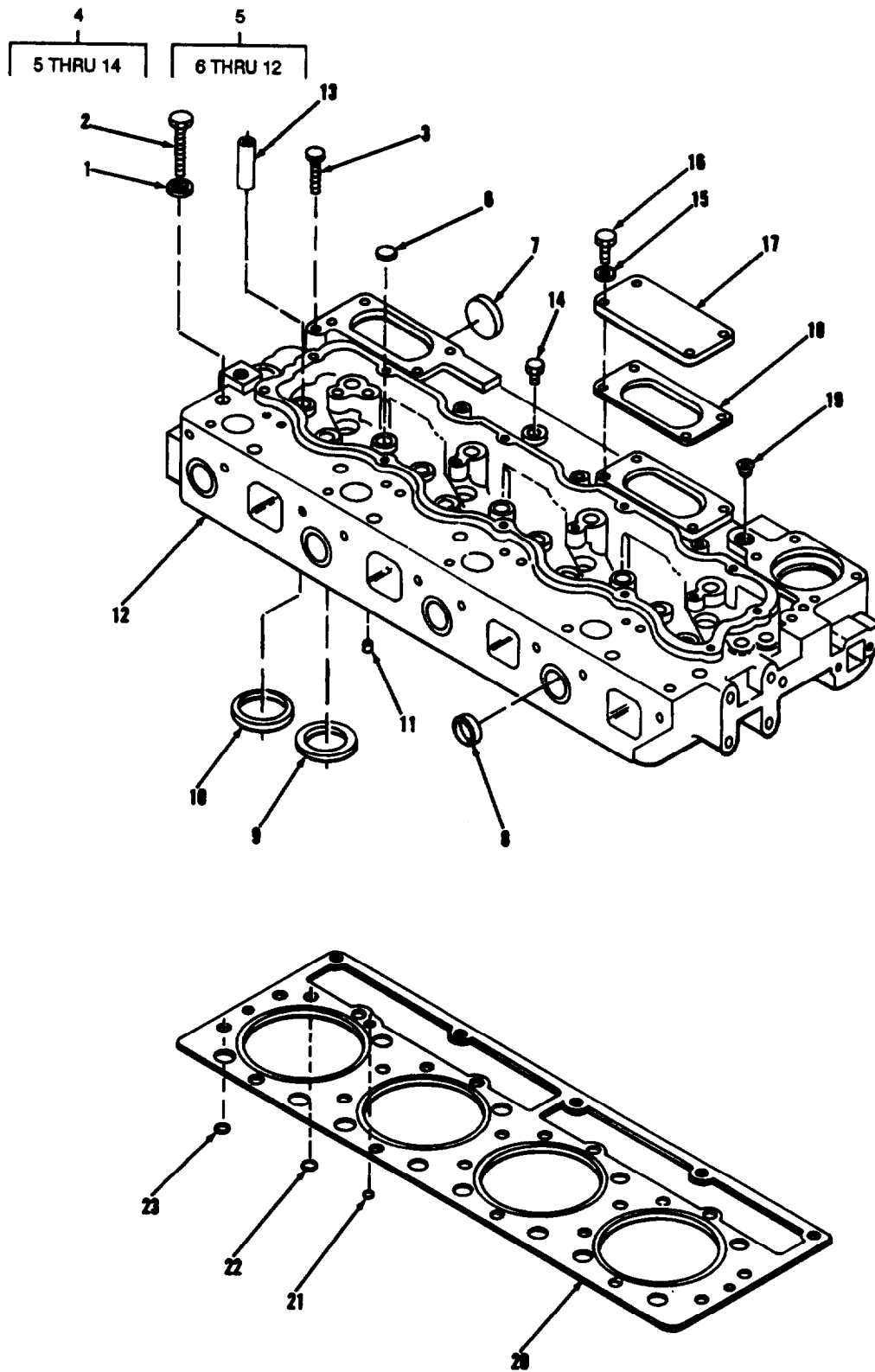
FIGURE 3. CYLINDER BLOCK ASSEMBLY,

## SECTION II

TM5-3805-261-24P

(1) ITEM NO	(2) SMR CODE	(3) CAGEC CAGEC	(4) PART NUMBER	(5) DESCRIPTION AND USABLE ON CODES(UOC)	(6) QTY
GROUP 0101 CRANKCASE, BLOCK, CYLINDER HEAD FIG. 3 CYLINDER BLOCK ASSEMBLY					
1	PFFZZ	11083	7N8021	PLATE,BLOCK	1
2	PAHZZ	11083	3S5496	PACKING,PREFORMED	1
3	PAFZZ	11083	7W7544	GASKET PLATE PART OF KIT P/N 6V2934e	1
4	PFFZZ	11083	2W6134	PACKING,PREFORMED	4
5	PAHZZ	11083	2P8889	CYLINDER SLEEVE	4
6	PAHZZ	58312	5S6670-00	PACKING,PREFORMED PART OF KIT P/N 5P8768	12
7	PAHZZ	11083	5P4174	INSERTION TOOL, SEAT	1
8	PFHZZ	96906	MS27769-3	PLUG,PIPE	1
9	PFHZZ	11083	3J5389	PLUG,PIPE	2
10	PFHZZ	11083	8M9307	PLUG, MACHINE THREAD	1
11	PAHZZ	11083	6F7062	WASHER,FLAT	1
12	PAHZZ	11083	9L7657	PLUG, FUEL PUMP	1
13	PFHZZ	11083	5M6213	PLUG,PIPE	2
14	PFHHH	11083	1N3574	ENGINE BLOCK ,DIESEL	1
15	PFHZZ	11083	8B6349	•PIN,STRAIGHT,HEADLE	2
16	PFHZZ	11083	T101	•STUD,PLAIN	1
17	PAHZZ	11083	7M4046	•BEARING,SLEEVE	2
18	PAHZZ	11083	8N4110	•BEARING,SLEEVE	1
19	PFHZZ	11083	4B3938	•PLUG,EXPANSION	1
20	PAHZZ	11083	9Y2992	•BEARING,SLEEVE	2
21	PAHZZ	11083	5S6419	•BEARING,SLEEVE	4
22	PAHZZ	11083	4B9782	•BALL*BEARING	5
23	PFHZZ	11083	2A3798	•PIN,STRAIGHT~HEADLE	2
24	XAHZZ	11083	1N3564	•BLOCK	1
25	PAHZZ	61038	7077	•PLUG,PIPE	1
26	PFHZZ	11083	8K1207	•PIN,STRAIGHT,HEADLE	1
27	PFHZZ	11083	5B7652	•PIN,STRAIGHT,HEADLE	2
28	PFHZZ	11083	1S9540	•DOWEL	1
29	PFHZZ	11083	5M6214	PLUG,PIPE	1
30	PFHZZ	58312	7S3224-00	BOLT,MACHINE	10
31	PFHZZ	11083	2S5658	WASHER,FLAT	10
32	PAHZZ	11083	6N8003	CLAMP,HUB	4
33	PFHZZ	11083	6N8002	CAP, PILLOW BLOCK	1

END OF FIGURE



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FIGURE 4. CYLINDER BLOCK HEAD ASSEMBLY.

## SECTION II

TM5-3805-261-24P

(1) ITEM NO	(2) SMR CODE	(3) CAGEC	(4) PART NUMBER	(5) DESCRIPTION AND USABLE ON CODES(UOC)	(6) QTY
GROUP 0101 CRANKCASE, BLOCK, CYLINDER HEAD FIG. 4 CYLINDER BLOCK HEAD ASSEMBLY					
1	PFFZZ	11083	2S0736	WASHER	17
2	PFFZZ	11083	1D4595	BOLT,MACHINE	14
3	PFFZZ	80204	B1821BH038C500N	SCREW, CAP, HEXAGON H	5
4	PAFZZ	11083	1N4304	CYLINDER HEAD	1
5	XAHHH	11083	7N7110	•HEAD ASSEMBLY	1
6	PAHZZ	11083	3B0623	•PLUG,EXPANSION	4
7	PFHZZ	11083	3S8313	•PLUG, MACHINE THREAD	3
8	PFHZZ	11083	3P1896	•PLUG,EXPANSION	8
9	PAHZZ	11083	2W4837	•SEAT, VALVE	4
10	PFHZZ	11083	7N4448	•WASHER,RECESSED	4
11	PFHZZ	11083	1S3062	•DIRECTOR, CYLINDER H	12
12	XAHZZ	11083	2W3244	•HEAD,CYLINDER	1
13	PAHZZ	11083	2P1262	•GUIDE, VALVE STEM	8
14	PFHZZ	11083	5M6213	•PLUG,PIPE	4
15	PFHZZ	11083	5M2894	WASHER,FLAT	4
16	PFHZZ	11083	S1594	BOLT,MACHINE	4
17	PFHZZ	11083	1P6367	COVER,ACCESS	1
18	PFHZZ	58312	5S6735-00	GASKET PART OF KIT P/N 6V2934 PART OF KIT P/N 6V2525	1
19	PFHZZ	15235	PLG1	PLUG,PIPE	3
20	PFFZZ	11083	7N8022	GASKET	1
21	PFFZZ	11083	3S5496	PACKING, PREFORMED PART OF KIT P/N 6V2934 PART OF KIT P/N 6V2525	1
22	PAFZZ	11083	7N8018	SEAL,PLAIN	12
23	PAFZZ	11083	4W8087	SEAL,SPECIAL	12

END OF FIGURE