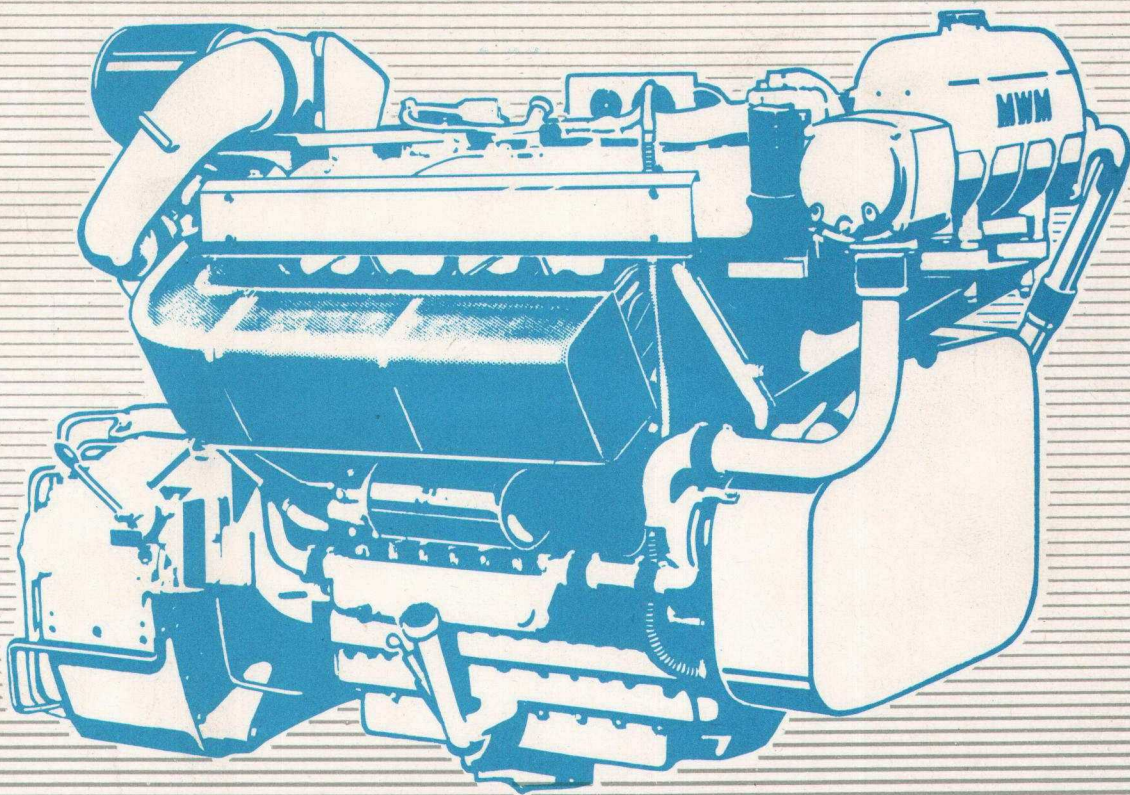


Ersatzteilliste
● Spare Parts Catalogue
Catalogue de Pièces de Rechange
Lista de Repuestos

234 V12



Ersatzteilliste

Spare Parts Catalogue

Catalogue de Pièces de Rechange

Lista de Repuestos

234 V12



6.234.0.006.3160

MIKE Fox / DAVID BETTISON

MWM ENGINE TYPE D234/TBD234/G234

GASKET SETS

D234

BASIC ENGINE GASKET SET

<u>ENGINE TYPE</u>	<u>MWM PART NO.</u>	<u>KHD PART NO.</u>
D234/V6	6.234.0.013.006.8	1216 3072
D234/V8	6.234.0.013.008.8	1216 3073
D234/V12	6.234.0.013.012.8	1216 3074
D234/V16	NOT AVAILABLE	

TBD234

TBD234/V6	6.234.0.013.016.8	1216 3075
TBD234/V8	6.234.0.013.018.8	1216 3076
TBD234/V12	6.234.0.013.022.8	1216 3077
TBD234/V16	6.234.0.013.026.8	1218 7898

G234

G234/V6	6.234.0.013.903.8	1218 7934
G234/V8	6.234.0.013.904.8	1218 7935
G234/V12	6.234.0.013.906.8	1218 7936
G234/V16	NOT AVAILABLE	

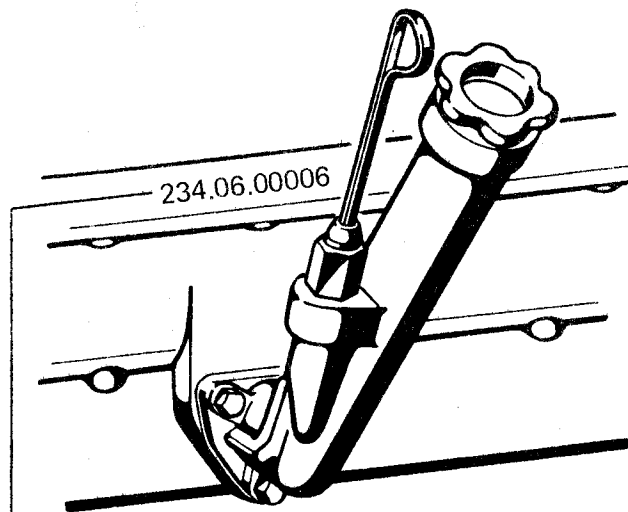
CYLINDER HEAD GASKET SET

D/TBD234	6.234.8.013.001.7	1216 3879
G234	6.234.8.013.901.7	1216 3880

BEST REGARDS

David Rajes

16.09.89



MWM			
MOTOREN - WERKE MANNHEIM AG			
D-6800 MANNHEIM			
MOTOR-TYP	<input type="text"/>		
MOTOR-NR.	<input type="text"/>		
LEISTUNG kW	<input type="text"/>	NACH DIN	<input type="text"/>
DREHZAHL 1/min	<input type="text"/>		<input type="text"/>

Motor - Nummer
 Engine - number
 Numero du moteur
 Numero del motore
 No. de motor

AVANT-PROPOS

Cette liste de pièces de rechange comporte les pièces vendables et interchangeables du moteur qui sont groupées dans des planches selon leur appartenance.

Figures et nomenclatures n'engagent pas notre responsabilité à cause du développement continu de la technique.

Pour la fourniture de pièces de rechange nos conditions de vente et de garantie sont valables.

Commande de pièces de rechange

Pour que notre fourniture soit exécutée correctement, indiquer ce qui suit:

1. **Type de moteur** (voir plaque signalétique)
2. **Numéro de moteur** (voir plaque signalétique et sur carter du vilebrequin)
3. **Nombre de pièces, dénomination, numéro de la pièce, numéro de planche et numéro de figure de la pièce désirée ***
4. **Mode d'envoi désiré**
5. **Adresse exacte** (si nécessaire station postale ou de chemin de fer)

Exemple de commande

Par lettre: Veuillez nous envoyer par exprès un tuyau de protection No. 6.234.0.942.001.5, diagramme No. 19-0420 A / illustration No. 9 pour le moteur, type TBD 234 V 12, numéro 234.12.000002 à l'adresse.

Par télégramme: Envoyez par exprès 19-0420 A / 9, numéro du moteur 234.12.000002 (adresse).

★ Comment trouver les indications désirées ? (par exemple tuyau de protection pour commande de soupapes).

Vous cherchez d'abord dans la liste du diagramme le terme "commande de soupapes". Vous trouverez ensuite le diagramme No. 19-0420 A et dans l'illustration No. 9 le tuyau de protection désiré. La pièce No. 6.234.0.942.001.5 et la dénomination tuyau de protection peut être trouvée dans la liste des pièces détachées de cette illustration.

PREFAZIONE

Questo elenco di parti di ricambio contiene le parti vendibili ed intercambiabili del motore riassunti su grafico in gruppi secondo la loro appartenenza.

Figure e nomenclature sono senza impegno a causa del continuo sviluppo tecnico.

Per la fornitura di parti di ricambio le nostre condizioni di vendita e di garanzia sono applicabili.

Ordine di parti di ricambio

Affinchè la nostra fornitura sia corretta fare le indicazioni seguenti:

1. **Tipo del motore** (ved. targhetta)
2. **Numero del motore** (ved. targhetta o carter)
3. **Numero dei pezzi denominazione, numero della parte, numero del grafico figura-no. della parte desiderate ***
4. **Modo di spedizione desiderato**
5. **Indirizzo esatto** (in caso di bisogno, indicare stazione postale o ferroviaria)

Esempio di ordine

Per lettera: per il motore tipo TBD 234 V 12, numero 234.12.000002, un tubo di protezione 6.234.0.942.001.5, numero di tabella 19-0420 A / fig. nr. 9, a mezzo spedizione espressa al seguente indirizzo (indirizzo).

Telegraficamente: a mezzo spedizione espressa un 19-0420 A / 9. Numero del motore 234.12.000002 (indirizzo).

★ come trovare le indicazioni desiderate ? (per esempio tubo di protezione per azionamento della valvola)

Sulla lista della tabella si cerca innanzitutto l' "azionamento della valvola" e si trova poi la tabella nr. 19-0420 A e qui, sull' illustrazione con la figura nr. 9, il tubo di protezione desiderato. Nella lista dei pezzi di questa tavola figurata si trova poi alla figura nr. 9 il pezzo nr. 6.234.0.942.001.5 e la denominazione del tubo protettivo.

INTRODUCCION

Esta lista de piezas de recambio contiene las piezas vendibles e intercambiables del motor agrupadas en cuadros.

Figuras y nomenclaturas están sin compromiso a causa de la evolución continua técnica. Para la entrega de piezas de recambio rigen nuestras condiciones de venta y de garantía.

Pedido de piezas de recambio

Para nuestra entrega correcta indicar lo que sigue:

1. **Tipo de motor** (véase placa)
2. **Número del motor** (véase placa o cárter)
3. **Número de piezas, denominación, número de pieza, no del cuadro y de la figura de la pieza deseada ***
4. **Modo de expedición deseado**
5. **Dirección exacta** (en caso necesario indicar posta y estación ferroviaria)

Ejemplo

Pedido por escrito: Envíenos para el motor TBD 234 V 12 No. 234.12.00002 un tubo de protección, 6.234.0.942.001.5, tabla No. 19-0420 A / Figura No. 9 por expreso a (dirección).

Pedido telegráfico: Expreso un 19-0420 A / 9 motor No. 234.12.00002 (dirección).

★ Como acertar las indicaciones deseadas ? (por ej.: tubo de protección para accionamiento de válvula)

Comenzar con buscar en lista de tablas "el accionamiento de válvulas" encontrando así la tabla No. 19-0420 A y aquí la ilustración con la figura No. 9, el tubo de protección deseado. En la nomenclatura de esa tabla se busca entonces bajo figura No. 9 la denominación tubo de protección y el número de la pieza 6.234.0.942.001.5.

EINLEITUNG

Diese Ersatzteilliste enthält die verkäuflichen und auswechselbaren Teile des Motors, die – entsprechend ihrer Zugehörigkeit zu bestimmten Baugruppen – in Bildtafeln zusammengefaßt sind. Abbildungen und Stücklisten sind wegen technischer Weiterentwicklung unverbindlich. Für die Lieferung von Ersatzteilen gelten unsere Verkaufs- und Garantiebedingungen.

Ersatzteilbestellung

Erwarten Sie unsere richtige Lieferung; dazu brauchen wir folgende Angaben:

1. **Motor-Typ** (im Typenschild eingeschlagen)
2. **Motor-Nr.** (im Typenschild und Kurbelgehäuse eingeschlagen)
3. **Stückzahl, Benennung, Teil-Nr., Tafel- und Bild-Nr.** des gewünschten Ersatzteils *
4. **Gewünschte Versandart**
5. **Genaue Anschrift** (falls erforderlich Post- oder Bahnstation)

Bestellbeispiel

Brieflich: Senden Sie uns für den Motortyp TBD 234 V 12, Motor-Nr. 234.12.000002 ein Schutzrohr 6.234.0.942.001.5, Tafel-Nr. 19-0420 A / Bild-Nr. 9, per Expreßgut an(Anschrift).

Telegrafisch: Expreß ein 19-0420 A / 9. Motor-Nr. 234.12.000002 (Anschrift).

★ Wie finde ich die gewünschten Angaben ? (z.B. Schutzrohr für Ventilbetätigung)

Im Tafelverzeichnis sucht man zunächst die „Ventilbetätigung“ findet so die Tafel-Nr. 19-0420 A und hier in der Abbildung mit Bild-Nr. 9 das gewünschte Schutzrohr. In der Stückliste dieser Bildtafel ermittelt man dann bei Bild-Nr. 9, die Teile-Nr. 6.234.0.942.001.5 und die Benennung Schutzrohr.

INTRODUCTION

This spare part list comprises the purchasable and replaceable engine parts shown on diagrams and grouped according to their belonging.

On account of continuous technical development the figures and part lists are not binding. Our sales and guaranty conditions apply to the delivery of spare parts.

Ordering spare parts

We will supply you properly and therefore we want the following statements:

1. **Engine-Type** (engraved on type-plate)
2. **Engine Number** (engraved on type-plate and crankcase)
3. **Number of Pieces, Name, Part No., Diagram No. and Item-No., of the spare part wanted***
4. **Kind of Dispatch you wish**
5. **Your Address** (post or railway station if necessary)

Ordering example

By letter: Please send us for the engine type TBD 234 V 12, engine No. 234.12.000002 a protective pipe 6.234.0.942.001.5, diagram No. 19-0420 A / figure-No. 9 by express to (address).

By telegram: Send by express a 19-0420 A / 9. Engine No. 234.12.000002(address).

★ How to find the desired indications? (e.g. protective pipe for valve actuation)

First look for "valve actuation" in the list of the diagram. There you will find the diagram No. 19-0420 A and under figure-No. 9 the desired protective pipe. In the parts list of that figure you will find the part No. 6.234.0.942.001.5 and the designation protective pipe.

Anschrift - Address - Adresse - Indirizzo - Dirección

Motoren-Werke Mannheim AG

Postfach 102263

Werk II – Abt. AK - Z

D-6800 Mannheim 1

Telefon: 0621/3841 oder 384 502

Telex: 0 463 002

Telephone
Téléphone
Telefono
Teléfono

Die Ersatzteil-Tafeln können für mehrere Motortypen gültig sein. Auf Seite 1 jeder Ersatzteil-Tafel sind oben links die Motortypen durch Punkt gekennzeichnet, für die die betreffenden Tafeln gleicher Nummer (Seite 1 und folgende) gültig sind.

Beispiel:

	D	TD	TBD	G	TBG
232	•	•	•		
234					
932	•				

Diese so gekennzeichneten Ersatzteil-Tafeln sind gültig für:

D 232, TD 232, TBD 232 und D 932

The spare parts tables may be applied to several engine types. The engine types, to which the respective tables – pertaining to the same number – are being applied (page 1 and the following tables), are marked by a spot on page 1, left above, of each spare parts table.

Example:

	D	TD	TBD	G	TBG
232	•	•	•		
234					
932	•				

The spare parts tables marked like this are valid for:

D 232, TD 232, TBD 232 and D 932

Les planches de pièces de rechange peuvent s'appliquer à plusieurs types de moteurs. Sur la page 1 de chaque planche de pièces de rechange sont repérés, en haut à gauche, par un point les types de moteurs auxquels s'appliquent les planches respectives de même numéro (page 1 et suivantes).

Exemple:

	D	TD	TBD	G	TBG
232	•	•	•		
234					
932	•				

Ces planches de pièces de rechange ainsi repérées s'appliquent aux:

D 232, TD 232, TBD 232 et D 932.

Las tablas de piezas de requesto pueden ser válidas para varios tipos de motores. En la Pág. 1 de cada tabla de piezas de requesto, en la parte superior izquierda están marcados con un punto los tipos de motor para los cuales son válidas las respectivas tablas con el mismo número (véase Pág. 1 y siguientes).

Ejemplo:

	D	TD	TBD	G	TBG
232	•	•	•		
234					
932	•				

Marcados de este modo. Las tablas de piezas de requestos son válidas para:

D 232, TD 232, TBD 232 y D 932

Le tabelle dei pezzi di ricambi possono essere valide per vari tipi di motori. A pagina 1 di ogni tabella dei pezzi di ricambi sono contrassegnati in alto a sinistra i tipi di motori mediante un punto, per i quali sono valide le rispettive tabelle aventi lo stesso numero (pagina 1 e seguente).

Esempio:

	D	TD	TBD	G	TBG
232	•	•	•		
234					
932	•				

Queste tabelle dei pezzi di ricambio contrassegnate in tal modo sono valide per:

D 232, TD 232, TBD 232 e D 932

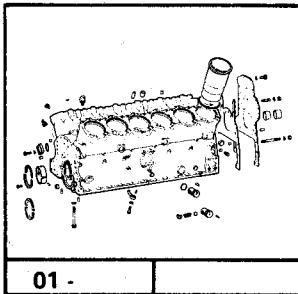
Tafelverzeichnis

List of tables

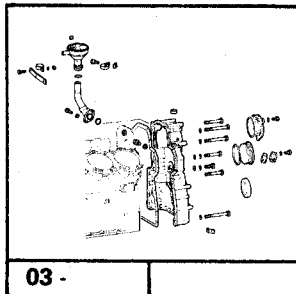
Liste des planches

Lista de cuadro

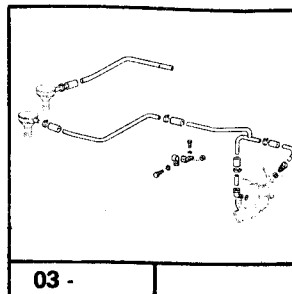
Lista di tavole



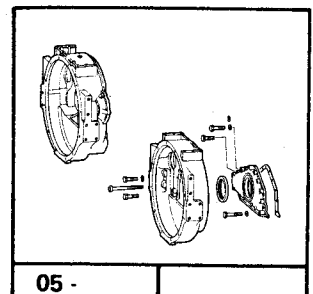
01 -



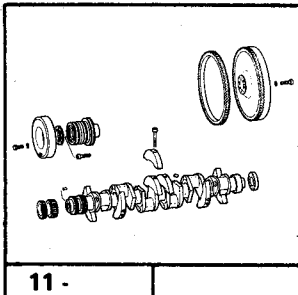
03 -



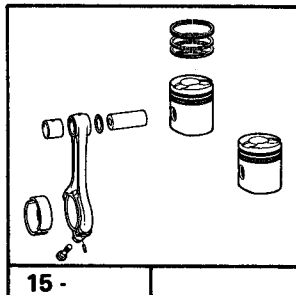
03 -



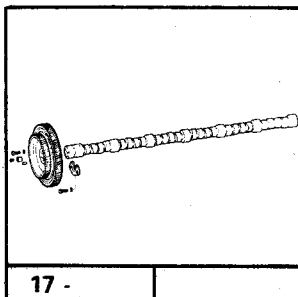
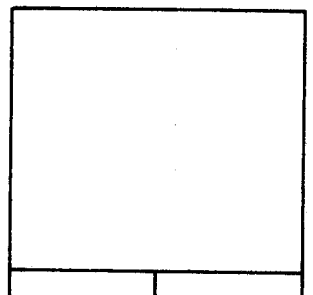
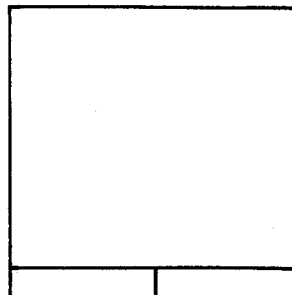
05 -



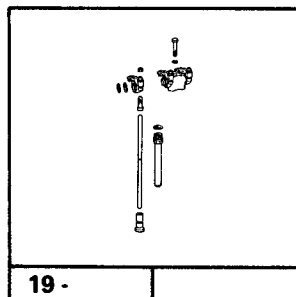
11 -



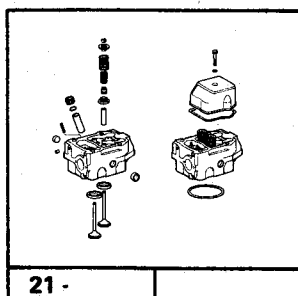
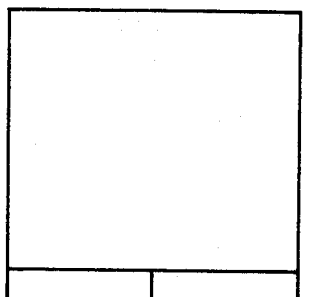
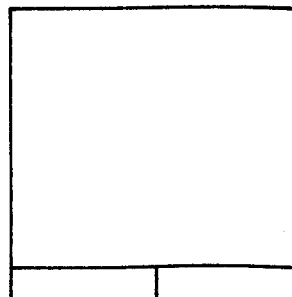
15 -



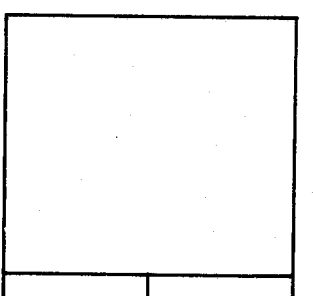
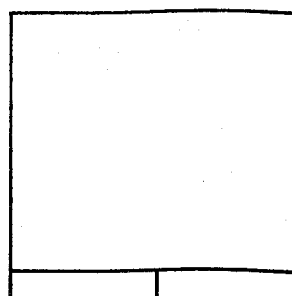
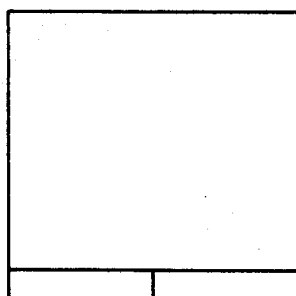
17 -

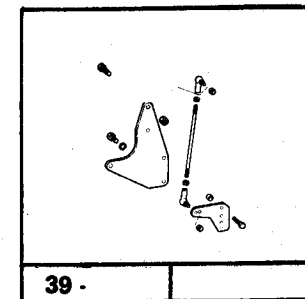
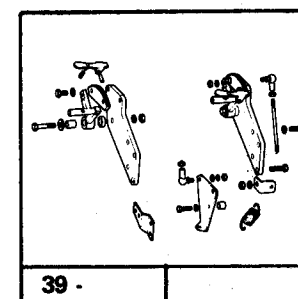
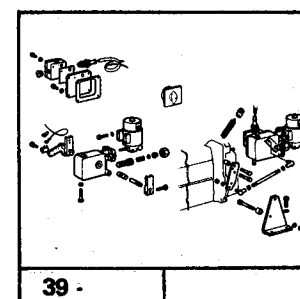
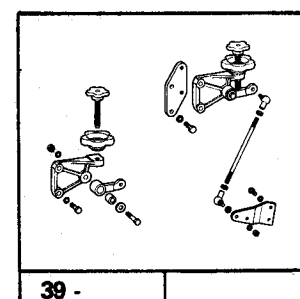
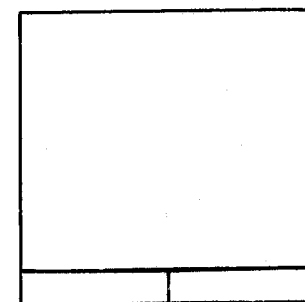
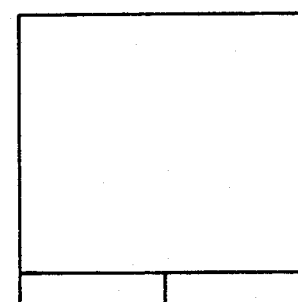
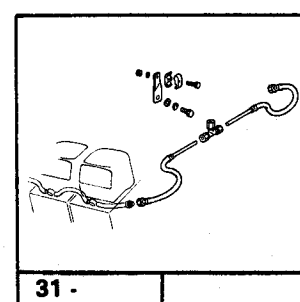
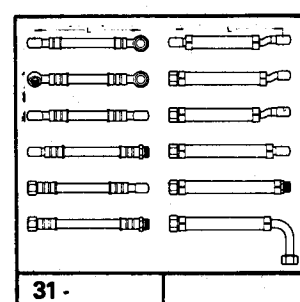
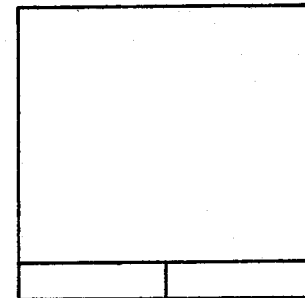
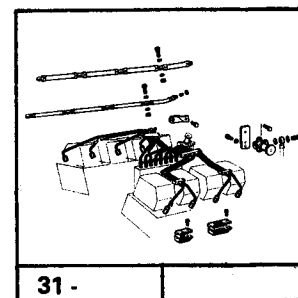
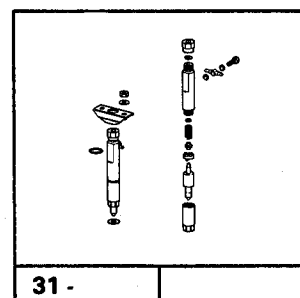
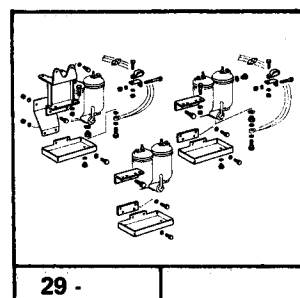
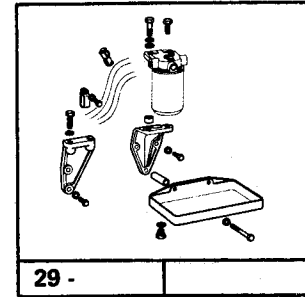
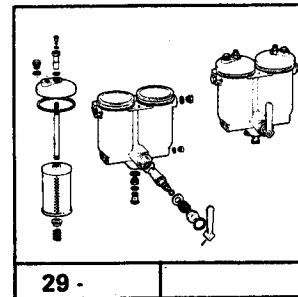
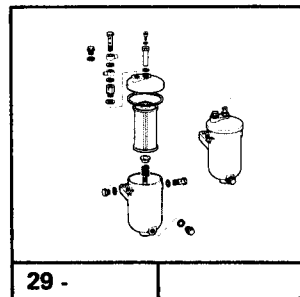
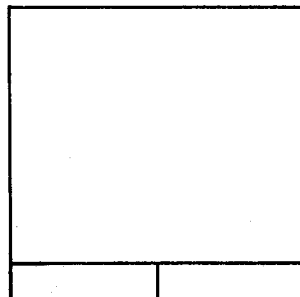
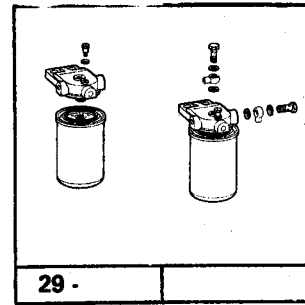
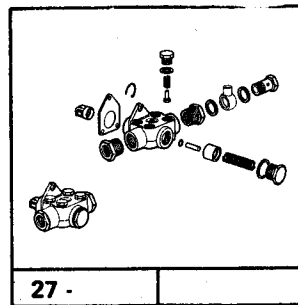
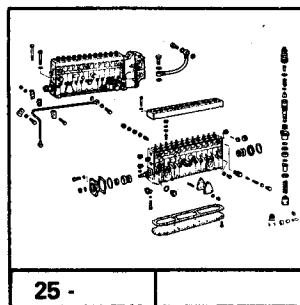
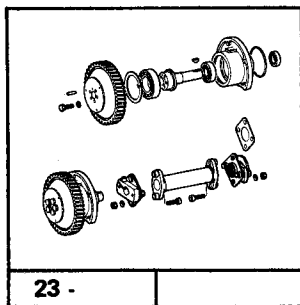


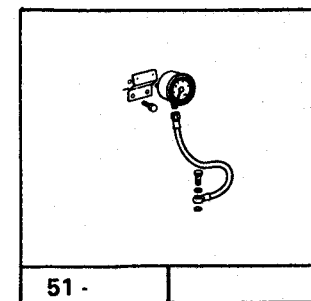
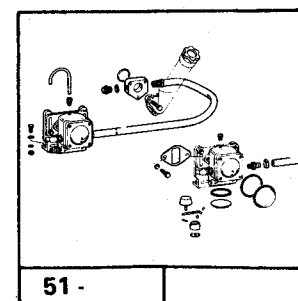
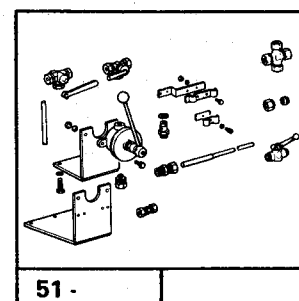
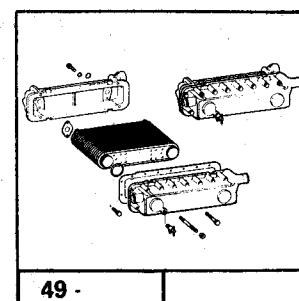
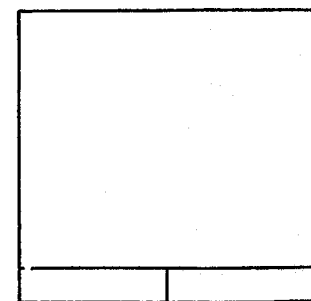
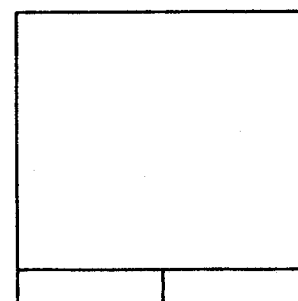
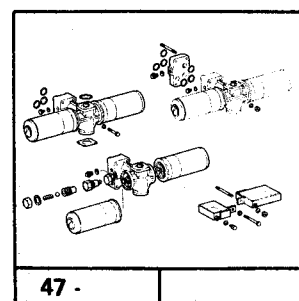
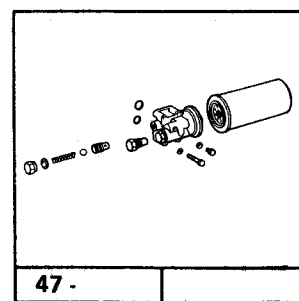
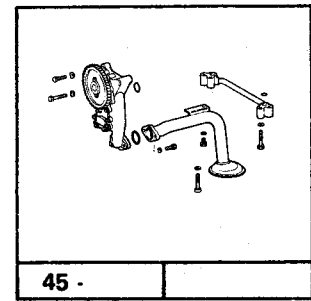
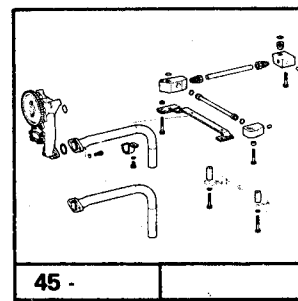
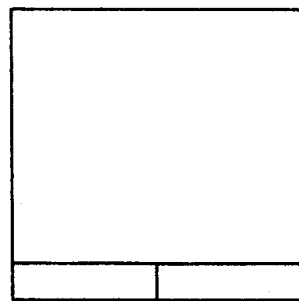
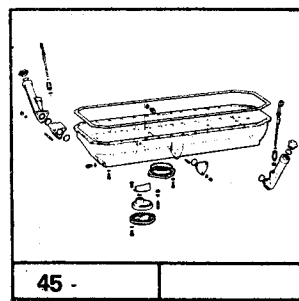
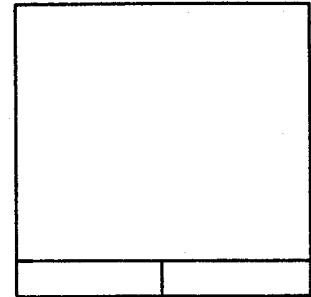
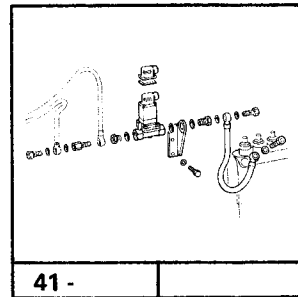
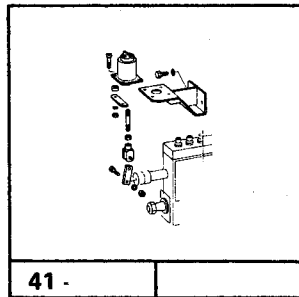
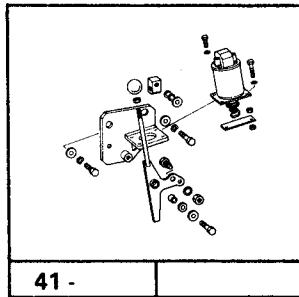
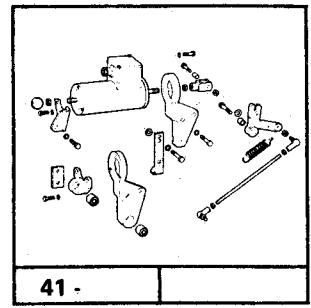
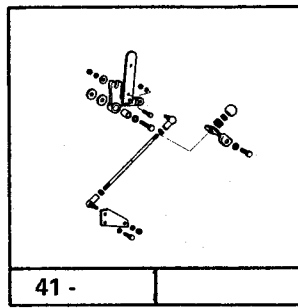
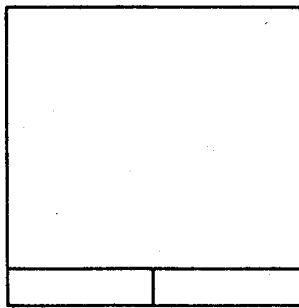
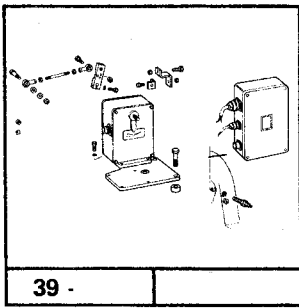
19 -

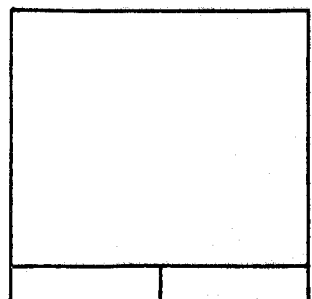
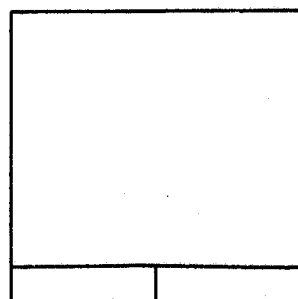
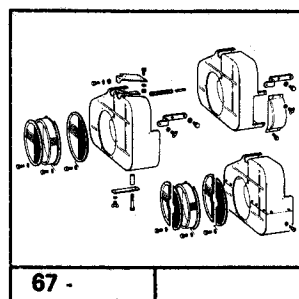
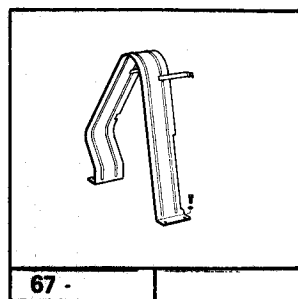
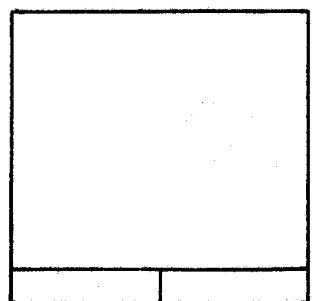
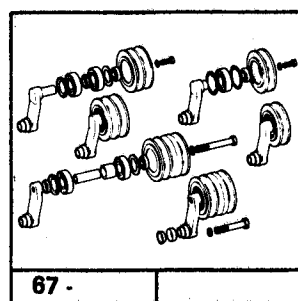
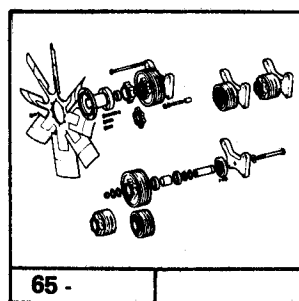
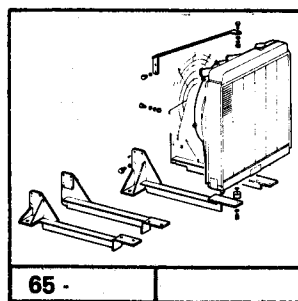
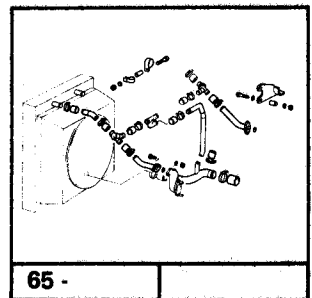
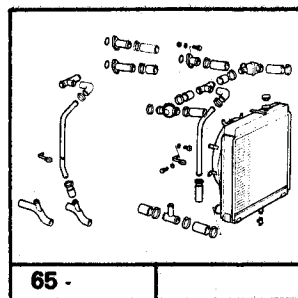
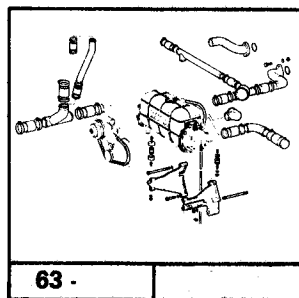
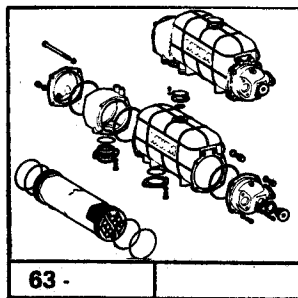
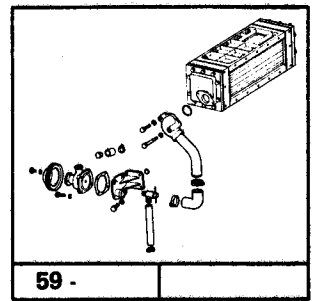
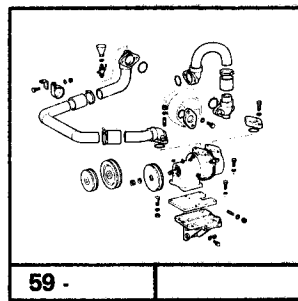
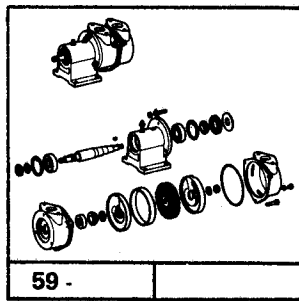
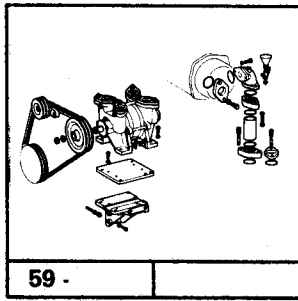
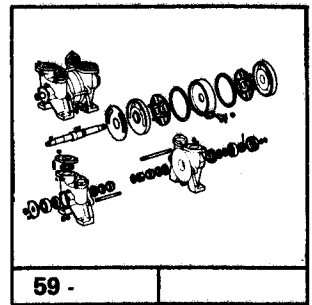
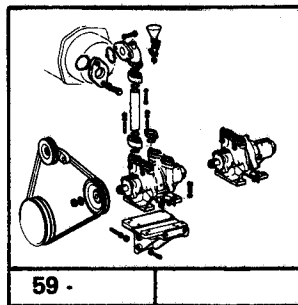
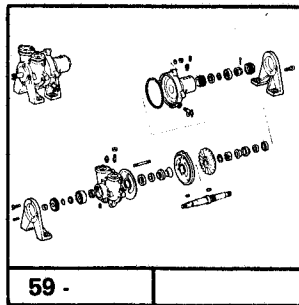
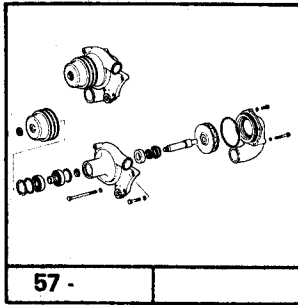


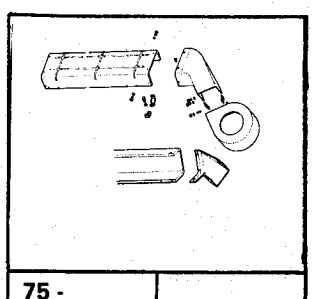
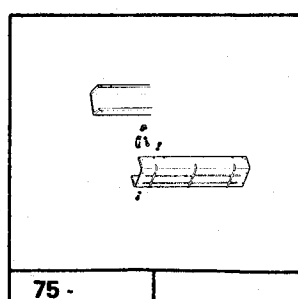
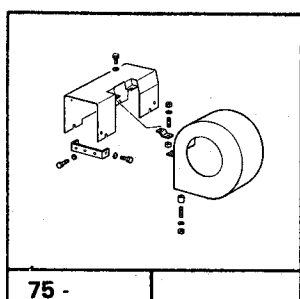
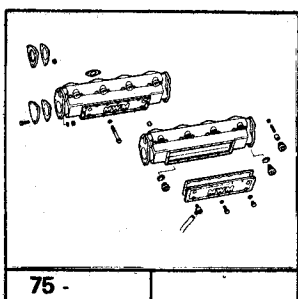
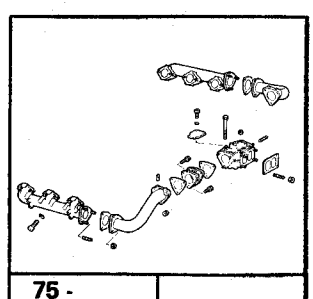
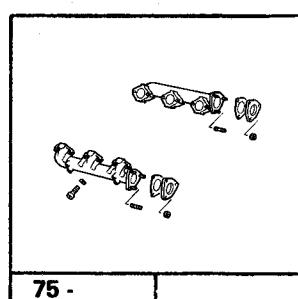
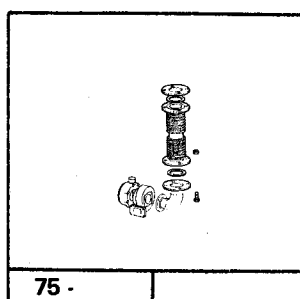
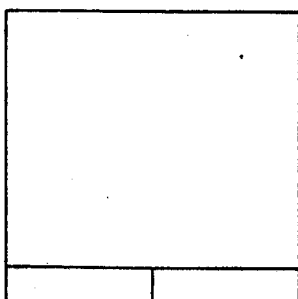
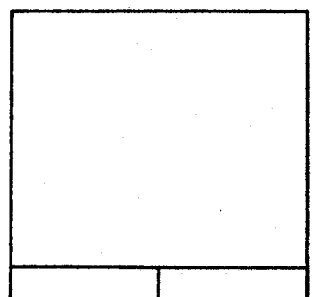
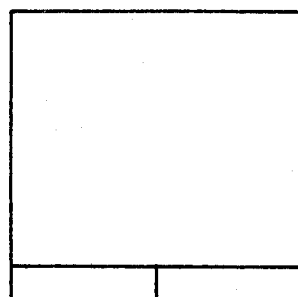
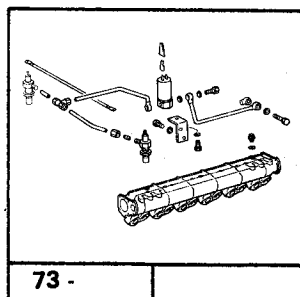
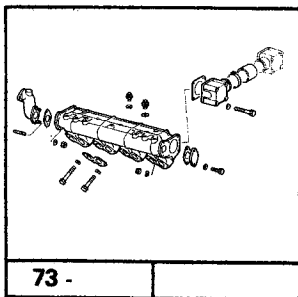
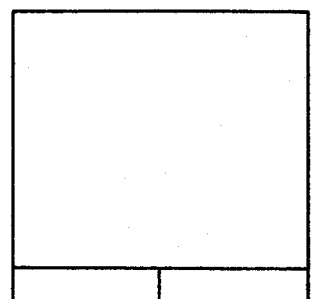
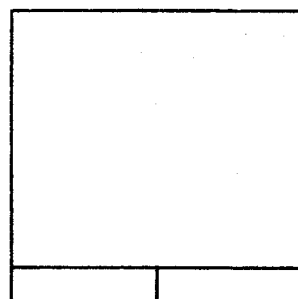
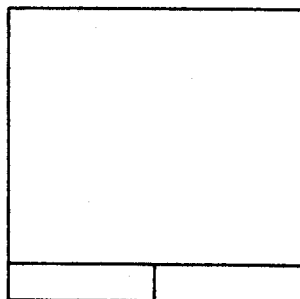
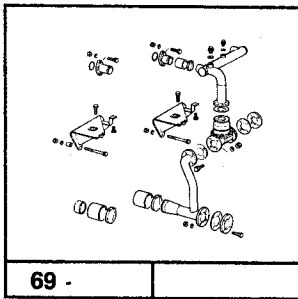
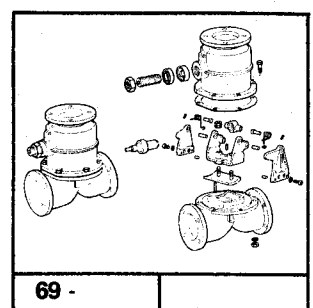
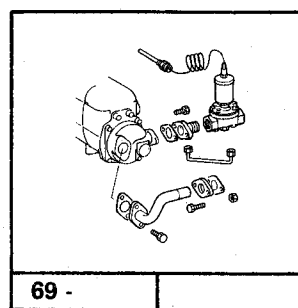
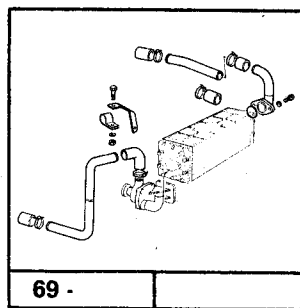
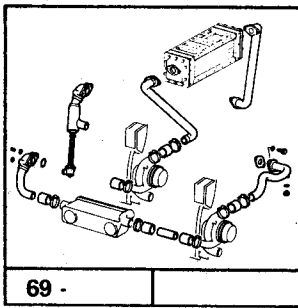
21 -

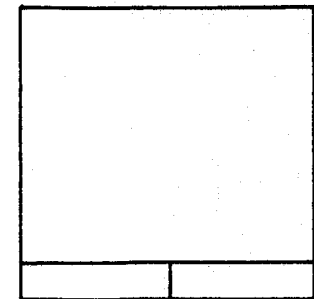
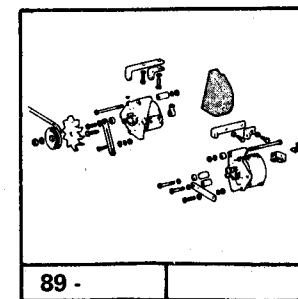
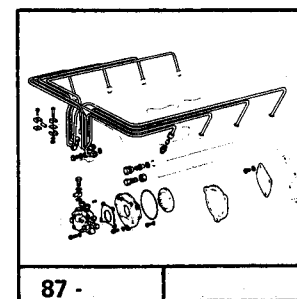
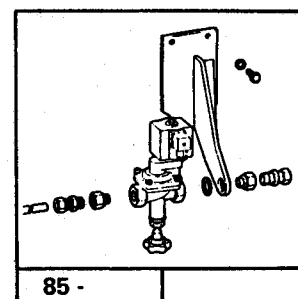
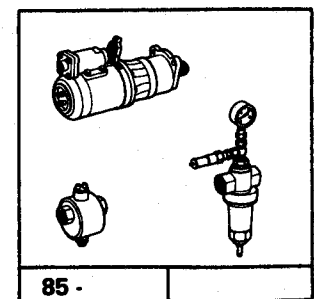
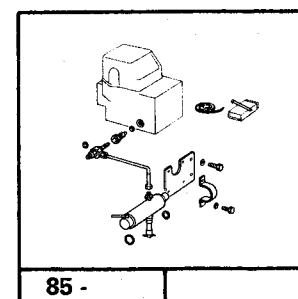
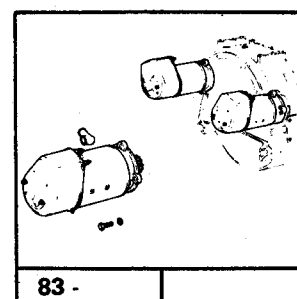
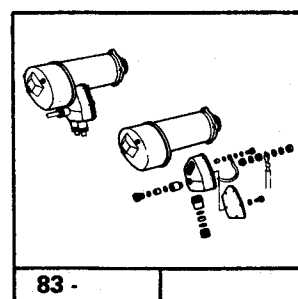
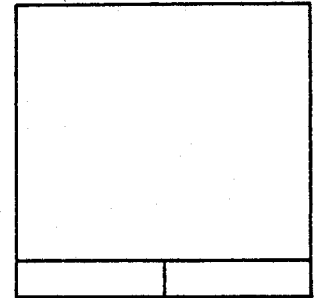
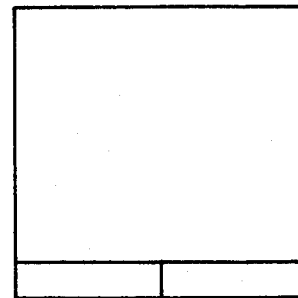
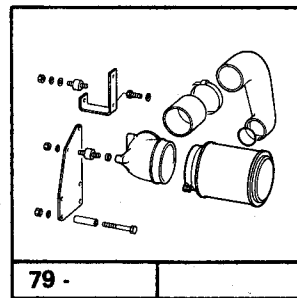
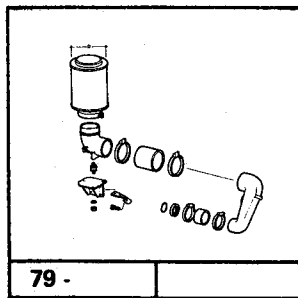
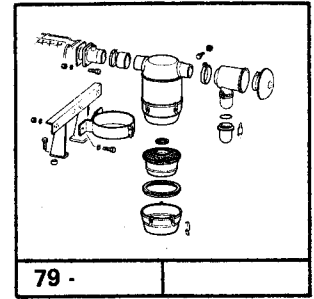
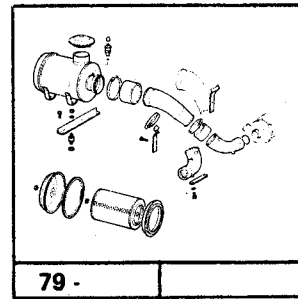
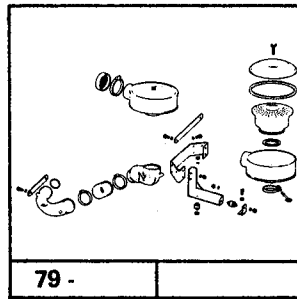
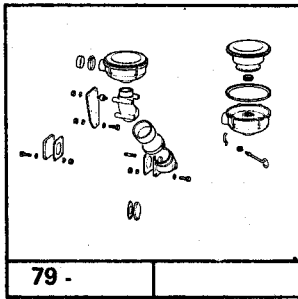
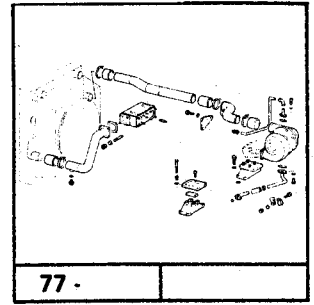
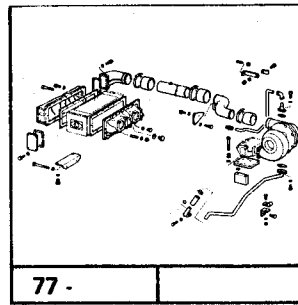
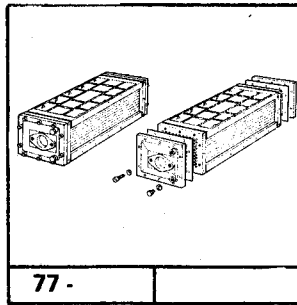
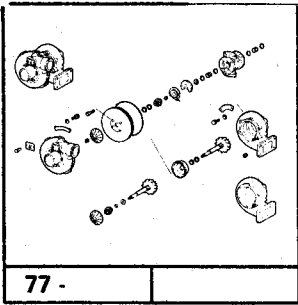


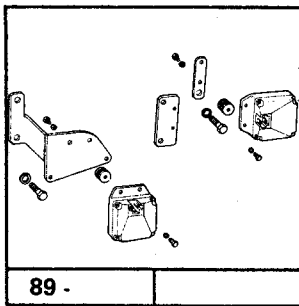




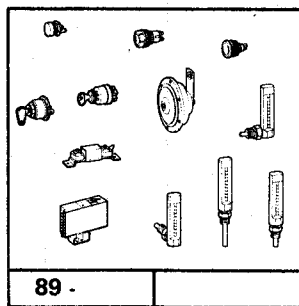




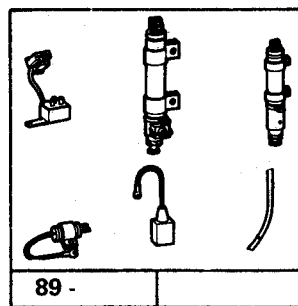




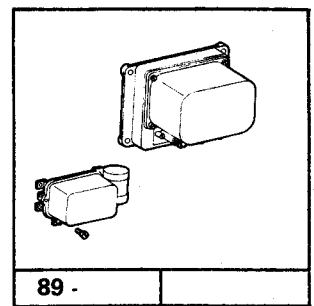
89 -



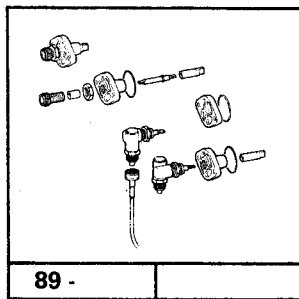
89 -



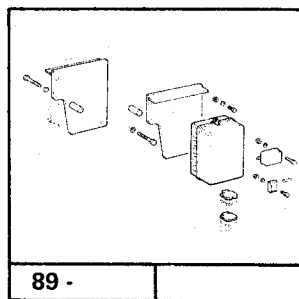
89 -



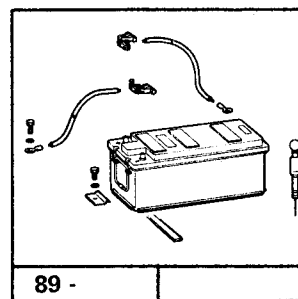
89 -



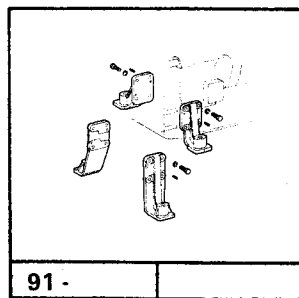
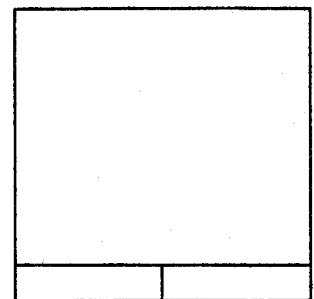
89 -



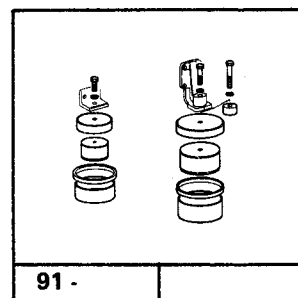
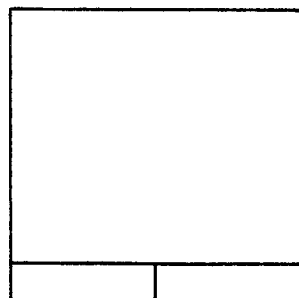
89 -



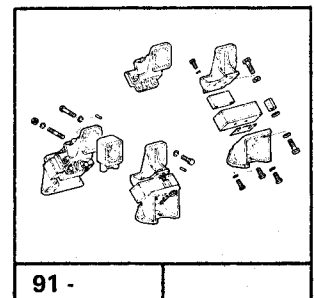
89 -



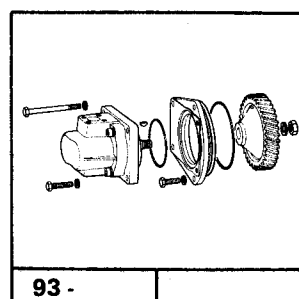
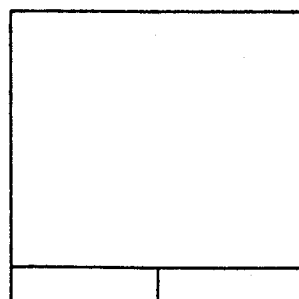
91 -



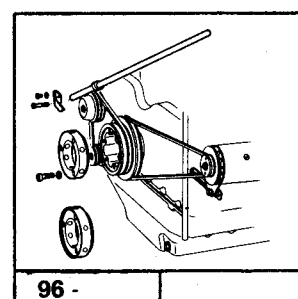
91 -



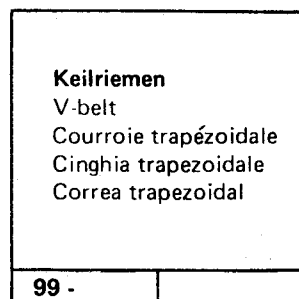
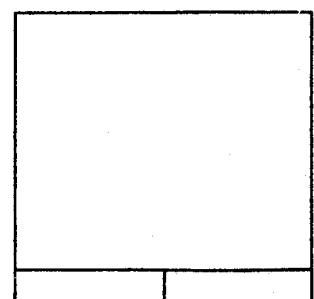
91 -



93 -

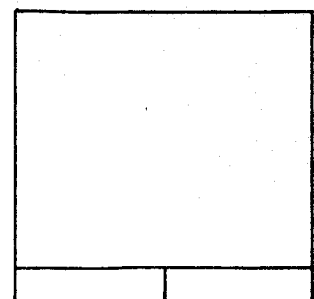
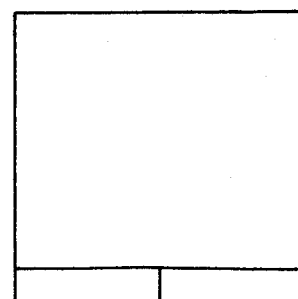
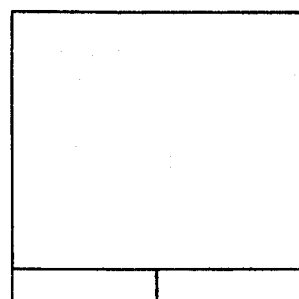


96 -



Keilriemen
V-belt
Courroie trapézoidale
Cinghia trapezoidale
Correa trapezoidal

99 -



	D	TD	TBD	G	TBG
232					
234	•		•	•	
932					

Kurbelgehäuse

Crankcase
Carter de vilebrequin
Carter di motore
Cárter de cigüeñal

12 Zyl. / 12 Cyl.

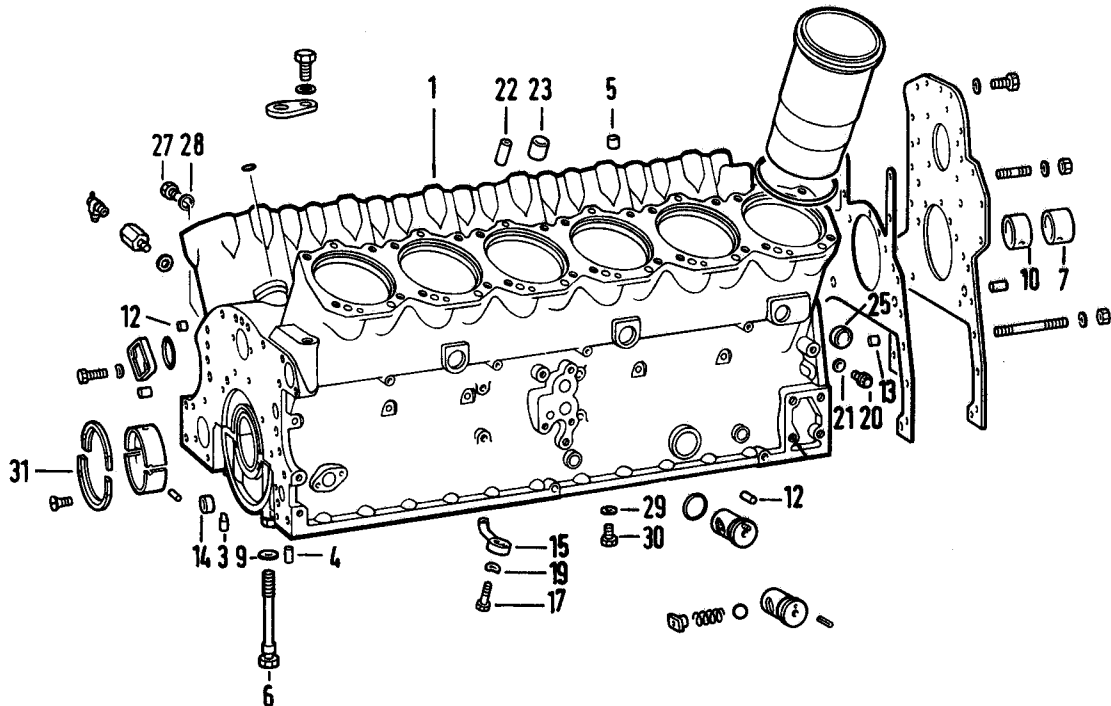


Bild-Nr. Fig. No Fig. no Fig. no Fig. no	Teil Nr. Piece No No de la pièce No del pezzo No de la pieza	Sonderangaben Special data Indications spéciales Dati speciali Indicaciones especiales	Benennung Denomination Dénomination Denominazione Denominación	Stückzahl Number Quantité Quantità Cantidad	
1	6.234.8.110.066.7		Zylinderkurbelgehäuse, kpl. best. aus Bild-Nr. 3-33	Cylinder crankcase, compl. consist of fig. No. 3-33	1
3	6.232.0.310.001.4		Zylinderstift	Straight pin	7
4	6.232.0.310.002.4		Zylinderstift	Straight pin	7
5	6.232.0.330.022.4		Buchse	Bush	1
6	6.0200.01.8.1856	BM18x165DIN931m12.9	Sechskantschraube	Hexagon screw	28
7	6.234.0.432.002.2		Lagerbuchse	Bearing bush	2
9	6.0215.06.1.1851		Scheibe	Washer	28
10	6.234.0.432.001.2		Lagerbuchse	Bearing bush	5
12	6.205.1.327.001.4	Ø 10 mm	Stopfen	Plug	8
13	6.324.1.327.002.4	Ø 14 mm	Stopfen	Plug	4
14	6.0215.21.8.0025	25DIN443-X6CRM017	Verschlußschraube	Cap	6
15	6.234.0.465.001.5		Düse für Kühlöl	Nozzle for cooling oil	12
17	6.0200.01.0.0845	M8x45DIN931-8.8	Sechskantschraube	Hexagon screw	12
19	6.0216.03.1.0080	B 8 DIN 137	Federscheibe	Spring washer	12
20	6.0206.05.0.1010	AM10x1DIN7604-5.8	Verschlußschraube	Screw plug	1
21	6.0492.01.0.1014	A10x14DIN7603-Cu	Dichtring	Packing ring	1
22	6.232.0.330.014.4		Hülse	Sleeve	24
23	6.234.0.330.011.4		Hülse	Sleeve	24
25	6.0215.21.8.0030	30DIN443-XCRM017	Verschlußdeckel	Cap	6
27	6.0206.05.0.1215	AM12x1,5DIN7604-5.8	Verschlußschraube	Screw plug	1
28	6.0492.01.0.1218	A12x18DIN7603-Cu	Dichtring	Packing ring	1
29	6.300.0.340.001.4		Scheibe	Washer	1
30	6.0200.05.0.0815	M8x16DIN933-8.8	Sechskantschraube	Hexagon screw	1
31	6.234.0.340.001.4		Ringhälfte	Ring half	2