



**SCATOLE INGRANAGGI
GEARBOXES
GETRIBE
RENVOIS D'ANGLE
CAJAS DE ENGRANAJES**



**SCATOLE INGRANAGGI
AD ASSI PARALLELI
PARALLEL SHAFT GEARBOXES
STIRNRADGETRIEBE
BOITERS A ARBRES PARALLELES
CAJAS DE ENGRANAJES
DE EJES PARALELOS**

S004

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La sicurezza di impiego delle macchine agricole deve essere ricercata in sede di progettazione al pari della funzionalità e dell'efficienza. Seguendo questa filosofia Bondioli & Pavesi ha sviluppato una gamma di scatole ad ingranaggi e di dispositivi in grado di aiutare il progettista nel raggiungimento di questi obiettivi.

The initial design of a machine must satisfy safety goals along with the functional, operational and efficiency requirements.

To assist the designer in meeting these goals, Bondioli & Pavesi has developed a range of gearboxes with several and unique features.

Die Bediener-sicherheit einer Landmaschine sollte ebenso wie Funktionalität und Wirkungsgrad bereits zu Beginn der Projektierung als wichtiges Entwicklungsziel angestrebt werden. Diesem Grundsatz folgend hat Bondioli & Pavesi ein Programm an Getrieben und Vorrichtungen entwickelt, das dem Projekt-ingenieur beim Erreichen dieser Zielsetzungen sehr hilfreich sein kann.

Tutti i modelli compresi nella gamma Bondioli & Pavesi sono dotati di forature per la applicazione di contro cuffie (fornibili separatamente) o di altri sistemi di protezione per gli alberi in rotazione.

Bondioli & Pavesi raccomanda la applicazione di protezioni antinfortunistiche per tutti gli alberi e componenti in rotazione.

All gearboxes in the standard Bondioli & Pavesi range have threaded holes for the attachment of shaft cones (supplied separately) or other auxiliary shielding.

Bondioli & Pavesi strongly recommends that all rotating shafts and their couplings be properly guarded.

Alle Modelle des Bondioli & Pavesi-Programms sind mit Gewindebohrungen zur Befestigung von Schutztöpfen (separat lieferbar) oder anderen Schutzsystemen für drehende Wellen ausgerüstet.

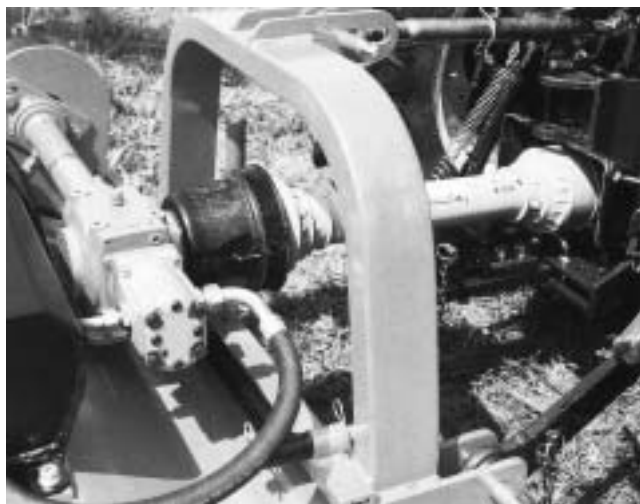
Bondioli & Pavesi weist hiermit nochmals ausdrücklich auf die Pflicht der Hersteller hin, alle drehenden Teile ihrer Maschine mit einem Unfallschutz zu versehen.



Per esigenze specifiche Bondioli & Pavesi mette a disposizione una serie di dispositivi incorporati in grado di evitare la presenza dell'operatore durante la manovra in area pericolosa.

For specific applications, Bondioli & Pavesi gearboxes can incorporate remote control functions which do not require the operator to approach the equipment during operation.

Für spezifische Anforderungen bietet Bondioli & Pavesi eine Reihe von Vorrichtungen an, die im Getriebe integriert werden können. Dadurch ist vermeidbar, daß sich die Bedienerperson während der Arbeit in Gefahrenbereiche begeben muß.



Sono disponibili inoltre componenti come prolunghe ed attacchi pompa per razionalizzare il progetto della macchina e renderla più sicura.

Options including extensions arms and hydraulic pump mounts are available to simplify the power transmission system, and thereby make it safer.

Darüberhinaus sind Komponenten wie Verlängerungen und Pumpenanschlüsse lieferbar für rationelle und sicherere Maschinenkonstruktionen.



Bondioli & Pavesi ha realizzato una gamma di controcuffie in plastica rigida per aiutare il progettista nella scelta delle protezioni montate sulla macchina.

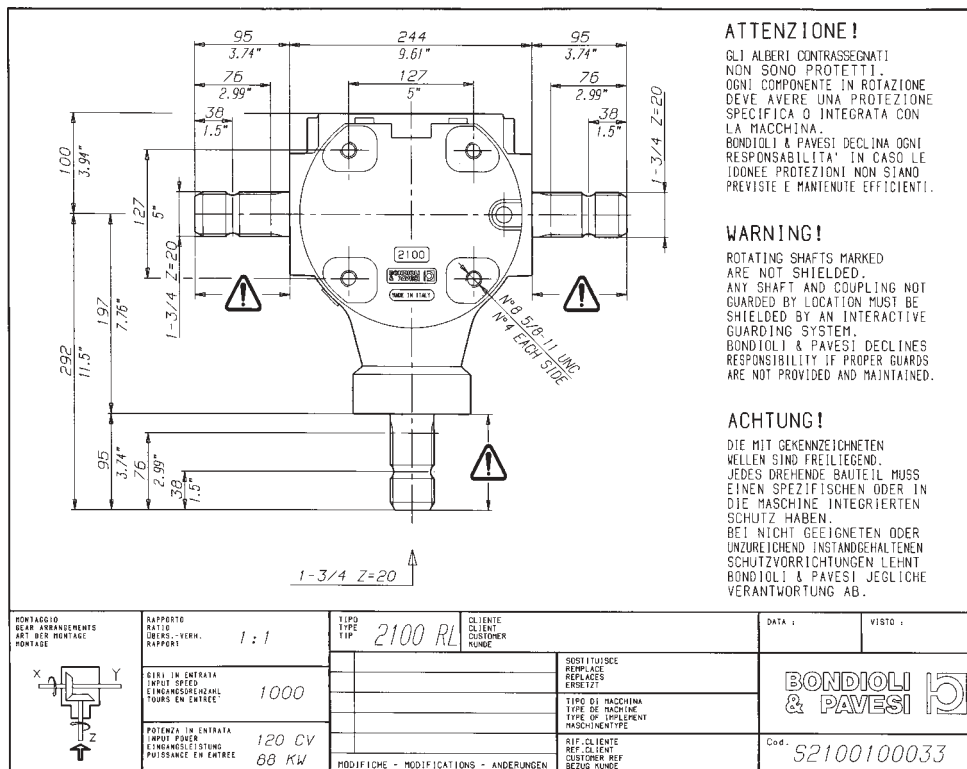
To aid the designer in the selection of auxiliary shielding, Bondioli & Pavesi has developed a family of rigid plastic shaft cones, which may be mounted to the gearbox or to the machine.

Bondioli & Pavesi bietet ein Programm an Schutzkappen (Hart-PVC), um dem Projektgenieur bei der Auswahl der auf die Maschine zu montierenden Schutzvorrichtungen zu helfen.

Ogni componente in rotazione deve avere una protezione specifica o integrata con la macchina. Nel caso la protezione possa essere asportata o danneggiata è consigliabile segnalare all'operatore la situazione di pericolo mediante specifiche etichette e manuali di istruzioni.

Rotating shafts and their couplings can be hazardous, especially if shielding is removed or damaged. We recommend the manufacturer to inform the user of potential hazard by means of appropriate safety labels and instruction manuals.

Jedes drehende Bauteil muß einen spezifischen oder in die Maschine integrierten Schutz haben. In Fällen, wo der Schutz entfernt oder zerstört werden kann, empfiehlt es sich, den Benutzer auf diese Gefahrensituationen mittels spezieller Aufkleber und in der Bedienungsanleitung hinzuweisen.



Il progresso della meccanizzazione agricola e delle normative antinfortunistiche spingono verso la ricerca di soluzioni tecniche sempre più razionali e sicure. Bondioli & Pavesi mette a disposizione le proprie risorse tecniche per lo sviluppo di soluzioni e progetti volti a questo scopo. Bondioli & Pavesi raccomanda la applicazione di protezioni antinfortunistiche per tutti gli alberi e componenti in rotazione. Bondioli & Pavesi raccomanda l'utilizzo di idonee etichette che segnalino all'operatore le eventuali situazioni di pericolo e lo avvisino nel caso la protezione sia stata asportata.

Although the safety, performance, and quality of today's machinery has made great improvements, tomorrow's user will demand even higher standards.

The technical department of Bondioli & Pavesi is available to help the equipment designer develop a power transmission system to meet these higher standards.

Bondioli & Pavesi strongly recommends that all rotating shafts and their couplings be properly guarded.

Bondioli & Pavesi strongly recommends the use of appropriate safety labels to warn the user of possible hazards and also to warn of the absence of shielding if it is removed for any reason.

Der Fortschritt in der landwirtschaftlichen Mechanisierung ebenso wie bei den Unfallschutznormen verlangt ständig nach noch einfacheren und sichereren technischen Lösungen. Bondioli & Pavesi stellt auch sein Technisches Büro für die Entwicklung von Lösungen für vorgenannte Aufgabenstellungen zur Verfügung.

Bondioli & Pavesi weist hiermit nochmals ausdrücklich auf die Pflicht der Hersteller hin, alle drehenden Teile ihrer Maschine mit einem Unfallschutz zu versehen. Dies gilt auch für die Verwendung von geeigneten Aufklebern, die den Benutzer auf eventuelle Gefahrensituationen hinweisen und warnen, wenn der Unfallschutz entfernt wurde.



La scatola ad ingranaggi è un componente fondamentale della catena cinematica delle macchine agricole.

Nella maggioranza delle applicazioni essa riceve il moto dalla Presa di Potenza della trattrice per mezzo dell'albero cardanico e lo distribuisce ai vari utilizzi della macchina.

In alcune applicazioni la scatola ad ingranaggi viene impiegata anche per supportare e movimentare gli utensili della macchina agricola.

The gearbox is a fundamental component of the power transmission system of many types of agricultural machinery.

Its most common application is to receive rotary motion from the power take off of a tractor by means of a universal joint driveshaft. This rotary motion is then distributed to the various functions required by the machine.

The gearbox may also be used to support, as well as power, the actual tools of the implement. A gearbox is capable of reversing the direction of the rotary motion, transmitting it at an angle, or modifying its speed and torque characteristics.

Das Zahnradgetriebe ist eine grundlegende Komponente in der kinematischen Kette der Landmaschinen. In der Mehrzahl der Anwendungen erhält es den Antrieb von der Zapfwelle des Traktors mittels einer Gelenkwelle und es verteilt ihn auf die verschiedenen Elemente der Maschine. Bei einigen Anwendungen wird das Zahnradgetriebe auch dazu benutzt, um die Arbeitswerkzeuge der Landmaschine aufzunehmen und anzutreiben.

Die Getriebeproduktion von Bondioli & Pavesi folgt im wesentlichen 2 Zielrichtungen:

- a) Standardprogramm und davon abgeleitete Getriebe
- b) Projekte in Zusammenarbeit mit den Herstellern von Landmaschinen.

CONVENZIONI E DEFINIZIONI

DEFINITIONS

BEGRIFFSDEFINITION

• RAPPORTO DI TRASMISSIONE

Si definisce rapporto di trasmissione "i" il rapporto tra la velocità di rotazione in ingresso n_1 e la velocità di rotazione in uscita n_2 :

$$i = \frac{n_1}{n_2}$$

Per convenzione il rapporto di trasmissione viene espresso nelle seguenti forme:

$$1 : \frac{n_1}{n_2} \text{ per un gruppo moltiplicatore (esempio } 1 : 1,90)$$

$$\frac{n_1}{n_2} : 1 \text{ per un gruppo riduttore (esempio } 1,90 : 1)$$

• SENSO DI ROTAZIONE

Il senso di rotazione viene definito orario o antiorario guardando frontalmente il componente in moto (albero, puleggia, ruota dentata), lasciando cioè la scatola dietro il componente.

• GEAR RATIO

The gear ratio "i" is defined as the ratio between the rotational input speed n_1 , and the rotational output speed n_2 :

$$i = \frac{n_1}{n_2}$$

As a convention the gear ratio is expressed in the following forms:

$$1 : \frac{n_1}{n_2} \text{ for a multiplier (example } 1 : 1.90)$$

$$\frac{n_1}{n_2} : 1 \text{ for a reducer (example } 1.90 : 1)$$

• ROTATION

The rotation is defined as either clockwise or counter-clockwise by looking "into" the components in motion (shaft, pulley, or sprocket), with the gearbox behind the component.

• DAS ÜBERSETZUNGS-VERHÄLTNISS

Das Übersetzungsverhältnis "i" ergibt sich aus dem Quotienten der Eingangsrehzahl n_1 und der Ausgangsrehzahl n_2 :

$$i = \frac{n_1}{n_2}$$

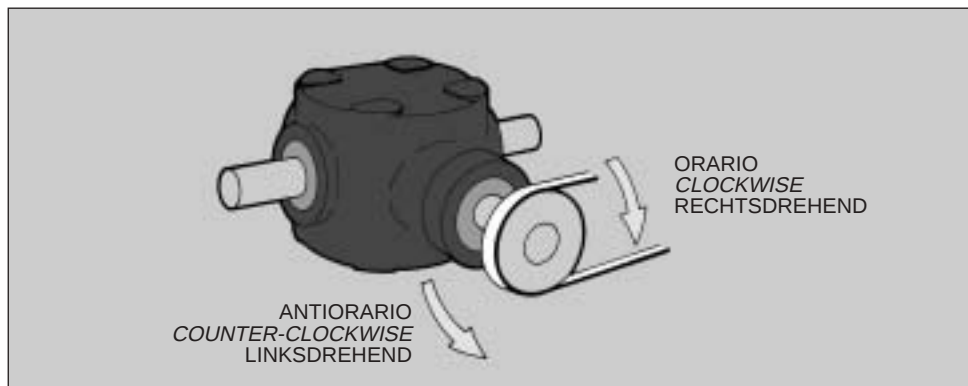
Es ist allgemein üblich, das Übersetzungsverhältnis durch eine der beiden folgenden Formeln auszudrücken:

$$1 : \frac{n_1}{n_2} \text{ (für ein Übersetzungsgetriebe z.B. } 1,90:1)$$

$$\frac{n_1}{n_2} : 1 \text{ (für ein Übersetzungsgetriebe z.B. } 1,90:1)$$

• DIE DREHRICHTUNG

Die Drehrichtung wird unterschieden in "rechtsdrehend" und "linksdrehend" indem man von vorne auf die sich bewegende Komponente schaut (z.B.)



Il senso di rotazione della Presa di Potenza posteriore del trattore è tradizionalmente oraria, per cui la rotazione dell'albero di ingresso della scatola collegata è antioraria.

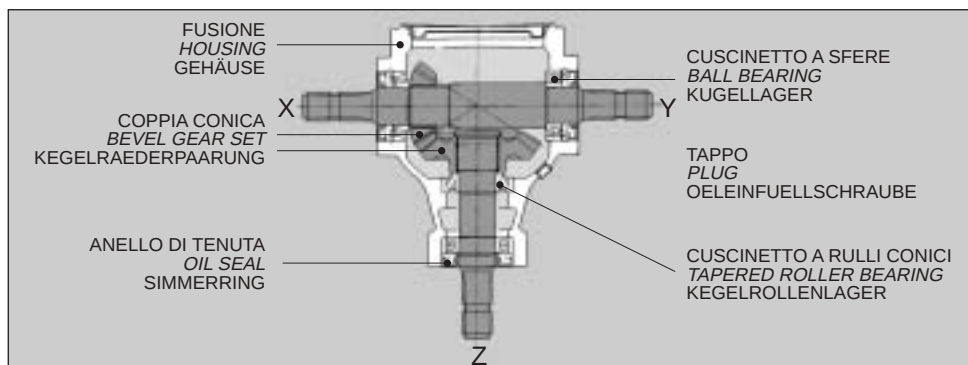
The rotation of the rear P.T.O. of tractors is traditionally clockwise. Therefore the input rotation of a gearbox connected directly to the P.T.O. is counterclockwise.

Welle, Riemenscheibe, Kettenrad) und dabei das Getriebe hinter der Komponente ist. Die Drehrichtung der Heck-Zapfwelle des Traktors ist üblicherweise "rechtsdrehend". Das bedeutet, daß die Getriebeeingangswelle "linksdrehend" ist.

• ASSI DELLA SCATOLA

• GEARBOX AXES

• DIE GETRIEBEWELLEN



Viene definito asse x-y l'asse passante della scatola. L'estremità prossima all'ingranaggio è definito asse x, l'estremità opposta asse y. L'asse non passante è definito asse z.

The x-y axis of the gearbox is defined as the axis passing through the gearbox, the axis perpendicular to this is the z-axis. The x-shaft is positioned next to the gear, the y-shaft is opposite the gear.

Die durchgehende Getriebewelle ist die x-y-Welle.

Die dem Zahnrad benachbarte Welle ist die x-Welle, gehende die entgegengesetzte ist die y-Welle. Die nichtsdurchWelle wird als z-Welle bezeichnet.

• SCHEMI DI MONTAGGIO DEGLI INGRANAGGI

• GEAR MOUNTING CONFIGURATIONS

• MONTAGEARTEN DER ZAHNRÄDER

Vengono definiti tre schemi di montaggio

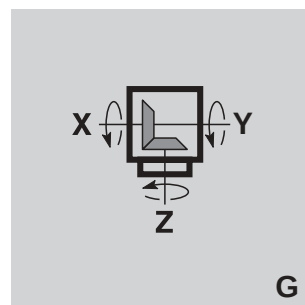
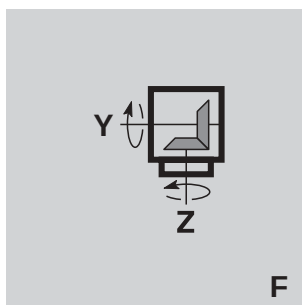
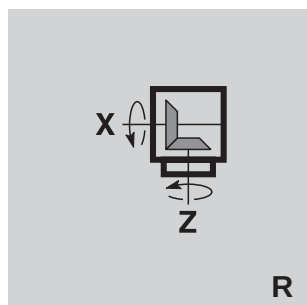
The three standard gear arrangements are defined as follows:

- 1) MONTAGGIO R: comprende soltanto gli assi x e z. Gli alberi hanno sensi di rotazione opposti.
- 2) MONTAGGIO F: comprende soltanto gli assi y e z. Gli alberi hanno sensi di rotazione concordi.
- 3) MONTAGGIO G: I sensi di rotazione dipendono dal posizionamento della scatola.

- 1) GEAR ARRANGEMENT R: includes only the z and x axes. The shafts rotate in opposite directions
- 2) GEAR ARRANGEMENT F: Includes only the z and y axes. The shafts rotate in the same direction
- 3) GEAR ARRANGEMENT G: The rotation of the shafts depends upon the position of the gearbox.

Es werden 3 Arten der Montage unterschieden:

- 1) Montageart R: bezieht sich nur auf die Wellen x und z. Die Wellen haben eine entgegengesetzte Drehrichtung
- 2) Montageart F: bezieht sich nur auf die Wellen y und z. Die Wellen haben die gleiche Drehrichtung
- 3) Montageart G: die Drehrichtungen sind abhängig von der Einbauposition des Gehäuses.



CARATTERISTICHE TECNICHE TECHNICAL CHARACTERISTICS TECHNISCHE EIGENSCHAFTEN

• POTENZA MEDIA E DURATA

La dimensione della scatola ad ingranaggi da impiegare in una data applicazione viene stabilita sulla base della potenza trasmessa, del rapporto di trasmissione, dei carichi applicati e della durata richiesta. Per durata della scatola ad ingranaggi si intende il numero di ore di funzionamento al quale iniziano a comparire fenomeni di erosione su un anello o sui corpi volventi di un cuscinetto oppure sui fianchi dei denti di un ingranaggio. L'affidabilità dei cuscinetti è basata sulla durata teorica L_{10} conforme alla definizione ISO.

• POWER AND LIFE

The selection of a gearbox for a particular application must be based upon the power to be transmitted, gear ratio, applied loads, and the required life. The life of a gearbox is intended to be the number of working hours before erosion phenomenon appears on a race or rolling elements of a bearing or on the side of the gear teeth. The reliability of the bearings is based upon the theoretical life L_{10} conforming to the ISO standard:

• DIE MITTLERE LEISTUNG UND LEBENSDAUER

Bei einer vorgegebenen Anwendung ergibt sich die zu wählende Baugröße aus der zu übertragenden Leistung, dem Übersetzungsverhältnis, den einwirkenden Belastungen und der geforderten Lebensdauer. Unter Lebensdauer eines Zahnradgetriebes versteht sich die Anzahl der Betriebsstunden, nach denen sich erste Abnutzungserscheinungen an Teilen des Wälzlagers oder an den Zahnflanken eines Zahnrades zeigen. Die Lebensdauer der Lager basiert auf der theoretischen Lebensdauer L_{10} gemäß der ISO-Definition

$$\left(\frac{C}{P} \right)^p = L_{10}$$

L_{10} = durata base (milioni di giri)
 C = coeff. di carico dinamico [N]
 P = carico dinamico equivalente [N]

$$p = \begin{cases} 3 & \text{per cuscinetti a sfere} \\ 10 & \text{per cuscinetti a rulli conici} \end{cases}$$

Tale durata L_{10} viene raggiunta da almeno il 90% dei cuscinetti. Nel presente catalogo viene fornito per ogni modello di scatola il diagramma POTENZA-DURATA STIMATA a 540 giri/min. E' possibile calcolare la DURATA STIMATA a pari potenza, ma a velocità differenti da 540 giri/min. moltiplicando il valore ottenuto dal diagramma per il coefficiente indicato nella apposita tabella. Le curve sono state calcolate considerando valori di potenza costante applicati in modo continuativo per le durate corrispondenti. I valori massimi di potenza indicati dalle curve corrispondono alla massima pressione di contatto tra i denti. I valori di potenza e coppia tabulati nella scheda di ogni modello sono i valori di impiego consigliato in base alla nostra esperienza.

Le curve POTENZA-DURATA possono essere utilizzate per la scelta di massima della scatola. La durata reale dipende infatti da numerosi fattori tipici dell'applicazione che possono essere evidenziati soltanto dalla prova in lavoro di un campione.

L_{10} = Base life (millions of revolution)
 C = Coefficient of dynamic load [N]
 P = Equivalent dynamic load [N]

$$p = \begin{cases} 3 & \text{or ball bearings} \\ 10 & \text{for tapered roller bearing} \end{cases}$$

This theoretical life is obtained by at least 90% of the bearings in a given sample.

This catalog has diagrams for determining the estimated life for a given power level at 540 rpm. To calculate estimated life at a given H.P. but with a speed other than 540 rpm, multiply the value obtained from the diagram by the factor listed in the table. The curves are calculated for continuous power loadings.

The maximum horsepower indicated on the curves corresponds to the maximum contact pressure between the gear teeth. The value of H.P. and torque listed on the data sheet for each gearbox model is that based on our experience. The curve H.P. /life can be utilized as a guideline for the choice of gearbox. As a fact, the actual life depends on a number of factors typical of the application that can be determined only by testing a sample gearbox in the actual working conditions.

L_{10} = Grundlebensdauer (Mio Umdrehungen)
 C = dynamischer Belastungskoeffizient [N]
 P = äquivalenter [N] dynamische Belastung

$$p = \begin{cases} 3 & \text{für Kugellager} \\ 10 & \text{für Kegelrollenlager} \end{cases}$$

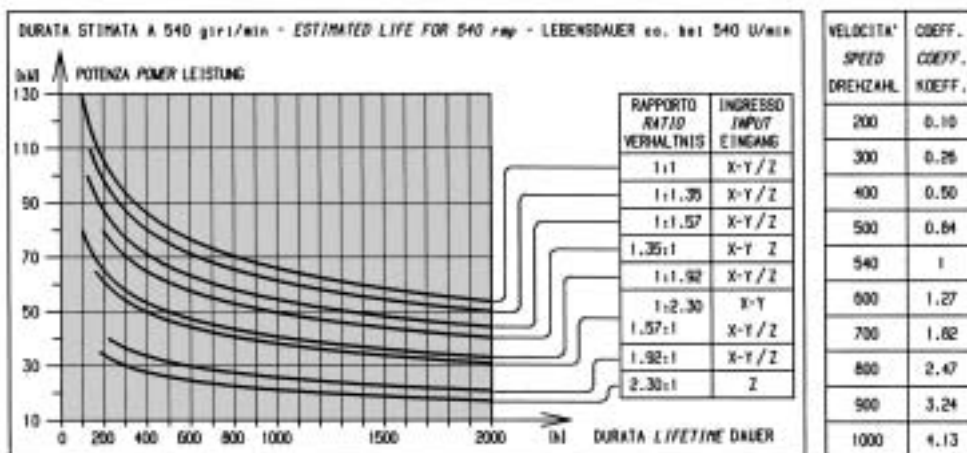
Diese L_{10} Lebensdauer wird erreicht mit mindestens 90% der Lager. Im vorliegenden Katalog ist für jeden Getriebetyp das Diagramm LEISTUNG-GESCHÄTZTE LEBENSDAUER dargestellt.

Um die geschätzte Lebensdauer bei gleicher Leistung jedoch von 540 U/min. abweichender Drehzahl zu ermitteln, ist der aus dem Diagramm erhaltene Wert mit dem auf der Tabelle aufgeführten Koeffizienten zu multiplizieren. Die Kurven gelten auf der Grundlage konstanter, im betreffenden Zeitraum permanent wirkender Leistungswerte.

Die in den Kurven angegebenen Leistungshochstwerte entsprechen der höchstzulässigen Zahnflankenflächenpressung.

Die im technischen Datenblatt aufgeführten Leistungs- und Drehmomentwerte sind die empfohlenen Anwendungsbereiche gemäß unseren Erfahrungswerten.

Die Leistungs-Lebensdauerkurven sind eine Hilfestellung zur grundsätzlichen Auswahl eines Getriebes. Die reale Lebensdauer hängt in der Tat von vielen leistungsspezifischen Faktoren ab, die nur im Laufe eines extremen und intensiven Mustereinsatzes herausgeschält werden können! Diese "goldene Regel" sollte niemals gebrochen werden!



ESEMPIO : RAPPORTO 1 : 1.92
POTENZA 50 kW
VELOCITÀ 700 giri/min.

EXAMPLE: RATIO 1 : 1.92
POWER 50kW (67.05Hp)
INPUT SPEED 700 rpm

BEISPIEL: ÜBERS.-VERH. 1:1.92
LEISTUNG: 50KW
EINGANGSDREHZAHL:
700 U/min.

Dal diagramma si ricava una durata stimata di 500h a 540 giri/min. Moltiplicando per il coefficiente corrispondente a 700 giri/min. (C=1.82) si ottiene un valore pari a 910h.

From the diagram we can find the estimated life for this power and ratio at 540 rpm to be 500 hours. From the table to the right we find the coefficient for 700 rpm to be 1.82. Multiplying the 500 hours from the diagram by this coefficient we obtain an estimated life of 910 hours.

Aus dem Diagramm erhält man einen Wert entsprechend 500 Stunden bei 540 U/min. Wenn man ihn mit dem 700 U/min. entsprechenden Koeffizienten (C=1.82) multipliziert, erhält man einen Wert von 910 Stunden.

- **RESISTENZA DEI COMPONENTI**
Le scatole ad ingranaggi impiegate nel settore agricolo sono soggette a sollecitazioni variabili rispetto al valore medio. Picchi di coppia vengono generati con la accelerazione e la decelerazione delle masse presenti nelle macchine o da sovraccarichi accidentali durante il lavoro. La scelta corretta del modello di scatola tiene conto di due aspetti fondamentali:
- durata rispetto alle sollecitazioni medie
- resistenza rispetto alle condizioni limite di lavoro.

I valori massimi di coppia sono sempre di difficile determinazione, ciò impone l'adozione di elevati coefficienti di sicurezza e di ipotesi cautelative nella progettazione. In generale una coppia momentanea di valore doppio rispetto a quella nominale non intacca la resistenza dei componenti della scatola ad ingranaggi. In ogni caso soltanto un adeguato dispositivo di sicurezza garantisce l'integrità della trasmissione.

- **STRENGTH OF COMPONENTS**
Gearboxes used on typical agricultural machines are subjected to variable loads with respect to the average value. Peaks of torque are generated from the acceleration or deceleration of heavy rotating masses or from accidental overloads during operation. The correct choice of a gearbox must consider two fundamental aspects:
- life with respect to average working conditions
- strength of the components with respects to the maximum loads involved

The maximum torque levels are always difficult to accurately determine. This imposes the use of high factors of safety and prudent estimates in design calculations. In general, torque levels double the nominal level will not damage the components of the gearbox. However, an adequate safety device to limit the peak torque level is the only way to insure the integrity of the transmission.

Die im Bereich der Landwirtschaft eingesetzten Zahnradgetriebe sind einer stark wechselnden Beanspruchung gegenüber dem Mittelwert ausgesetzt. Drehmomentspitzen entstehen durch das Trägheitsmoment beim Beschleunigen oder Abbremsen der vorhandenen Massen der Maschine oder durch zufällige Überlastungen während der Arbeit. Die richtige Auswahl des Getriebetyps muß zwei grundlegende Gesichtspunkte berücksichtigen:

- die Lebensdauer in Bezug auf die mittleren Belastungen
- die Festigkeit mit Bezug auf die maximalen Belastungen

Die maximalen Werte des Drehmomentes sind äußerst schwierig zu ermitteln; das bedeutet, daß mit hohen Sicherheitskoeffizienten und vorsichtigen Annahmen bei der Projektierung gearbeitet werden muß. Im allgemeinen führen kurzzeitig auftretende Drehmomentspitzen bis zum zfachen des Nennmomentes zu keinerlei Beschädigungen der einzelnen Getriebebauteile. Vollständige Unversehrtheit kann jedoch nur durch eine geeignete Sicherheitsvorrichtung gewährleistet werden.

CARATTERISTICHE TECNICHE TECHNICAL CHARACTERISTICS TECHNISCHE EIGENSCHAFTEN

• CARICHI RADIALI

Il dimensionamento dei componenti della scatola tiene conto dei carichi dovuti alla trasmissione di potenza tra gli ingranaggi.

Quando la scatola è azionata o aziona una trasmissione a cinghia o a catena occorre considerare l'ulteriore carico radiale generato da questi tipi di trasmissioni meccaniche ed eventualmente interpellare l'Ufficio Tecnico fornendo le informazioni seguenti:

- 1) ASSE SUL QUALE
E' MONTATA LA PULEGGIA
O LA RUOTA DENTATA: Z, X, Y
- 2) POTENZA TRASMESSA
- 3) VELOCITA' DI ROTAZIONE
- 4) DIREZIONE DEL CARICO
RADIALE (fig.1)
- 5) SENSO DI ROTAZIONE :
ORARIO O ANTIORARIO
- 6) DISTANZA DEL CARICO
DAL-L'ASSE DELLA SCATOLA
(fig.2)

• RADIAL LOADS

The components of a gearbox are designed primarily according to the loads imposed by the transmission of power between the gears. Whenever a gearbox transmits power by means of a belt or chain drive, the radial loads generated by these types of transmission must be considered. Please consult our technical department with the following information:

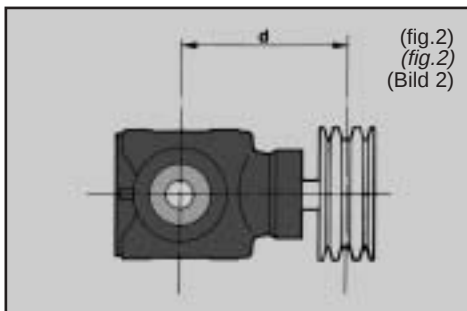
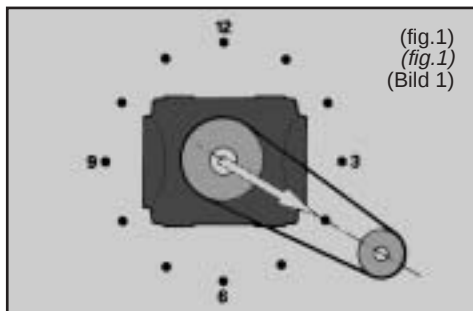
- 1) AXIS UPON WHICH THE
PULLEY OR SPROCKET IS
MOUNTED: Z, X, OR Y.
- 2) TRANSMITTED POWER
- 3) ROTATIONAL SPEED
- 4) DIRECTION OF RADIAL LOADS
(fig.1)
- 5) DIRECTION OF ROTATION:
CLOCKWISE OR COUNTER-
CLOCKWISE
- 6) DISTANCE FROM THE
APPLIED RADIAL LOAD TO THE
CENTER-LINE OF THE GEARBOX
(fig.2)

• RADIALBELASTUNGEN

Die Dimensionierung der Komponenten des Getriebes berücksichtigt die Belastungen, die bei der Leistungsübertragung zwischen den Zahnradern wirken.

Wenn mit dem Getriebe ein Riemen- oder Kettentrieb verbunden ist, muß die zusätzliche Radialbelastung, die von dieser Art der mechanischen Übertragung ausgeht, ebenfalls berücksichtigt werden und ggf. in unserem Technischen Büro rückgefragt werden, wobei folgende Informationen wichtig sind:

- 1) DIE WELLE, AN WELCHER DIE
RIEMENSCHLEIBE ODER DAS
ZAHNRAD MONTIERT SIND: X,Y,Z
- 2) DIE ZU ÜBERTRAGENDE
LEISTUNG
- 3) DREHZAHL
- 4) RICHTUNG DER
RADIALKRAFT GEM. BILD 1
- 5) DREHRICHTUNG RECHTS
ODER LINKS
- 6) ABSTAND DER WIRKENDEN
KRAFT VOM GETRIEBE GEM.
BILD 2



• LUBRIFICAZIONE

I componenti meccanici in moto relativo devono essere lubrificati per evitare usura e riscaldamento. La lubrificazione può essere realizzata mediante grasso od olio : l'olio consente velocità relative superiori, il grasso viene impiegato in genere per lubrificare cuscinetti ad asse verticale o inclinato in quanto può essere più facilmente trattenuto in zona.

I grassi vengono classificati in base alla consistenza mediante la gradazione NLGI (NATIONAL LUBRICATING GREASE INSTITUTE)

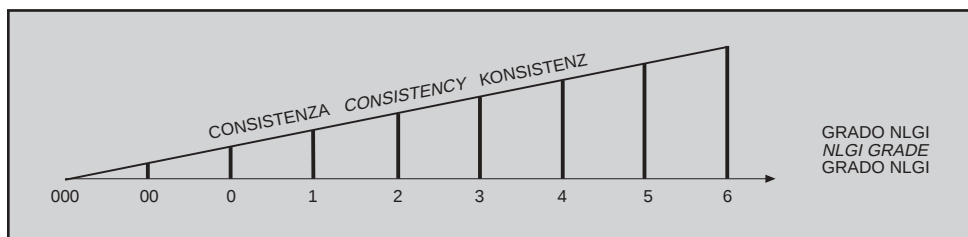
• LUBRICATION

The mechanical components of the gearbox in relative motion must be lubricated to avoid wear and heat build up. Lubrication may be through the use of oil or grease: oil allows higher relative speeds, grease is generally used to lubricate bearings on a vertical or inclined axis since it tends to more readily stay in place. The various types of grease are classified according to their consistency using the NLGI (NATIONAL LUBRICATING GREASE INSTITUTE) grade scale.

• DIE SCHMIERUNG

Die mechanischen Komponenten müssen bei entsprechender Bewegung geschmiert werden, um Verschleiß und Erwärmung zu vermeiden.

Die Schmierung kann durch Fett oder Öl gewährleistet werden. Öl ist gut geeignet bei hohen Relativgeschwindigkeiten; Fett hingegen wird eingesetzt zum Schmieren der Lager von vertikalen oder geneigten Wellen, wo es leichter in der jeweiligen Schmierzone gehalten werden kann.



Le scatole Bondioli & Pavesi sono in genere lubrificate " in bagno d'olio", in casi particolari viene impiegato un grasso NLGI n° 0. I cuscinetti volventi per i quali è stata prevista una apposita zona di contenimento vengono lubrificati con grasso NLGI n° 2.

Caratteristica fondamentale di un olio lubrificante è la viscosità sulla quale è basata la classificazione SAE (SOCIETY OF AUTOMOTIVE ENGINEERS) degli oli per cambi e differenziali :

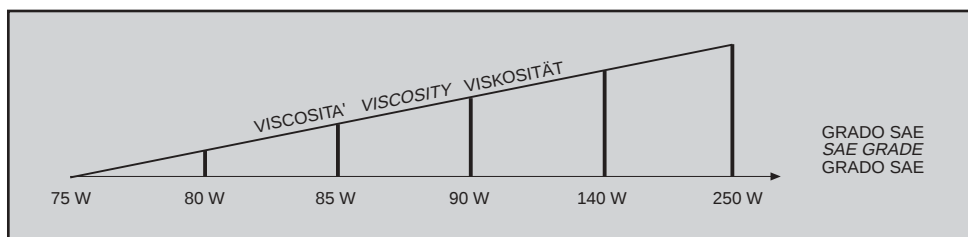
Bondioli & Pavesi gearboxes are generally lubricated by an oil bath, but for special applications a NLGI no.0 grease may be specified. For sealed bearings used on a verticle or inclined axis, NLGI no.2 grease is used for lubrication. The fundamental characteristic of a lubricating oil is the viscosity, which is classified according to the SAE (society of automotive engineers), grade for transmission and differential oils.

Die Fette werden klassifiziert entsprechend ihrer mittleren Konsistenz in der NLGI-Abstufung (National Lubricating Grease Institute).

Die Getriebe von Bondioli & Pavesi werden generell im Ölbad geschmiert.

In besonderen Anwendungsfällen wird Fett nach NLGI, O Grad, verwendet.

Die Wälzlager, die sich in einer höher gelegenen Position des Gehäuses befinden werden mit Fett nach NLGI Grad 2 geschmiert.



Particolari additivi migliorano la capacità dell'olio di mantenere il film lubrificante anche per elevati valori di pressione e temperatura.

Certain additives increase the capacity of the oil to maintain a lubricating film in the presence of high temperatures and pressures.

Die grundlegende Eigenschaft eines Schmieröles ist die Viskosität, auf der die SAE-Klassifizierung (SOCIETY OF AUTOMOTIV ENGINEERS) der Öle für Schalt- und Differentialgetriebe beruht.

CARATTERISTICHE TECNICHE TECHNICAL CHARACTERISTICS TECHNISCHE EIGENSCHAFTEN

Per le scatole Bondioli & Pavesi è consigliato l'impiego di olio SAE 90 EP (additivo EXTREME PRESSURE).

E' sconsigliato l'impiego di olio con gradazione SAE maggiore di 90 in scatole dotate di dispositivi GMS interni (es RUOTA LIBERA, INVERTITORE etc.). La quantità di olio viene stabilita mediante il tappo di livello ed è indicata approssimativamente sulla scheda tecnica di ogni modello.

Una maggiore quantità di olio non migliora le condizioni di lubrificazione e può provocare maggiore riscaldamento della scatola.

La sostituzione dell'olio garantisce dai pericoli connessi al deterioramento e alla presenza di particelle metalliche che si formano specialmente nel primo periodo di funzionamento.

E' consigliabile sostituire l'olio dopo le prime 50 ore di funzionamento e successivamente ogni 500 ore.

SAE 90 EP (Extreme Pressure additive) oil is recommended for Bondioli & Pavesi gearboxes. A higher grade oil is not recommended for gearboxes with internal GMS devices (ex. OVERRUNNIG CLUTCH, INVERTER, etc.). The quantity of oil to use is determined by the level plug and is approximately indicated on the technical data sheet for each model. Overfilling with oil does not improve the lubrication, and may provoke heat build-up.

Changing the oil periodically protects the internal components from problem associated with deterioration and metallic particles, which are especially hazardous during the first few hours of use. Recommended oil changes are after the first 50 hours of use, and then periodically every 500 hours.

Besondere Additive verbessern die Fähigkeit des Öls, den Schmierfilm auch bei erhöhten Werten von Flächenpressung und Temperatur aufrecht zu erhalten. Für Getriebe von Bondioli & Pavesi wird die Verwendung des Getriebe-Öls SAE 90 EP (Additiv "Extrem Pressure") empfohlen. Von der Verwendung von SAE-Öl mit einer Gradierung über 90 wird abgeraten, wenn im Getriebe integrierte GMS-Vorrichtungen (z.B. Freilauf, Drehrichtungsumkehrung) vorgesehen sind. Die Ölmenge ist mittels der Ölstands-Kontroll-Schraube festgelegt und ist näherungsweise im Katalog für jeden Getriebetyp angegeben. Eine größere Ölmenge verbessert nicht die Bedingungen der Schmierung und kann eine höhere Erwärmung des Getriebes hervorrufen. Der Ölwechsel gewährleistet, daß schädliche Stoffe, z.B. metallischer Abrieb, wie er besonders in den ersten Stunden nach Inbetriebnahme entsteht, aus dem Getriebe entfernt werden.

Es ist ratsam, das Öl nach den ersten 50 Betriebsstunden und nach jeden weiteren 500 Stunden zu wechseln.

• TEMPERATURE DI IMPIEGO

Il calore generato dall'attrito tra i vari componenti in moto relativo è funzione della potenza trasmessa. La temperatura della scatola dipende dalla capacità di cedere calore all'esterno, quindi dalla sua superficie di scambio e dalle condizioni ambientali.

I dati tecnici riportati sono riferiti a condizioni di temperatura ambiente compresa tra -10° +50° C (14° - 122° F).

Il limite di temperatura della scatola in lavoro è di 90° C (200° F) stabilito per prevenire l'invecchiamento degli elementi di tenuta e garantire sufficiente viscosità all'olio. Il calore provoca l'espansione dell'aria contenuta nella scatola e quindi l'aumento della pressione interna.

L'impiego corretto dei paraoli è garantito fino a pressione interna di 0,5 bar. Le scatole destinate ad impieghi particolarmente gravosi sono dotate di tappo di sfogo montabile a richiesta su ogni tipo di scatola in ghisa.

• OPERATING TEMPERATURES

The heat generated by the action of the various components in motion is a function of the transmitted power. The temperature of the gearbox depends upon the capacity of the gearbox to exchange heat with the atmosphere, which in turn depends upon the exchange surface and ambient conditions. The published technical data are in reference to ambient temperatures between -10° and +50° C (14°-122°F). The temperature limit of the gearbox during normal working conditions is 90° C (200° F), established to prevent premature wear of the oil seals and to assure sufficient oil viscosity. Heat causes expansion of the air contained in the gearbox, thereby increasing the internal pressure. The oil seals are capable of withstanding internal pressures up to 0.5 bar (7.25 psi). Gearboxes intended for heavy duty working conditions are fitted with a breather plug, which is available upon request for every model of

• DIE ARBEITSTEMPERATUR

Wärme, die durch Reibung der mit Relativgeschwindigkeit zueinander drehenden Bauteilen entsteht, ist abhängig von der zu übertragenden Leistung. Die Getriebetemperatur ist abhängig von der Wärmemenge, die nach außen abgegeben werden kann d.h. von der abstrahlenden Gehäuseoberfläche und den Umgebungsbedingungen. Die angegebenen technischen Daten beziehen sich auf eine Umgebungstemperatur, die zwischen - 10° und 50° C (14 - 122° F) liegt. Die maximal zulässige Betriebstemperatur beträgt 90° C (200° F), damit die Dichtungselemente nicht vorzeitig altern und das Öl eine ausreichende Viskosität behält. Die Wärme bewirkt eine Ausdehnung der im Gehäuse eingeschlossenen Luft und somit eine Erhöhung des inneren Druckes. Die korrekte Funktion der Wellendichtringe ist bis zu einem internen Druck von 0,5 bar garantiert. Die für besonders schwierige Arbeitsbedingungen vorgesehenen Getriebe sind mit einen Entlüftungstopfen versehen, der auf Wunsch bei jedem Getriebe mit dem Gußgehäuse montiert werden kann.

DISPOSITIVI APPLICABILI ALLE SCATOLE
OPTIONAL FEATURES FOR GEARBOXES
SICHERHEITSVORRICHTUNGEN DER ZAHNRADGETRIEBE



• PROLUNGHE

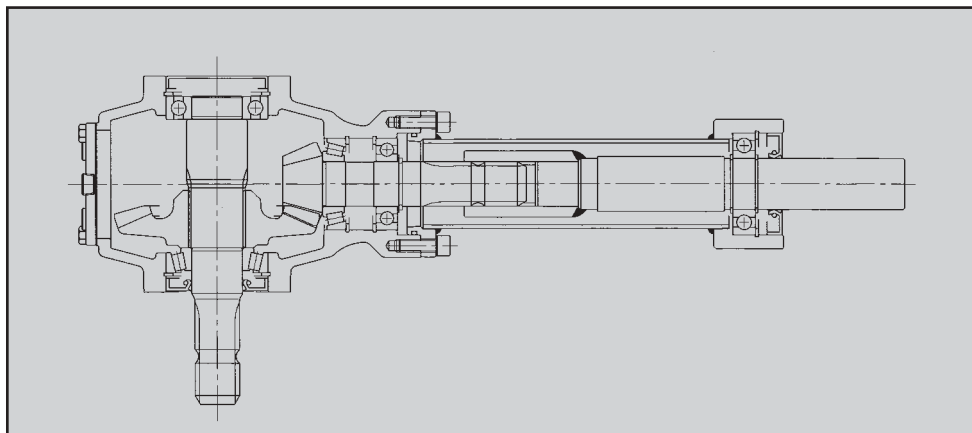
Le scatole ad ingranaggi Bondioli & Pavesi sono predisposte per l'applicazione di prolunghe.

• EXTENSION ARMS

Bondioli & Pavesi gearboxes are designed to readily accept extension shafts.

• VERLÄNGERUNGEN

Die Zahnradgetriebe von Bondioli & Pavesi sind auch für den Anschluß einer Verlängerung vorgesehen.



L'albero della prolunga porta una bussola scanalata che si accoppia con l'albero della scatola.

Il collegamento albero-bussola ed il cuscinetto all'estremità della prolunga sono lubrificati "in bagno d'olio" come la scatola.

Sono previsti sistemi di lubrificazione specifici per il cuscinetto della prolunga qualora questa lavori in posizione non orizzontale.

La tenuta dell'olio nel collegamento prolunga-scatola è garantita da un anello O-Ring.

The shaft of the extension has a splined bushing that couples to the shaft of the gearbox.

The coupling and the bearing located at the end of the extension are lubricated in an oil bath common to the gearbox.

Special lubricating methods may be employed where the extension shaft is positioned non-horizontally. The connection between the gearbox and extension is sealed by means of an O-ring.

Die Welle der Verlängerung hat eine Profilbuchse, die auf die Getriebewelle geschoben werden kann.

Die Verbindung Welle-Buchse und das Lager am Wellenende der Verlängerungslaufenden laufen im Ölbad wie das Getriebe.

Falls die Verlängerungswelle nicht in horizontaler Position arbeitet, sind besondere Schmiersysteme für das äußere Lager vorgesehen. Ein O-Ring am Verbindungsflansch zwischen Gehäuse und Verlängerung gewährleistet Öldichtheit.

DISPOSITIVI APPLICABILI ALLE SCATOLE OPTIONAL FEATURES FOR GEARBOXES SICHERHEITSVORRICHTUNGEN DER ZAHNRADGETRIEBE

• POMPE AD INGRANAGGI

L'applicazione di una pompa oleodinamica alla scatola ad ingranaggi permette di alimentare in maniera adeguata il circuito idraulico di una macchina agricola. Le pompe applicabili alle scatole Bondioli & Pavesi sono del tipo ad ingranaggi in ghisa o in alluminio.

• POMPA AD INGRANAGGI IN GHISA

• GEAR PUMP MOUNTS

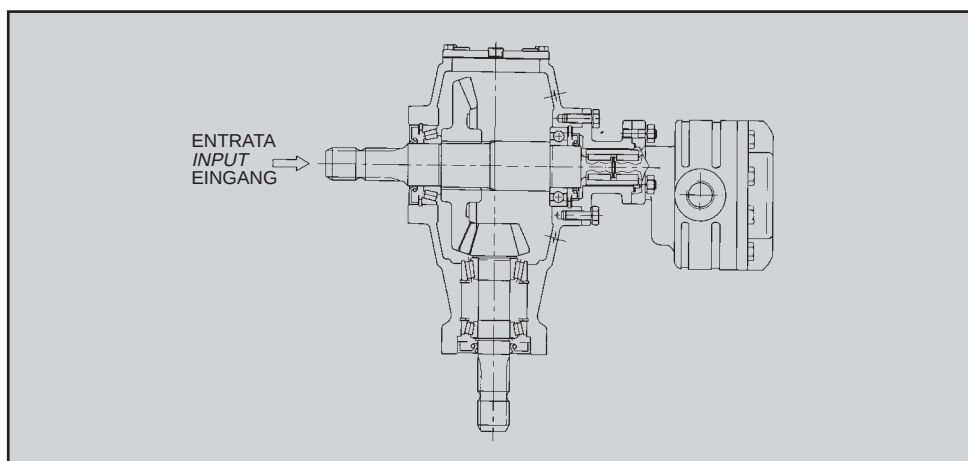
*The addition of a hydraulic pump to a gearbox allows an adequate flow for the hydraulic circuit of the machine.
The hydraulic pumps which may be mounted to Bondioli & Pavesi gearboxes are gear pumps of either aluminium or cast iron.*

• CAST IRON GEAR PUMPS

• ZAHNRADPUMPE

Der Anschluß einer ölhydraulischen Pumpe an das Zahnradgetriebe gestattet es, den Ölkreislauf einer Landmaschine in angemessener Art zu versorgen.
Die an Bondioli & Pavesi-Getrieben anschließbaren Pumpen sind Zahnradpumpen aus Grauguß oder Aluminium.

• ZAHNRADPUMPE AUS GUß



La pompa viene fissata alla scatola mediante un supporto in ghisa con flangia a tre lobi dotata di tre prigionieri.

L'albero della pompa viene collegato all'albero di ingresso passante della scatola mediante una bussola ed una o due coppie di linguette a seconda della potenza trasmessa alla pompa. La tenuta dell'olio della scatola è garantita anche in assenza della pompa sul supporto.

The pump is bolted to the gearbox by means of a cast iron support with a three lobe flange. The shaft of the pump is connected to the through shaft of the gearbox by means of a keyed bushing (either a single or double key depending upon the power transmitted by the pumps). The integrity of the seal between the gearbox and support flange is insured even when the pump is not mounted on the support.

Die Pumpe wird am Getriebe mittels eines Zwischenlagers aus Guß mit Flansch für 3 Stiftschrauben befestigt.

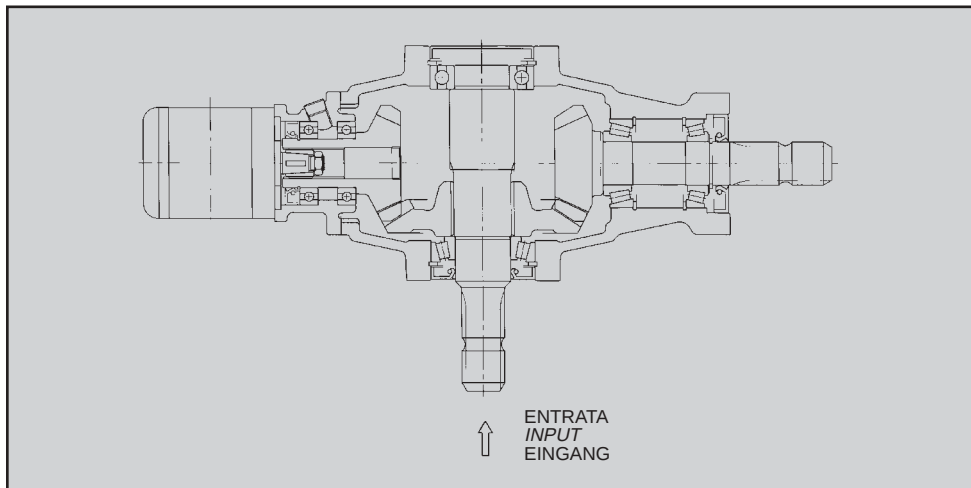
Die Pumpenwelle wird mit der durchgehenden Welle des Getriebes mittels einer Buchse und ein oder zwei Paßfedern, je nach der zu übertragenden Kraft, verbunden.

Die Öldichtheit des Getriebes ist auch bei abmontierter Pumpe gewährleistet.

• POMPA AD INGRANAGGI IN ALLUMINIO

• ALUMINIUM GEAR PUMPS

• ZAHNRADPUMPE AUS ALUMINIUM



L'applicazione della pompa ingranaggi in alluminio richiede:

- predisposizione della scatola (lavorazione speciale della sede coperchio).
- montaggio dell'apposito KIT che comprende il supporto in ghisa, due cuscinetti, il pignone che realizza la moltiplicazione della velocità, gli elementi di centraggio e tenuta. Per ogni rapporto di trasmissione della scatola si ha un corrispondente KIT che si differenzia per il pignone. La tenuta dell'olio della scatola è garantita anche in assenza della pompa sul supporto. La scatola può essere fornita soltanto predisposta e dotata successivamente del KIT attacco pompa.

The addition of an aluminium gear pump to a gearbox requires the following:

- *special machining in the area where the cover plate is fitted.*
- *Mounting of the appropriate kit which includes a cast iron support, two bearings, a pinion gear to create the necessary increase of rotational speed, centering elements, and seals. For each ratio of the gearbox there is a specific kit with the proper pinion gear. The gearbox oil is sealed even when the gear pump is removed. The gearbox may be supplied with the special machining only, and subsequently equipped with the pump attachment kit as an option.*

Der Anschluß der Zahnradpumpe aus Aluminium erfordert:

- Vorbereitung des Getriebegehäuses (spezielle Bearbeitung des Deckelsitzes)
- Aufbau des vorgesehenen Kit's, der das Zwischenlager aus Guß, zwei Kugellager das Ritzel für Drehzahlübersetzung und die Elemente für Zentrierung und Dichtung enthält.

- für jedes Übersetzungsverhältnis gibt es einen entsprechenden KIT, der sich nur in der Ritzelwelle unterscheidet.

Die Öldichtheit ist auch bei demontierter Pumpe gewährleistet. Das Getriebe kann auch alleine und nur vorgerüstet für den Anbausatz geliefert werden, welcher später nachgerüstet werden kann.

DISPOSITIVI APPLICABILI ALLE SCATOLE OPTIONAL FEATURES FOR GEARBOXES SICHERHEITSVORRICHTUNGEN DER ZAHNRADGETRIEBE

- DISPOSITIVI DI SICUREZZA E DI MANOVRA :
GMS (GEAR MATIC SYSTEM)

Il GMS è costituito da scatole a ingranaggi con dispositivi di sicurezza o manovra integrati, anche in combinazione tra loro . Il dispositivo diviene così parte della macchina anziché essere montato sull'albero cardanico fornendo vantaggi fondamentali :

- maggior sicurezza per l'operatore in quanto il dispositivo non può essere asportato con l'albero cardanico.
- migliore funzionamento del dispositivo grazie alla lubrificazione ed al miglior centraggio degli elementi in rotazione.
- dimensionamento e taratura del dispositivo specifici in base alle caratteristiche della macchina.
- economia progettuale e costruttiva grazie alla presenza di un riferimento (costituito dal GMS) nella catena cinematica della macchina.

- DEVICES FOR SAFETY AND FUNCTION:
GMS (GEAR MATIC SYSTEM)

The GMS system consists of safety devices or control mechanisms (or a combination of both) incorporated into the gearbox. The device therefore becomes an integral part of the machine rather than being mounted on the driveline, which has the following advantages:

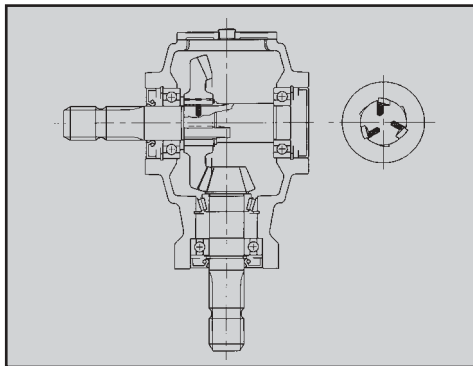
- *increased safety for the operator because a safety device cannot be removed along with the driveline*
- *better function of the device or mechanism due to constant lubrication received from the gearbox oil bath, plus more precise positioning of rotating elements*
- *dimensions and settings of the device are specific to each particular machine*
- *overall design and function of the machine may be optimized with the inclusion of the GMS system into the kinematics chain of the machine.*

- SICHERHEITS - UND SCHALTVORRICHTUNGEN GMS (GEAR MATIC SYSTEM)

Das GMS besteht aus Zahnradgetrieben mit integrierten Sicherheits - oder Schaltvorrichtungen oder aus einer Kombination von beiden. Die Sicherheitsvorrichtung wird somit zu einem Teil der Maschine und liefert gegenüber einer an der Gelenkwelle montierten Vorrichtung wesentliche Vorteile:

- höchste Sicherheit für die Bedienungsperson, weil die Sicherheitsvorrichtung nicht mit der Gelenkwelle von der Maschine demontiert werden kann
- bessere Funktion der Sicherheitsvorrichtung dank der Schmierung und der besseren Zentrierung der rotierenden Bauteile
- Auslegung und Einstellung der Sicherheitsvorrichtung sind spezifisch auf die Eigenschaften der Maschine abgestimmt
- hervorragende Wirtschaftlichkeit dank der Schaffung eines Funktionselements (GMS) in der kinematischen Kette der Maschine, deren andere Glieder optimal ausgelegt werden können.

- RUOTA LIBERA RL



Consente la trasmissione del moto dall'albero di ingresso a quello di uscita ma non viceversa.

E' necessario dove esistono forti inerzie per eliminare le coppie di ritorno in fase di decelerazione. Per la sua applicazione è necessario conoscere il senso di rotazione in ingresso ed il montaggio degli ingranaggi.

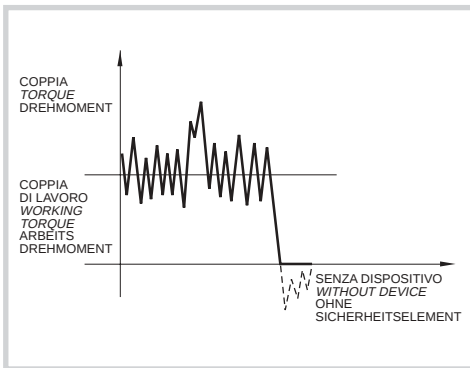
- OVERRUNNING CLUTCH RL

Allows transmission of power from the input shaft to the output shaft, but not vice-versa.

It is necessary when reverse torques due to the deceleration of heavy inertial masses must be eliminated.

To properly specify this device, it is necessary to inform our engineering staff of the input rotation and gear arrangement.

- DER FREILAUF RL

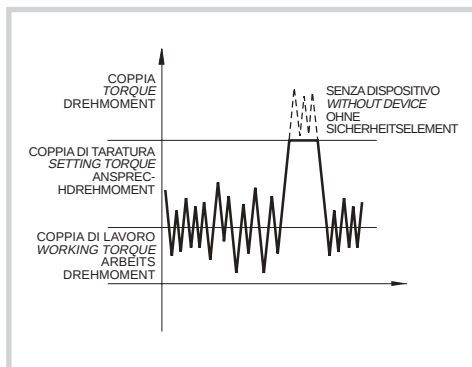
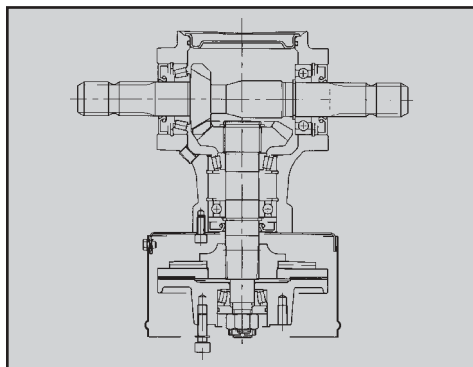


Er erlaubt die Übertragung der Bewegung von der Eingangswelle auf die Ausgangswelle; verhindert aber den rückläufigen Kraftfluß. Er ist dort notwendig, wo große Massenträgheitsmomente existieren und diese zu eliminieren sind. Für den richtigen Einbau muß man die Drehrichtung der Eingangswelle wie auch die Montage der Zahnräder berücksichtigen.

• FRIZIONE F

• FRICTION CLUTCH F

• REIBSCHEIBENKUPPLUNG F



Limita la coppia trasmessa al valore di taratura per effetto dello slittamento dei dischi di attrito. E' necessario per le applicazioni caratterizzate da elevate coppie di spunto o da sovraccarichi che debbano essere superati senza interrompere il lavoro.

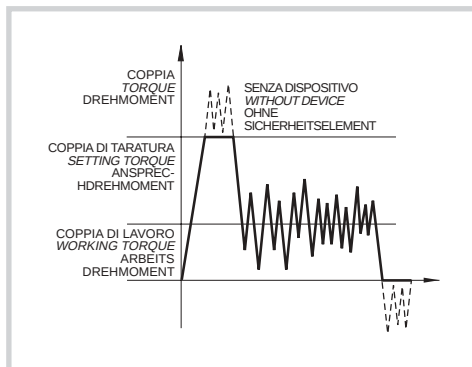
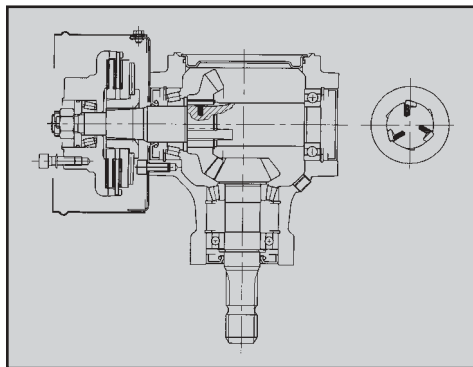
Limits the transmitted torque to the preset value by slippage between the friction linings. Its applications are characterized by high starting torques or by temporary overloads which must be overcome without interrupting the job.

Sie begrenzt das übertragbare Drehmoment bis zur Höhe des eingestellten Wertes durch Rutschen der Reibscheiben. Sie ist notwendig bei den Anwendungen, bei denen besonders hohe Drehmomentspitzen oder Überlastungsmomente ohne Arbeitsunterbrechung überwunden werden sollen.

• FRIZIONE E RUOTA LIBERA

• FRICTION AND OVERRUNNING CLUTCH

• REIBSCHEIBENKUPPLUNG UND FREILAUF



E' necessario dove esistono forti inerzie in quanto limita le coppie di spunto in avviamento ed elimina le coppie di ritorno in decelerazione.

A combination of the overruning and friction clutch devices. It is often used when large inertial loads are present to limit the starting torque and eliminate reverse torques during deceleration.

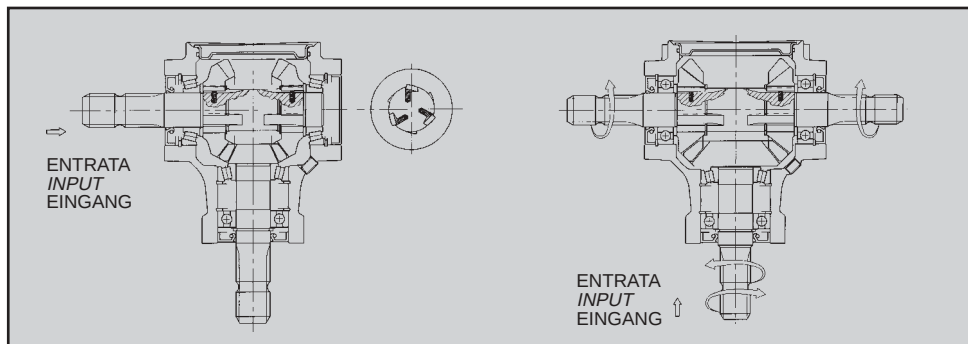
Diese Kombination ist dort notwendig, wo große Massenträgheitsmomente auftreten, Drehmomentspitzen beim Anfahren der Maschine begrenzt werden müssen und das negative Drehmoment beim Abbremsen der Maschine eliminiert werden muß.

DISPOSITIVI APPLICABILI ALLE SCATOLE OPTIONAL FEATURES FOR GEARBOXES SICHERHEITSVORRICHTUNGEN DER ZAHNRADGETRIEBE

• INVERTITORE DI ENTRATA NL-NR-NT

• INPUT INVERTER NL-NR-NT

• EINGANGS WECHSELGETRIEBE NL-NR-NT



Mantiene inalterato il senso di rotazione in uscita qualunque sia il senso di rotazione in ingresso. E' utilizzato in macchinari il cui senso di rotazione in entrata può essere sia antiorario (collegamento alla Presa di Potenza posteriore del trattore) sia orario (collegamento alla Presa di Potenza anteriore del trattore). Il dispositivo è denominato NL per senso di rotazione in uscita antiorario ed NR per senso di rotazione in uscita orario. Con doppia uscita X e Y (fig. 2) è denominato NT.

The direction of the output rotation is maintained unchanged regardless of the input rotation. Often used when the implement may be mounted to the rear P.T.O. of the tractor (counter-clockwise rotation) or mounted to the front P.T.O. (clockwise rotation).

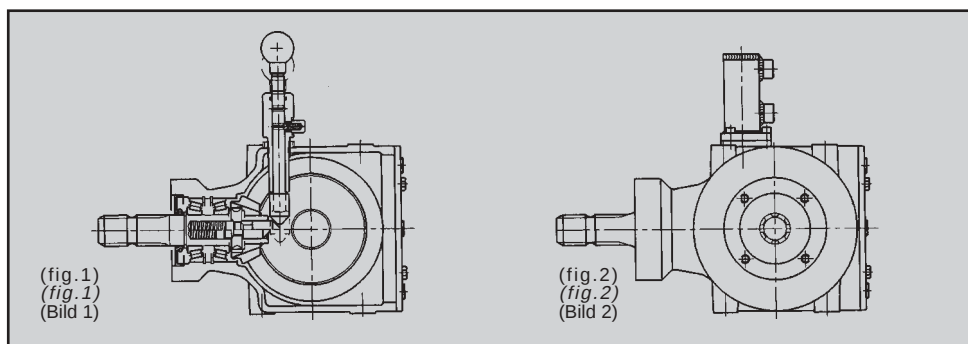
The device is designated NL when the output rotation is counter-clockwise and NR when the output rotation is clockwise. When output is on both x and y axis (fig. 2), it is designated NT.

Es erhält die Drehrichtung der Ausgangswelle unabhängig von der Drehrichtung der Eingangswelle aufrecht. Angewendet wird es in Maschinen, bei denen die Eingangswelle linksdrehend (bei Schlepperheckzapfwelle) oder auch rechtsdrehend (bei Schlepper-Frontzapfwelle) sein kann. Die Vorrichtung mit der Bezeichnung "NL" ist für die linksdrehende Ausgangswelle; die mit der Bezeichnung "NR" ist für die rechtsdrehende Ausgangswelle, die Bezeichnung "NT" steht für Ausführung mit 2 Ausgangswellen und y (Bild 2).

• DISINNESTO DS - DSI

• DISENGAGEMENT DS-DSI

• ABSCHALTVORRICHTUNG DS-DSI



Permette il disinserimento dell'asse di uscita Z. Il comando può essere manuale (fig.1) o idraulico (fig.2) e deve avvenire ad ingranaggi fermi. Il reinnesto deve avvenire ad ingranaggi rotanti lentamente e scarichi di coppia.

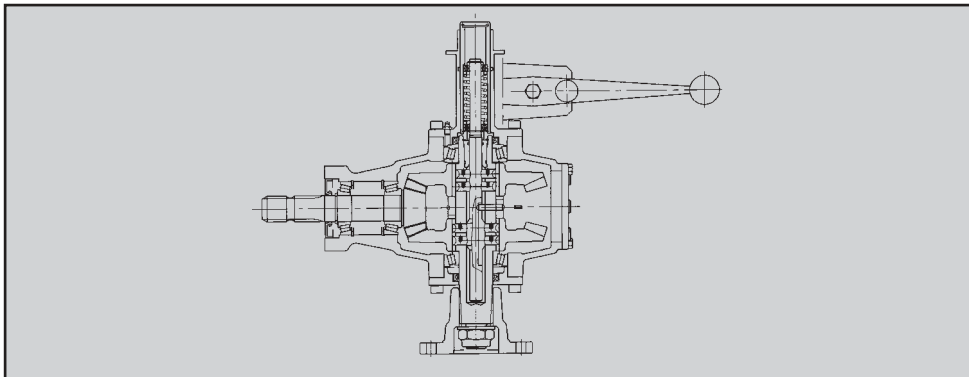
Allows the disengagement of the output axis z. Control is either manual (fig. 1) or hydraulic (fig. 2) and may be operated only when the gears are stationary. Reengagement must occur when the gears are slowly rotating and unloaded.

Sie gestattet das Abschalten der Ausgangs-"Z"-Welle. Die Schaltung kann manuell (Bild 1) oder hydraulisch (Bild 2) erfolgen. Das Getriebe muß dabei aber im Stillstand sein. Das Einkuppeln hingegen muß bei langsam aber lastfrei drehenden Wellen erfolgen.

• INVERTITORE DI USCITA CON
PRESELETTORE **RV**

• *OUTPUT INVERTER WITH
MANUAL SELECT **RV***

• AUSGANGS WECHSELGETRIEBE
MIT VORWAHLHEBEL **RV**



Permette l'inversione del senso di rotazione dell'albero di uscita x-y. Il comando di inversione avviene ad ingranaggi fermi. Il reinnesto avviene automaticamente al ritorno in rotazione degli ingranaggi.

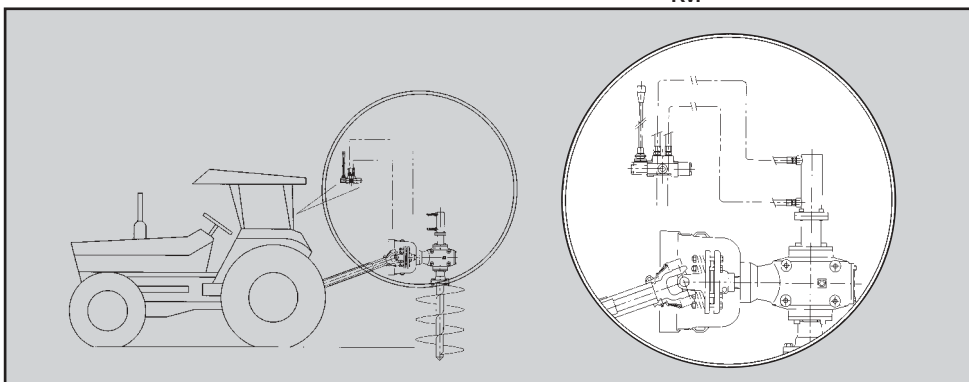
Permits reversing the rotation of the x-y output shaft. Selecting the reverse rotation is done while the gears are stationary, then the reverse gear is automatically engaged when the gears begin to rotate.

Es gestattet das Umschalten der Drehrichtung der Ausgangswelle x-y. Der Umschaltvorgang erfolgt im Stillstand. Die Einkupplung erfolgt automatisch, wenn die Zahnräder sich zu drehen beginnen.

• INVERTITORE DI USCITA CON
COMANDO IDRAULICO **RVI**

• *OUTPUT INVERTER WITH
HYDRAULIC SELECT **RVI***

• AUSGANGS-WECHSELGETRIEBE
MIT HYDRAULISCHER BETÄTIGUNG
RVI



Permette di comandare dalla cabina del trattore l'inversione della rotazione dell'albero di uscita x-y. Il dispositivo viene collegato ad un distributore del trattore e tramite questo viene impartito il comando. La inversione del moto viene comandata ad ingranaggi fermi ed avviene automaticamente con il reinnesto della presa di moto.

Allows reversing the rotation of x-y output shaft from the tractor seat. The device may be connected to one of the directional control valves of the tractor. Selection of the reverse rotation must be done while the gears are stationary. The reverse gear will automatically engage once the P.T.O. begins to rotate.

Es gestattet das Umschalten der Drehrichtung der x-y Ausgangswelle. Die Vorrichtung ist verbunden mit dem Steuergerät des Traktors und über dieses wird das Schaltkommando übertragen. Das Umschalten der Drehrichtung erfolgt im Stillstand und das Einkuppeln erfolgt automatisch, wenn die Zahnräder sicher wieder in Bewegung setzen.

ELEMENTI CARATTERISTICI DI UNA RUOTA DENTATA

CHARACTERISTICS OF GEARS

DIE WICHTIGSTEN PARAMETER EINES ZAHNRADES

PRINCIPALI ELEMENTI DI UNA RUOTA DENTATA CONICA

a) DENTATURA DIRITTA

Gli assi dei denti coincidono con le generatrici di un cono primitivo. Le sezioni normali dei denti hanno superfici che variano da un valore massimo alla base maggiore del tronco di cono primitivo ad un valore minimo alla base minore.

Per convenzione gli elementi della dentatura sono riferiti alla base maggiore del tronco di cono.

D_p = diametro primitivo

D_i = diametro interno

D_e = diametro esterno

m = modulo

p = passo

g = semiangolo del cono primitivo

z = n° dei denti

Tra i parametri valgono le seguenti relazioni :

FUNDAMENTAL ELEMENTS OF A BEVEL GEAR

a) STRAIGHT CUT

The axis of the teeth coincides with the generating line of the pitch cone. The normal section of the teeth has a surface that varies from a maximum value at the major base of the truncated cone to a minimum value at the minor base.

As a convention, the elements of the teeth are in reference to the major base of the truncated cone.

D_p = pitch diameter

D_i = inside diameter

D_e = outside diameter

m = module

p = pitch

g = pitch cone half angle

z = number of teeth

Among these parameters we have the following relationships:

Parameter eines Kegelrades

a) Geradverzahnung

Die Achsen der Zähne bilden die Mantellinie eines Wälzkegels. Der Zahn ist am Zahnfuß breiter als am Zahnkopf.

Für die Berechnung der Elemente einer Verzahnung gelten folgende Parameter:

D_p = Teilkreisdurchmesser

D_i = Fußkreisdurchmesser

D_e = Kopfkreisdurchmesser

m = Modul

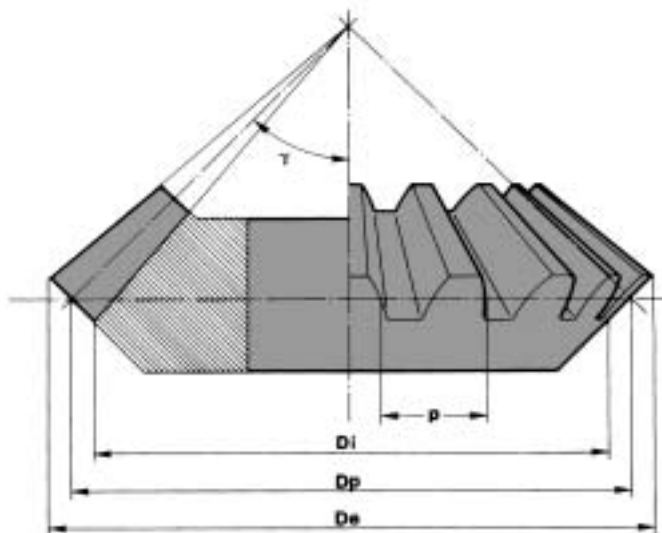
p = Zahnkreisteilung

g = Schrägungswinkel

z = Anzahl der Zähne

Zwischen den Parametern gelten folgende Beziehungen:

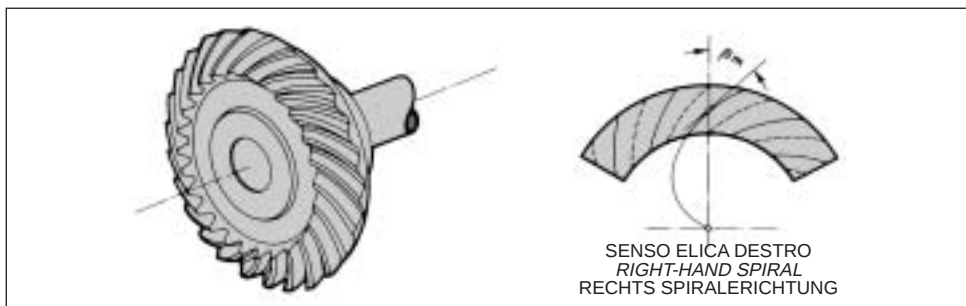
$$m = \frac{D_p}{z} \quad p = \frac{\pi D_p}{z} \quad p = \pi m$$



b) DENTATURA ELICOIDALE
I parametri della dentatura elicoidale sono gli stessi della dentatura dritta con l'aggiunta dell'angolo di inclinazione dell'elica β_m e del senso di spirale (destro o sinistro).

b) HELICAL TEETH
The parameters of helical teeth are identical to straight cut teeth, except for the addition of the inclination of the helix β_m and the rotation of the spiral (left or right).

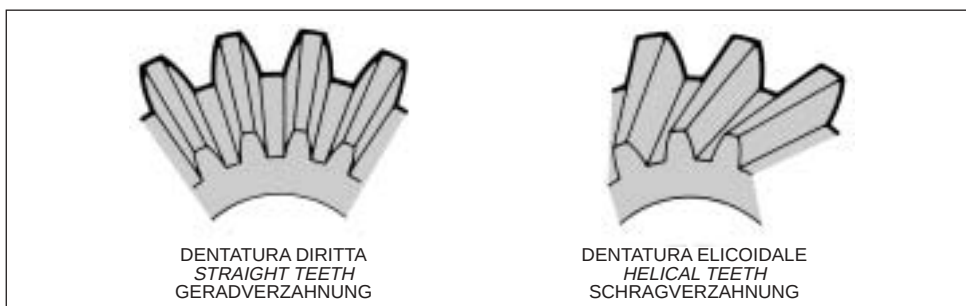
b) Schrägverzahnung
Die Parameter der Schrägverzahnung sind die gleichen wie bei der Geradverzahnung mit dem Zusatz des Spiralwinkels β_m und der Richtung der Spirale (rechts oder links).



In confronto con la dentatura dritta, la dentatura elicoidale è caratterizzata da un maggior ricoprimento poiché il n° di denti in presa è sempre maggiore.

In comparison with the straight cut gear, a helical gear has better overall contact since the number of teeth engaged at a given moment is greater.

Im Gegensatz zur Geradverzahnung wird die Schrägverzahnung von einer größeren Überdeckung charakterisiert, weil die Anzahl der im Eingriff stehenden Zähne größer ist.



Questa caratteristica conferisce maggiore durata a parità di potenza trasmessa, contatto più graduale e quindi maggiore silenziosità, maggiore resistenza del dente sia sul fianco sia al piede. Inoltre è possibile ridurre il numero minimo di denti per cui, a parità di ingombro, si possono realizzare rapporti di trasmissione maggiori. Per contro una coppia conica elicoidale richiede l'accoppiamento e la rodatura degli ingranaggi ed un montaggio più elaborato che ripristini la posizione di rodatura.

This characteristic yields a better life for a given power level, less noise is generated due to the more gradual contact, and there is less stress on the side and base of the tooth. Also it is possible to reduce the minimum number of teeth so that a higher gear ratio is possible in the same amount of space. However, a spiral bevel gear requires matching and "running in" of gear pairs, and more complicated assembly to reestablish the "run in" position.

Diese Charakteristik verleiht ihr eine größere Lebensdauer im Vergleich zur übertragenden Kraft; der Eingriff ist präziser und hat daher auch eine größere Laufruhe und eine größere Festigkeit der Zähne an den Flanken und Füßen zur Folge. Darüberhinaus ist es möglich die Zahl der Zähne auf ein Minimum zu reduzieren, da bei gleichem Platzbedarf ein höheres Übersetzungsverhältnis realisiert werden kann. Vor allem, erfordert eine Schrägverzahnung eine präzise Passung und Läppung der Zahnräder, als auch eine sehr gute Montage.

CODIFICA CODES CODIERUNG

Ogni scatola standard è definita e può essere ordinata mediante un numero di codice a 12 posizioni ad eccezione delle SERIE 3000 e 2002 che richiedono soltanto 9 o 10 posizioni a seconda dei tipi.

Le prime 5 posizioni indicano il TIPO DI SCATOLA. Ad esempio per una scatola S2020 si ha:



All standard gearboxes may be defined by a 12 digit code number, except for the 3000 and 2002 series which requires only 9 or 10 digits.

The first five positions of the code indicate the type of gearbox. As an example, for a S2020 series we have:

Jeder Getriebetyp ist genau definiert und kann bestellt werden mittels einer Code-Nr. von 12 Stellen mit Ausnahme der Serien 3000 und 2002 die nur 9 oder 10 Stellen entsprechend des Types erfordern.

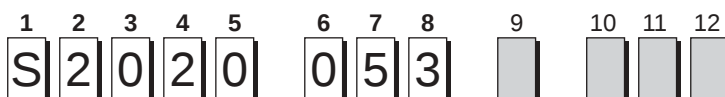
Die ersten 5 Stellen bestimmen den Typ des Getriebes. Zum Beispiel ein Getriebe der Serie S2020 hat:

Le successive 3 posizioni riportano il CODICE DEL RAPPORTO DI TRASMISSIONE che viene indicato nella tabella delle prestazioni di ogni tipo di scatola. Tale codice è funzione del rapporto di trasmissione dell'impiego della scatola e dell'ingresso.

Ad esempio per una scatola S2020 rapporto 1:1,90 (moltiplicatore) con ingresso Z si ha:

The next three positions denote the code for the gear ratio, which is indicated in the data sheet for every type of gearbox. This code is a function of the gear ratio and the input. For example, our S2020 gearbox with a 1:1.90 multiplier ratio and input on the z axis would have the following:

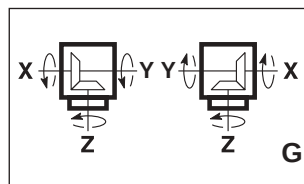
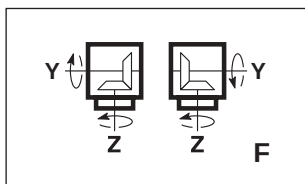
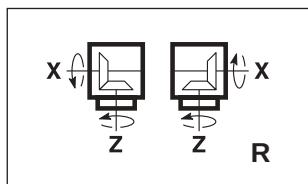
Die folgenden 3 Stellen geben das Übersetzungsverhältnis an, welches man dem Maßblatt des Getriebes entnehmen kann. So ein Code gibt das Übersetzungsverhältnis an. z.B. ein Getriebe S2020 hat ein Verhältnis 1:1,90 bezogen auf die Eingangswelle Z:



La 9ª posizione indica lo schema di montaggio degli ingranaggi: R, F o G.

The 9th position indicates the gear arrangement R, F, or G:

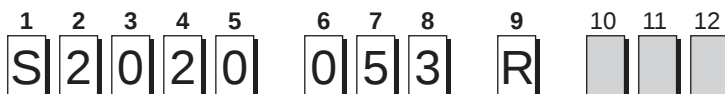
Die neunte Position des Codes gibt das Montageschema des Getriebes R,F oder G an.



Ad esempio per un montaggio R il codice diventa:

For example, with a gear arrangement R the code becomes:

Z.B. eine Montage R wird so codiert:



La 10^a posizione indica la configurazione dell'asse Z.

The 10th position indicates the style of shaft of the z axis.

Die 10. Stelle gibt die Lage der Z-Welle an

La 11^a posizione indica la configurazione dell'asse X.

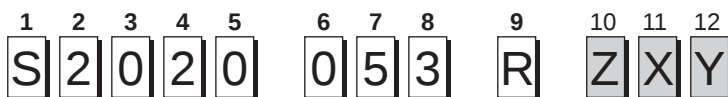
The 11th position indicates the style of shaft on the x axis.

Die 11. Stelle gibt die Lage der x-Welle an

La 12^a posizione indica la configurazione dell'asse Y.

The 12th position indicates the style of shaft on the y axis.

Die 12. Stelle gibt die Lage der y-Welle an



Le configurazioni possibili sono riportate sulla scheda di ogni tipo di scatola.

The standard style shafts are indicated in the data sheet for every type of gearbox.

Die möglichen Einbaulagen sind in jedem Typenblatt eines Getriebes dargestellt.

Per la SERIE 3000 il codice è strutturato nel modo precedentemente descritto fino alla 9^a posizione.

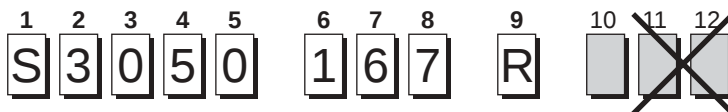
For the series 3000 the code is structured as before up to the 9th position.

Für die Serie 3000 ist die Codierung - wie bereits beschrieben - aber nur bis zur 9. Stelle.

La 10^a posizione indica in questo caso il TIPO DI FUSIONE tra quelli rappresentati nella scheda della scatola.

The 10th position for this series indicates the type of housing from among those listed on the data sheet.

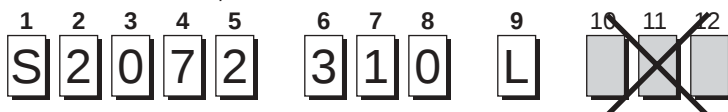
Die 10. Stelle gibt die Art des Gusses der verschiedenen Getriebetypen an.



Se il TIPO DI FUSIONE è unico questa indicazione viene tralasciata ed il codice risulta composto soltanto dalle prime 9 posizioni.

If there is only one style of housing offered for a particular gearbox, this digit is omitted and the code is simply composed of the first 9 positions

Wenn der Gußtyp einheitlich ist, wird diese Stelle weggelassen und der Code setzt sich nur aus den ersten neun Stellen zusammen.



Per la SERIE 2002 il codice è strutturato nel modo precedentemente descritto fino alla 8^a posizione.

For the series 2002 the code is structured as before up to the 8th position.

Für die Serie 2002 ist die Codierung - wie bereits beschrieben - aber nur bis zur 8. Stelle.

La 9^a posizione indica in questo caso il TIPO DI COMANDO dell'INVER-TITORE: a leva "L" o idraulico "I".

The 9th position indicates the type of INVERTER: manual "L" or hydraulic "I".

Die 9. Stelle gibt die Art der Betätigung des Wechselgetriebes an: mit Hebel "L" oder hydraulisch "I".

Il codice delle SCATOLE SPECIALI è composto da 11 posizioni ed ha struttura comune alle scatole standard fino alla 8^a posizione. Le 3 posizioni successive costituiscono in questo caso un numero progressivo.

The code for gearboxes with non-standard features is composed of 11 digits, of which the first eight positions are identical to the above examples. The last three digits are sequential numbers indicating the modification.

Der Code der Spezialgetriebe setzt sich aus 11 Stellen zusammen und hat bis zur 8. Stelle die Form der Standardcodierung, die 9., 10. und 11. Stelle bilden eine fortlaufende Zahlenfolge.

Le scatole ad ingranaggi sono dotate di etichetta di identificazione che riporta il codice Bondioli & Pavesi.

The gearboxes are provided with an identification label which includes the Bondioli & Pavesi code number.

Die Getriebe sind mit Typenschild versehen, auf dem die Bondioli & Pavesi-Bestellnummer steht.

UNITÀ DI MISURA E RELAZIONI MECCANICHE

CONVERSION OF UNITS (ENGLISH - METRIC)

UMRECHNUNGSTABELLEN (MECHANIK)

1 mm	≈	0.039 in
1 in	=	25.400mm
1 N	≈	0.225 lb
1 N	≈	0.102 kp
1 lb	≈	4.448 N
1 lb	≈	0.454 kp

1 kp	≈	9.81 N
1 kp	≈	2.205 lb
1 daN	≈	0.225 lb
1 N•m	≈	8.851 in•lb
1 N•m	≈	0.102 kp•m
1 in•lb	≈	0.113 N•m

1 in•lb	≈	0.012 kp•m
1 kp•m	≈	9.81 N•m
1 kp•m	≈	86.796 in•lb
1 kW	≈	1.360 CV
1 CV	≈	0.735 kW
1 CV	≈	1 PS ≈ 1HP

P potenza
M momento della coppia torcente
n velocità giri/min
k valore numerico dipendente dalle unità di misura

P power
M torque
n rpm
k constant depending upon units of measurement

P Leistung
M Drehmoment
n Drehzahl in U/min
k Umrechnungsfaktor abhängig von der Maßeinheit

$$P = \frac{M \cdot n}{k} \quad M = k \cdot \frac{P}{n}$$

VALORI DELLA COSTANTE k - VALUE OF k - FAKTOR k

COPPIA TORQUE DREHMOMENT	POTENZA POWER LEISTUNG	
	kW	CV-HP-PS
daN • m	954.93	702.35
in • lb	84518.40	62163.18
kp • m	973.76	716.20

ESEMPIO 1 :
 Determinare la potenza **P** espressa in **CV** avendo i seguenti dati:

M - coppia : 150 kp • m
n - velocità : 540 giri/min
k - costante 716.20 (vedi tabella)

$$P = \frac{150 \cdot 540}{716.20} = 113.09 \text{ CV}$$

EXAMPLE 1 :
 Determine power **P** in **HP** given:

M - torque : 150 kp • m
n - speed : 540 rpm
k - constant 716.20 (see table)

$$P = \frac{150 \cdot 540}{716.20} = 113.09 \text{ HP}$$

BEISPIEL 1 :
 Bestimmung der Leistung **P** in **PS** folgenden Daten:

M - Drehmoment : 150 kp • m
n - Drehzahl : 540 U/min
k - Faktor 716.20 (siehe Tabelle)

$$P = \frac{150 \cdot 540}{716.20} = 113.09 \text{ PS}$$

ESEMPIO 2 :
 Determinare la coppia **M** espressa in **in•lb** avendo i seguenti dati :

P - potenza : 100 kW
n - velocità : 540 giri/min
k - costante : 84518.40 (vedi tab.)

$$M = 84518.40 \cdot \frac{100}{540} = 15651.55 \text{ in} \cdot \text{lb}$$

EXAMPLE 2 :
 Determine the torque **M** in **in•lb** given:

P - power : 100 kW
n - speed : 540 rpm
k - constant 84518.40 (see table)

$$M = 84518.40 \cdot \frac{100}{540} = 15651.55 \text{ in} \cdot \text{lb}$$

BEISPIEL 2 :
 Bestimmung des Drehmomentes **M** in **in • lb** mit folgenden Daten:

P - Leistung : 100 kW
n - Drehzahl : 540 U/min
k - Faktor 84518.40 (siehe Tabelle)

$$M = 84518.40 \cdot \frac{100}{540} = 15651.55 \text{ in} \cdot \text{lb}$$

UNITÀ DI MISURA E RELAZIONI OLEODINAMICHE
CONVERSION OF HYDRAULIC UNITS
UMRECHNUNGSTABELLEN (HYDRAULIK)



1 in ³	=	16.387 cm ³
1 cm ³	=	0.061 in ³
1 US gal	=	3.785 l
1 l	=	0.264 US gal
1 US pt	=	0.473 l
1 l	=	2.114 US pt

1 psi	=	0.069 bar
1 bar	=	14.504 psi
1 atm	=	1.013 bar
1 bar	=	0.987 atm
1 atm	=	14.696 psi
1 psi	=	0.068 atm

1 US gpm	=	3.785 l/min
1 l/min	=	0.264 US gpm
1 m ³ /h	=	16.667 l/min
1 l/min	=	0.060 m ³ /h
1 US gpm	=	0.227 m ³ /h
1 m ³ /h	=	4.403 US gpm

Tra le principali grandezze oleodinamiche valgono le seguenti relazioni a meno dei rendimenti idraulico e meccanico.

Among the main hydraulic parameters, the following relationship apply (neglecting the hydraulic and mechanical efficiencies):

Für die wichtigsten Maßeinheiten der Hydraulik gelten die folgenden Definitionen (ohne Berücksichtigung des hydr. und mech. Wirkungsgrades)

Q portata (l/min)
n velocità rot. (giri/min)
V cilindrata (cm³/giro)

Q flow rate (US gpm)
n rotational speed (rpm)
V displacement (in³/rev)

Q Förderstrom (l/min)
n Drehzahl (U/min)
V Fördervolumen (cm³/U)

$$Q = \frac{V \cdot n}{K_1} \quad V = K_1 \cdot \frac{Q}{n}$$

VALORI DELLA COSTANTE k_1 - VALUE OF k_1 - FAKTOR k_1

COEFFICIENTE K_1 COEFFICIENTE K_1 - FAKTOR K_1		CILINDRATA - DISPLACEMENT - FÖRDERVOLUMEN V cm ³ /giro - cm ³ /U		V in ³ /rev
PORTATA FLOW RATE FÖRDERSTROM	l/min Q US gpm	1000	3785	61 231

P = potenza [kW]
p = pressione (bar)

P = power [kW]
p = pressure (bar)

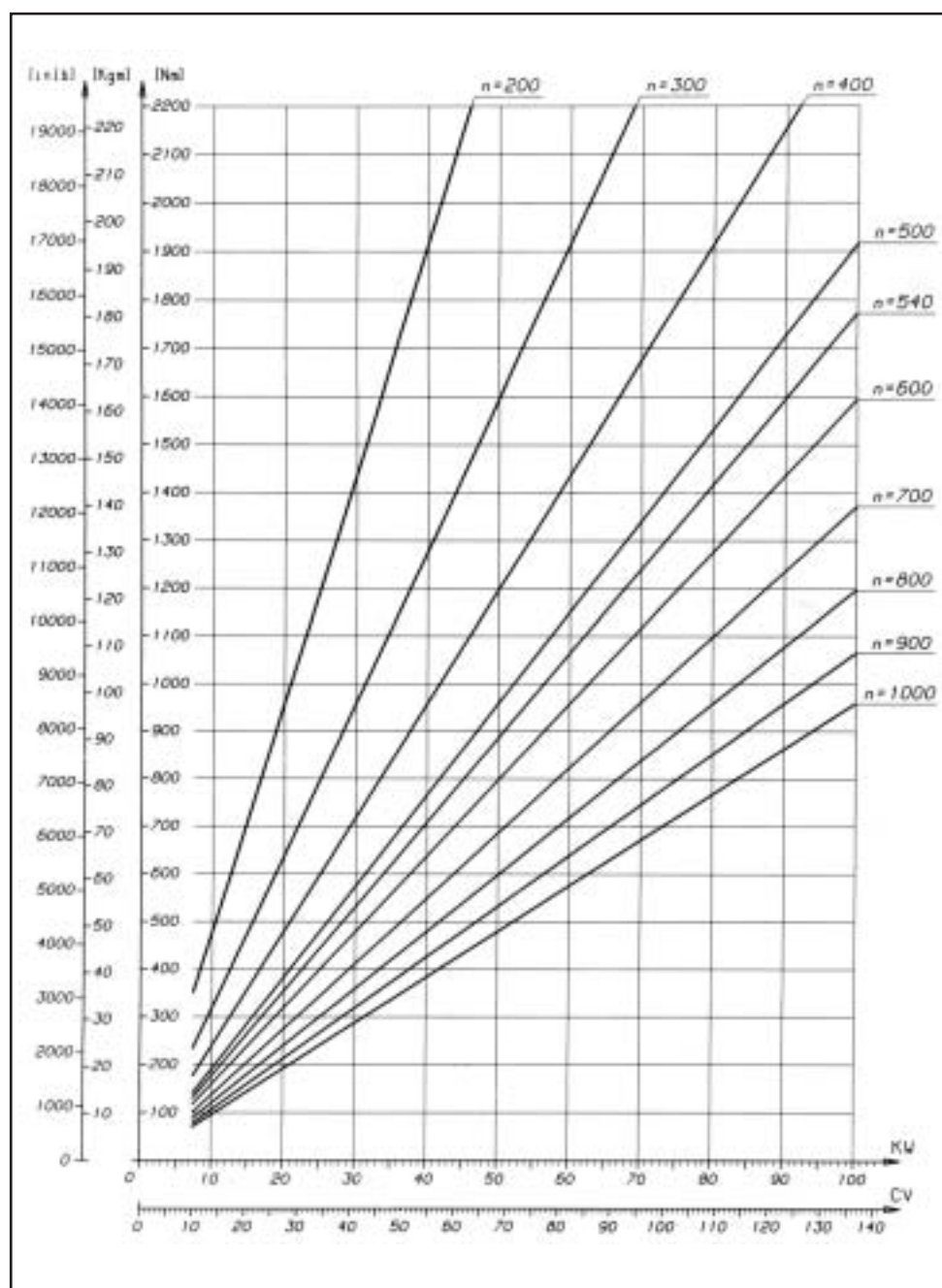
P = Leistung [kW]
p = Arbeitsdruck (bar)

$$Q = K_2 \cdot \frac{p}{P} \quad p = K_2 \cdot \frac{P}{Q}$$

VALORI DELLA COSTANTE k_2 - VALUE OF k_2 - FAKTOR k_2

		PRESSIONE - PRESSURE - ARBEITSDRUCK p bar		p psi
PORTATA FLOW RATE FÖRDERSTROM	l/min Q US gpm	612	162	8568 2298

CORRISPONDENZA COPPIA POTENZA
DIAGRAM OF SPEED/TORQUE/POWER
UMRECHNUNGSTABELLE DREHMOMENT - LEISTUNG



SERIE
SERIES 1000

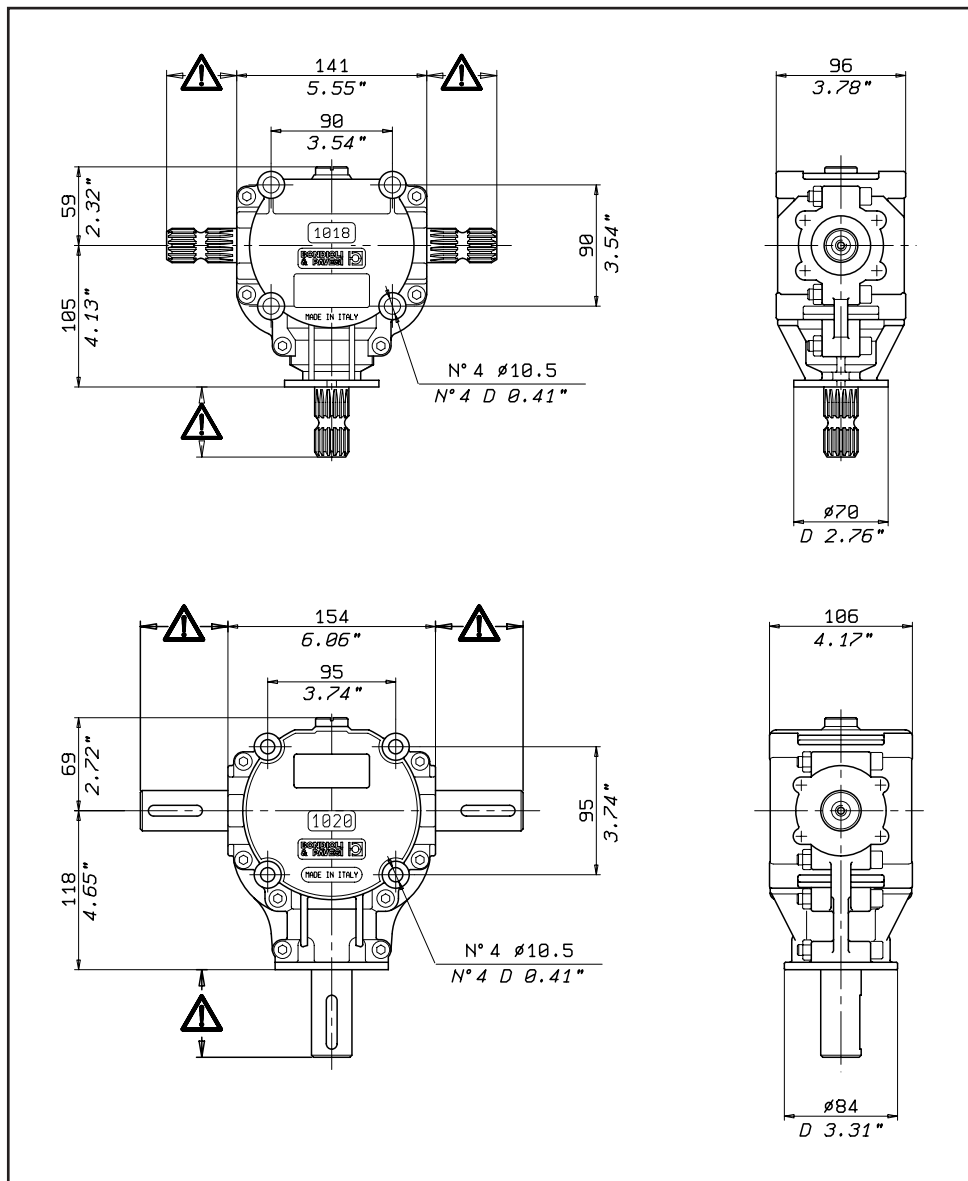


**BONDIOLI
& PAVESI**



SERIE SERIES 1000





ATTENZIONE! 
 Gli alberi contrassegnati  non sono protetti. Ogni componente in rotazione deve avere una protezione specifica o integrata con la macchina. Bondioli & Pavesi declina ogni responsabilità in caso le idonee protezioni non siano previste e mantenute efficienti

WARNING! 
 Rotating shafts marked  are not shielded. Any shaft and coupling not guarded by location must be shielded by an interactive guarding system. Bondioli & Pavesi declines responsibility if proper guards are not provided and maintained.

ACHTUNG! 
 Die mit gekennzeichneten  Wellen sind freiliegend. Jedes drehende Bauteil muss einen spezifischen oder in die Maschine integrierten Schutz haben. Bei nicht geeigneten oder unzureichend instandgehaltenen Schutzvorrichtungen lehnt Bondioli & Pavesi jegliche Verantwortung ab.

SERIE 1000

- SCATOLE MULTIFUNZIONE, PRINCIPALI APPLICAZIONI: SPANDICONCIME, MACCHINE PER IL GIARDINAGGIO.

- RAPPORTI DA 1:1 A 2,78 IN MOLTIPLICA ED IN RIDUZIONE.

- POTENZE FINO A 30 CV A 540 giri/min.

- SCATOLE IN LEGA DI ALLUMINIO PRESSOFUSO DI ELEVATA RESISTENZA.

- COPPIE CONICHE A DENTATURA DIRITTA GLEASON IN ACCIAIO CEMENTATO E TEMPERATO.

- ANELLI DI TENUTA CON LABBRO PARAPOLVERE.

- MULTI-PURPOSE GEARBOXES. TYPICAL APPLICATIONS ARE SPREADER, MOWERS, FLAIL MOWERS.

- RATIOS FROM 1:1 TO 2,78 AS MULTIPLIER OR REDUCER.

- POWER UP TO 30 Hp AT 540 r.p.m.

- HIGH STRENGTH DIE CAST ALUMINIUM ALLOY CASES.

- GEARS ARE CARBURIZED AND HARDENED STEEL, STRAIGHT CUT GLEASON SYSTEM TEETH.

- DUST LIP ON OIL SEALS

- MEHRZWECKGEHÄUSE, HAUPT-EINSATZBEREICHE: DÜNGSTREUER, GÄRTENGERÄTE.

- ÜBERSETZUNGSVERHÄLTNI SSE VON 1:1 BIS 2,78 AUCH ALS UNTERSETZUNG.

- LEISTUNGSBEREICH BIS 30 CV BEI 540 U/MIN.

- GEHÄUSE AUS HOCHFESTEM PREßDRUCK-ALUMINIUM.

- KEGELRÄDER, GERADEVERZAHNT UND EINSATZGEHÄRTET.

- WELLENDICHTRINGE MIT STAUBSCHUTZLIPPE.



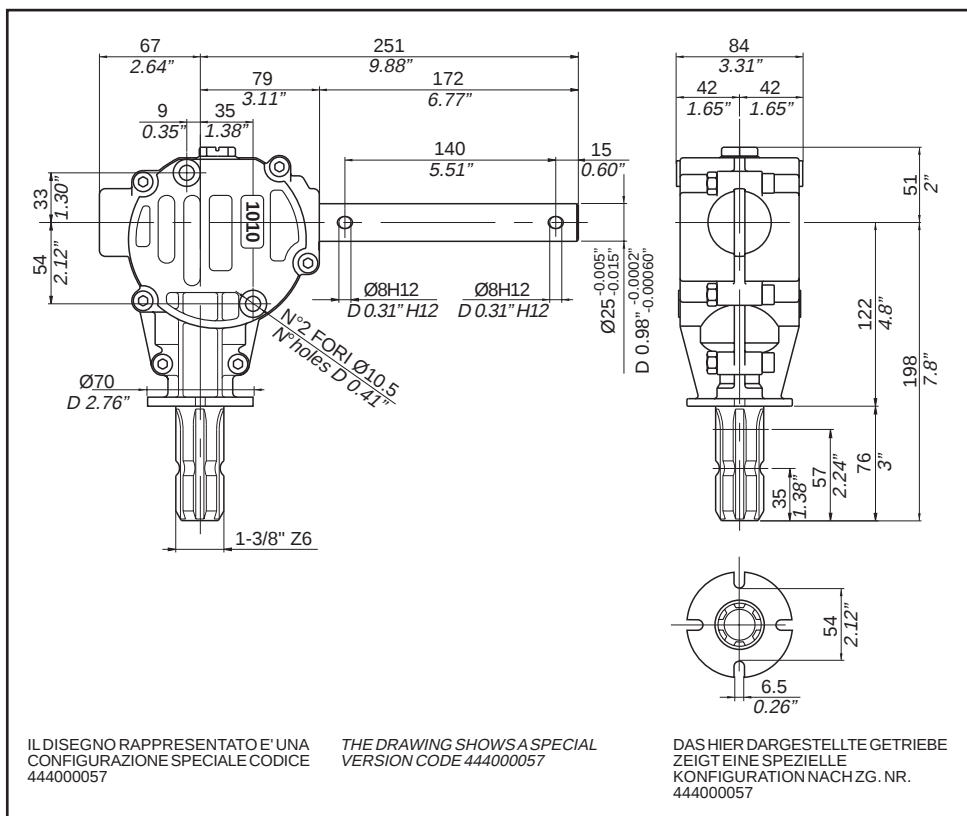
POTENZA a 540 giri/min. - POWER at 540 r.p.m. - LEISTUNG bei 540 U/min.



POTENZA a 1000 giri/min. - POWER at 1000 r.p.m. - LEISTUNG bei 1000 U/min.

		S1010		S1018		S1020	
		kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGSGETRIEBE	1:2,78			7 11	10 15	9 13	12 18
	1:1,90			10 16	14 22	13 21	18 28
	1:1,50						
	1:1,46					16 25	22 34
	1:1,35			12 18	16 25	17 26	23 36
	1:1	7	10	11 17	15 23	15 23	20 31
RIDUTTORE SPEED REDUCER UNTERSETZUNGSGETRIEBE	1,35:1			10 15	13 20	13 21	18 28
	1,46:1					12 18	16 25
	1,50:1						
	1,90:1			7 10	9 14	9 13	12 18
	2,78:1			4 6	5 8	4 7	6 9

1010



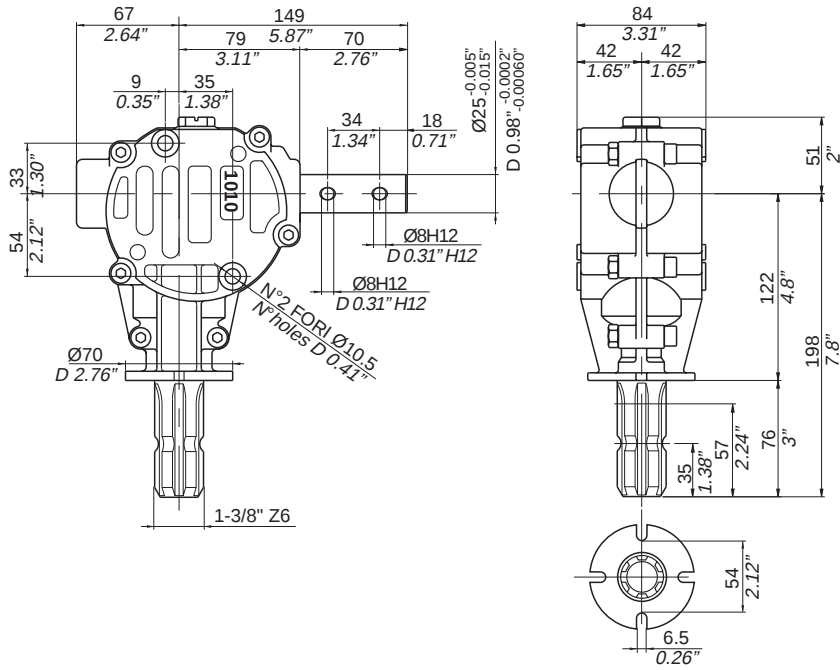
IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m U/min.	P kW	CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	INGRESSO-INPUT-EINGANG Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE											
	1:1	540	7	10	130	1151	130	1151	540	100	100
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE											

★ E' predisposta per l'attacco cuffia di protezione. I fori sono eseguiti a richiesta.

★ Provision for fitting of safety cone. Mounting holes made on request.

★ Schutz zopfbestigung ist vorgesehen, die Gewindebohrungen werden auf Wunsch angebracht.

1010



IL DISEGNO RAPPRESENTATO E' UNA CONFIGURAZIONE SPECIALE CODICE S 1010100018

THE DRAWING SHOWS A SPECIAL VERSION CODE S 1010100018

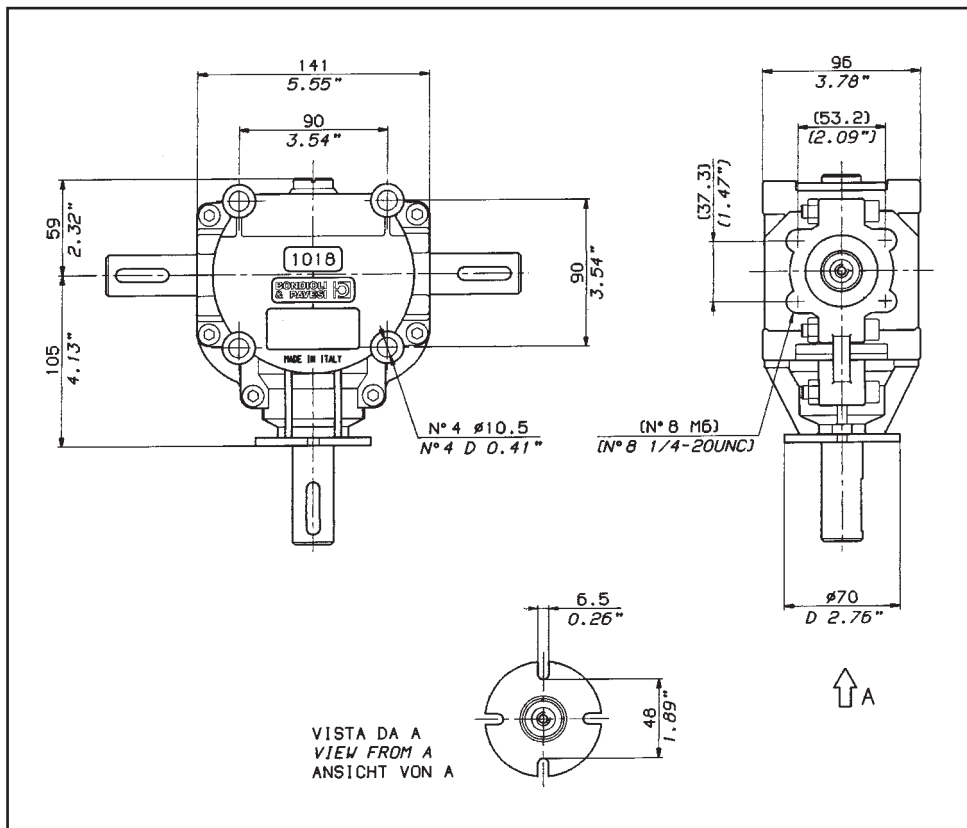
DAS HIER DARGESTELLTE GETRIEBE ZEIGT EINE SPEZIELLE KONFIGURATION NACH ZG. NR. S 1010100018

IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE											
	1:1	540	7	10	130	1151	130	1151	540	100	100
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE											

* E' predisposta per l'attacco cuffia di protezione. I fori sono eseguiti a richiesta.

* Provision for fitting of safety cone. Mounting holes made on request.

* Schutz zopfbestigung ist vorgesehen, die Gewindebohrungen werden auf Wunsch angebracht.

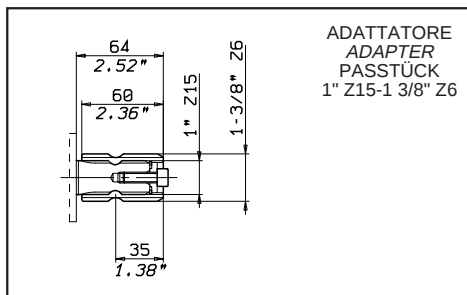
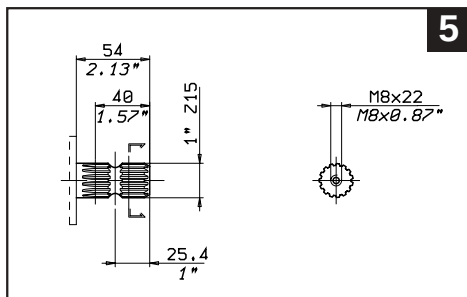
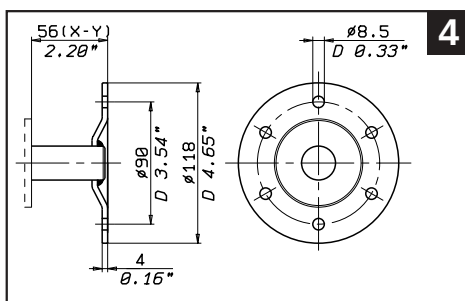
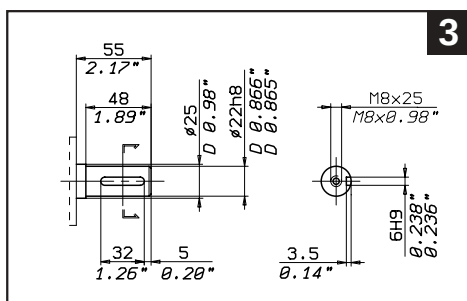
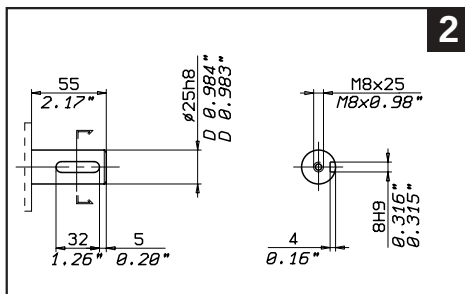
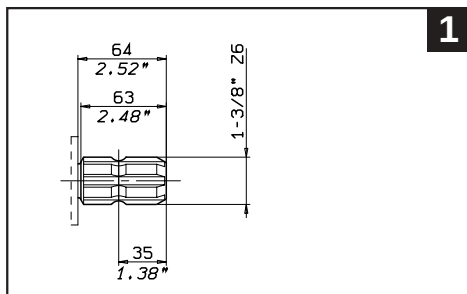


IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV-Hp-PS	N•m	M in•lb	N•m	in•lb	giri/min. r.p.m. U/min.	Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,78	540	7	10	130	1151	47	414	1501	—	278
		1000	11	15	105	933	38	336	2780		
	1:1,90	540	10	14	182	1612	96	848	1026	053	190
		1000	16	22	155	1368	81	720	1900		
	1:1,35	540	12	16	208	1842	154	1365	729	074	135
		1000	18	25	176	1554	130	1151	1350		
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1:1	540	11	15	195	1727	195	1727	540	100	100
		1000	17	23	162	1430	162	1430	1000		
	1,35:1	540	10	13	169	1497	228	2021	400	135	074
		1000	15	20	141	1244	190	1679	741		
	1,90:1	540	7	9	117	1036	222	1969	284	190	053
		1000	10	14	98	871	187	1654	526		
	2,78:1	540	4	5	65	576	181	1601	194	278	—
		1000	6	8	56	497	156	1383	360		

★ E' predisposta per l'attacco cuffia di protezione. I fori sono eseguiti a richiesta.

★ Provision for fitting of safety cone. Mounting holes made on request.

★ Schutz zopfbestigung ist vorgesehen, die Gewindebohrungen werden auf Wunsch angebracht.



ADATTATORE
ADAPTER
PASSTÜCK
1" Z15-1 3/8" Z6

Albero 1 3/8" Z6 non realizzabile di pezzo:

- contemporaneamente sugli assi X e Y.
- sull'asse Z per S1018190 e S1018278.
- sull'asse X e sull'asse Y per S1018053.

Nei suddetti casi richiedere l'albero 1" Z15 tipo 5 e l'adattatore speciale raffigurato a fianco.

1 3/8" Z6 shaft not available in one piece:

- on both axes X and Y at the same time.
- on axis Z for S1018190 and S1018278.
- on both axes X and Y for S1018053.

The above cases require shaft 1" Z15 type 5 together with the special adapter illustrated opposite.

Welle 1 3/8" Z6 nicht in einem Stück herstellbar:

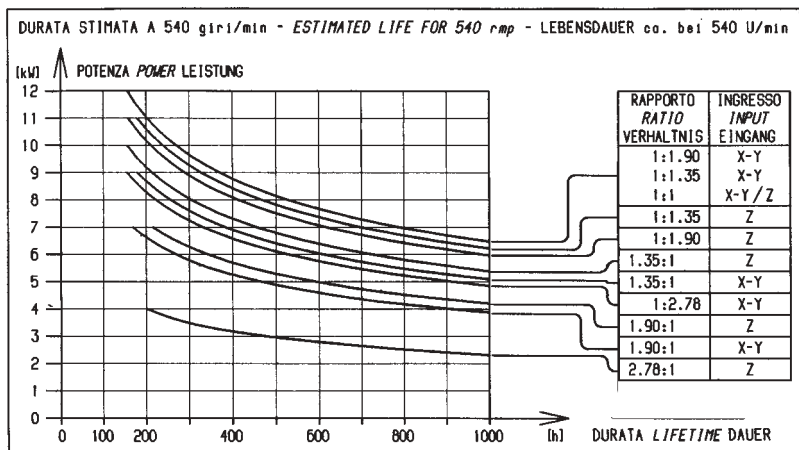
- gleichzeitig auf den X- und Y-Achsen.
- auf der Z-Achse für S1018190 und S1018278.
- auf der X und Y Achse für S1018053.

In den o.a. Fällen, die Welle 1" Z15 typ 5 und den speziellen daneben abgebildeten Spezialadapter anfragen.

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,25 L
PESO INDICATIVO SCATOLA 4,5 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 8 ozs
APPROXIMATE WEIGHT 10 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,25 L
GETRIEBEGEWICHT CA. 4,5 kg



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER



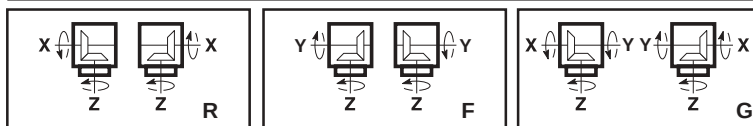
TIPO - TYPE - TYP

1018

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

278 - 190 - 135 - 100 - 074 - 053

MONTAGGIO - ARRANGEMENT - MONTAGEART

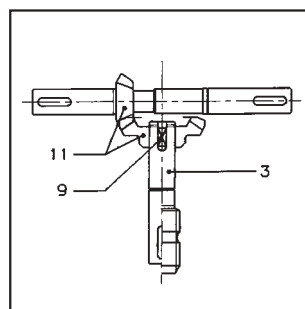
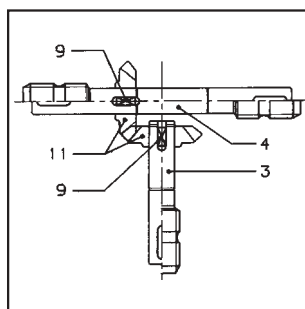
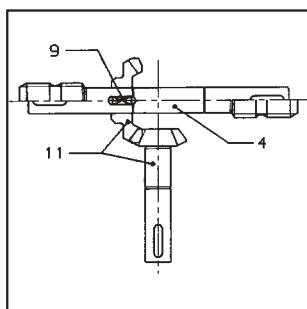
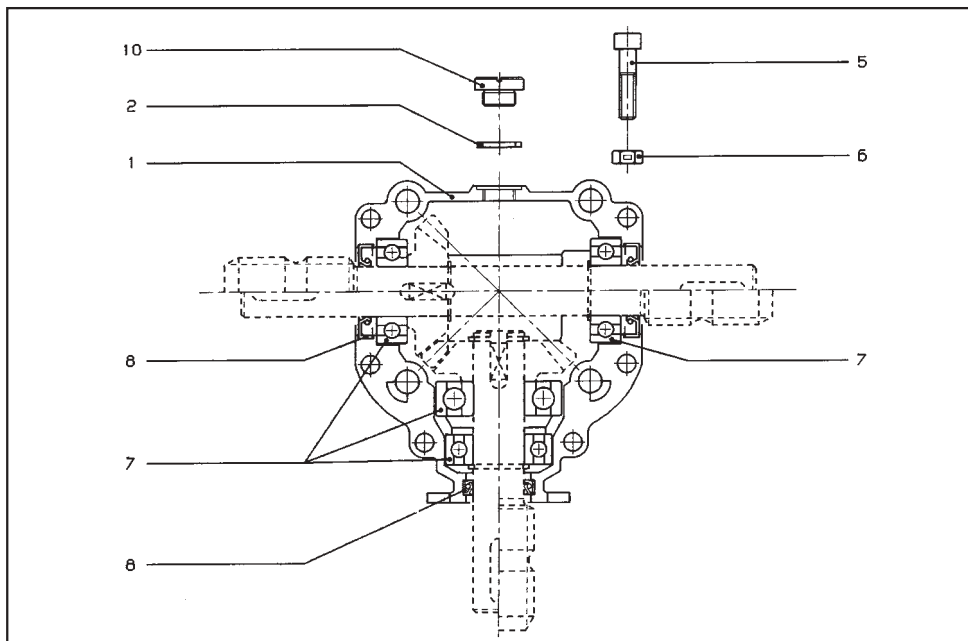


0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE)
1, 2, 3, 4, 5 (TIPO DI ALBERO - SHAFT - WELLENTYP)

ASSE Z - Z AXIS - WELLE Z

ASSE X - X AXIS - WELLE X

ASSE Y - Y AXIS - WELLE Y



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

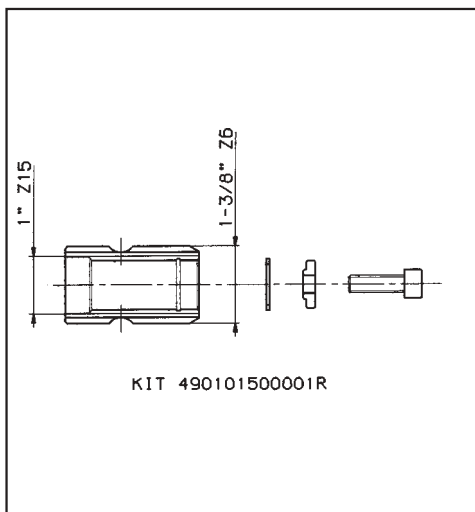
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*
2		298301600
3		*
4		*
5		303021200
6		330002620
7	6305	354100025
	6205	354104025

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8	25x47x7	355001025
	25x35x7	355003025
9	B 8x7x18	370004000
10	3/8"GAS	373028000
11		*

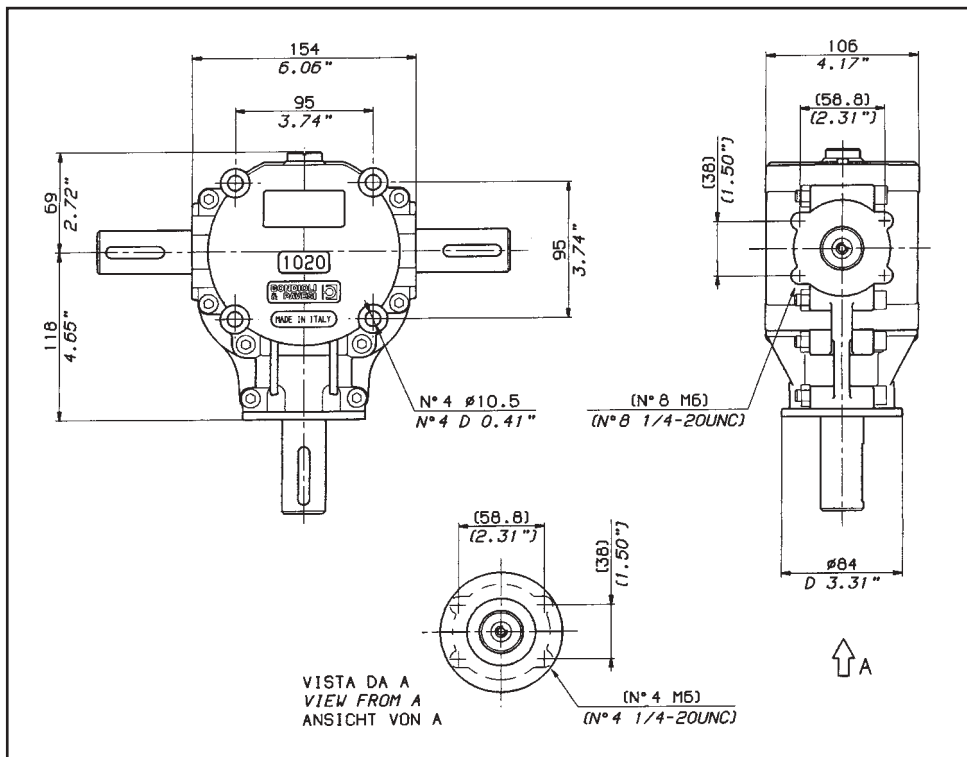
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 REF. 1 BEZ. 1	RIF. 3 REF. 3 BEZ. 3	RIF. 4 REF. 4 BEZ. 4	RIF. 11 REF. 11 BEZ. 11	COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 REF. 1 BEZ. 1	RIF. 3 REF. 3 BEZ. 3	RIF. 4 REF. 4 BEZ. 4	RIF. 11 REF. 11 BEZ. 11
S1018053F102	190250026+190250027	295036136		448053409R	S1018278G221	190250028+190250029		295036144	448278300R
S1018053F103	190250026+190250027	295036136		448053412R	S1018278G222	190250028+190250029		295616135	448278300R
S1018053F202	190250026+190250027	295616133		448053409R	S1018278G333	190250028+190250029		295606002	448278302R
S1018053G122	190250028+190250029	295036136		448053414R	S1018278R210	190250026+190250027		295036143	448278300R
S1018053G133	190250028+190250029	295036136		448053410R	S1018278R220	190250026+190250027		295616134	448278300R
S1018053G222	190250028+190250029	295616133		448053414R	S1018278R310	190250026+190250027		295036143	448278302R
S1018053R120	190250026+190250027	295036136		448053413R					
S1018053R130	190250026+190250027	295036136		448053411R					
S1018053R220	190250026+190250027	295616133		448053413R					
S1018074F102	190250026+190250027	295036136	295616136	448135301R					
S1018074F202	190250026+190250027	295616133	295616136	448135301R					
S1018074G122	190250028+190250029	295036136	295616187	448135301R					
S1018074G222	190250028+190250029	295616133	295616187	448135301R					
S1018074R110	190250026+190250027	295036136	295036143	448135301R					
S1018074R120	190250026+190250027	295036136	295616134	448135301R					
S1018074R140	190250026+190250027	295036136	295619815	448135301R					
S1018074R220	190250026+190250027	295616133	295616134	448135301R					
S1018100F101	190250026+190250027	295036136	295036142	448100404R					
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1020

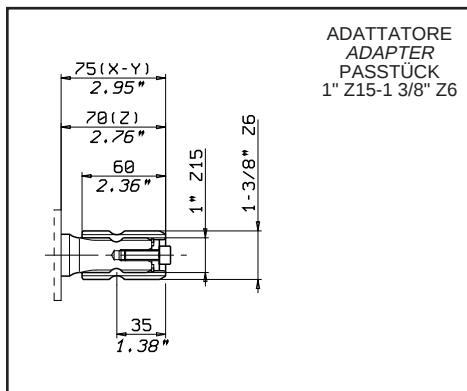
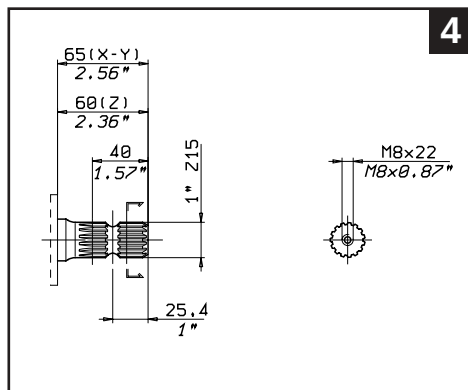
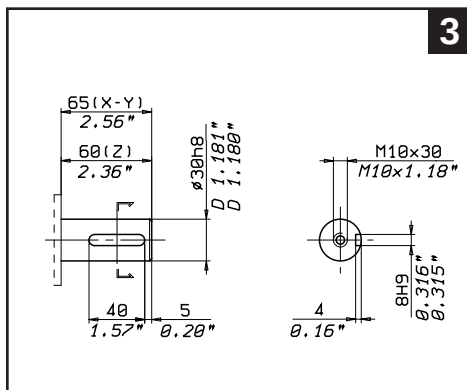
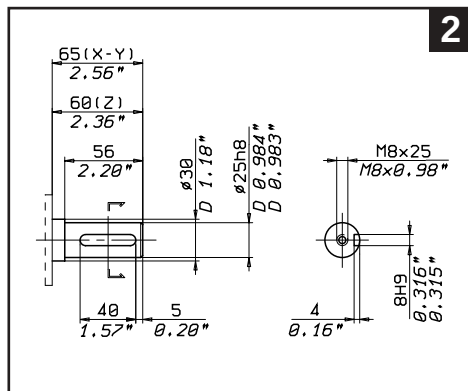
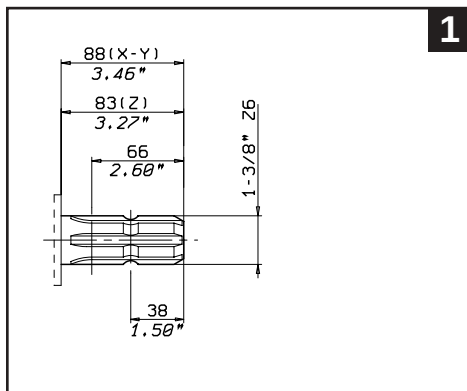


IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,78	540	9	12	156	1382	56	497	1501	-	278
		1000	13	18	126	1119	45	403	2780		
	1:1,90	540	13	18	234	2073	123	1091	1026	053	190
		1000	21	28	197	1741	104	916	1900		
	1:1,46	540	16	22	286	2533	196	1735	788	068	146
		1000	25	34	239	2114	164	1448	1460		
	1:1,35	540	17	23	299	2648	222	1962	729	074	135
		1000	26	36	253	2238	187	1658	1350		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1	540	15	20	260	2303	260	2303	540	100	100
		1000	23	31	218	1928	218	1928	1000		
	1,35:1	540	13	18	234	2073	316	2798	400	135	074
		1000	21	28	197	1741	266	2350	741		
	1,46:1	540	12	16	208	1842	304	2690	370	146	068
		1000	18	25	176	1554	256	2270	685		
	1,90:1	540	9	12	156	1382	297	2625	284	190	053
		1000	13	18	126	1119	240	2127	526		
	2,78:1	540	4	6	78	691	217	1921	194	278	-
		1000	7	9	63	560	176	1556	360		

★ E' predisposta per l'attacco cuffia di protezione. I fori sono eseguiti a richiesta.

★ Provision for fitting of safety cone. Mounting holes made on request.

★ Schutz zopfbestigung ist vorgesehen, die Gewindebohrungen werden auf Wunsch angebracht.



Albero 1 3/8" Z6 non realizzabile di pezzo:

- contemporaneamente sugli assi X e Y.
- sull'asse Z per S1020190 e S1020278.
- sull'asse X e sull'asse Y per S1020053.

Nei suddetti casi richiedere l'albero 1" Z15 tipo 4 e l'adattatore speciale raffigurato a fianco.

1 3/8" Z6 shaft not available in one piece:

- on both axes X and Y at the same time.
- on axis Z for S1020190 and S1020278.
- on both axes X and Y for S1020053.

The above cases require shaft 1" Z15 type 4 together with the special adapter illustrated opposite.

Welle 1 3/8" Z6 nicht in einem Stück herstellbar:

- gleichzeitig auf den X- und Y-Achsen.
- auf der Z-Achse für S1020190 und S1020278.
- auf der X und Y Achse für S1020053.

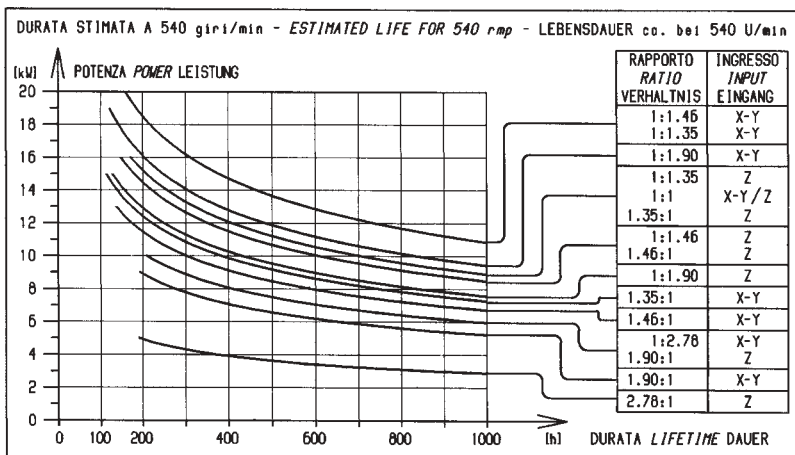
In den o.a. Fällen, die Welle 1" Z15 typ 4 und den speziellen daneben abgebildeten Spezialadapter anfragen.

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,6 L
PESO INDICATIVO SCATOLA 6 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 19 ozs
APPROXIMATE WEIGHT 13 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,6 L
GETRIEBEGEWICHT CA. 6 kg

1020



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER



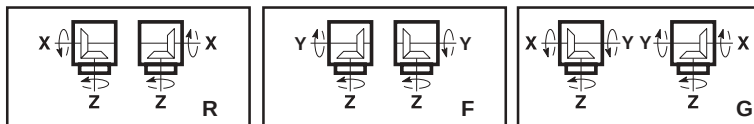
TIPO - TYPE - TYP

1020

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

278 - 190 - 146 - 135 - 100 - 074 - 068 - 053

MONTAGGIO - ARRANGEMENT - MONTAGEART

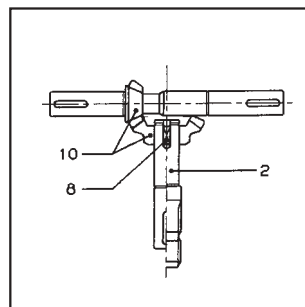
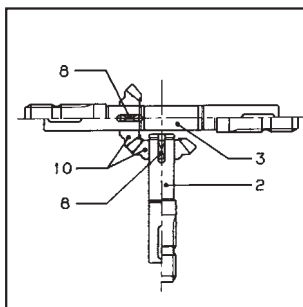
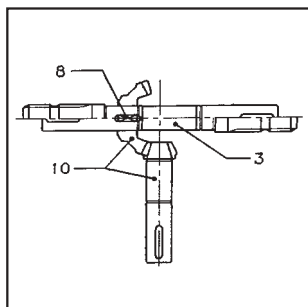
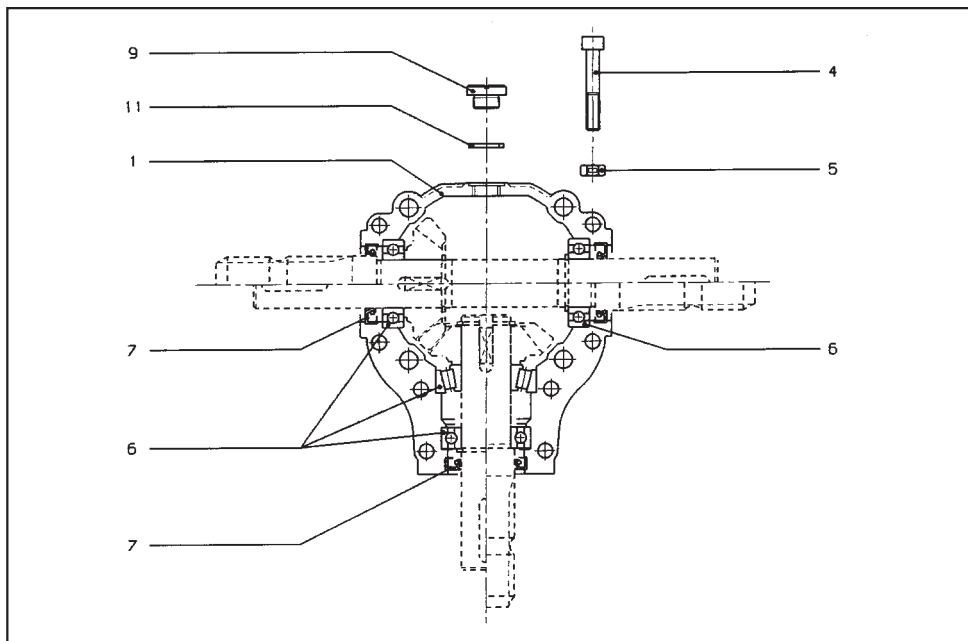


0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE)
1, 2, 3, 4, (TIPO DI ALBERO - SHAFT - WELLENTYP)

ASSE Z - Z AXIS - WELLE Z

ASSE X - X AXIS - WELLE X

ASSE Y - Y AXIS - WELLE Y



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

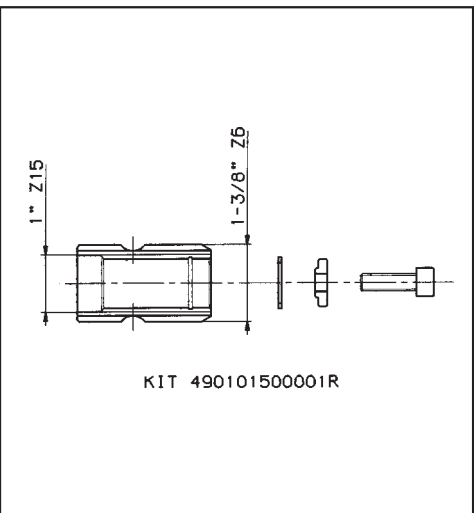
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5	6006	354102030
6	30206	354400030
7	30x50X7	355000030
	35x50x7	355010035

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8	B 8x7x22	370007000
	3/8" GAS	373028000
9		*
10		298301600
11		

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 REF. 1 BEZ. 1	RIF. 3 REF. 3 BEZ. 3	RIF. 4 REF. 4 BEZ. 4	RIF. 11 REF. 11 BEZ. 11	COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 REF. 1 BEZ. 1	RIF. 3 REF. 3 BEZ. 3	RIF. 4 REF. 4 BEZ. 4	RIF. 11 REF. 11 BEZ. 11
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**SERIE
SERIES 2000**

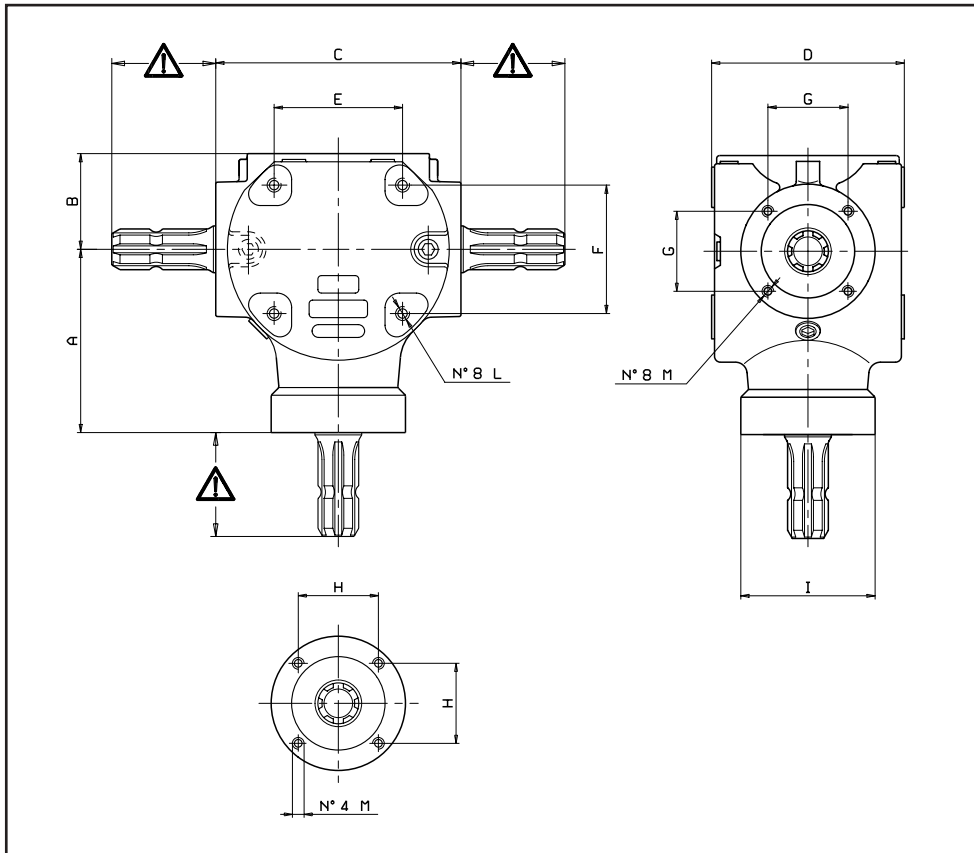


**BONDIOLI
& PAVESI**



SERIE SERIES 2000





TIPO TYPE TYP	A	B	C	D	E	F	G	H	I	L	M
S2018	100	64	142	120	80	80	47,4	47,4	82	M10	M8
G2018	3,94"	2,52"	5,59"	4,72"	3,15"	3,15"	1,87"	1,87"	3,23"	3/8-16UNC	5/16-18UNC
S2020	115	67	164	120	88	88	54,4	54,4	92	M10	M8
G2020	4,53"	2,64"	6,46"	4,72"	3,46"	3,46"	2,14"	2,14"	3,62"	3/8-16UNC	5/16-18UNC
S2030	137	70	180	144	88	88	61,5	61,5	104	M12	M8
G2030	5,39"	2,76"	7,09"	5,67"	3,46"	3,46"	2,42"	2,42"	4,09"	1/2-13UNC	5/16-18UNC
S2050	157	82	210	165	110	110	68,6	68,6	115	M12	M10
G2050	6,18"	3,23"	8,27"	6,50"	4,33"	4,33"	2,70"	2,70"	4,53"	1/2-13UNC	3/8-16UNC
S2070	175	90	230	175	115	115	68,6	68,6	115	M14	M10
G2070	6,89"	3,54"	9,06"	6,89"	4,53"	4,53"	2,70"	2,70"	4,53"	9/16-12UNC	3/8-16UNC
S2100	197	100	244	190	127	127	73,5	73,5	120	M16	M10
G2100	7,76"	3,94"	9,61"	7,48"	5"	5"	2,89"	2,89"	4,72"	5/8-11UNC	M103/8
S2125	220	114	280	225	160	145	76,4"	76,4	130	M16	M10
G2125	8,66"	4,49"	11,02"	8,86"	6,3"	5,71"	3"	3"	5,12"	5/8-11UNC	3/8-16UNC
S2150	240	130	310	260	170	170	80	80	135	M16	M10
G2150	9,45"	5,12"	12,20"	10,24"	6,69"	6,69"	3,15"	3,15"	5,31"	5/8-11UNC	3/8-16UNC
S2200	335	145	385	310	220	170	130	105	150	M20	M10
G2200	13,19"	5,71"	15,16"	12,20"	8,66"	6,69"	5,12"	4,13"	5,91"	3/4-10UNC	3/8-16UNC

2000

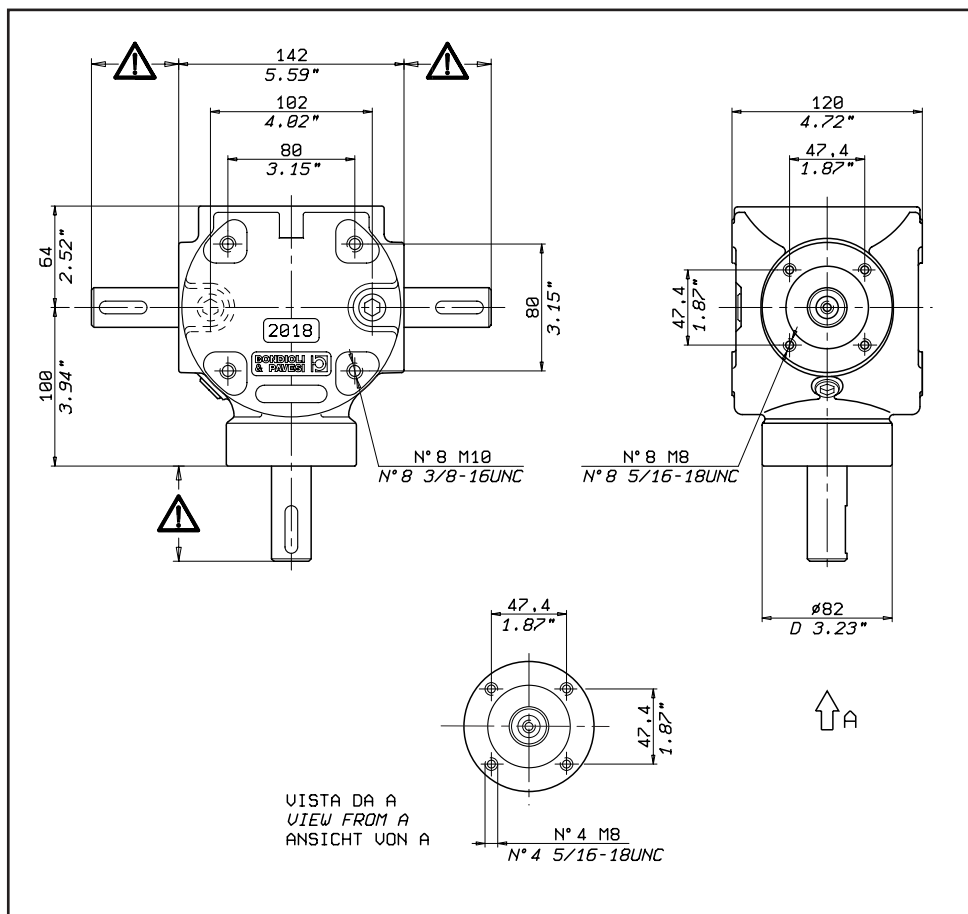
- SCATOLE MULTIFUNZIONE.
- RAPPORTI DA 1:1 A 2,78 IN MULTIPLICA ED IN RIDUZIONE.
- POTENZE FINO 200 kW A 540 giri/min.
- SCATOLE MONOBLOCCO IN GHISA.
- VERNICIATURA INTERNA ED ESTERNA, ESSICAZIONE IN FORNO, RESISTENZA ALLA CORROSIONE SECONDO NORMA ASTM B 117-79, RESISTENZA ALL'OLIO SAE 90EP FINO A 125°C (260°F).
- COPPIE CONICHE A DENTATURA DIRITTA GLEASON IN ACCIAIO CEMENTATO E TEMPRATO.
- ALBERI IN ACCIAIO CEMENTATO E TEMPRATO O BONIFICATO.
- ANELLI DI TENUTA CON LABBRO PARAPOLVERE.
- CUSCINETTI DI QUALITÀ PER ELEVATA AFFIDABILITÀ (L₁₀)

- MULTI-PURPOSE GEARBOXES.
- RATIOS FROM 1:1 TO 2,78 AS MULTIPLIER OR AS REDUCER.
- POWER UP TO 200 kW AT 540 r.p.m.
- ONE PIECE CAST IRON CASE MAX STRENGTH PRECISE POSITIONING OF INTERNAL COMPONENTS.
- INNER AND OUTER DIPPING AND OVEN DRYING AT HIGH TEMPERATURE. CORROSION RESISTANCE TO ASTM B 117-79. CAPABLE OF WORKING UP TO 125°C (260°F) WITH SAE 90 EP.
- GLEASON SYSTEM STRAIGHT BEVEL GEARS MADE FROM CARBURIZED AND HARDENED STEEL.
- CARBURIZED AND HARDENED OR HARDENED AND TEMPERED SHAFTS.
- SEAL RINGS WITH ANTIDUST LIP.
- QUALITY BEARINGS FOR HIGH RELIABILITY (L₁₀)

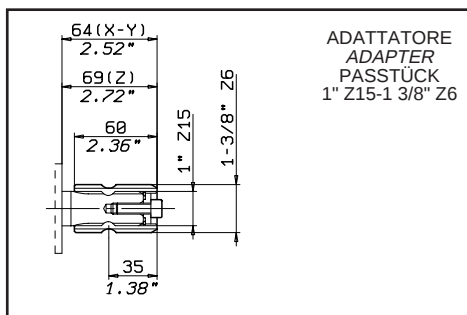
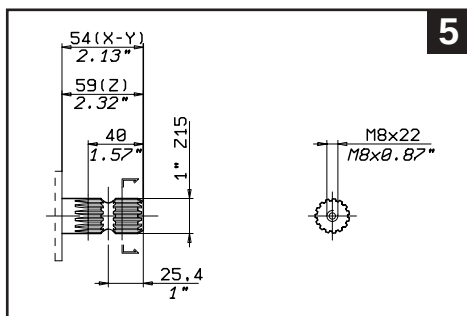
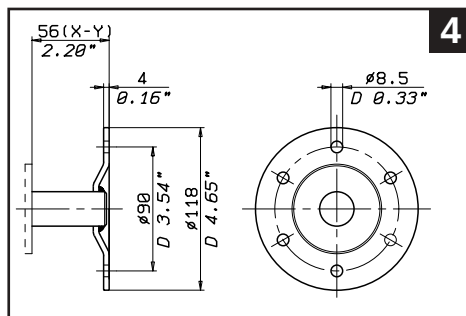
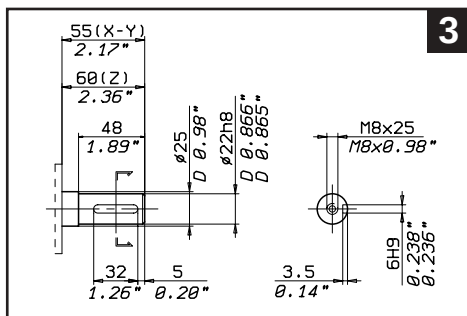
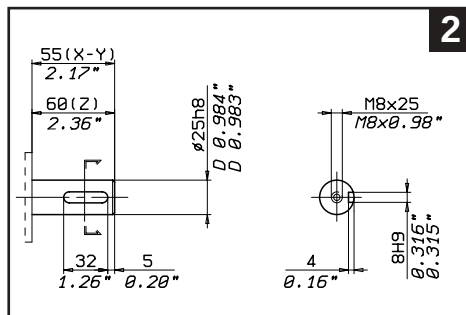
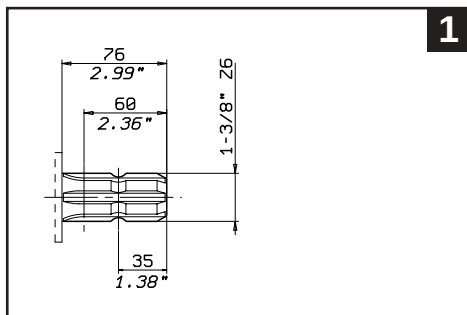
- GETIEBE FÜR VIELFÄLTIGE ANWENDUNGEN
- ÜBERSETZUNGSVERHÄLTNISSE VON 1:1 BIS 2,78 AUCH ALS UNTERSETZUNG.
- LEISTUNGSBEREICH BIS 200 kW BEI 540 U/min.
- GUß-GETRIEBEGEHÄUSE IN EINEM STÜCK.
- GEHÄUSE TAUCHGRUNDIERT, IM EINBRENNVERFAHREN GETROCKNET. KORROSIONSBESTÄNDIG GEMÄß NORM ASTM B 117-79. HITZEBESTÄNDIG BEI SAE 90 EP-ÖL BIS 125°C (260°F)
- KEGELRÄDER, GERADEVERZAHNT UND EINSATZGEHÄRTET.
- WELLEN AUS EINSATZGEHÄRTETEM ODER VERGÜTETEM STAHL.
- WELLENDICHTRINGE MIT STAUBSCHUTZLIPPE.
- QUALITÄTS-WÄLZLAGER FÜR HÖCHSTE ZUVERLÄSSIGKEIT (L₁₀)

POTENZA a 540 giri/min. - POWER at 540 r.p.m. - LEISTUNG bei 540 U/min.

		2018		2020		2030		2050		2070		2100		2125		2155		2200	
		kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS	kW	[CV]hp-PS
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGSGETRIEBE	1:2,78	7	10	9	12														
	1:2,56							21	29										
	1:2,42															107	145		
	1:2,30											44	60	61	83				
	1:1,93													76	103	121	165		
	1:1,90	11	15	14	19			29	40	43	58	51	70	70					
	1:1,82					21	28												
	1:1,57											67	91						
	1:1,53															125	170		
	1:1,50									60	82					125	170	202	275
	1:1,47													98	133				
RIDUTTORE SPEED REDUCER UNTERSETZUNGSGETRIEBE	1:1,46			18	24	26	35	37	50										
	1:1,35	15	20	19	26					60	82	77	105	101	138				
	1:1,25															126	172		
	1:1	15	20	22	30	31	42	49	66	66	90	81	110	100	137	121	165	176	240
	1:25:1															111	151		
	1:35:1	12	16	16	22					48	65	62	85	81	110				
	1:46:1			14	19	20	27	28	38										
	1:47:1													75	102				
	1:50:1									44	60					97	132	147	200
	1:53:1															97	132		
	1:57:1											49	66						
	1:82:1					13	18												
	1:90:1	7	10	9	12			18	25	26	35	33	45			81	110		
	1:93:1													48	65				
	2:30:1											26	35	34	46				
	2:42:1															59	80		
	2:56:1							10	14										
	2:78:1	4	5	4	6														



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	in·lb M	N·m	in·lb	giri/min. r.p.m U/min.	INGRESSO-INPUT-EINGANG	
										Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,78	540	7	10	130	1151	47	414	1501	-	278
		1000	11	15	105	933	38	336	2780		
	1:1,90	540	11	15	195	1727	103	909	1026	053	190
		1000	17	23	162	1430	85	753	1900		
	1:1,35	540	15	20	260	2303	193	1706	729	074	135
		1000	23	31	218	1928	161	1428	1350		
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1:1	540	15	20	260	2303	260	2303	540	100	100
		1000	23	31	218	1928	218	1928	1000		
	1,35:1	540	12	16	208	1842	281	2487	400	135	074
		1000	18	25	176	1554	237	2099	741		
	1,90:1	540	7	10	130	1151	247	2188	284	190	053
		1000	11	15	105	933	200	1772	526		
2,78:1	540	4	5	65	576	181	1601	194	278	-	
	1000	6	8	56	497	156	1383	360			



Albero 1 3/8" Z6 non realizzabile di pezzo:

- contemporaneamente sugli assi X e Y.
- sull'asse Z per S2018190 e S2018278.
- sull'asse X e sull'asse Y per S2018053.

Nei suddetti casi richiedere l'albero 1" Z15 tipo 5 e l'adattatore speciale raffigurato a fianco.

1 3/8" Z6 shaft not available in one piece:

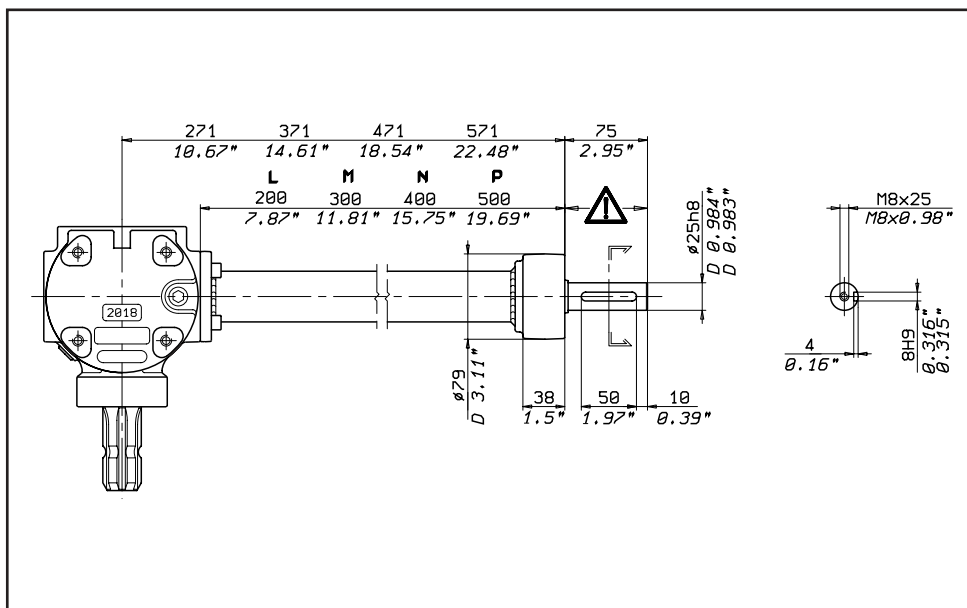
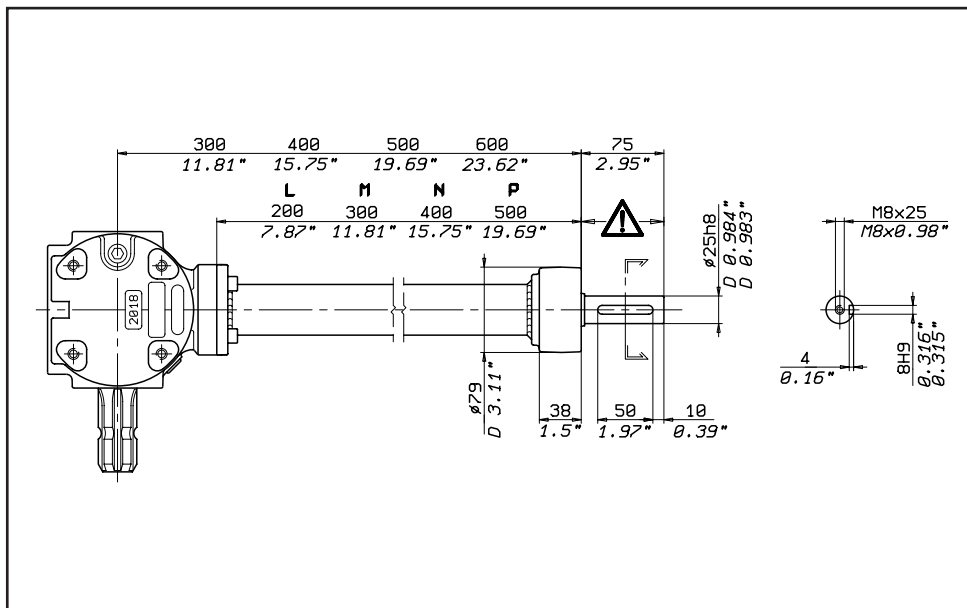
- on both axes X and Y at the same time.
- on axis Z for S2018190 and S2018278.
- on both axes X and Y for S2018053.

The above cases require shaft 1" Z15 type 5 together with the special adapter illustrated opposite.

Welle 1 3/8" Z6 nicht in einem Stück herstellbar:

- gleichzeitig auf den X- und Y-Achsen.
- auf der Z-Achse für S2018190 und S2018278.
- auf der X und Y Achse für S2018053.

In den o.a. Fällen, die Welle 1" Z15 typ 5 und den speziellen daneben abgebildeten Spezialadapter anfragen.

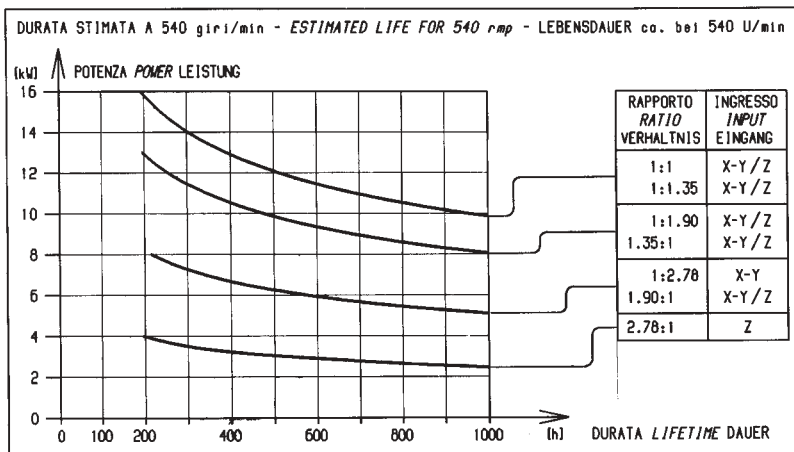


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,4 L
PESO INDICATIVO SCATOLA 8 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 15 ozs
APPROXIMATE WEIGHT 18 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,4 L
GETRIEBEGEWICHT CA. 8 kg

2018



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.62
800	2.47
900	3.24
1000	4.13

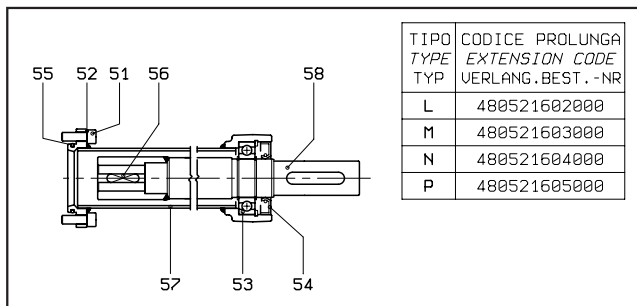
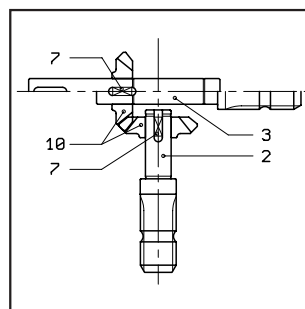
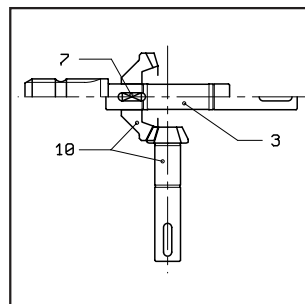
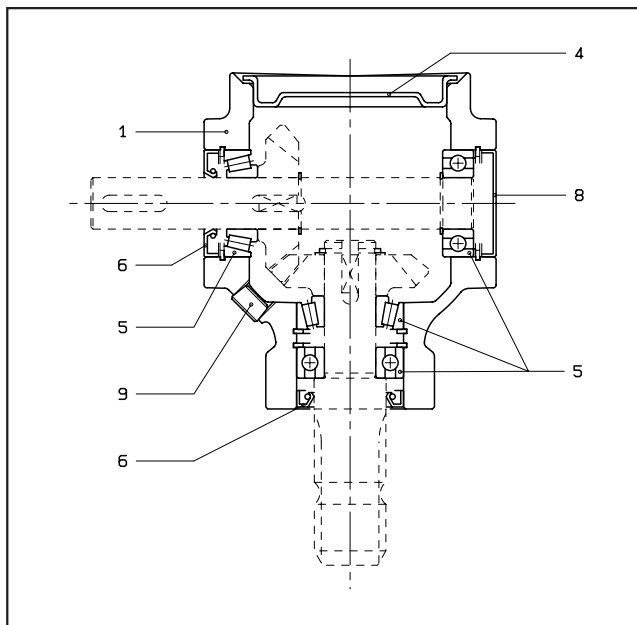
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

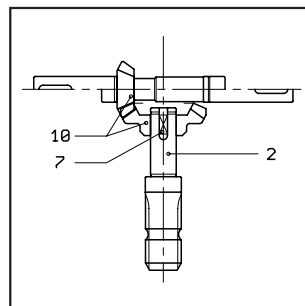
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS - GEWINDE S (ISO) - G (UNC)	2	0	1	8							
TIPO - TYPE - TYP 1018											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 278 - 190 - 135 - 100 - 074 - 053											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1,2,3,4,5 (TIPO DI ALBERO - SHAFT - WELLENTYP) L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)	ASSE Z - Z AXIS - WELLE Z				ASSE X - X AXIS - WELLE X						
					ASSE Y - Y AXIS - WELLE Y						



TIPO TYPE TYP	CODICE PROLUNGA EXTENSION CODE VERLANG. BEST.-NR
L	480521602000
M	480521603000
N	480521604000
P	480521605000



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290220002
	UNC	290220003
2		*
3		*
4		298609400
5		
6	6205	354101025
	30205	354403025

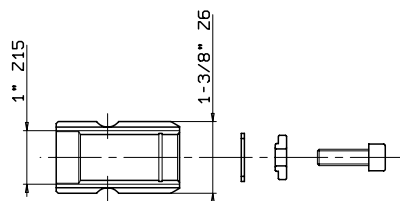
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
7	25x52x7	355012025
	35x52x7	355025035
8	B 8x7x18	370004000
9	52x7	372001000
10	3/8" GAS	373010000
11		*

**PROLUNGA
EXTENSION - VERLÄNGERUNG**

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
51		303002400
52		336008001
53	6206	354101030
54	30x62x10	355003030
55		358024000
56	A 8x7x32	370000002
57	L	580526202
	M	580526201
	N	580526203
	P	580526204
58	L	581161604
	M	581161603
	N	581161605
	P	581161606

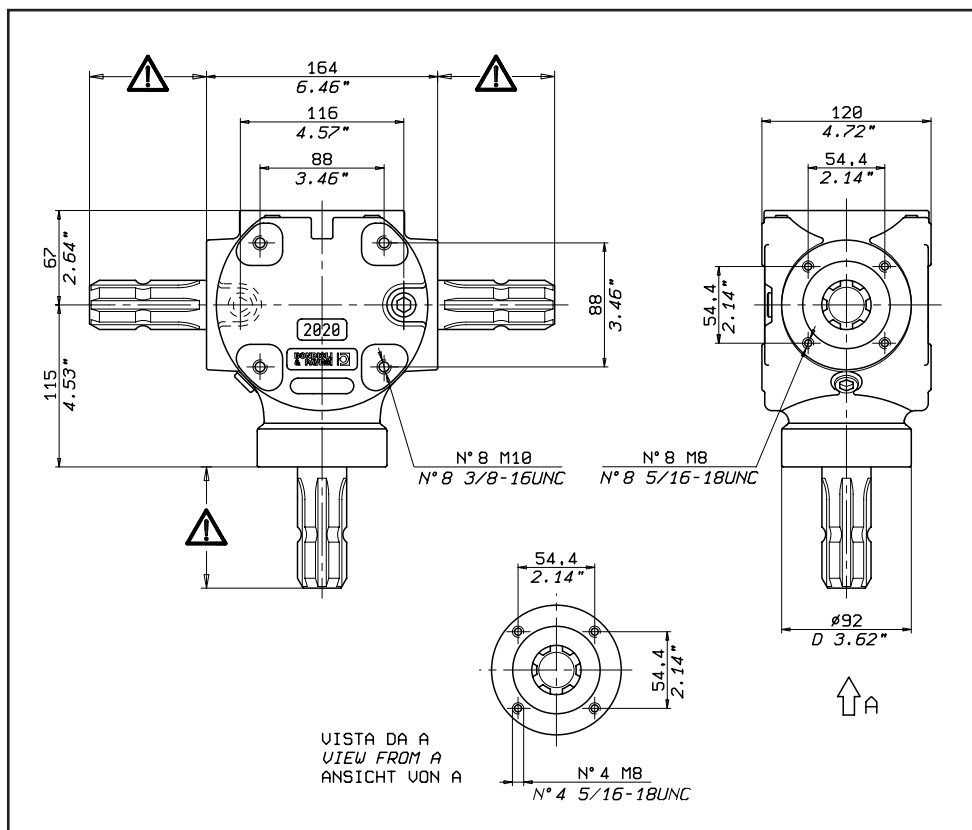
* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

2018



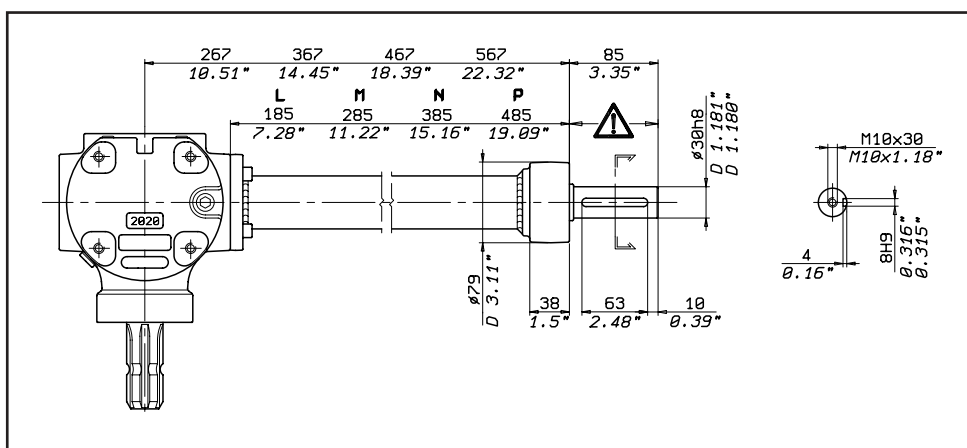
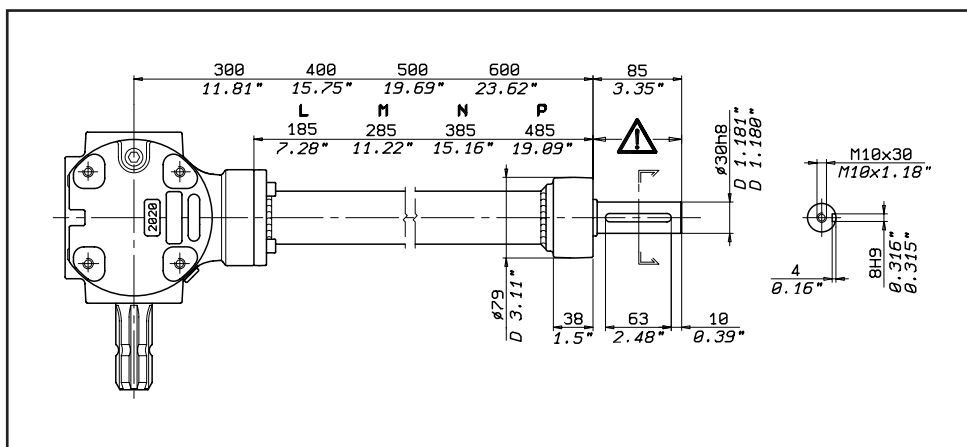
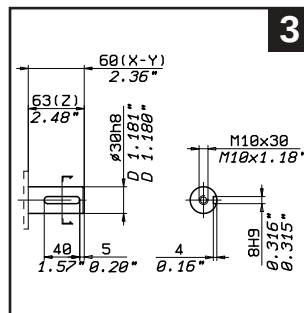
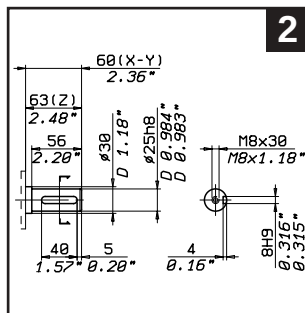
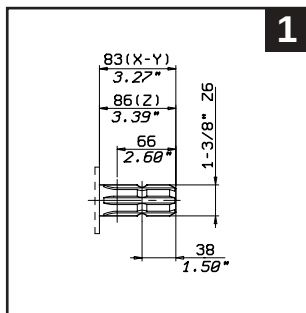
KIT 490101500001R

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 11 REF. 11 BEZ. 11
2018053F102	295036127		448053409R
2018053F303	295606108		448053412R
2018053G122	295036127		448053414R
2018053G333	295606108		448053410R
2018053R120	295036127		448053413R
2018074F202	295616133	295616187	448135301R
2018074G122	295036127		448135301R
2018100F101	295036127	295036134	448100404R
2018100F202	295616133	295616136	448100404R
2018100G122	295036127	295616187	448100404R
2018100G222	295616133	295616187	448100404R
2018100R110	295036127	295036132	448100404R
2018100R120	295036127	295616134	448100404R
2018100R130	295036127	295606107	448100404R
2018100R140	295036127	295619826	448100404R
2018100R220	295616133	295616134	448100404R
2018135F202	295616133	295616136	448135301R
2018135G122	295036127	295616187	448135301R
2018190F201		295036134	448190403R
2018190F202		295616136	448190403R
2018190G222		295616187	448190403R
2018190R210		295036132	448190403R
2018190R310		295036132	448190402R
2018278F201		295036134	448278300R
2018278F202		295616180	448278300R
2018278F301		295036134	448278302R
2018278G222		295616187	448278300R
2018278R210		295036132	448278300R
2018278R310		295036132	448278302R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m U/min.	kW	P CV·hp·PS	N·m	M	in·lb	N·m	in·lb	giri/min. r.p.m U/min.	INGRESSO-INPUT-EINGANG Z X-Y	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,78	540	9	12	156	1382	56	497	1501	-	278	
		1000	14	19	133	1181	48	425	2780			
	1:1,90	540	14	19	247	2188	130	1151	1026	053	190	
		1000	21	29	204	1803	107	949	1900			
	1:1,46	540	18	24	312	2764	214	1893	788	068	146	
		1000	27	37	260	2301	178	1576	1460			
	1:1,35	540	19	26	338	2994	251	2218	729	074	135	
		1000	29	40	281	2487	208	1842	1350			
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1	540	22	30	390	3454	390	3454	540	100	100	
		1000	34	46	323	2860	323	2860	1000			
	1,35:1	540	16	22	286	2533	386	3420	400	135	074	
		1000	25	34	239	2114	322	2854	741			
	1,46:1	540	14	19	247	2188	361	3194	370	146	068	
		1000	21	29	204	1803	297	2633	685			
	1,90:1	540	9	12	156	1382	297	2625	284	190	053	
		1000	13	18	126	1119	240	2127	526			
2,78:1	540	4	6	78	691	217	1921	194	278	-		
	1000	7	9	63	560	176	1556	360				

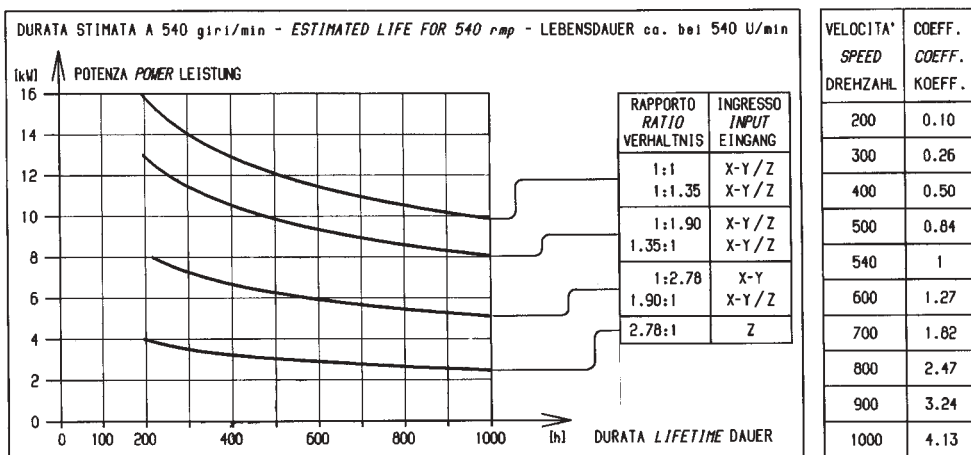
2020



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,6 L
PESO INDICATIVO SCATOLA 9 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 19 ozs
APPROXIMATE WEIGHT 20 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,6 L
GETRIEBEGEWICHT CA. 9 kg

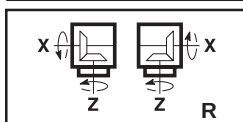
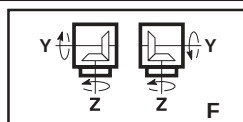
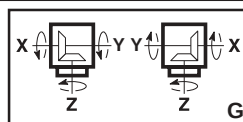


Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

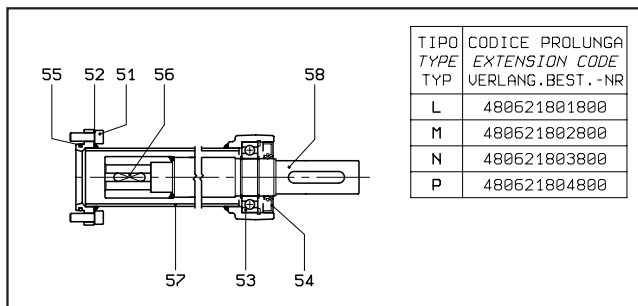
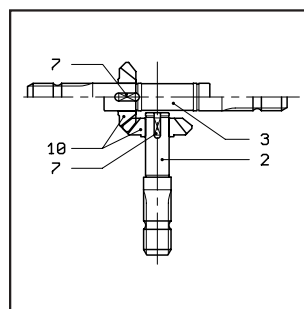
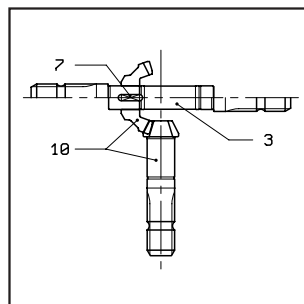
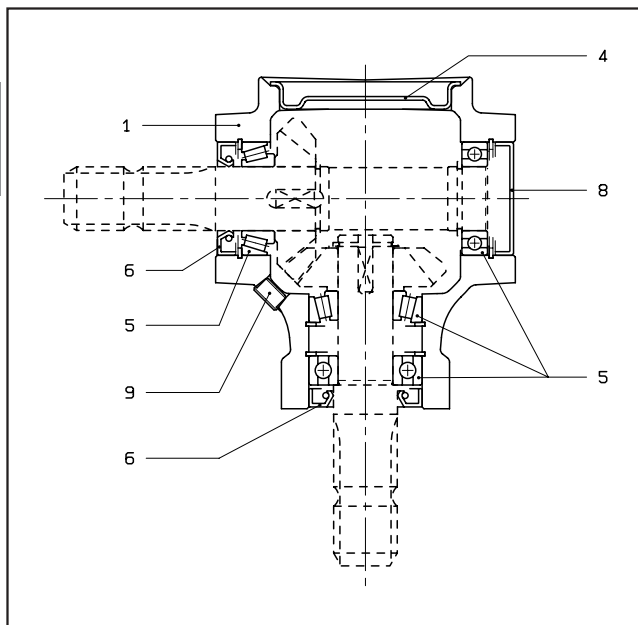
To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

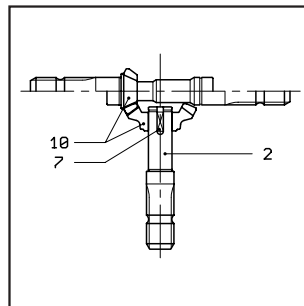
CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)	2	0	2	0							
TIPO - TYPE - TYP 2020											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 278 - 190 - 146 - 135 - 100 - 074 - 068 - 053											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
  											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1,2,3 (TIPO DI ALBERO - SHAFT - WELLENTYP) L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)					ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y						

RICAMBI SPARE PARTS ERSATZTEILE



TIPO TYPE TYP	CODICE PROLUNGA EXTENSION CODE VERLANG. BEST. -NR
L	480621801800
M	480621802800
N	480621803800
P	480621804800



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290220107
2	UNC	290220108
3		*
4		298609400
	6206	354101030
	6007	354107035
5	30206	354400030
	32007X	354404035
6	35x62x10	355004035
	30x62x10	355007030
7	B 8x7x22	370007000
	B 10x8x20	370022000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8	62x10	372004000
9	3/8" GAS	373010000
10		*

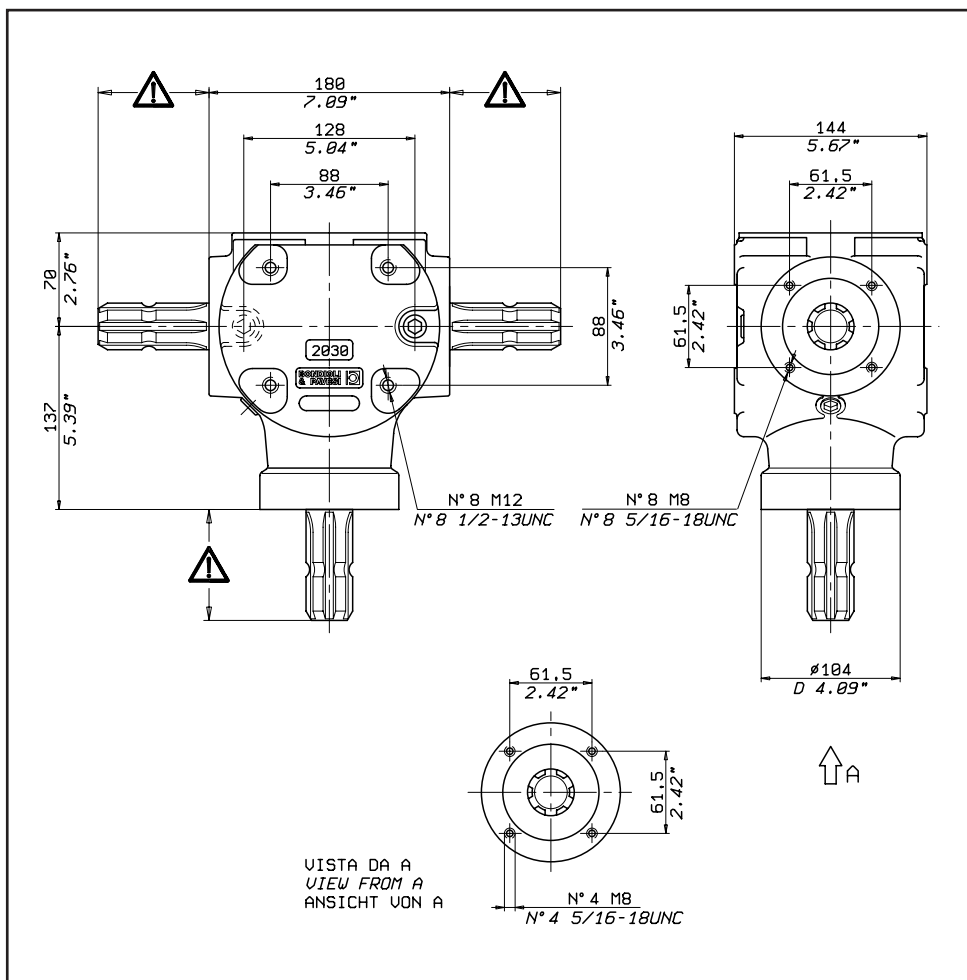
PROLUNGA EXTENSION - VERLÄNGERUNG

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
51		303002400
52		336008001
53	6207	354107035
54	35x62x10	355004035
55		358025000
56	A 8x7x40	370009000
	L	580626204
	M	580626203
57	N	580626209
	P	580626210
	L	581161803
	M	581161802
58	N	581161806
	P	581161805

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE
62

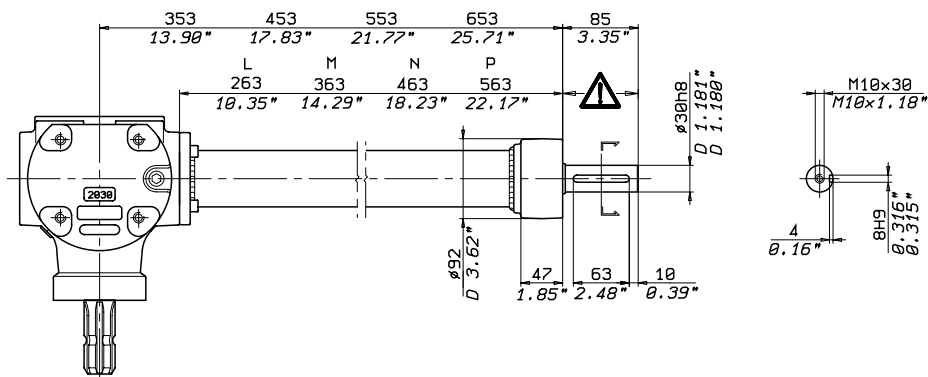
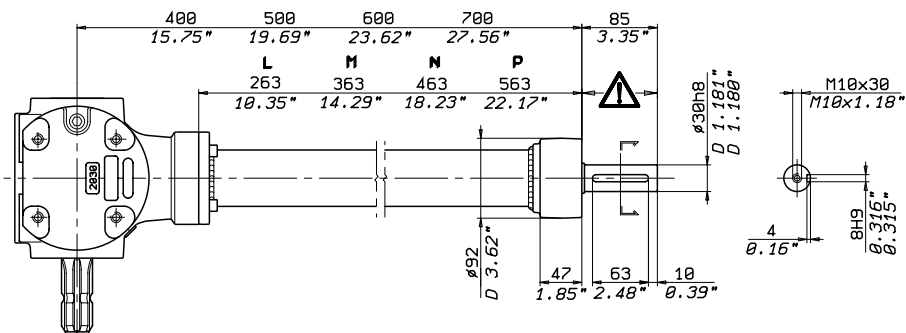
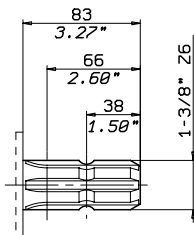
COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 11 REF. 11 BEZ. 11	COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 11 REF. 11 BEZ. 11
2020053F101	295036225		448053402R	2020135R330		295626211	448074300R
2020053F102	295036225		448053407R				
2020053F103	295036225		448053404R	2020146F101	295036222	448146400R	
2020053F201	295616211		448053402R	2020146F102	295616210	448146400R	
2020053F301	295626214		448053402R	2020146F103	295626212	448146400R	
2020053G111	295036225		448053400R	2020146F301	295036222	448146401R	
2020053G113	295036225		448053401R	2020146F303	295626212	448146401R	
2020053G122	295036225		448053406R	2020146G111	295030331	448146403R	
2020053G133	295036225		448053403R	2020146G122	295616151	448146400R	
2020053G333	295626214		448053403R	2020146G133	295626213	448146400R	
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2020053R130	295036225		448053405R	2020146GL11	295030331	448146406R	
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2020068F102	295036225		448068401R	2020146R310	295036221	448146401R	
2020068F103	295036225		448068406R	2020146R330	295626211	448146401R	
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2020074G333	295626214	295626213	448074300R	2020190G122	295616151	448190413R	
2020074R130	295036225	295626211	448074300R	2020190G133	295626213	448190413R	
2020074R310	295626214	295036202	448074300R	2020190G222	295616151	448190414R	
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2020100G222	295616211	295616151	448100505R	2020278F101	295036222	448278310R	
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2020100R330	295626214	295626211	448100505R	2020278G222	295616151	448278311R	
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2020135F103	295036225	295626212	448074300R	2020278G331	295036224	448278312R	
2020135F201	295616211	295036222	448074300R	2020278G333	295626213	448278312R	
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2030



IMPIEGHO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	P kW	CV·Hp·PS	N·m	in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,82	540	21	28	364	3224	200	1771	983	055	182
		1000	32	44	309	2736	170	1503	1820		
	1:1,46	540	26	35	455	4030	312	2760	788	068	146
		1000	38	52	365	3233	250	2215	1460		
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1:1	540	31	42	546	4836	546	4836	540	100	100
		1000	48	65	457	4042	457	4042	1000		
	1,46:1	540	20	27	351	3109	513	4539	370	146	068
		1000	29	40	281	2487	410	3631	685		
	1,82:1	540	13	18	234	2073	426	3772	297	182	055
		1000	21	29	204	1803	371	3282	549		

1

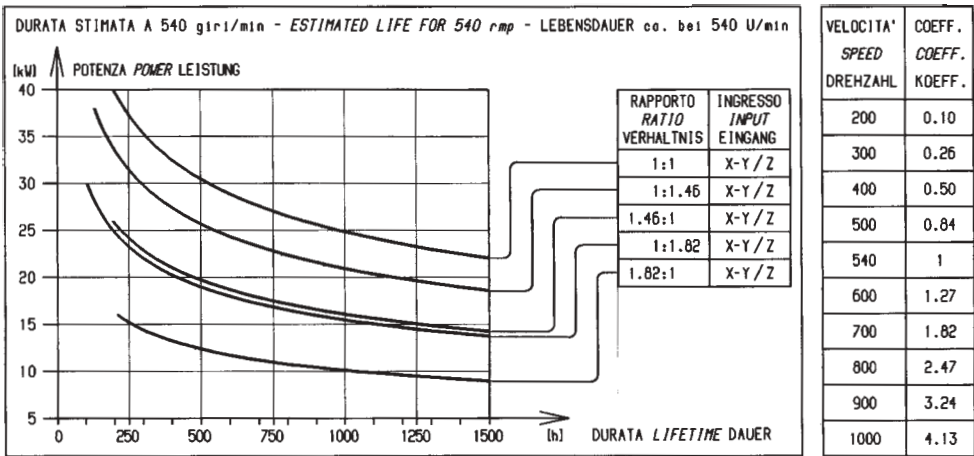


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,8 L
PESO INDICATIVO SCATOLA 14 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 27 ozs
APPROXIMATE WEIGHT 31 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,8 L
GETRIEBEGEWICHT CA. 14 kg

2030



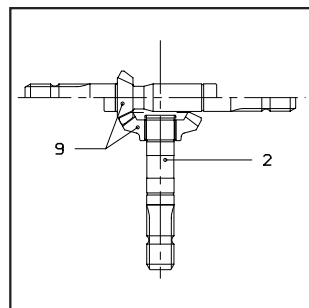
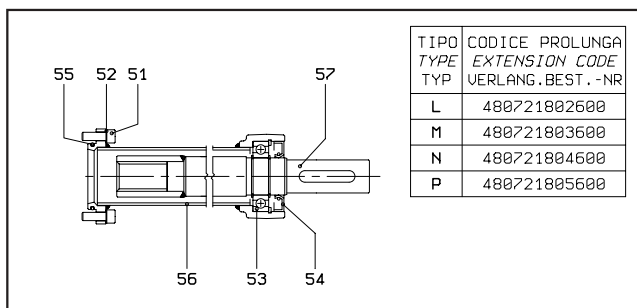
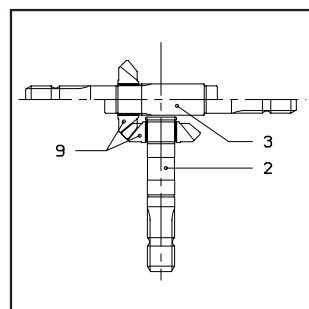
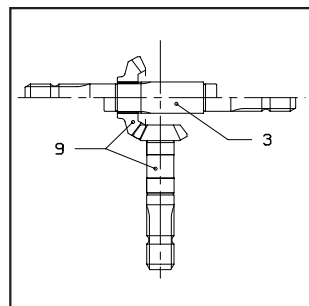
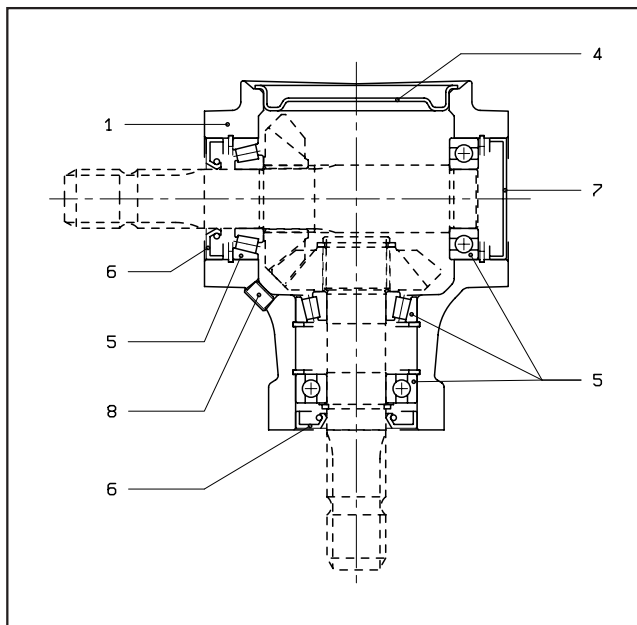
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEWINDE S (ISO) - G (UNC)	2	0	3	0							
TIPO - TYPE - TYP 2030											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 182 - 146 - 100 - 068 - 055											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP) L, M, N, P (PROLUNGA - EXTENSION - VERLÄNGERUNG)					ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y						



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE
BEZ.	BESCHREIBUNG	BEST.-NR
1	ISO	290230022
2	UNC	290230023
3		*
4		298611000
5	6207	354101035
6	30207	354401035
7	35x72x10	355016035
8	72x10	372003000
9	3/8" GAS	373010000
		*

RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE
BEZ.	BESCHREIBUNG	BEST.-NR
9	62x10	372004000
10	3/8" GAS	373010000
11		*

**PROLUNGA
EXTENSION - VERLÄNGERUNG**

RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE
BEZ.	BESCHREIBUNG	BEST.-NR
51		303002400
52		336008001
53	6207	354101035
54	35x72x10	355016035
55		358026000
56	L	580727202
	M	580727204
	N	580727205
	P	580727217
57	L	581021800
	M	581021801
	N	581021802
	P	581021813

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

2030

COD. SCATOLA
GEAR BOX CODE
GETRIEBE
BESTELL.-NR

RIF. 2
REF. 2
BEZ. 2

RIF. 3
REF. 3
BEZ. 3

RIF. 9
REF. 9
BEZ. 9

2030055F101
2030055G111
2030055R110

295034051
295034051
295034051

295034903
295030326
295034902

448055501R
448055502R
448055500R

2030068F101
2030068G111
2030068R110

295034051
295034051
295034051

295034903
295030326
295034902

448068501R
448068502R
448068500R

2030100F101
2030100G111
2030100R110

295034051
295034051
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295034903
295030326
295034902
295034902

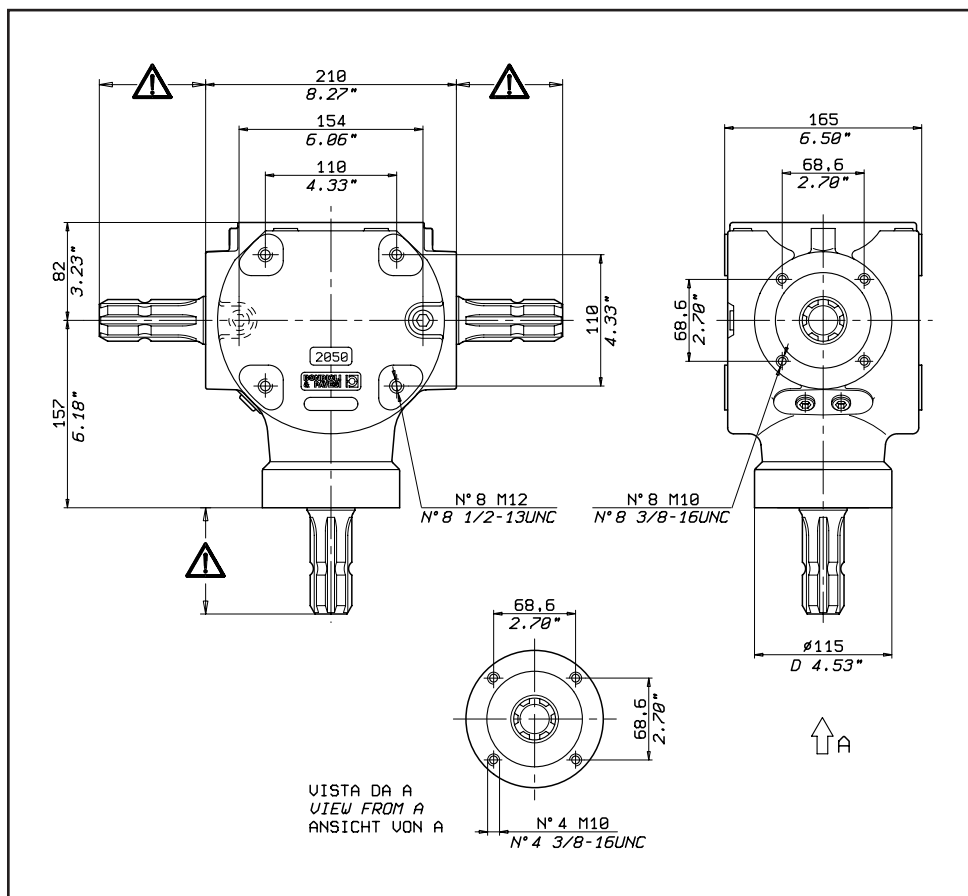
448100500R
448100500R
448100500R

2030146F101
2030146G111
2030146R110

448146500R
448146500R
448146500R

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2030182G111
2030182R110
2030182RL10

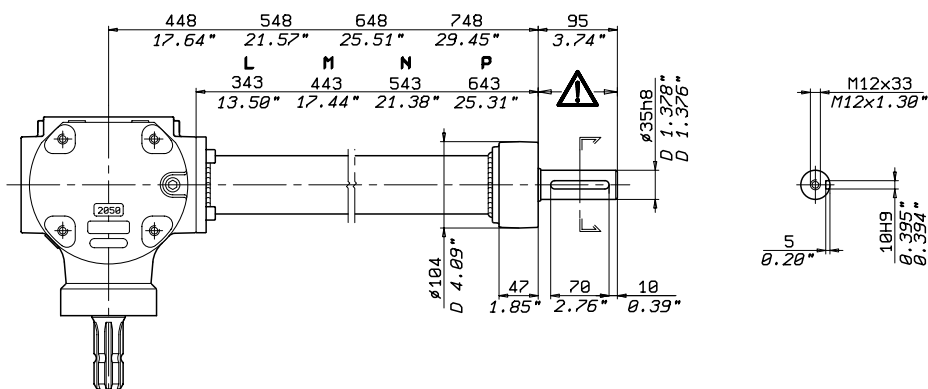
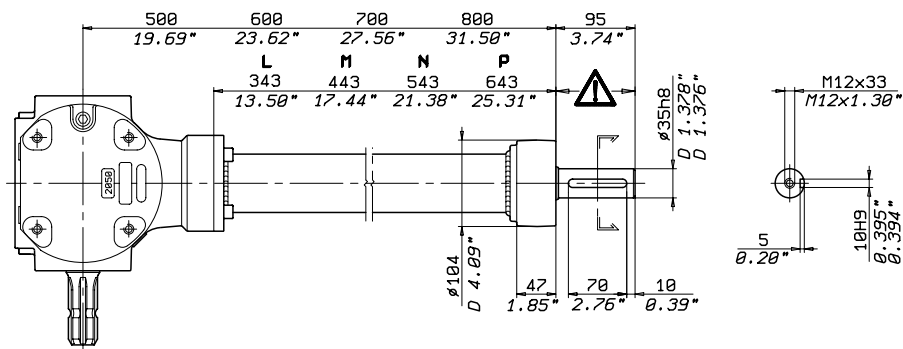
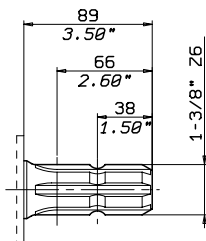
448182500R
448182500R
448182500R
448182500R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,56	540	21	29	377	3339	147	1304	1382	-	256
		1000	33	45	316	2798	124	1093	2560		
	1:1,91	540	29	40	520	4606	272	2411	1031	053	191
		1000	46	62	436	3855	228	2018	1910		
	1:1,46	540	37	50	651	5757	446	3943	788	068	146
		1000	57	77	541	4788	371	3279	1460		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1	540	49	66	859	7600	859	7600	540	100	100
		1000	75	102	717	6342	717	6342	1000		
	1,46:1	540	28	38	494	4376	722	6388	370	146	068
		1000	43	58	408	3606	595	5265	685		
	1,91:1	540	18	25	325	2879	621	5498	283	191	053
		1000	28	38	267	2363	510	4513	524		
	2,56:1	540	10	14	182	1612	466	4127	211	256	-
		1000	16	22	155	1368	396	3602	391		

2050

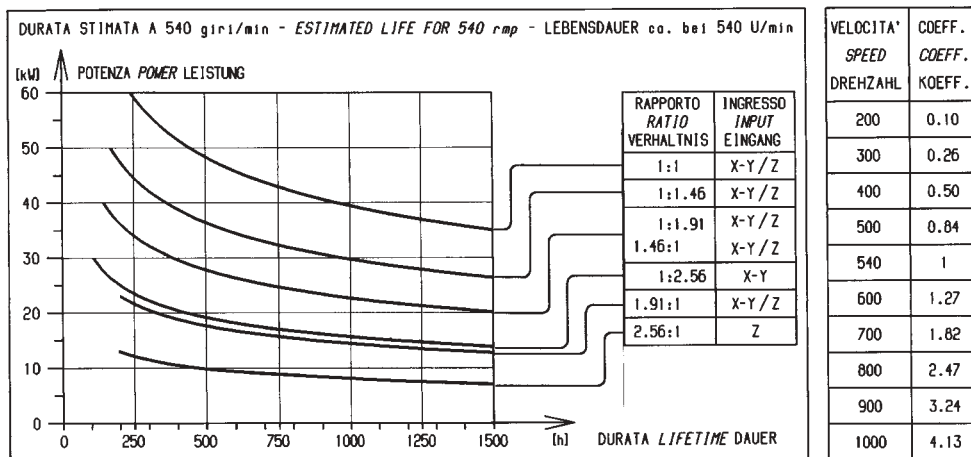
1



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,95 L
PESO INDICATIVO SCATOLA 20 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 32 ozs
APPROXIMATE WEIGHT 44 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,95 L
GETRIEBEGEWICHT CA. 20 kg



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

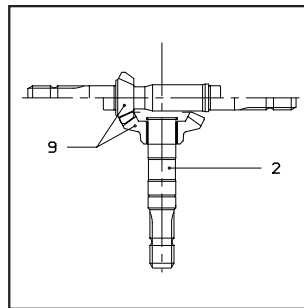
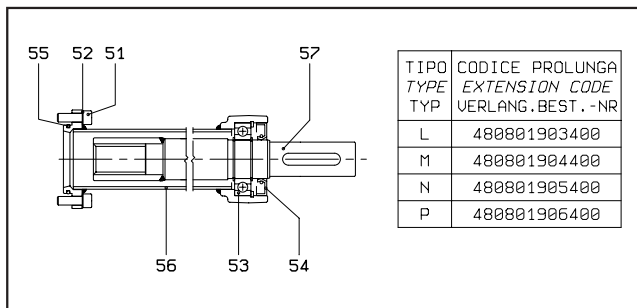
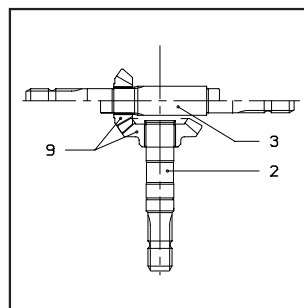
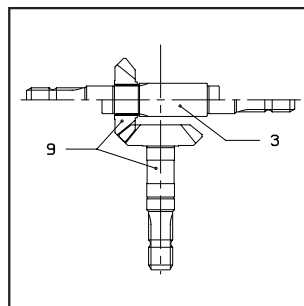
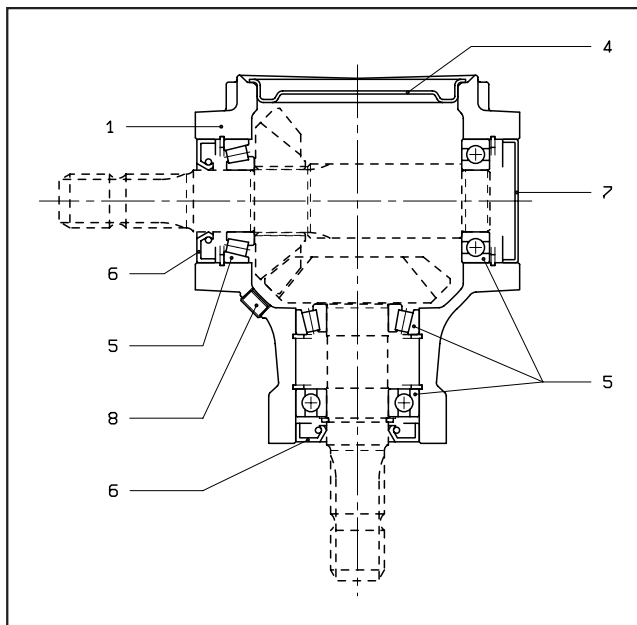
To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)	2	0	5	0							
TIPO - TYPE - TYP 2050											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 256 - 191 - 146 - 100 - 068 - 053											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP) L, M, N, P (PROLUNGA - EXTENSION - VERLÄNGERUNG)	ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y										

RICAMBI **SPARE PARTS** **ERSATZTEILE**



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*
2		*
3		*
4		298613001
		354101040
5	6208	354102035
	6307	354401040
	30307	354408035
6	40x80x10	355008040
	35x80x10	355029035
7	80x10	372005000
8	3/8" GAS	373010000
9		*

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

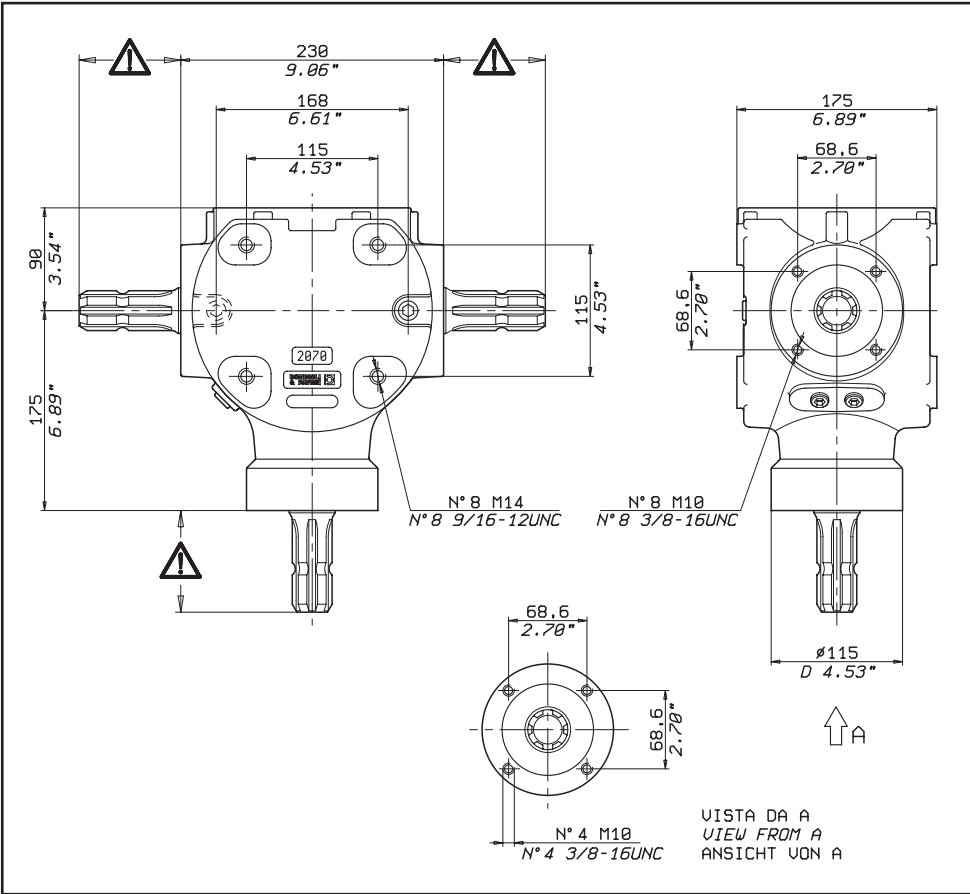
PROLUNGA EXTENSION - VERLÄNGERUNG

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
51		303004400
52		336010001
53	6207	354101040
54	35x72x10	355001040
55		358027000
	L	580808006
56	M	580808001
	N	580808002
	P	580808021
	L	581021901
57	M	581021908
	N	581021900
	P	581021909

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

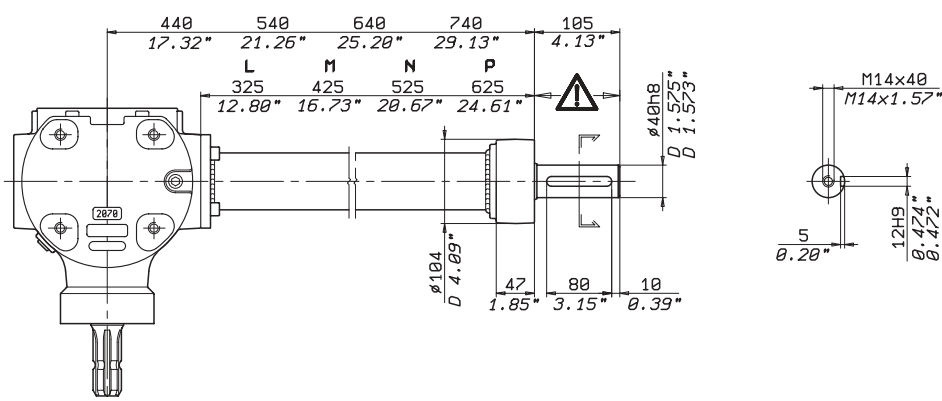
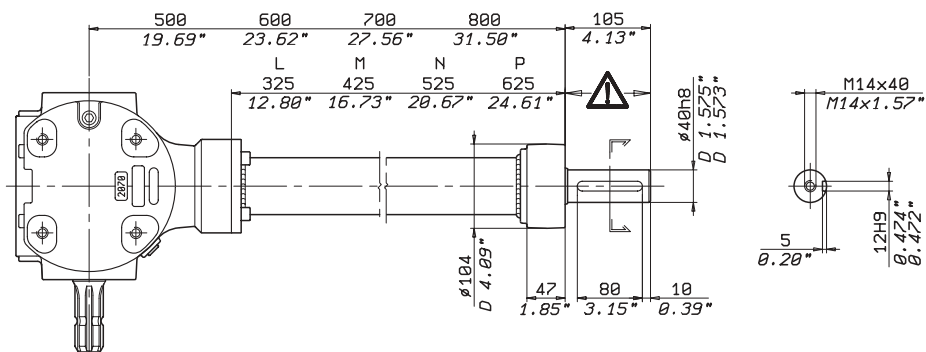
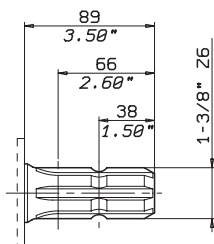
COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 1 ISO REF. 1 ISO BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 9 REF. 9 BEZ. 9
2050053F101	290250021	290250023	295034023		448053501R
2050053G111	290250021	290250023	295034023		448053502R
2050053R110	290250021	290250023	295034023		448053500R
2050068F101	290250021	290250023	295034023	295034028	448068600R
2050068FL01	290250021	290250023	295034023	295034028	448068600R
2050068G111	290250021	290250023	295034023	295030306	448068600R
2050068R110	290250021	290250023	295034023	295034027	448068600R
2050100F101	290250020	290250022		295034008	448100707R
2050100FL01	290250020	290250022		295034008	448100707R
2050100G111	290250020	290250022		295034007	448100707R
2050100GN11	290250020	290250022		295034007	448100707R
2050100R110	290250020	290250022		295034009	448100707R
2050146F101	290250020	290250022		295034008	448146600R
2050146G111	290250020	290250022		295034007	448146600R
2050146R110	290250020	290250022		295034009	448146600R
2050191F101	290250020	290250022		295034008	448191500R
2050191FL01	290250020	290250022		295034008	448191500R
2050191G111	290250020	290250022		295034007	448191500R
2050191R110	290250020	290250022		295034009	448191500R
2050191R1P0	290250020	290250022		295034009	448191500R
2050191RL10	290250020	290250022		295034009	448191500R
2050191RN10	290250020	290250022		295034009	448191500R
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2050256F101	290250020	290250022		295034008	448256500R
2050256G111	290250020	290250022		295034007	448256500R
2050256R110	290250020	290250022		295034009	448256500R
2050256RM10	290250020	290250022		295034009	448256500R

2070



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	M N·m	in·lb	N·m	in·lb	giri/min. r.p.m U/min.	Z	X-Y
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,92	540	43	58	755	6679	393	3478	1037	052	192
		1000	66	90	632	5596	329	2915	1920		
	1:1,50	540	60	82	1067	9442	711	6295	810	067	150
		1000	93	126	885	7835	590	5223	1500		
	1:1,35	540	60	82	1067	9442	790	6994	729	074	135
		1000	93	126	885	7835	656	5803	1350		
1:1	540	66	90	1171	10363	1171	10363	540	100	100	
	1000	99	135	948	8394	948	8394	1000			
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,35:1	540	48	65	846	7485	1142	10104	400	135	074
		1000	74	100	703	6218	948	8394	741		
	1,50:1	540	44	60	781	6909	1171	10363	360	150	067
		1000	68	92	646	5721	970	8581	667		
	1,92:1	540	26	35	455	4030	874	7738	281	192	052
		1000	40	54	379	3358	728	6447	521		

1

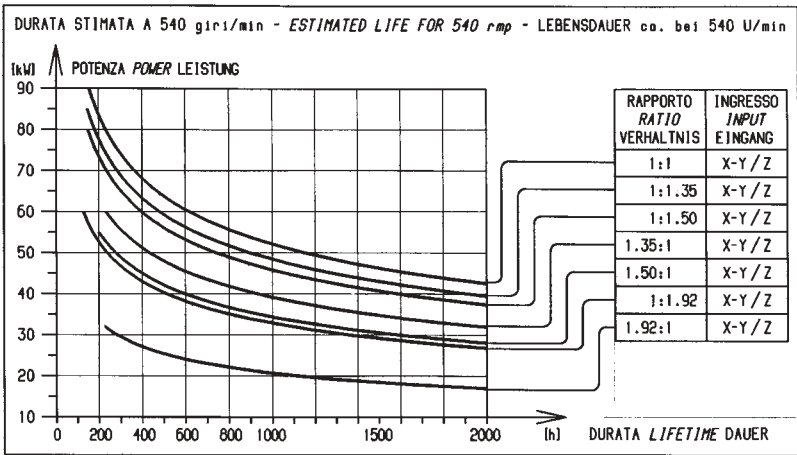


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,2 L
PESO INDICATIVO SCATOLA 25 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 40 ozs
APPROXIMATE WEIGHT 55 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,2 L
GETRIEBEGEWICHT CA. 25 kg

2070



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE
THREADS-GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
2070

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
192 - 150 - 135 - 100 - 074 - 067 - 052

MONTAGGIO - ARRANGEMENT - MONTAGEART

X

Z

X

Z

R

Y

Z

Y

Z

F

X

Z

Y

Z

Y

Z

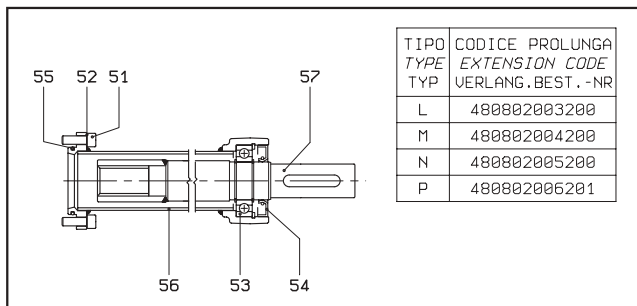
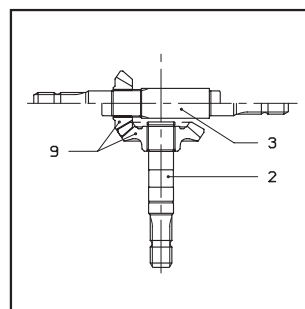
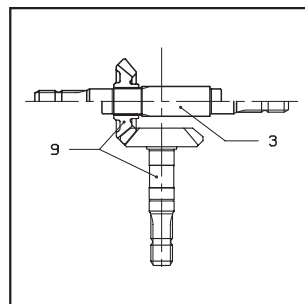
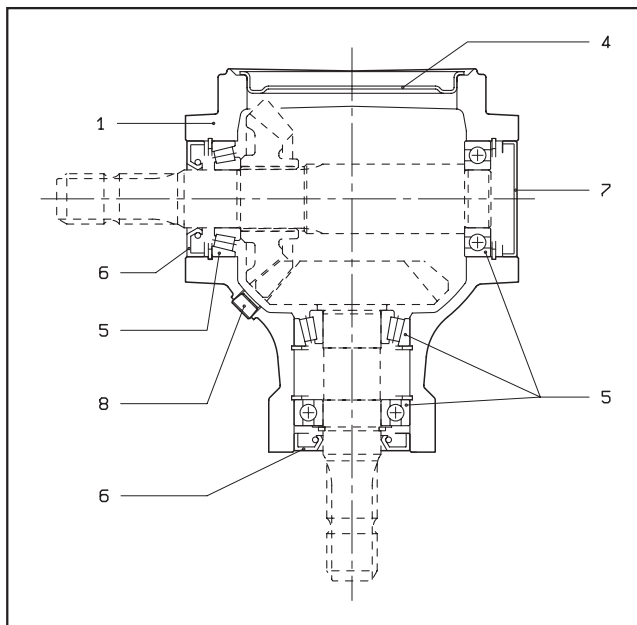
X

Z

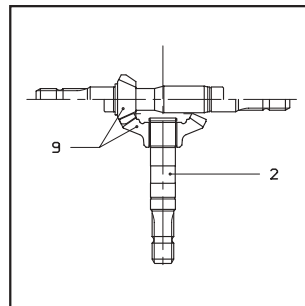
G

0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE)
1 (TIPO DI ALBERO - SHAFT - WELLENTYP)
L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)

ASSE Z - Z AXIS - WELLE Z
ASSE X - X AXIS - WELLE X
ASSE Y - Y AXIS - WELLE Y



TIPO TYPE TYP	CODICE PROLUNGA EXTENSION CODE VERLÄNG. BEST.-NR
L	480802003200
M	480802004200
N	480802005200
P	480802006201



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290270018
	UNC	290270019
2		*
3		*
4		298614500
	6208	354101040
5	30308	354401040
	32208	354403040
6	40x80x10	355008040
7	80x10	372005000
8	80x10	373010000
9	3/8" GAS	*

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

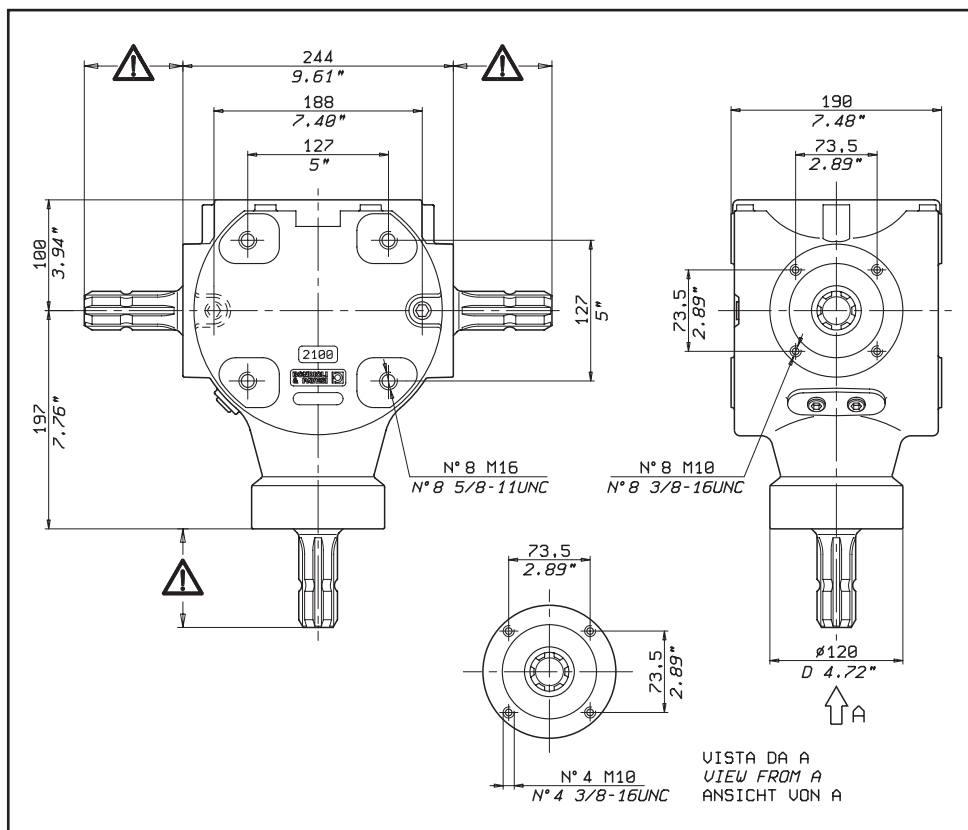
**PROLUNGA
EXTENSION - VERLÄNGERUNG**

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
51		303004400
52		336010001
53	6209	354100045
54	45x85x10	355030045
55		358027000
	L	580808503
56	M	580808529
	N	580808515
	P	580808511
	L	581022007
57	M	581022058
	N	581022022
	P	581022018

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

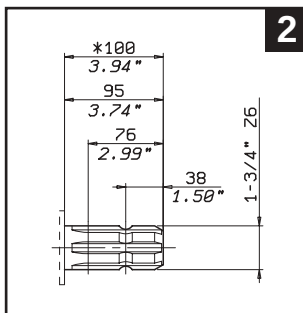
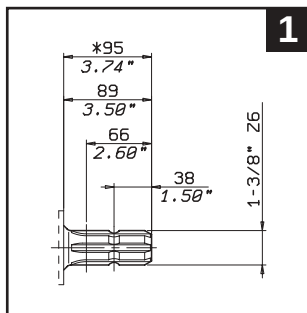
2070

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 9 REF. 9 BEZ. 9
2070052F101 2070052G111 2070052R110	295034030 295034030 295034030		448052605R 448052606R 448052604R
2070067F101 2070067G111 2070067R110	295034030 295034030 295034030	295034019 295034020 295034018	448067600R 448067600R 448067600R
2070074G111	295034030	295034020	448135601R
2070100F101 2070100FP01 2070100G111 2070100R110		295034019 295034019 295034020 295034018	448100711R 448100711R 448100711R 448100711R
2070135F101 2070135G111 2070135R110	295034047 295034047 295034047	295034019 295034020 295034018	448135601R 448135601R 448135601R
2070150F101 2070150G111 2070150R110		295034019 295034020 295034018	448150605R 448150605R 448150605R
2070192F101 2070192G111 2070192R110 2070192RN10		295034019 295034020 295034018 295034018	448192607R 448192607R 448192607R 448192607R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,30	540	44	60	781	6909	339	3004	1242	-	230
		1000	68	92	646	5721	281	2487	2300		
	1:1,92	540	51	70	911	8060	474	4198	1037	052	192
		1000	79	108	759	6715	395	3498	1920		
	1:1,57	540	67	91	1184	10478	754	6674	848	064	157
		1000	103	140	984	8705	627	5545	1570		
	1:1,35	540	77	105	1366	12090	1012	8956	729	074	135
		1000	118	161	1131	10011	838	7415	1350		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1	540	81	110	1431	12666	1431	12666	540	100	100
		1000	125	170	1194	10570	1194	10570	1000		
	1,35:1	540	62	85	1106	9787	1493	13213	400	135	074
		1000	96	130	913	8083	1233	10912	741		
	1,57:1	540	49	66	859	7600	1348	11932	344	157	064
		1000	74	101	710	6280	1114	9860	637		
	1,92:1	540	33	45	585	5182	1124	9949	281	192	052
		1000	50	68	478	4228	917	8118	521		
	2,30:1	540	26	35	455	4030	1047	9269	235	230	-
		1000	40	54	379	3358	873	7723	435		

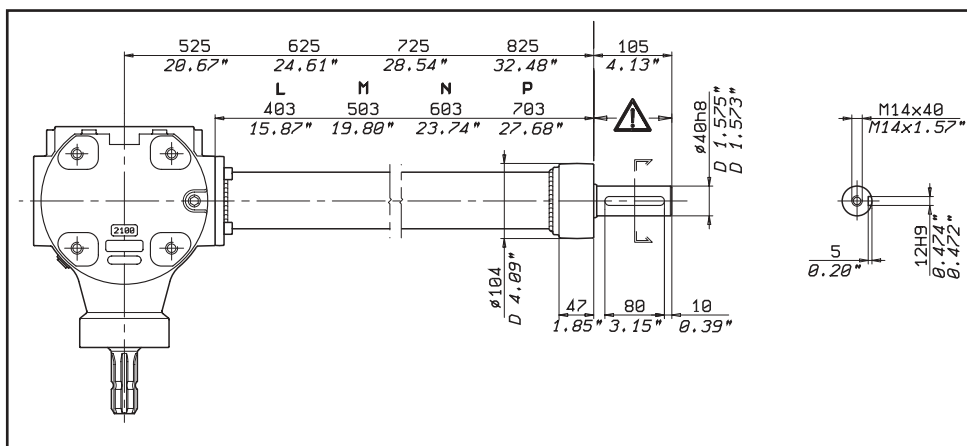
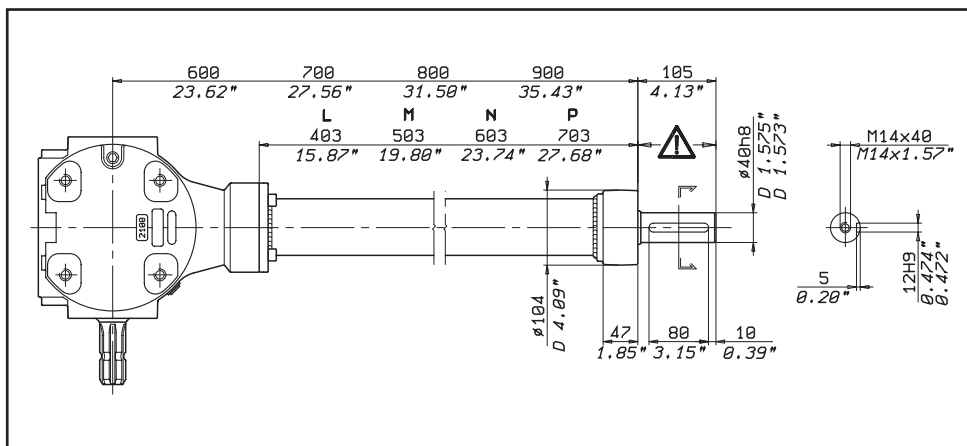
2100



* Le lunghezze di mm.95 e mm.100 sono eseguite solo su scatole tipo 2100 052.

* The lengths of mm.95 (3.74") of mm.100 (3.94") are available only on gearboxes type 2100 052.

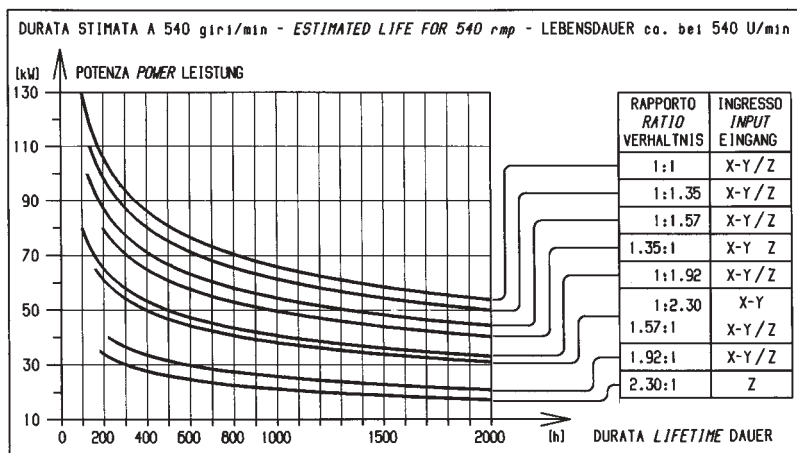
* Die Wellenlängen von 95 und 100 mm sind nur für die Getriebe 2100 052 ausführbar.



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,7 L
PESO INDICATIVO SCATOLA 30 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 57 ozs
APPROXIMATE WEIGHT 66 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,7 L
GETRIEBEGEWICHT CA. 30 kg



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

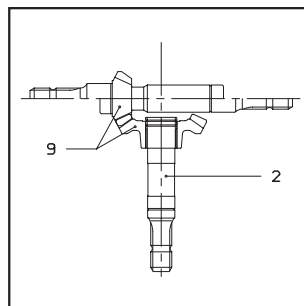
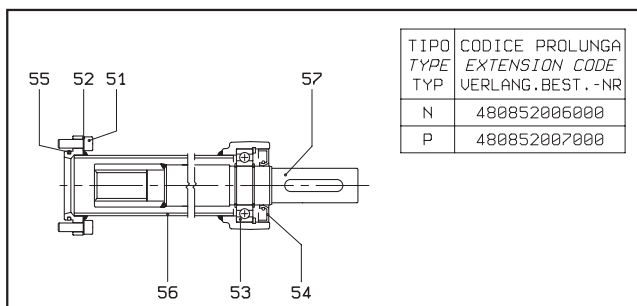
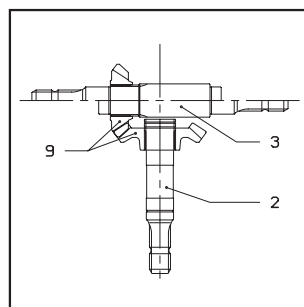
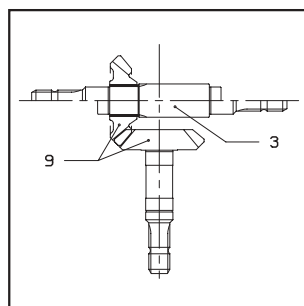
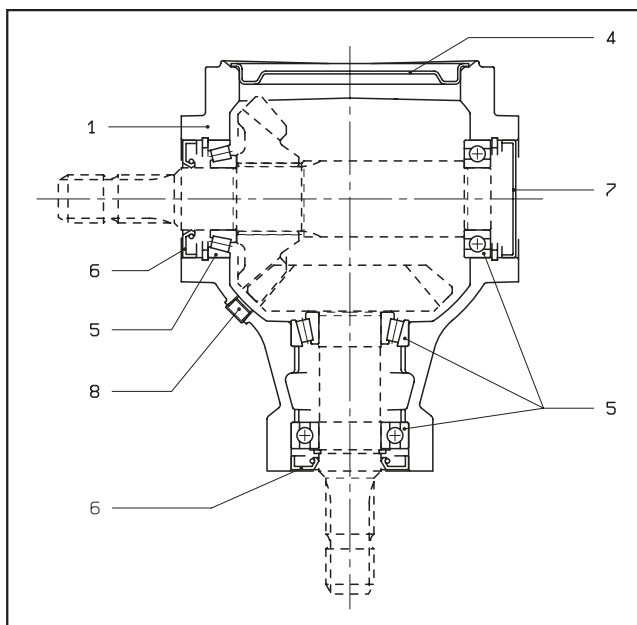
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)	2	1	0	0						
TIPO - TYPE - TYP 2100										
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 230 - 192 - 157 - 135 - 100 - 074 - 064 - 052										
MONTAGGIO - ARRANGEMENT - MONTAGEART										
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1, 2 (TIPO DI ALBERO - SHAFT - WELLENTYP) L, M, N, P (PROLUNGA - EXTENSION - VERLÄNGERUNG)										
ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y										

2100

**RICAMBI
SPARE PARTS
ERSATZTEILE**



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*
2		*
3		*
4		298616000
5	6209	354100045
	30309	354400045
	30210	354400050
	32209	354401045
6	45x85x10	355030045
	50x90x10	355020050
7	85x10	372006000
	90x10	372007000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8	3/8" GAS	373010000
9		*

PROLUNGA EXTENSION - VERLÄNGERUNG

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
51		303004400
52		336010001
53	6209	354100045
54	45x85x10	355000045
55		358028000
56	L	
	M	
	N	580858514
	P	580858508
57	L	
	M	
	N	581042007
	P	581042004

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 ISO REF. 1 UNC BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10
2100052F101	290290040	290290041	295034159		448052601R
2100052G111	290290040	290290041	295034159		448052602R
2100052G211	290290040	290290041	295044050		448052602R
2100052G222	290290040	290290041	295044050		448052603R
2100052R110	290290040	290290041	295034025		448052600R
2100052R120	290290040	290290041	295034025		448052608R
2100064F101	290290021	290290038	295034025	295034015	448064600R
2100064F202	290290021	290290038	295044009	295044001	448064600R
2100064FP01	290290021	290290038	295044009	295034015	448064600R
2100064G111	290290021	290290038	295034025	295034010	448064600R
2100064G211	290290021	290290038	295044009	295034010	448064600R
2100064G222	290290021	290290038	295044009	295044002	448064600R
2100064R110	290290021	290290038	295034025	295034014	448064600R
2100064R220	290290021	290290038	295044009	295044003	448064600R
2100074F101	290290021	290290038	295034025	295034015	448135600R
2100074F202	290290021	290290038	295044009	295044001	448135600R
2100074G111	290290021	290290038	295034025	295034010	448135600R
2100074G211	290290021	290290038	295044009	295034010	448135600R
2100074G222	290290021	290290038	295044009	295044002	448135600R
2100074R110	290290021	290290038	295034025	295034014	448135600R
2100074R220	290290021	290290038	295044009	295044003	448135600R
2100100F101	290290021	290290038		295034015	448100701R
2100100F102	290290021	290290038		295044001	448100701R
2100100F202	290290021	290290038		295044001	448100702R
2100100G111	290290021	290290038		295034010	448100701R
2100100G122	290290021	290290038		295044002	448100701R
2100100G211	290290021	290290038		295034010	448100702R
2100100G222	290290021	290290038		295044002	448100702R
2100100R110	290290021	290290038		295034014	448100701R
2100100R120	290290021	290290038		295044003	448100701R
2100100R1P0	290290021	290290038		295044003	448100701R
2100100R220	290290021	290290038		295044003	448100702R
2100100RN10	290290021	290290038		295034014	448100702R
2100135F101	290290021	290290038	295034025	295034015	448135600R
2100135F202	290290021	290290038	295044009	295044001	448135600R
2100135G111	290290021	290290038	295034025	295034010	448135600R
2100135G122	290290021	290290038	295034025	295044002	448135600R
2100135G211	290290021	290290038	295044009	295034010	448135600R
2100135G222	290290021	290290038	295044009	295044002	448135600R
2100135R110	290290021	290290038	295034025	295034014	448135600R
2100135R220	290290021	290290038	295044009	295044003	448135600R
2100157F101	290290021	290290038		295034015	448157600R
2100157F202	290290021	290290038		295044001	448157601R
2100157G111	290290021	290290038		295034010	448157600R
2100157G222	290290021	290290038		295044002	448157601R
2100157R110	290290021	290290038		295034014	448157600R
2100157R220	290290021	290290038		295044003	448157601R
2100157RP10	290290021	290290038		295034014	448157601R
2100192F101	290290021	290290038		295034015	448192602R
2100192F202	290290021	290290038		295044001	448192603R
2100192G111	290290021	290290038		295034010	448192602R
2100192G211	290290021	290290038		295034010	448192603R
2100192G222	290290021	290290038		295044002	448192603R
2100192R110	290290021	290290038		295034014	448192602R
2100192R210	290290021	290290038		295034014	448192603R
2100192R220	290290021	290290038		295044003	448192603R
2100192RL10	290290021	290290038		295034014	448192603R
2100192RN10	290290021	290290038		295034014	448192603R
2100230F101	290290021	290290038		295034015	448230600R
2100230F102	290290021	290290038		295044001	448230600R
2100230F202	290290021	290290038		295044001	448230601R
2100230G111	290290021	290290038		295034010	448230600R
2100230G222	290290021	290290038		295044002	448230601R
2100230R110	290290021	290290038		295034014	448230600R
2100230R120	290290021	290290038		295044003	448230600R
2100230R210	290290021	290290038		295034014	448230601R
2100230R220	290290021	290290038		295044003	448230601R

Technical drawing of a 2500 Series 1000 PSI Hydraulic Filter, showing front, top, and side views with dimensions in inches and millimeters.

Front View Dimensions:

- Overall Width: 280 mm (11.02")
- Overall Height: 220 mm (8.66")
- Top Flange Width: 200 mm (7.87")
- Top Flange Height: 114 mm (4.49")
- Bottom Flange Width: 160 mm (6.3")
- Bottom Flange Height: 145 mm (5.71")
- Filter Element Height: 2125

Top View Dimensions:

- Overall Width: 225 mm (8.86")
- Overall Height: 76.4 mm (3")
- Filter Element Diameter: $\varnothing 130$ mm (5.12")

Side View Dimensions:

- Overall Width: 76.4 mm (3")
- Overall Height: 76.4 mm (3")

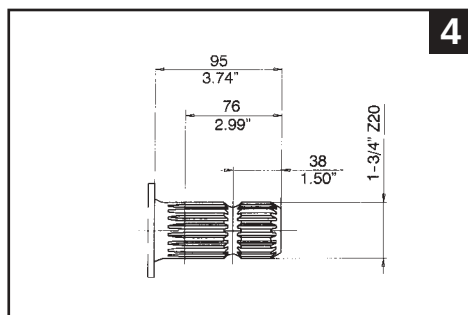
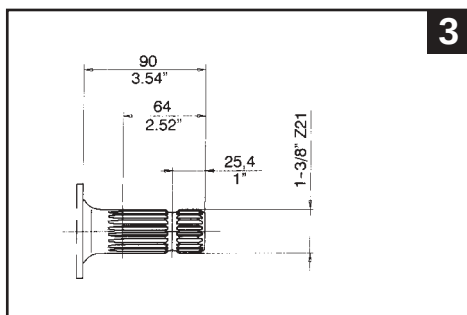
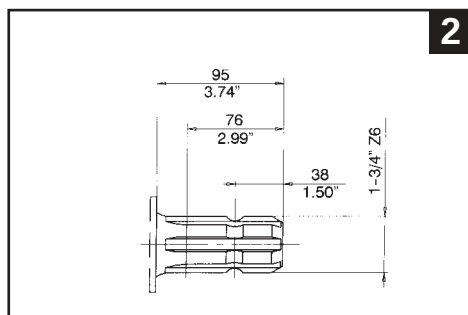
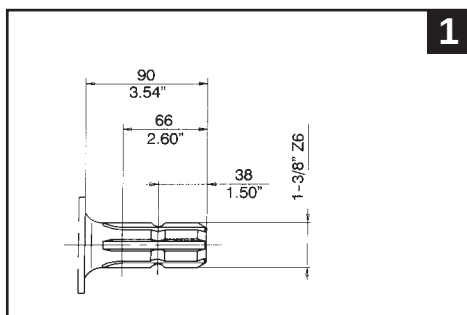
Labels and Callouts:

- TAPPO DI SFIATO
OIL BREATHER PLUG
ENTLÜFTUNGSSCHRAUBE
- N° 8 M16
N° 8 5/8-11UNC
- N° 8 M10
N° 8 3/8-16UNC
- N° 4 M10
N° 4 3/8-16UNC

Views:

- VISTA DA A
VIEW FROM A
ANSICHT VON A

84



Le scatole tipo 2125 043, 2125 052 sono disponibili solamente con l'albero 1 3/8" Z6 o 1 3/8" Z21 montato sull'asse X - Y.

Gearboxes 2125 043, 2125 052 are available only with shaft 1 3/8" Z6 or 1 3/8" Z21 splined mounted on shaft X - Y.

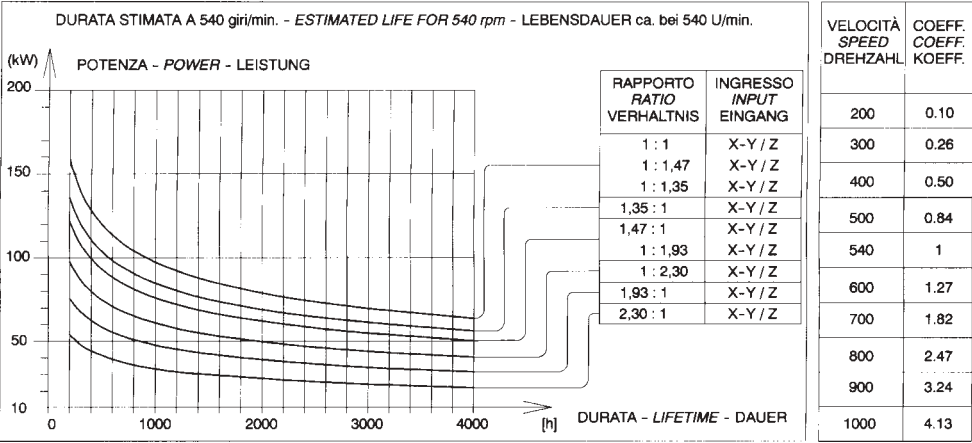
Die Getriebe Typ 2125 043, 2125 052 sind nur mit dem Anschluß 1 3/8" Z6, 1 3/8" Z21 bei und X -Y.

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 2,8 L
PESO INDICATIVO SCATOLA 45 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 95 ozs
APPROXIMATE WEIGHT 99 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 2,8 L
GETRIEBEGEWICHT CA. 45 kg

2125



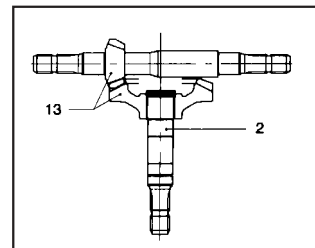
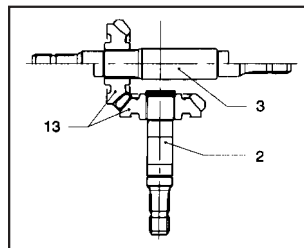
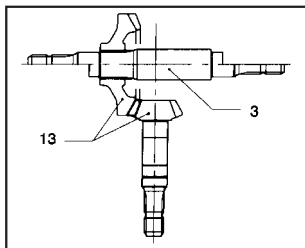
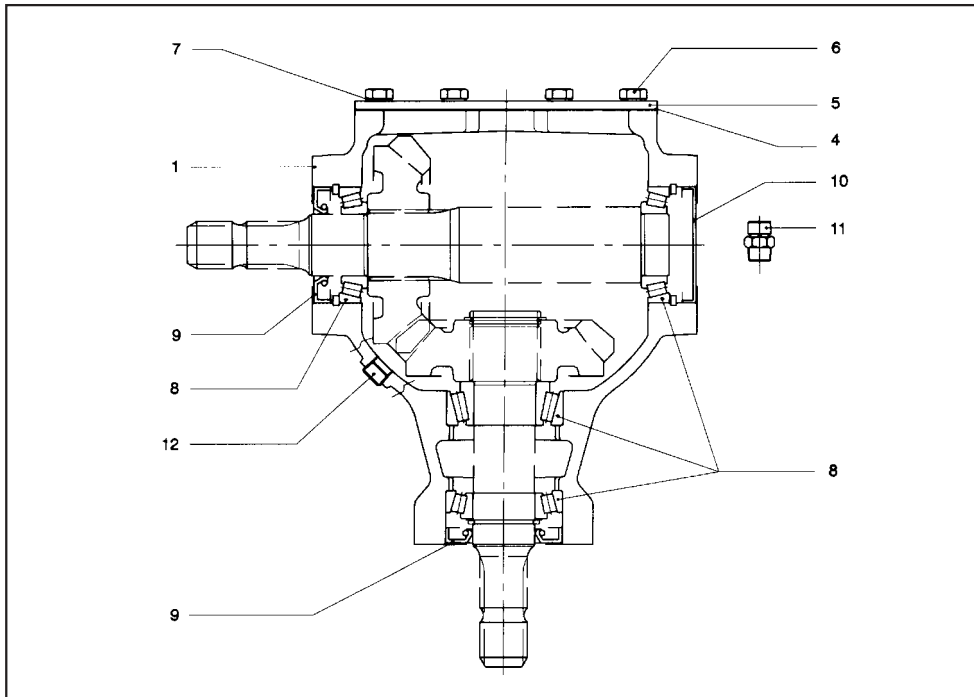
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)	2	1	2	5							
TIPO - TYPE - TYP 2125											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 230 - 193 - 147 - 135 - 100 - 074 - 068 - 052 - 043											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1, 2, 3 (TIPO DI ALBERO - SHAFT - WELLENTYP)											
ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y											



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*
2		*
3		*
4		298318006
5	M10x25x1,5	298622000
6		319012200
7	30209	335010001
	33209	354400045
8	6308	354402045
	30308	354110040
	45x85x12	354407040
9	40x90x10	355029045
		355018040
10	3/8" GAS	372006000

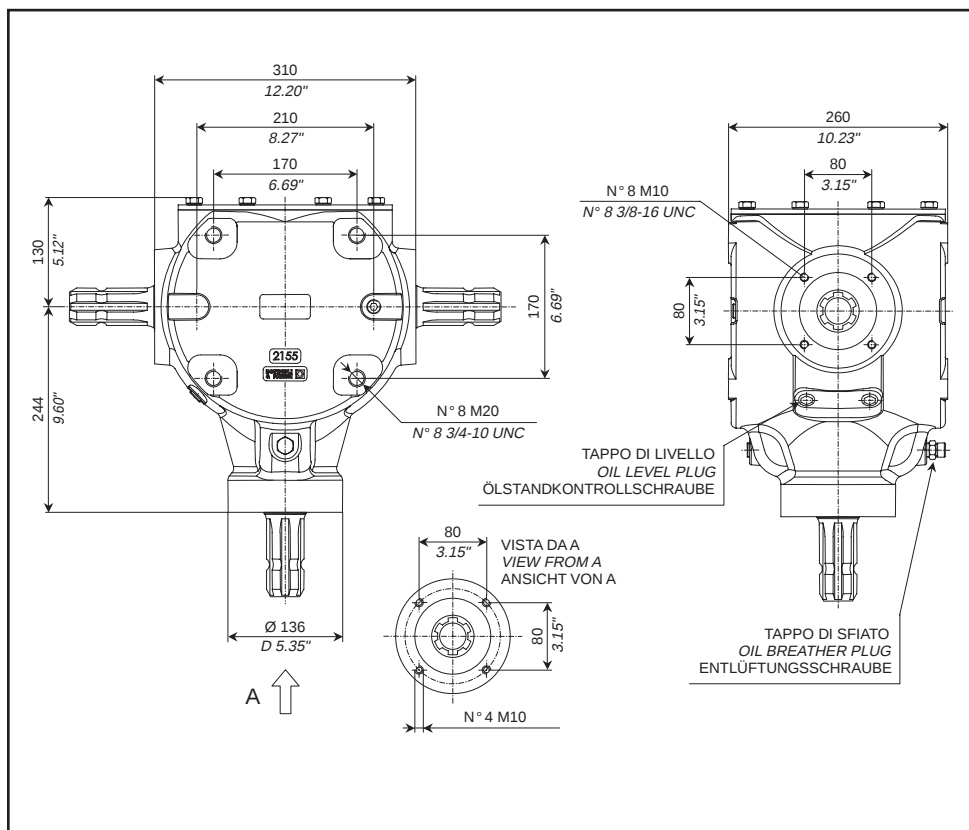
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
11		373007000
12	3/8" GAS	373010000
13		*

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

*CODICE A PAGINA SEGUENTE - COD. FOLL. PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGEDEN SEITE

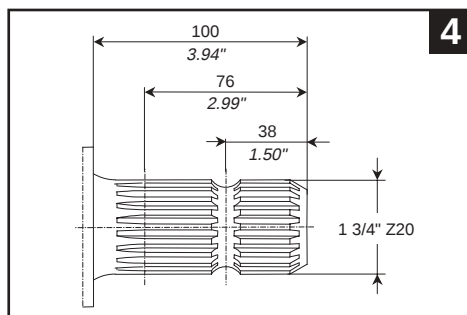
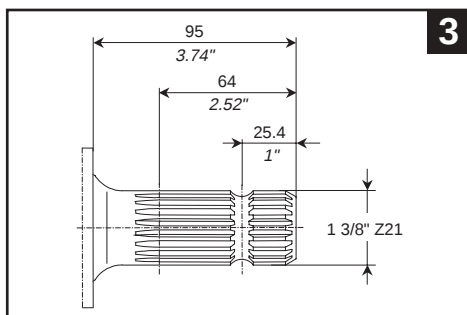
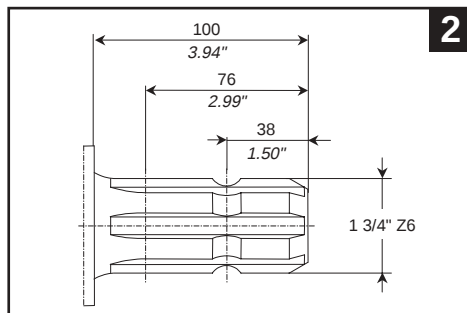
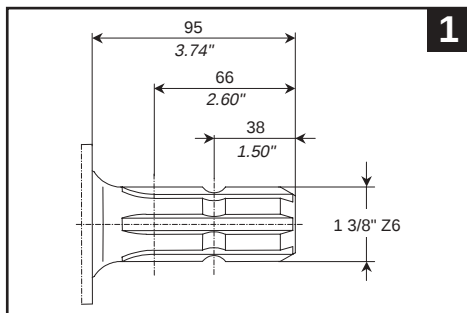
2125

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 ISO REF. 1 ISO BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 14 REF. 14 BEZ. 14
2125043G111	290291201	290291204	295034161	-	448043600
2125052G111	290291201	290291204	295034161	295030389	448052623
2125068G111	290291200	290291203	295034161	295030388	448147703
2125074G111	290291200	290291203	295034161	295030388	448135702
2125100R110	290291200	290291203	295034161	295034162	44100790
2125100G111	290291200	290291203	295034161	295030388	448100790
2125100F101	290291200	290291203	295034161	295034163	448100790
2125135G111	290291200	290291203	295034161	295030388	448135702
2125147G111	290291200	290291203	295034161	295030388	44814703
2125193G111	290291200	290291203	-	295030388	448193611
2125230G111	290291200	290291203	-	295030388	448230609



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,42	540	107	145	1887	16696	780	6899	1307	041	242
		1000	164	223	1567	13866	647	5730	2420		
	1:1,93	540	121	165	2147	18999	1112	9844	1042	052	193
		1000	184	250	1756	15545	910	8054	1930		
	1:1,53	540	125	170	2212	19575	1446	12794	826	065	153
		1000	192	261	1834	16229	1199	10607	1530		
	1:1,25	540	126	172	2238	19805	1790	15844	675	080	125
		1000	195	265	1862	16478	1489	13182	1250		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1	540	121	165	2147	18999	2147	18999	540	100	100
		1000	184	250	1756	15545	1756	15545	1000		
	1,25:1	540	111	151	1965	17387	2456	21734	432	125	080
		1000	171	232	1630	14426	2038	18032	800		
	1,53:1	540	97	132	1717	15199	2628	23255	353	153	065
		1000	149	203	1426	12622	2182	19312	654		
	1,93:1	540	81	110	1431	12666	2762	24446	280	193	052
		1000	124	169	1187	10508	2292	20281	518		
	2,42:1	540	59	80	1041	9212	2519	22292	223	242	041
		1000	90	123	864	7648	2019	18508	413		

2155



Le scatole tipo 2155 041, 2155 052 sono disponibili solamente con l'albero 1 3/8" Z6 o 1 3/8" Z21 montato sull'asse X - Y.

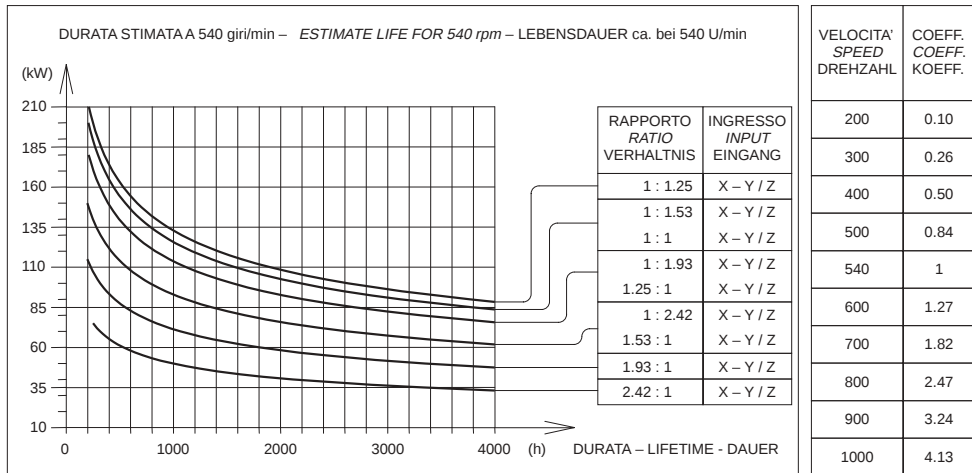
Gearboxes 2155 041, 2155 052 are available only with shaft 1 3/8" Z6 or 1 3/8" Z21 splined mounted on shaft X - Y.

Die Getriebe Typ 2155 041, 2155 052 sind nur mit dem Anschluß 1 3/8" Z6, 1 3/8" Z21 bei und X -Y.

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 4 L
PESO INDICATIVO SCATOLA 62 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 135 ozs
APPROXIMATE WEIGHT 137 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 4 L
GETRIEBEGEWICHT CA. 62 kg



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

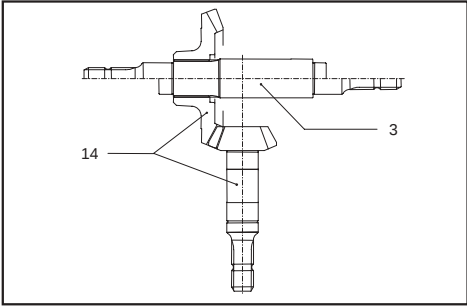
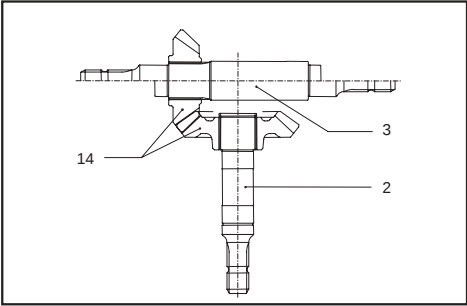
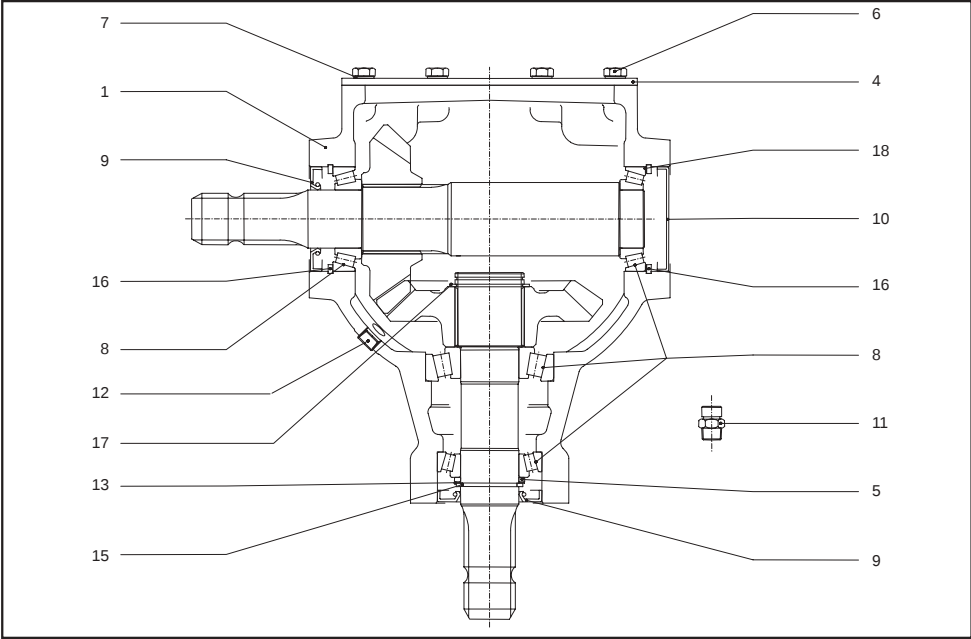
To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)										
TIPO - TYPE - TYP 2155										
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 242 - 193 - 153 - 125 - 100 - 080 - 065 - 052 - 041										
MONTAGGIO - ARRANGEMENT - MONTAGEART										
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1, 2, 3 (TIPO DI ALBERO - SHAFT - WELLENTYP)										
ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y										

2155



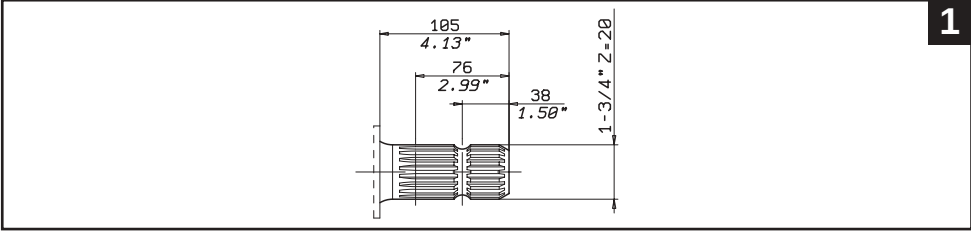
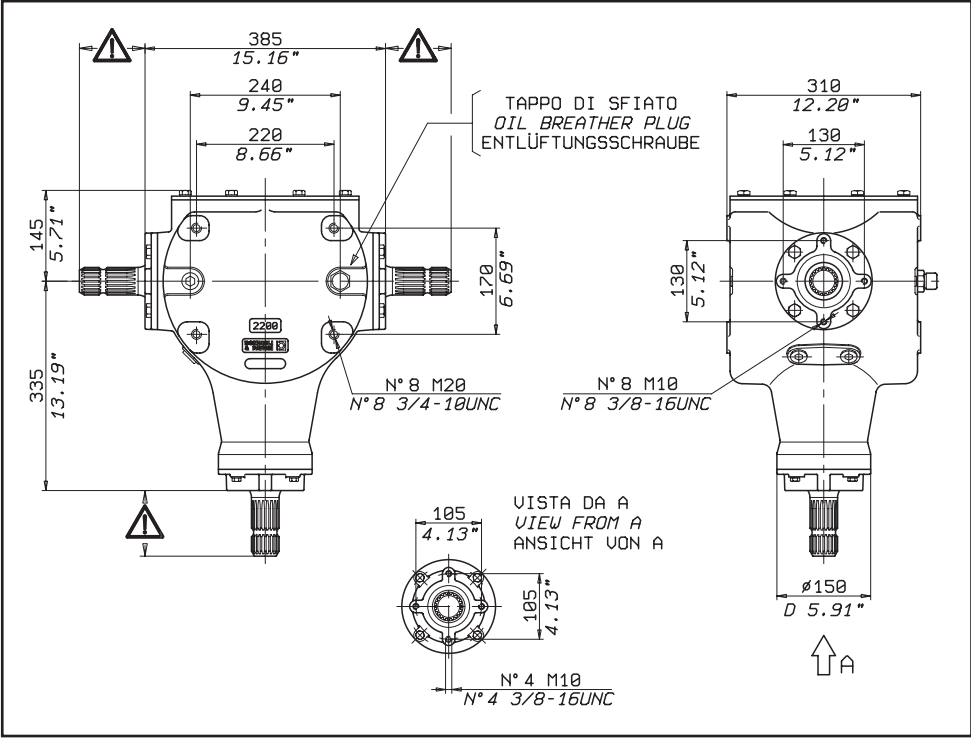
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR	RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR	RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*	13		340E05000			
2		*	14		*			
3		*	15	50x3 DIN 471/2	339000050			
4		298625400	16	90x4 DIN 472/2	339000090			
5		298405025	17	60x2 DIN 471/1	*			
6		319012200	18		340I09000			
7		335010001						
8	32210	354401050						
	30210	354400050						
	30310	354405050						
9	50x90x10	355020050						
10	90x10	372007000						
11	3/8" GAS	373007000						
12	3/8" GAS	373010000						

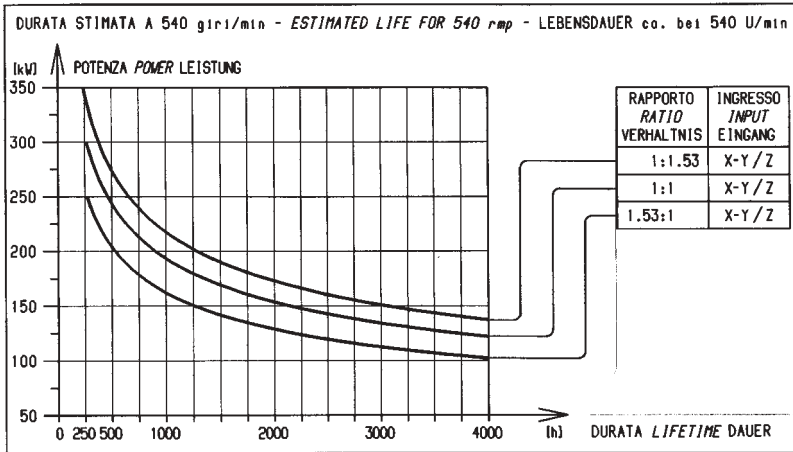
* CODICE A PAGINA SEGUENTE - COD. FOLL. PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGEDEN SEITE

CODICE SCATOLA GEARBOX CODE GETRIEBE BESTELL.-NR	RIF. 1 ISO REF. 1 ISO BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 2 REF. 2 BEZ. 2	RIF. 3 REF. 3 BEZ. 3	RIF. 14 REF. 14 BEZ. 14	RIF. 17 REF. 17 BEZ. 17
2155041G211	290291302	290291305	295044052	295030329	448041700R	337000060
2155041G411	290291302	290291305	295384036	295030329	448041700R	337000060
2155041R210	290291302	290291305	295044052	295034067	448041700R	337000060
2155052G111	290291302	290291305	295034177	295030329	448052700R	337000060
2155052G211	290291302	290291305	295044052	295030329	448052700R	337000060
2155065G111	290291300	290291303	295034177	295034078	448065701R	337000060
2155065G211	290291300	290291303	295044052	295034078	448065701R	337000060
2155065G222	290291300	290291303	295044052	295044019	448065701R	337000060
2155065G444	290291300	290291303	295384036	295383803	448065701R	337000060
2155080F202	290291300	290291303	295044052	295044012	448125700R	337000060
2155080G111	290291300	290291303	295034177	295034078	448125700R	337000060
2155080G222	290291300	290291303	295044052	295044019	448125700R	337000060
2155080G444	290291300	290291303	295384036	295383803	448125700R	337000060
2155080R110	290291300	290291303	295034177	295034083	448125700R	337000060
2155080R220	290291300	290291303	295044052	295044013	448125700R	337000060
2155100F202	290291300	290291303	295044052	295044012	448100798R	337000060
2155100F404	290291300	290291303	295384036	295384017	448100798R	337000060
2155100G111	290291300	290291303	295034177	295034078	448100798R	337000060
2155100G211	290291300	290291303	295044052	295034078	448100798R	337000060
2155100G222	290291300	290291303	295044052	295044019	448100798R	337000060
2155100G444	290291300	290291303	295384036	295383803	448100798R	337000060
2155100R220	290291300	290291303	295044052	295044013	448100798R	337000060
2155125F202	290291300	290291303	295044052	295044012	448125700R	337000060
2155125G222	290291300	290291303	295044052	295044019	448125700R	337000060
2155125R220	290291300	290291303	295044052	295044013	448125700R	337000060
2155153F202	290291300	290291303	-	295044012	448153705R	-
2155153G111	290291300	290291303	-	295034078	448153704R	-
2155153G222	290291300	290291303	-	295044019	448153705R	-
2155153G444	290291300	290291303	-	295383803	448153706R	-
2155153R120	290291300	290291303	-	295044013	448153704R	-
2155153R440	290291300	290291303	-	295384008	448153706R	-
2155193G111	290291301	290291304	-	295034078	448193709R	-
2155193G122	290291301	290291304	-	295044019	448193709R	-
2155193G222	290291301	290291304	-	295044019	448193710R	-
2155193R220	290291301	290291304	-	295044013	448193710R	-
2155193G444	290291301	290291304	-	295383803	448193711R	-
2155242F101	290291301	290291304	-	295035306	448242707R	-
2155242G222	290291301	290291304	-	295044019	448242708R	-
2155242R120	290291301	290291304	-	295044013	448242707R	-
2155242R140	290291301	290291304	-	295384008	448242707R	-
2155242R440	290291301	290291304	-	295384008	448242709R	-

2200



IMPIEGIO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,53	540	240	275	3578	31665	2339	20696	826	066	153
		1000	241	328	2305	20395	1506	13330	1530		
	1:1	540	176	240	3123	27635	3123	27635	540	100	100
		1000	265	360	2529	22385	2529	22385	1000		
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,53:1	540	147	200	2602	23029	3981	35235	353	153	066
		1000	213	290	2038	18032	3117	27589	654		



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

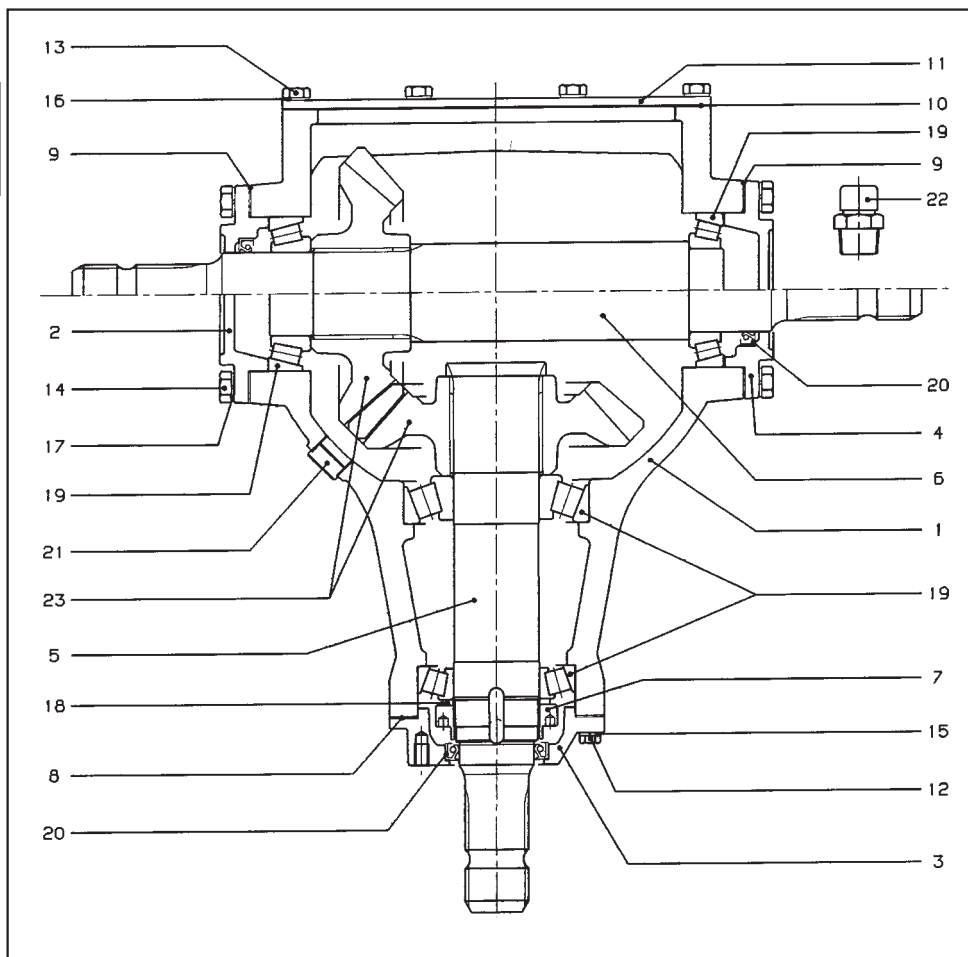
FILETTATURE THREADS - GEWINDE	2	2	0	0						
S (ISO) - G (UNC)										
TIPO - TYPE - TYP	2200									
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE	153 - 100 - 066									
MONTAGGIO - ARRANGEMENT - MONTAGEART										
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP)					ASSE Z - Z AXIS - WELLE Z				ASSE X - X AXIS - WELLE X	
									ASSE Y - Y AXIS - WELLE Y	

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 6 L
PESO INDICATIVO SCATOLA 95 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 202 ozs
APPROXIMATE WEIGHT 210 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 6 L
GETRIEBEGEWICHT CA. 95 kg

2200



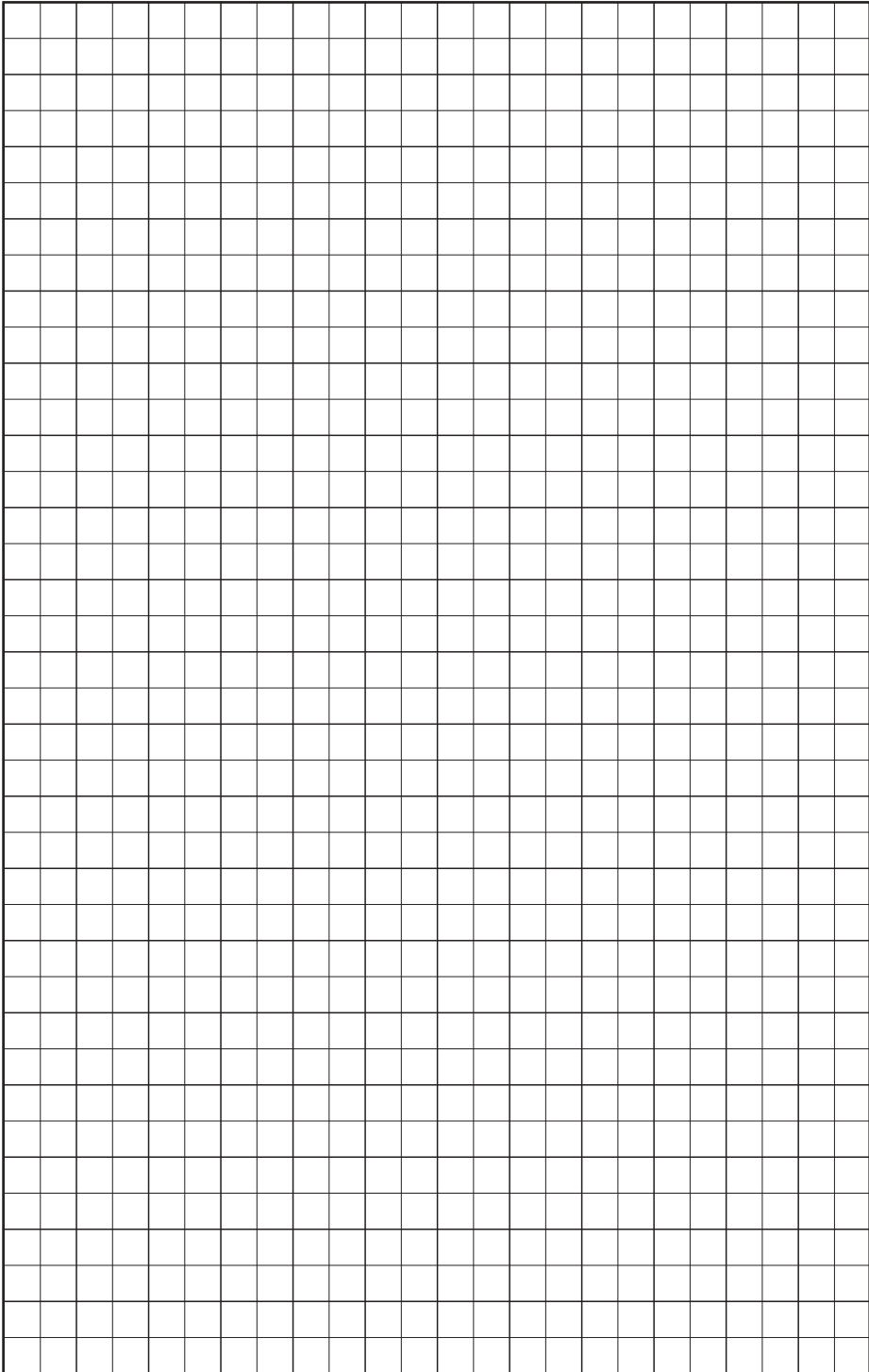
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE	RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE	RIF. REF.	DESCRIZIONE DESCRIPTION	CODICE CODE
BEZ.	BESCHREIBUNG	BEST.-NR	BEZ.	BESCHREIBUNG	BEST.-NR	BEZ.	BESCHREIBUNG	BEST.-NR
1	ISO	290290205	9		298930003	17		335060002
	UNC	290290204	10		298960001	18	30212	354401060
2		290290300	11		319000220		32212	354402060
3		290290400	12		319026200		30312	354403060
4		29090A007	13		319027200	19	52x72x12	355050052
5		*	14		335008002		60x80x10	355011060
6		*	15		335010002	20	3/4" GAS	373017000
7		298920003	16		335012002	21	3/4" GAS	373018000
8		298311000				22		*

* CODICE A PAGINA SEGUENTE - COD. FOLL. PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGEDEN SEITE



COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 5 REF. 5 BEZ. 5	RIF. 6 REF. 6 BEZ. 6	RIF. 22 REF. 22 BEZ. 22
2200066F101	295384000	295384002	448066800R
2200066G111	295384000	295383800	448066800R
2200066R110	295384000	295384001	448066800R
2200100F101	295384000	295384002	448100800R
2200100G111	295384000	295383800	448100800R
2200100R110	295384000	295384001	448100800R
2200153F101	295384000	295384002	448066800R
2200153G111	295384000	295383800	448066800R
2200153R110	295384000	295384001	448066800R



**SERIE
SERIES 2001**

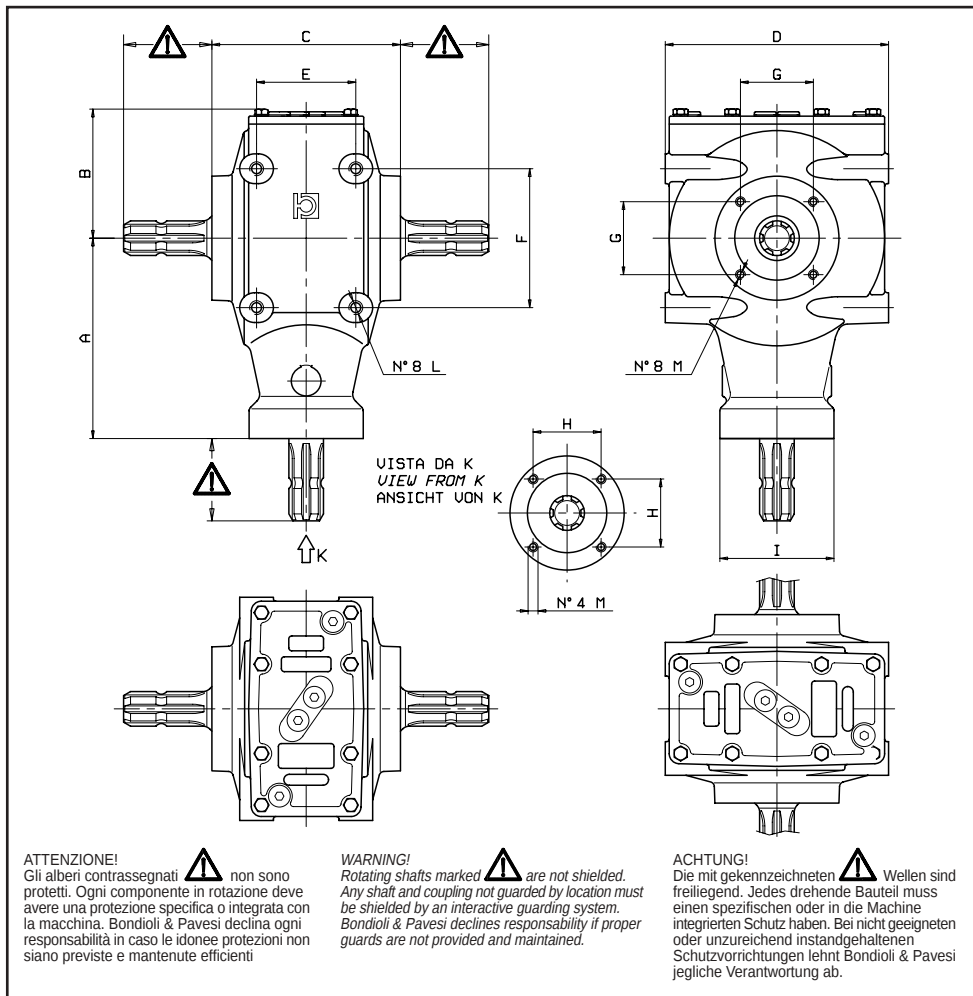


**BONDIOLI
& PAVESI**



SERIE SERIES 2001





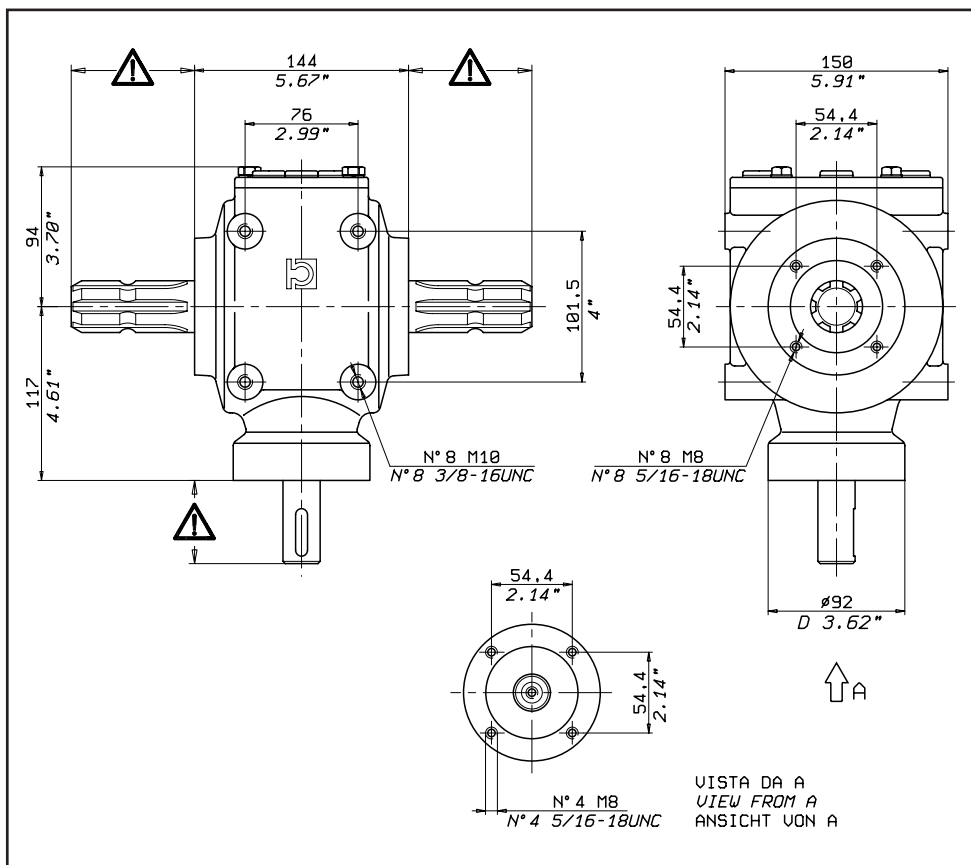
TIPO TYPE TYP	A	B	C	D	E	F	G	H	I	L	M
S2021	117	94	144	150	76	101,5	54,4	54,4	92	M10	M8
G2021	4,61"	3,70"	5,67"	5,91"	2,99"	4"	2,14"	2,14"	3,62"	3/8-16UNC	5/16-18UNC
S2041	149	99	164	170	84	114	61,5	61,5	104	M12	M8
G2041	5,87"	3,90"	6,46"	6,69"	3,31"	4,49"	2,42"	2,42"	4,09"	1/2-13UNC	5/16-18UNC
S2061	160	110	170	190	84	114	68,6	68,6	115	M12	M10
G2061	6,30"	4,33"	6,69"	7,48"	3,31"	4,49"	2,70"	2,70"	4,53"	1/2-13UNC	3/8-16UNC
S2071	202	130	190	225	100	140	73,5	68,6	115	M14	M10
G2071	7,95"	5,12"	7,48"	8,86"	3,94"	5,51"	2,89"	2,70"	4,53"	9/16-12UNC	3/8-16UNC
S2081	225	141	210	250	120	150	79	98,6	115	M16	M10
G2081	8,86"	5,55"	8,27"	9,84"	4,72"	5,91"	3,11"	2,70"	4,53"	5/8-11UNC	M103/8
S2201	285	227	300	406	200	255	108	86,3	140	M20	M10
G2201	11,22"	8,94"	11,81"	15,98"	7,87"	10,04"	4,25"	3,4"	5,51"	3/4-10UNC	3/8-16UNC

2001

- PRINCIPALI APPLICAZIONI:
TRINCIASTOCCHI,
DECESPUGLIATORI A ROTORE.
- RAPPORTI DA 1,93 A 5,33 IN
MOLTIPLICA ED IN RIDUZIONE.
- POTENZE FINO A 107 kW A 540 giri/min.
- SCATOLE MONOBLOCCO IN GHISA.
- VERNICIATURA INTERNA ED
ESTERNA, ESSICCAZIONE IN FORNO,
RESISTENZA ALLA CORROSIONE
SECONDO NORMA ASTM B 117-79,
RESISTENZA ALL'OLIO SAE 90 EP
FINO A 125°C (260°F).
- COPPIE CONICHE IN ACCIAIO
CEMENTATO E TEMPRATO,
DENTATURA GLEASON DIRITTA
FINO AL RAPPORTO 3,10,
ELICOIDALE PER RAPPORTI
4,12 - 4,50 - 5,33.
- ALBERI IN ACCIAIO CEMENTATO E
TEMPRATO.
- ANELLI DI TENUTA CON LABBRO
PARAPOLVERE.
- CUSCINETTI DI QUALITÀ PER
ELEVATA AFFIDABILITÀ (L₁₀).
- TYPICAL APPLICATIONS:
FLAIL MOWERS, STALK SHREDDERS.
- RATIOS FROM 1,93 TO 5,33 AS
MULTIPLIER OR AS REDUCER.
- POWER UP TO 107 kW AT 540 r.p.m.
- ONE PIECE CAST IRON CASE MAX
STRENGTH PRECISE POSITIONING
OF INTERNAL COMPONENTS.
- INNER AND OUTER DIPPING AND
OVEN DRYING AT HIGH
TEMPERATURE.
- CORROSION RESISTANCE TO ASTM
B 117-79. CAPABLE OF WORKING UP
TO 125°C (260°F) WITH SAE 90 EP.
- BEVEL GEARS ARE CASE
HARDENED AND TEMPERED STEEL.
- GLEASON STRAIGHT CUT TEETH
FOR RATIOS UP TO 3.10, SPIRAL
BEVEL FOR RATIOS 4.12, 4.5 AND
5.33.
- HIGH STRENGTH CASE HARDENED
SHAFTS.
- SEAL RINGS WITH ANTIDUST LIP.
- QUALITY BEARINGS FOR HIGH
RELIABILITY (L₁₀).
- HAUPTSÄCHLICH VERWENDET BEI:
MULCHGERÄTE UND BUSCHHACKER.
- ÜBERSETZUNGSVERHÄLTNISSE
VON 1,93 BIS 5,33 AUCH ALS
UNTERSETZUNG.
- LEISTUNGSBEREICH BIS 107 kW BEI
540 U/min.
- GUß-GETRIEBEGEHÄUSE IN EINEM
STÜCK.
- GEHÄUSE TAUCHGRUNDIERT, IM
EINBRENNVERFAHREN GETROCKNET.
- KORROSIONSBESTÄNDIG GEMÄß
NORM ASTM B 117-79.
- HITZEBESTÄNDIG BEI SAE 90 EP-
ÖL BIS 125°C(260°F).
- KEGELRÄDER EINSATZGEHÄRTET.
- GLEASON-GERADVERZÄHNUNG BIS
ZU ÜBERSETZUNGSVERHÄLTNIS
I=3,10, SPIRALVERZÄHNT BEI I = 4,12-
4,50 UND 5,33.
- WELLEN IN EINSATZGEHÄRTETEM
STAHL.
- WELLENDICHTRINGE MIT
STAUBSCHUTZLIPPE.
- QUALITÄTS-WÄLZLAGER FÜR
HÖCHSTE ZUVERLÄSSIGKEIT (L₁₀).

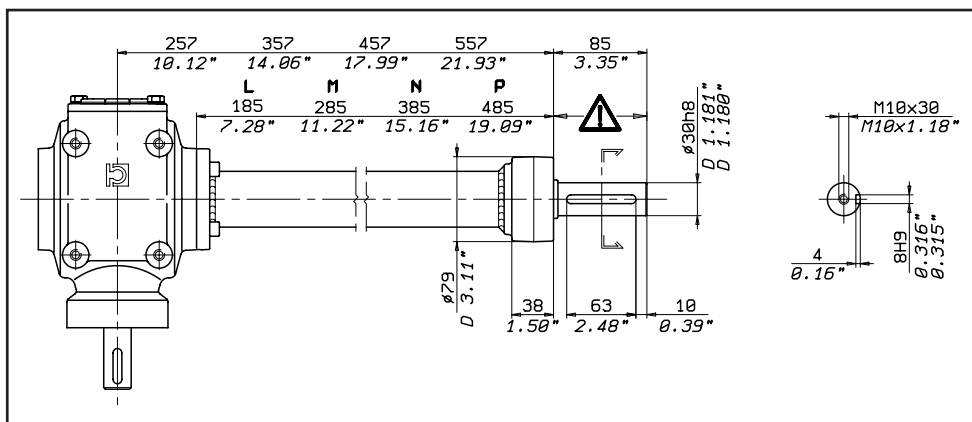
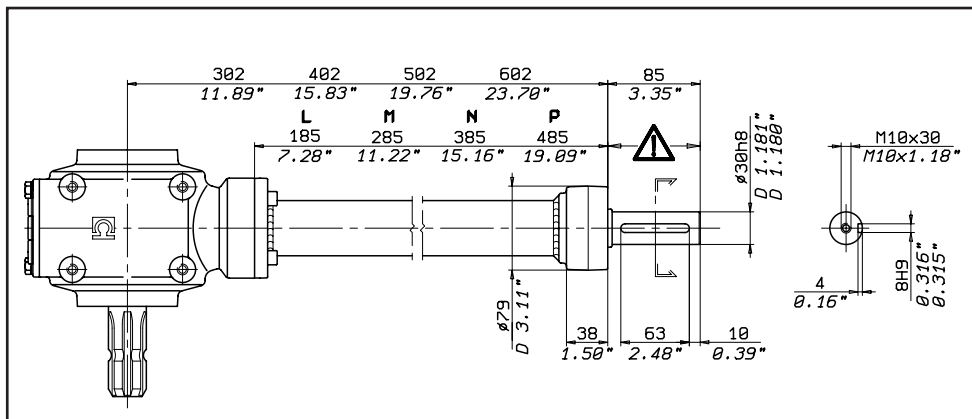
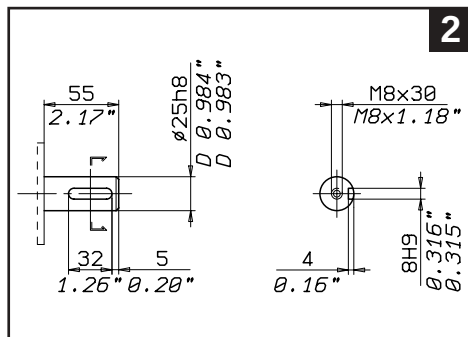
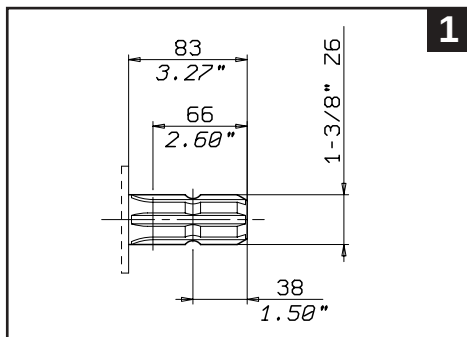
POTENZA a 540 giri/min. - POWER at 540 r.p.m. - LEISTUNG bei 540 U/min.

IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERSVERH.	2021 kW CVHp-PS		2041 kW CVHp-PS		2061 kW CVHp-PS		2071 kW CVHp-PS		2081 kW CVHp-PS		2081 kW CVHp-PS	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGSGETRIEBE	1:5,33					24	32						
	1:4,50					29	40						
	1:4,12			21	29			45	61	66	90		90
	1:3,90	10	13										
	1:3,10			24	33	38	52	54	73	88	120		120
	1:3,00	14	19										
	1:2,58			28	38	38	52	60	82				
	1:2,54	17	23										
	1:2,46									88	120		120
	1:2,08	21	28	31	42								
	1:1,93					38	52	60	82	107	145		145
	1,93:1					25	34	37	50	66	90	147	90
RIDUTTORE SPEED REDUCER UNTERSETZUNGSGETRIEBE	2,08:1	12	17	19	26								
	2,46:1									46	63	120	63
	2,54:1	9	12										
	2,58:1			15	21	22	30	32	44				
	2,92:1	7	9									96	
	3,00:1			11	15	18	24	24	33	40	55		55
	3,10:1	4	5										
	3,90:1			8	11			18	25	27	37		37
	4,12:1					11	15					27	
	4,50:1					8	11						
	5,33:1												



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m U/min.	kW	P CV/HP-PS	N·m M	in·lb	N·m	in·lb	giri/min. r.p.m U/min.	Z	X-Y	
		INGRESSO-INPUT-EINGANG										
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:3,90	540	10	13	169	1497	43	384	2106	-	390	
		1000	-	-	-	-	-	-	-	-	-	
	1:3,00	540	14	19	247	2188	82	729	1620	-	300	
		1000	21	29	204	1803	68	601	3000	-	300	
	1:2,54	540	17	23	299	2648	118	1043	1372	-	254	
		1000	25	34	239	2114	94	832	2540	-	254	
	1:2,08	540	21	28	364	3224	175	1550	1123	-	208	
		1000	29	40	281	2487	135	1196	2080	-	208	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	2,08:1	540	12	17	221	1957	460	4072	260	208	-	
		1000	18	25	176	1554	365	3233	481	208	-	
	2,54:1	540	9	12	156	1382	397	3510	213	254	-	
		1000	13	18	126	1119	321	2843	394	254	-	
	3,00:1	540	7	9	117	1036	351	3109	180	300	-	
		1000	10	14	98	871	295	2612	333	300	-	
	3,90:1	540	4	5	65	576	254	2245	138	390	-	
		1000	6	8	56	497	219	1940	256	390	-	

2021

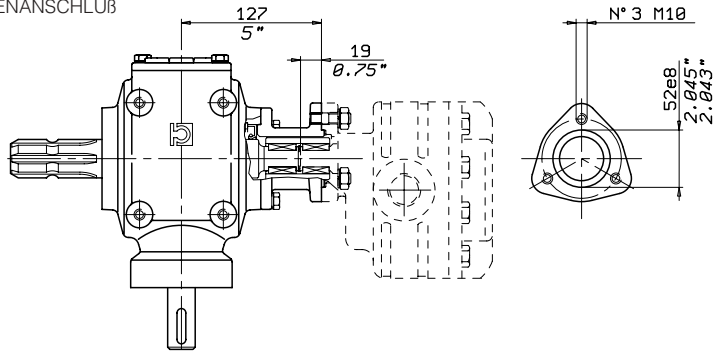


OLIO CONSIGLIATO SAE 90 EP
 QUANTITA' OLIO INDICATIVA 0,7 L
 PESO INDICATIVO SCATOLA 11 kg

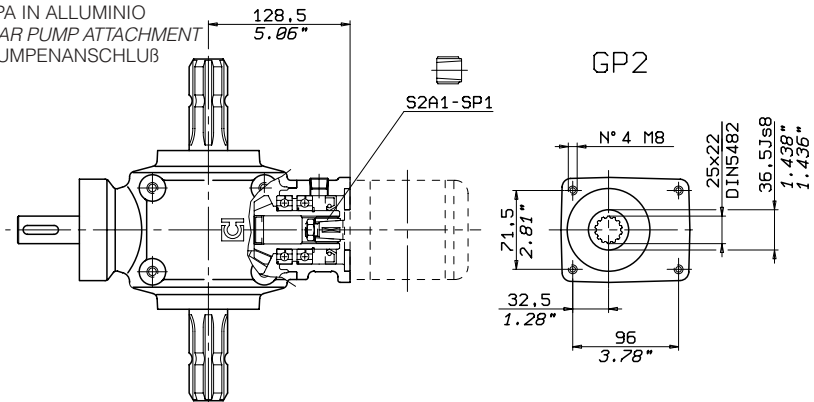
RECOMMENDED OIL GRADE SAE 90 EP
 APPROXIMATE OIL QUANTITY 23 ozs
 APPROXIMATE WEIGHT 24 lbs

EMPFOHLENES ÖL SAE 90 EP
 MENGE ÖL CA. 0,7 L
 GETRIEBEGEWICHT CA. 11 kg

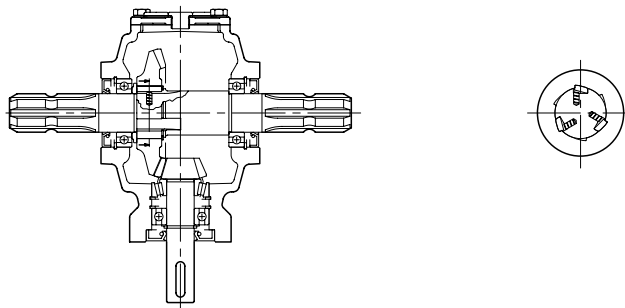
ATTACCO POMPA IN GHISA
CAST IRON GEAR PUMP ATTACHMENT
GRAUGUß - PUMPENANSCHLUß



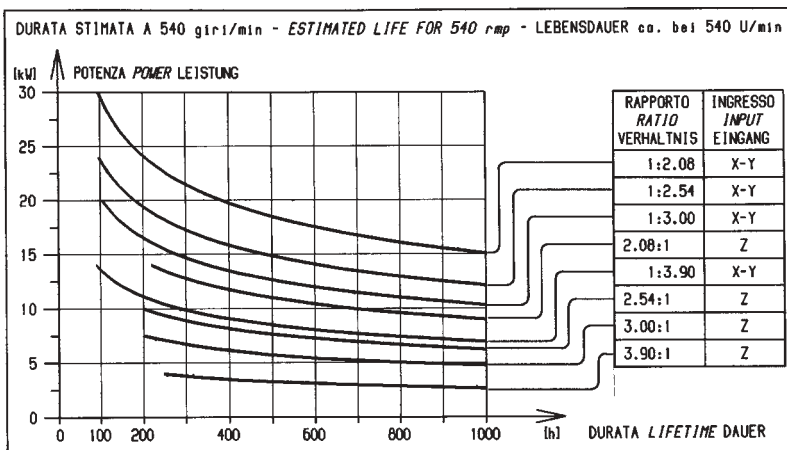
ATTACCO POMPA IN ALLUMINIO
ALUMINIUM GEAR PUMP ATTACHMENT
ALUMINIUM - PUMPENANSCHLUß



RUOTA LIBERA
OVERRUNNING CLUTCH
FREILAUF



2021



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

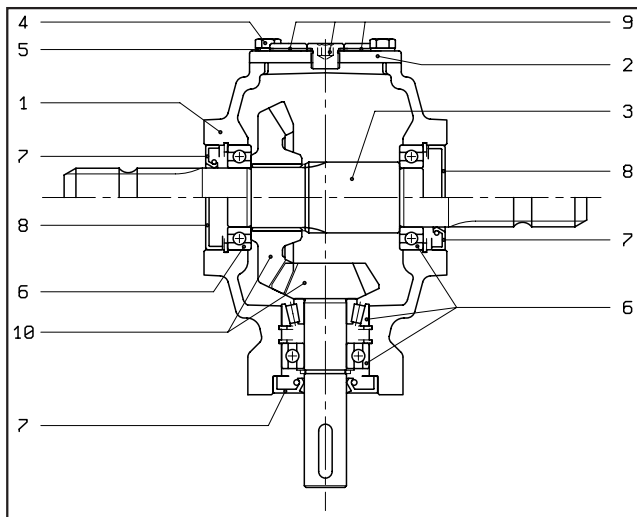
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

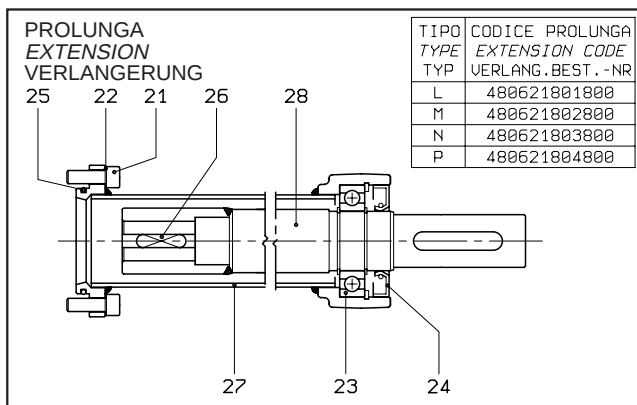
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS - GEWINDE S (ISO) - G (UNC)	2	0	2	1					2		
TIPO - TYPE - TYP 2021											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 390 - 300 - 254 - 208											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1,2 (TIPO DI ALBERO - SHAFT - WELLENTYP) L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)											
				ASSE Z - Z AXIS - WELLE Z							
				ASSE X - X AXIS - WELLE X							
				ASSE Y - Y AXIS - WELLE Y							



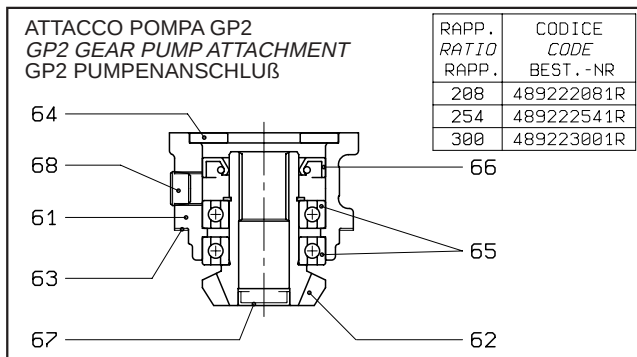
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290230111
	UNC	290230110
2		298600069
3		*
4		319024200
5		335008002
6	6205	354101025
	6007	354107035
	30205	354403025
7	25x62x10	355013025
	35x62x10	355004035
8	62x10	372004000
9	3/8"GAS	
10		*



**PROLUNGA
EXTENSION
VERLÄNGERUNG**

TIPO TYPE TYP	CODICE PROLUNGA EXTENSION CODE VERLANG. BEST. -NR
L	480621801800
M	480621802800
N	480621803800
P	480621804800

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21		303002400
22		336008001
23	6007	354107035
24	35x62x10	355004035
25		358025000
26		370020000
27	L	580626204
	M	580626203
	N	580626209
	P	580626210
28	L	581161803
	M	581161802
	N	581161806
	P	581161805



**ATTACCO POMPA GP2
GP2 GEAR PUMP ATTACHMENT
GP2 PUMPENANSCHLUß**

RAPP. RATIO RAPP.	CODICE CODE BEST. -NR
208	489222081R
254	489222541R
300	489223001R

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
61		290230400
62	R = 2,08	292122705
	R = 2,54	292112701
	R = 3,00	292122706
63		298300028
64		298403600
65	6007	354107035
66	35x62x10	355004035
67	26x7	372012000
68	3/8"GAS	373010000

2021

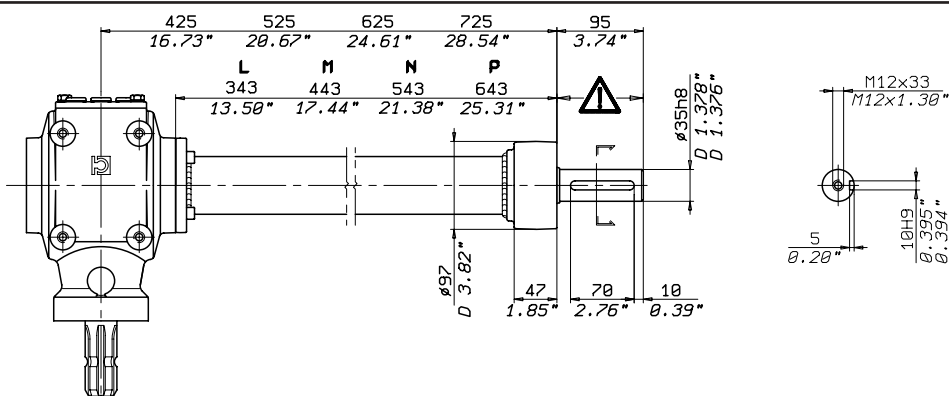
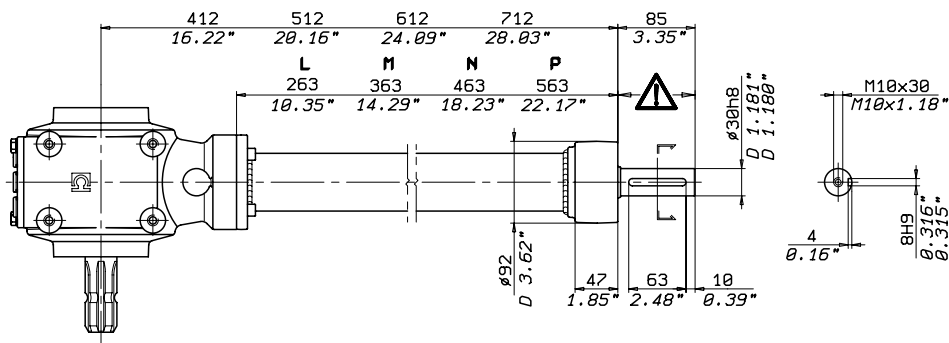
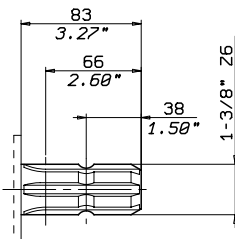
COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10			
2021208F201	295034066	448122500R			
2021208FP01	295034066	448122500R			
2021208G211	295034055	448122500R			
2021208GL11	295034055	448122500R			
2021208GP11	295034055	448122500R			
2021208R210	295034065	448122500R			
2021208RM10	295034065	448122500R			
2021254G211	295034055	448254401R			
2021300F201	295034066	448300302R			
	295406102	448300302R			
2021300F202	295034055	448300302R			
2021300G211	295034065	448300302R			
2021300R210					
	295406102	448390200R			
2021390F202		448390200R			
2021390G211	295034055	448390200R			
2021390R210	295034065	448390200R			
2021390R220	295406106				


**BONDIOLI
& PAVESI**

* **ELICOIDALE**: rotazione in ingresso oraria per montaggio F, antioraria per montaggio R - **HELICOIDAL**: input rotation clockwise for F arrangement, counter-clockwise for R arrangement - **SPIRALVERZAHNT**: Eingangs-drehrichtung im Uhrzeigersinn bei Montage F bzw. gegen den Uhrzeigersinn bei Montage R
 ****ELICOIDALE**: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangs-drehrichtung gegen den Uhrzeigersinn

2041

1

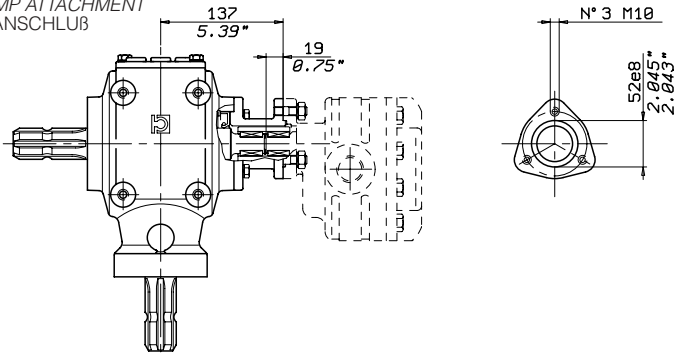


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,9 L
PESO INDICATIVO SCATOLA 15 kg

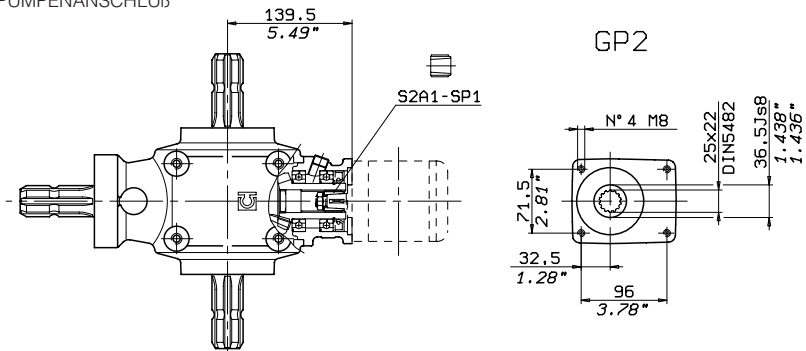
RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 30 ozs
APPROXIMATE WEIGHT 33 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,9 L
GETRIEBEGEWICHT CA. 15 kg

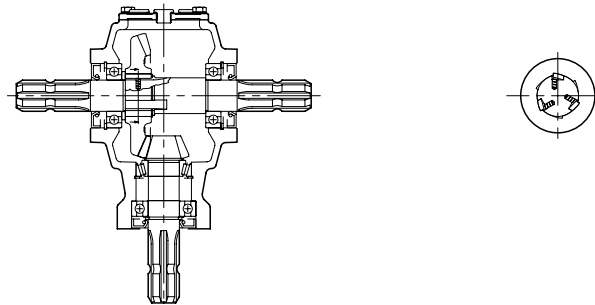
ATTACCO POMPA IN GHISA
CAST IRON GEAR PUMP ATTACHMENT
GRAUGÜß - PUMPENANSCHLUß



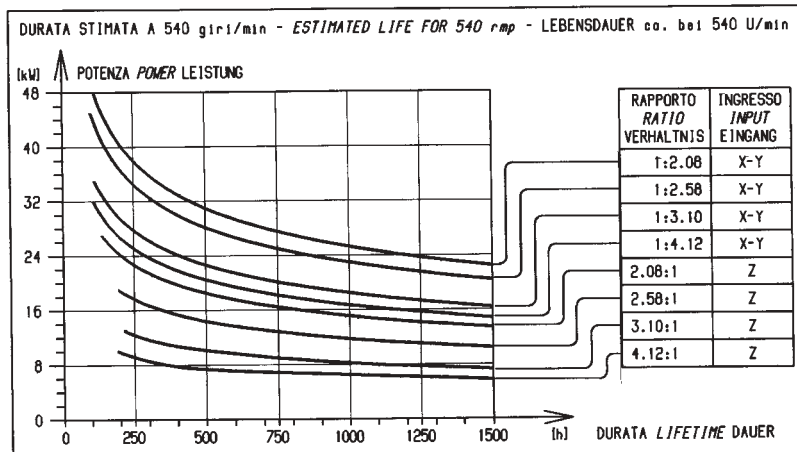
ATTACCO POMPA IN ALLUMINIO
ALUMINIUM GEAR PUMP ATTACHMENT
ALUMINIUM - PUMPENANSCHLUß



RUOTA LIBERA
OVERRUNNING CLUTCH
FREILAUF



2041



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

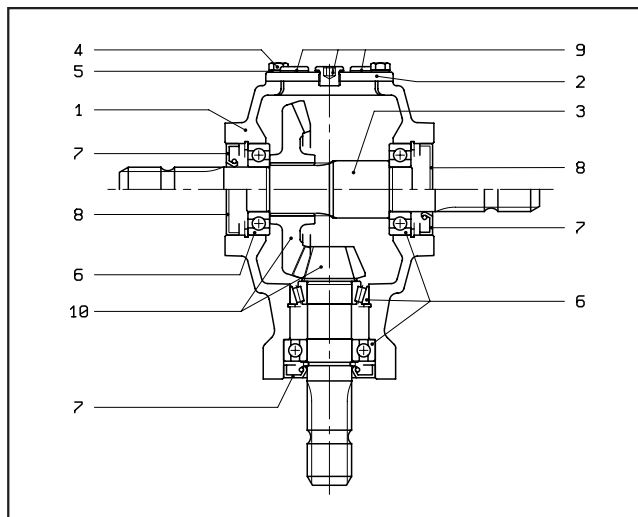
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

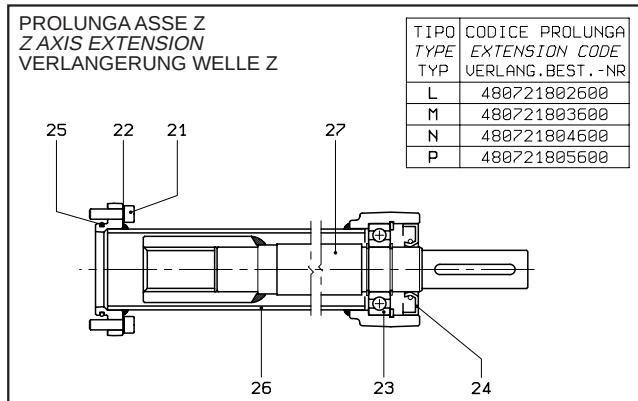
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

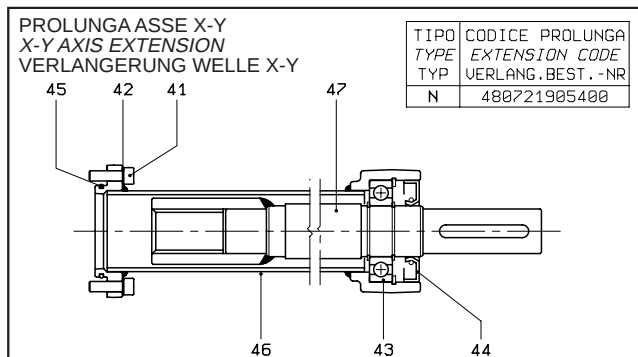
FILETTATURE THREADS-GEVINDE	2	0	4	1						
S (ISO) - G (UNC)										
TIPO - TYPE - TYP										
2041										
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE										
412 - 310 - 258 - 208										
MONTAGGIO - ARRANGEMENT - MONTAGEART										
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP) L, M, N, P (PROLUNGA - EXTENSION - VERLÄNGERUNG)	ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y									



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290240018
	UNC	290240014
2		298600070
3		★
4		319024200
5		335008002
6	6207	354101035
	32007X	354404035
7	35x72x10	355016035
8	72x10	372003000
9	3/8"GAS	373023001
10		★



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21		303002400
22		336008001
23	6207	354101035
24	35x72x10	355016035
25		358026000
26	L	580727202
	M	580727204
	N	580727205
	P	580727217
27	L	581021800
	M	581021801
	N	581021802
	P	581021813

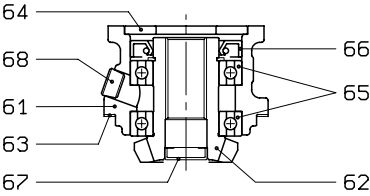


RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
41		303002400
42		336008001
43	6208	354101040
44	40x80x10	355008040
45		358026000
46	N	580728002
47	N	581021904

2041

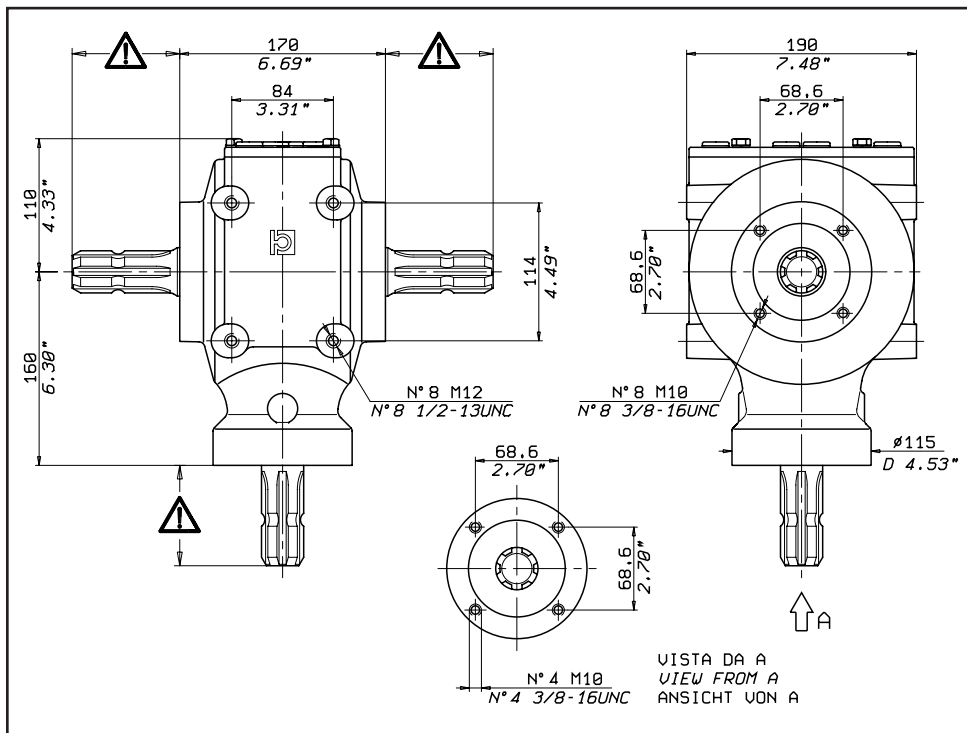
ATTACCO POMPA GP2
GP2 GEAR PUMP ATTACHMENT
GP2 PUMPENANSCHLUß

RAPP. RATIO RAPP.	CODICE CODE BEST. -NR
258	489242580R
308	489243080R
310	489243102R



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
61		290400100
62	R = 3,10	292102706
	R = 2,58	292122707
	R = 3,08	292132701
63		298300026
64		298403600
65	6008	354106040
66	40x68x10	355006040
67	26x7	372012000
68	3/8"GAS	373010000

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10			
2041208F101	295034046	448208501R			
2041208G111	295030318	448208501R			
2041208R110	295034045	448208501R			
2041258F101	295034046	448258401R			
2041258G111	295030318	448258401R			
2041258R110	295034045	448258401R			
2041258R1N0	295034045	448258401R			
2041310F101	295034046	448308300R			
2041310G111	295030318	448308300R			
2041310GL11	295030318	448308300R			
2041310GP11	295030318	448308300R			
2041310R110	295034045	448308300R			
2041310RM10	295034045	448308300R			
2041310RN10	295034045	448308300R			
2041412F101	295034046	291330800R			
2041412G111	295030318	291330800R			
2041412R110	295034045	291330800R			

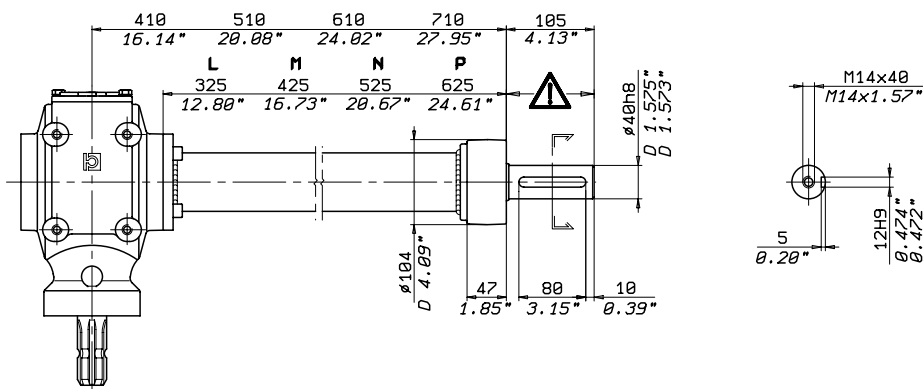
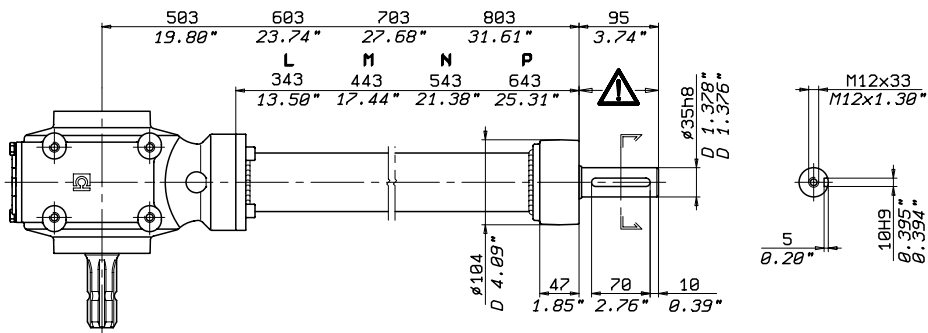
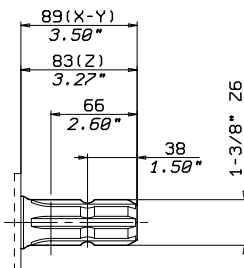


IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	INGRESSO-INPUT-EINGANG	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	* 1:5,33	540	24	32	416	3685	78	691	2878		-	533
		1000	36	49	344	3047	65	572	5330		-	
	* 1:4,50	540	29	40	520	4606	116	1024	2430		-	450
		1000	45	61	429	3793	95	843	4500		-	
	1:3,10	540	38	52	677	5988	218	1931	1674		-	310
		1000	59	80	562	4974	181	1605	3100		-	
	1:2,58	540	38	52	677	5988	262	2321	1393		-	258
		1000	59	80	562	4974	218	1928	2580		-	
	1:1,93	540	38	52	677	5988	351	3102	1042		-	193
		1000	59	80	562	4974	291	2577	1930		-	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,93:1	540	25	34	442	3915	854	7556	280		193	-
		1000	38	52	365	3233	705	6240	518		-	
	2,58:1	540	22	30	390	3454	1007	8912	209		258	-
		1000	34	46	323	2860	834	7379	388		-	
	3,10:1	540	18	24	312	2764	968	8567	174		310	-
		1000	27	37	260	2301	806	7132	323		-	
	** 4,50:1	540	11	15	195	1727	878	7772	120		450	-
		1000	17	23	162	1430	727	6436	222		-	
	** 5,33:1	540	8	11	143	1267	763	6751	101		533	-
		1000	12	17	119	1057	637	5634	188		-	

* **ELICOIDALE**: rotazione in ingresso oraria per montaggio F, antioraria per montaggio R - **HELICOIDAL**: input rotation clockwise for F arrangement, counter-clockwise for R arrangement - **SPIRALVERZAHNT**: Eingangsrehrichtung im Uhrzeigersinn bei Montage F bzw. gegen den Uhrzeigersinn bei Montage R
 ****ELICOIDALE**: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangsrehrichtung gegen den Uhrzeigersinn

2061

1

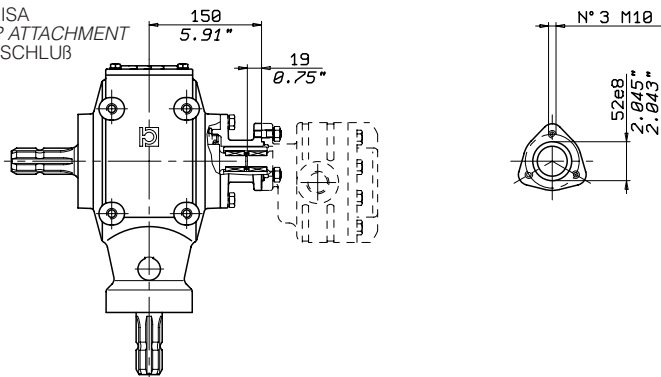


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1 L
PESO INDICATIVO SCATOLA 19 kg

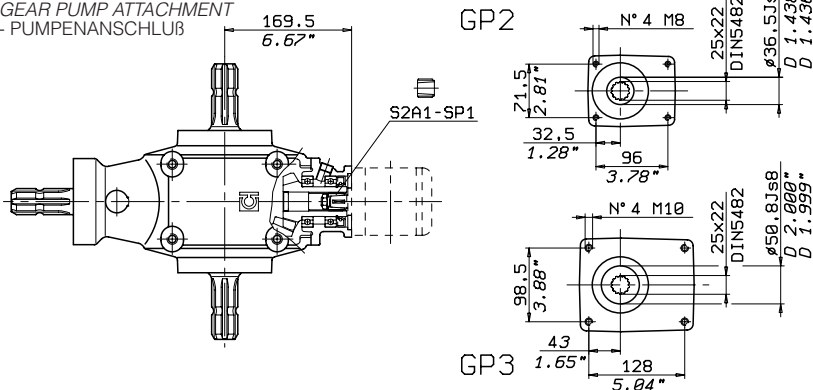
RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 34 ozs
APPROXIMATE WEIGHT 42 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1 L
GETRIEBEGEWICHT CA. 19 kg

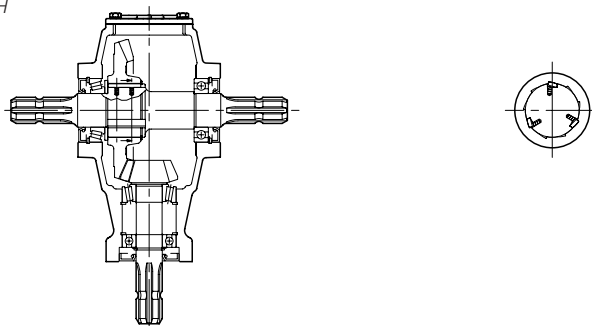
ATTACCO POMPA IN GHISA
CAST IRON GEAR PUMP ATTACHMENT
GRAUGUß - PUMPENANSCHLUß



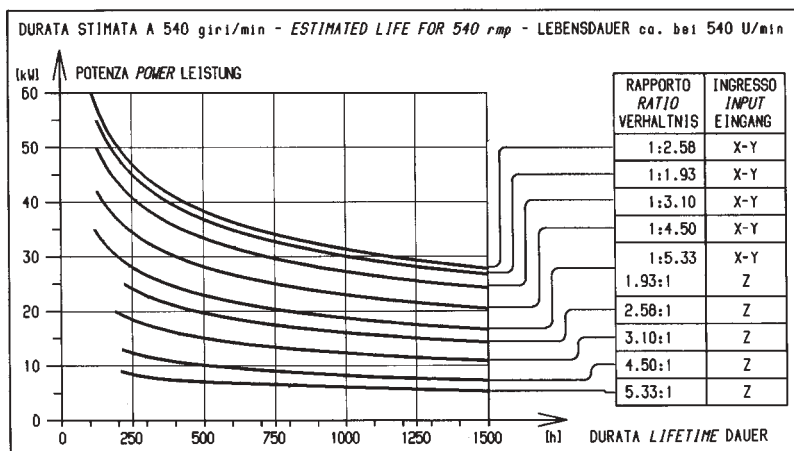
ATTACCO POMPA IN ALLUMINIO
ALUMINIUM GEAR PUMP ATTACHMENT
ALUMINIUM - PUMPENANSCHLUß



RUOTA LIBERA
OVERRUNNING CLUTCH
FREILAUF



2061



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

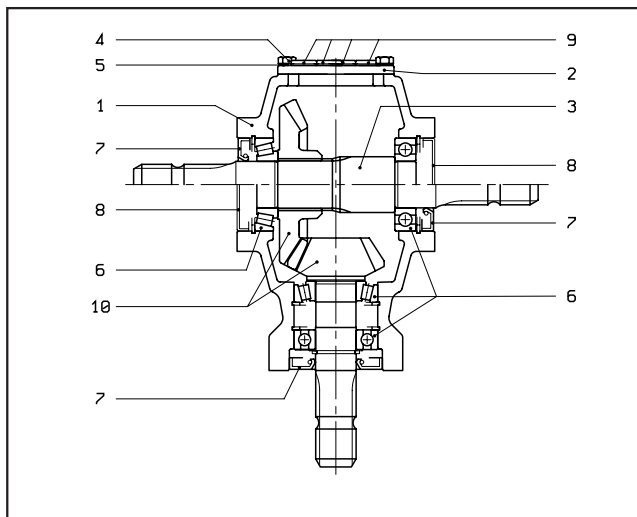
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

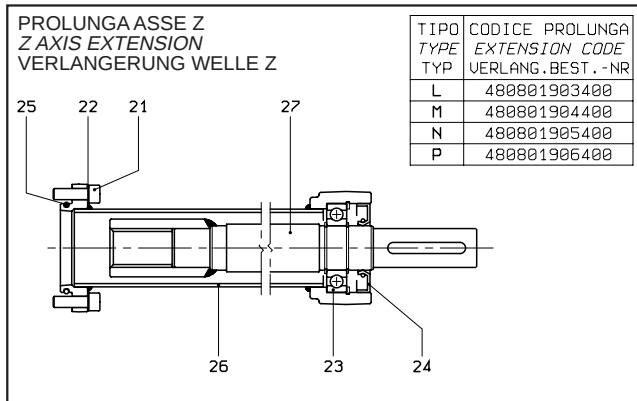
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

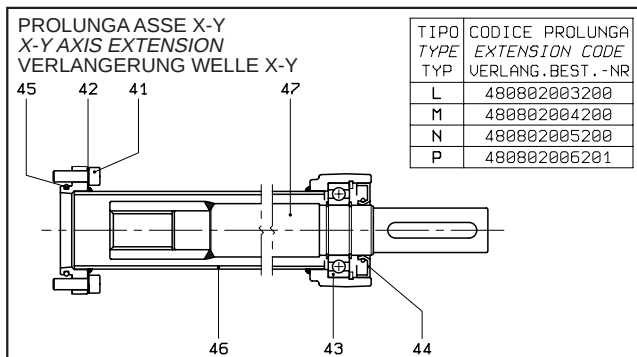
FILETTATURE THREADS-GEVINDE	2	0	6	1						
S (ISO) - G (UNC)										
TIPO - TYPE - TYP										
2061										
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE										
533 - 450 - 310 - 258 - 193										
MONTAGGIO - ARRANGEMENT - MONTAGEART										
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP) L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)	ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y									



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290260205
	ISO r=1,93	290260220
	UNC	290260203
2		29065A008
3		*
4		319024200
5		335008002
6	6207	354101035
	6208	354101040
	30207	354401035
	30208	354401040
7	40x80x10	355008040
	35x80x10	355029035
8	80x10	372005000
9	3/8"GAS	373023001
10		*



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21		303004400
22		336010001
23	6208	354101040
24	40x80x10	355008040
25		358027000
26	L	580808006
	M	580808001
	N	580808002
	P	580808021
27	L	581021901
	M	581021908
	N	581021900
	P	581021909

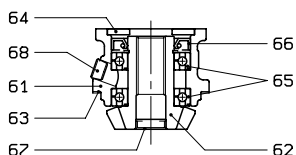


RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
41		303004400
42		336010001
43	6209	354100045
44	45x85x10	355030045
45		358027000
46	L	580808503
	M	580808529
	N	580808515
	P	580808511
47	L	581022007
	M	581022058
	N	581022022
	P	581022018

2061

ATTACCO POMPA GP2 GP2 GEAR PUMP ATTACHMENT GP2 PUMPENANSCHLUß

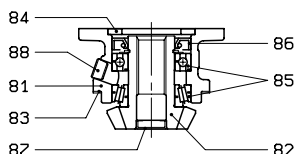
RAPP. RATIO RAPP.	CODICE CODE BEST. -NR
193	489261931R
258	489262581R
308	489263080R
310	489263102R



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
61		290260500
62	R = 1,93	292152700
	R = 2,58	292122701
	R = 3,08	292132700
	R = 3,10	292102704
63		298300025
64		298403600
65	6008	354106040
66	40x68x10	355006040
67	26x7	372012000
68	3/8"GAS	373010000

ATTACCO POMPA GP3 GP3 GEAR PUMP ATTACHMENT GP3 PUMPENANSCHLUß

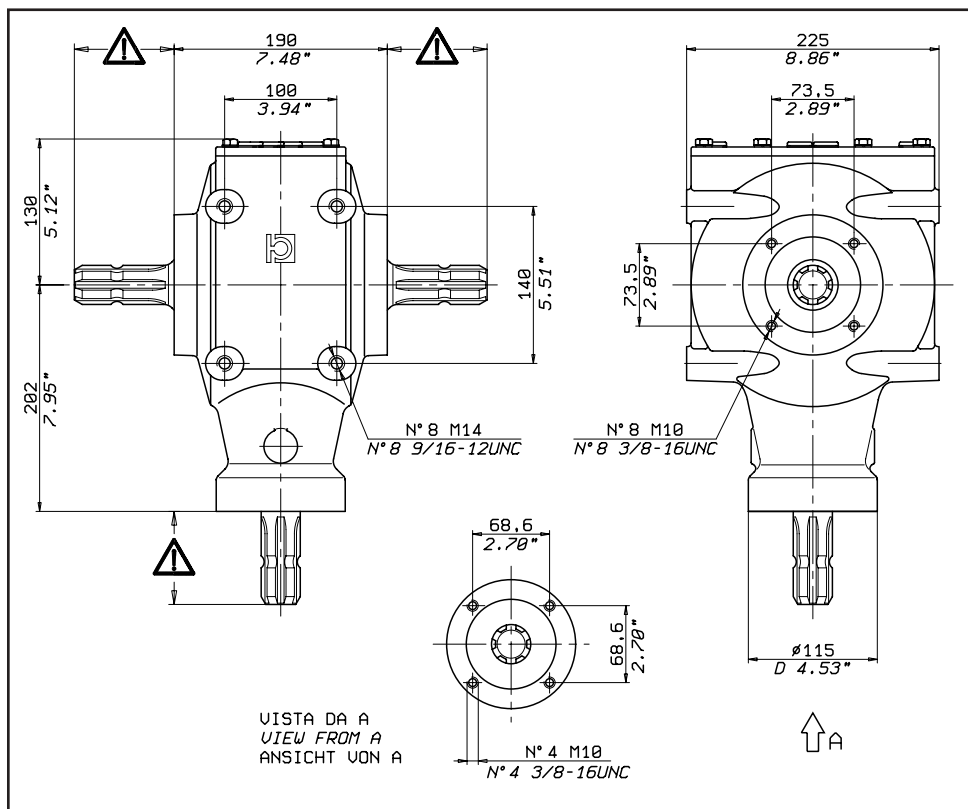
RAPP. RATIO RAPP.	CODICE CODE BEST. -NR
258	489252581R
308	489253080R
310	489253101R



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
81		290260600
82	R = 2,58	292122704
	R = 3,08	292132702
	R = 3,10	292102708
83		298300025
84		298451000
85	6008	354106040
	32008X	354400040
86	40x68x10	355006040
87	26x7	372012000
88	3/8"GAS	373010000

COD. SCATOLA REF. 3 GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10	COD. SCATOLA REF. 3 GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10
2061193F101	295034011	448193500R	2061310R110	295034006	448308407R
2061193G111	295034073	448193500R	2061310R1M0	295034006	448308407R
2061193R110	295034006	448193500R	2061310RM10	295034006	448308407R
2061193RL10	295034006	448193500R	2061310RN10	295034006	448308407R
2061193RM10	295034006	448193500R	2061310RP10	295034006	448308407R
2061193RN10	295034006	448193500R			
2061193RP10	295034006	448193500R	2061450F101	295034011	447450401R
			2061450G111	295034073	447450401R
2061258F101	295034011	448258501R	2061450R110	295034006	447450401R
2061258G111	295034073	448258501R			
2061258R110	295034006	448258501R	2061533F101	295034011	447533504R
			2061533G111	295034073	447533504R
2061310F101	295034011	448308407R	2061533R110	295034006	447533504R
2061310FL01	295034011	448308407R	2061533RP10	295034006	447533504R
2061310FP01	295034011	448308407R			
2061310G111	295034073	448308407R			
2061310GM11	295034073	448308407R			
2061310GP11	295034073	448308407R			

2071

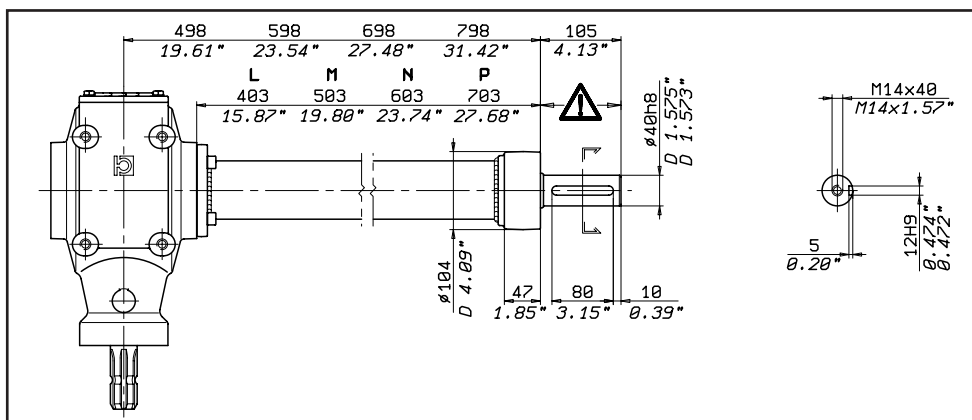
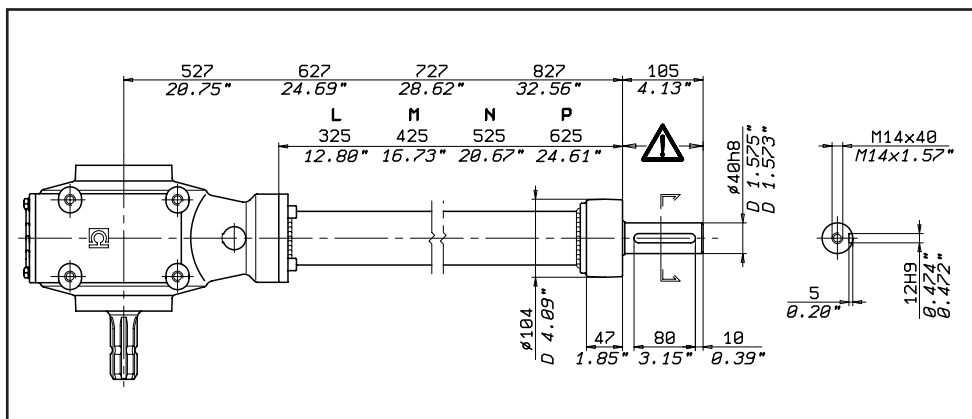
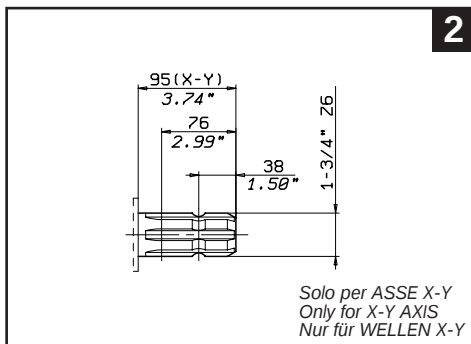
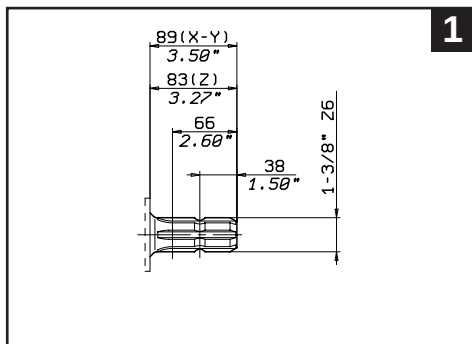


IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE	
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	Z	X-Y
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	* 1:4,11	540	45	61	794	7024	193	1709	2219	-	411
		1000	69	94	660	5845	161	1422	4110	-	
	1:3,10	540	54	73	950	8406	306	2712	1674	-	310
		1000	82	112	787	6964	254	2246	3100	-	
	1:2,58	540	60	82	1067	9442	414	3660	1393	-	258
		1000	92	125	878	7772	340	3013	2580	-	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1:1,93	540	60	82	1067	9442	553	4892	1042	-	193
		1000	92	125	878	7772	455	4027	1930	-	
	1,93:1	540	37	50	651	5757	1256	11112	280	193	-
		1000	57	77	541	4788	1044	9240	518	-	
	2,58:1	540	32	44	572	5066	1477	13071	209	258	-
		1000	50	68	478	4228	1233	10909	388	-	
	3,10:1	540	24	33	429	3800	1331	11780	174	310	-
		1000	37	51	358	3171	1111	9831	323	-	
	** 4,11:1	540	18	25	325	2879	1337	11831	131	411	-
		1000	28	38	267	2363	1097	9711	243	-	

* **ELICOIDALE:** rotazione in ingresso oraria per montaggio F, antioraria per montaggio R - **HELICOIDAL:** input rotation clockwise for F arrangement, counter-clockwise for R arrangement - **SPIRALVERZAHNT:** Eingangsrehrichtung im Uhrzeigersinn bei Montage F bzw. gegen den Uhrzeigersinn bei Montage R

** **ELICOIDALE:** rotazione in ingresso antioraria - **HELICOIDAL:** input rotation counter-clockwise - **SPIRALVERZAHNT:** Eingangsrehrichtung gegen den Uhrzeigersinn

2071

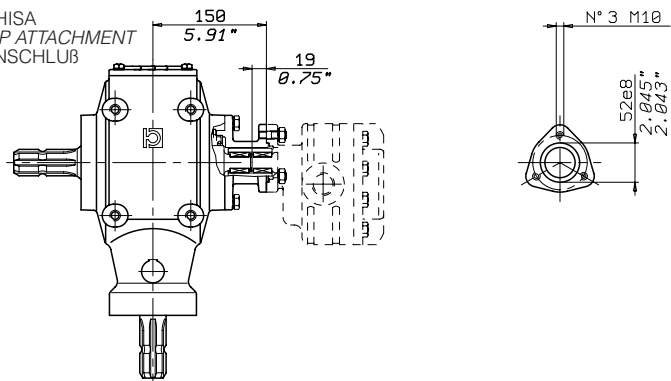


OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,8 L
PESO INDICATIVO SCATOLA 28 kg

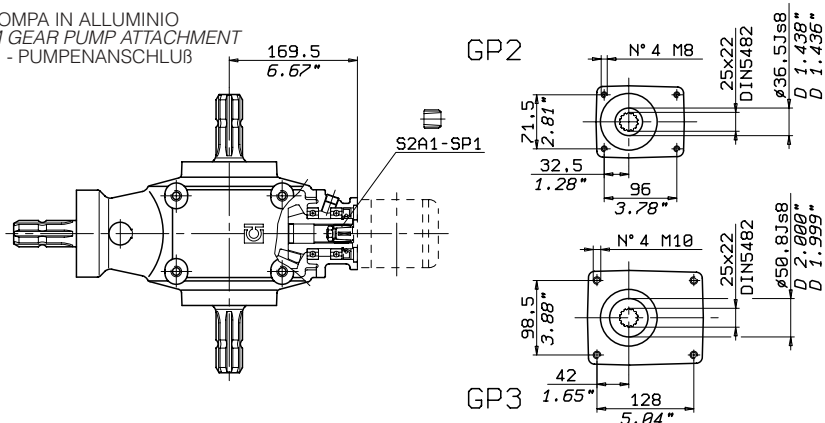
RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 61 ozs
APPROXIMATE WEIGHT 61 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,8 L
GETRIEBEGEWICHT CA. 28 kg

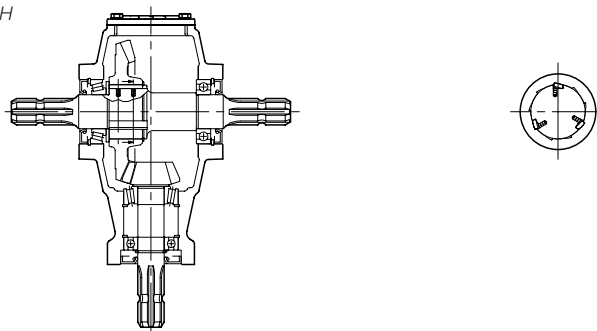
ATTACCO POMPA IN GHISA
CAST IRON GEAR PUMP ATTACHMENT
GRAUGUß - PUMPENANSCHLUß



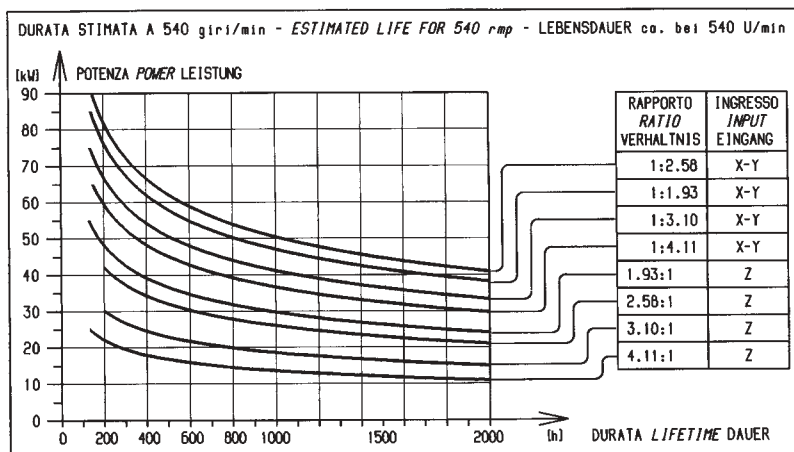
ATTACCO POMPA IN ALLUMINIO
ALUMINIUM GEAR PUMP ATTACHMENT
ALUMINIUM - PUMPENANSCHLUß



RUOTA LIBERA
OVERRUNNING CLUTCH
FREILAUF



2071



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

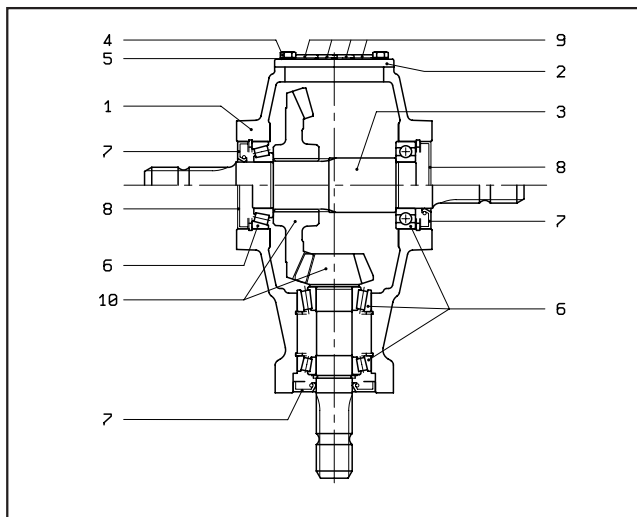
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

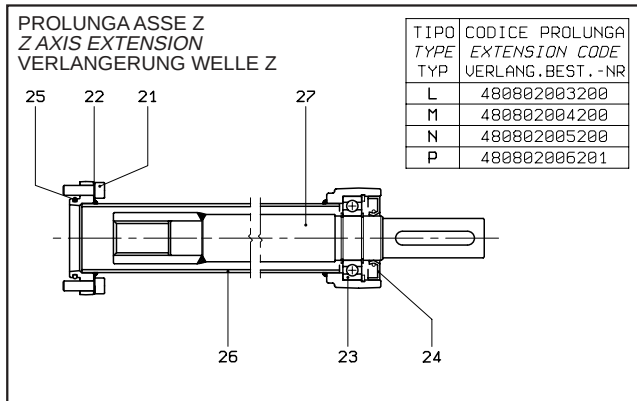
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

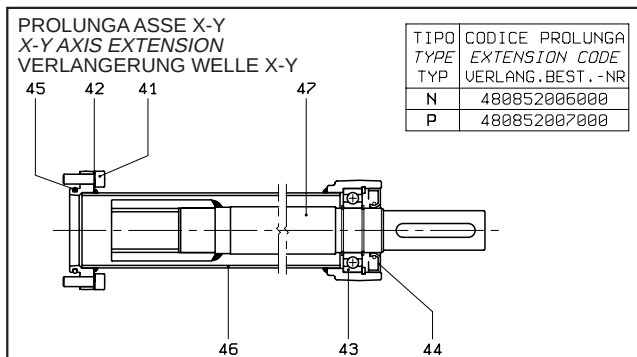
FILETTATURE THREADS - GEVINDE S (ISO) - G (UNC)	2	0	7	1							
TIPO - TYPE - TYP 2071											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 411 - 310 - 258 - 193											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1 (TIPO DI ALBERO - SHAFT - WELLENTYP) L, M, N, P (PROLUNGA - EXTENSION - VERLÄNGERUNG)					ASSE Z - Z AXIS - WELLE Z ASSE X - X AXIS - WELLE X ASSE Y - Y AXIS - WELLE Y						



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290270119
	UNC	290270116
2		29075A003
3		★
4		319024200
5		335008002
6	6209	354100045
	30209	354400045
	30207	354401035
	32207	354407035
7	45x85x10	355030045
	35x80x10	355029035
8	85x10	372006000
9	3/8"GAS	373023001
10		★



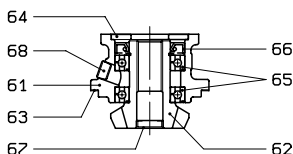
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21		303004400
22		336010001
23	6209	354100045
24	45x85x10	355030045
25		358027000
26	L	580808503
	M	580808529
	N	580808515
	P	580808511
27	L	581022007
	M	581022058
	N	581022022
	P	581022018



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
41		303004400
42		336010001
43	6209	354100045
44	45x85x10	355030045
45		358028000
46	N	580858514
	P	580858508
47	N	581042007
	P	581042004

2071

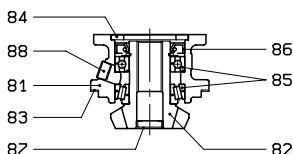
ATTACCO POMPA GP2 GP2 GEAR PUMP ATTACHMENT GP2 PUMPENANSCHLUß



RAPP. RATIO RAPP.	CODICE CODE BEST. - NR
193	489281931R
258	489282581R
308	489283080R
310	489283102R

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
61		290700100
62	R = 1,93	292152701
	R = 2,58	292122703
	R = 3,08	292132703
	R = 3,10	292102707
63		298300027
64		298403600
65	6008	354106040
66	40x68x10	355006040
67	26x7	372012000
68	3/8"GAS	373010000

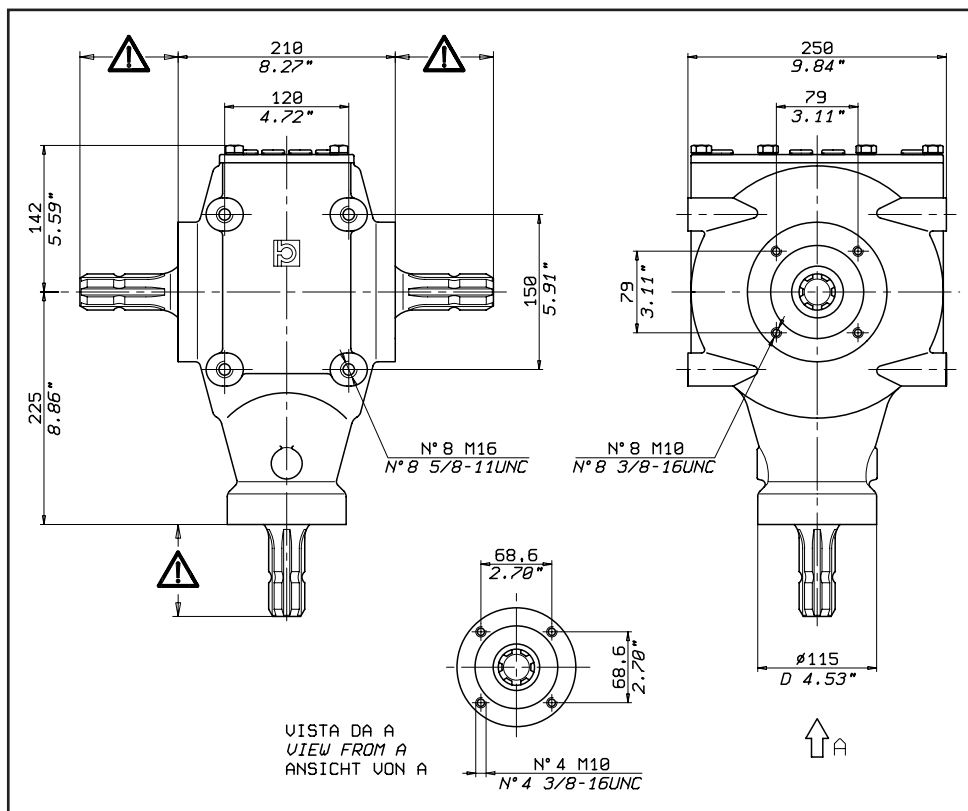
ATTACCO POMPA GP3 GP3 GEAR PUMP ATTACHMENT GP3 PUMPENANSCHLUß



RAPP. RATIO RAPP.	CODICE CODE BEST. - NR
193	489281932R
258	489282582R
308	489283081R
310	489283103R

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
81		290700200
82	R = 3,08	292132703
	R = 3,10	292102707
83		298300027
84		298451000
85	6008	354106040
	32008X	354400040
86	40x68x10	355006040
87	26x7	372012000
88	3/8"GAS	373010000

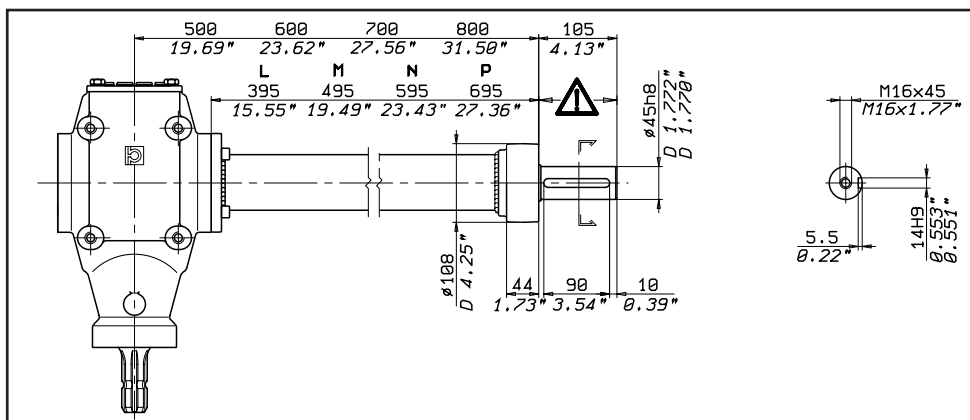
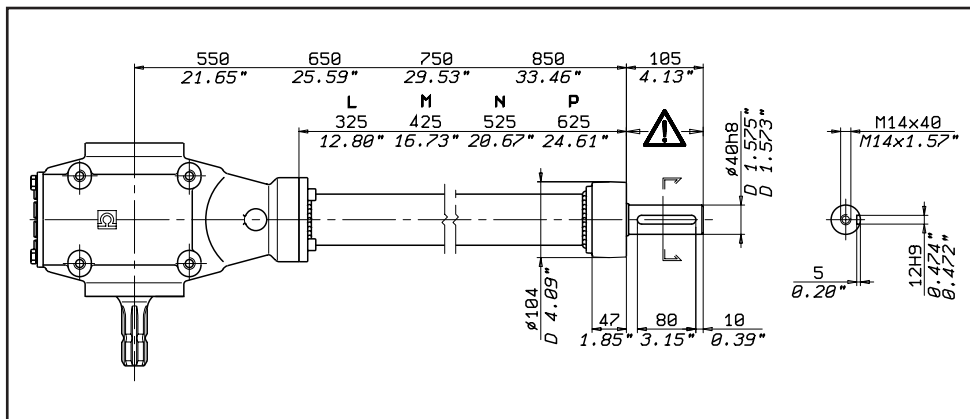
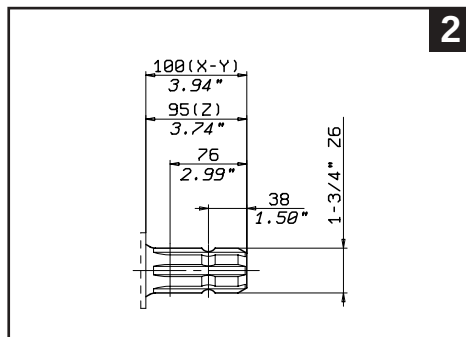
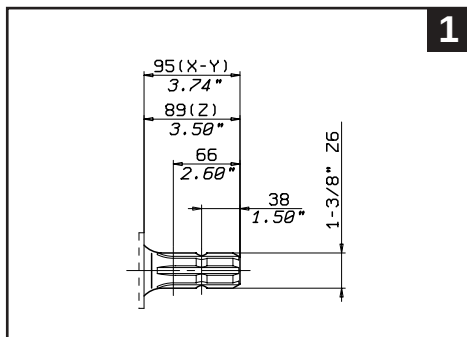
COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10	COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10
2071193F101	295034043	448193501R	2071310GP11	295030317	448308401R
2071193G111	295030317	448193501R	2071310R110	295034042	448308401R
2071193GP11	295030317	448193501R	2071310R120	295044021	448308401R
2071193R110	295034042	448193501R	2071310RL10	295034042	448308401R
2071193RL10	295034042	448193501R	2071310RM10	295034042	448308401R
2071193R120	295044021	448193501R	2071310RN10	295034042	448308401R
2071193RN10	295034042	448193501R	2071310RP10	295034042	448308401R
2071193RP10	295034042	448193501R			
			2071411F101	295034043	447411505R
2071258F101	295034043	448258601R	2071411G111	295030317	447411505R
2071258G111	295030317	448258601R	2071411G122	295040408	447411505R
2071258G122	295040408	448258601R	2071411R110	295034042	447411505R
2071258GN22	295040408	448258601R	2071411R120	295044021	447411505R
2071258R110	295034042	448258601R			
2071258RP10	295034042	448258601R			
2071310F101	295034043	448308401R			
2071310G111	295030317	448308401R			



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	Z	X-Y	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	* 1:4,11	540	66	90	1171	10363	285	2521	2219	-	411	
		1000	101	138	970	8581	236	2088	4110	-	411	
	1:3,10	540	88	120	1561	13818	504	4457	1674	-	310	
		1000	136	185	1300	11503	419	3711	3100	-	310	
	1:2,46	540	88	120	1561	13818	635	5617	1328	-	246	
		1000	136	185	1300	11503	528	4676	2460	-	246	
	1:1,93	540	107	145	1887	16696	978	8651	1042	-	193	
		1000	162	220	1546	13679	801	7088	1930	-	193	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,93:1	540	66	90	1171	10363	2260	20001	280	193	-	
		1000	99	135	948	8394	1831	16201	518	-	-	
	2,46:1	540	46	63	820	7254	2016	17845	220	246	-	
		1000	70	95	667	5907	1642	14531	407	-	-	
	3,10:1	540	40	55	716	6333	2218	19633	174	310	-	
		1000	62	85	597	5285	1851	16384	323	-	-	
	** 4,11:1	540	27	37	481	4260	1979	17510	131	411	-	
		1000	40	55	386	3420	1588	14056	243	-	-	

* **ELICOIDALE**: rotazione in ingresso oraria per montaggio F, antioraria per montaggio R - **HELICOIDAL**: input rotation clockwise for F arrangement, counter-clockwise for R arrangement - **SPIRALVERZAHNT**: Eingangsrehrichtung im Uhrzeigersinn bei Montage F bzw. gegen den Uhrzeigersinn bei Montage R
 ****ELICOIDALE**: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangsrehrichtung gegen den Uhrzeigersinn

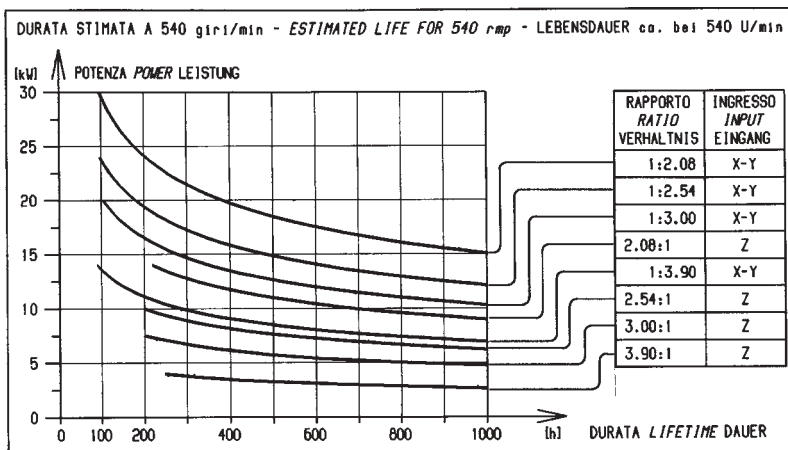
2081



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 2.5 L
PESO INDICATIVO SCATOLA 35 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 85 ozs
APPROXIMATE WEIGHT 77 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 2.5 L
GETRIEBEGEWICHT CA. 35 kg



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

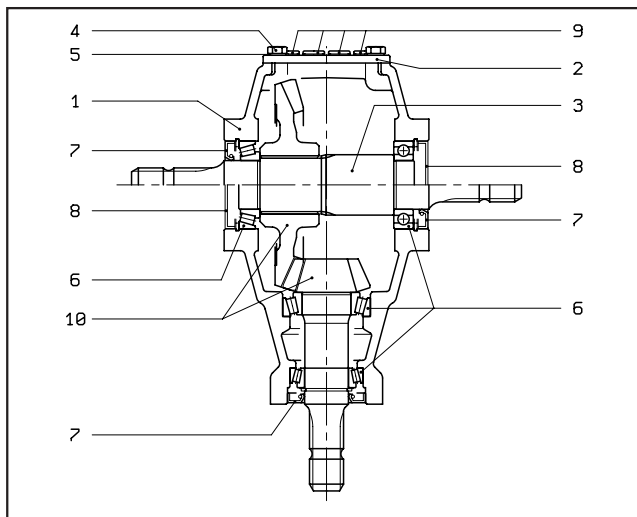
Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

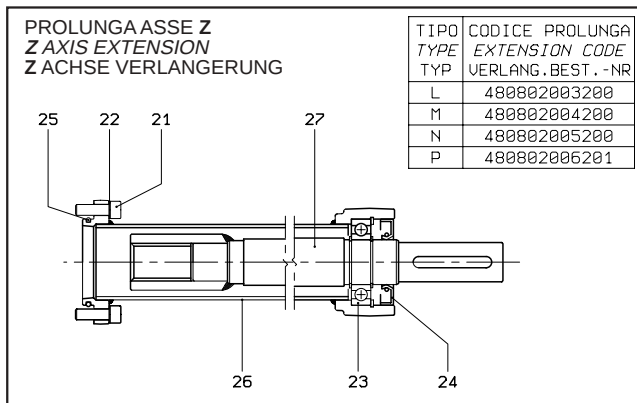
Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

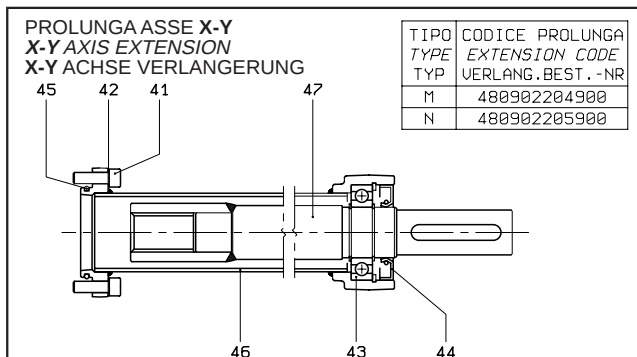
FILETTATURE THREADS-GEVINDE S (ISO) - G (UNC)	2	0	8	1							
TIPO - TYPE - TYP 2081											
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 411 - 310 - 246 - 193											
MONTAGGIO - ARRANGEMENT - MONTAGEART											
0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE) 1,2 (TIPO DI ALBERO - SHAFT - WELLENTYP) L,M,N,P (PROLUNGA - EXTENSION - VERLÄNGERUNG)					ASSE Z - Z AXIS - WELLE Z						
								ASSE X - X AXIS - WELLE X			
								ASSE Y - Y AXIS - WELLE Y			



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		*
2		29085A004
3		*
4		319001220
5		335010002
6	6210	354103050
	30210	354400050
	32210	354401050
	33210	354402050
	32009	354407045
7	50x90x10	355020050
	45x80x10	355016045
8	90x10	372007000
9	3/8" GAS	373023001
10		*



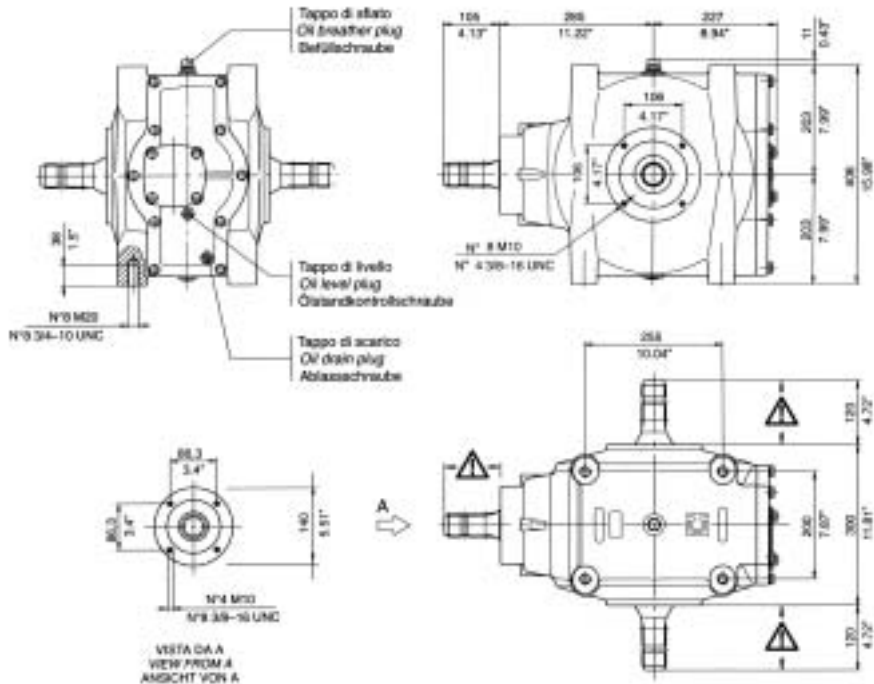
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21		303004400
22		336010001
23	6209	354100045
24	45x85x10	355030045
25		358027000
26	L	580808503
	M	580808529
	N	580808515
	P	580808511
27	L	581022007
	M	581022058
	N	581022022
	P	581161806
		581022016



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
41		303004400
42		336010001
43	6210	354103050
44	50x90x10	355020050
45		358029000
46	M	580909005
	N	580909006
47	M	581042202
	N	581042203

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 ISO REF. 1 ISO BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 3 REF. 3 BEZ. 3	RIF. 10 REF. 10 BEZ. 10
2081193F101	290280200	290280212	295034022	448193601R
2081193F102	290280200	290280212	295044007	448193601R
2081193F10M	290280200	290280212	295044007	448193601R
2081193F201	290280200	290280212	295034022	448193602R
2081193F202	290280200	290280212	295044007	448193602R
2081193G111	290280200	290280212	295030304	448193601R
2081193G122	290280200	290280212	295040402	448193601R
2081193G211	290280200	290280212	295030304	448193602R
2081193G222	290280200	290280212	295040402	448193602R
2081193R110	290280200	290280212	295034021	448193601R
2081193R120	290280200	290280212	295044006	448193601R
2081193R210	290280200	290280212	295034021	448193602R
2081193R220	290280200	290280212	295044006	448193602R
2081193RM10	290280200	290280212	295034021	448193601R
2081246F101	290280000	290280011	295034022	448246600R
2081246F102	290280000	290280011	295044007	448246600R
2081246F201	290280000	290280011	295034022	448246601R
2081246F202	290280000	290280011	295044007	448246601R
2081246G111	290280000	290280011	295030304	448246600R
2081246G122	290280000	290280011	295040402	448246600R
2081246G211	290280000	290280011	295030304	448246601R
2081246G222	290280000	290280011	295040402	448246601R
2081246R110	290280000	290280011	295034021	448246600R
2081246R120	290280000	290280011	295044006	448246600R
2081246R210	290280000	290280011	295034021	448246601R
2081246R220	290280000	290280011	295044006	448246601R
2081310F101	290280000	290280011	295034022	448308501R
2081310F102	290280000	290280011	295044007	448308501R
2081310F201	290280000	290280011	295034022	448308504R
2081310F202	290280000	290280011	295044007	448308504R
2081310G111	290280000	290280011	295030304	448308501R
2081310G122	290280000	290280011	295040402	448308501R
2081310G211	290280000	290280011	295030304	448308504R
2081310G222	290280000	290280011	295040402	448308504R
2081310R110	290280000	290280011	295034021	448308501R
2081310R120	290280000	290280011	295044006	448308501R
2081310R210	290280000	290280011	295034021	448308504R
2081310R220	290280000	290280011	295044006	448308504R
2081411F101	290280000	290280011	295034022	447411500R
2081411F102	290280000	290280011	295044007	447411500R
2081411G111	290280000	290280011	295030304	447411500R
2081411G122	290280000	290280011	295040402	447411500R
2081411R110	290280000	290280011	295034021	447411500R
2081411R120	290280000	290280011	295044006	447411500R
2081411R220	290280000	290280011	295044006	447411501R
2081411R1N0	290280000	290280011	295044006	447411500R

2201



ATTENZIONE!  Gli alberi contrassegnati non sono protetti. Ogni componente in rotazione deve avere una protezione specifica o integrata con la macchina. Bondioli & Pavesi declina ogni responsabilità in caso le idonee protezioni non siano previste e mantenute efficienti

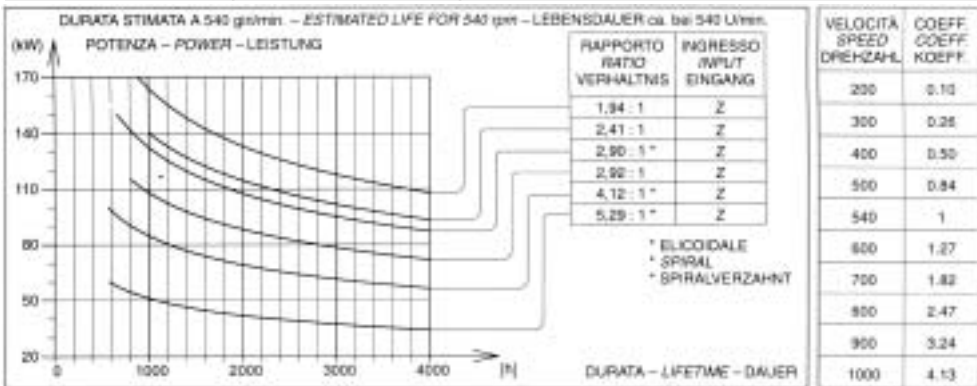
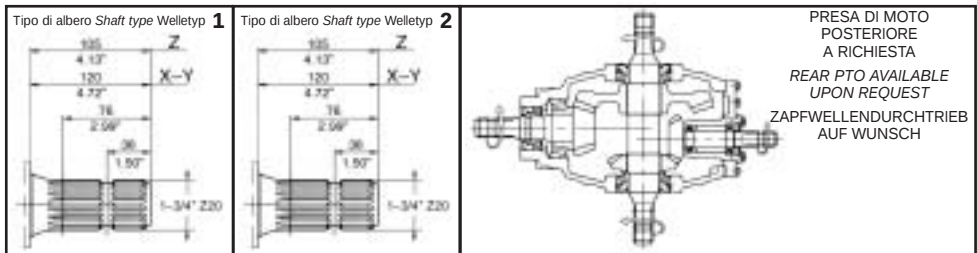
WARNING!  Rotating shafts marked are not shielded. Any shaft and coupling not guarded by location must be shielded by an interactive guarding system. Bondioli & Pavesi declines responsibility if proper guards are not provided and maintained.

ACHTUNG!  Die mit gekennzeichneten Wellen sind freiliegend. Jedes drehende Bauteil muss einen spezifischen oder in die Maschine integrierten Schutz haben. Bei nicht geeigneten oder unzureichend instandgehaltenen Schutzvorrichtungen lehnt Bondioli & Pavesi jegliche Verantwortung ab.

IMPIEGIO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA X-Y OUTPUT X-Y AUSGANG X-Y		CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,94:1	540	147	200	2600	23000	5044	44640	278	194
		1000	220	300	2100	18590	5061	44795	515	
	2,41:1	540	120	162	2100	18590	5061	44795	224	241
		1000	184	250	1755	15530	4230	37440	415	
	2,92:1	540	96	130	1690	14960	4935	43680	185	292
		1000	147	200	1400	12390	4088	36183	342	
	* 2,90:1	540	120	162	2100	18590	6090	53900	186	290
		1000	184	250	1755	15530	5089	45043	345	
	* 4,12:1	540	74	100	1300	11500	5356	47406	131	412
		1000	114	155	1090	9640	4490	39740	243	
	* 5,29:1	540	46	62	800	7080	4232	37457	102	529
		1000	66	90	630	5570	3333	29500	189	

ELICOIDALE: rotazione in
ingresso antioraria
SPIRAL: counter-clockwise
rotation of the input shaft
spiraldrehzeit:
Eingangsdrehrichtung
gegen den Uhrzeigersinn





Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA CODES BESTELLNUMMER

FILETTATURE THREADS-GEVINDE

S (ISO) - G (UNC)

TIPO - TYPE - TYP

2201

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

529 - 412 - 290 - 292 - 241 - 194

MONTAGGIO - ARRANGEMENT - MONTAGEART

X Z Y

Y Z X

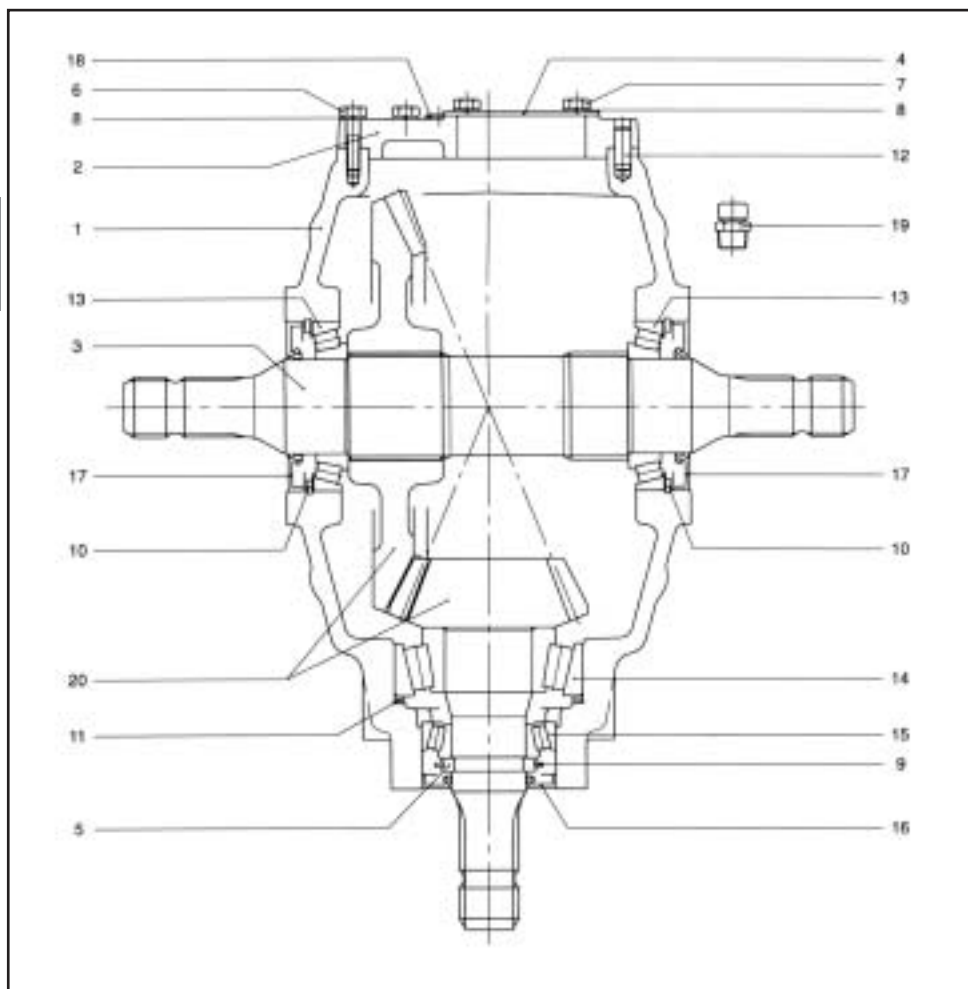
X Z Y Y Z X

0 (SENZA ALBERO - WITHOUT SHAFT - OHNE WELLE)
1,2 (TIPO DI ALBERO - SHAFT - WELLENTYP)

ASSE Z - Z AXIS - WELLE Z
ASSE X - X AXIS - WELLE X
ASSE Y - Y AXIS - WELLE Y

OLIO CONSIGLIATO	SAE 90 EP	RECOMMENDED OIL GRADE	SAE 90 EP	EMPFOHLENES ÖL	SAE 90 EP
QUANTITA' OLIO INDICATIVA	6 L	APPROXIMATE OIL QUANTITY	200 ozs	MENGE ÖL CA.	6 L
PESO INDICATIVO SCATOLA	115 kg	APPROXIMATE WEIGHT	253 lbs	GETRIEBEGEWICHT CA.	115 kg

2201



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290290803
	UNC	290290804
2		290290901
3	1 3/4" Z6	295040411
	1 3/4" Z6R=1,94	295044044
	1 3/4" Z20	295383807
4		298600039
5		298645100
6	M10x40 UNI 5773	317018200
7	M10x20 UNI 5739	319002200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8		335010001
9	70x2,5 DIN471/1	337001070
10	125x4 DIN472/1	338000125
11		340125000
12	12x30 DIN7979	346012000
13	30214	354404070
14	32313	354406065
	32313B	359405065
15	32211	354408055
16		355006055

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
17		355006070
18	1/2" GAS DIN906	373043000
19	1/2" GAS	373044000
20	1 3/4" Z6 R=4,12:1	447412900
	1 3/4" Z6 R=2,90:1	447290901
	1 3/4" Z6 R=2,92:1	448293700
	1 3/4" Z20 R=2,92:1	448293701
	1 3/4" Z6 R=2,41:1	448241700
	1 3/4" Z20 R=2,41:1	448241701
	1 3/4" Z20 R=1,94:1	448194900

**SERIE
SERIES 2002 - 2003**

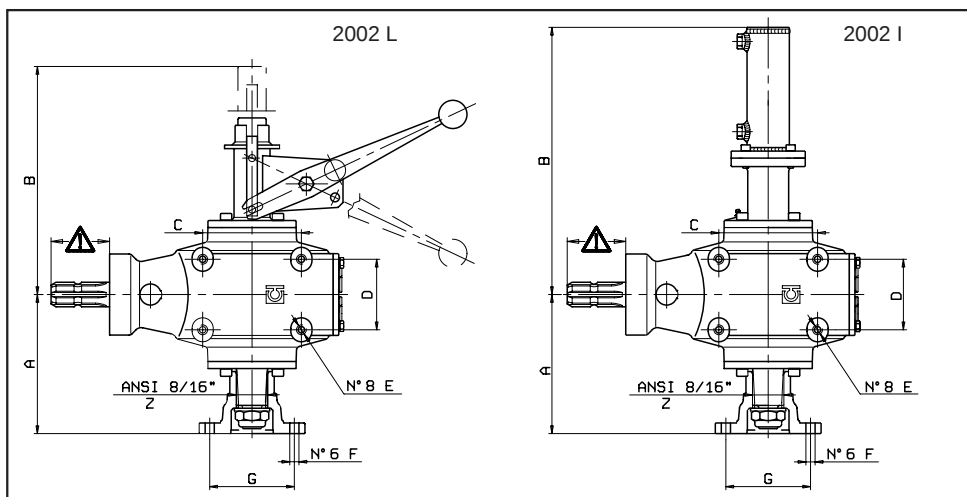


**BONDIOLI
& PAVESI**

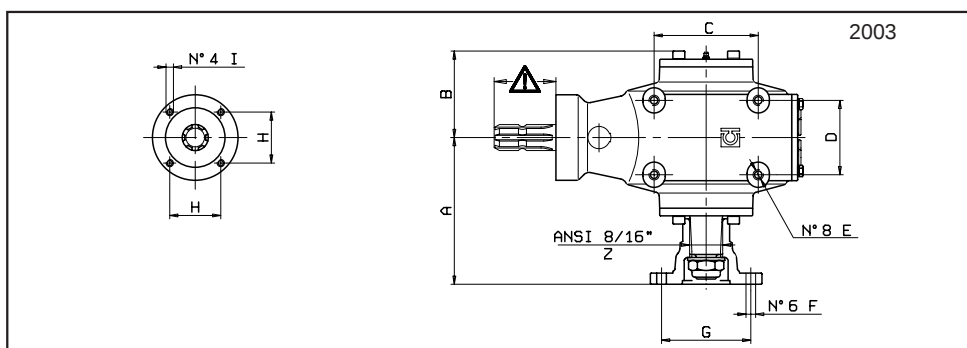


2002-2003





Tipo Type Typ	A	B		C	D	E	F	G	H	I	Z
		2002 L	2002 I								
S2072	197	324	379	140	100	M14	13	120	68,6	M10	13
G2072	7,76"	12,76"	14,92"	5,51"	3,94"	9/16-12UNC	0,51"	4,72"	2,70"	3/8-16UNC	
S2082	214	346	393	150	120	M16	13	120	68,6	M10	15
G2082	8,43"	13,62"	15,47"	5,91"	4,72"	5/8-11UNC	0,51"	4,72"	2,70"	3/8-16UNC	



Tipo Type Typ	A	B	C	D	E	F	G	H	I	Z
S2063	181	106	114	84	M12	13	120	68,6	M10	12
G2063	7,13"	4,17"	4,49"	3,31"	1/2-13UNC	0,51"	4,72"	2,70"	3/8-16UNC	
S2073	197	116	140	100	M14	13	120	68,6	M10	13
G2073	7,76"	4,57"	5,51"	3,94"	9/16-12UNC	0,51"	4,72"	2,70"	3/8-16UNC	
S2083	214	125	150	120	M16	13	120	68,6	M10	15
G2083	8,43"	4,92"	5,91"	4,72"	5/8-11UNC	0,51"	4,72"	2,70"	3/8-16UNC	

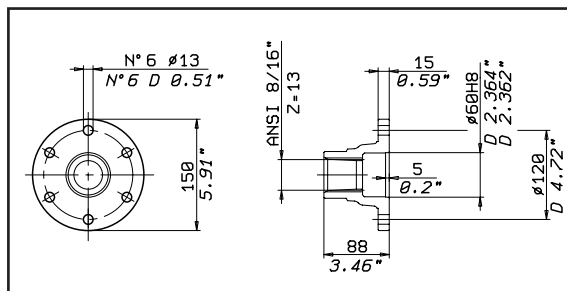
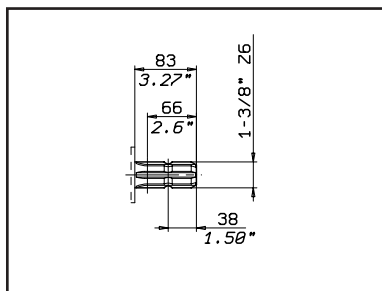
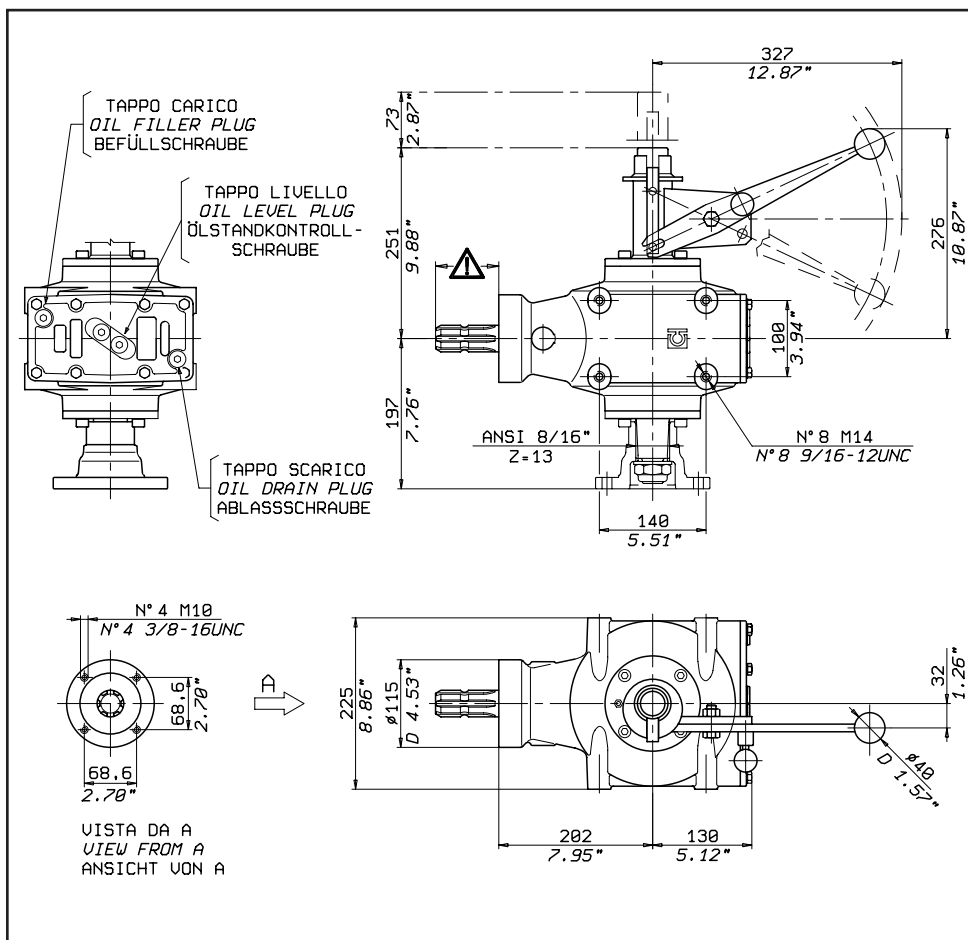
2002 - 2003

- SCATOLE PER TRIVELLA:
CON INVERTITORE (2002)
SENZA INVERTITORE (2003)
- FLANGIA DI ACCOPPIAMENTO
ALL'ATTREZZO IN ACCIAIO
BONIFICATO, MONTATA SULL'ALBERO
MEDIANTE UN PROFILO SCANALATO
CONICO ANSI 8/16"
- ALBERO IN USCITA IN ACCIAIO
CEMENTATO E TEMPRATO
SUPPORTATO DA CUSCINETTI A RULLI
CONICI.
- INVERTITORE (SERIE 2002) CON
COMANDO A LEVA O IDRAULICO.
- RAPPORTI DA 1,93:1 FINO A 4,50:1
IN RIDUZIONE.
- SCATOLE MONOBLOCCO IN GHISA.
- VERNICIATURA INTERNA ED
ESTERNA, ESSICAZIONE IN FORNO,
RESISTENZA ALLA CORROSIONE
SECONDO NORMA ASTM B 117-79,
RESISTENZA ALL'OLIO
SAE 90 EP FINO A 125°C (260°F).
- COPPIE CONICHE IN ACCIAIO
CEMENTATO E TEMPRATO.
DENTATURA GLEASON DIRITTA FINO
AL RAPPORTO 3,10:1, ELICOIDALE
PER RAPPORTI SUPERIORI.
- ALBERI IN ACCIAIO CEMENTATO E
TEMPRATO.
- ANELLI DI TENUTA CON LABBRO
PARAPOLVERE.
- CUSCINETTI DI QUALITÀ PER
ELEVATA AFFIDABILITÀ (L10).
- POST HOLE DIGGER GEARBOXES
WITH OUTPUT INVERTER (2002) AND
WITHOUT OUTPUT INVERTER (2003).
- AUGER FLANGE MADE OF HIGH
STRENGTH HEAT TREATED STEEL,
COUPLED TO THE OUTPUT SHAFT
BY A TAPERED SPLINE, (ANSI 8/16).
- OUTPUT SHAFT IS HIGH STRENGTH
, CASE HARDENED STEEL
SUPPORTED BY HEAVY DUTY TAPER
ROLLER BEARINGS.
- OUTPUT INVERTER (SERIES 2002)
WITH MANUAL OR HYDRAULIC
CONTROL.
- REDUCTION RATIOS FROM 1,93:1 TO
4,50:1.
- ONE PIECE CAST IRON CASE MAX
STRENGTH PRECISE POSITIONING
OF INTERNAL COMPONENTS.
- INNER AND OUTER DIPPING AND
OVEN DRYING AT HIGH
TEMPERATURE.
- CORROSION RESISTANCE TO ASTM
B 117-79. CAPABLE OF WORKING UP
TO 125°C (260°F) WITH SAE 90 EP.
- BEVEL GEARS ARE CASE
HARDENED STEEL. GLEASON
STRAIGHT CUT TEETH FOR RATIOS
UP TO 3.10:1, HIGHER RATIOS ARE
SPIRAL BEVEL.
- HIGH STRENGTH CASE HARDENED
SHAFTS.
- SEAL RINGS WITH ANTIDUST LIP.
- QUALITY BEARINGS FOR HIGH
RELIABILITY (L10).
- GETRIEBE FÜR ERDBOHRER MIT
UMKEHRSCHALTUNG (2002) BZW.
OHNE UMKEHRSCHALTUNG (2003).
- VERBINDUNGSFLANSCH IN
VERGÜTETEM STAHL, AUF DER
AUSGANGSWELLE MITTELS,
KONISCHER VERZÄHNUNG NACH
ANSI 8/16" MONTIERT.
- AUSGANGSWELLE IN
EINSATZGEHÄRTETEM STAHL,
BEIDSEITIG KEGELROLLEN-
GELAGERT.
- UMKEHRSCHALTUNG (2002)
MECHANISCHER ODER
HYDRAULISCHER BETÄTIGUNG.
- UNTERSETZUNGSVERHÄLTNISSE VON
1,93:1 BIS 4,50:1.
- GUß-GETRIEBEGEHÄUSE IN EINEM
STÜCK.
- GEHÄUSE TAUCHGRUNDIERT, IM
EINBRENNVERFAHREN GETROCKNET.
KORROSIONSBESTÄNDIG GEMÄß
NORM ASTM B 117-79.
- HITZEBESTÄNDIG BEI SAE 90 EP-ÖL
BIS 125°C(260°F).
- KEGELRÄDER EINSATZGEHÄRTET, BEI
I=3,10:1, MIT GLEASON -
GERADVERZÄHNUNG, BEI
STÄRKEREN
UNTERSETZUNGSVERHÄLTNISS MIT
SPIRALVERZÄHNUNG.
- WELLEN IN EINSATZGEHÄRTETEM
STAHL.
- WELLENDICHRINGE MIT
STAUBSCHUTZLIPPE.
- QUALITÄTS-WÄLZLAGER FÜR
HÖCHSTE ZUVERLÄSSIGKEIT (L10).

POTENZA a 540 giri/min. - POWER at 540 r.p.m. - LEISTUNG bei 540 U/min.

	2063		2072		2073		2082		2083		
	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	
1,93:1	25	34									1,93:1
2,46:1							46	63	46	63	2,46:1
2,58:1	22	30	32	44	32	44					2,58:1
3,10:1	18	24	24	33	24	33	40	55	40	55	3,10:1
4,11:1			18	25	18	25	27	37	27	37	4,11:1
4,50:1	11	15									4,50:1
	2063		2072		2073		2082		2083		

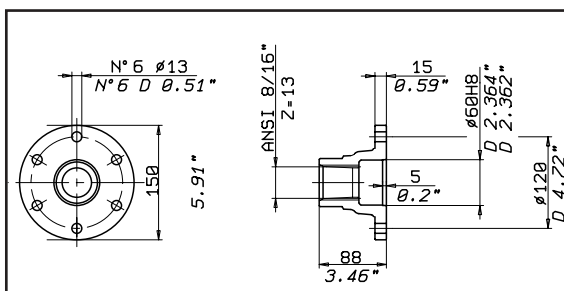
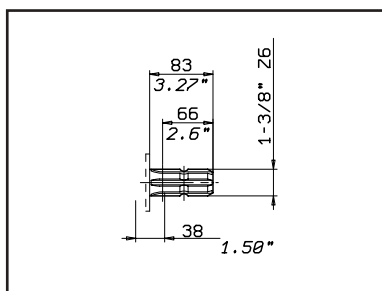
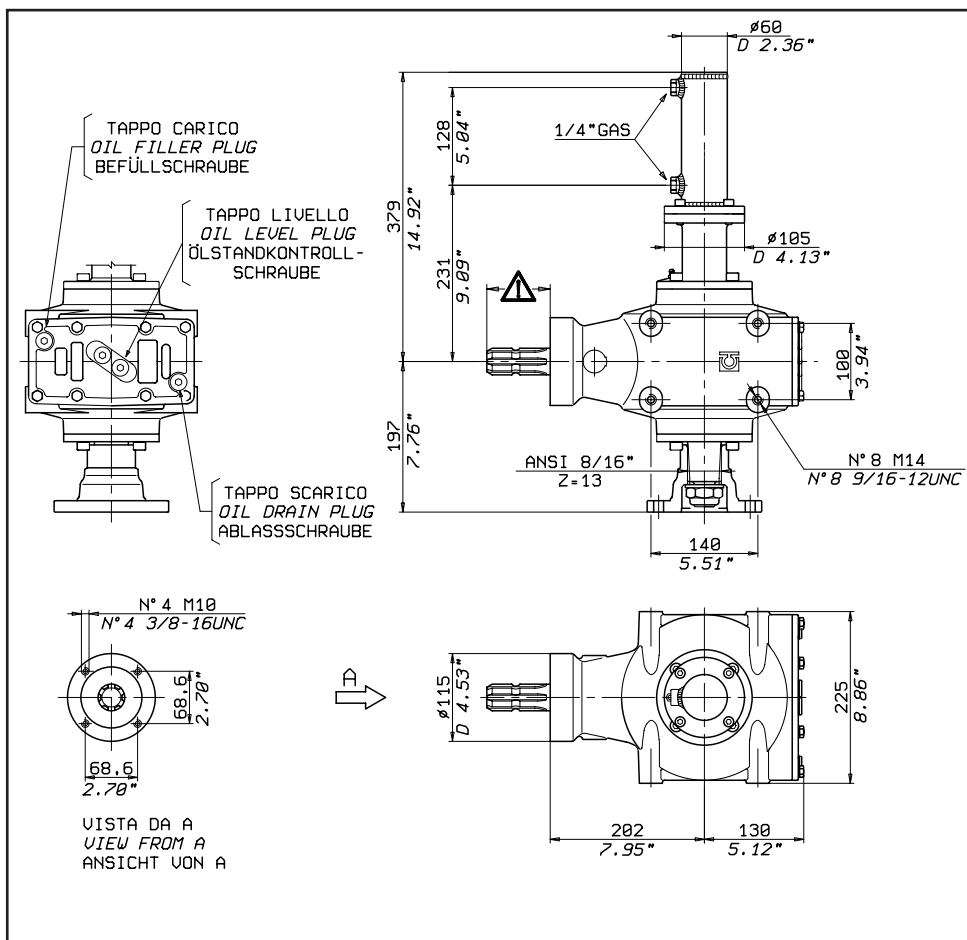
2072



OLIO CONSIGLIATO SAE 90 EP
 QUANTITA' OLIO INDICATIVA 1,7 L
 PESO INDICATIVO SCATOLA 40 kg

RECOMMENDED OIL GRADE SAE 90 EP
 APPROXIMATE OIL QUANTITY 57 ozs
 APPROXIMATE WEIGHT 88 lbs

EMPFOHLENES ÖL SAE 90 EP
 MENGE ÖL CA. 1,7 L
 GETRIEBEGEWICHT CA. 40 kg



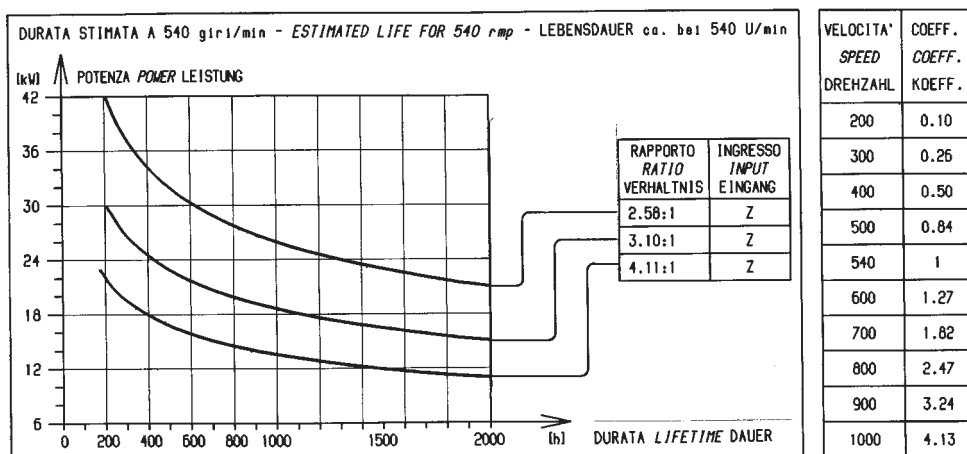
OLIO CONSIGLIATO	SAE 90 EP
QUANTITA' OLIO INDICATIVA	1,7 L
PESO INDICATIVO SCATOLA	42 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 57 ozs
APPROXIMATE WEIGHT 93 lbs

EMPFOHLENES ÖL	SAE 90 EP
MENGE ÖL CA.	1,7 L
GETRIEBEGEWICHT CA.	42 kg

IMPIEGIO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m U/min.	P kW	CV-Hp-PS	N•m	M in•lb	N•m	in•lb	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	2,58:1	540	32	44	572	5066	1477	13071	258
	3,10:1	540	24	33	429	3800	1331	11780	310
	* 4,11:1	540	18	25	325	2879	1337	11831	411

*ELICOIDALE: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangs-drehrichtung gegen den Uhrzeigersinn



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE
THREADS-GEVINDE
S (ISO) - G (UNC)

2

0

7

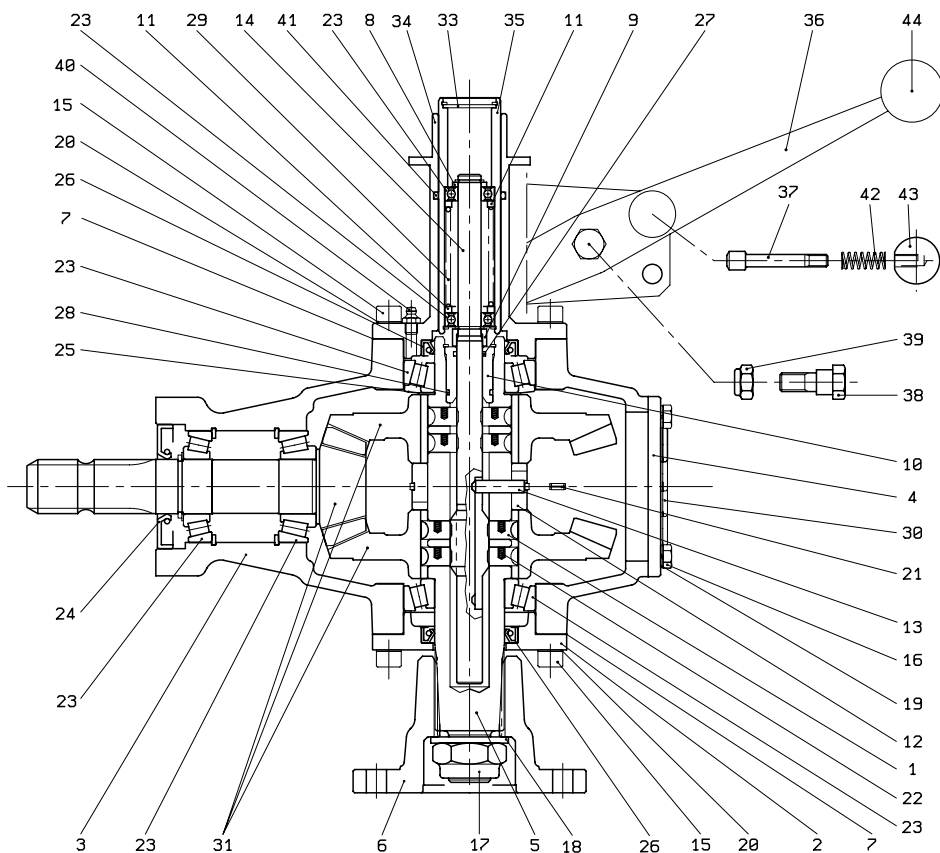
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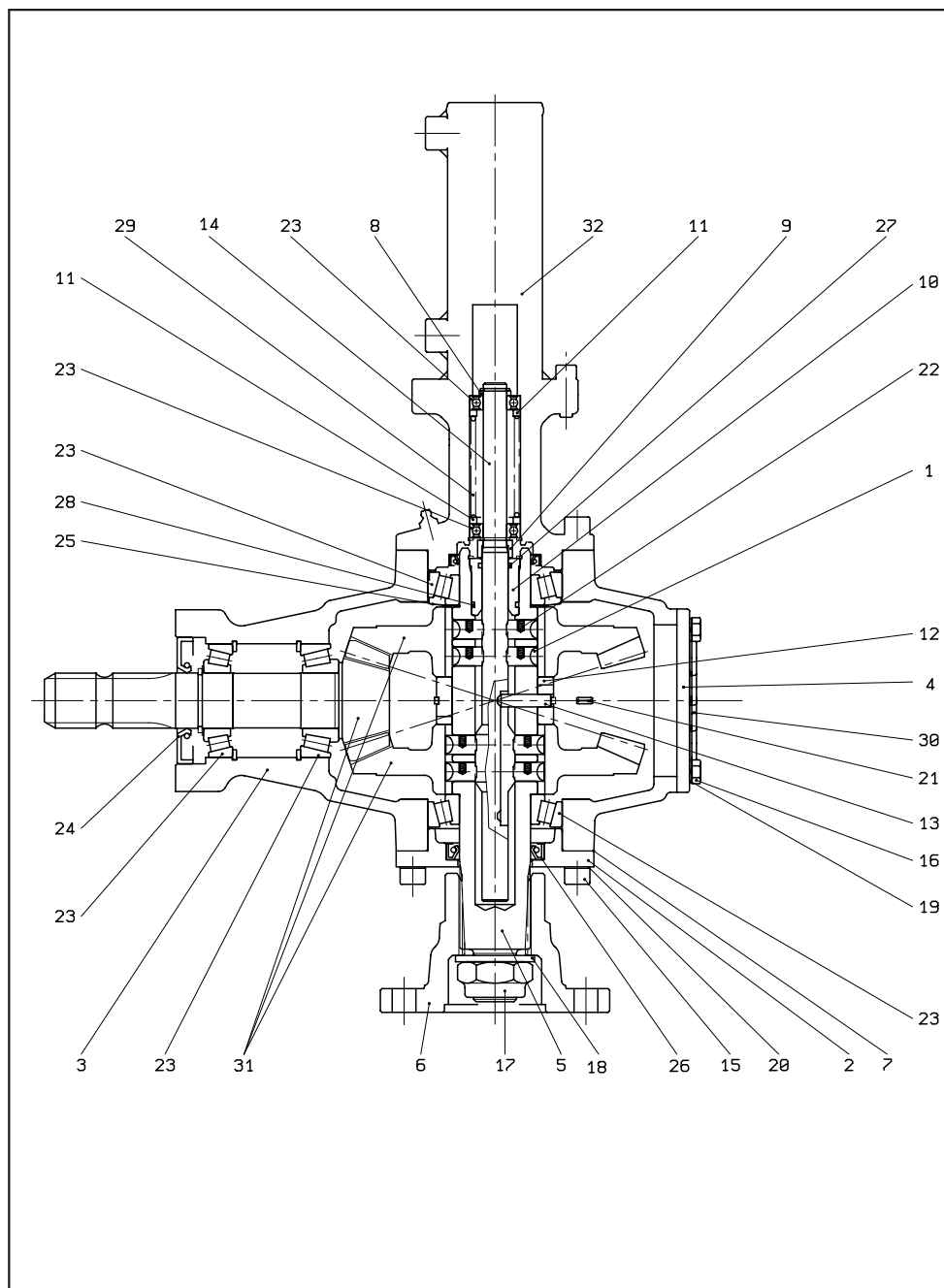
TIPO - TYPE - TYP
2072

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
411 - 310 - 258

L COMANDO A LEVA - LEVER DRIVE - HEBELSTEUERUNG
 I COMANDO IDRAULICO - HYDRAULIC DRIVE - HYDRAULISHER ANTRIEB

2072





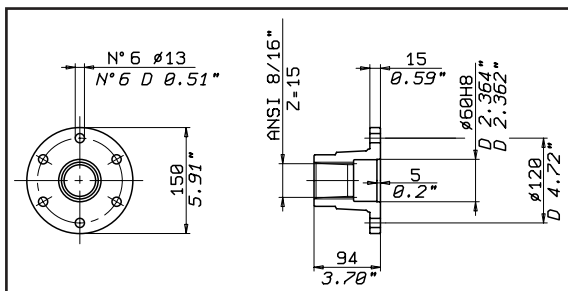
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		250000054
2		29000B006
3	ISO	290270118
	UNC	290270117
4		29075A003
5		295405304
6		298103800
7		298308500
8		298401500
9		298401501
10		298401600
11		298402300
12		298405401
13		298700811
14		298702505
15		303004400
16		319024200
17		330027000
18		332028000
19		335008002
20		336010001
21		341075000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
22		351051370
23	6002	354101015
	30209	354400045
	30207	354401035
	32207	354407035
24	35x80x10	355029035
25		355006045
26	45x62x10	355021045
	45x58x7	355013045
27		358030000
28		358031000
29		368026000
30	3/8"GAS	373023001
31	R = 3,10 R = 4,11	448310601R 447411509R
33		151500150
34		290200200
35		298000050
36		298000053
37		298701205
38		298701601
39		327003520

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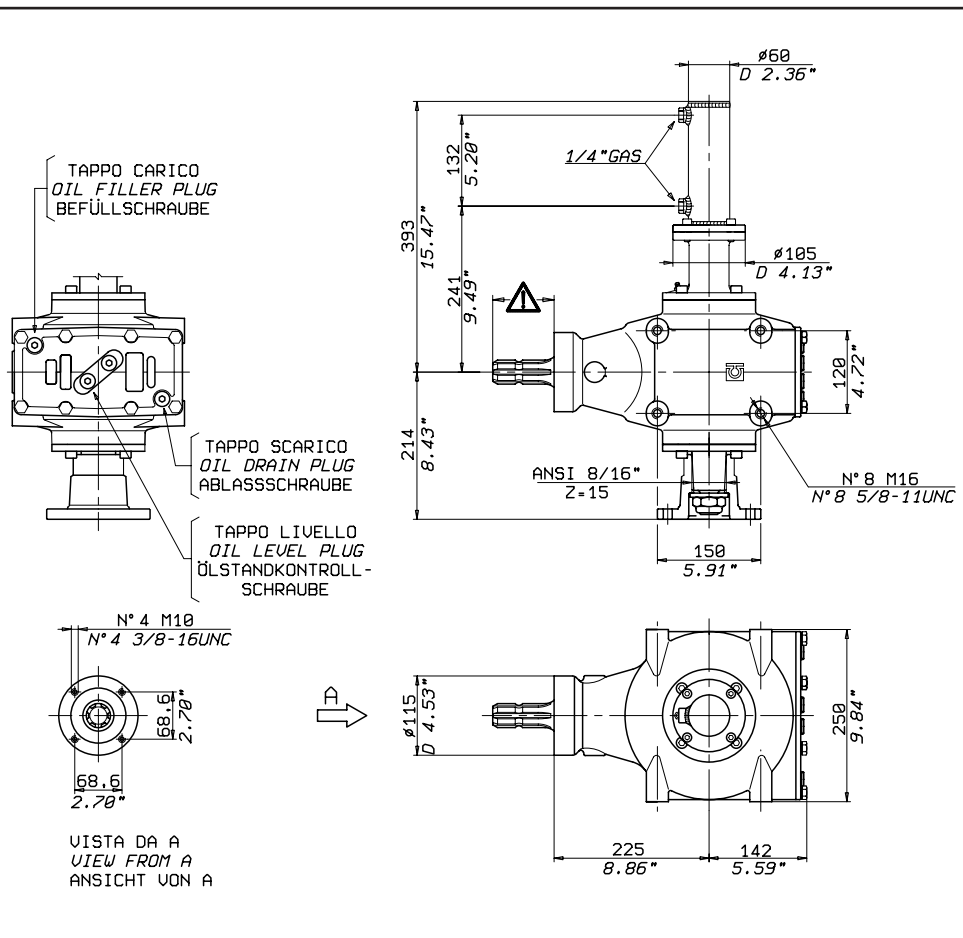
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		250000054
2		29000B006
3	ISO	290270118
	UNC	290270117
4		29075A003
5		295405304
6		298103800
7		298308500
8		298401500
9		298401501
10		298401600
11		298402300
12		298405401
13		298700811
14		298702505
15		303004400
16		319024200
17		330027000
18		332028000
19		335008002
20		336010001
21		341075000

[illegible][illegible]


**BONDIOLI
& PAVESI**

EMPFOHLENES ÖL	SAE 90 EP
MENGE ÖL CA.	2,1 L
GETRIEBEGEWICHT CA.	51 kg

2082



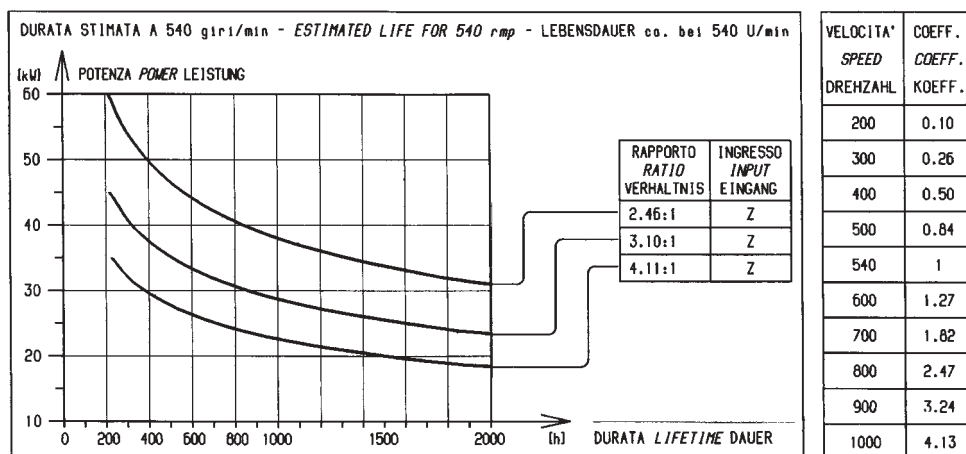
OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 2,0 L
PESO INDICATIVO SCATOLA 28 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 70 ozs
APPROXIMATE WEIGHT 61 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 2,0 L
GETRIEBEGEWICHT CA. 28 kg

IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	P kW	CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	2,46:1	540	46	63	820	7254	2016	17845	246
	3,10:1	540	40	55	716	6333	2218	19633	310
	* 4,11:1	540	27	37	481	4260	1979	17510	411

*ELICOIDALE: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangsrehrichtung gegen den Uhrzeigersinn



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

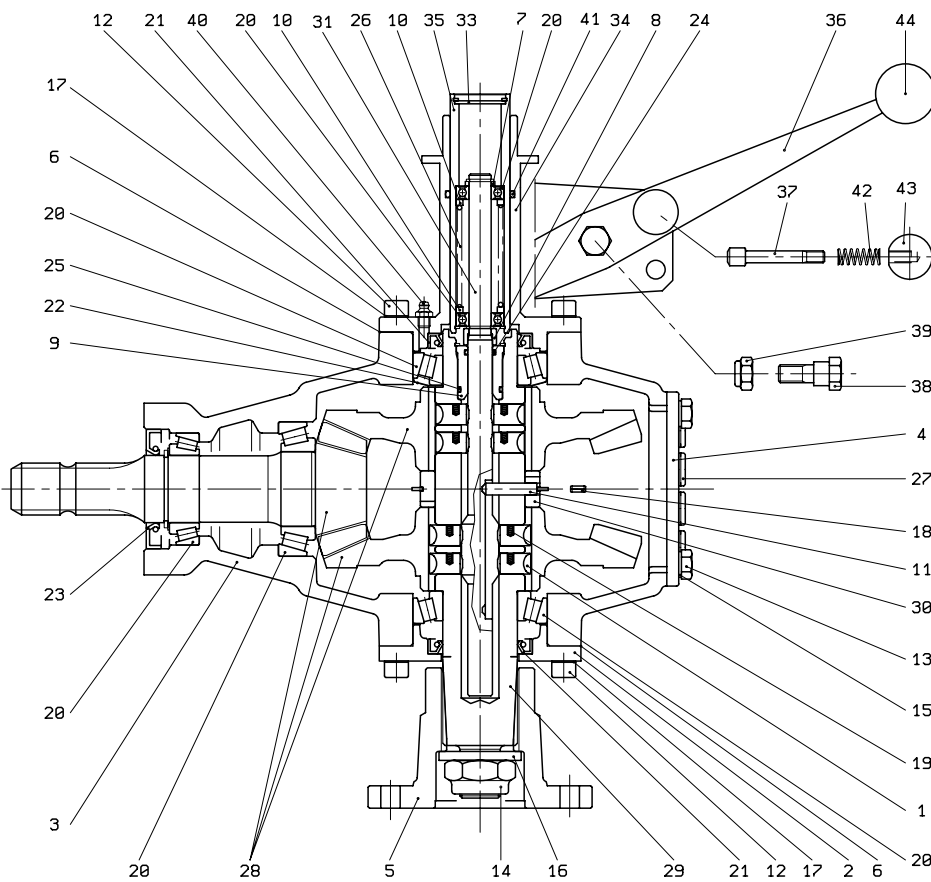
CODIFICA - CODES - BESTELLNUMMER

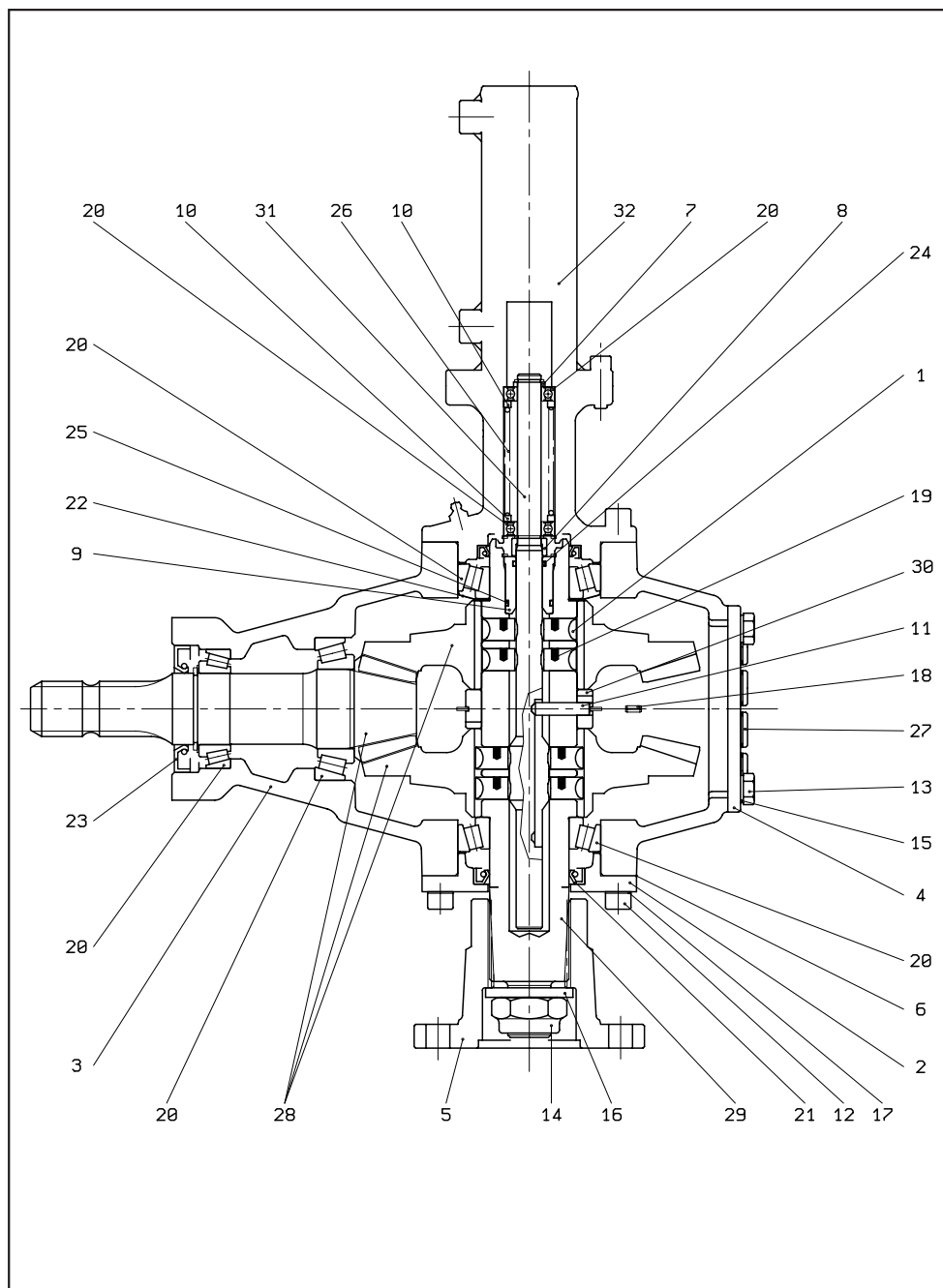
FILETTATURE
THREADS - GEWINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
2082

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
411 - 310 - 246

L COMANDO A LEVA - LEVER DRIVE - HEBELSTEUERUNG
I COMANDO IDRAULICO - HYDRAULIC DRIVE - HYDRAULISHER ANTRIEB





2082 COMANDO A LEVA - LEVER DRIVE - HEBELSTEUERUNG

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		250000055
2		29000A004
3	ISO	290280001
	UNC	290280012
4		29085A004
5		298104502
6		298309000
7		298401500
8		298401501
9		298401600
10		298402300
11		298700812
12		303004400
13		319001220
14		330027000
15		335010002
16		335028000
17		336010001
18		341004000
19		351051370

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
20	6002	354101015
	30210	354400050
	32210	354401050
	32009	354407045
21	50x70x10	355002050
	50x65x8	355013050
22		355003050
23	45x80x10	355016045
24		358030000
25		358031000
26		368026000
27	3/8"GAS	373023001
28	R = 3,10	448310702R
	R = 4,11	447411502R
29		295405305
30		298406012
31		298702504
33		151500150
34		290200300
35		298000052
36		298000053
37		298701205

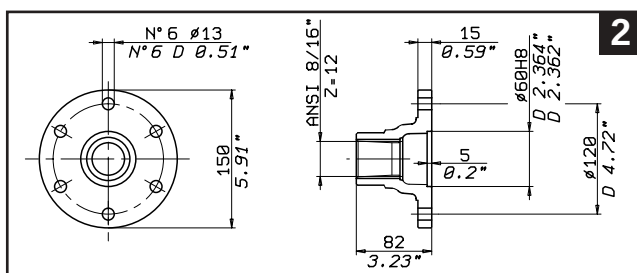
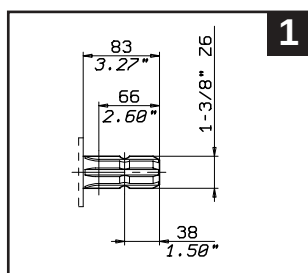
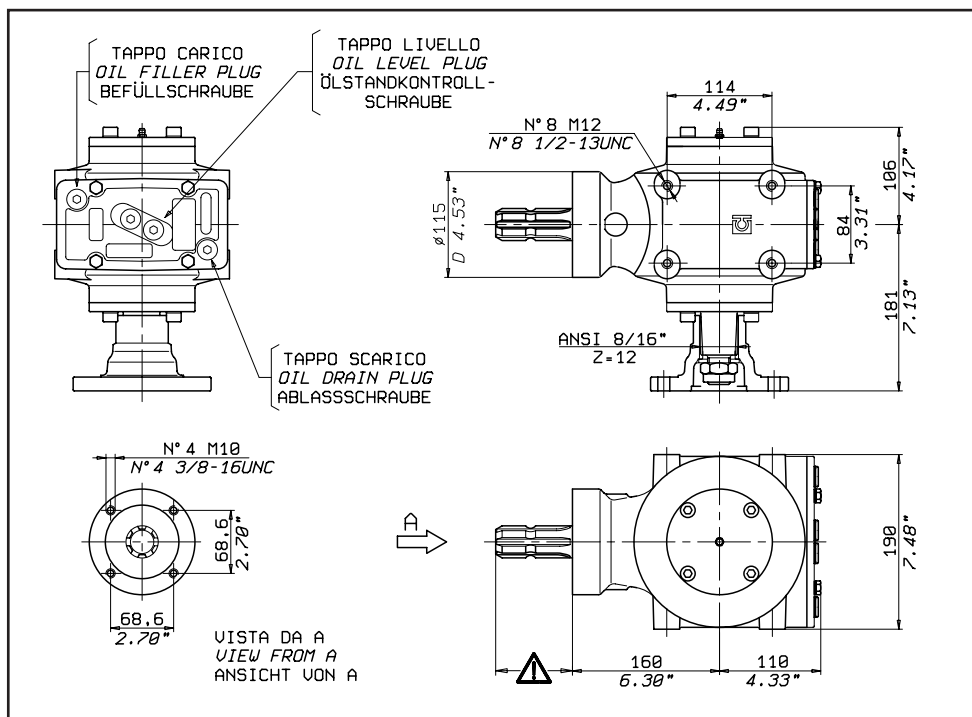
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
38		298701601
39		327003520
40		348006000
41		358023000
42		368010000
43		399000006
44		399000007

2082 COMANDO IDRAULICO - HYDRAULIC DRIVE - HYDRAULISHER ANTRIEB

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		250000055
2		29000A004
3	ISO	290280001
	UNC	290280012
4		29085A004
5		298104502
6		298309000
7		298401500
8		298401501
9		298401600
10		298402300
11		298700812
12		303004400
13		319001220
14		330027000
15		335010002
16		335028000
17		336010001
18		341004000
19		351051370

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
20	6002	354101015
	30210	354400050
	32210	354401050
	32009	354407045
21	50x70x10	355002050
22		355003050
23	45x80x10	355023050
24		355003050
25		355016045
26		368026000
27	3/8"GAS	373023001
28	R = 3,10	448310702R
	R = 4,11	447411502R
29		295405305
30		298406012
31		298702504
32		490208201001

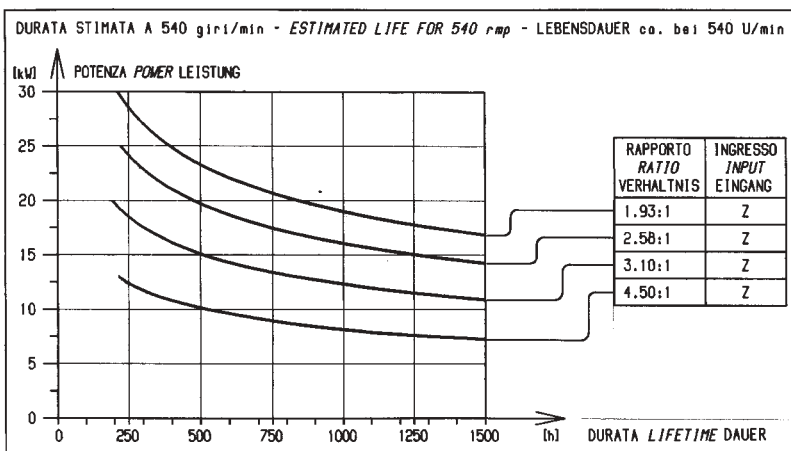
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICERAPP. RATIO CODE BESTELL.-KODE
		gir./min. r.p.m. U/min.	kW	P CV•Hp•PS	N•m	M in•lb	N•m	in•lb	gir./min. r.p.m. U/min.	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,93:1	540	25	34	442	3915	854	7556	280	193
	2,58:1	540	22	30	390	3454	1007	8912	209	258
	* 3,10:1	540	18	24	312	2764	968	8567	174	310
	4,50:1	540	11	15	195	1727	878	7772	120	450

* **ELICOIDALE:** rotazione in ingresso antioraria - **HELICOIDAL:** input rotation counter-clockwise - **SPIRALVERZAHNT:** Eingangsdrehrichtung gegen den Uhrzeigersinn

2063



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

2

0

6

3

FILETTATURE
THREADS - GEVINDE

S (ISO) - G (UNC)

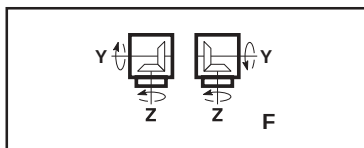
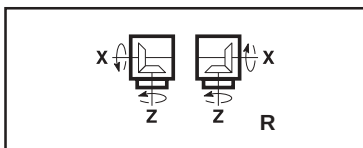
TIPO - TYPE - TYP

2063

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

450 - 310 - 258 - 193

MONTAGGIO - ARRANGEMENT - MONTAGEART



MONTAGGIO - ARRANGEMENT - MONTAGEART F
MONTAGGIO - ARRANGEMENT - MONTAGEART R

ASSE Z - Z AXIS - WELLE Z

ASSE X - X AXIS - WELLE X

ASSE Y - Y AXIS - WELLE Y

OLIO CONSIGLIATO
QUANTITA' OLIO INDICATIVA
PESO INDICATIVO SCATOLA

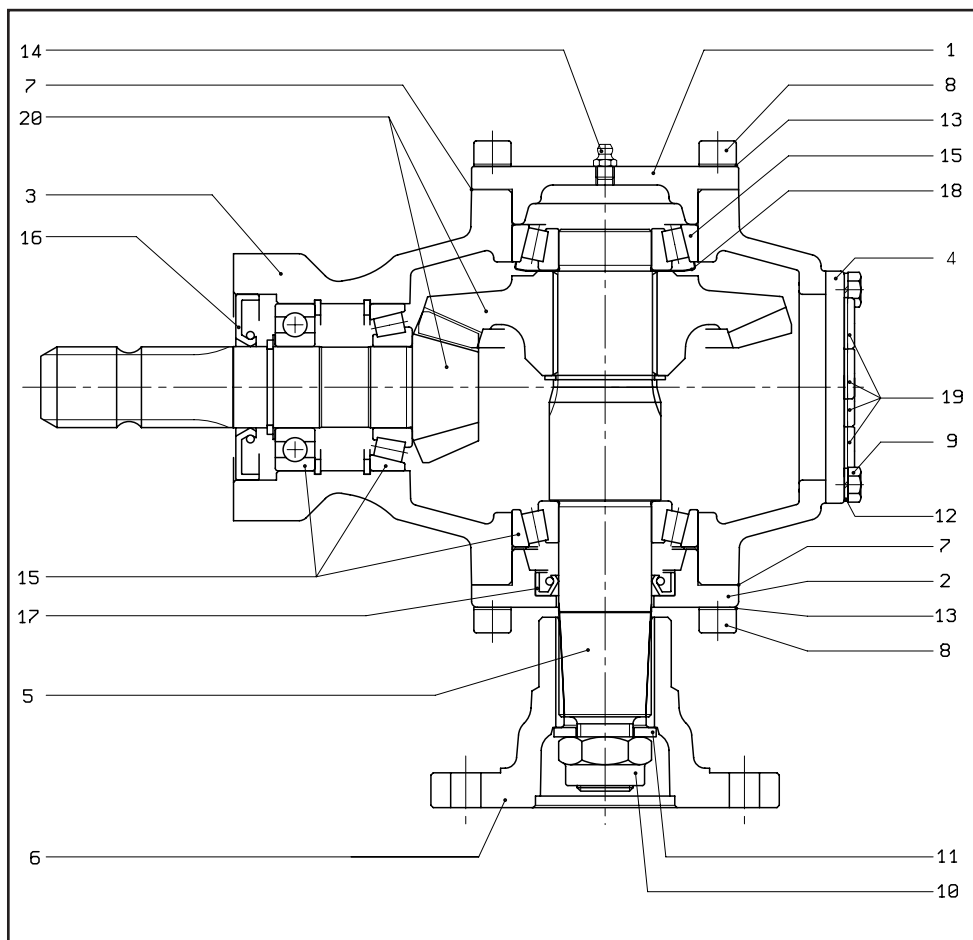
SAE 90 EP
1,2 L
25 kg

RECOMMENDED OIL GRADES
APPROXIMATE OIL QUANTITY
APPROXIMATE WEIGHT

SAE 90 EP
42 ozs
55 lbs

EMPFOHLENES ÖL
MENGE ÖL CA.
GETRIEBEGEWICHT CA.

SAE 90 EP
1,2 L
25 kg

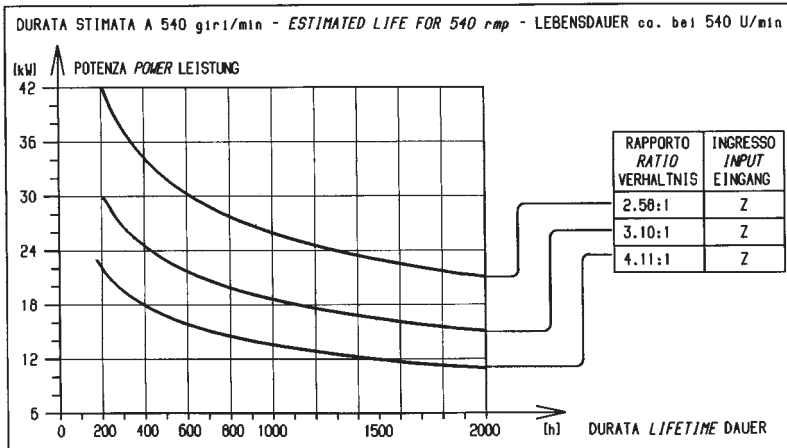


SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		29000A001
2		29000A002
3	ISO UNC	290260206 290260204
4		29065A008
5	"F" "R"	295244007 295244006
6		298103504
7		298538000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8		303003400
9		319024200
10		330024002
11		332025000
12		335008002
13		336010001
14		348006000
15	6207 30207	354101035 354401035

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
	30208	354401040
16	35x80x10	355029035
17	40x60x10	355020040
18		355013040
19	3/8" GAS	373023001
20	R = 1,93 R = 3,10 R = 4,50	448193500R 448310500R 447450401R



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

2

0

7

3

FILETTATURE
THREADS - GEVINDE

S (ISO) - G (UNC)

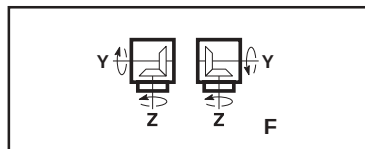
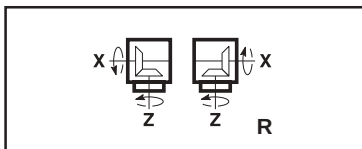
TIPO - TYPE - TYP

2073

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

411 - 310 - 258

MONTAGGIO - ARRANGEMENT - MONTAGEART



MONTAGGIO - ARRANGEMENT - MONTAGEART F
MONTAGGIO - ARRANGEMENT - MONTAGEART R

ASSE Z - Z AXIS - WELLE Z

ASSE X - X AXIS - WELLE X

ASSE Y - Y AXIS - WELLE Y

OLIO CONSIGLIATO
QUANTITA' OLIO INDICATIVA
PESO INDICATIVO SCATOLA

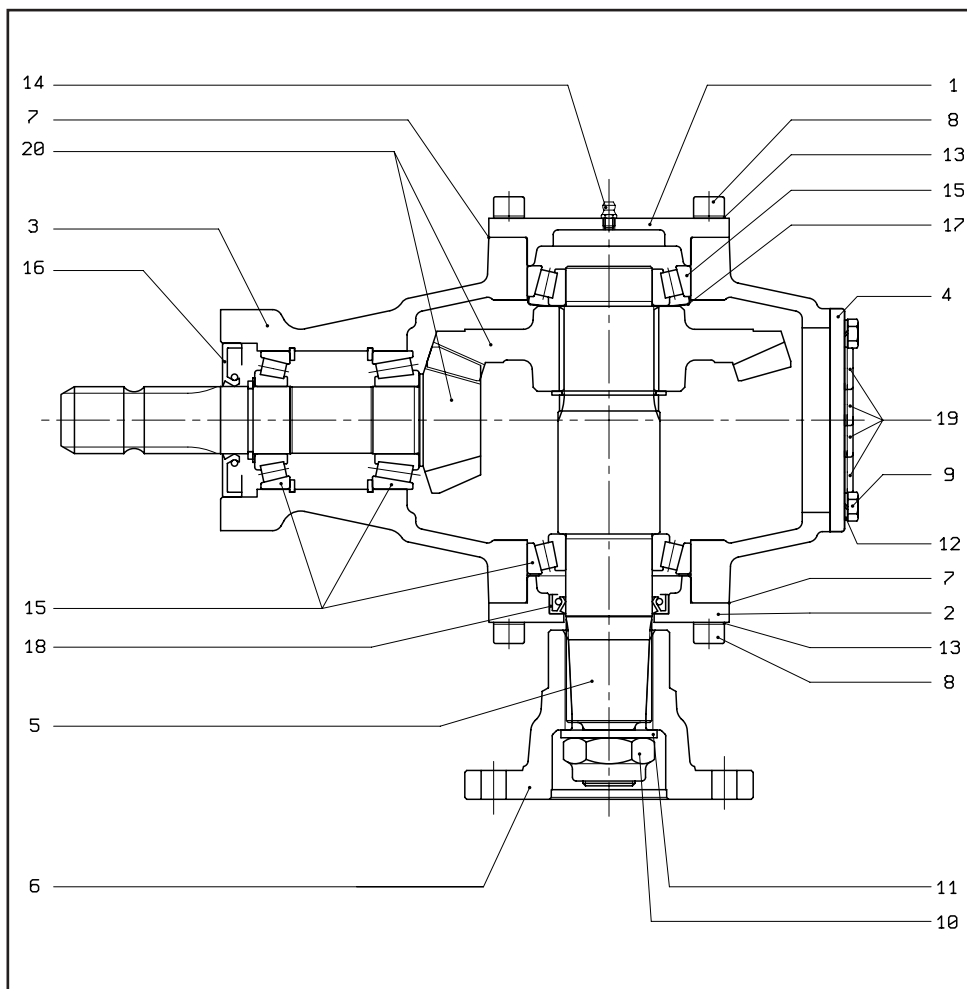
SAE 90 EP
1.7 L
32 kg

RECOMMENDED OIL GRADES
APPROXIMATE OIL QUANTITY
APPROXIMATE WEIGHT

SAE 90 EP
57 ozs
70 lbs

EMPFOHLENES ÖL
MENGE ÖL CA.
GETRIEBEGEWICHT CA.

SAE 90 EP
1.7 L
32 kg

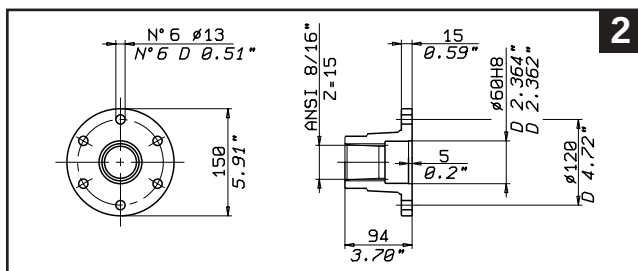
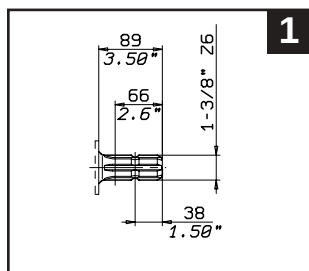
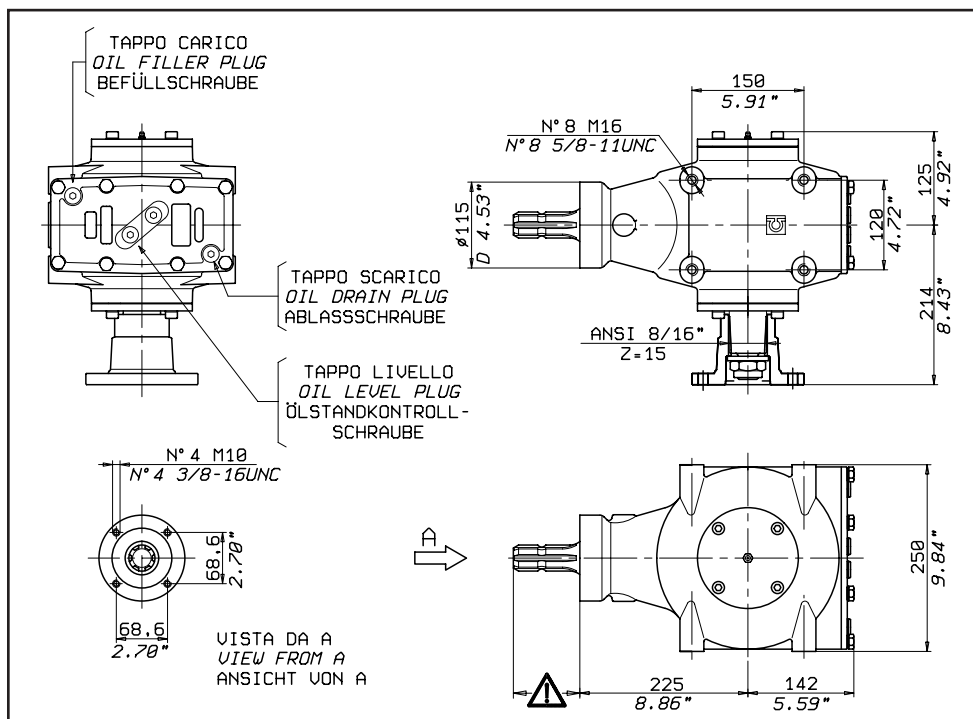


SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		29000A007
2		29000B006
3	ISO	290270118
	UNC	290270117
4		29075A003
5	"F"	295244005
	"R"	295244004
6		298103800
7		298308500

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8		303004400
9		319024200
10		330027000
11		332028000
12		335008002
13		336010001
14		348006000
15	30209	354400045
	30207	354401035

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
	32207	354407035
16	35x80x10	355029035
17		355006045
18	45x62x10	355007045
19	3/8"GAS	373023001
20	R = 1,93	448193501R
	R = 3,10	448310600R
	R = 4,11	447411505R

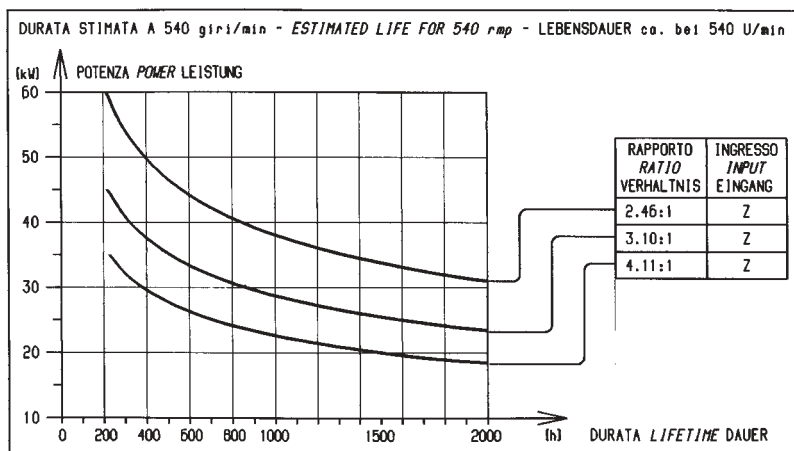


IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	2,46:1	540	46	63	820	7254	2016	17845	246
	3,10:1	540	40	55	716	6333	2218	19633	310
	* 4,11:1	540	27	37	481	4260	1979	17510	411

* ELICOIDALE: rotazione in ingresso antioraria - **HELICOIDAL**: input rotation counter-clockwise - **SPIRALVERZAHNT**: Eingangsdrehrichtung gegen den Uhrzeigersinn

2083

**RICAMBI
SPARE PARTS
ERSATZTEILE**



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

2

0

8

3

FILETTATURE
THREADS - GEVINDE

S (ISO) - G (UNC)

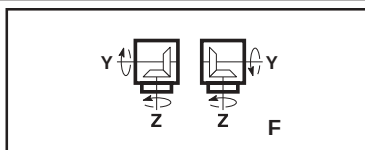
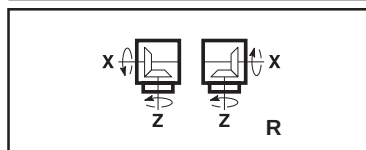
TIPO - TYPE - TYP

2083

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE

411 - 310 - 258

MONTAGGIO - ARRANGEMENT - MONTAGEART



MONTAGGIO - ARRANGEMENT - MONTAGEART F
MONTAGGIO - ARRANGEMENT - MONTAGEART R

ASSE Z - Z AXIS - WELLE Z

ASSE X - X AXIS - WELLE X

ASSE Y - Y AXIS - WELLE Y

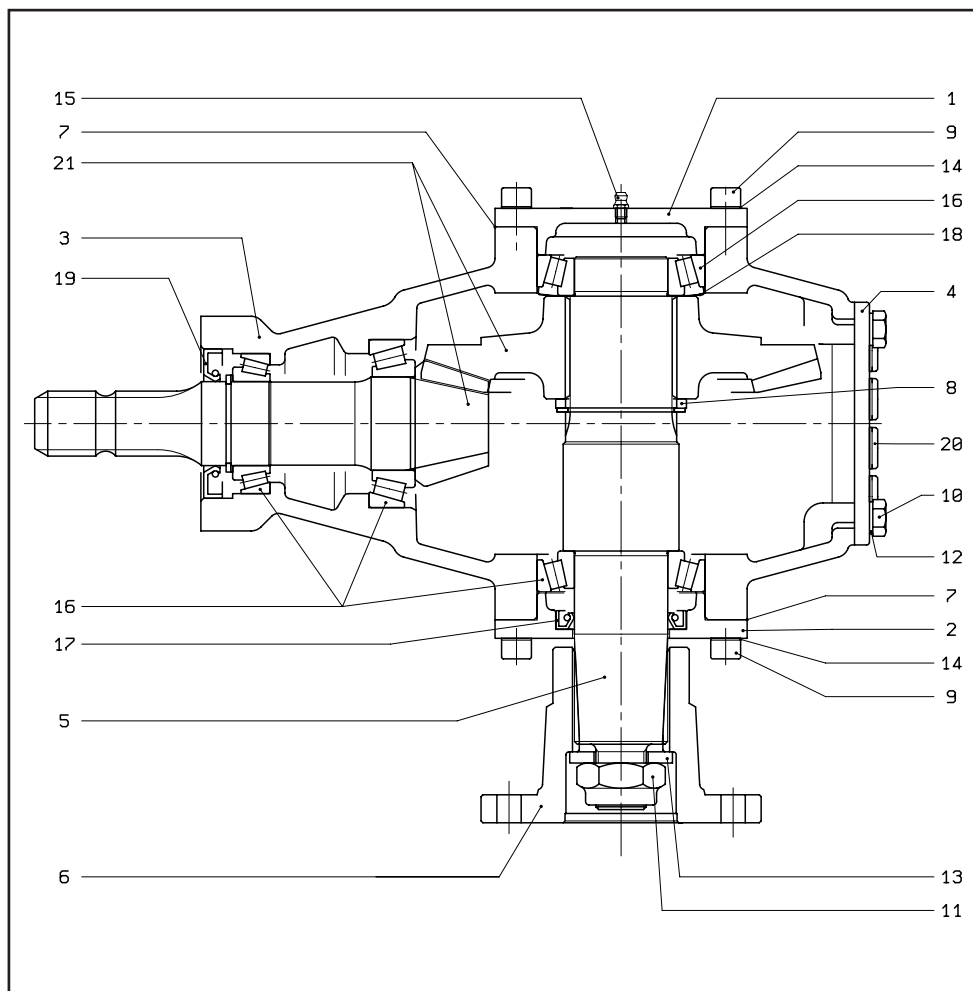
OLIO CONSIGLIATO
QUANTITA' OLIO INDICATIVA
PESO INDICATIVO SCATOLA

SAE 90 EP
2.1 L
42 kg

RECOMMENDED OIL GRADES
APPROXIMATE OIL QUANTITY
APPROXIMATE WEIGHT

SAE 90 EP
MENGHE ÖL CA.
GETRIEBEGEWICHT CA.

SAE 90 EP
2.1 L
42 kg

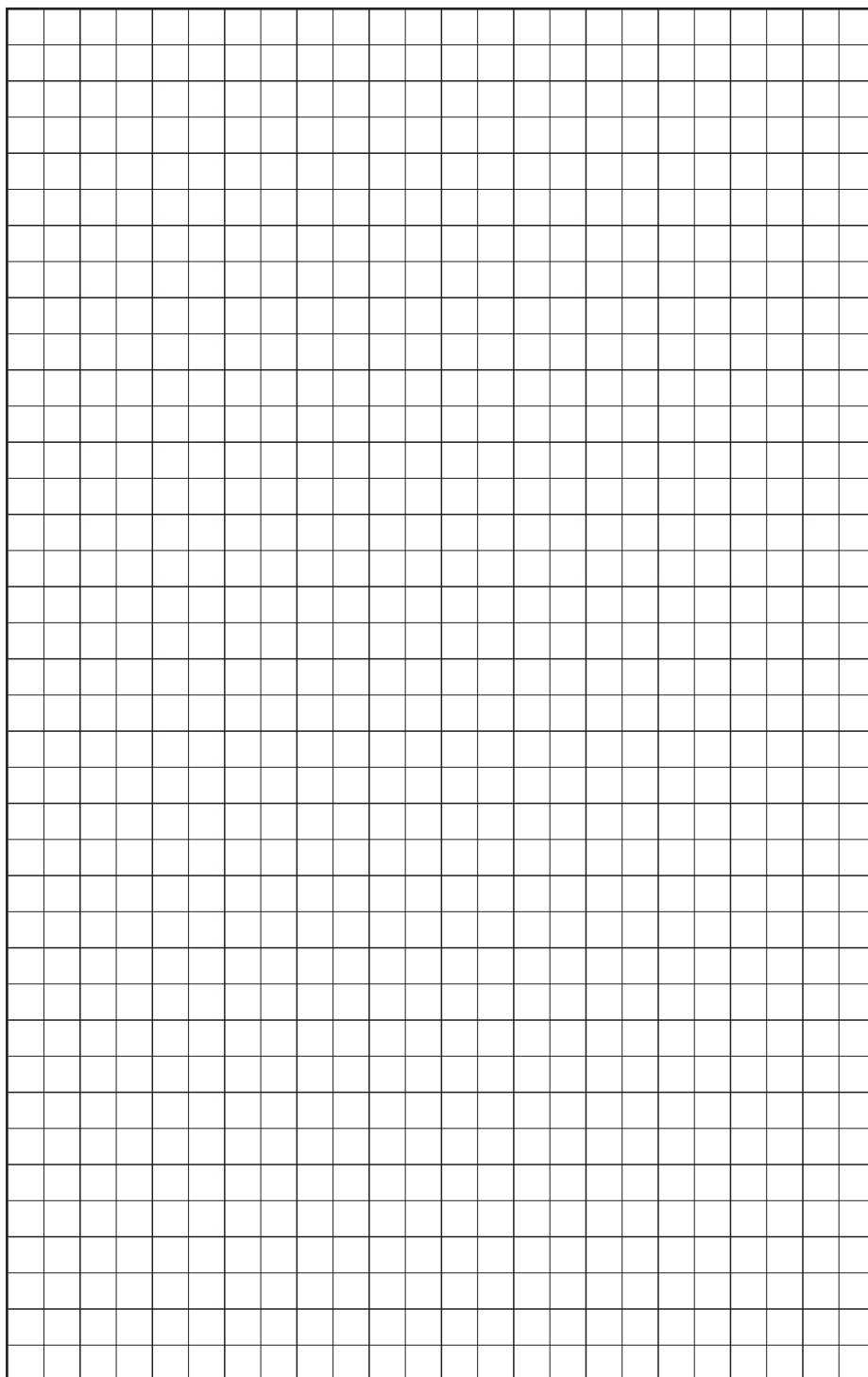


SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		29000A003
2		29000A004
3	ISO	290280001
	UNC	290280012
4		29085A004
5	"F"	295244003
	"R"	295244002
6		298104502
7		298309000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
8	R = 4,11	298406002
9		303004400
10		319001220
11		330027000
12		335010002
13		335028000
14		336010001
15		348006000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
16	30210	354400050
	32210	354401050
	32009	354407045
17	50x70x10	355023050
18		355003050
19	45x80x10	355016045
20	3/8"GAS	373023001
21	R = 3,10	448310700R
	R = 4,11	447411500R



**SERIE
SERIES 3000**

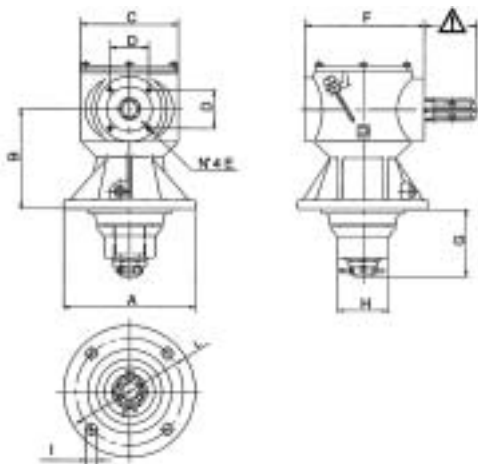


**BONDIOLI
& PAVESI**



3000





ATTENZIONE!

Gli alberi contrassegnati  non sono protetti. Ogni componente in rotazione deve avere una protezione specifica o integrata con la macchina. Bondioli & Pavesi declina ogni responsabilità in caso le idonee protezioni non siano previste e mantenute efficienti

WARNING!

Rotating shafts marked  are not shielded. Any shaft and coupling not guarded by location must be shielded by an interactive guarding system. Bondioli & Pavesi declines responsibility if proper guards are not provided and maintained.

ACHTUNG!

Die mit gekennzeichneten  Wellen sind freiliegend. Jedes drehende Bauteil muss einen spezifischen oder in die Maschine integrierten Schutz haben. Bei nicht geeigneten oder unzureichend instandgehaltenen Schutzvorrichtungen lehnt Bondioli & Pavesi jegliche Verantwortung ab.

Tipo Type Typ	Fusione Casing Gußform	A	B	C	D	E	F	G	H	I	L
S3035	1	160	165	152	61,5	M8	146	130	73	N°4 Ø16,5	171,5
G3035		6.3"	6.5"	5.95"	2.42"	5/16-18UNC	5.75"	5.12"	2.87"	N°4 D0.65"	6.75"
S3035	2	160	165	152	61,5	M8	146	83	-	N°4 Ø16,5	171,5
G3035		6.3"	6.5"	5.98"	2.42"	5/16-18UNC	5.75"	3.27"	-	N°4 D0.65"	6.75"
S3040		165	152,4	140	54,4	M8	157	125	68	N°4 Ø17,5	171,5
G3040		6.5"	6"	5.51"	2.14"	5/16-18UNC	6.18"	4.92"	2.68"	N°4 D0.69"	6.75"
S3050	1	210	160	156	61,5	M8	191	107,5	80	N°4 Ø17,5	171,5
G3050		8.27"	6.3"	6.14"	2.42"	5/16-18UNC	7.52"	4.23"	3.15"	N°4 D0.69"	6.75"
S3050	2	210	160	156	61,5	M8	191	131,5	80	N°4 Ø17,5	171,5
G3050		8.27"	6.3"	6.14"	2.42"	5/16-18UNC	7.52"	5.18"	3.15"	N°4 D0.69"	6.75"
S3050	3	210	160	156	61,5	M8	191	195,5	80	N°4 Ø17,5	171,5
G3050		8.27"	6.3"	6.14"	2.42"	5/16-18UNC	7.52"	7.7"	3.15"	N°4 D0.69"	6.75"
S3065		240	180	176	68,6	M8	208	131,5	80	N°4 Ø20,5	203,2
G3065		9.45"	7.09"	6.93"	2.7"	5/16-18UNC	8.19	5.18"	3.15"	N°4 D0.81"	8"
S3070	1	240	180	185	68,6	M8	212	126	80	N°4 Ø21	203,2
G3070		9.45"	7.09"	7.28"	2.7"	5/16-18UNC	8.35"	4.96"	3.15"	N°4 D0.83"	8"
S3070	2	210	205	185	68,6	M8	212	178	80	N°4 Ø17,5	175
G3070		8.27"	8.07"	7.28	2.7"	5/16-18UNC	8.35	7.01"	3.15"	N°4 D0.69"	6.89"
S3100		250	190	230	74,2	M10	270	246	115	N°4 Ø21	282,8
G3100		9.84"	7.48"	9.06"	2.91"	3/8-16UNC	10.63"	9.69"	4.53"	N°4 D0.83"	11.14"
S3150		250	204	270	74,2	M10	328	246	115	N°4 Ø21	282,8
G3150		9.84"	8.03"	10.63"	2.91"	3/8-16UNC	12.91"	9.69"	4.53"	N°4 D0.83"	11.14"
S3160		355	225	240	74,2	M8	341	223	260	N°4 Ø21	305
G3160		1398"	8.86"	9.45"	2.92"	5/16-18UNC	13.43"	8.78"	10.24"	N°4 D0.83"	12.01"

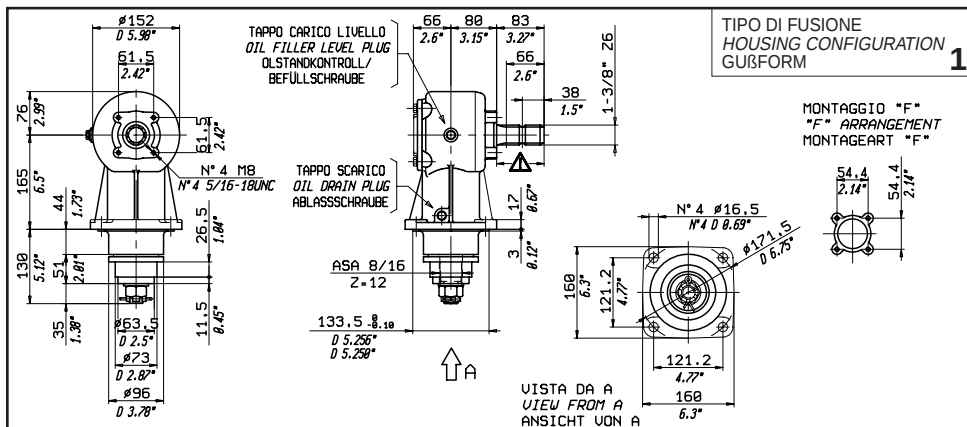
3000

- PRINCIPALI APPLICAZIONI FALCIATRICI, DECSUGLIATRICI.
- POTENZE FINO A 140 kW A 540 giri/min.
- SCATOLE MONOBLOCCO IN GHISA (SFEROIDALE PER MODELLI 3050 E MAGGIORI).
- VERNICIATURA INTERNA ED ESTERNA, ESSICCAZIONE IN FORNO, RESISTENZA ALLA CORROSIONE SECONDO NORMA ASTM B 117-79, RESISTENZA ALL'OLIO SAE 90 FINO A 125° C (260° F).
- COPPIECONICHE A DENTATURA DIRITTA GLEASON IN ACCIAIO CEMENTATO E TEMPRATO.
- ALBERI IN ACCIAIO CEMENTATO E TEMPRATO.
- TAPPO DI SFIATO PER MODELLO 3050 E MAGGIORI.
- ANELLI DI TENUTA CON LABBRO PARAPOLVERE. SCHERMO DI PROTEZIONE IN LAMIERA SULL'ASSE Z.
- CUSCINETTI DI QUALITÀ PER ELEVATA AFFIDABILITÀ (L₁₀).

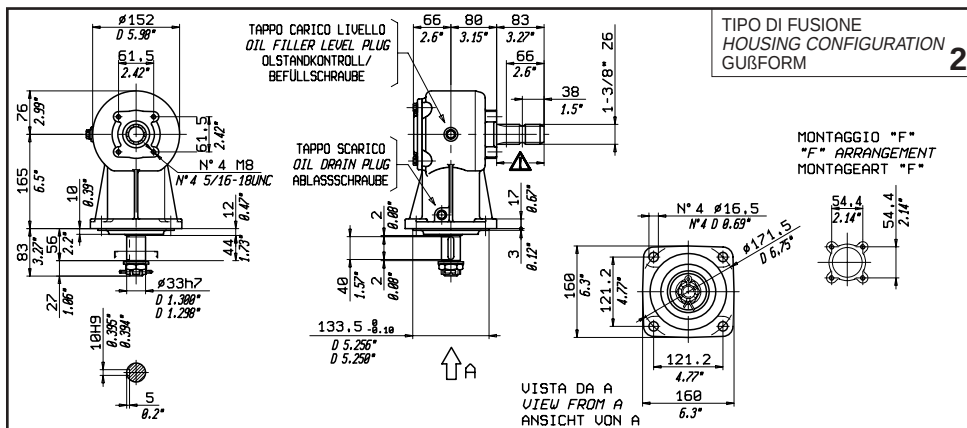
- TYPICAL APPLICATIONS: ROTARY MOWERS, BRUSH CUTTERS, FINISHING MOWERS.
- POWER UP TO 140 kW AT 540 r.p.m.
- MONOLITHIC (ONE PIECE) CAST IRON HOUSING (NODULAR CAST IRON FOR MODELS 3050 AND LARGER).
- INNER AND OUTER DIPPING AND OVER DRYING AT HIGH TEMPERATURE.
- CORROSION RESISTANCE TO ASTM B 117-79. CAPABLE OF WORKING UP TO 125° C (260° F) WITH SAE 90 EP.
- GLEASON SYSTEM STRAIGHT BEVEL GEARS MADE FROM CARBURIZED AND HARDENED STEEL.
- HIGH STRENGTH CASE HARDENED SHAFTS.
- BREATHER PLUGS STANDARD FOR MODELS 3050 AND LARGER.
- DUST LIP ON ALL SEALS, METAL GUARD OVER THE OUTPUT SHAFT SEAL.
- QUALITY BEARINGS FOR HIGH RELIABILITY (L₁₀).

- HAUPTSÄCHLICH VERWENDET BEI: MÄHWERKE, BUSCHHACKER.
- LEISTUNGSBEREICH BIS 140 kW BEI 540 U/min.
- GEHÄUSE IN EINEM GUßSTÜCK (AB MODELL 3050 UND GRÖßER IN SPHÄROGUß).
- GEHÄUSE TAUCHGRUNDIERT, IM EINBRENNVERFAHREN GETROCKNET.
- KORROSIONBESTÄNDIG GEMAß NORM ASTM B 117-79 MITZEBESTÄNDIG BEI SAE 90 EP-ÖL BIS 125° C (260° F).
- KEGELRÄDER GERADVERZAHNT UND EINSATZGEHÄRTET.
- ENTLÜFTUNGSSCHRAUBE AB MODELL 3050 UND GRÖßER.
- SECHSKANTOWELLEN EINSATZGEHÄRTETEM ODER NITRIERGEHÄRTET.
- WELLENDICHRINGE MIT STAUBSCHUTZLIPPE.
- SIMMERRINGE MIT STAUBSCHUTZLIPPE, BLECHSCHUTZKAPPE AUF DER Z-WELLE.
- QUALITÄTS-WÄLZLAGER FÜR HÖCHSTE ZUVERLÄSSIGKEIT (L₁₀).

IMPIEGO USE ANWEN- DUNG	RAPPORTO RATIO ÜBERSVERH	min ⁻¹	3035		3040		3050		3065		3070		3100		3150		3160	
			kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS	kW	CV Hp-PS
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGSGETRIEBE	1: 2,82	540	15	20														
		1000																
	1: 2,30	540	20	27														
		1000																
	1: 2,15	540					29	40										
		1000					45	62										
	1: 1,90	540	23	32	22	30	33	45	48	65	48	65	66	90				
		1000			34	46	51	70			74	100	102	139				
	1: 1,67	540			26	36	37	50										
		1000			41	56	57	77										
	1: 1,50	540	29	40	29	40	40	55	53	72	53	72	74	100	125	170	125	170
		1000			45	62	62	85			82	111	114	155	193	263		
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1: 1	540											81	110	140	190	129	175
		1000											125	170	216	294	199	270
	1,25: 1	540											67	91	114	155		
		1000											103	141	177	240	176	240
	1,50: 1	540											57	78	95	129		
		1000											89	121	147	200	147	200
	1,90:1	540											43	58				
		1000											66	90				



MULTIPLICATORE SPEED MULTIPLIER ÜBERSATZUNGS- GETRIEBE	RAPPORTO RATIO ÜBERSVERH.	INGRESSO X-Y INPUT X-Y EINGANG X-Y					USCITA Z OUTPUT Z AUSGANG Z			CODICE RAPP. RATIO CODE BESTELL.-KODE
	min ⁻¹	min ⁻¹	kW	P CV·Hp·PS	N·m	in·lb	N·m	in·lb	min ⁻¹	
	1: 2,30	540	20	27	350	3100	150	1350	1242	
	1: 1,92	540	23	32	420	3670	220	1910	1037	
	1: 1,47	540	29	40	520	4600	350	3120	794	147



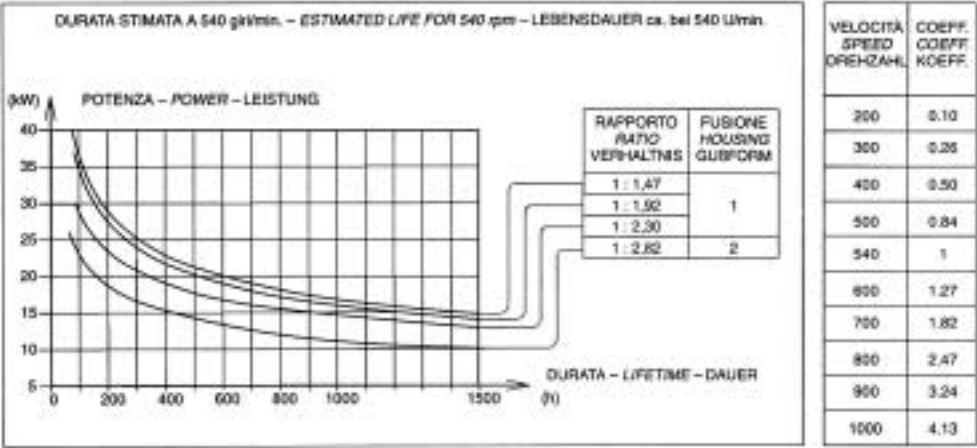
MULTIPLICATORE SPEED MULTIPLIER ÜBERSATZUNGS- GETRIEBE	RAPPORTO RATIO ÜBERSVERH.	INGRESSO X-Y INPUT X-Y EINGANG X-Y					USCITA Z OUTPUT Z AUSGANG Z			CODICE RAPP. RATIO CODE BESTELL.-KODE
	min ⁻¹	min ⁻¹	kW	P CV·Hp·PS	N·m	in·lb	N·m	in·lb	min ⁻¹	
	1: 2.82	540	15	20	260	2300	90	800	1523	

ATTENZIONE!
Gli alberi contrassegnati non sono protetti. Ogni componente in rotazione deve avere una protezione specifica o integrata con la macchina. Bondioli & Pavesi declina ogni responsabilità in caso le idonee protezioni non siano previste e mantenute efficienti

WARNING!
Rotating shafts marked are not shielded. Any shaft and coupling not guarded by location must be shielded by an interactive guarding system. Bondioli & Pavesi declines responsibility if proper guards are not provided and maintained.

ACHTUNG!
Jedes drehende Bauteil muss einen spezifischen oder in die Maschine integrierten Schutz haben. Bei nicht geeigneten oder unzureichend instandgehaltenen Schutzvorrichtungen lehnt Bondioli & Pavesi jegliche Verantwortung ab.

3035



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

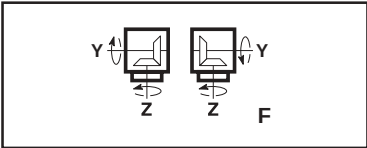
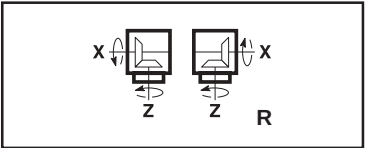
CODIFICA
CODES
BESTELLNUMMER

FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
2201

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
230 - 192 - 147 : tipo di fusione 1, housing configuration 1, gußform 1
282 : tipo di fusione 2, housing configuration 2, gußform 2

MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



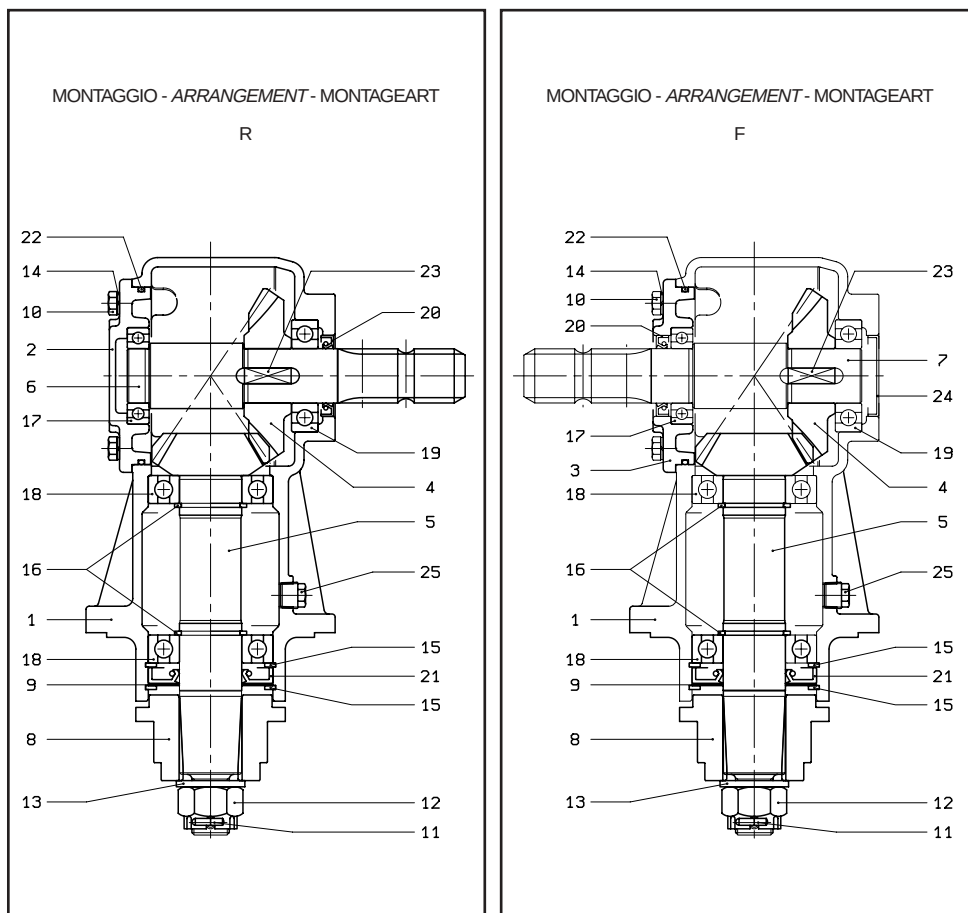
TIPO DI FUSIONE - HOUSING CONFIGURATION - GUßFORM: 1 - 2

OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1 L
PESO INDICATIVO SCATOLA 17 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 32 ozs
APPROXIMATE WEIGHT 38 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1 L
GETRIEBEGEWICHT CA. 17 kg

FUSIONE TIPO 1 - HOUSING CONFIGURATION TYPE 1 - GUßFORM TYP 1



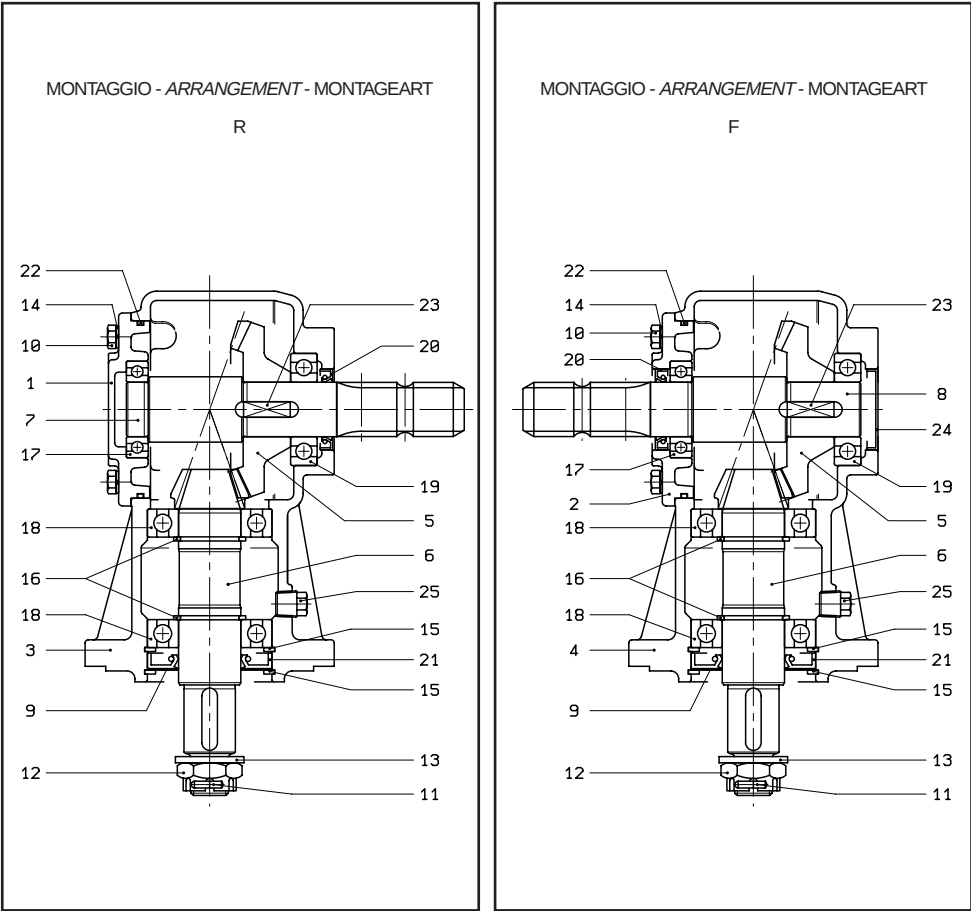
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290330500
2		290330500
3		290330600
4	ISO	290330601
5	R = 1 : 2,30	291236304
	R = 1 : 1,92	291236303
	R = 1 : 1,47	291226300
6	R = 1 : 2,30	292109600
	R = 1 : 1,92	292129600
	R = 1 : 1,47	292159600

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
7		295036343
8		295036344
9		298103802
10		298404008
11	M8x25	319029200
12	5x50 UNI 1336	323001000
13	M24x2 UNI 5593	330001500
14	25x44x4 UNI 5714	332025000
15	8x15x1,6 DIN128B	335008001
16	80x2,5 DIN 472/1	338000080

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
17	40x2,5 DIN471/2	339001040
18	6007	354100035
19	6208	354100040
20	6207	354113035
21	35x52x7	355018035
22	40x80x10	355002040
23		358056000
24	B10x8x30 UNI6604	370039000
25	52x7	372001000
26	3/8" GAS	373005000

3035

FUSIONE TIPO 2 - HOUSING CONFIGURATION TYPE 2 - GUßFORM TYP 2

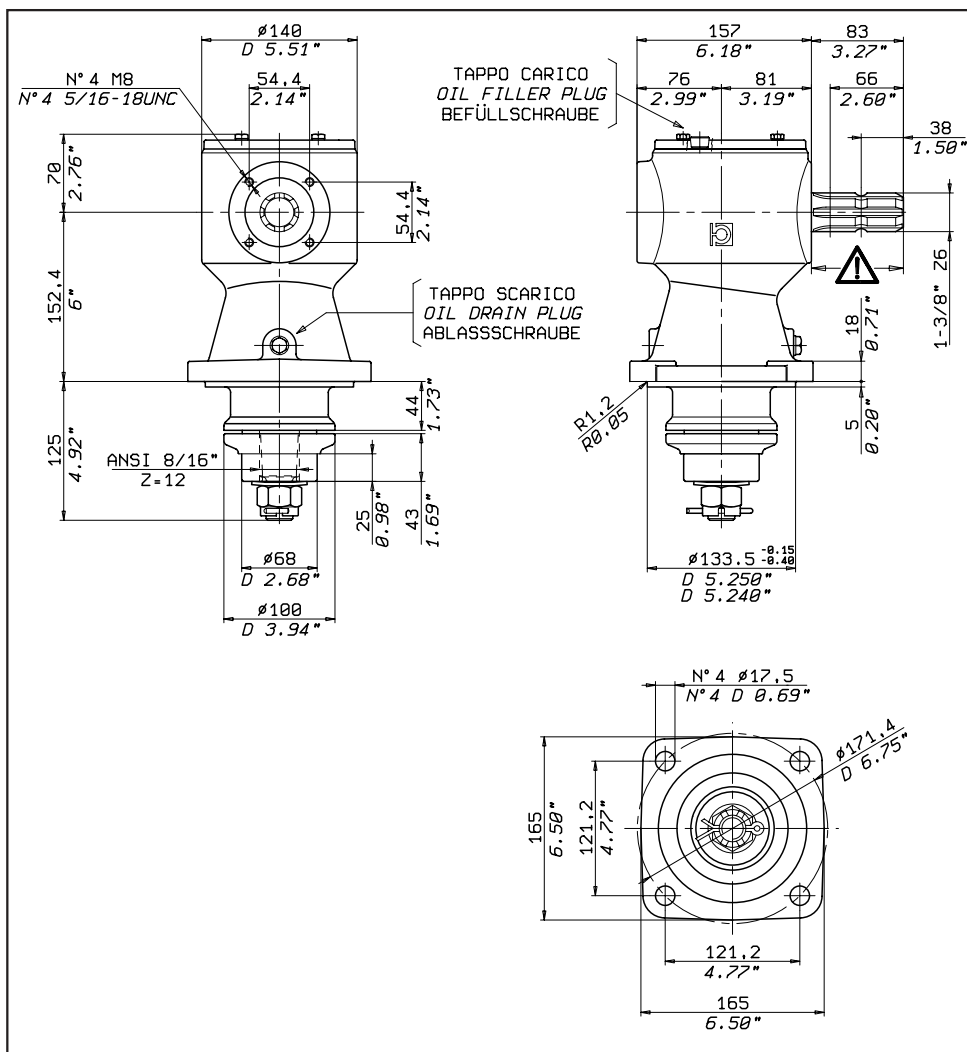


RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		290330600
2	ISO	290330601
3	ISO	290330700
4		290330701
5	R = 1 : 2,30	291316300
6	R = 1 : 1,92	292114011
7		295036343
8		295036344
9		298404008
10	M8x25	319029200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
11	5x50 UNI1336	323001000
12	M 24x2 UNI 5594	330024000
13	25x44x4 UNI5714	332025000
14	8x15x1,6 DIN128B	335008001
15	80x2,5 DIN 472/1	338000080
16	40x2,5 DIN 471/2	339001040
17	6007	354100035
18	6208	354100040
19	6207	354113035
20	35x52x08	355001035

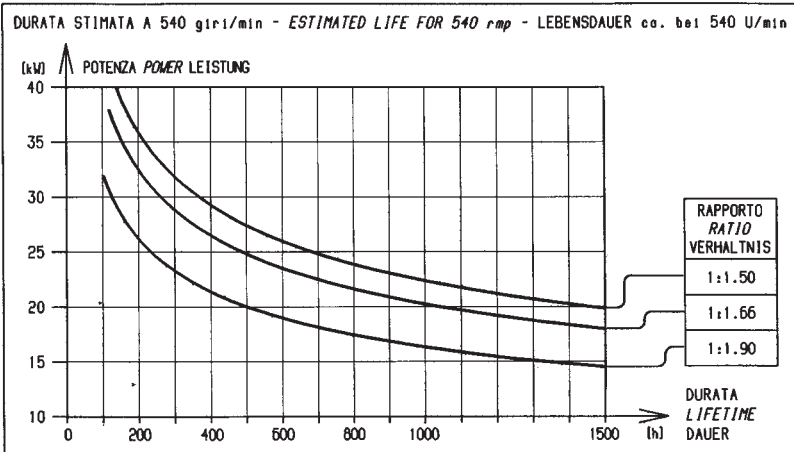
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
21	40x80x10	355002040
22		358056000
23	B10x8x30 UNI6604	370039000
24	52x7	372001000
25	3/8" GAS	373005000

3040



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERSVERH.	INGRESSO X-Y INPUT X-Y EINGANG X-Y					USCITA Z OUTPUT Z AUSGANG Z			CODICE RAPP. RATIO CODE BESTELL.-CODE
		giri/min r.p.m. U/min.	P kW	CV/Hp	PS N•m	M in•lb	N•m	in•lb	giri/min r.p.m. U/min.	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1: 1,90	540	22	30	390	3456	205	1819	1026	190
		1000	34	46	324	2883	171	1517	1900	
	1: 1,66	540	26	36	468	4147	282	2498	896	166
		1000	41	56	389	3460	235	2084	1660	
	1: 1,50	540	29	40	520	4608	347	3072	810	150
		1000	45	62	433	3844	288	2563	1500	

3040



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

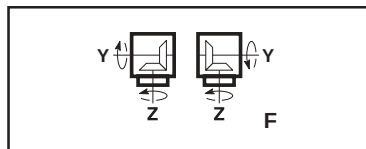
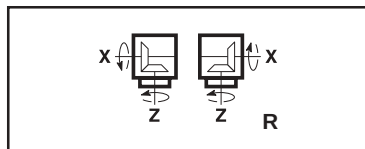
CODIFICA
CODES
BESTELLNUMMER

FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
3040

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
190 - 166 - 150

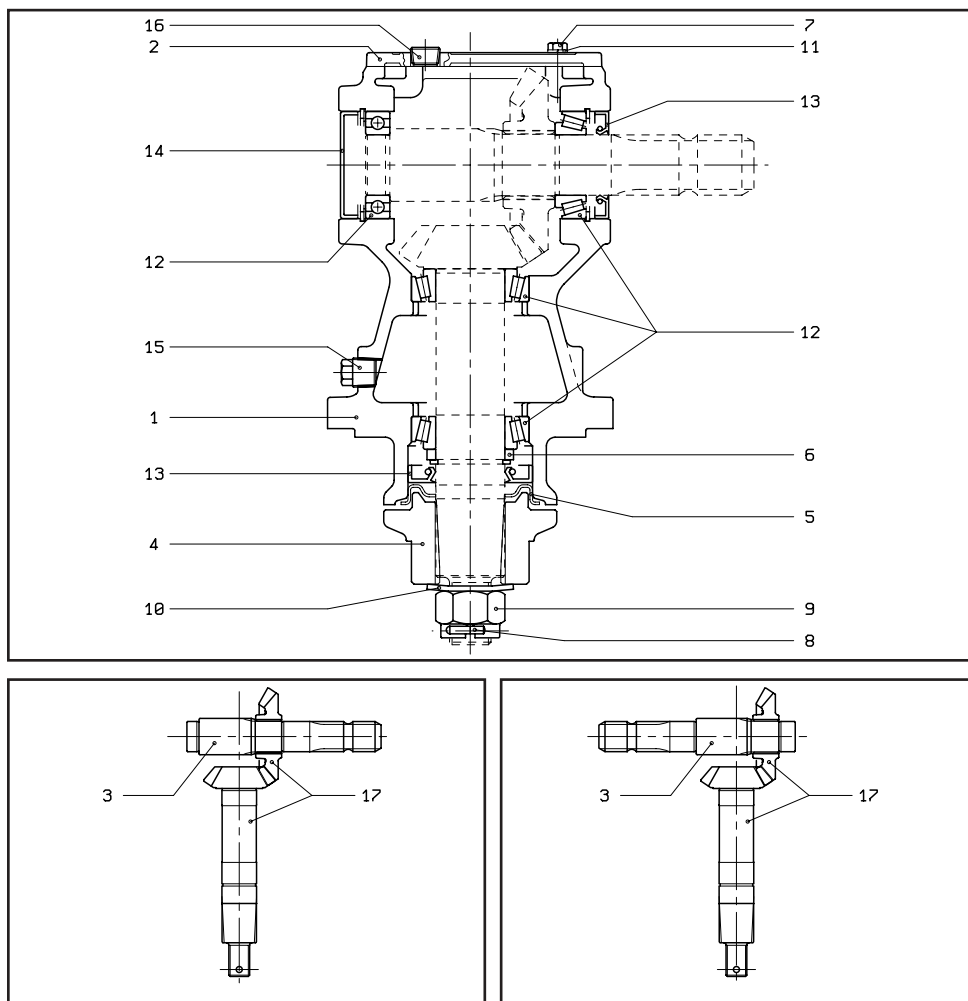
MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,1 L
PESO INDICATIVO SCATOLA 15 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 38 ozs
APPROXIMATE WEIGHT 33 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,1 L
GETRIEBEGEWICHT CA. 15 kg



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		★
2		29035A003
3		★
4		298313000
5		298364000
6		298444000
7		319000300
8		323001000
9		330001500

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
10		367001003
11		335006002
12		354107035
13	6007	354400040
	32008X	354404035
	32007X	355000035
14	35x62x10	355000040
	40x72x10	372004000
15		373005000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
16	3/8"GAS	373010000
17	3/8"GAS	★

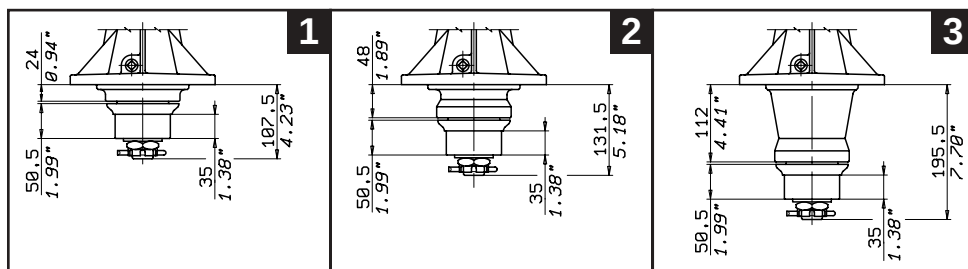
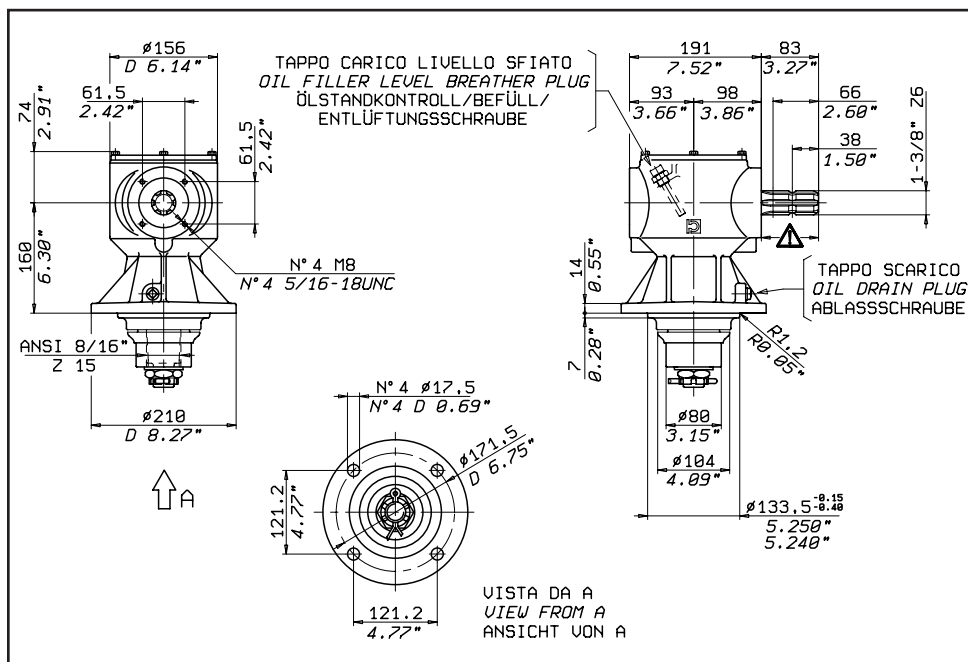
★ CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

3040

RICAMBI
SPARE PARTS
ERSATZTEILE

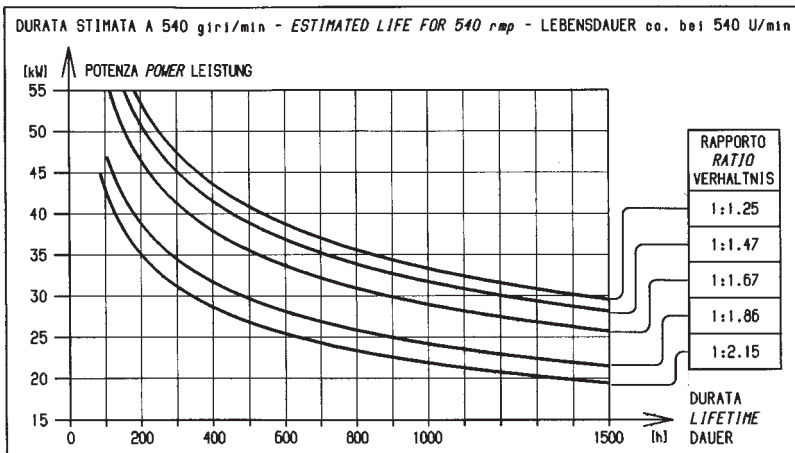
COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 1 ISO REF. 1 ISO BEZ. 1 ISO	RIF. 1 UNC REF. 1 UNC BEZ. 1 UNC	RIF. 3 REF. 3 BEZ. 3	RIF. 17 REF. 18 BEZ. 17
3040150F	290340203	290340206	295034061	448150500R
3040150R	290340202	290340205	295034052	448150500R
3040167F	290340203	290340206	295034061	448167503R
3040167R	290340202	290340205	295034052	448167503R
3040190F	290340203	290340206	295034061	448190500R
3040190R	290340202	290340205	295034052	448190500R

3050



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	in·lb	N·m	in·lb	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:2,15	540	29	40	520	4608	242	2143	215
		1000	45	62	433	3844	201	1788	
	1:1,86	540	33	45	585	5184	315	2792	186
		1000	51	70	487	4324	262	2329	
	1:1,67	540	37	50	650	5760	390	3455	167
		1000	57	77	541	4805	324	2882	
	1:1,47	540	40	55	715	6336	487	4319	147
		1000	62	85	595	5285	405	3603	
	1:1,25	540	44	60	780	6912	624	5530	125
		1000	68	93	649	5766	519	4613	

3050



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

FILETTATURE
THREADS-GEVINDE

S (ISO) - G (UNC)

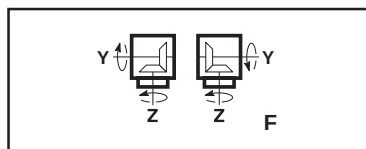
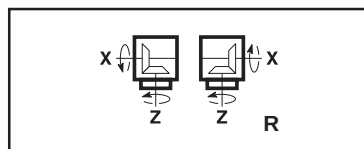
TIPO - TYPE - TYP
3050

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
215 - 186 - 167 - 147 - 125

MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F

TIPO DI FUSIONE
CASING
CONFIGURATION
GUßFORM

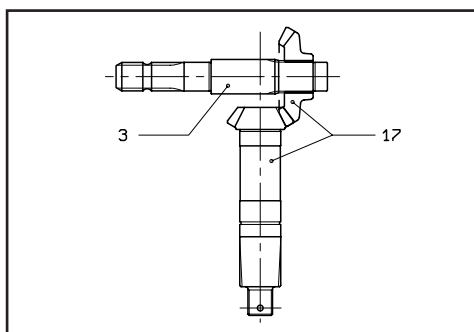
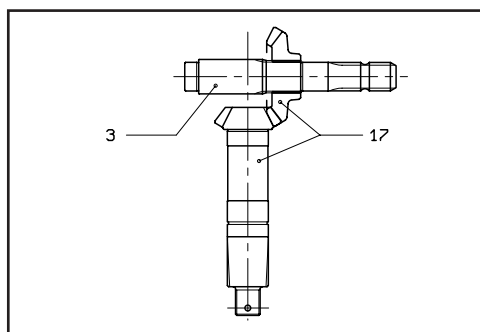
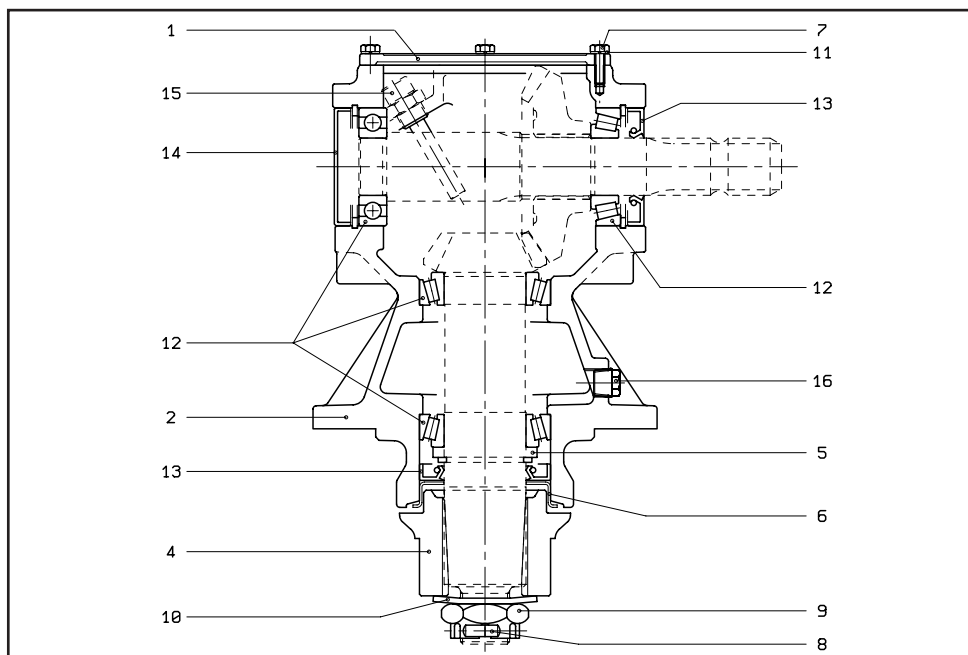
1 - 2 - 3



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,4 L
PESO INDICATIVO SCATOLA 22 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 45 ozs
APPROXIMATE WEIGHT 48,5 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,4 L
GETRIEBEGEWICHT CA. 22 kg



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

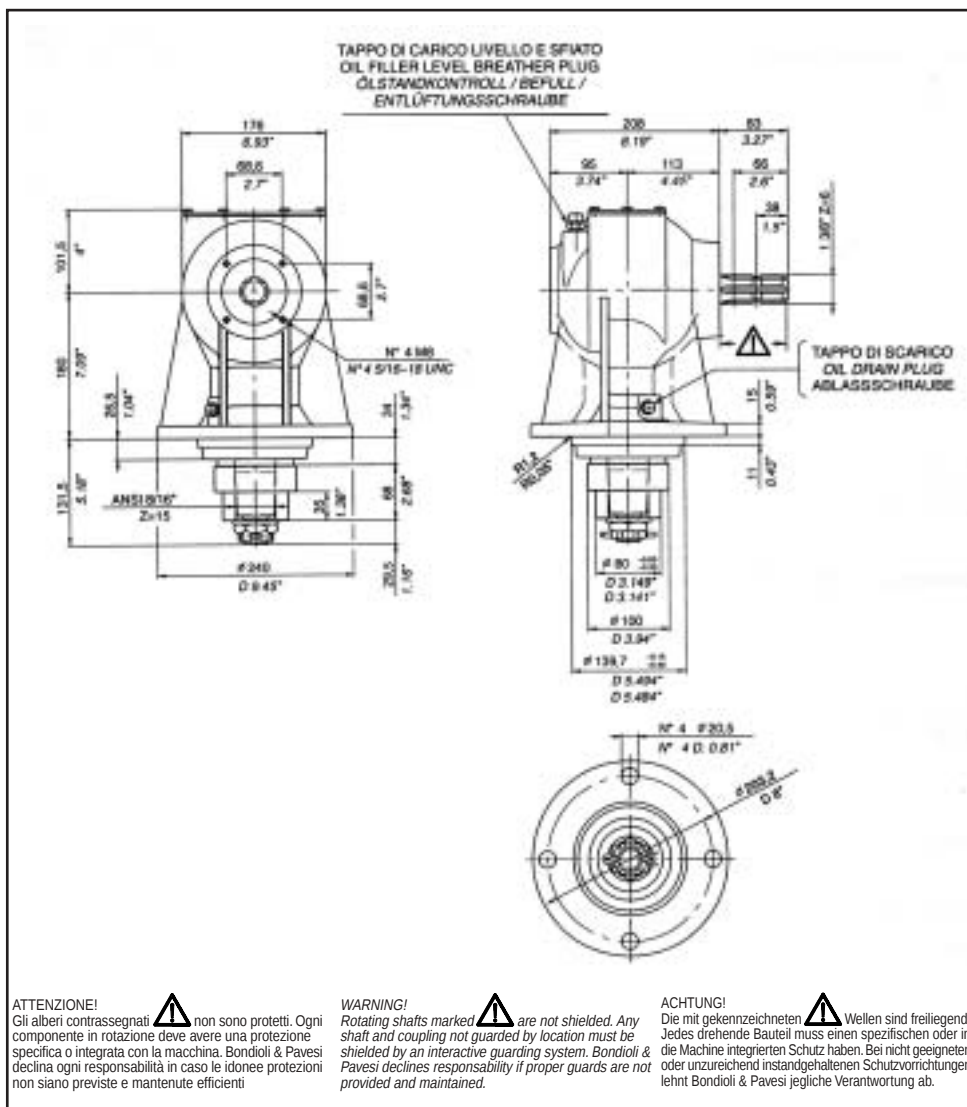
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		190450003
2		★
3		★
4		298405000
5		298405001
6		298464002
7		319000300
8		323002000
9		330002500

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
10		367001001
11		335006002
12		354101035
13	6207	354401035
	30207	354404050
	32010X	355000050
14	50x80x10	355007035
	35x72x10	372003000
15	72x10	373004000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
16	3/8"GAS	373005000
17	3/8"GAS	★

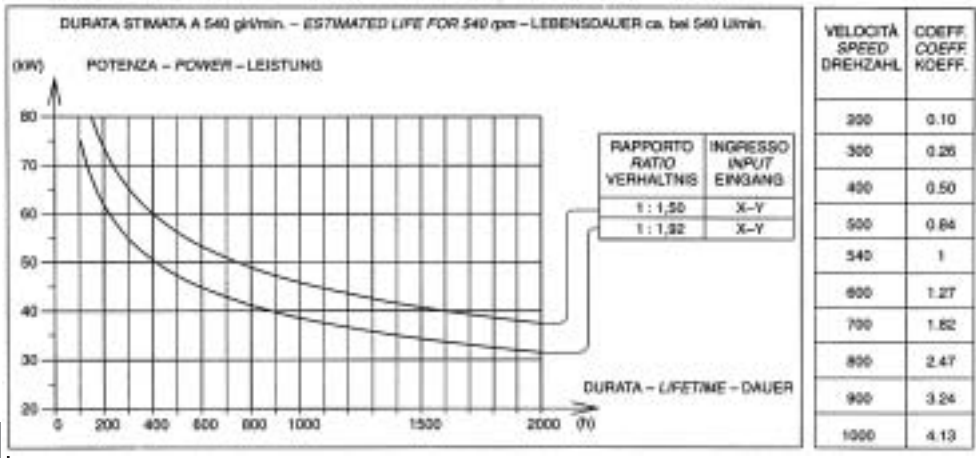
★ CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 2 ISO REF. 2 ISO BEZ. 2 ISO	RIF. 2 UNC REF. 2 UNC BEZ. 2 UNC	RIF. 3 REF. 3 BEZ. 3	RIF. 17 REF. 18 BEZ. 17
3050125F3	290350205	290350208	295034058	448125501R
3050125R1	290350001	290350004	295034057	448125502R
3050125R3	290350204	290350207	295034057	448125501R
3050147F1	290350002	290350005	295034058	448147500R
3050147F2	290350104	290350106	295034058	448147501R
3050147F3	290350205	290350208	295034058	448147502R
3050147R1	290350001	290350004	295034057	448147500R
3050147R2	290350103	290350105	295034057	448147501R
3050147R3	290350204	290350207	295034057	448147502R
3050167F1	290350002	290350005	295034058	448167500R
3050167F2	290350104	290350106	295034058	448167501R
3050167F3	290350205	290350208	295034058	448167502R
3050167R1	290350001	290350004	295034057	448167500R
3050167R2	290350103	290350105	295034057	448167501R
3050167R3	290350204	290350207	295034057	448167502R
3050186F1	290350002	290350005	295034058	448186400R
3050186F2	290350104	290350106	295034058	448186401R
3050186F3	290350205	290350208	295034058	448186402R
3050186R1	290350001	290350004	295034057	448186400R
3050186R2	290350103	290350105	295034057	448186401R
3050186R3	290350204	290350207	295034057	448186402R
3050215F1	290350002	290350005	295034058	448215400R
3050215F2	290350104	290350106	295034058	448215401R
3050215F3	290350205	290350208	295034058	448215402R
3050215R1	290350001	290350004	295034057	448215400R
3050215R2	290350103	290350105	295034057	448215401R
3050215R3	290350204	290350207	295034057	448215402R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.- KODE	
		giri/min. r.p.m. U/min.	P kW	CV/HP/PS	N•m	M in•lb	N•m	in•lb		giri/min. r.p.m. U/min.
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,92	540	48	65	845	7488	440	3900	1037	192
	1:1,50	540	53	72	936	8294	624	5530	810	150

3065



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

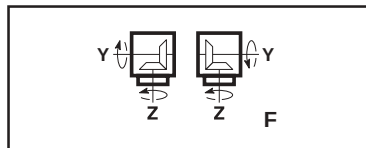
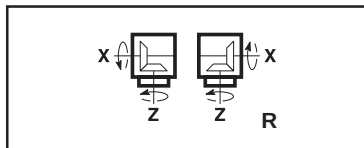


FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
3065

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
192 - 150

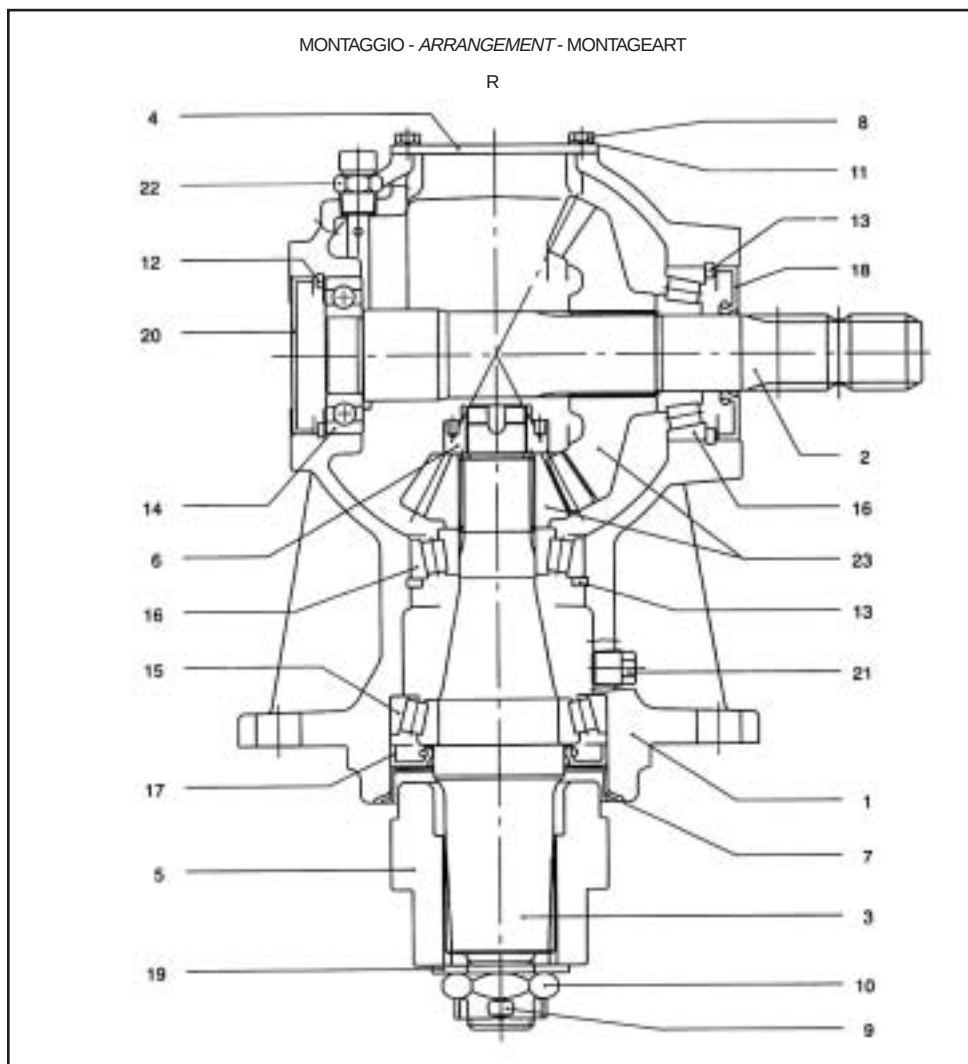
MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,7 L
PESO INDICATIVO SCATOLA 32 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 58 ozs
APPROXIMATE WEIGHT 71 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,7 L
GETRIEBEGEWICHT CA. 32 kg



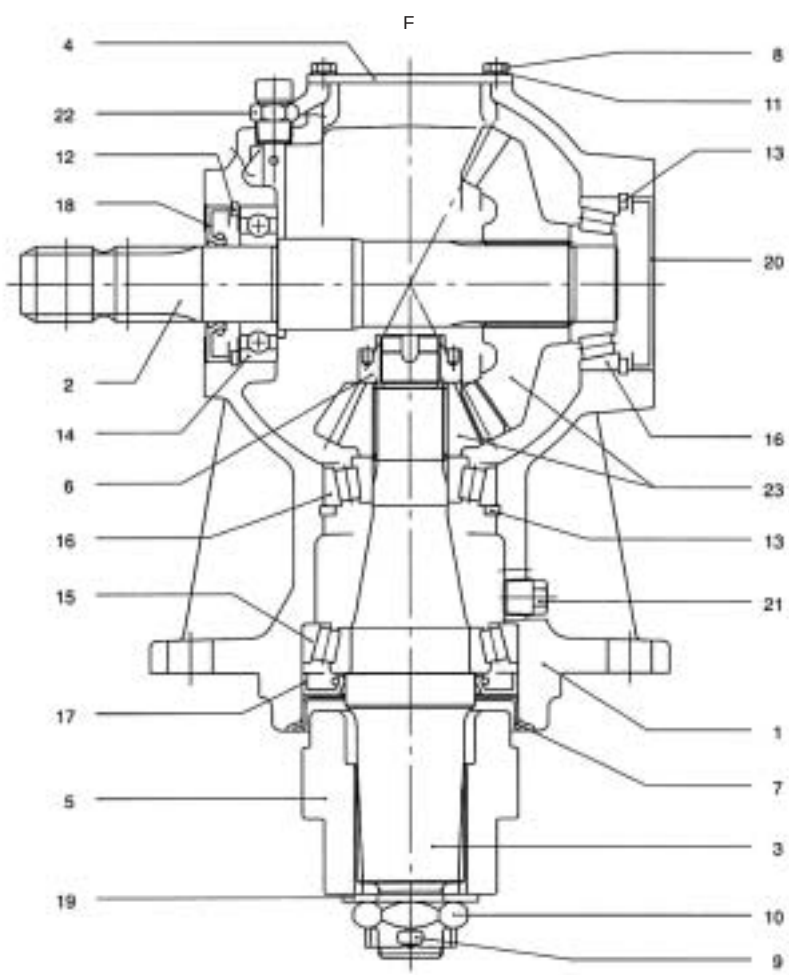
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		290370200
2		295034113
3		295404070
4		298000095
5		298100026
6	M28x1,5	298202801
7		298665000
8	M6x14 UNI 5739	319032200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
9	6x60 UNI 1336	323002000
10	M30x2 UNI 5594	330002500
11		335006002
12	72x3 DIN 472/2	339001072
13	80x4 DIN 472/2	339002080
14	6207	354101035
15	30211	354104055
16	30307	354408035

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
17		355003060
18		355006035
19	31x63x3,5DIN2039	367001001
20		372003000
21	3/8" GAS	373005000
22	3/8" GAS	373064000
23	R = 1:1,92	448192616
	R = 1:1,50	448150611

3065

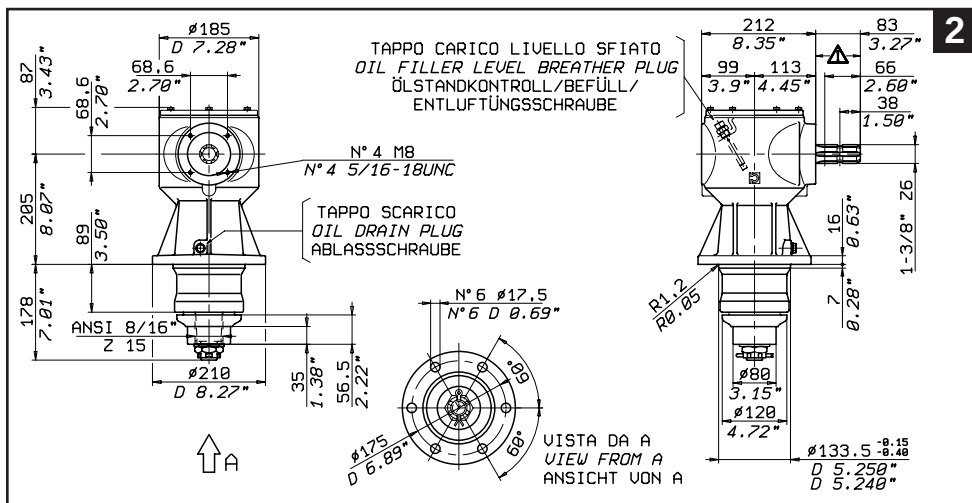
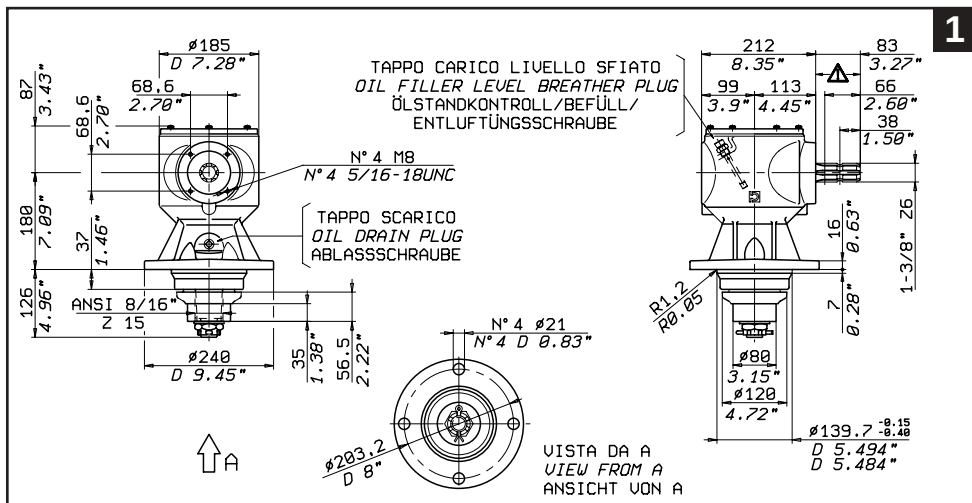
MONTAGGIO - ARRANGEMENT - MONTAGEART



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		290370201
2		295034114
3		295404070
4		298000095
5		298100026
6	M28x1,5	298202801
7		298665000
8	M6x14 UNI 5739	319032200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
9	6x60 UNI 1336	323002000
10	M30x2 UNI 5594	330002500
11		335006002
12	72x3 DIN 472/2	339001072
13	80x4 DIN 472/2	339002080
14	6207	354101035
15	30211	354401055
16	30307	354408035

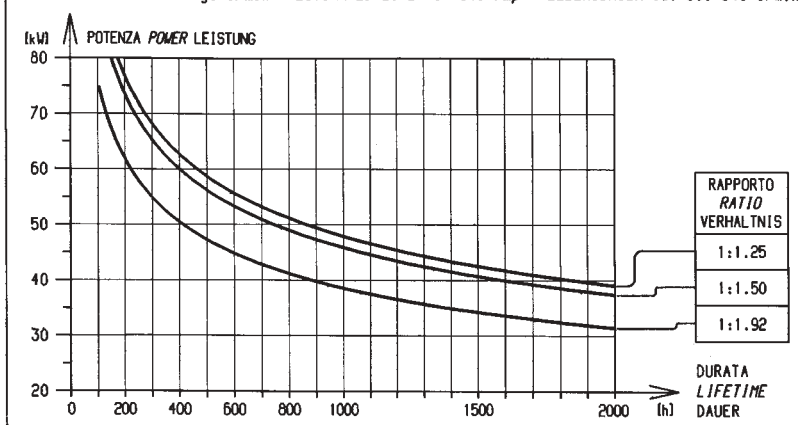
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
17		355003060
18		355007035
19	31x63x3,5DIN2039	367001001
20		372005000
21	3/8" GAS	373005000
22	3/8" GAS	373064000
23	R = 1:1,92	448192616
	R = 1:1,50	448150611



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	in·lb	N·m	in·lb	
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,92	540	48	65	845	7488	440	3900	1037
		1000	74	100	703	6246	366	3253	1920
	1:1,50	540	53	72	936	8294	624	5530	810
		1000	82	111	779	6919	519	4613	1500
	1:1,25	540	55	75	975	8640	780	6912	675
		1000	85	116	811	7207	649	5766	1250

3070

DURATA STIMATA A 540 giri/min - ESTIMATED LIFE FOR 540 rpm - LEBENSDAUER ca. bei 540 U/min



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER



FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

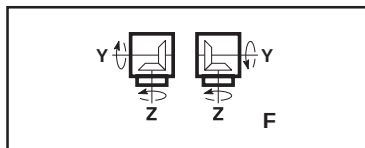
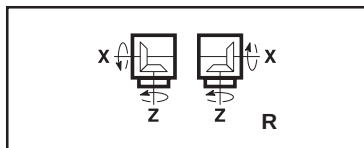
TIPO - TYPE - TYP
3070

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
192 - 150 - 125

MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F

TIPO DI FUSIONE
CASING
CONFIGURATION
GUßFORM

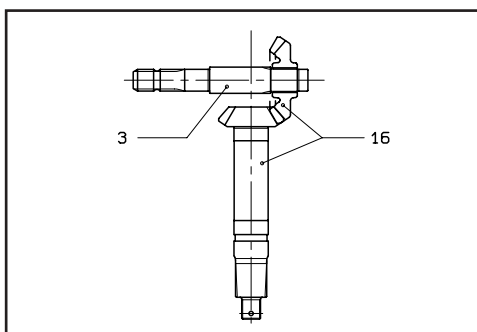
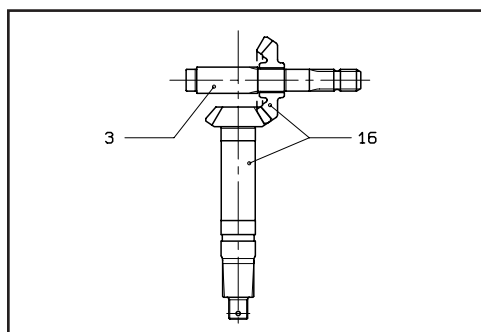
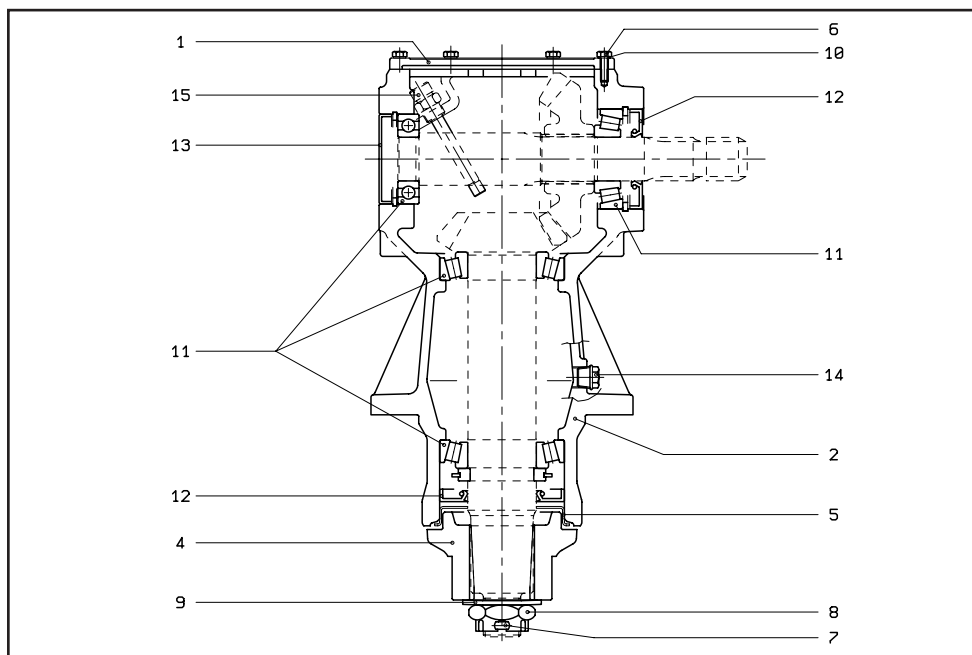
1 - 2



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,7 L
PESO INDICATIVO SCATOLA 32 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 58 ozs
APPROXIMATE WEIGHT 71 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,7 L
GETRIEBEGEWICHT CA. 32 kg



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		190650005
2		*
3		*
4		298614000
5		298665002
6		319000300
7		323002000
8		330002500
9		367001001

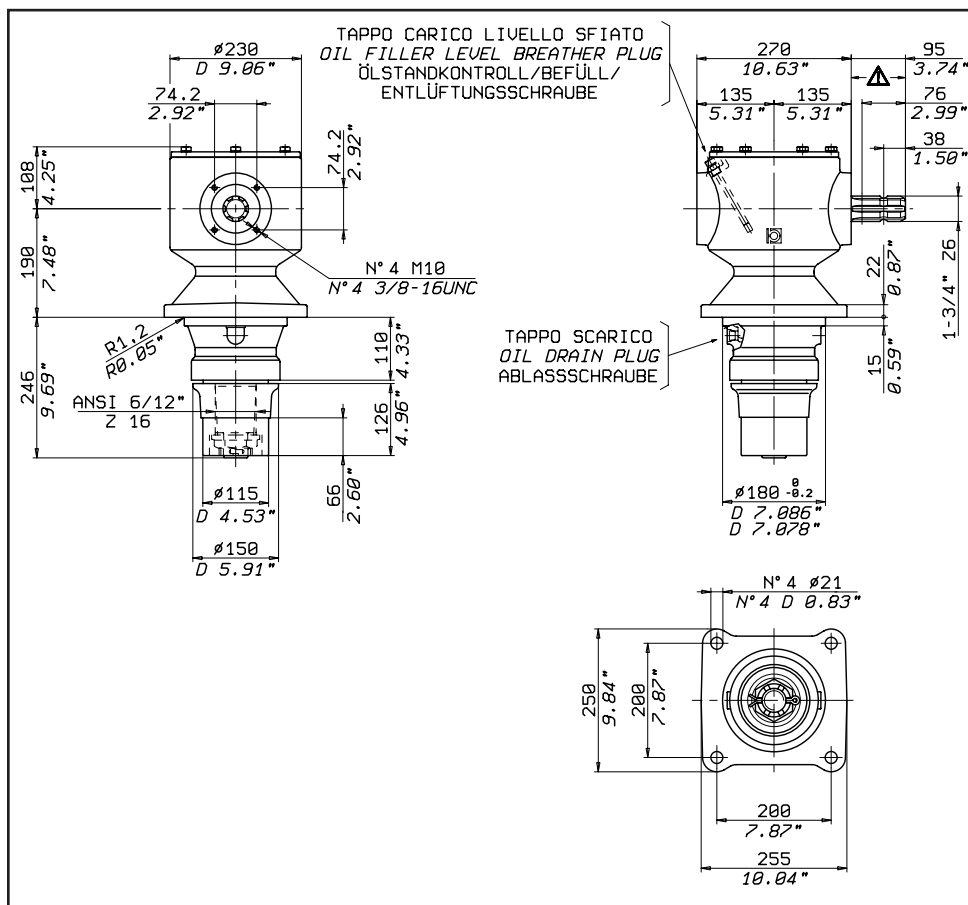
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
10		335006002
11		354101035
12	6207	354401055
	30211	354408035
	30307	355001055
13	55x100x10	355006035
	35x80x10	355007035
	35x72x10	372003000
14	72x10	372005000

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
	80x10	373005000
15	3/8"GAS	373006000
16	3/8"GAS	*

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

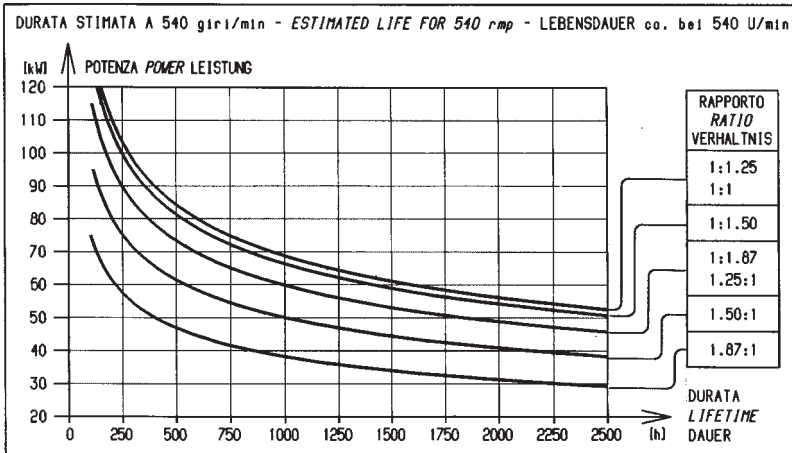
3070

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 2 ISO REF. 2 ISO BEZ. 2 ISO	RIF. 2 UNC REF. 2 UNC BEZ. 2 UNC	RIF. 3 REF. 3 BEZ. 3	RIF. 16 REF. 17 BEZ. 16
3070125F1	290370002	290370004	295034060	448125602R
3070125F2	290370103	290370106	295034060	448125603R
3070125R1	290370001	290370003	295034054	448125602R
3070125R2	290370102	290370105	295034054	448125603R
3070150F1	290370002	290370004	295034060	448150603R
3070150F2	290370103	290370106	295034060	448150604R
3070150R1	290370001	290370003	295034054	448150603R
3070150R2	290370102	290370105	295034054	448150604R
3070192F1	290370002	290370004	295034060	448192604R
3070192F2	290370103	290370106	295034060	448192605R
3070192R1	290370001	290370003	295034054	448192604R
3070192R2	290370102	290370105	295034054	448192605R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE INGRESSO-INPUT-EINGANG
		giri/min. r.p.m U/min.	kW	P CV·hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,87	540	66	90	1170	10368	626	5544	1010	187
		1000	102	139	973	8649	521	4625	1870	
	1:1,50	540	74	100	1300	11520	867	7680	810	150
		1000	114	155	1082	9610	721	6407	1500	
	1:1,25	540	77	105	1365	12096	1092	9677	675	125
		1000	119	162	1136	10090	908	8072	1250	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1:1	540	81	110	1430	12672	1430	12672	540	100
		1000	125	170	1190	10571	1190	10571	1000	
	1,25:1	540	67	91	1183	10483	1479	13104	432	080
		1000	103	141	984	8745	1230	10931	800	
	1,50:1	540	57	78	1014	8986	1520	13472	360	067
		1000	89	121	844	7496	1265	11238	667	
1,87:1	540	43	58	754	6682	1409	12489	289	053	
	1000	66	90	627	5574	1172	10418	535		

3100



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

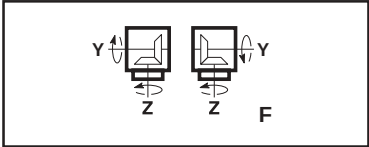
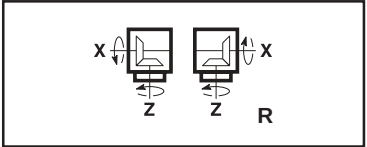


FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

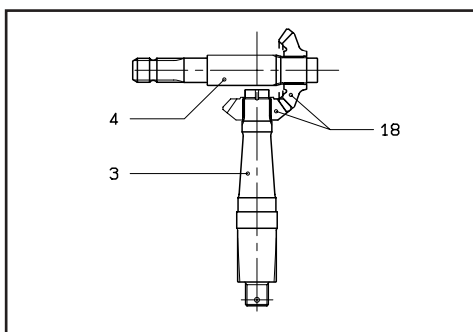
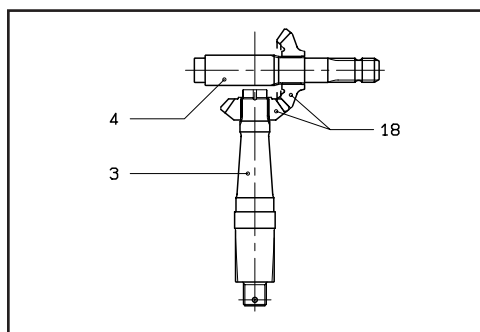
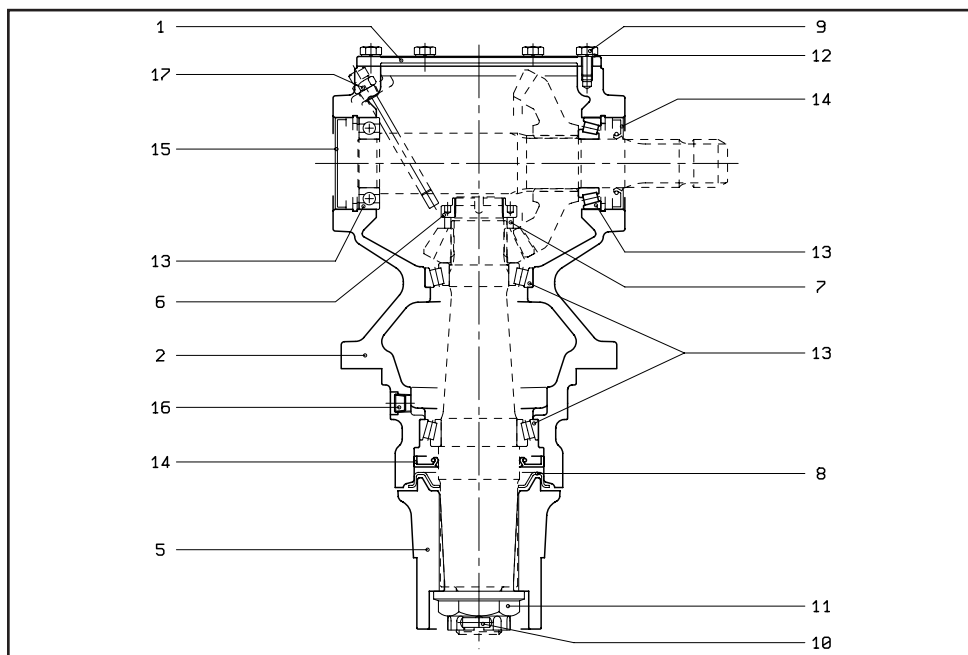
TIPO - TYPE - TYP
3100

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
187 - 150 - 125 - 100 - 080 - 067 - 053

MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



OLIO CONSIGLIATO	SAE 90 EP	RECOMMENDED OIL GRADES	SAE 90 EP	EMPFOHLENES ÖL	SAE 90 EP
QUANTITA' OLIO INDICATIVA	4,5 L	APPROXIMATE OIL QUANTITY	153 ozs	MENGE ÖL CA.	4,5 L
PESO INDICATIVO SCATOLA	56 kg	APPROXIMATE WEIGHT	123 lbs	GETRIEBEGEWICHT CA.	56 kg



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

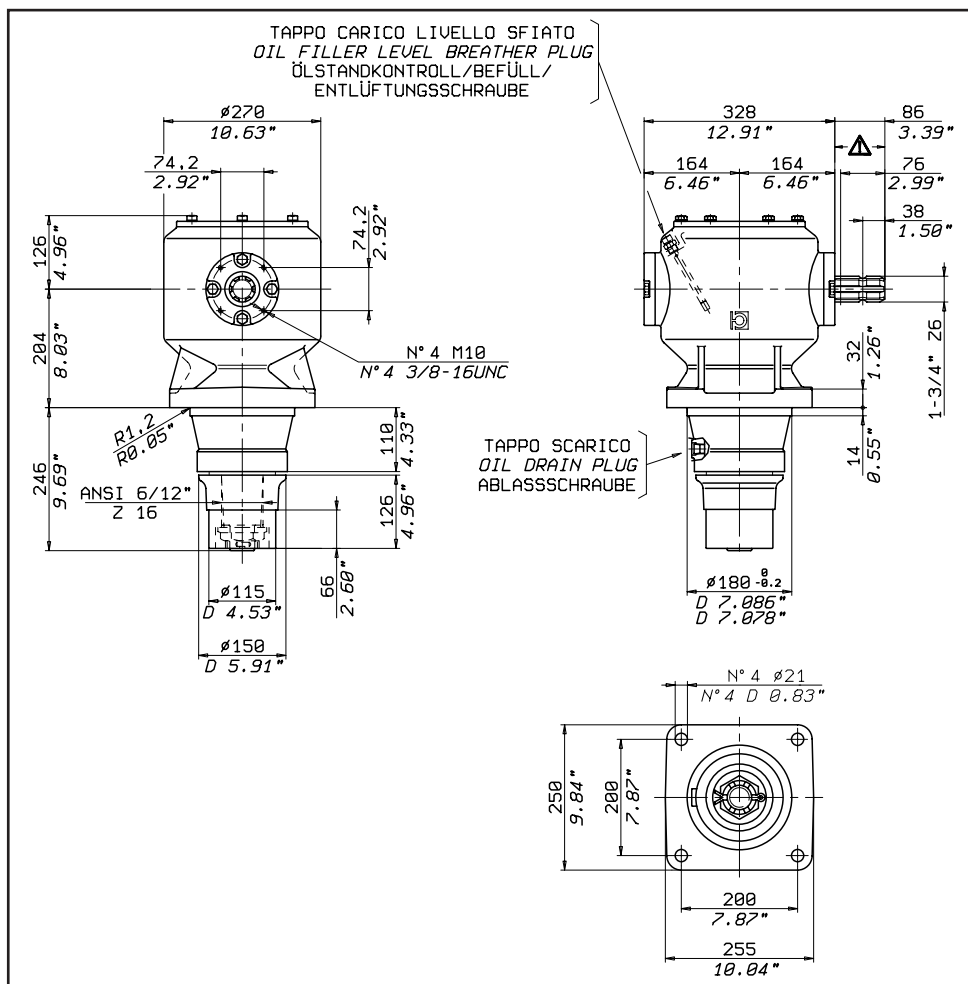
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		190950002
2		★
3		295404036
4		★
5		298106403
6		298204501
7		298405200
8		298966001
9		319002200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
10	ISO	310001102
	UNC	323004000
11		330001209
12		335010001
13		354100045
14	6209	354400045
	30209	354401055
	30211	354402070
	32014X	355000045

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
15	45x85x10	355000075
	75x120x10	372006000
16	85x10	373010000
17	3/8"GAS	373012000
18	3/8"GAS	★

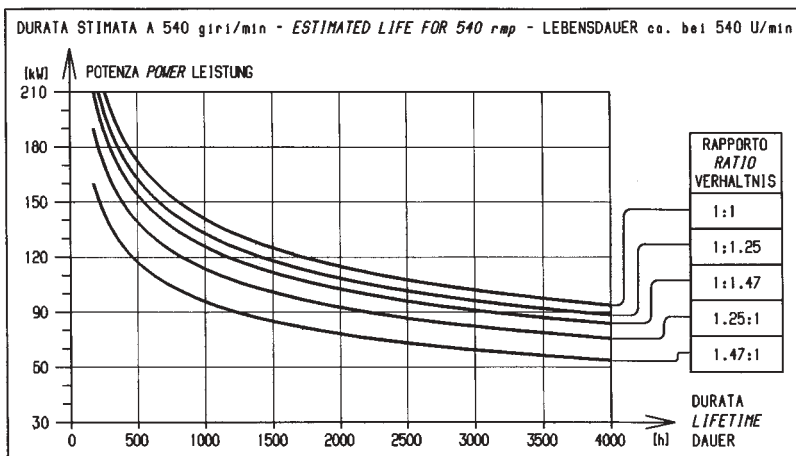
★ CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

COD.SCATOLA GEAR BOX CODE GETRIEBE BESTELL-NR	RIF. 2 ISO REF. 2 ISO BEZ. 2 ISO	RIF. 2 UNC REF. 2 UNC BEZ. 2 UNC	RIF. 4 REF. 4 BEZ. 4	RIF. 18 REF. 19 BEZ. 18
3100067F	290390002	290390004	295044020	448150600R
3100067R	290390001	290390003	295044015	448150600R
3100080R	290390001	290390003	295044015	448125607R
3100100F	290390002	290390004	295044020	448100600R
3100100R	290390001	290390003	295044015	448100600R
3100125F	290390002	290390004	295044020	448125607R
3100125R	290390001	290390003	295044015	448125607R
3100150F	290390002	290390004	295044020	448150600R
3100150R	290390001	290390003	295044015	448150600R
3100187R	290390001	290390003	295044015	448187500R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
MULTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1.47	540	125	170	2210	19584	1503	13322	147
		1000	193	263	1839	16337	1251	11113	
	1:1.25	540	132	180	2340	20736	1872	16589	125
		1000	205	278	1947	17298	1557	13838	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1:1	540	140	190	2470	21888	2470	21888	100
		1000	216	294	2055	18259	2055	18259	
	1.25:1	540	114	155	2019	17895	2524	22369	080
		1000	177	240	1680	14928	2100	18660	
		540	95	129	1683	14913	2474	21922	
		1000	147	200	1400	12440	2058	18287	

3150



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

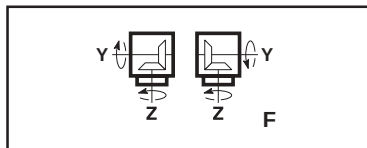
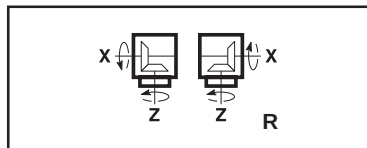
CODIFICA
CODES
BESTELLNUMMER

FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
3150

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
147 - 125 - 100 - 080 - 068

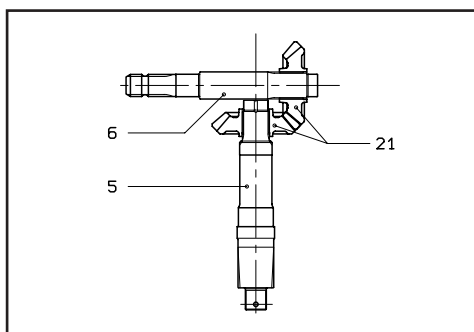
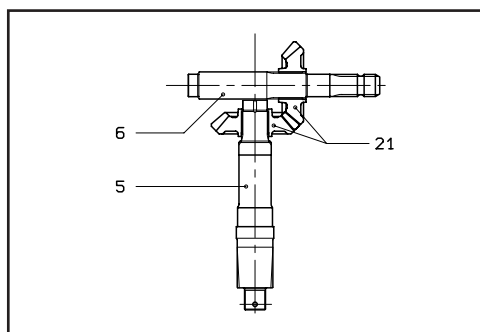
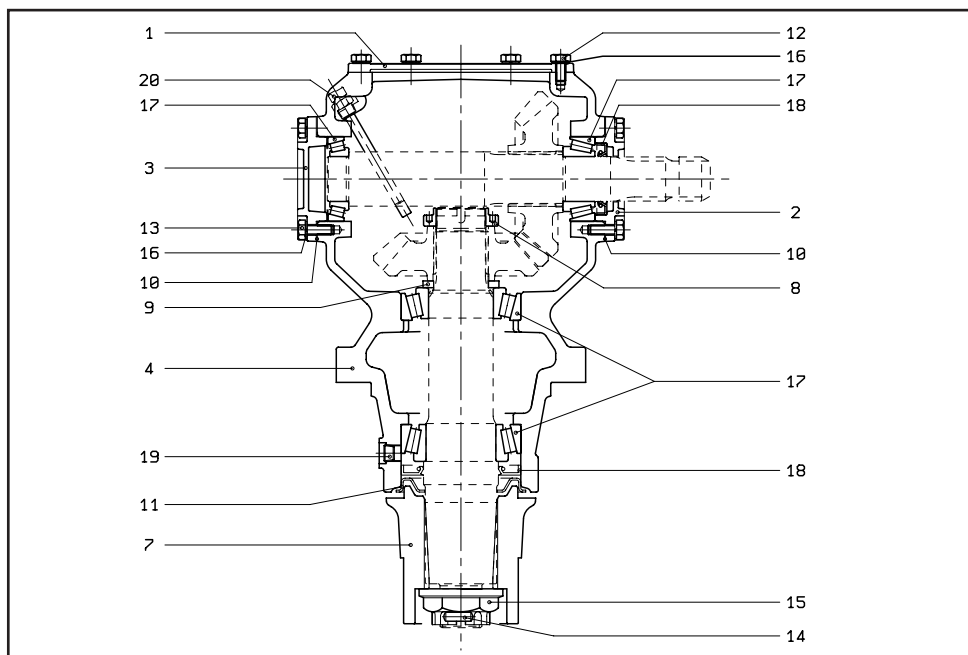
MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 4,5 L
PESO INDICATIVO SCATOLA 65 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 152 ozs
APPROXIMATE WEIGHT 143 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 4,5 L
GETRIEBEGEWICHT CA. 65 kg



SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		190950001
2		29001A000
3		29001A001
4	ISO	290390800
	UNC	290390500
5		295404035
6		*
7		298106403
8		298205003

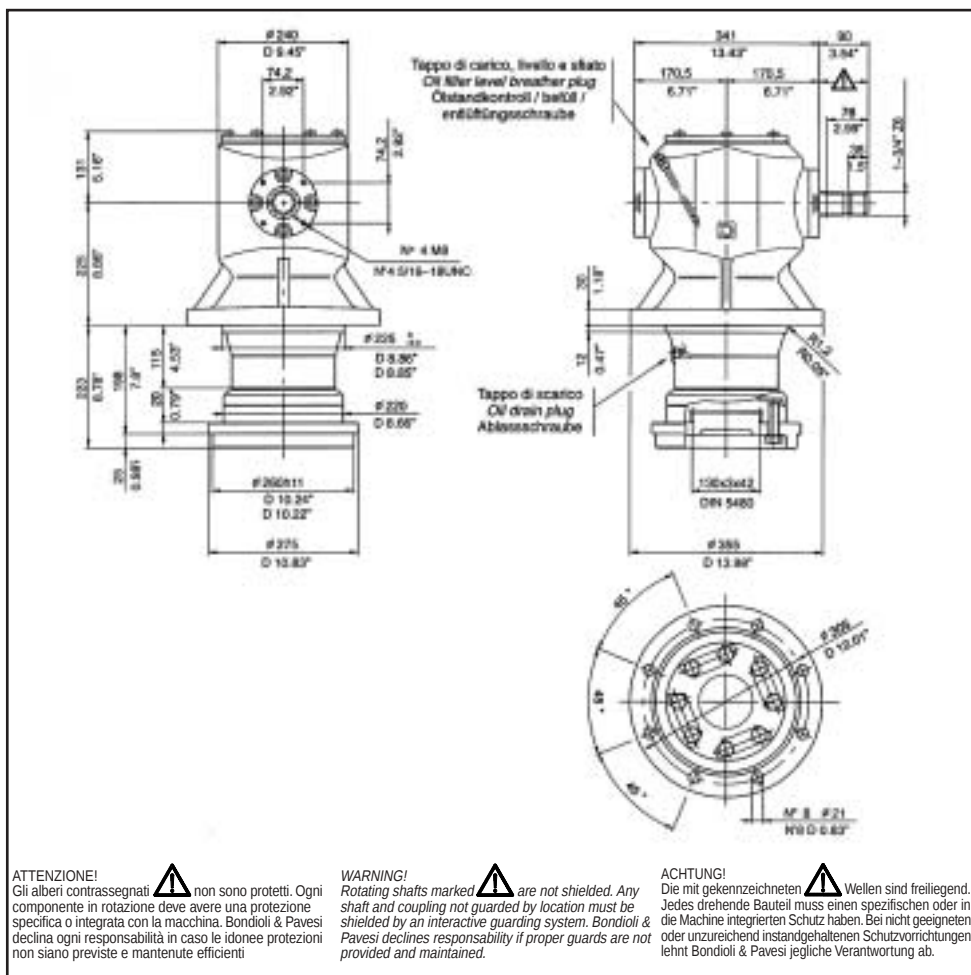
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
9		*
10		298938500
11		298966001
12		319002200
13		319012200
14		323004000
15		330001209
16		335010001
17		354400045

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
18	30209	354401065
	32213	354401070
	33114	354402045
	33209	355000075
19	75x120x10	355002045
	45x72x10	373010000
20		373012000
21		*

* CODICE A PAGINA SEGUENTE - CODE ON FOLLOWING PAGE - BEST.-NR. FINDEN SIE AUF DER FOLGENDEN SEITE

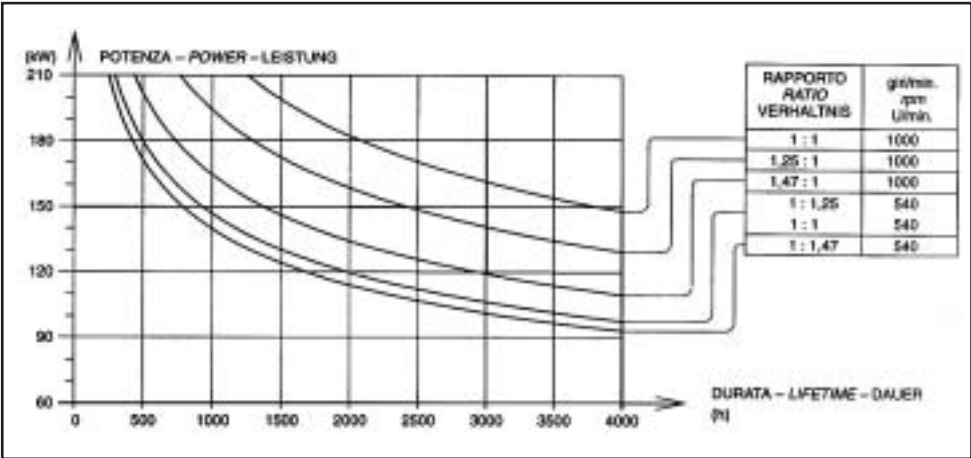
3150

COD. SCATOLA GEAR BOX CODE GETRIEBE BESTELL.-NR	RIF. 6 REF. 6 BEZ. 6	RIF. 9 REF. 9 BEZ. 9	RIF. 21 REF. 22 BEZ. 21
3150100F	295044004	295405500	448100708R
3150100R	295044000	298405500	448100708R
3150147F	295044004	298405002	448147700R
3150147R	295044000	298405002	448147700R



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV/HP-PS	N•m	M in•lb	N•m	in•lb	giri/min. r.p.m. U/min.	
MOLTIPLICATORE SPEED MULTIPLIER ÜBERSETZUNGS- GETRIEBE	1:1,47	540	125	170	2210	19584	1503	13322	794	147
	1:1,25	540	132	180	2340	20736	1872	16589	675	125
	1:1	540 1000	129 199	175 270	2280 1900	20180 16816	2280 1900	20180 16816	540 100	100
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,25:1	1000	176	240	1680	14870	2100	18587	800	080
	1,47:1	1000	147	200	1400	12390	2058	18287	680	068

3160



Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA
CODES
BESTELLNUMMER

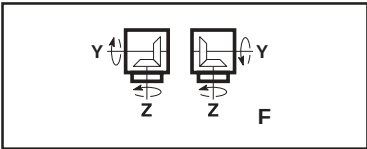
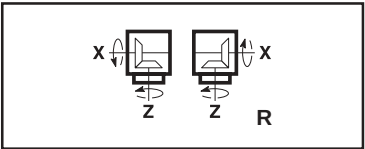


FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
3160

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
147 - 125 - 100 - 080 - 068

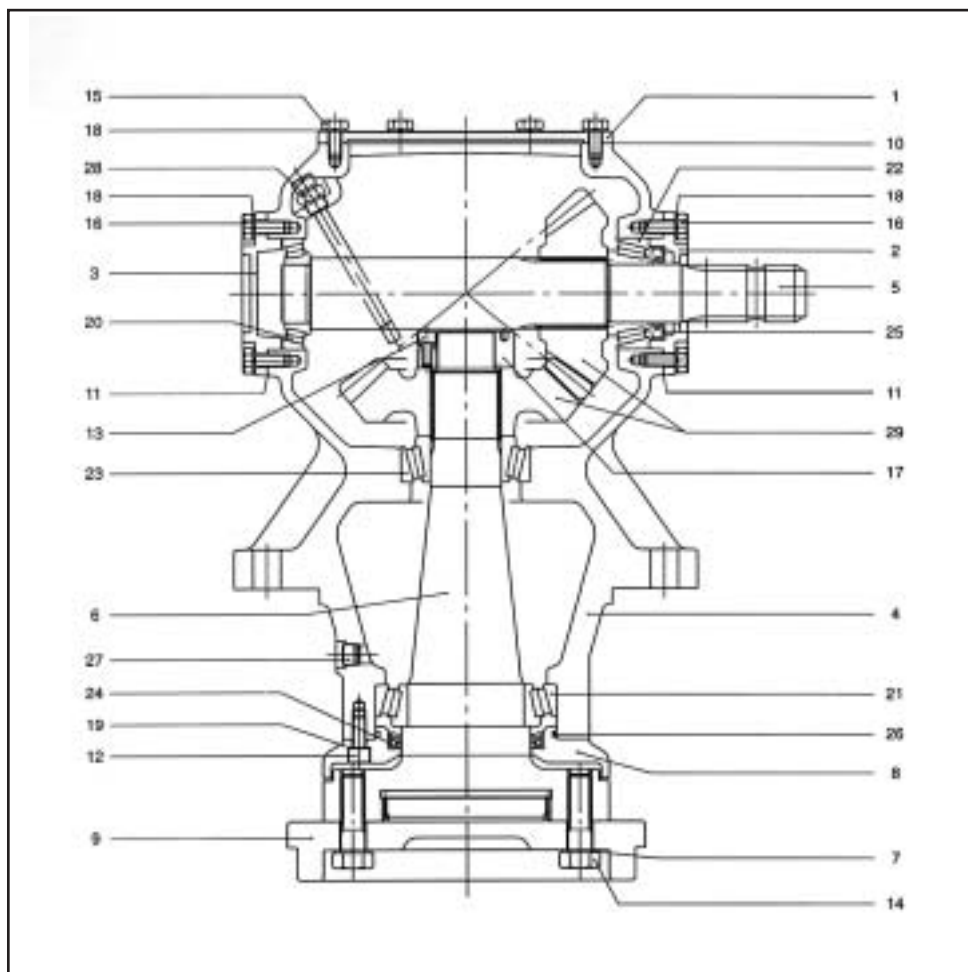
MONTAGGIO - ARRANGEMENT - MONTAGEART: R - F



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 4,5 L
PESO INDICATIVO SCATOLA 113 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 157,5 ozs
APPROXIMATE WEIGHT 250 lbs

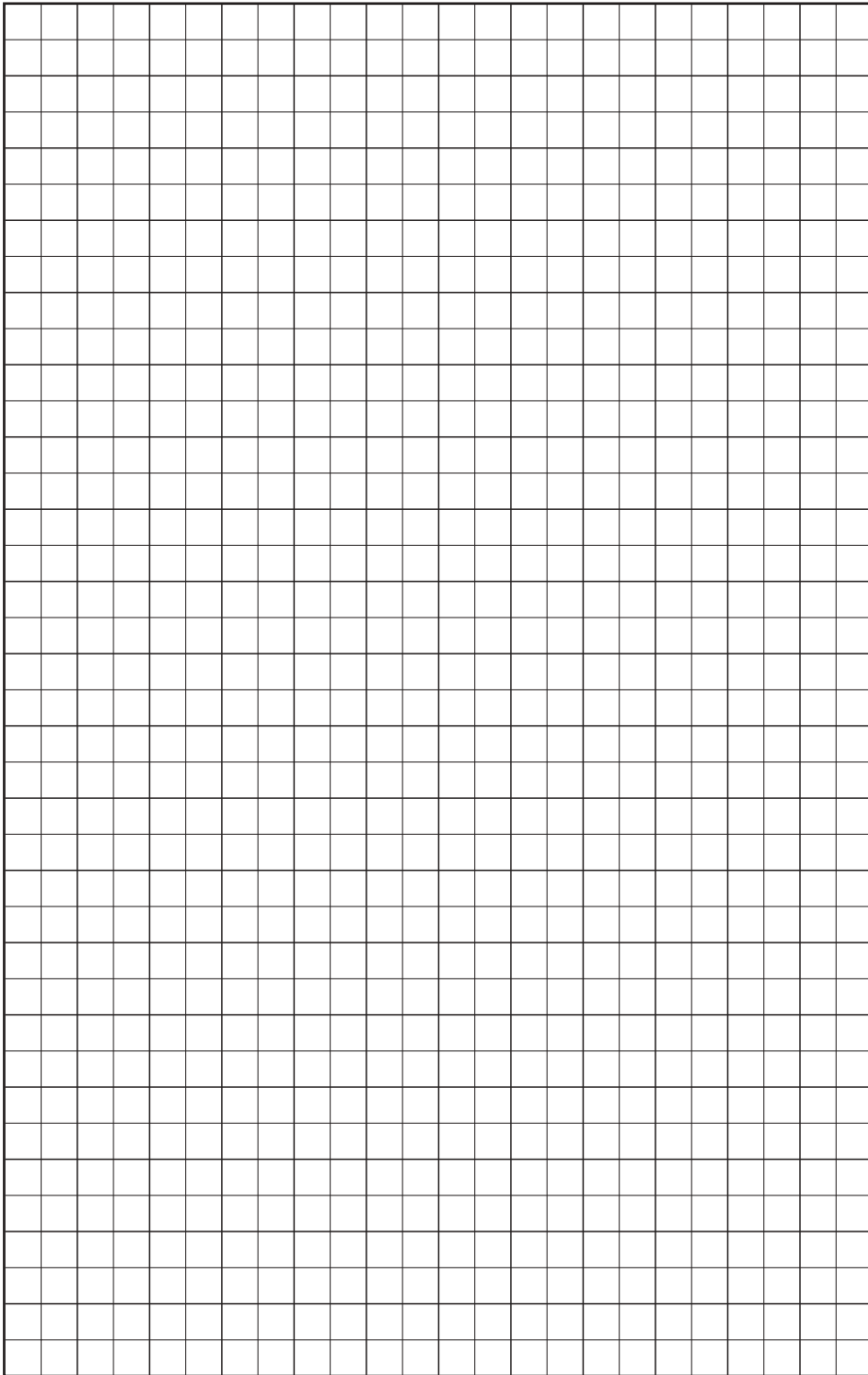
EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 4,5 L
GETRIEBEGEWICHT CA. 113 kg



RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1		190950003
2		29001A000
3		29001A001
4		290390600
5		295044023
6		295409804
7		298001900
8		298110000
9		298126000
10		298938500
11		303001200

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
12	M10x25 UNI5931	303008000
13	M8x18 UNI5931	317024300
14	M18x60 UNI5737	319002200
15	M10x20 UNI5739	319012200
16	M10x25 UNI5739	330045002
17		335010001
18	10x18x1,8 DIN128B	336010001
19	Schnorr S10	354400045
20	30209	354400090
21	32010	354402045
22	33209	354407055

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
23	33211	355000100
24	100x120x12	355002045
25	45x72x10	358010000
26		373010000
27	3/8" GAS	373012000
28	3/8" GAS	448147800
	R = 1:1,47	448125701
	R = 1:1,25	448100745
	R = 1:1	448125701
	R = 1,25:1	448147800
	R = 1,47:1	



**SERIE
SERIES 4003-4004**

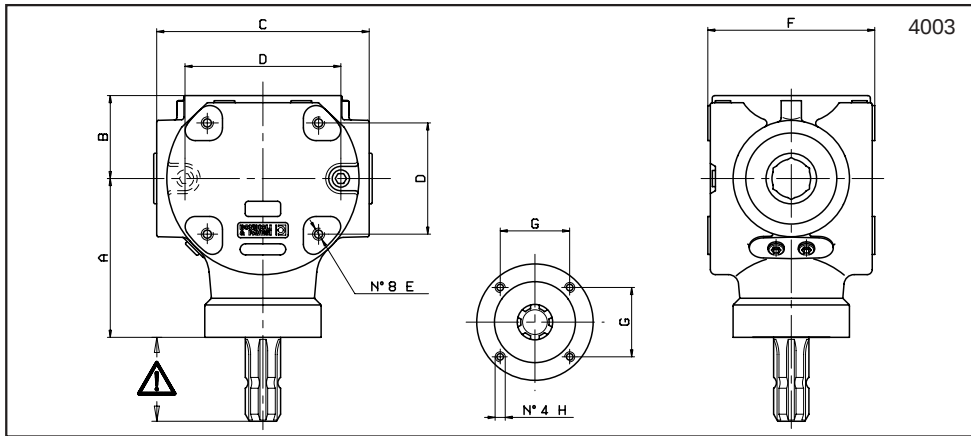


**BONDIOLI
& PAVESI**

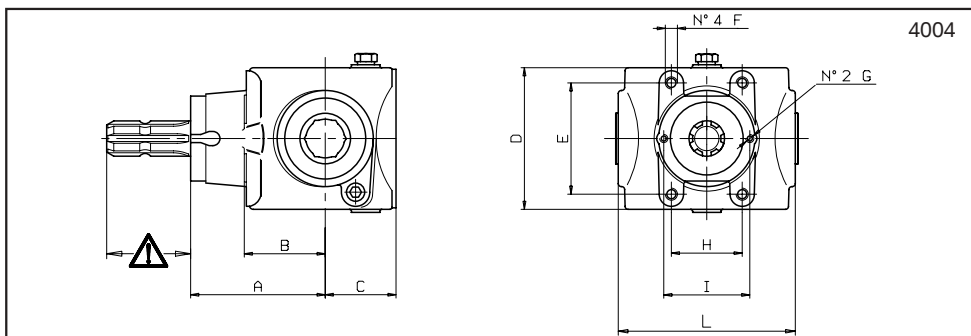


4003-4004





Tipo Type - Typ	A	B	C	D	E	F	G	H
S4023	115	67	164	88	M10	120	54,4	M8
G4023	4,53"	2,64"	6,46"	3,46"	3/8-16UNC	4,72"	2,14"	5/16-18UNC
S4033	137	70	180	88	M12	144	61,5	M8
G4033	5,39"	2,76"	7,09"	3,46"	1/2-13UNC	5,67"	2,42"	5/16-18UNC
S4053	157	82	210	110	M12	165	68,6	M10
G4053	6,18"	3,23"	8,27"	4,33"	1/2-13UNC	6,50"	2,70"	3/8-16UNC
S4073	175	90	230	115	M14	175	68,6	M10
G4073	6,89"	3,54"	9,06"	4,53"	9/16-12UNC	6,89"	2,70"	3/8-16UNC
S4083	197	100	244	127	M16	190	73,5	M10
G4083	7,76"	3,94"	9,61"	5"	5/8-11UNC	7,48"	2,89"	3/8-16UNC



Tipo Type - Typ	A	B	C	D	E	F	G	H	I	L
S4034	133	78	70	140	110	M12	M8	70	85	175
G4034	5,24"	3,07"	2,76"	5,51"	4,33"	1/2-13UNC	5/16-18UNC	2,76"	3,35"	6,89"
S4054	155	92	82	156	120	M12	M10	80	92	203
G4054	6,10"	3,62"	3,23"	6,14"	4,72"	1/2-13UNC	3/8-16UNC	3,15"	3,62"	7,99"

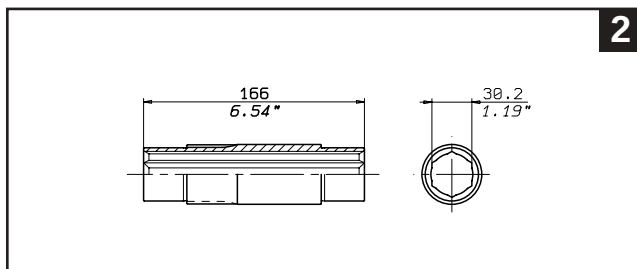
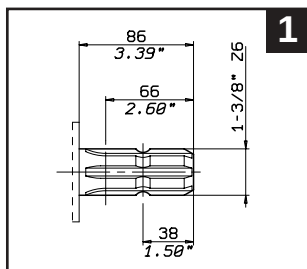
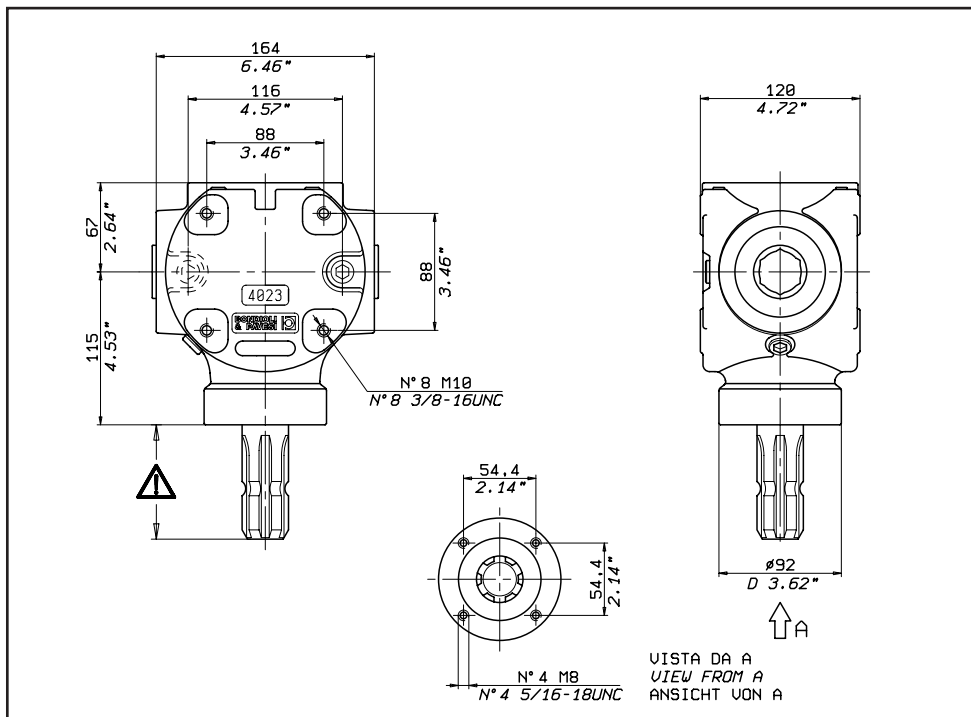
4003-4004

- PRINCIPALI APPLICAZIONI:
FRESE INTERFILARI, FRESE
SPOSTABILI.
- ALBERI X-Y CAVI CON PROFILO
ESAGONALE
- RAPPORTI IN RIDUZIONE FINO A
2,44:1
- POTENZE FINO A 49 kW A 540 giri/min.
- SCATOLE MONOBLOCCO IN GHISA.
- VERNICIATURA INTERNA ED
ESTERNA,
ESSICCAZIONE IN FORNO,
RESISTENZA
ALLA CORROSIONE SECONDO NORMA
ASTM B 117-79 RESISTENZA ALL'OLIO
SAE 90 EP FINO A 125 °C (260 °F).
- COPPIE CONICHE A DENTATURA
DIRITTA GLEASON IN ACCIAIO
CEMENTATO E TEMPRATO.
- ALBERI ESAGONALI CEMENTATI E
TEMPRATI O CARBONITRURATI.
- ANELLI DI TENUTA CON LABBRO
PARAPOLVERE.
- CUSCINETTI DI QUALITÀ PER ELEVATA
AFFIDABILITÀ (L₁₀).
- TYPICAL APPLICATIONS:
ROTARY TILLERS, OFFSET ROTARY
TILLERS.
- OUTPUT SHAFT HOLLOW WITH
HEXAGONAL PROFILE.
- REDUCTION RATIO UP TO 2.44:1
- POWER UP TO 49 kW AT 540 r.p.m.
- ONE PIECE CAST IRON CASE MAX
STRENGTH PRECISE POSITIONING
OF INTERNAL COMPONENTS.
- INNER AND OUTER DIPPING AND
OVEN DRYING AT HIGH
TEMPERATURE.
- CORROSION RESISTANCE TO ASTM
B 117-79. CAPABLE OF WORKING UP
TO 125°C (260°F) WITH SAE 90 EP.
- GLEASON SYSTEM STRAIGHT
BEVEL GEAR MADE FROM
CARBURIZED AND HARDENED
STEEL.
- HEXAGONAL HOLLOW SHAFTS ARE
CASE HARDENED OR
CARBONITRIDED.
- SEAL RINGS WITH ANTIDUST LIP.
- QUALITY BEARINGS FOR HIGH
RELIABILITY (L₁₀).
- HAUPTSÄCHLICH VERWENDET BEI:
REIHENHACKFRÄSEN, FRÄSEN MIT
SEITENVERSCHIEBUNG.
- XY - SECHSKANT - HOHLWELLE.
- UNTERSETZUNGSVERHÄLTNISSE BIS
ZU I=2,44:1
- LEISTUNGSBEREICH BIS 49 kW BEI
540 U/min.
- GUß-GETRIEBEGEHÄUSE IN EINEM
STÜCK.
- GEHÄUSE TAUCHGRUNDIERT, IM
EINBRENNVERFAHREN GETROCKNET.
KORROSIONSBESTÄNDIG GEMÄß
NORM ASTM B 117-79
- HITZEBESTÄNDIG BEI SAE 90 EP-ÖL
BIS 125 °C (260 °F).
- KEGELRÄNDER GERADVERZAHNT
UND EINSATZGEHÄRTET.
- SECHSKANTHOHLWELLEN
EINSATZGEHÄRTET ODER
NITRIERGEHÄRTET.
- WELLENDICHRINGE MIT
STAUBSCHUTZLIPPE.
- QUALITÄTS-WÄLZLAGER FÜR
HÖCHSTE ZUVERLÄSSIGKEIT (L₁₀).

POTENZA a 540 giri/min. - POWER at 540 r.p.m. - LEISTUNG bei 540 U/min.

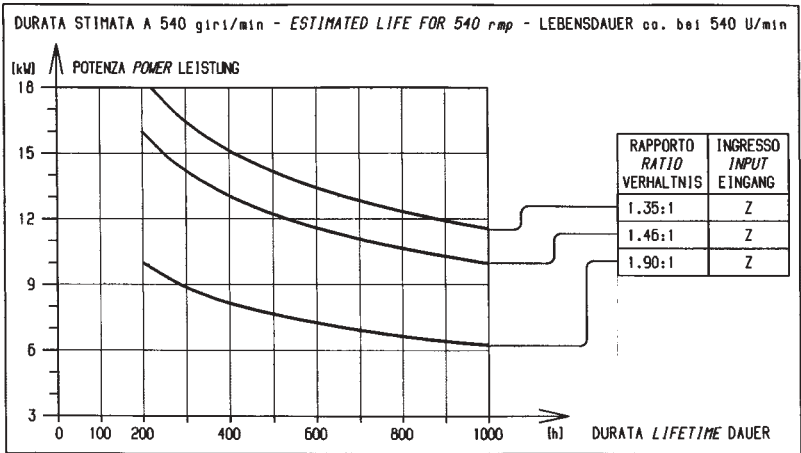
giri/min r.p.m. U/min	Rapporto Ratio Übers-Verth	4023		4033		4034		4053		4054		4073		4083	
		kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS	kW	CV-Hp-PS
	1,35:1	15	20												
	1,46:1	13	18	19	26	19	26	35	48	33	45				
	1,50:1											40	54		
540	1,57:1													49	66
	1,69:1							29	40	26	36				
	1,75:1			15	20	15	20								
	1,81:1			13	18	13	18								
	1,91:1	9	12					24	32	24	32	27	37	33	45
1000	2,44:1					13	18			22	30				
		4023		4033		4034		4053		4054		4073		4083	

4023



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,35:1	540	15	20	260	2303	351	3109	400	135
	1,46:1	540	13	18	234	2073	342	3026	370	146
	1,90:1	540	9	12	156	1382	297	2625	284	190

4023



VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE
THREADS - GEVINDE
S (ISO) - G (UNC)

TIPO - TYPE - TYP
4023

CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE
190 - 146 - 135

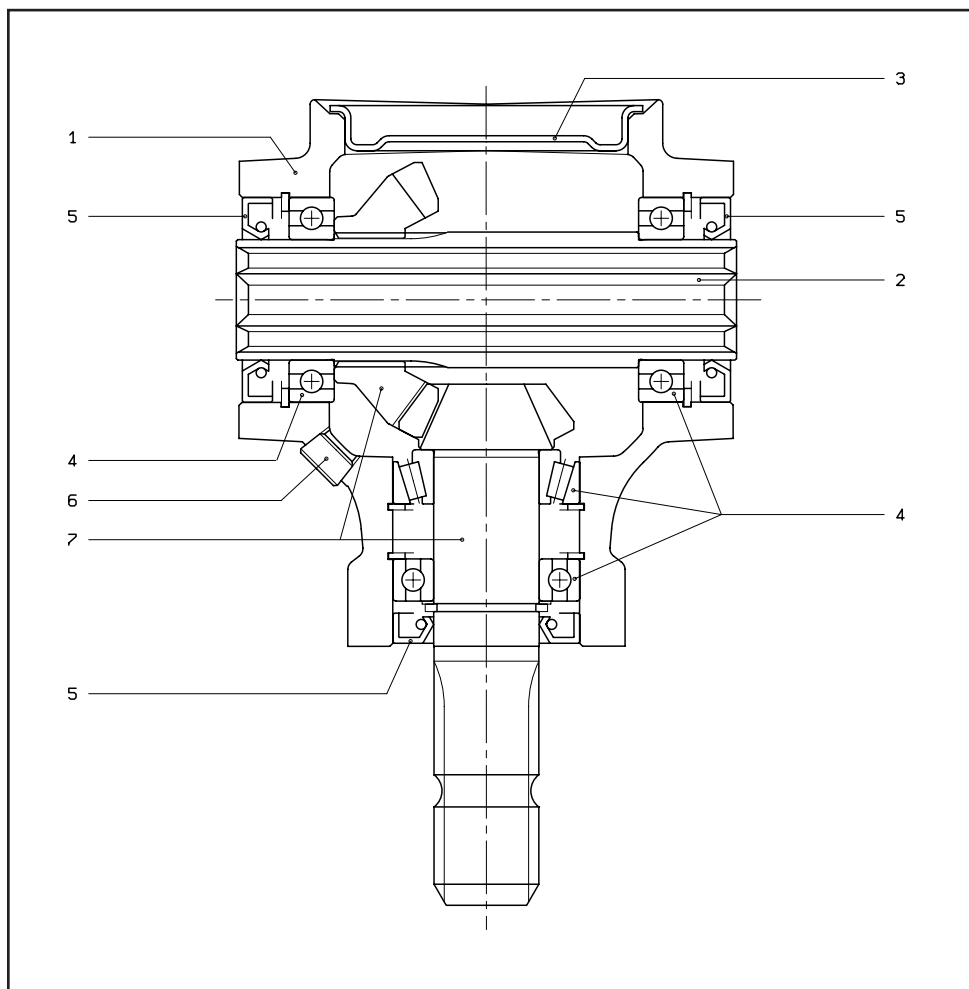
MONTAGGIO - ARRANGEMENT - MONTAGEART

1 2 2

ASSE Z - Z AXIS - WELLE Z

ASSE X-Y - X-Y AXIS - WELLE X-Y

OLIO CONSIGLIATO	SAE 90 EP	RECOMMENDED OIL GRADES	SAE 90 EP	EMPFOHLENES ÖL	SAE 90 EP
QUANTITA' OLIO INDICATIVA	0,6 L	APPROXIMATE OIL QUANTITY	19 ozs	MENGE ÖL CA.	0,6 L
PESO INDICATIVO SCATOLA	9 kg	APPROXIMATE WEIGHT	20 lbs	GETRIEBEGEWICHT CA.	9 kg



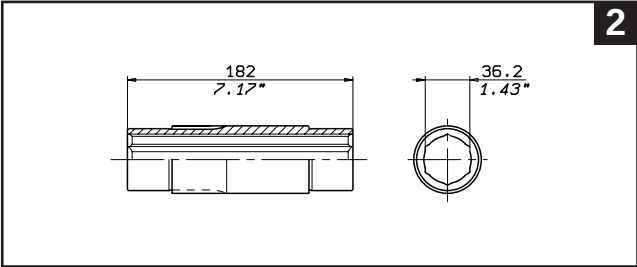
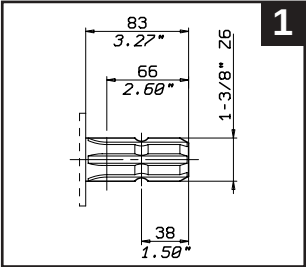
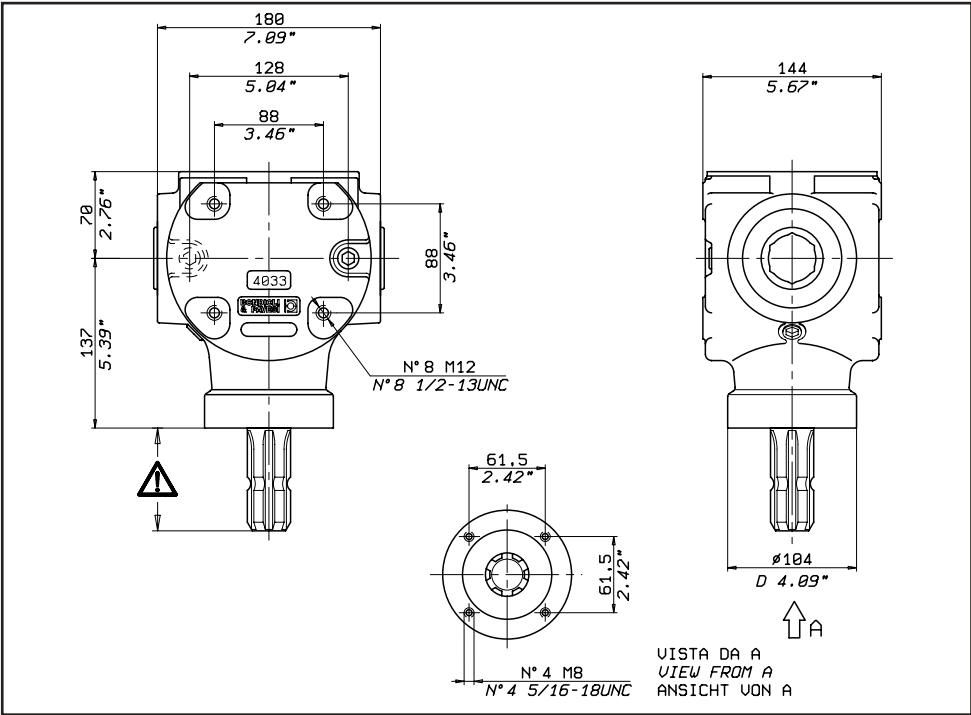
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290220109
	UNC	290220110
2		295400028
3		298609400
4	6008	354106040
	6007	354107035
	32007X	354404035
5	35x62x10	355004035
	40x68x10	355006040

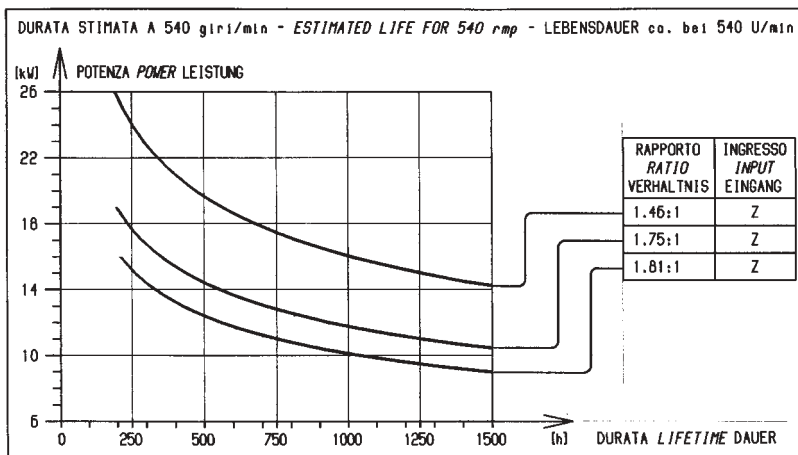
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
6		373010000
7	R = 1,46	448146405R
	R = 1,90	448190424

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

4033



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.- KODE
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,46:1	540	19	26	338	2994	494	4371	146
	1,75:1	540	15	20	260	2303	455	4030	175
	1,81:1	540	13	18	234	2073	424	3751	181



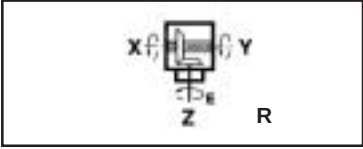
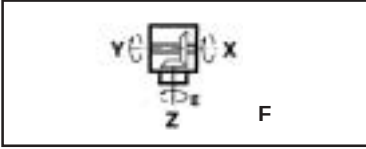
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

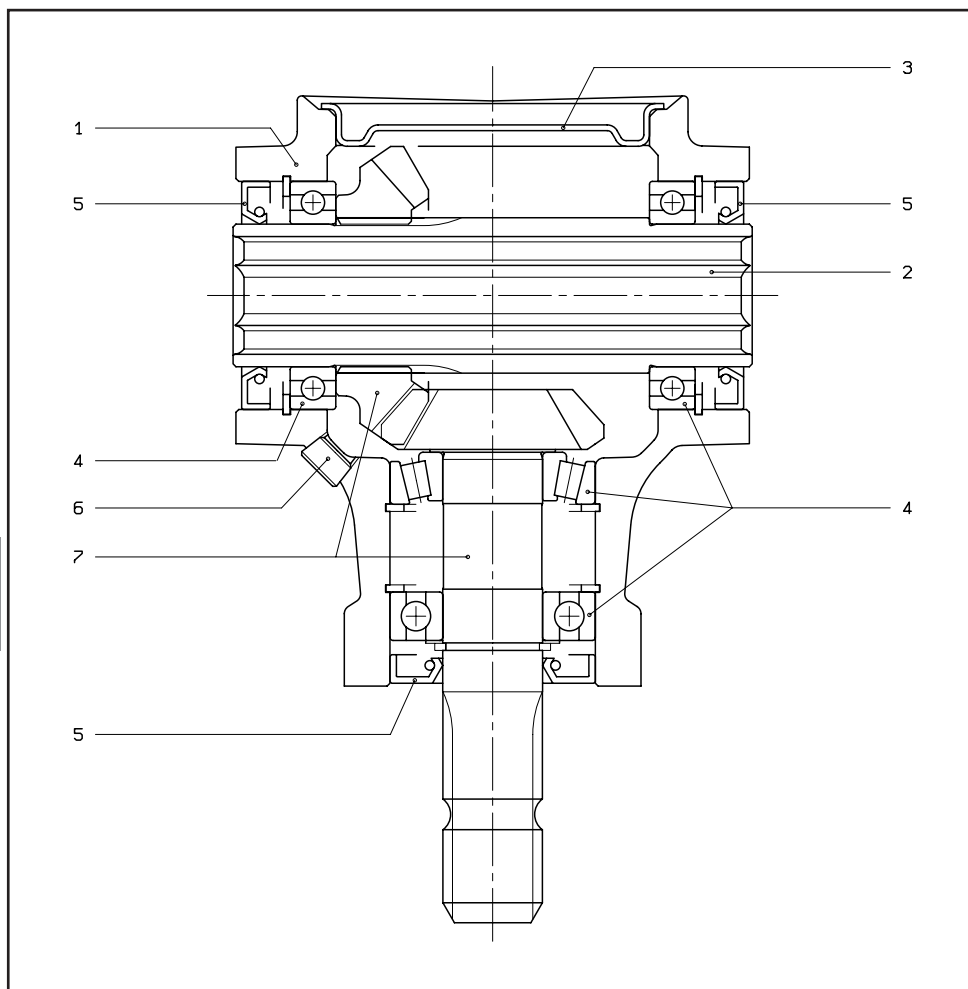
To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

CODIFICA - CODES - BESTELLNUMMER

FILETTATURE THREADS - GEVINDE S (ISO) - G (UNC)	4 0 3 3			1 2 2
TIPO - TYPE - TYP 4033				
CODICE RAPPORTO - RATIO CODE - BESTELL.-KODE 181 - 175 - 146				
MONTAGGIO - ARRANGEMENT - MONTAGEART				
				
	1 ASSE Z - Z AXIS - WELLE Z			
	2 ASSE X-Y - X-Y AXIS - WELLE X-Y			

OLIO CONSIGLIATO	SAE 90 EP	RECOMMENDED OIL GRADE	SAE 90 EP	EMPFOHLENES ÖL	SAE 90 EP
QUANTITA' OLIO INDICATIVA	0,8 L	APPROXIMATE OIL QUANTITY	27 ozs	MENGE ÖL CA.	0,8 L
PESO INDICATIVO SCATOLA	13 kg	APPROXIMATE WEIGHT	29 lbs	GETRIEBEGEWICHT CA.	13 kg

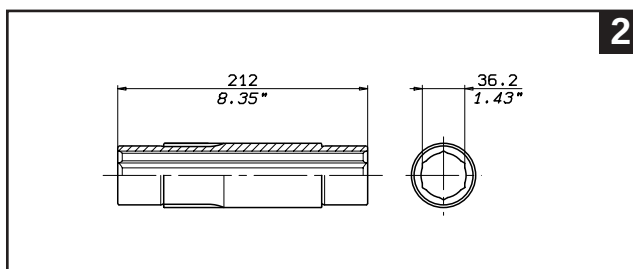
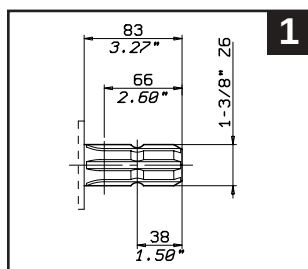
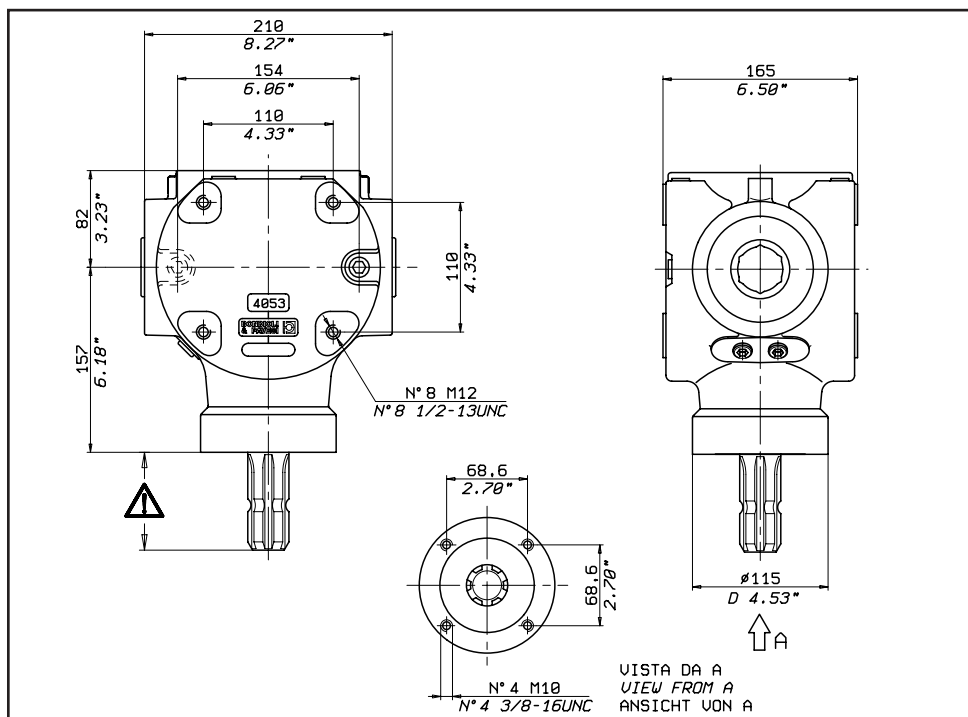


SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290230024
	UNC	290230026
2		295973602
3		29861000
4		354100050
		354101035
		354401035

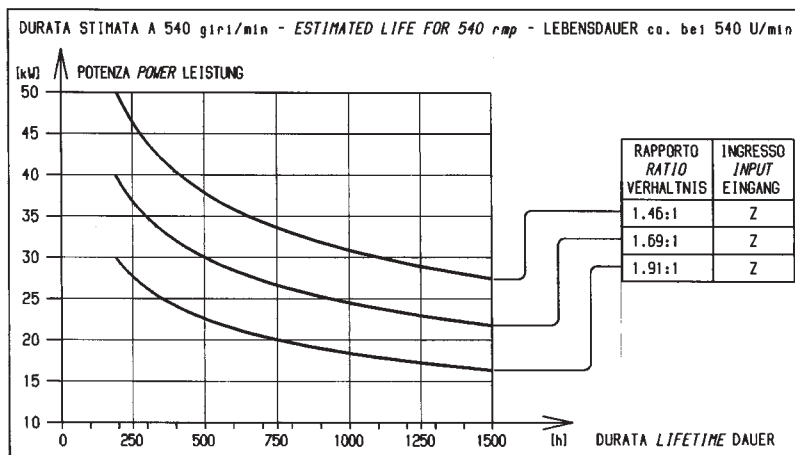
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
5		355016035
		355022050
6		373010000
7	R = 1,46	448146502
	R = 1,81	448181503

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,46:1	540	35	48	625	5527	912	8070	146
	1,69:1	540	29	40	520	4606	880	7784	169
	1,91:1	540	24	32	416	3685	795	7038	191

4053



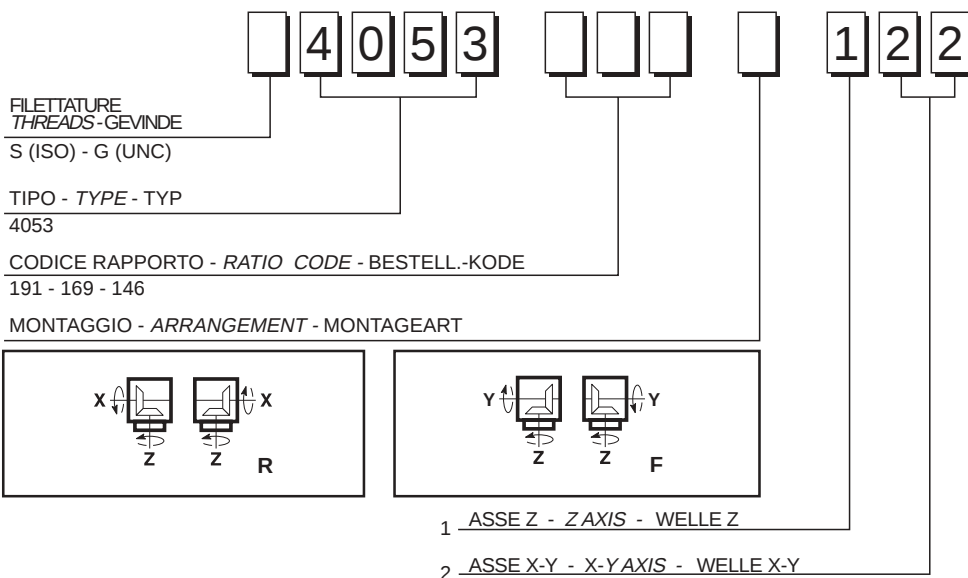
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

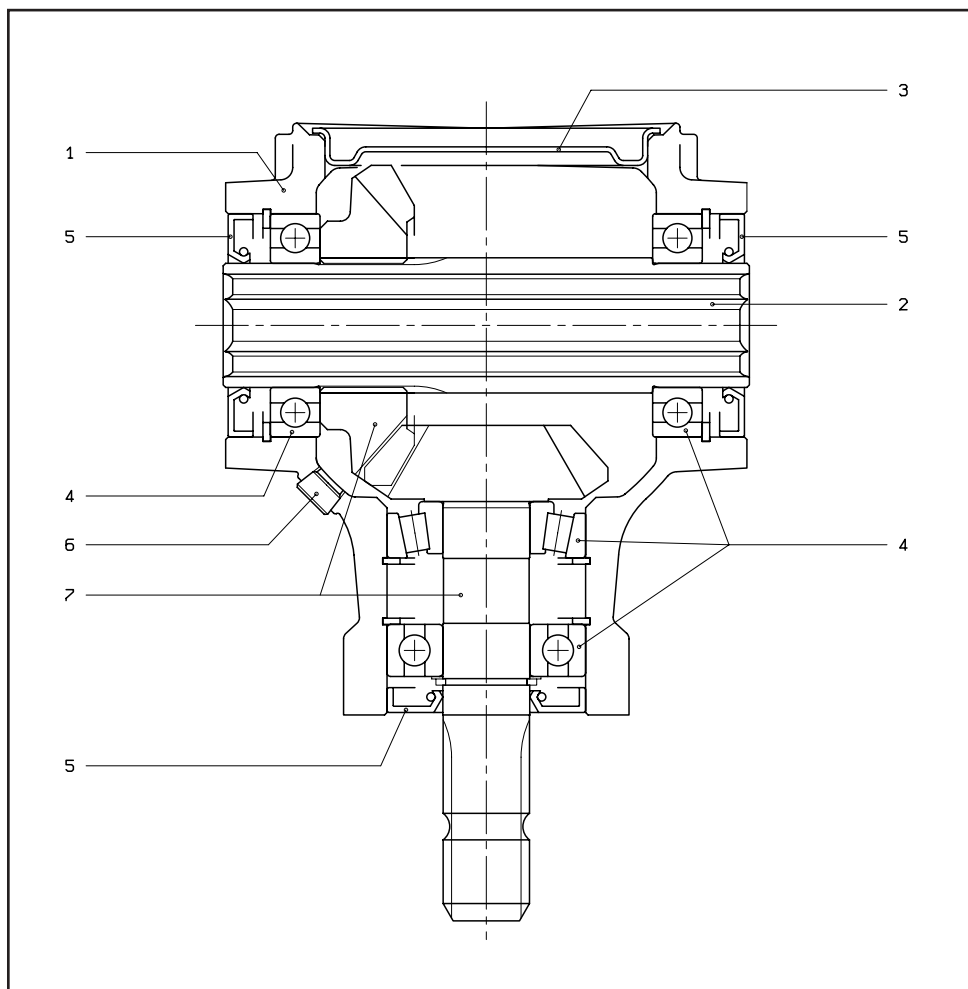
CODIFICA - CODES - BESTELLNUMMER



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,95 L
PESO INDICATIVO SCATOLA 18 kg

RECOMMENDED OIL GRADE SAE 90 EP
APPROXIMATE OIL QUANTITY 33 ozs
APPROXIMATE WEIGHT 40 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,95 L
GETRIEBEGEWICHT CA. 18 kg



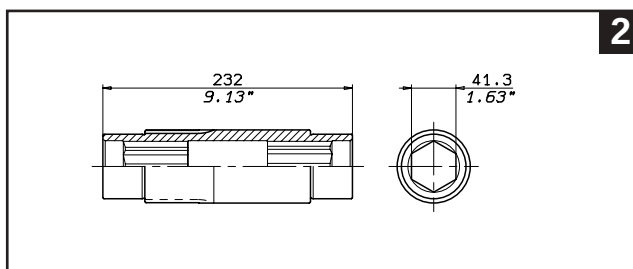
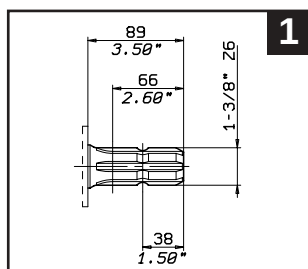
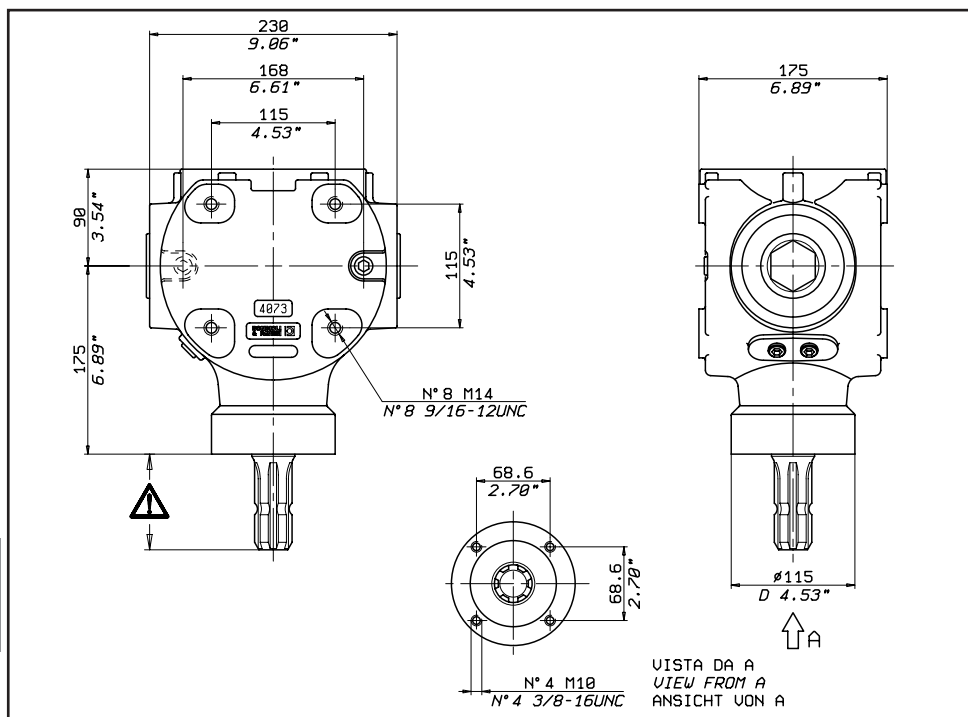
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290450106
	UNC	290450108
2		295973601
3		298613001
4	6307	354102035
	6210	354103050
	30307	354408035
5	50x90x10	355020050
	35x80x10	355029035

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
6	3/8"GAS	373010000
7	R = 1,46	448146602R
	R = 1,91	448191602R

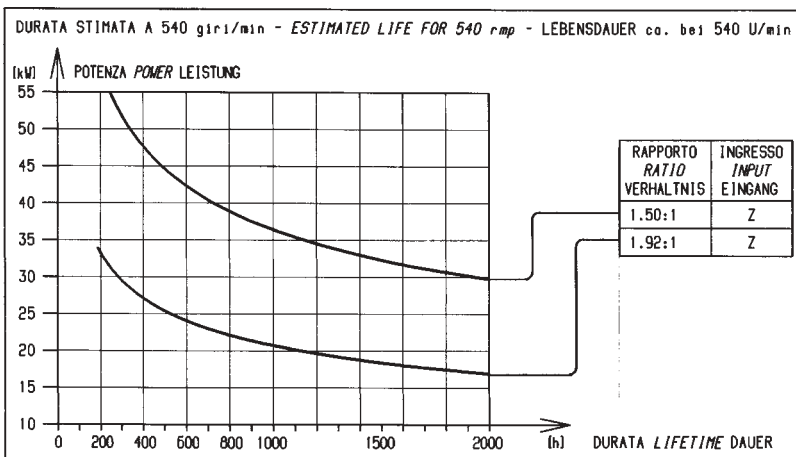
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

4073



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV-Hp-PS	N•m	M in•lb	N•m	in•lb	giri/min. r.p.m. U/min.	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,50:1	540	40	54	703	6218	1054	9327	360	150
	1,92:1	540	27	37	481	4260	924	8180	281	192

4073



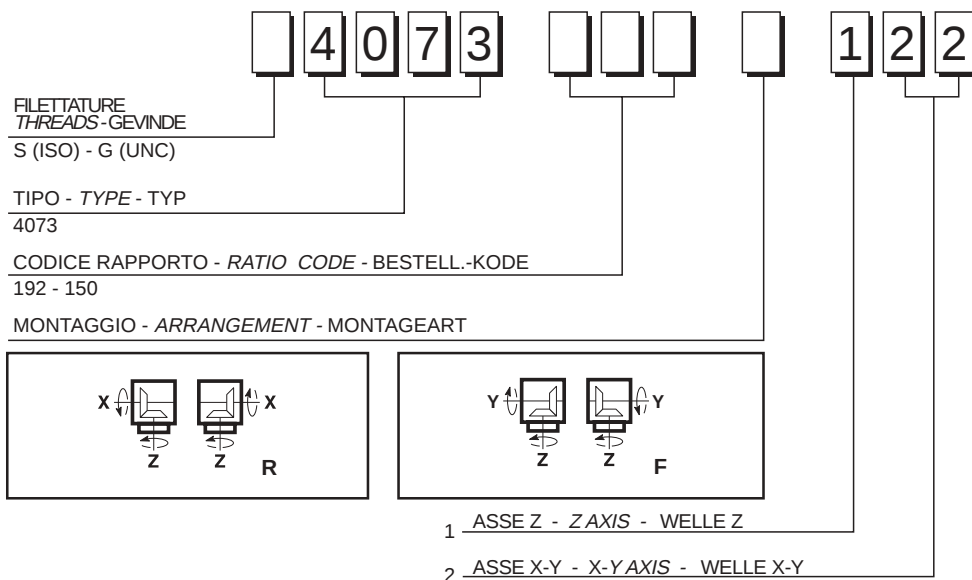
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

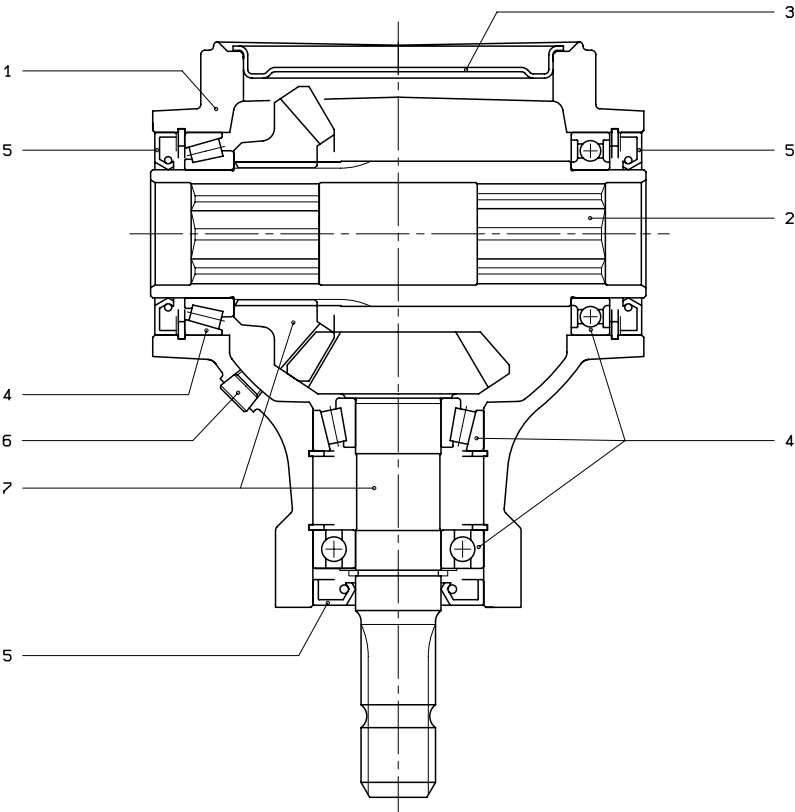
CODIFICA - CODES - BESTELLNUMMER



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,2 L
PESO INDICATIVO SCATOLA 22 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 42 ozs
APPROXIMATE WEIGHT 49 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,2 L
GETRIEBEGEWICHT CA. 22 kg



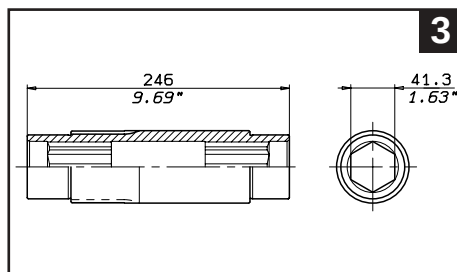
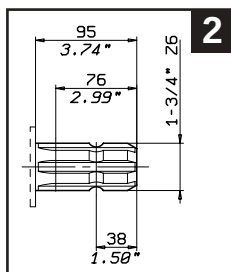
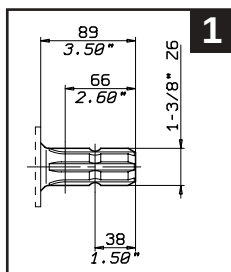
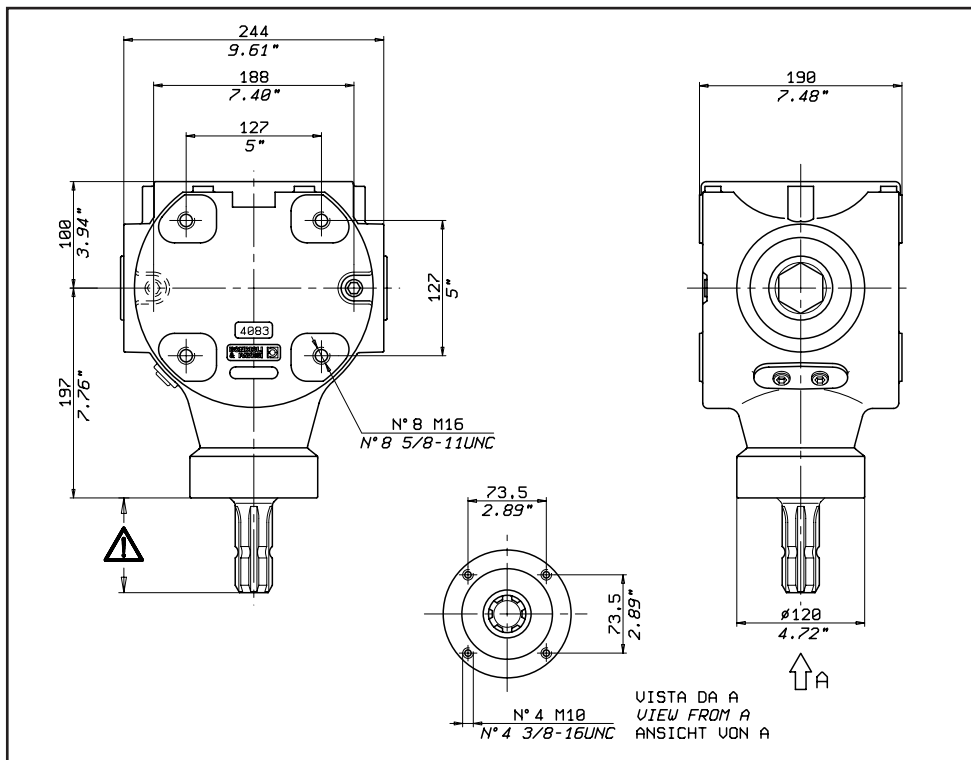
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290270020
	UNC	290270021
2		295400031
3		298614500
4	6012	354104060
	6208	354101040
	32012	354404060
	32208	354403040

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
5	60x95x10	355010060
	40x80x10	355008040
6	3/8" GAS	373010000
7	R = 1,50	448150606R
	R = 1,92	448192612R

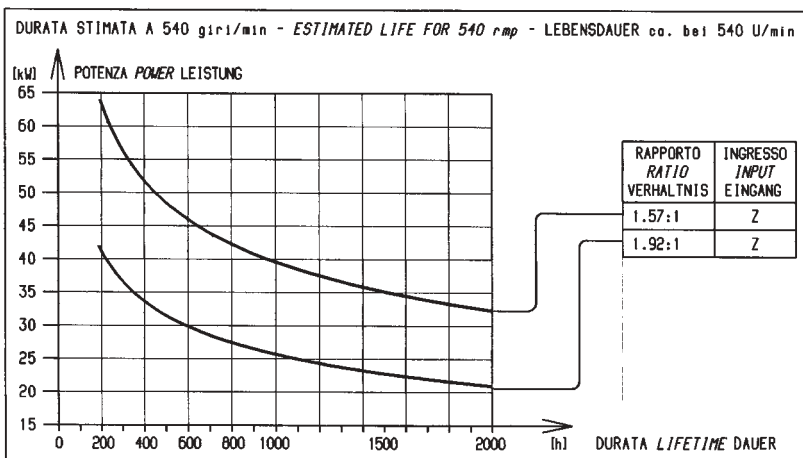
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

4083



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG			CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m. U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m. U/min.	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,57:1	540	49	66	859	7600	1348	11932	344	157
	1,92:1	540	33	45	585	5182	1124	9949	281	192

4083



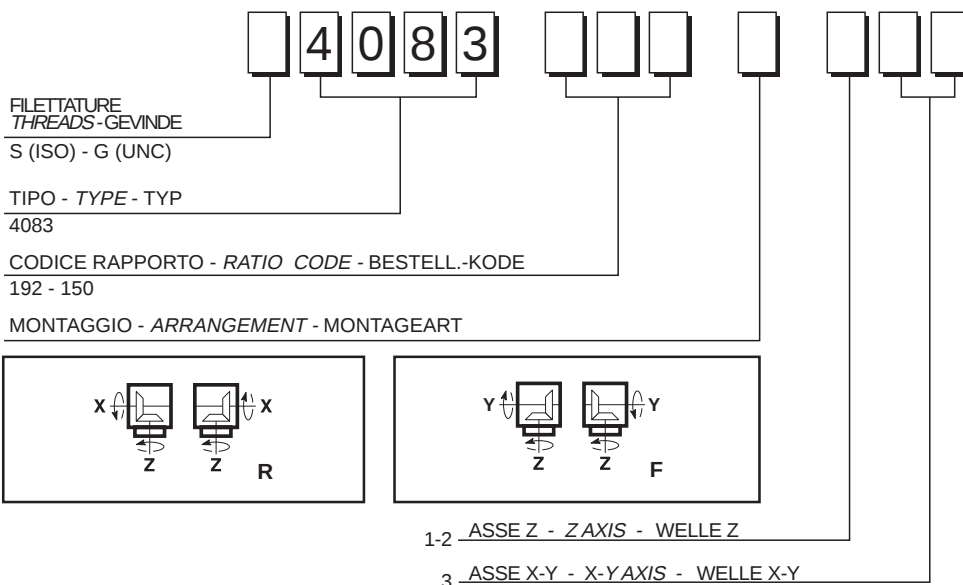
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.62
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

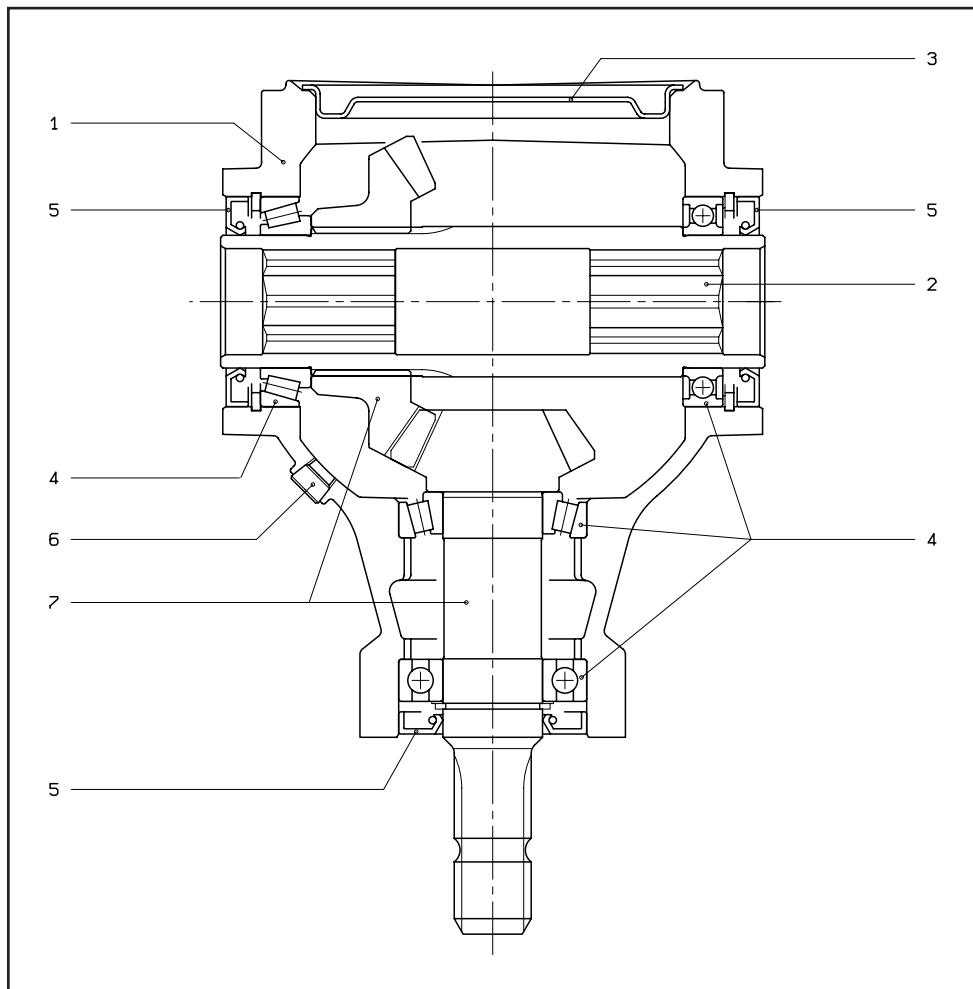
CODIFICA - CODES - BESTELLNUMMER



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1,7 L
PESO INDICATIVO SCATOLA 28 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 58 ozs
APPROXIMATE WEIGHT 62 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1,7 L
GETRIEBEGEWICHT CA. 28 kg



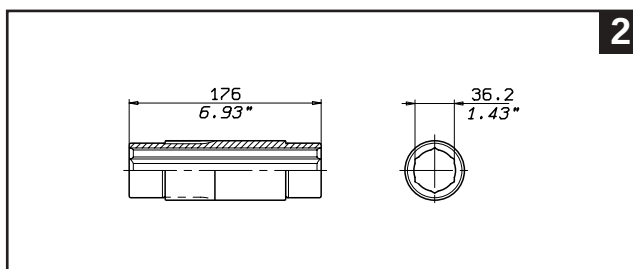
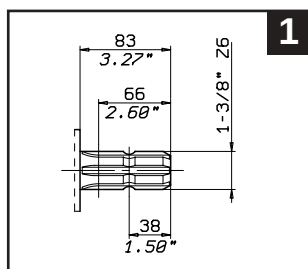
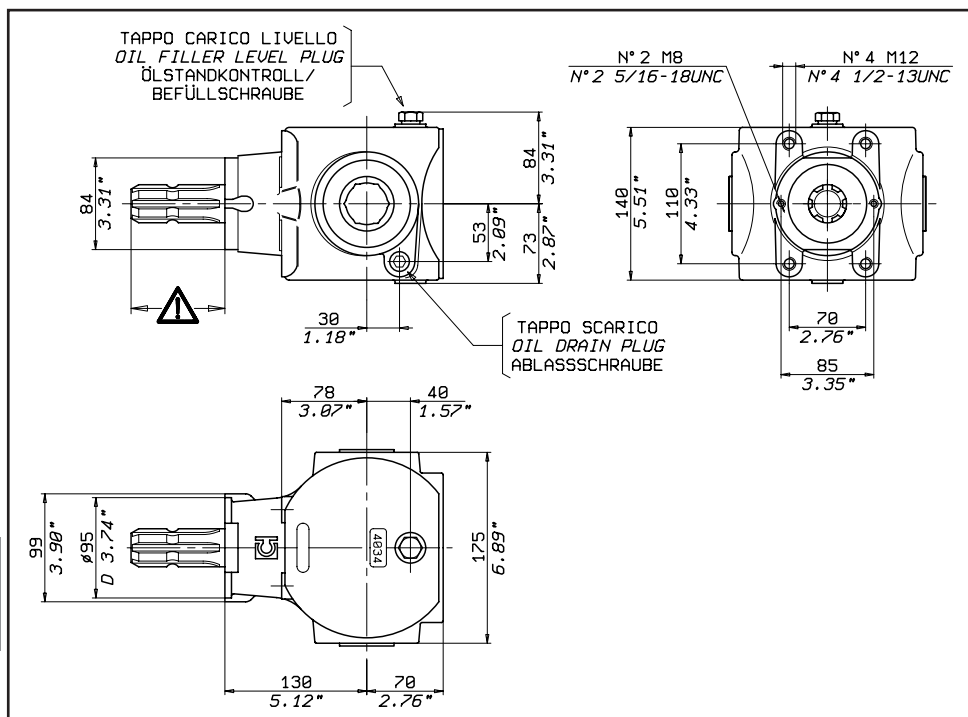
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290290023
	UNC	290290039
2		295400010
3		298616000
4	30209	354400045
	6209	354100045
	6012	354104060
	32209	354401045
	32012	354404060

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
5	45x85x10	355030045
	60x95x10	355010060
6	3/8"GAS	373010000
7	R=1,57-1 3/8"	448157603R
	R = 1,92-1 3/8"	448192608R
	R = 1,57-1 3/4"	448157604R
	R = 1,92-1 3/4"	448192609R

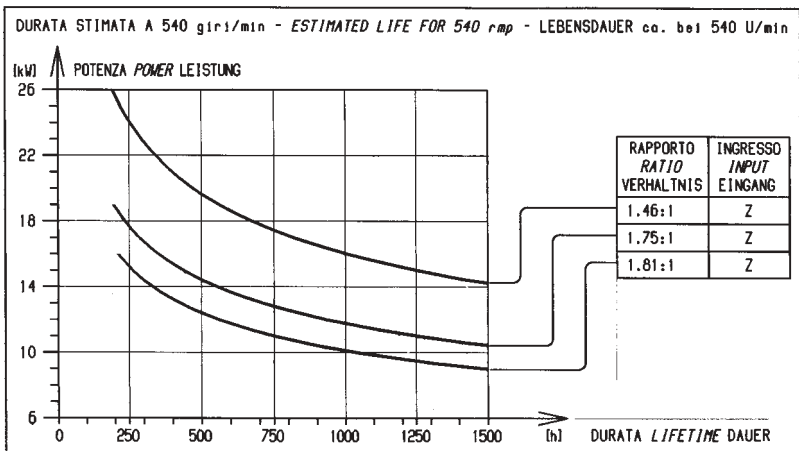
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

4034



IMPIEGIO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG					USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	
RIDUTTORE SPEED REDUCER UNTERSETZUNGS- GETRIEBE	1,46:1	540	19	26	338	2994	494	4371	146
	1,75:1	540	15	20	260	2303	455	4030	175
	1,81:1	540	13	18	234	2073	424	3751	181
	2,44:1	540	13	18	126	1119	309	2731	244

4034



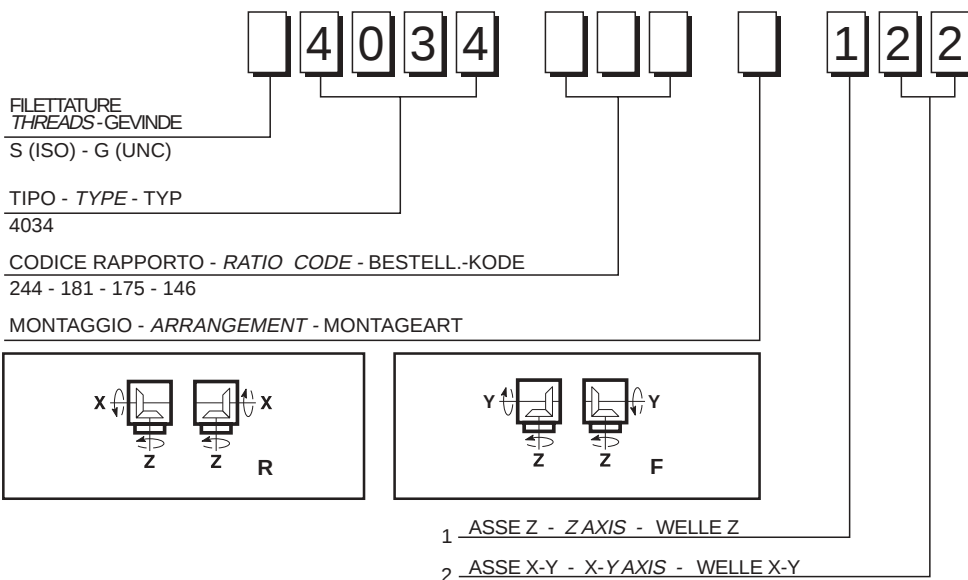
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

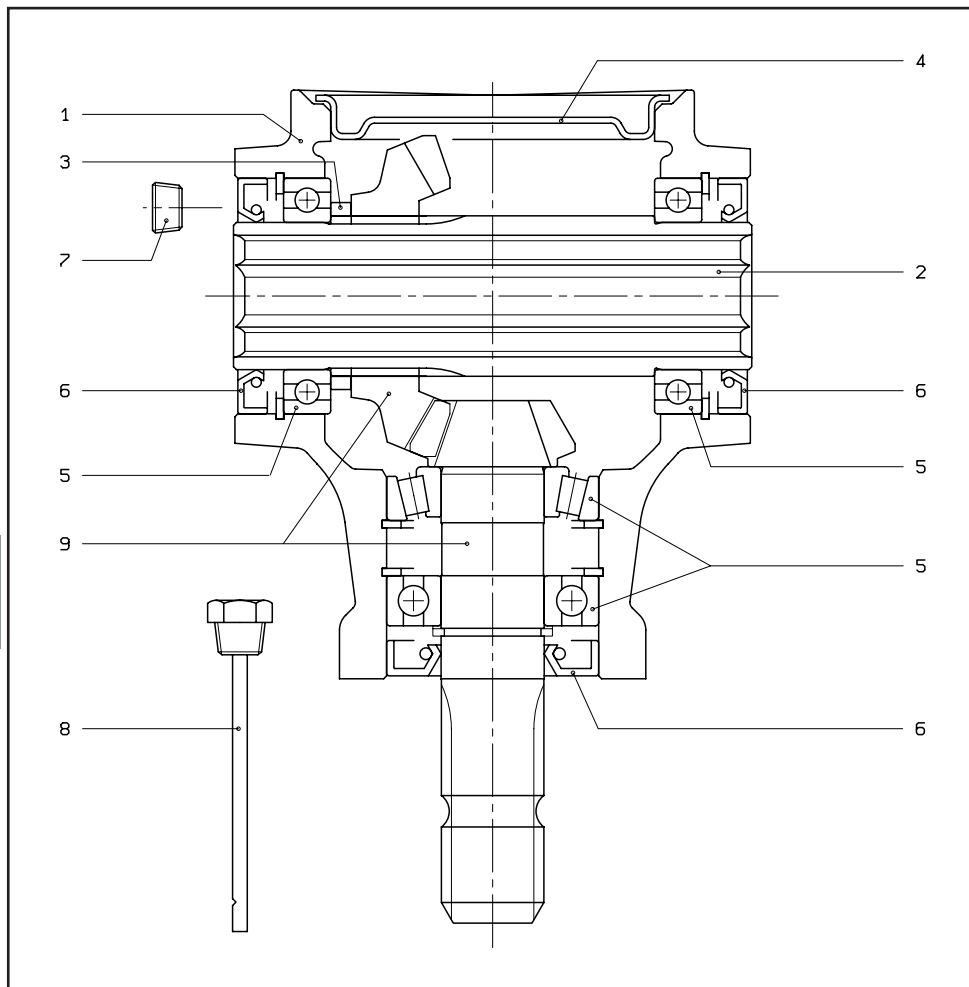
CODIFICA - CODES - BESTELLNUMMER



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 0,8 L
PESO INDICATIVO SCATOLA 13 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 27 ozs
APPROXIMATE WEIGHT 29 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 0,8 L
GETRIEBEGEWICHT CA. 13 kg

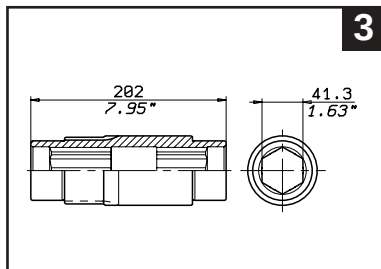
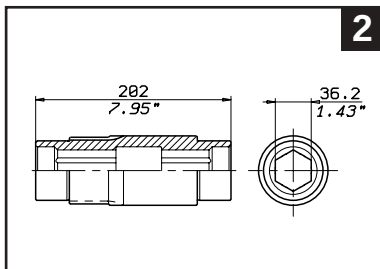
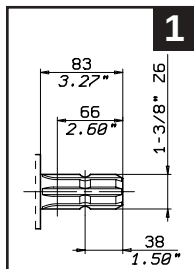
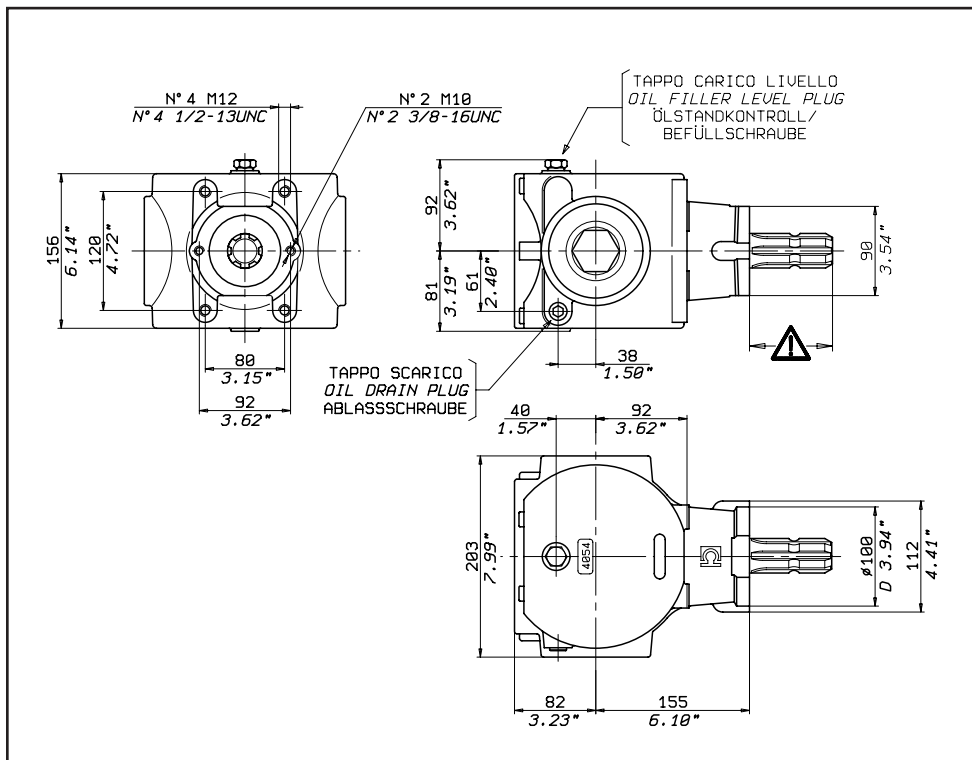


SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290430001
	UNC	290430002
2		295973603
3		298045400
4		298611000
5	6010	354100050
	6207	354101035
	30207	354401035

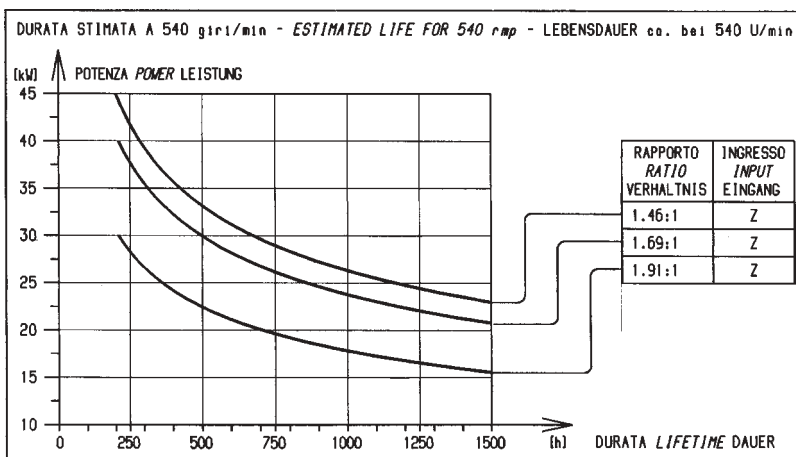
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
6	50x80x10	355022050
	35x72x12	355023035
7	3/8" GAS	373010000
8	3/8" GAS	373013000
9	R = 1,46	448146503R
	R = 1,75	448175500R
	R = 1,82	448182502R
	R = 2,44	448244500R

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR



IMPIEGO USE ANWENDUNG	RAPPORTO RATIO ÜBERS.- VERH.	INGRESSO INPUT EINGANG						USCITA OUTPUT AUSGANG		CODICE RAPP. RATIO CODE BESTELL.-KODE
		giri/min. r.p.m U/min.	kW	P CV·Hp·PS	N·m	M in·lb	N·m	in·lb	giri/min. r.p.m U/min.	
RIDUTTORE SPEED REDUCER UNTERSATZUNGS- GETRIEBE	1,46:1	540	33	45	585	5182	855	7565	370	146
	1,69:1	540	26	36	468	4145	792	7006	320	169
	1,91:1	540	24	32	416	3685	795	7038	283	191
	2,44:1	540	22	30	211	1865	514	4552	410	244

4054



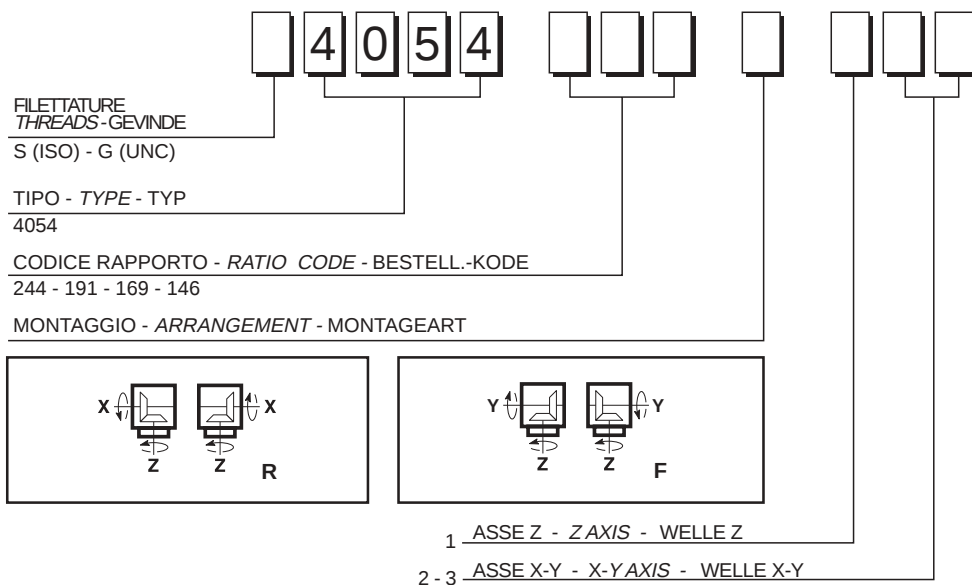
VELOCITA' SPEED DREHZAHL	COEFF. COEFF. KOEFF.
200	0.10
300	0.26
400	0.50
500	0.84
540	1
600	1.27
700	1.82
800	2.47
900	3.24
1000	4.13

Per ricavare la durata a velocità diversa da 540 giri/min. a parità di potenza, moltiplicare la durata ottenuta dal diagramma per il coefficiente indicato in tabella

To estimate the expected life with a speed different from 540 rpm but with an equal power, multiply the life obtained from the diagram by the coefficient indicated in the table.

Um die Lebensdauer bei gleicher Leistung aber anderer Drehzahl zu ermitteln, ist die per Diagramm ermittelte Lebensdauer mit dem in der Tabelle angegebenen Koeffizienten zu multiplizieren.

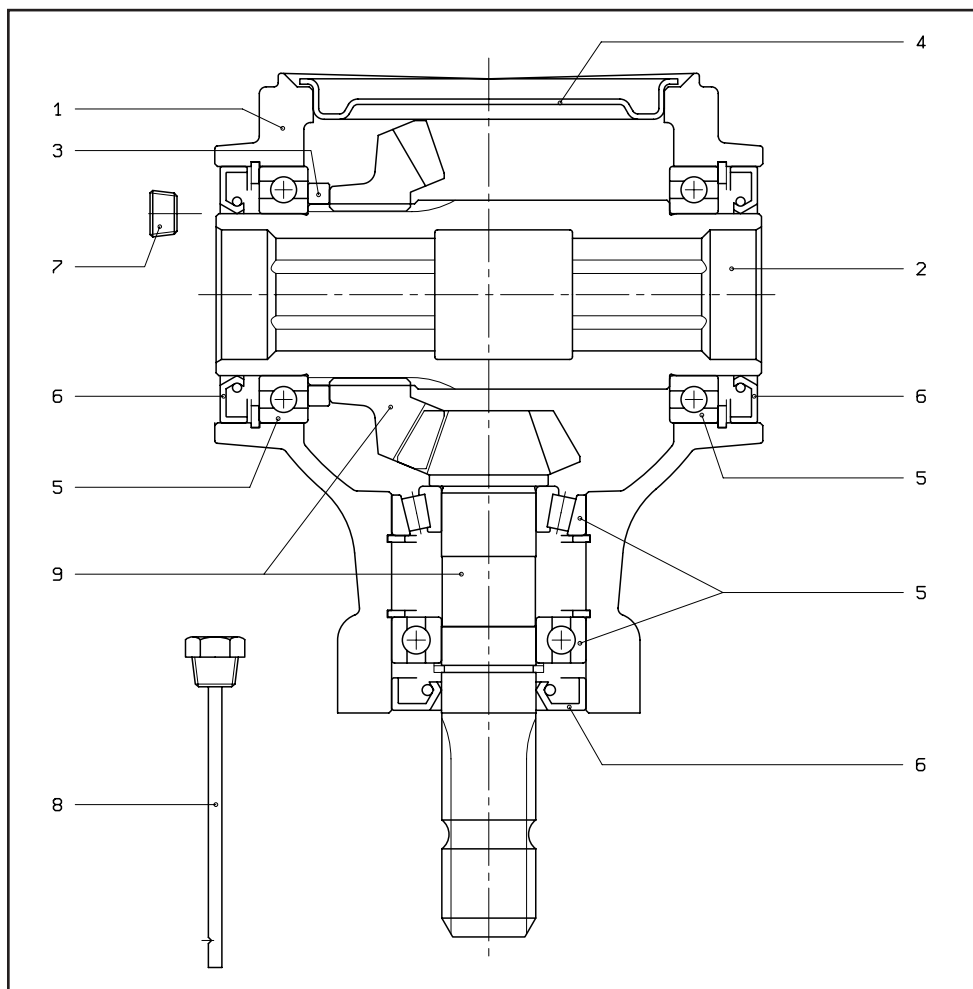
CODIFICA - CODES - BESTELLNUMMER



OLIO CONSIGLIATO SAE 90 EP
QUANTITA' OLIO INDICATIVA 1.1 L
PESO INDICATIVO SCATOLA 18 kg

RECOMMENDED OIL GRADES SAE 90 EP
APPROXIMATE OIL QUANTITY 38 ozs
APPROXIMATE WEIGHT 40 lbs

EMPFOHLENES ÖL SAE 90 EP
MENGE ÖL CA. 1.1 L
GETRIEBEGEWICHT CA. 18 kg



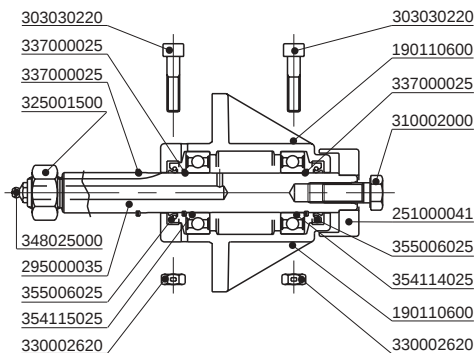
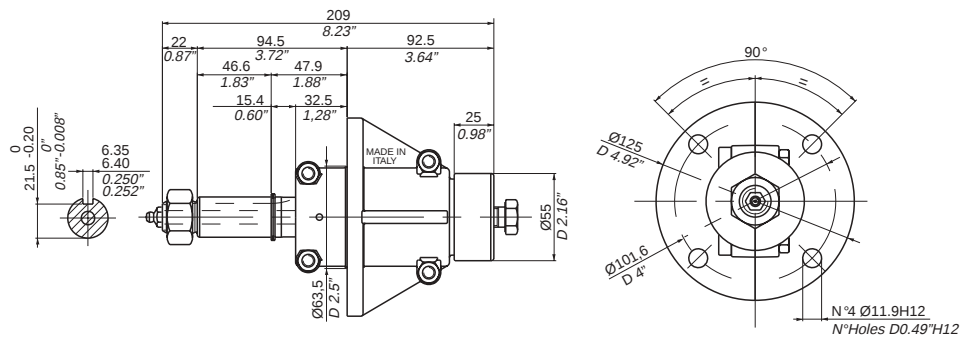
SCATOLA INGRANAGGI - GEARBOX - GETRIEBE

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
1	ISO	290450109
	UNC	290450110
2	' 41	295400001
	' 36	295400002
3		298046700
4		298613001
5	6012	354100060
	6207	354101035
	30207	354401035

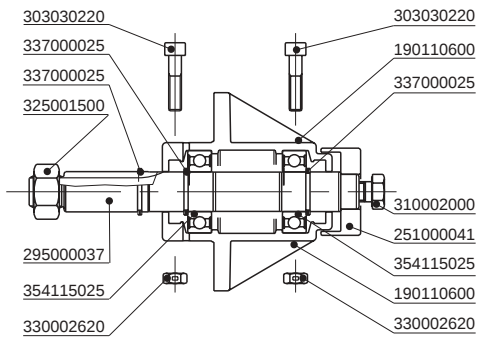
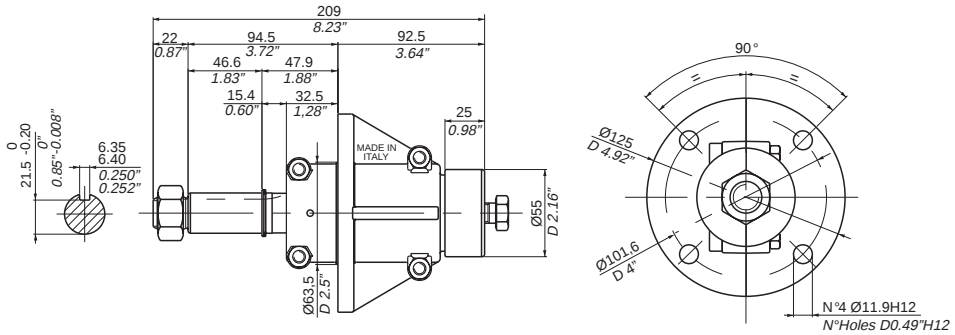
RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR
6	60x95x10	355010060
	35x72x12	355023035
7	3/8"GAS	373010000
8	3/8"GAS	373016000
9	R = 1,46	448146605R
	R = 1,69	448169600R
	R = 1,91	448191601R
	R = 2,44	448244501R

RIF. REF. BEZ.	DESCRIZIONE DESCRIPTION BESCHREIBUNG	CODICE CODE BEST.-NR

Spindle



IL GRUPPO RAPPRESENTATO NEL DISEGNO E' UNA CONFIGURAZIONE SPECIALE CODICE 444000057
 THE DRAWING SHOWS A SPECIAL VERSION CODE 444000057
 DAS HIER DARGESTELLTE GETRIEBE ZEIGT EINE SPEZIELLE KONFIGURATION NACH ZG. NR. 444000057



IL GRUPPO RAPPRESENTATO NEL DISEGNO E' UNA CONFIGURAZIONE SPECIALE CODICE 444000057
 THE DRAWING SHOWS A SPECIAL VERSION CODE 444000057
 DAS HIER DARGESTELLTE GETRIEBE ZEIGT EINE SPEZIELLE KONFIGURATION NACH ZG. NR. 444000057