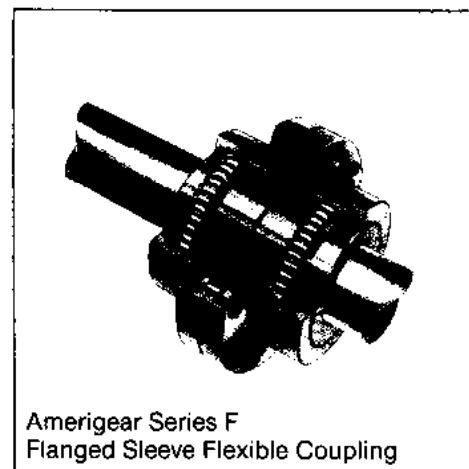


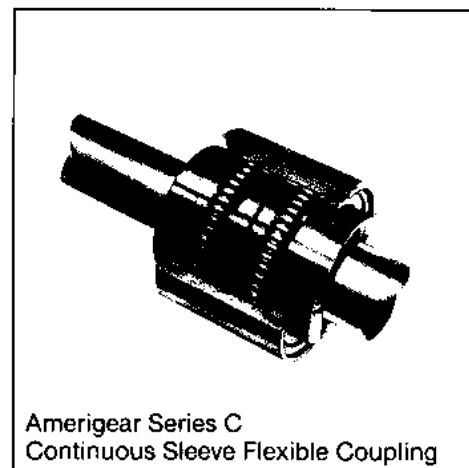


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IDENTIFICATION OF COUPLING TYPES	
F	Flanged Sleeve
C	Continuous Sleeve
FS and CS	Single Engagement
FM and CM	Mill Motor (Taper Shaft)
FMS and CMS	Mill Motor Single Engagement
FV and CV	Vertical
FVS and CVS	Vertical Single Engagement
FA and CA	Axial Travel
FAS and CAS	Axial Travel Single Engagement
FE	Extended (Spacer)
FL and CL	Continuously Lubricated
FEL	Extended, Continuously Lubricated
FR	Rigid
FD and FDC	Disconnect (Cut-out)
FB and CB	Brake Drum
FI	Insulated
FPH	Shear Pin
FSPH	Shear Pin Single Engagement



Amerigear Series F
Flanged Sleeve Flexible Coupling



Amerigear Series C
Continuous Sleeve Flexible Coupling

Modifications and Variations Series F

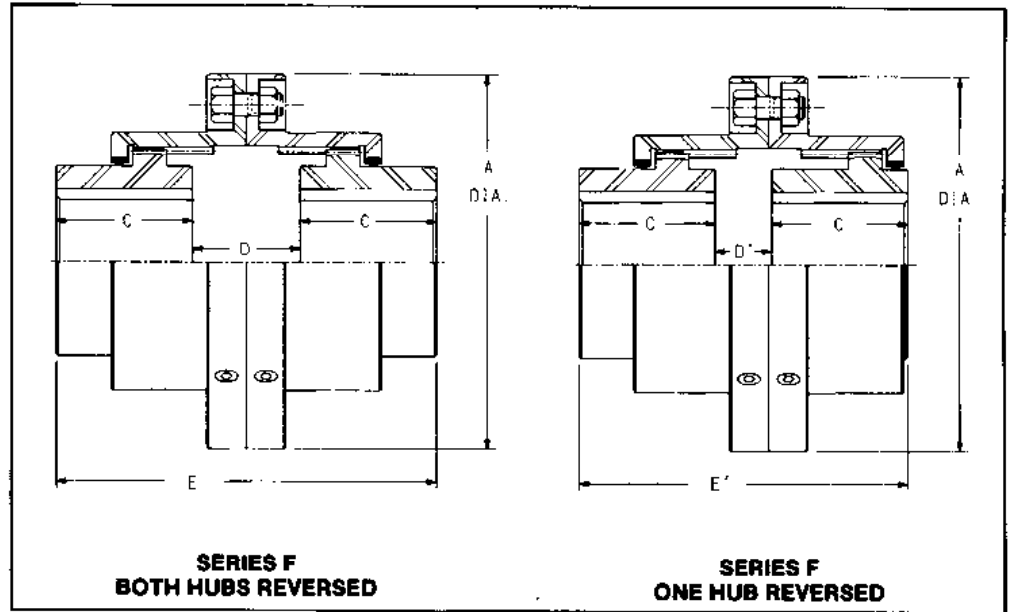
An extensive stock of standard coupling components and inventory of bar and tube, allows for the design and manufacture of couplings to a variety of specific customer requirements. On this and the next few pages is data referring to some of the coupling modifications and/or alterations that are available in the Series F design, and on pages 31-33 for the Series C design.

Reverse Mounted Hubs — Series F

Application: Used where greater-than-standard shaft separation is required to allow insertion of pulleys and similar components through shaft separation without moving connected equipment. Accomplished without spacer or adaptor plate.

Description: All standard components used. Hubs (or hub) simply mounted on shafts in reverse position. If hub puller holes desired, specify when ordering.

CAUTION:
This configuration is not intended for use in applications requiring axial travel. Dimension D in Series F Couplings must be maintained.



SERIES F, REVERSE MOUNTED HUBS

Size	Maximum Bore — Inches		Load Capacity		DIMENSIONS					
	Square Key	Reduced Key	HP Per 100 R.P.M.	Torque In.-Lbs. x 10 ³	A	C	D	D'	E	E'
200	.81	.88	3	1.9	2.94	1.06	—	—	—	—
201	1.25	1.31	5	3.2	3.56	1.38	.31	.22	3.06	2.98
201 1/4	1.62	1.75	12	7.6	4.00	1.69	.88	.50	4.25	3.88
201 1/2	2.25	2.38	27	17.0	6.00	1.94	.44	.28	4.31	4.16
202	2.75	2.88	50	31.5	7.00	2.44	1.00	.56	5.88	5.44
202 1/2	3.50	3.75	85	53.6	8.38	3.03	1.56	.88	7.62	6.94
203	4.00	4.25	150	94.5	9.44	3.59	1.75	.97	8.94	8.16
203 1/2	4.50	4.75	225	142.0	11.00	4.19	2.25	1.25	10.62	9.62
204	5.50	5.88	340	214.0	12.50	4.75	2.75	1.50	12.25	11.00
204 1/2	6.25	6.75	515	324.0	13.62	5.31	3.38	1.84	14.00	12.47
205	7.00	7.12	660	416.0	15.31	6.03	4.31	2.31	16.38	14.38
205 1/2	7.50	7.62	875	551.0	16.56	6.62	5.19	2.75	18.44	16.00
206	8.25	8.62	1,190	750.0	18.00	7.41	5.88	3.09	20.69	17.91
207	9.62	10.25	1,640	1,033.0	20.75	8.69	6.25	3.31	23.62	20.69

REFER TO SERIES F COUPLING, PAGES 8 AND 42 FOR ADDITIONAL DIMENSIONS. FLANGE DETAILS, PAGE 41. MAXIMUM BORE, KEYWAY AND PULLER HOLE DATA, PAGE 40.

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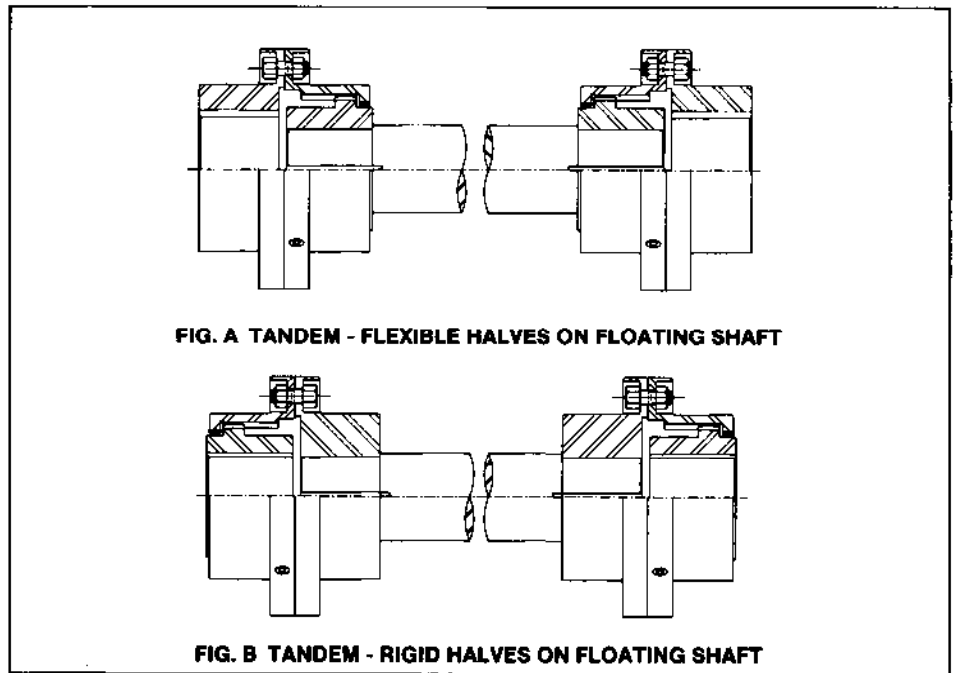
Flexible Couplings

Modifications and Variations Series F

Tandem Assemblies Two FS Series Couplings connected by an intermediate floating shaft comprise a tandem assembly. The amount of offset capacity is determined by the distance between gear meshes. By mounting flexible halves on floating shaft, advantage may be taken of larger bore capacity of rigid half (Fig. A). By mounting rigid halves on floating shaft, more parallel offset capacity is available (Fig. B). Tandems may also be used in vertical applications (Fig. C) with additional modifications.

See Page 37 for maximum operating speeds of tandem couplings.

Size	Shaft Dia.	Size	Shaft Dia.
200	.88	203½	4.00
201	1.25	204	5.00
201¼	1.62	204½	6.00
201½	2.00	205	6.00
202	2.50	205½	6.50
202½	3.00	206	8.00
203	3.50	207	8.00

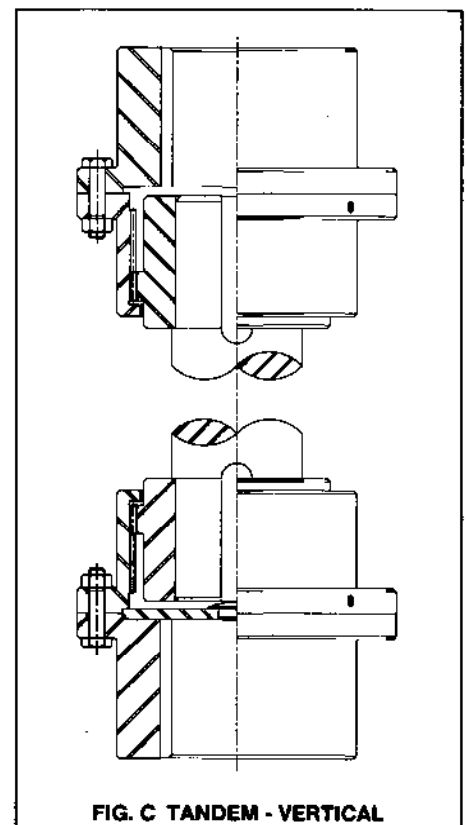
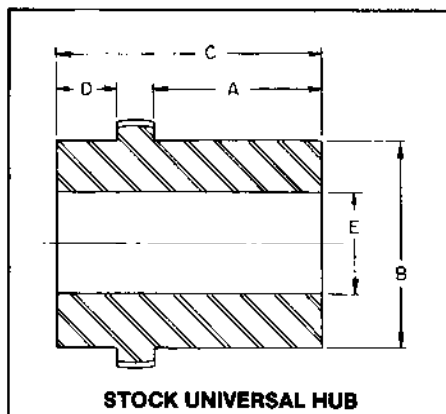
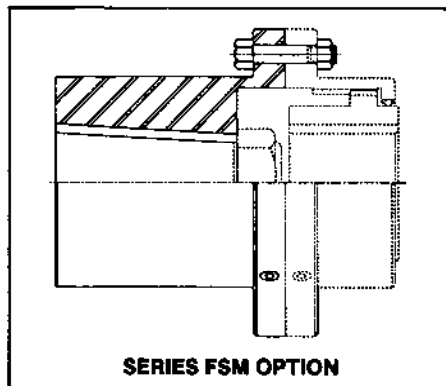


Single Engagement Mill Motor Type With Taper Bore In Rigid Half

Specially-designed Series FSM with Taper Bore in rigid half are used to accommodate larger shaft sizes with a minimum-sized flexible coupling.

Stock Universal Hubs Ameridrives International, maintains a wide variety of Amerigear Stock Universal Hubs to minimize lead time and reduce order and delivery costs on non-standard specifications requiring longer-than-standard hub lengths.

Universal Hub Size	A	B	C	D	Rough Stock Bore E
201¼	3.31	3.12	4.34	.50	.750
202	4.00	4.00	5.38	.75	1.000
202½	4.38	4.88	6.38	1.25	1.000
203	4.50	5.75	6.88	1.50	1.500
203½	5.00	6.50	7.50	1.50	1.500
204	5.81	7.75	8.31	1.38	2.375
204½	5.50	9.00	8.75	2.00	2.375
205	5.50	9.50	9.25	2.38	3.375
205½	6.50	10.50	10.88	2.88	3.375
206	8.50	11.75	13.12	3.00	3.375



Modifications and Variations Series F

Limited End-Float Variation

Application: Recommended for installations where axial travel must be limited to a lesser degree than inherent in standard flexible couplings, such as in a sleeve bearing motor to prevent the rotor from "wiping" the bearing shoulders.

Description: A standard coupling is designed with clearances to accommodate misalignment and manufacturing tolerances. When an application requires that the end float be restrained, a plastic disc is positioned between the faces of coupling hubs. The clearances are measured and the hubs are modified to the amount of limited end float required.

In the case of spacer arrangements, steel plates with steel thrust buttons are fitted to the spacer. The clearances are measured and the hubs are modified.

As shown, the tandem design can be modified for limited end float.

It should be noted that as the coupling is extended or compressed for LEF, the misalignment capacity of the coupling is reduced accordingly.

CAUTION:

Parts of limited end-float couplings are not interchangeable with parts of similar or standard couplings.

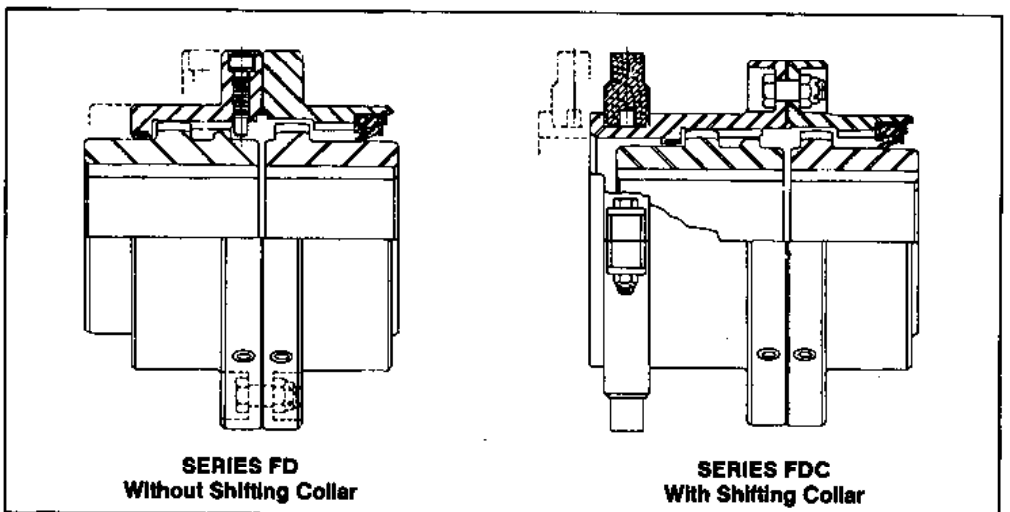
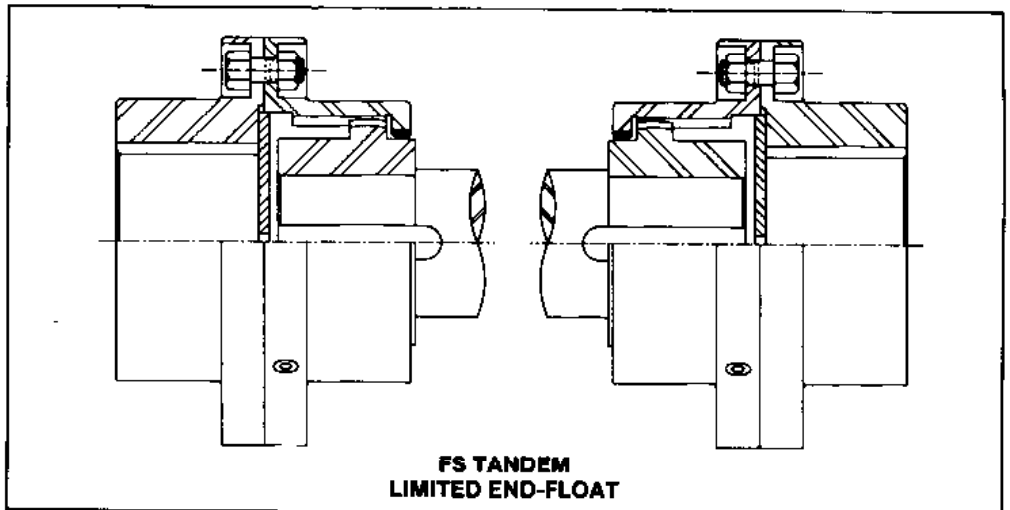
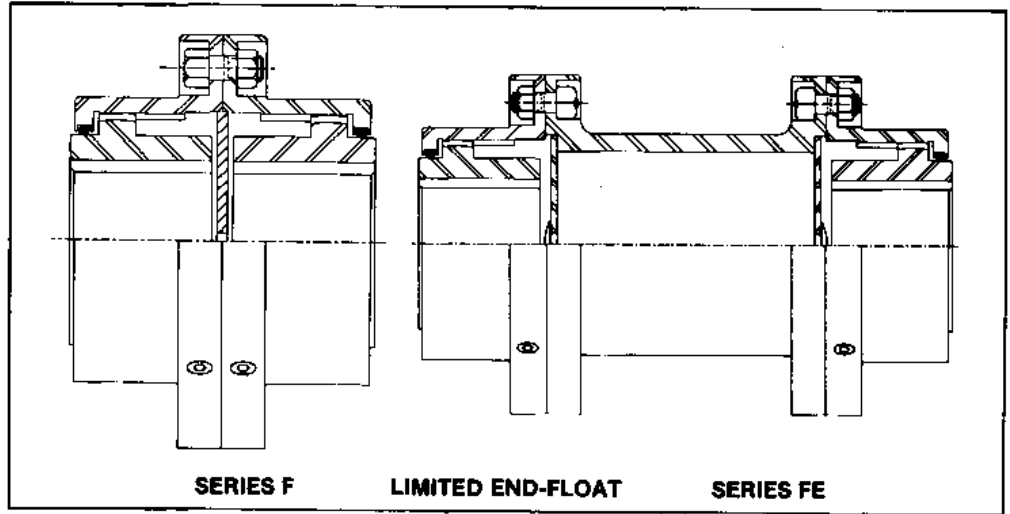
Flanged Sleeve —

Double Engagement Disconnect Type

Application: Meets requirements for quick connection or disconnection of shafts up to 9" diameter, as in stand-by or emergency mechanical power transmission service. Compensates for all three types of misalignment.

Description: Amerigear Series FD and FDC Flexible Couplings are designed with bolted center flanges to facilitate installation and alignment. Flanged-sleeve design makes possible minimum distances between bearing housings to facilitate shaft alignment.

Note: The right-hand hub or disengaging hub is to be mounted on the driving shaft. Chamfered entry teeth provided on disengaging hub and sleeve only when specified — at additional cost.



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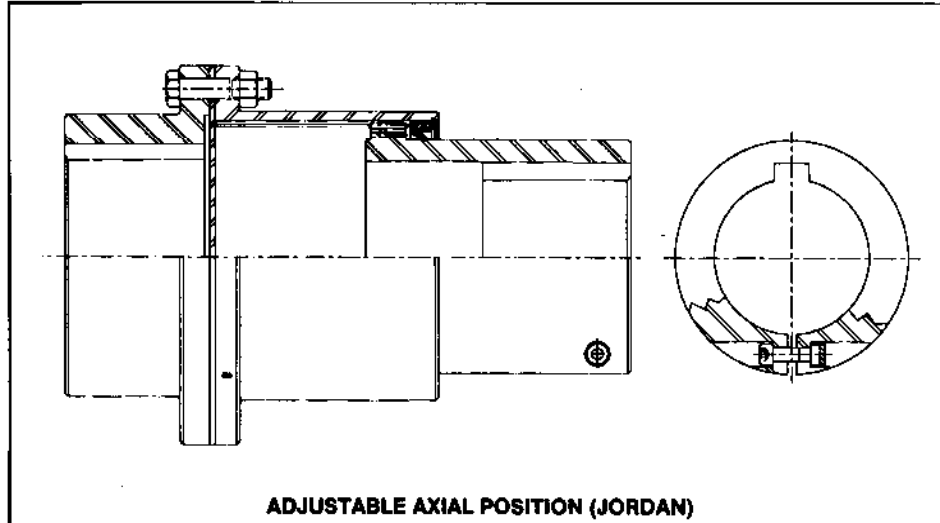
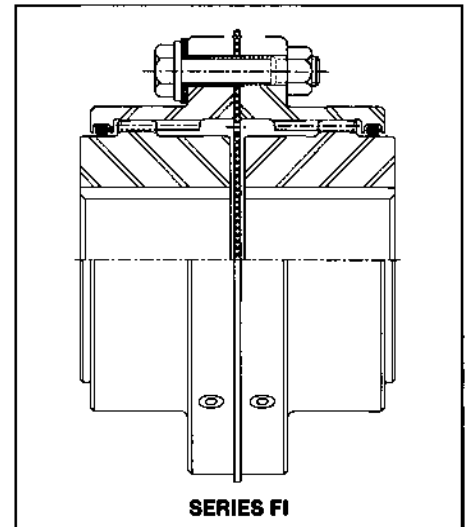
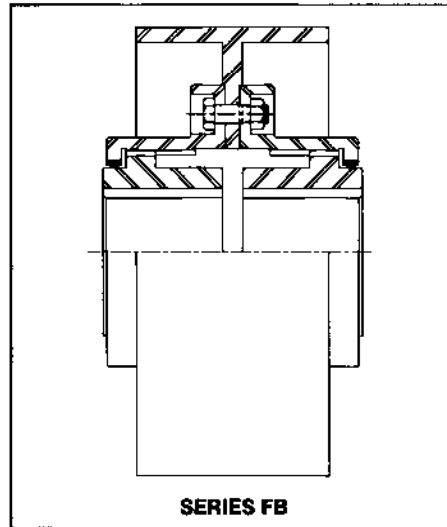
Flexible Couplings

Modifications and Variations Series F

Brake Drum Series FB Coupling

Application: The FB coupling is designed for use in applications that require a brake drum but have insufficient space between the driver and the driven components for a separate brake drum mounting.

Description: The FB coupling consists of standard Amerigear Series F sleeves and hubs with a flange type brake drum bolted securely between the sleeve flanges. Depending on the diameter of the drum, the drum may be machined as one piece or fabricated. When ordering, specify drum diameter and face width.



Insulated Type Series FI Coupling

Application: The FI coupling is designed for use when driver and driven equipment must be electrically insulated from each other to prevent the flow of stray electrical currents. The FI protects against the pitting of precision bearings and shafts that may occur in equipment such as generator excitor drives.

Description: The Amerigear Series FI coupling incorporates an insulator washer, insulated bolts and an insulator disc to isolate the two halves of the coupling.

Compared to the Amerigear Series F coupling, the FI coupling shaft-to-shaft is increased and misalignment capacity is limited to $\pm 3/4^\circ$ per gear mesh.

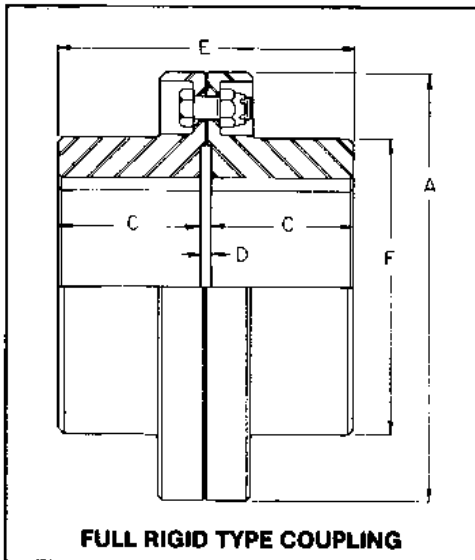
Adjustable Axial Position Coupling

Application: In certain types of equipment drives, shaft-to-shaft distance varies during equipment operation requiring an axial travel type of coupling. In addition, adjustment to maintain the maximum axial travel for various initial shaft-to-shaft conditions is also required. The design of the adjustable axial positioning coupling suits this purpose.

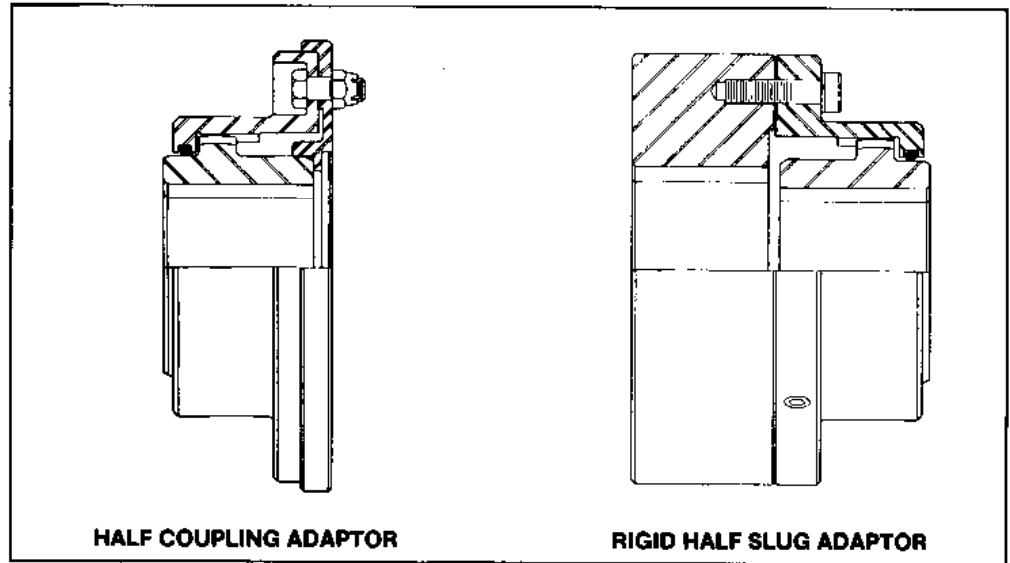
Description: The coupling design is similar to that of the axial travel FA or FAS Series. The exception is that the hub of the travel half of the coupling is fitted with a clamp bolt design. The clamp bolt holds the coupling hub in position.

When adjustment is necessary, after the drive has stopped rotating, the clamp bolt is loosened and the hub is slid along the equipment shaft to the new position. The clamp bolt is then retightened. This is performed without having to move either the driver or the driven components of the equipment.

Modifications and Variations Series F



FULL RIGID TYPE COUPLING



HALF COUPLING ADAPTOR

RIGID HALF SLUG ADAPTOR

Full Rigid Type Coupling

Application: For mechanical power transmission applications where no misalignment or axial displacement exists between connected shafts.

Description: Accurately-machined medium carbon steel.

Full Rigid Size	A	C	D	E	F
200	2.94	1.05	—	2.09	1.94
201	3.56	1.23	—	2.47	2.56
201½	4.00	1.48	—	2.97	3.00
201½	6.00	1.78	.188	3.75	3.88
202	7.00	2.28	.188	4.75	4.88
202½	8.38	2.91	.188	6.00	5.75
203	9.44	3.41	.188	7.00	6.81
203½	11.00	3.97	.188	8.12	7.75
204	12.50	4.44	.375	9.25	9.06
204½	13.62	5.00	.375	10.38	10.19
205	15.31	5.75	.375	11.88	11.38
205½	16.56	6.12	.375	12.62	12.50
206	18.00	7.16	.500	14.81	13.50
207	20.75	8.44	.625	17.50	15.75

SIZES 200, 201 AND 201½ FLANGE FASTENERS ARE SELF-LOCKING SOCKET HEAD CAP SCREWS — ONE FLANGE TAPPED.

SIZES 201½-205½ HAVE SHROUDED BOLTS (SB) WITH SELF-LOCKING NUTS; EXPOSED BOLTS (EB) UPON REQUEST — NO ADDITIONAL COST.

SIZES 206 AND 207 HAVE EXPOSED BOLTS (EB) WITH SELF-LOCKING NUTS.

Half Coupling Adaptors Adaptors are used where one of the connected machines is disconnected, leaving the other machine in service; or where individual equipment testing is required.

Adaptor ring is secured to sleeve and pilots the hub, holding sleeve concentric and rigid with the hub.

On close-coupled installations, adaptors are usually segmented or split for ease of installation. On spacer couplings, the adaptor is a solid, one-piece construction.

Rigid Half Slug Adaptor For tandem arrangements where one shaft is considerably larger than the other. Utilizes standard Series F — flexible half mounted to a special slug adaptor. Bore length and O.D. same as dimension C and A listed to the left for full rigid type couplings.

Differential Tooth Coupling (Modification) Series F Only

Application: For accurate adjustment and control of angular shaft relationships as required on press drives, feed mechanisms, timing devices and similar applications.

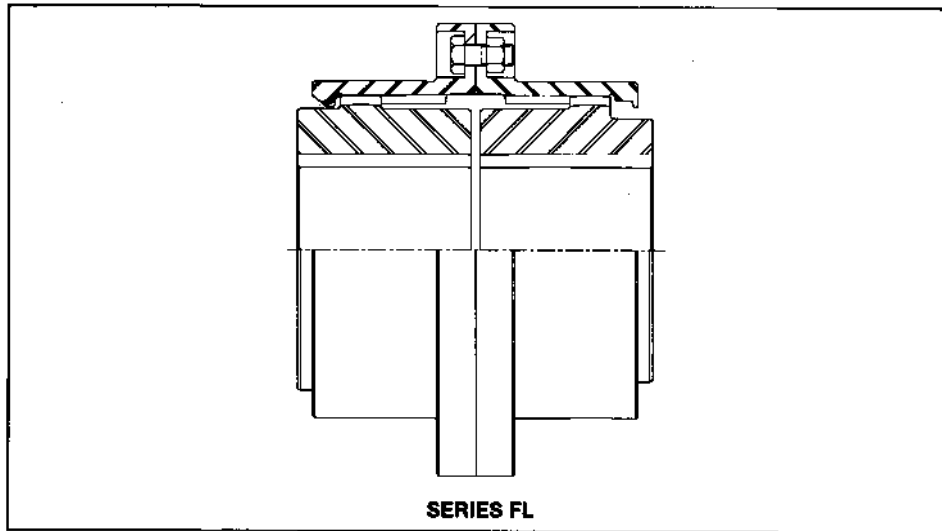
Description: One half of Amerigear Series F (Modified) Flexible Coupling is a standard half Series F Coupling. Other half contains a special hub and sleeve designed with one tooth more or less than standard mating half. This permits vernier adjustment of shaft-to-shaft or sleeve-to-sleeve relationship for desired shaft synchronization.

Amerigear

Flexible Couplings

Modifications and Variations

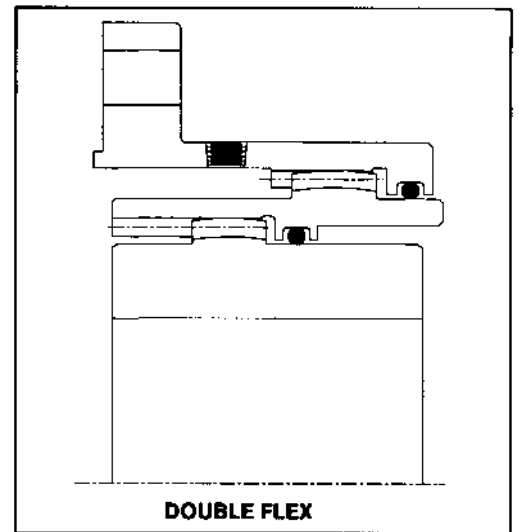
Series F



Continuously-Lubricated Type Coupling

Application: Continuous oil lubrication is desirable under certain conditions of high ambient operating temperatures. Since this design does not utilize the contaminant-proof features of standard couplings, the installation should be enclosed to prevent the entrance of excessive dust or moisture, and should be provided with an adequate flow of clear oil. Lubricating oil should be filtered to at least 5 microns and the location of the oil nozzles should be positioned as close as possible to the coupling in order to minimize oil jet deflection due to windage. Type of lubricant should be chosen carefully, with consideration given to load carrying characteristics. Quantity of flow depends on horsepower transmitted, and this flow requirement will be specified by Ameridrives International.

Description: Amerigear Series FL Flexible Couplings utilize standard components with sleeves modified for oil inlet and discharge. Differential level of location of inlet and discharge openings assure positive lubricant flow. Design provides for retention of oil in event of pump failure, or for intermittent type lubrication. Angled discharge holes assure scavenging action to minimize sludge accumulation.



Double Flex Coupling

Application: The double flex coupling is designed for applications that are limited in space between driver and driven equipment. The double flex design accommodates both angular and offset misalignment in a compact design.

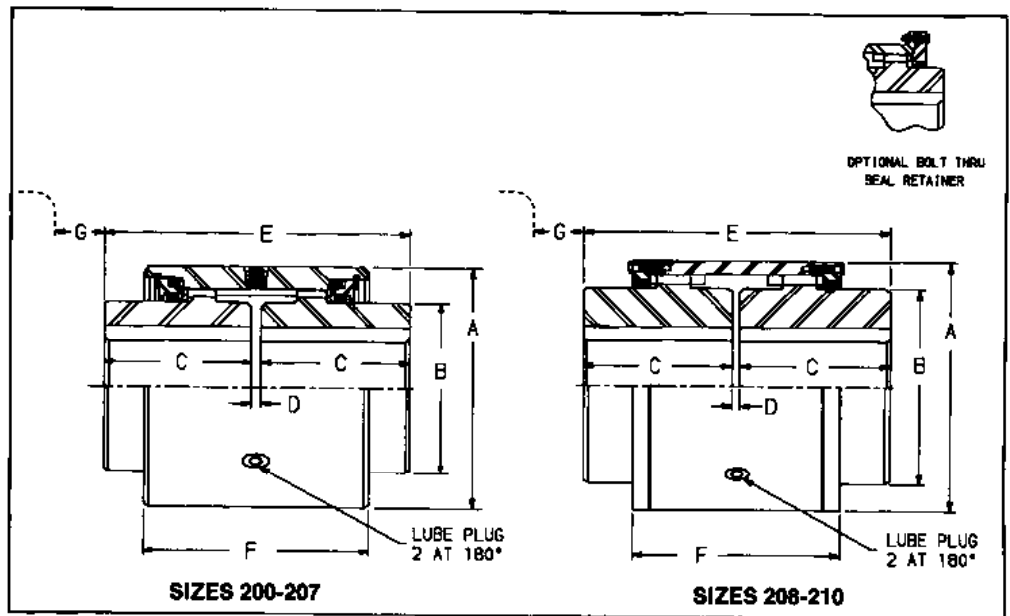
Description: Similar to the Amerigear standard coupling, the double flex coupling has a sleeve and a hub. The main difference is that a gear ring is positioned between the hub and sleeve. The gear ring has an external gear to mate with the sleeve internal gear and an internal gear to fit the hub external gear.

Series C Sizes 200-210

Continuous Sleeve — Double-Engagement Type

Application: Amerigear Series C offers the advantages of lower initial cost, higher speeds, greater safety, more compactness and extremely low weight and WR². Compensates for all three types of misalignment. Meets requirements of all standard applications for shaft sizes up to 15" diameter.

Description: Amerigear Series C Flexible Coupling is designed with a smooth, cylindrical one-piece sleeve for smoother, faster, quieter and safer operation. Positive-engagement steel snap rings keep coupling constrained during operation under the most adverse conditions of axial end loading . . . permits quicker assembly and disassembly. Lower cost over comparably rated flange-and-bolt types.



C Size	Maximum Bore - Inches		Load Capacity		Parallel Offset Capacity In.	DIMENSIONS						
	Square Key	Reduced Key	HP Per 100 R.P.M.	Torque In.-Lbs. x 10 ³		A	B	C	D	E	F	G**
200	.81	.88	3	1.9	.023	2.12	1.25	1.06	.12	2.25	2.25	1.31
*201	1.25	1.31	5	3.2	.037	2.69	1.75	1.38	.12	2.88	2.88	1.62
201 1/4	1.63	1.75	12	7.6	.038	3.19	2.25	1.69	.12	3.50	2.94	1.38
201 1/2	2.25	2.38	27	17.0	.050	4.38	3.12	1.94	.12	4.00	3.56	1.90
202	2.75	2.88	50	31.5	.056	5.38	4.00	2.44	.12	5.00	4.06	1.90
202 1/2	3.50	3.75	85	53.6	.056	6.50	4.88	3.03	.19	6.25	4.63	1.90
203	4.00	4.25	150	94.5	.078	7.44	5.75	3.59	.19	7.37	5.59	2.30
203 1/2	4.50	4.75	225	142.0	.090	8.32	6.50	4.19	.25	8.63	6.43	2.50
204	5.50	5.88	340	214.0	.098	9.86	7.75	4.75	.25	9.75	7.06	2.67
204 1/2	6.25	6.75	515	324.0	.107	10.88	9.00	5.31	.31	10.93	7.58	2.63
205	7.00	7.12	660	416.0	.114	11.75	9.50	6.03	.31	12.37	8.01	2.34
205 1/2	7.50	7.62	875	551.0	.117	12.75	10.50	6.62	.31	13.55	8.28	2.01
206	8.25	8.62	1,190	750.0	.129	14.00	11.75	7.41	.31	15.13	8.91	1.86
207	9.62	10.25	1,640	1,033.0	.160	16.38	13.50	8.69	.38	17.76	10.44	2.11
208	11.25	12.25	2,380	1,500.0	.101	18.38	15.62	9.75	.38	19.88	11.88	1.77
209	12.25	13.38	2,700	1,700.0	.114	20.50	17.50	10.75	.50	22.00	13.25	2.15
210	13.75	15.00	3,300	2,080.0	.127	22.38	19.00	12.00	.50	24.50	14.38	2.01

FOR LARGER SIZES, CONTACT AMERIDRIVES INTERNATIONAL.

*SIZES 200 AND 201 FURNISHED WITHOUT LUBE PLUGS.

**CLEARANCE FOR ALIGNING COUPLING.

MAXIMUM BORE, KEYWAY AND PULLER HOLE DATA, PAGES 9 AND 40. ADDITIONAL DETAILS, PAGES 42-43. MODIFICATIONS AND VARIATIONS, PAGES 31-33.

MAXIMUM SPEEDS, PAGE 34. WEIGHTS AND WR², PAGES 38-39.

Amerigear Flexible Couplings - Fully-Crowned Teeth For Higher Torque, Higher Speed, Higher Misalignment Capacity
All Amerigear Series C Couplings incorporate the following engineered features:

- Sizes 200-207, $\pm 1\frac{1}{2}^\circ$ angular misalignment capacity per gear mesh.
- Sizes 208-210, $\pm \frac{3}{4}^\circ$ angular misalignment capacity per gear mesh.
- Torque ratings at full angular misalignment.
- Accurately machined medium carbon steel hubs and sleeves.
- Positive-type O-ring seals keep lubricant in . . . contaminants out. Seals enshrouded to prevent damage.

Amerigear

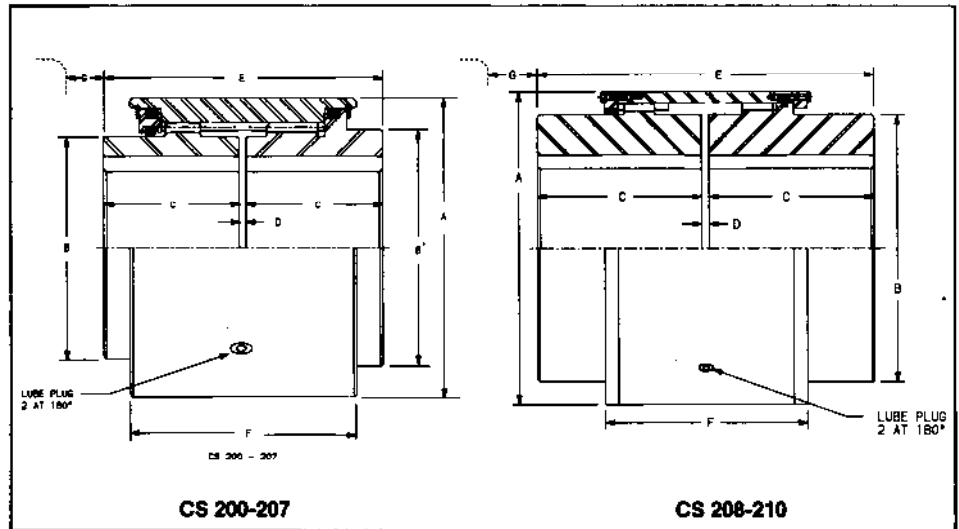
Flexible Couplings

Series CS Sizes 200-210

Continuous Sleeve — Single-Engagement Type

Application: Meets the application requirements described for Amerigear Series FS Couplings (page 10), but in addition offers the advantages of greater safety, more compactness and extremely low weight and WR².

Description: Amerigear Series CS Flexible Coupling is designed with a smooth, cylindrical one-piece sleeve for smoother, faster, quieter and safer operation. Rigid half is splined. Positive-engagement steel snap rings keep the flexible half and rigid half constrained during operation under the most adverse conditions of axial end loadings . . . permits quicker assembly and disassembly.



CS Size	Maximum Bore Bore - Inches Flexible Half		Maximum Bore Bore - Inches Rigid Half		Load Capacity		DIMENSIONS							
	Square Key	Reduced Key	Square Key	Reduced Key	HP Per 100 R.P.M.	Torque In.-Lbs. x 10 ³	A	B	B'	C	D	E	F	G**
200	.81	.88	.88	1.00	3	1.9	2.12	1.25	1.25	1.06	.12	2.25	2.25	1.31
*201	1.25	1.31	1.31	1.38	5	3.2	2.69	1.75	1.75	1.38	.12	2.88	2.88	1.62
201 1/4	1.62	1.75	1.62	1.75	12	7.6	3.19	2.25	2.25	1.69	.12	3.50	2.94	1.38
201 1/2	2.25	2.38	2.25	2.38	27	17.0	4.38	3.12	3.50	1.94	.12	4.00	3.56	1.90
202	2.75	2.88	2.75	3.00	50	31.5	5.38	4.00	4.25	2.44	.12	5.00	4.06	1.90
202 1/2	3.50	3.75	3.50	3.75	85	53.6	6.50	4.88	5.25	3.03	.19	6.25	4.63	1.90
203	4.00	4.25	4.00	4.25	150	94.5	7.44	5.75	6.12	3.59	.19	7.37	5.59	2.30
203 1/2	4.50	4.75	4.50	4.88	225	142.0	8.32	6.50	6.81	4.19	.25	8.63	6.43	2.50
204	5.50	5.88	5.50	5.88	340	214.0	9.86	7.75	8.00	4.75	.25	9.75	7.06	2.67
204 1/2	6.25	6.75	6.25	6.75	515	324.0	10.88	9.00	9.25	5.31	.31	10.93	7.58	2.63
205	7.00	7.12	7.00	7.12	660	416.0	11.75	9.50	10.00	6.03	.31	12.37	8.28	2.34
205 1/2	7.50	7.62	7.50	8.00	875	551.0	12.75	10.50	11.00	6.62	.31	13.55	8.91	2.01
206	8.25	8.62	8.25	8.62	1,190	750.0	14.00	11.75	12.00	7.41	.31	15.13	10.44	1.86
207	9.62	10.25	9.62	10.25	1,640	1,033.0	16.38	13.50	13.75	8.69	.38	17.76	16.00	2.11
208	11.25	12.25	11.25	12.25	2,380	1,500.0	18.38	15.62	15.62	9.75	.38	19.88	11.88	1.77
209	12.25	13.38	12.25	13.38	2,700	1,700.0	20.50	17.50	17.50	10.75	.50	22.00	13.25	2.15
210	13.75	15.00	13.75	15.00	3,300	2,080.0	22.38	19.00	19.00	12.00	.50	24.50	14.38	2.00

FOR LARGER SIZES, CONTACT AMERIDRIVES INTERNATIONAL.

*SIZES 200 AND 201 FURNISHED WITHOUT LUBE PLUGS.

**CLEARANCE FOR ALIGNING COUPLING.

MAXIMUM BORE, KEYWAY AND PULLER HOLE DATA, PAGE 40.

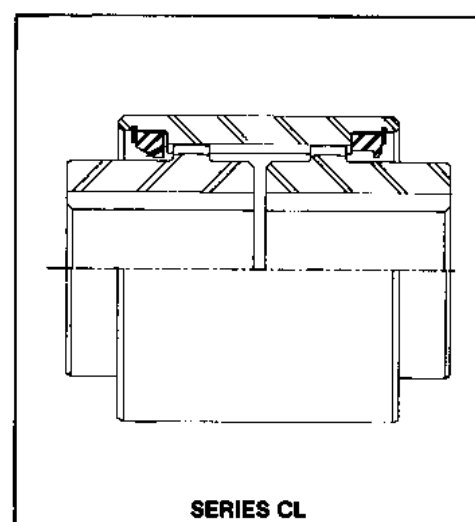
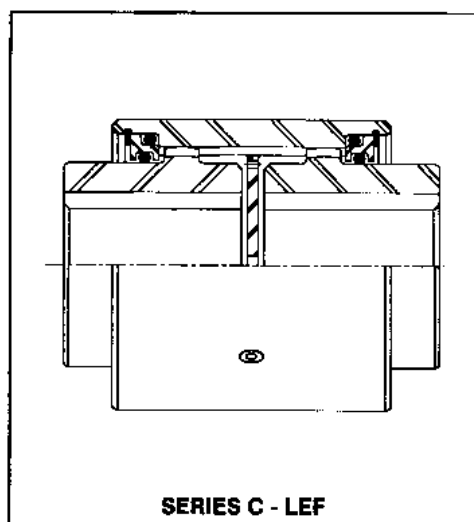
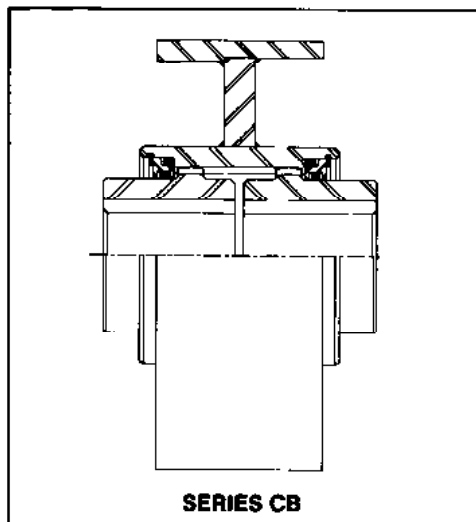
ADDITIONAL DIMENSIONS, PAGES 42-43. MODIFICATIONS AND VARIATIONS, PAGES 31-33. MAXIMUM SPEEDS, PAGE 34.

Amerigear Flexible Couplings - Fully-Crowned Teeth For Higher Torque, Higher Speed, Higher Misalignment Capacity
All Amerigear Series CS Couplings incorporate the following engineered features:

- Sizes 200-207, $\pm 1\frac{1}{2}^\circ$ angular misalignment capacity.
- Sizes 208-210, $\pm \frac{3}{4}^\circ$ angular misalignment capacity.
- Torque ratings at full misalignment.
- Accurately machined medium carbon steel hubs and sleeves.
- Positive-type O-ring seals keep lubricant in . . . contaminants out. Seals enshrouded to prevent damage.

Modifications and Variations

Series C



Brake Drum Type Coupling

Application: The Series CB Brake Drum Coupling is used where the shaft space prevents a separate drum mounting and the drum diameter prevents a bolted design to be used.

Description: The Series CB Brake Drum is integral with the coupling sleeve. It may be fabricated or totally machined. When ordering, specify the drum outer diameter and the face width.

Limited End Float Coupling

Application: The standard Series C coupling is designed with clearances to accommodate misalignment and manufacturing tolerances. When the application requires that the end float be restrained, a plastic disc is positioned between the faces of the coupling hubs. The clearances are measured and the hubs are modified for the amount of limited end float required.

It should be noted that as the coupling is extended or compressed for LEF, the misalignment capacity of the coupling is reduced accordingly.

CAUTION:

Parts of limited end float couplings are not interchangeable with parts of similar or standard couplings.

Continuously Lubricated Coupling

Application: The C Series coupling can be modified for continuous oil lubrication. The same oil supply qualifications listed under the FL Amerigear also apply to the CL Series couplings.

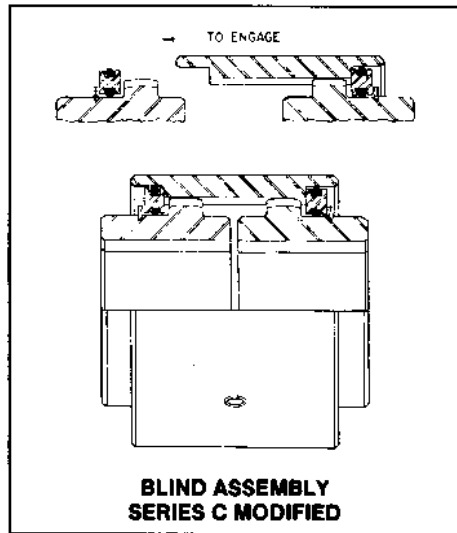
Description: Standard stock hubs and sleeves are used in the CL construction. The CL Series has the advantage of reduced weight, compact design and lower WR^2 .

Dam rings are designed with inlet ring and outlet ring openings at different levels to assure positive oil flow, controlled oil level and oil level retention in the event the oil supply is interrupted. The outlet ring has angled discharge holes to provide a scavenging action to minimize sludge accumulation.

Amerigear

Flexible Couplings

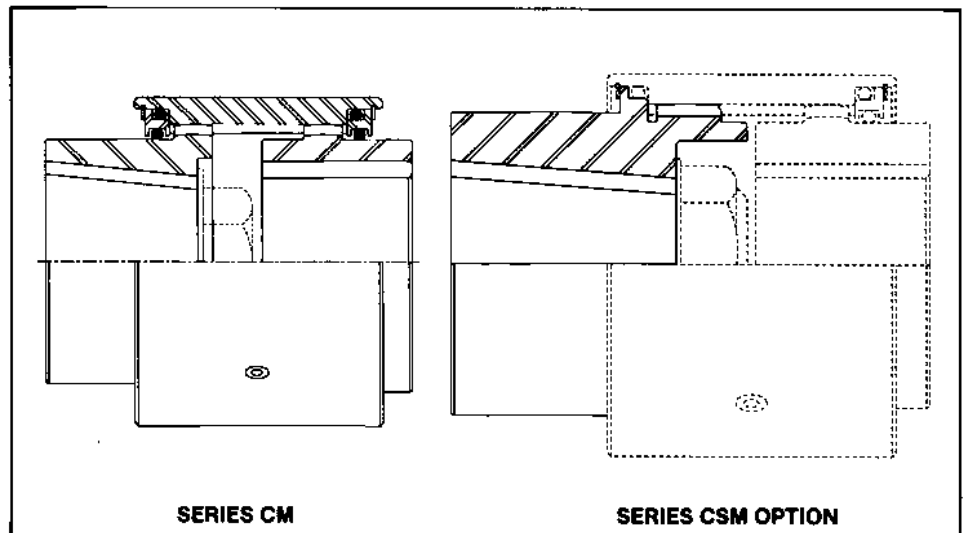
Modifications and Variations Series C



Blind Assembly Modification — Series C

Application: Recommended for plug-in type installations, as with flange or frame-mounted equipment. Also used where short shaft extensions of bell housings restrict installation of standard Series C Coupling. May be used in horizontal or vertical positions.

Description: Amerigear Series C (Modified), Blind Assembly type Flexible Coupling retains all the features and overall dimensions of standard Series C Coupling. Snap-ring groove is machined into hub allowing preassembly of seal assembly to hub before shafts are connected.



Mill Motor CM Coupling

Application: The CM and CSM couplings are designed for applications which utilize shafts having tapered shaft ends, i.e., AISE mill motors. These couplings offer the advantage of lower weight, minimum outer diameter and low WR^2 .

Description: The CM and the CSM couplings use standard stock sleeves. The couplings can be made with any combination of hub bores. For example, one or both hubs with tapered bores; one tapered and one straight bore.

Modifications and Variations

Series C

Continuous Sleeve Axial Travel

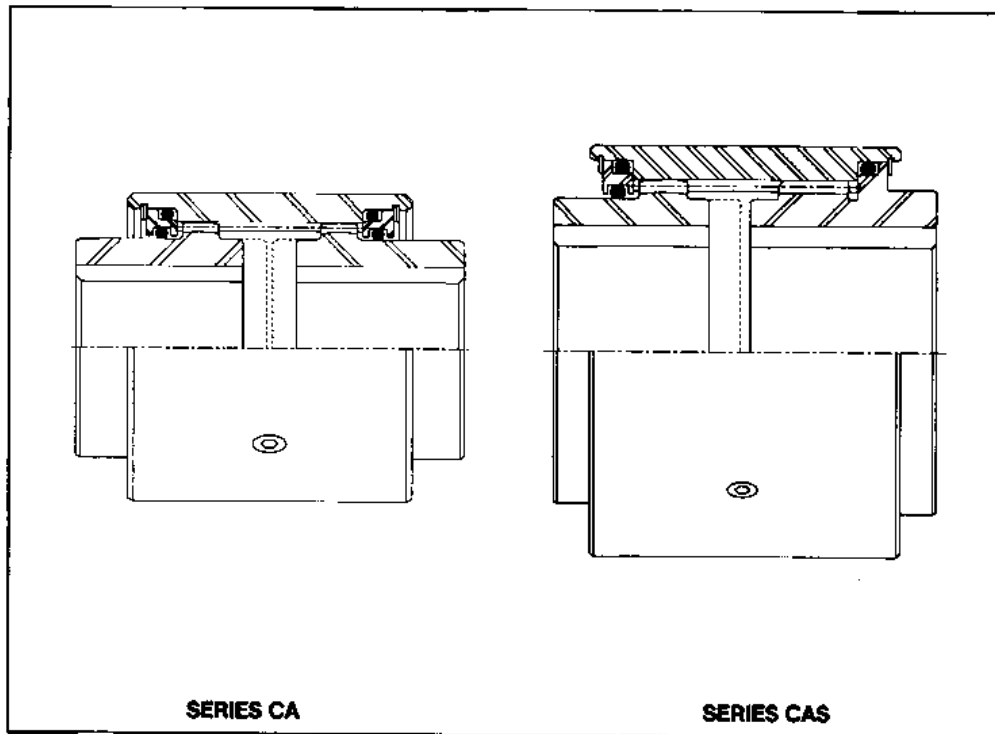
Application: The CA and CAS type couplings are designed to provide axial travel between driver and driven shafts such as with certain crane and fan equipment. Compared to the Series F, the CA and CAS advantages are lower weight and WR, higher speeds and a more compact design.

Description: The Amerigear CA couplings have a one piece sleeve that engages both shaft hubs. The coupling is sealed with seal retainers and O-rings. The coupling is assembled with spiral type retaining rings.

The CAS coupling differs from the CA using a rigid hub in place of one flex hub and has one less seal retainer and O-ring.

Depending on the dimensions required, the coupling usually can be made from stock sleeves and modified stock hubs or a made-to-order may be possible.

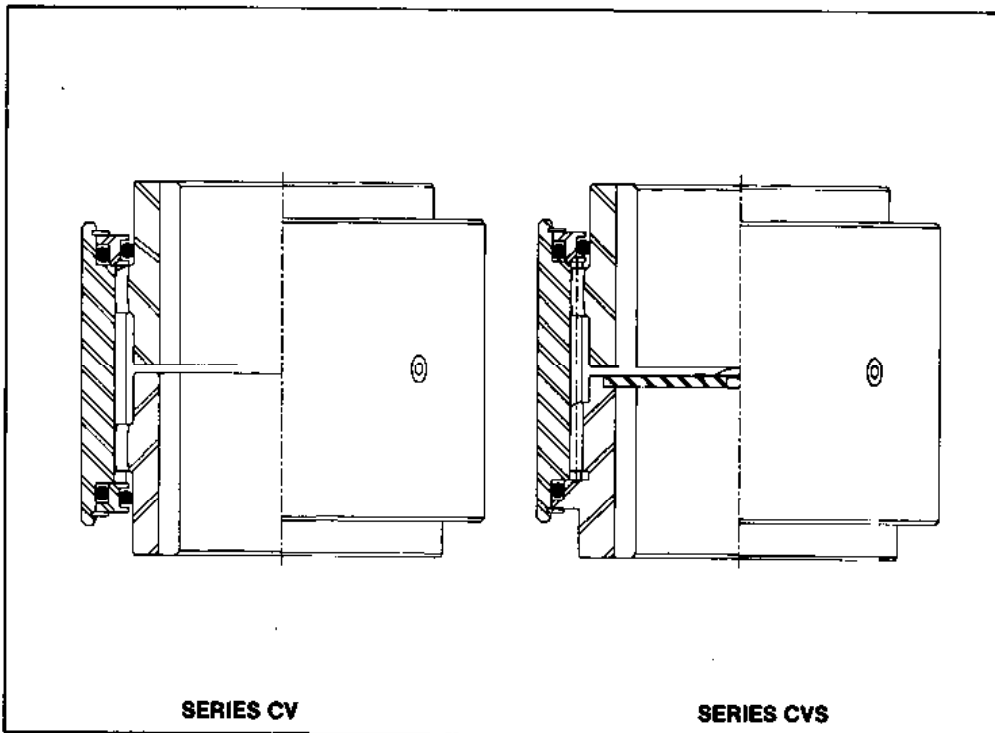
The couplings are limited to $\pm 1/2^\circ$ angular misalignment per flex half.



Continuous Sleeve Vertical Coupling

Application: The CV and CVS couplings are used to connect driver and driven equipment having vertical shafts. While the CV compensates for all three types of misalignment, the CVS compensates only for angular.

Description: The CV coupling is constructed from a stock sleeve, seals, seal retainers and retainer rings and from modified stock hubs. The CVS coupling uses a stock rigid hub in place of one flex hub and one less seal.



Amerigear

Flexible Couplings

Engineering Data Speeds, Classes and Balance

Speeds The speed limits at right are recommendations based on experience and are intended as a guide only. The actual limits are determined by the characteristics of the system in which the coupling is to be installed.

Consult Ameridrives, for speed limits of series not listed at right.

Classes Four classes of Amerigear couplings are available.

1. Standard AMERIGEAR Couplings
2. Balanced Standard AMERIGEAR Couplings
3. Class III AMERIGEAR Couplings
4. Class I AMERIGEAR Couplings

I. Standard Couplings.

These couplings offer fully-crowned teeth. Sizes 200 - 207 have $\pm 1\frac{1}{2}^\circ$ angular misalignment capacity per mesh. Sizes 208 - 210 have $\pm \frac{3}{4}^\circ$. Parts are fully-machined from medium carbon steel. These couplings also feature self-locking nuts and positive type O-ring seals.

II. Balanced Standard Couplings.

This class is offered in Series F and FE for sizes 201½ - 207. These couplings are Standard Couplings which have been dynamically balanced as components. They offer all the features as Standard Couplings. But, because of the increased speed rating of the Balanced Standard Class of couplings, the rated angular misalignment is limited to $\pm 1^\circ$. These couplings will meet an AGMA Balance Classification (see page 35). Series F meet AGMA Class 9. Series FE meet AGMA Class 8.

NOTE: Series FE are supplied with pilot rings and are only available up to a 10" length of spacer.

III. Class III Couplings.

These couplings offer all the features of our standard line, plus additional modifications which permit higher operating speeds. They are made of medium carbon steel and conform to dimensions of standard couplings, and are available through size 205½.

Size	F	F Balanced	F Class III	F Class I	C	FPH	FPH Class III	* FD, FDC
200	8,500				11,000			
201	7,700			32,000	9,800			
201½	7,100			32,000	8,900			
201½	5,400	9,000	12,600	25,000	7,700	4,200	8,200	
202	4,800	8,100	11,400	20,000	6,200	3,800	7,400	1,800
202½	4,300	6,900	9,500	18,000	6,000	3,400	6,150	1,600
203	4,000	6,100	8,200	16,000	5,200	3,200	5,300	1,200
203½	3,600	5,400	7,200	13,000	4,400	2,800	4,700	1,000
204	3,200	4,750	6,300	11,500	3,550	2,500	4,100	900
204½	3,000	4,450	5,900	10,500	3,000	2,400	3,800	850
205	2,600	4,000	5,400	9,800	2,800	2,000	3,500	750
205½	2,400	3,500	4,800	9,000	2,400	1,900	3,000	650
206	2,200	3,250		8,400	2,200	2,200	2,800	600
207	1,800	2,750		6,800	1,800	1,800	2,400	550
208	1,500				1,800			
209	1,275				1,650			
210	1,100				1,400			

* THESE ARE MAXIMUM SPEEDS FOR FD WHEN DISENGAGED AND FOR FDC WHEN ENGAGED OR DISENGAGED. FOR FD WHEN ENGAGED, FOLLOW STANDARD F SPEEDS.

The hubs and sleeves of the Class III couplings are selected from stock to minimize gear tooth tip clearance, and the sleeves incorporate integral pilots, both providing accurate centering of mating sleeves, spacer or tandem shafts. These couplings are dynamically balanced as components and will meet AGMA classifications as designated below. Sleeves and spacers are serialized for ease of identification. Class III coupling piloted sleeves are stocked with undrilled flanges.

Because of the increased speed rating of the Class III Coupling, the rated angular misalignment is limited to $\pm \frac{3}{4}^\circ$.

The Class III Coupling is available in the following series:

- F Page 8, AGMA Class 10
- FL Page 28, AGMA Class 10
- FE Page 19, AGMA Class 9
- FS, FS Page 10 and 24, AGMA Class 8 and 9
- Tandem
- FPH Page 22, AGMA Class 8 and 9

NOTE: Class depends on length and size of coupling.

IV. Class I Couplings.

These are high-performance alloy couplings with nitrided gear teeth which are rated at $\pm \frac{1}{4}^\circ$. Information on this class of gear coupling is not covered in this catalog. Contact Ameridrives and request Amerigear Class I catalog, 462-ADV.

Engineering Data

Speeds, Classes and Balance

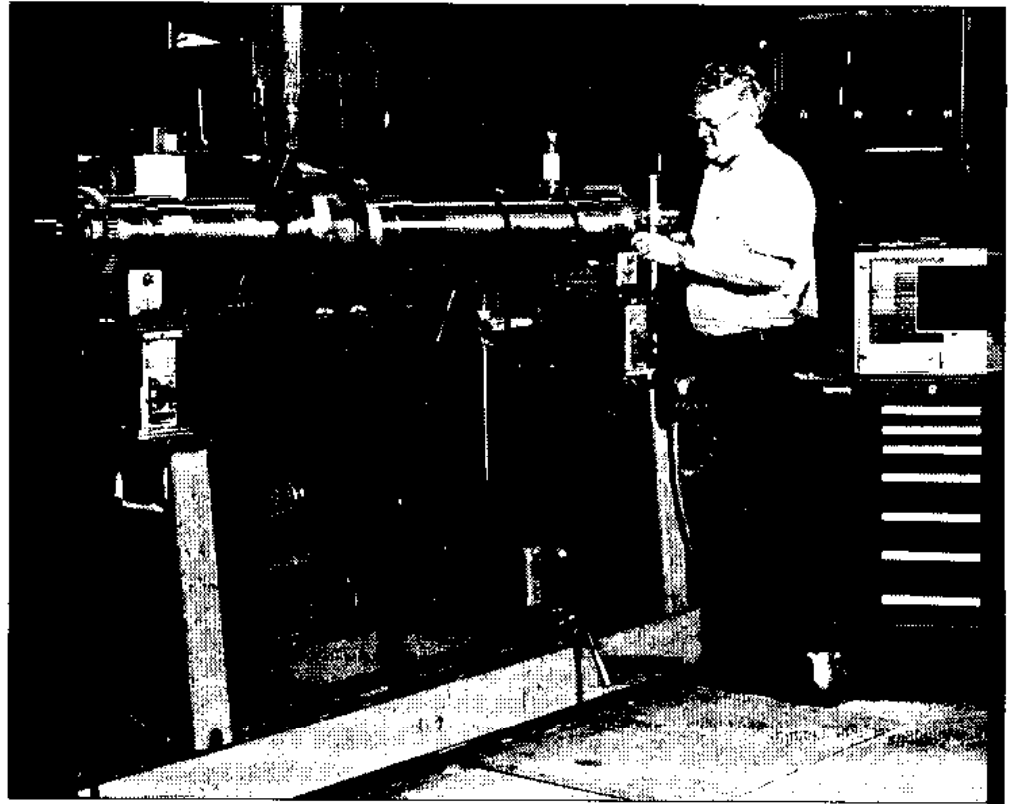
Balance Procedure All components of Balanced Standards are dynamically balanced within .00015 inches peak-to-peak, which is equivalent to a mass shift of 75 micro-inches. All components of Class III couplings are dynamically balanced within .0001 inches peak-to-peak, which is equivalent to a mass shift of 50 micro-inches.

All hubs, sleeves, rigids and other short parts other than unbalanced standard parts, are single plane balanced on Ameridrives designed vertical balance machines.

Spacers, tandem shaft assemblies and other long parts, other than unbalanced standard parts, are two plane balanced on an IRD horizontal balance machine. All balancing operations are performed using state-of-the-art IRD Analyzers.

Class III coupling components balance records are retained in the Quality Control Department. Copies of balance records are available on customer request.

Contact Ameridrives International for balancing needs.



Balancing minimizes damaging vibrations for applications in the higher speed ranges ... and where supporting structures and housings become lighter.

UNBALANCE DATA FOR AMERIGEAR FLEXIBLE COUPLINGS

Table 1:
Standard AGMA Balance Classification

AGMA COUPLING BALANCE CLASS	MAXIMUM DISPLACEMENT OF PRINCIPAL INERTIA AXIS (RMS Micro-Inches)
6	16,000
7	8,000
8	4,000
9	2,000
10	1,000
11	500

Ref.: ANSI/AGMA 9000-C90.

Table 2:
Amerigear Balance Classification

AMERIDRIVES CLASSIFICATION	AGMA CLASS	
	F Coupling	FE Coupling
Standard	8	7
Balanced Standard	9	8
Class III	10	9
Class I	11	10

The approximate unbalance "U" of a coupling, per plane, expressed in Oz.-In., may be found by:

$$U = \frac{16 \times W \times D}{1,000,000}$$

where W = Half coupling weight in Lbs.
D = RMS displacement in micro-inches from Table 1.

RMS = Root Mean Squared average.

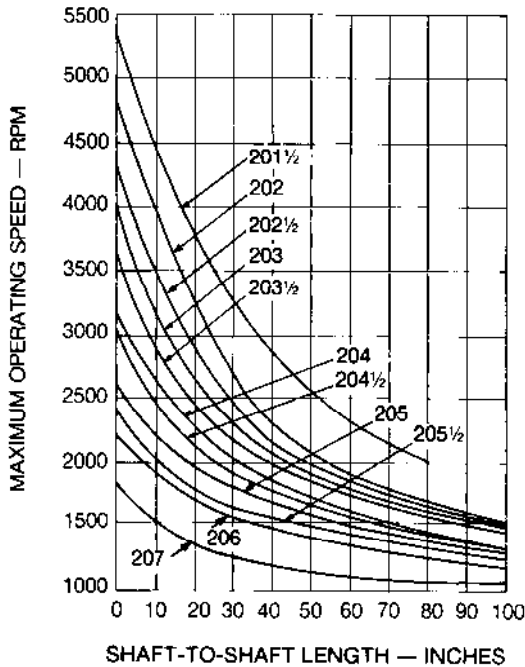
Amerigear

Flexible Couplings

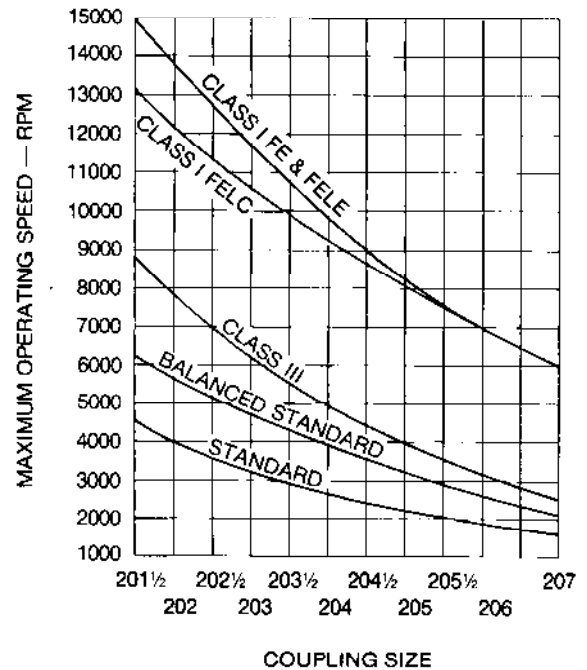
Engineering Data

Maximum Speeds, Series FE and FEL

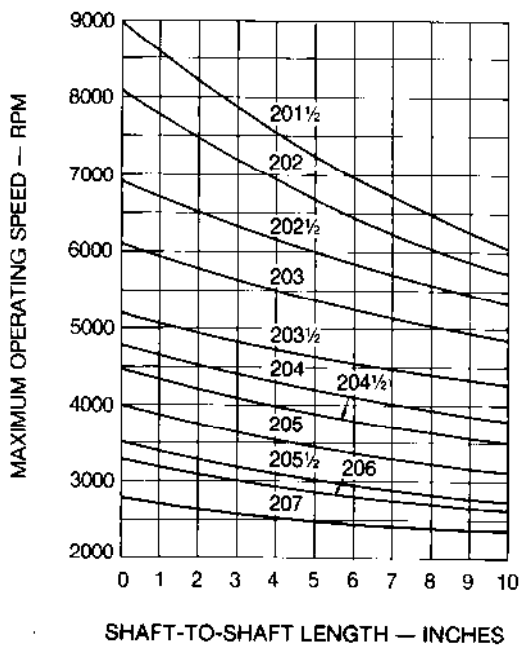
STANDARD FE AND FEL



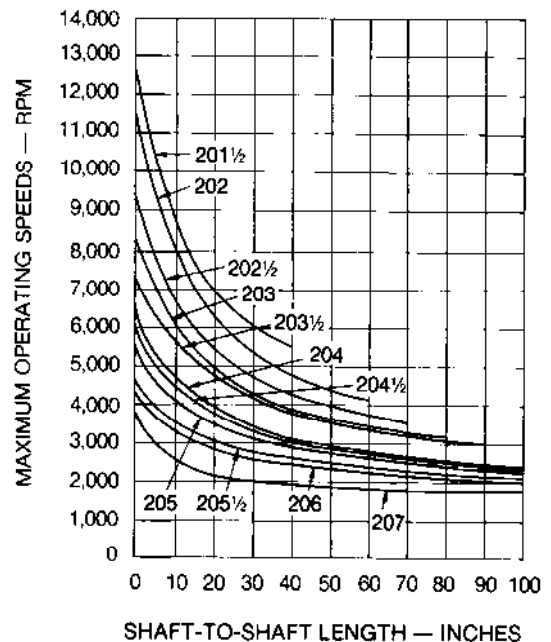
FE AND FEL AT 10-INCH SHAFT-TO-SHAFT



BALANCED STANDARD FE AND FEL



CLASS III FE AND FEL



NOTE: THE MAXIMUM SPEEDS ON THIS PAGE ARE ONLY A GUIDE. THE ACTUAL LIMITS ARE DETERMINED BY THE CHARACTERISTICS OF THE SYSTEM IN WHICH THE COUPLING IS INSTALLED.

FOR LENGTHS GREATER THAN SHOWN, CONTACT AMERIDRIVES INTERNATIONAL.

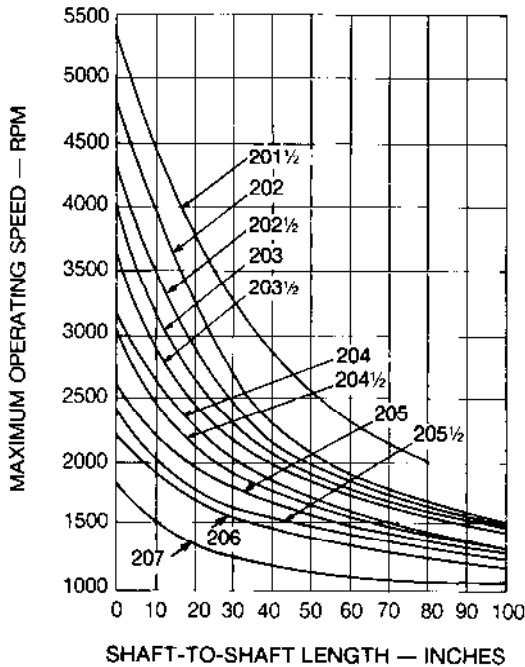
Amerigear

Flexible Couplings

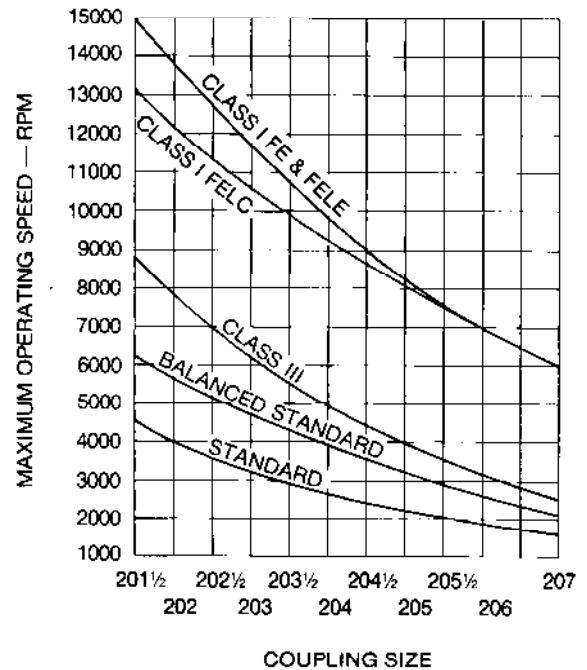
Engineering Data

Maximum Speeds, Series FE and FEL

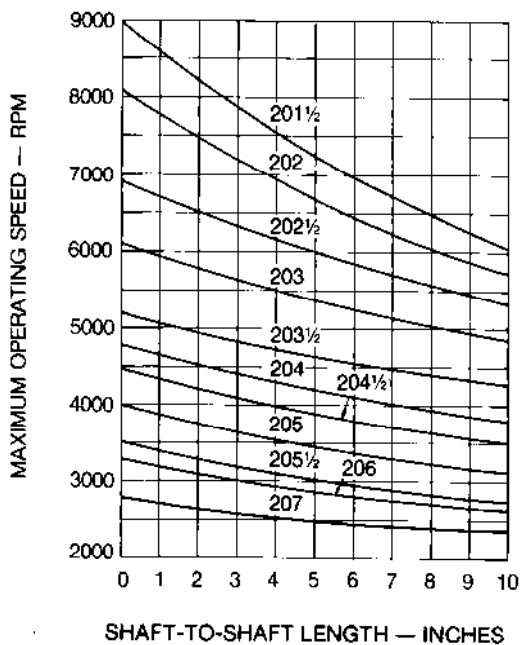
STANDARD FE AND FEL



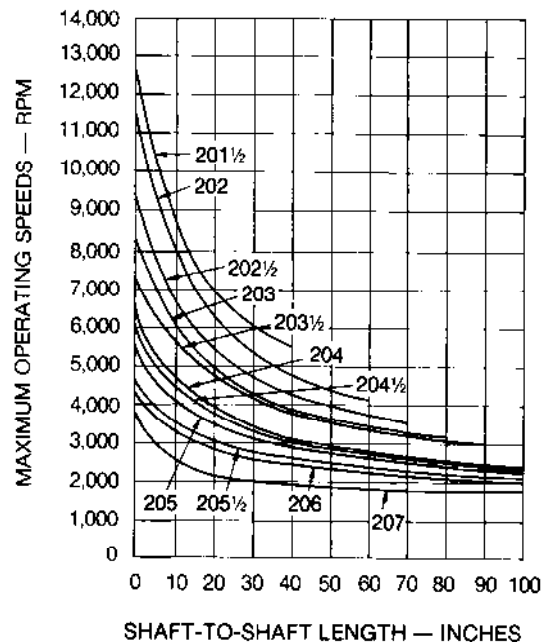
FE AND FEL AT 10-INCH SHAFT-TO-SHAFT



BALANCED STANDARD FE AND FEL



CLASS III FE AND FEL

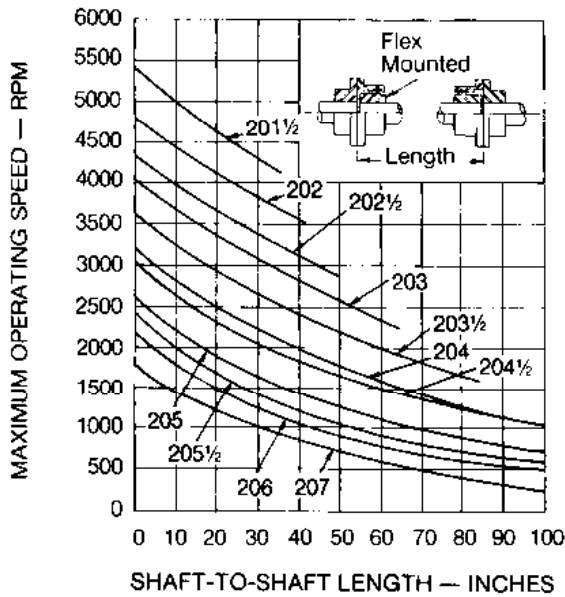


NOTE: THE MAXIMUM SPEEDS ON THIS PAGE ARE ONLY A GUIDE. THE ACTUAL LIMITS ARE DETERMINED BY THE CHARACTERISTICS OF THE SYSTEM IN WHICH THE COUPLING IS INSTALLED.

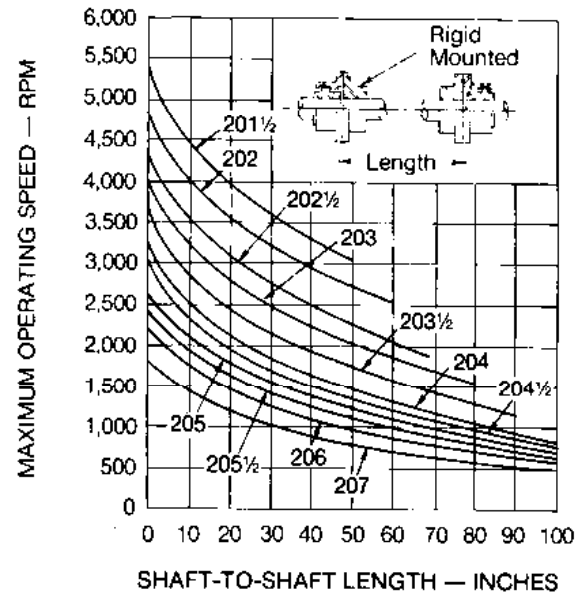
FOR LENGTHS GREATER THAN SHOWN, CONTACT AMERIDRIVES INTERNATIONAL.

Maximum Speeds, Series FS Tandem

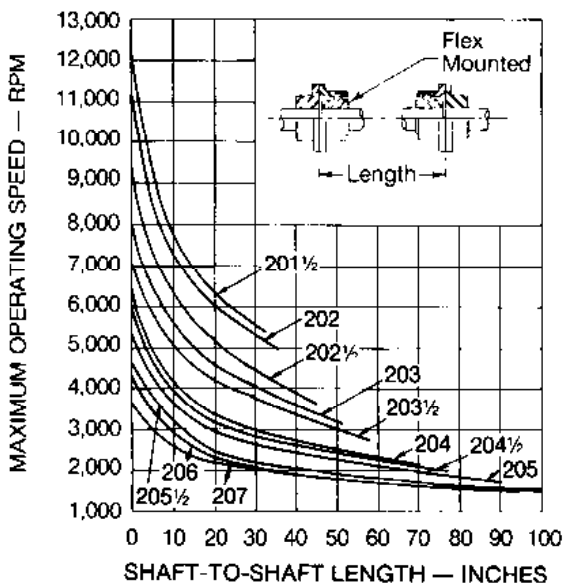
**STANDARD FS
FLEX HUB MOUNTED ON TANDEM SHAFT.**



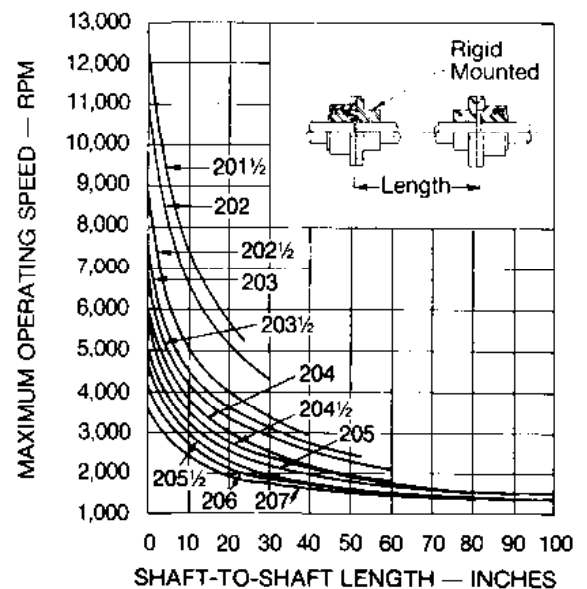
**STANDARD FS
RIGID HUB MOUNTED ON TANDEM SHAFT.**



**CLASS III FS
FLEX HUB MOUNTED ON TANDEM SHAFT.**



**CLASS III FS
RIGID HUB MOUNTED ON TANDEM SHAFT.**



NOTE: THE MAXIMUM SPEEDS ON THIS PAGE ARE ONLY A GUIDE. THE ACTUAL LIMITS ARE DETERMINED BY THE CHARACTERISTICS OF THE SYSTEM IN WHICH THE COUPLING IS INSTALLED.

SEE PAGE 24 FOR SHAFT SIZES USED FOR THESE CHARTS.

IF INTERMEDIATE SHAFT IS NOT SUPPLIED BY AMERIDRIVES, A CRITICAL SPEED CHECK SHOULD BE MADE BY CUSTOMER. FOR LENGTHS GREATER THAN SHOWN, CONTACT AMERIDRIVES INTERNATIONAL.

Amerigear

Flexible Couplings

Weights, WR², Torsional Stiffness and Engineering Calculations

SIZES 200-207 SERIES F AND C — WEIGHT-LBS.

Size	Solid Hub F & C	Solid Rigid	Sleeve		Spacer Less Tube	Tube WL/in.	Shaft WL/in.	Coupling With Solid Hubs		FS Coupling Solid Hub & Rigid	FE Coupling Less Tube w/ Solid Hubs
			F	C				F	C		
200	.42	1.35	.74	.85	1.06	.18	.19	2.3	1.8	2.5	3.36
201	1.04	2.36	1.20	1.32	1.36	.25	.28	4.5	3.6	4.6	5.86
201¼	1.88	3.46	1.63	1.96	2.62	.29	.36	7.0	6.0	7.0	9.62
201½	4.50	10.00	3.90	4.60	7.32	.91	.84	17.0	14.0	18.6	24.32
202	9.06	17.00	5.70	7.60	11.00	1.46	1.39	30.0	27.0	32.2	41.00
202½	16.80	29.50	9.00	12.00	18.30	1.58	2.00	53.0	47.0	56.7	71.30
203	27.50	44.00	12.80	18.00	21.80	2.04	2.73	82.0	75.0	85.7	103.80
203¼	40.80	69.00	21.60	25.00	36.40	2.36	3.56	127.0	109.0	134.0	163.40
204	65.40	103.00	29.70	38.80	45.40	3.16	5.56	193.0	174.0	200.0	236.40
204½	98.20	140.00	33.60	42.00	53.50	3.50	5.56	266.0	242.0	275.0	319.50
205	126.00	206.00	55.60	51.00	95.40	3.63	8.01	368.0	308.0	392.0	463.40
205½	168.00	260.00	73.10	57.50	108.00	4.30	8.01	488.0	400.0	507.0	596.00
206	232.00	360.00	83.60	80.00	87.20	4.60	10.50	640.0	550.0	685.0	727.20
207	363.00	553.00	117.20	128.00	131.00	5.23	14.20	973.0	862.0	1,045.0	1,104.00

SIZES 200-207 SERIES F AND SIZES 200-207 SERIES C — WR² (LB.-IN.²)

Size	Solid Hub F & C	Solid Rigid	Sleeve		Spacer Less Tube	Tube WR ² /in.	Shaft WR ² /in.	Coupling With Solid Hubs		FS Coupling Solid Hub & Rigid	FE Coupling Less Tube w/ Solid Hubs
			F	C				F	C		
200	.10	1.13	1.00	1.6	.72	.12	.02	2.2	1.8	2.46	2.92
201	.51	2.94	2.39	2.0	1.46	.32	.07	5.8	3.0	6.84	7.26
201¼	1.41	5.47	4.14	3.8	2.26	.50	.19	11.1	6.6	13.58	13.40
201½	5.90	34.00	22.00	19.0	49.80	2.72	.39	58.0	33.0	64.10	107.80
202	19.10	75.70	43.60	46.0	89.40	7.03	1.09	129.0	89.0	142.00	218.40
202½	52.80	185.00	119.00	109.0	215.00	10.60	2.25	319.0	224.0	332.00	534.00
203	118.00	350.00	180.00	212.0	335.00	19.20	4.17	617.0	471.0	669.00	952.00
203¼	226.00	732.00	400.00	374.0	750.00	29.10	7.11	1,304.0	855.0	1,411.00	2,054.00
204	508.00	1,386.00	719.00	813.0	1,225.00	53.20	17.40	2,536.0	1,920.0	2,695.00	3,761.00
204½	1,023.00	2,250.00	1,014.00	1,100.0	1,720.00	70.10	17.40	4,174.0	3,239.0	4,387.00	5,894.00
205	1,489.00	4,360.00	2,090.00	1,562.0	3,880.00	90.50	36.00	7,373.0	4,688.0	8,154.00	11,253.00
205½	2,419.00	6,400.00	3,184.00	2,098.0	5,230.00	130.00	36.00	11,496.0	7,134.0	12,293.00	16,726.00
206	4,107.00	8,800.00	4,217.00	3,486.0	4,920.00	159.00	66.70	17,130.0	11,904.0	17,606.00	22,050.00
207	8,552.00	18,800.00	8,044.00	7,638.0	9,760.00	238.00	114.00	34,287.0	25,188.0	36,491.00	44,047.00

TORSIONAL STIFFNESS (Kt) $\frac{\text{IN.-LB.}}{\text{RAD.}} \times 10^6$

Size	Nominal Bore of Hub & Rigid	KA/Inch Shaft	KN/Inch Tube	KS C Coupling Nom. Bore	KS F Coupling Nom. Bore	KS FS Coupling Nom. Bore	KE FE Coupling Less Tube w/ Nom. Bore
200	.75	.68	4.87	.34	.35	.41	.35
201	1.00	2.75	12.90	.86	.86	1.02	.86
201¼	1.25	7.78	28.34	1.60	1.58	1.92	1.58
201½	1.50	15.99	100.38	3.63	3.43	3.88	3.31
202	2.00	44.10	256.36	8.68	7.84	9.08	7.49
202½	2.50	91.00	418.56	16.87	14.61	17.02	13.94
203	3.00	169.00	760.52	28.66	25.16	29.53	23.88
203¼	3.50	289.00	963.36	44.32	40.09	46.93	38.42
204	4.00	705.00	1,469.00	69.09	61.25	71.87	58.06
204½	4.50	705.00	2,356.00	99.76	85.79	101.12	80.57
205	5.00	1,460.00	4,144.00	126.94	111.40	132.36	105.72
205½	5.50	1,460.00	5,110.00	169.56	152.78	181.63	144.67
206	6.00	2,710.00	6,455.00	222.07	189.95	220.81	176.71
207	7.00	4,620.00	9,660.00	335.94	287.14	340.09	268.09

I. To find Wt. and WR² of a coupling not shown on chart, add Wt. and WR² of components and subtract Wt. and WR² of required bores. See page 39.

II. To find Torsional Stiffness (Kt) of FS Tandem Coupling:

$$KT = \frac{1}{\frac{2}{K_s} + \frac{N}{K_A}}$$

N = Length of shaft between Mtd. hubs or rigids.

For rigid Mtd. — N = Shaft-to-shaft - 2xD - 2xC'

For flex Mtd. — N = Shaft-to-shaft - 2xD - 2xC

Find D, C, C' on page 10.

To find Torsional Stiffness (Kt) of FE Tandem Coupling:

$$KT = \frac{1}{\frac{1}{K_E} + \frac{N}{K_N}}$$

N = Length of spacer tube between flanges.

N = Shaft-to-shaft - D-2Q (Find Q on page 41.)

Weights, WR^2 , Torsional Stiffness and Engineering Calculations

SERIES F AND C — WEIGHTS

Size	Large Coupling with Solid Hubs		
	F	F - Opt.	C
208	1,440	1,496	1,237
209	1,989	2,051	1,707
210	2,543	2,543	2,141
211	3,370	3,441	—
212	4,240	4,320	—
213	5,350	5,440	—
214	6,550	6,640	—
215	7,880	8,020	—
216	9,490	9,960	—
218	12,900	13,600	—
220	17,100	18,100	—
222	22,700	24,100	—
224	29,100	30,800	—
226	36,900	39,500	—
228	45,000	45,300	—
230	54,500	55,100	—

SERIES F AND C — WR^2 - LB./IN.² × 10³

Size	Large Coupling with Solid Hubs		
	F	F - Opt.	C
208	65.8	71.1	45.7
209	114.0	121.3	107.3
210	168.7	178.6	124.2
211	267.4	279.8	—
212	390.2	405.6	—
213	581.3	600.3	—
214	806.9	829.9	—
215	1,095.0	1,136.0	—
216	1,550.0	1,696.0	—
218	2,513.0	2,784.0	—
220	4,263.0	4,459.0	—
222	6,394.0	7,273.0	—
224	9,849.0	10,824.0	—
226	14,543.0	16,647.0	—
228	20,126.0	20,389.0	—
230	27,460.0	28,271.0	—

SERIES FS — WEIGHT AND WR^2 - LB./IN.²

Size	Larger Coupling With Solid Hub and Rigid			
	Weight (Lbs.)		WR^2 - Lb./In. ² × 10 ³	
	FS	FS - Opt.	FS	FS - Opt.
208	1,482	1,526	69.2	72.5
209	2,044	2,093	117.6	123.4
210	2,659	2,725	177.9	187.3
211	3,630	3,670	298.0	304.2
212	4,550	4,590	444.5	452.2
213	5,730	5,780	641.7	651.3
214	6,980	7,020	877.0	898.5
215	8,380	8,450	1,202.0	1,222.0
216	10,380	10,530	1,771.0	1,814.0
218	14,100	14,200	2,882.0	3,522.0
220	18,600	18,700	4,559.0	4,649.0
222	24,700	24,900	7,328.0	7,430.0
224	31,400	31,600	11,006.0	11,135.0
226	41,400	41,600	16,902.0	17,093.0
228	48,600	48,800	23,093.0	23,356.0
230	57,500	58,100	29,914.0	30,725.0

ENGINEERING CALCULATIONS

I. Solid Disc (Fig. 1)

- Weights-Lbs.
 $W = .223 L D^2$
- WR^2 - Lb.-In.²
 $WR^2 = \frac{W}{8} D^2$
- Torsional Stiffness - In.-Lb./Radian
 $K = \frac{1.13 \times 10^6 (D^4)}{L}$

II. Disc With Hole (Fig. 2)

- Weights-Lbs.
 $W = .223 L (D^2 - d^2)$
- WR^2 - Lb.-In.²
 $WR^2 = \frac{W}{8} (D^2 + d^2)$
- Torsional Stiffness - In.-Lb./Radian
 $K = \frac{1.13 \times 10^6 (D^4 - d^4)}{L}$

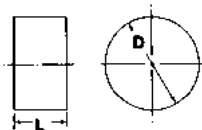


FIG. 1

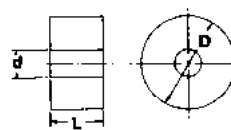


FIG. 2

III. Misalignment

- Angular Misalignment
A gear coupling accommodates for various types of misalignment by angular displacement of its gear teeth (Fig. 3).

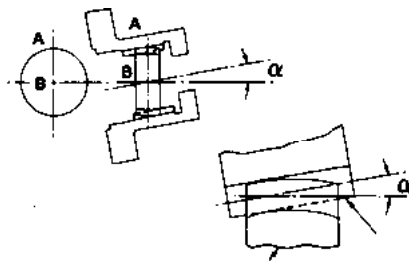


FIG. 3

A single gear mesh can only accommodate angular misalignment (Fig. 4).



FIG. 4

Fig. 5 shows a double engagement coupling made up of two meshes having $\pm\alpha^\circ$ capacity each. Together, they will provide a total angular capacity of $\pm 2\alpha^\circ$.

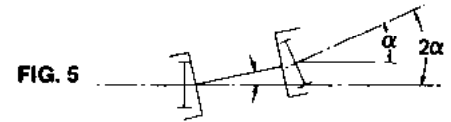


FIG. 5

- Fig. 6 shows a double engagement coupling of two meshes each having $\pm 2\alpha^\circ$. If the distance between meshes is "d", then the maximum parallel offset "Y" is equal to:

$$Y = d \tan \alpha^\circ \quad \alpha = \text{rated misalignment}$$

α°	TAN α°
1/4	.0044
1/2	.0087
3/4	.0131
1	.0174
1 1/2	.0262

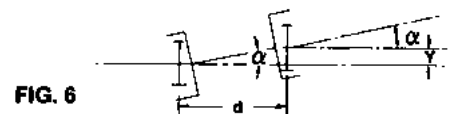


FIG. 6

- The third type of misalignment is when we have a combination of angular and parallel offset.

To find the amount of angular capacity allowed, when we know the amount of offset:

$$\alpha_{\text{allow}} = \alpha_{\text{rated}} - \tan^{-1} \left(\frac{Y}{d} \right)$$

To find the amount of parallel allowed, if angular misalignment (α_1) is known:

$$Y = d \tan (\alpha_{\text{rated}} - \alpha_1)$$

IV. Axial Thrust Transmitted To Thrust Bearings

$$F = (T \times \mu) / R$$

$\mu = .03$ to $.3$ (depending on lubrication). Generally, use $.15$.

$$R = \text{Pitch Radius}$$

The last two digits of a coupling size is approximately equal to the pitch radius.

$$\text{Ex. } 203\frac{1}{2} \quad R = 3\frac{1}{2}$$

$$211 \quad R = 11$$

T = Operating Torque - In.-Lbs.

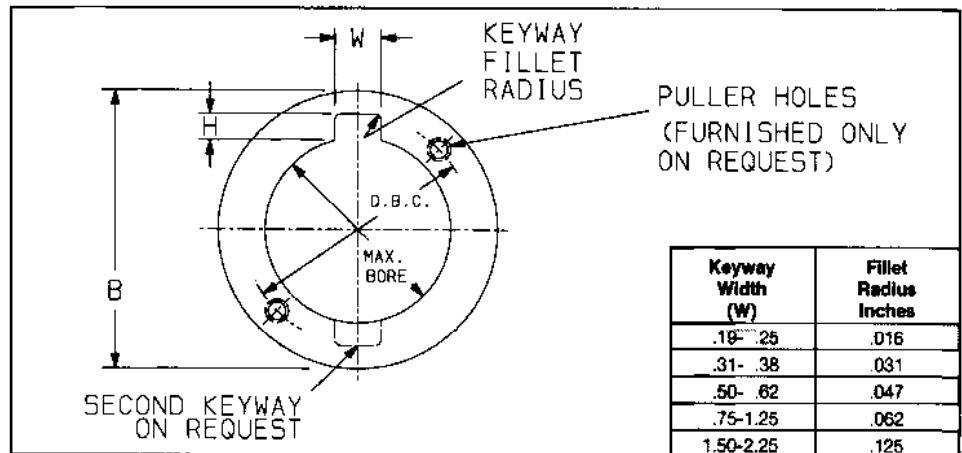
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Flexible Couplings

Maximum Bore, Keyway and Puller Hole Data Series F, FS, C, CS

F, C and CS Size	Max. Bore With Puller Holes	Puller Holes	
		DBC	Size
200	—		
201	1.00	1.375	¼-28
201¼	1.44	1.812	¼-28
201½	2.00	2.625	5/16-18
202	2.75	3.375	5/16-18
202½	3.25	4.187	¾-16
203	4.00	4.875	½-13
203½	4.38	5.437	¾-11
204	5.50	6.625	¾-11
204½	6.50	7.875	¾-11
205	6.62	8.250	¾-10
205½	7.00	8.750	1-8
206	8.25	10.000	1-8
207	9.00	11.375	1¼-7
208	11.25	13.500	1¼-7
209	12.25	15.250	1¾-6
210	13.75	16.500	1½-6
211	15.00	18.000	1½-6
212	17.00	20.000	1½-6
213	19.00	22.000	1½-6
214	20.00	23.500	1¾-5
215	22.00	25.500	1¾-5
216	23.50	27.000	1¾-5
218	26.50	30.500	2-4½
220	30.00	34.500	2-4½
222	33.00	38.500	2-4½
224	36.00	42.500	2-4½
226	39.00	46.000	2-4½
228	42.00	50.000	2-4½
230	46.00	54.000	2-4½

NOTE: THESE TABLES ARE EXCLUSIVE. IF BOTH PULLER HOLES AND KEYWAYS ARE REQUIRED, THEN THE MAXIMUM BORE WILL BE THE SMALLER BORE SIZE LISTED IN ANY TABLE.



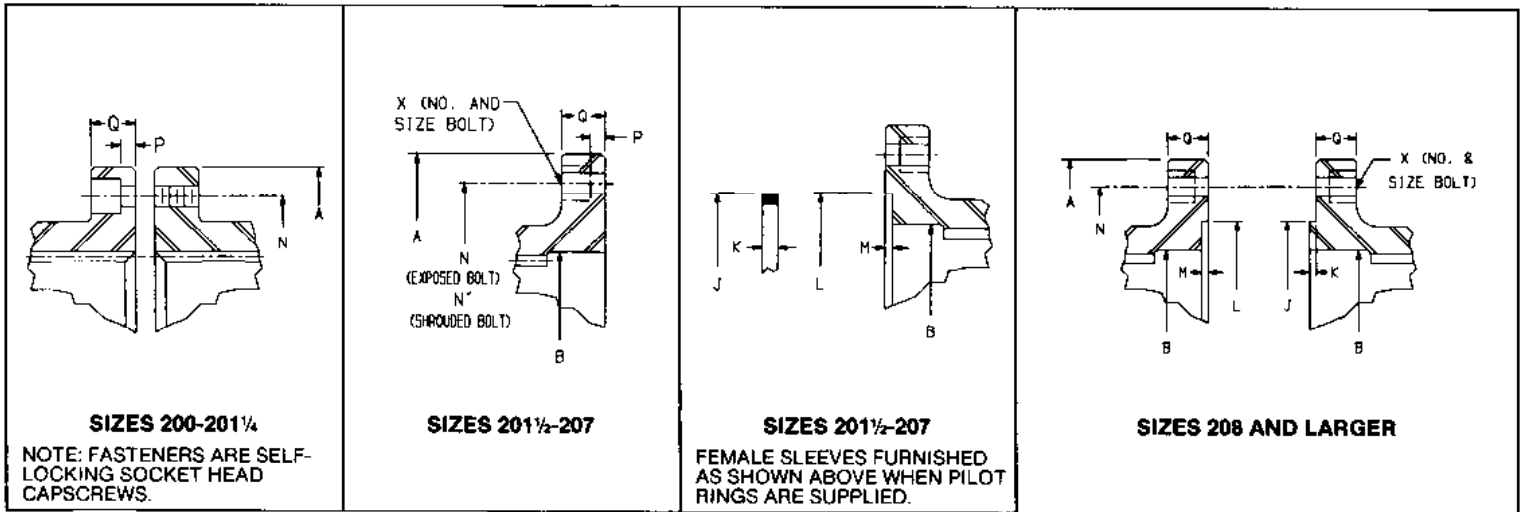
F and C Size	Stock Rough Bore*	Reduced Key			Square Key			Hub Dia. B
		Bore	W	H	Bore	W	H	
200	.375	.875	.19	.06	.812	.19	.09	1.25
201	.375	1.312	.25	.09	1.250	.25	.12	1.75
201¼	.375	1.750	.38	.12	1.625	.38	.19	2.25
201½	.750	2.375	.50	.19	2.250	.50	.25	3.12
202	.875	2.875	.62	.22	2.750	.62	.31	4.00
202½	.875	3.750	.88	.31	3.500	.88	.44	4.88
203	1.500	4.250	1.00	.38	4.000	1.00	.50	5.75
203½	1.500	4.750	1.00	.38	4.500	1.00	.50	6.50
204	2.375	5.875	1.25	.44	5.500	1.25	.62	7.75
204½	2.375	6.750	1.50	.50	6.250	1.50	.75	9.00
205	3.375	6.750	1.75	.75	6.625	1.75	.88	9.50
205½	3.375	7.625	1.75	.75	7.500	1.75	.88	10.50
206	4.500	8.625	2.00	.75	8.250	2.00	1.00	11.75
207	5.000	10.250	2.50	.88	9.625	2.50	1.25	13.50

*MINIMUM BORE IS .060 INCHES GREATER THAN ROUGH BORE SIZE.

FS Size	Rigid Half — Series FS							Rigid Half — Series CS						
	Reduced Key			Square Key			Rigid Half Dia. B	Reduced Key			Square Key			Rigid Half Dia. B
	Bore	W	H	Bore	W	H		Bore	W	H	Bore	W	H	
200	1.375	.31	.12	1.312	.31	.16	1.94	1.000	.19	.06	.875	.19	.09	1.25
201	1.875	.38	.12	1.750	.38	.19	2.56	1.375	.31	.12	1.312	.31	.16	1.75
201¼	2.125	.50	.19	2.000	.50	.25	3.00	1.750	.38	.12	1.625	.38	.19	2.25
201½	2.875	.62	.22	2.688	.62	.31	3.88	2.375	.62	.22	2.250	.50	.25	3.50
202	3.500	.88	.31	3.250	.88	.44	4.88	3.000	.75	.25	2.750	.62	.31	4.25
202½	4.250	1.00	.38	4.000	1.00	.50	5.75	3.750	.88	.31	3.500	.88	.44	5.25
203	5.000	1.25	.44	4.625	1.25	.62	6.81	4.250	1.00	.38	4.000	1.00	.50	6.12
203½	5.750	1.25	.44	5.375	1.25	.62	7.75	4.875	1.25	.44	4.500	1.00	.50	6.81
204	6.750	1.50	.50	6.250	1.50	.75	9.06	5.875	1.25	.44	5.500	1.25	.62	8.00
204½	7.375	1.75	.62	6.875	1.75	.88	10.19	6.750	1.50	.50	6.250	1.50	.75	9.25
205	8.375	1.75	.62	7.875	1.75	.88	11.38	7.000	1.75	.62	6.625	1.75	.88	10.00
205½	9.250	2.00	.75	8.750	2.00	1.00	12.50	8.000	2.00	.75	7.500	1.75	.88	11.00
206	9.875	2.00	.75	9.375	2.00	1.00	13.50	8.625	2.00	.75	8.250	2.00	1.00	12.00
207	11.500	2.50	.88	10.750	2.50	1.25	15.75	10.250	2.50	.88	9.625	2.50	1.25	13.75

CONTACT AMERIDRIVES INTERNATIONAL REGARDING BORES FOR HUBS OR RIGID HALVES WHERE COUNTERBORES, REDUCED LENGTHS, OVERBORES OR SPECIAL KEYWAYS ARE INVOLVED.

Dimensional Data Flange Details, Series F



Size	A	N D.B.C.	P	Q	Bolt No.	Bolt Size
200	2.937	2.38	.12	.44	4	1/4 - 28
201	3.562	3.00	.12	.44	4	1/4 - 28
201 $\frac{1}{2}$	4.000	3.44	.12	.44	4	1/4 - 28

Size	COMMON DIMENSIONS							EXPOSED BOLT			SHROUDED BOLT				
	A	B	J	K	L	M	Q	N		X (Bolts)		N'	P	X (Bolts)	
								D.B.C.	No.	Size	D.B.C.			No.	Size
201 $\frac{1}{2}$	6.00	3.69	3.844/3.842	.16	3.844/3.846	.09	.75	4.81	8	$\frac{3}{8}$	4.81	.22	8	$\frac{3}{8}$	
202	7.00	4.56	4.750/4.748	.16	4.750/4.752	.09	.75	5.88	6	$\frac{1}{2}$	5.81	.22	10	$\frac{3}{8}$	
202 $\frac{1}{2}$	8.38	5.56	5.750/5.748	.16	5.750/5.752	.09	.88	7.12	6	$\frac{3}{8}$	7.00	.28	10	$\frac{1}{2}$	
203	9.44	6.47	6.750/6.748	.16	6.750/6.752	.09	.88	8.12	8	$\frac{3}{8}$	8.00	.28	12	$\frac{1}{2}$	
203 $\frac{1}{2}$	11.00	7.26	7.516/7.514	.16	7.516/7.518	.09	1.06	9.50	8	$\frac{3}{4}$	9.28	.33	12	$\frac{3}{8}$	
204	12.50	8.56	9.000/8.998	.31	9.000/9.002	.19	1.06	11.00	8	$\frac{3}{4}$	10.62	.33	14	$\frac{3}{8}$	
204 $\frac{1}{2}$	13.62	9.81	10.125/10.123	.31	10.125/10.127	.19	1.06	12.00	10	$\frac{3}{4}$	11.75	.33	14	$\frac{3}{8}$	
205	15.31	10.73	11.125/11.123	.31	11.125/11.127	.19	1.50	13.50	8	$\frac{7}{8}$	13.19	.52	14	$\frac{3}{4}$	
205 $\frac{1}{2}$	16.56	11.73	12.500/12.498	.31	12.500/12.502	.19	1.50	14.50	14	$\frac{7}{8}$	14.44	.52	16	$\frac{3}{4}$	
206	18.00	12.73	13.500/13.498	.44	13.500/13.502	.25	1.00	15.75	14	$\frac{7}{8}$	—	—	—	—	
207	20.75	15.06	15.500/15.498	.56	15.500/15.502	.31	1.12	18.25	16	1	—	—	—	—	
208	23.25	17.06	17.809/17.806	.25	17.812/17.815	.31	1.31	20.75	16	1 $\frac{1}{2}$	—	—	—	—	
209	26.00	19.06	19.809/19.806	.25	19.812/19.815	.31	1.50	23.25	18	1 $\frac{1}{2}$	—	—	—	—	
210	28.00	20.56	21.557/21.554	.31	21.562/21.565	.38	1.50	25.25	18	1 $\frac{3}{4}$	—	—	—	—	
211	30.50	23.00	23.997/23.994	.31	24.000/24.003	.38	1.62	27.50	18	1 $\frac{1}{2}$	—	—	—	—	
212	33.00	25.00	25.997/25.994	.31	26.000/26.003	.38	1.62	30.00	18	1 $\frac{1}{2}$	—	—	—	—	
213	35.75	27.00	27.997/27.994	.31	28.000/28.003	.38	1.75	32.25	18	1 $\frac{3}{4}$	—	—	—	—	
214	38.00	29.00	29.997/29.994	.31	30.000/30.003	.38	1.88	34.50	18	1 $\frac{3}{4}$	—	—	—	—	
215	40.50	31.00	31.997/31.994	.31	32.000/32.003	.38	1.88	36.75	20	1 $\frac{3}{4}$	—	—	—	—	
216	44.50	33.25	34.246/34.242	.38	34.250/34.254	.50	2.25	40.50	20	2	—	—	—	—	
218	48.50	37.25	38.246/38.242	.38	38.250/38.254	.50	2.25	44.50	22	2	—	—	—	—	
220	52.50	41.25	42.246/42.242	.38	42.250/42.254	.50	2.25	48.50	24	2	—	—	—	—	
222	58.00	45.25	46.496/46.492	.50	46.500/46.504	.62	2.50	53.50	24	2 $\frac{1}{4}$	—	—	—	—	
224	62.88	49.25	50.496/50.492	.50	50.500/50.504	.62	2.75	58.12	24	2 $\frac{1}{2}$	—	—	—	—	
226	68.00	53.62	54.496/54.492	.50	54.500/54.504	.62	3.00	63.75	24	2 $\frac{3}{4}$	—	—	—	—	
228	73.00	57.62	58.496/58.492	.50	58.500/58.504	.62	3.00	67.75	24	2 $\frac{3}{4}$	—	—	—	—	
230	77.00	61.62	62.496/62.492	.50	62.500/62.504	.62	3.00	71.75	24	2 $\frac{3}{4}$	—	—	—	—	

SIZES 201 $\frac{1}{2}$ -205 $\frac{1}{2}$ HAVE SHROUDED BOLTS (SB) WITH SELF-LOCKING NUTS AS STANDARD; EXPOSED BOLTS (EB) UPON REQUEST — NO ADDITIONAL COST.

SIZES 206-215 HAVE EXPOSED BOLTS (EB) WITH SELF-LOCKING NUTS AS STANDARD.

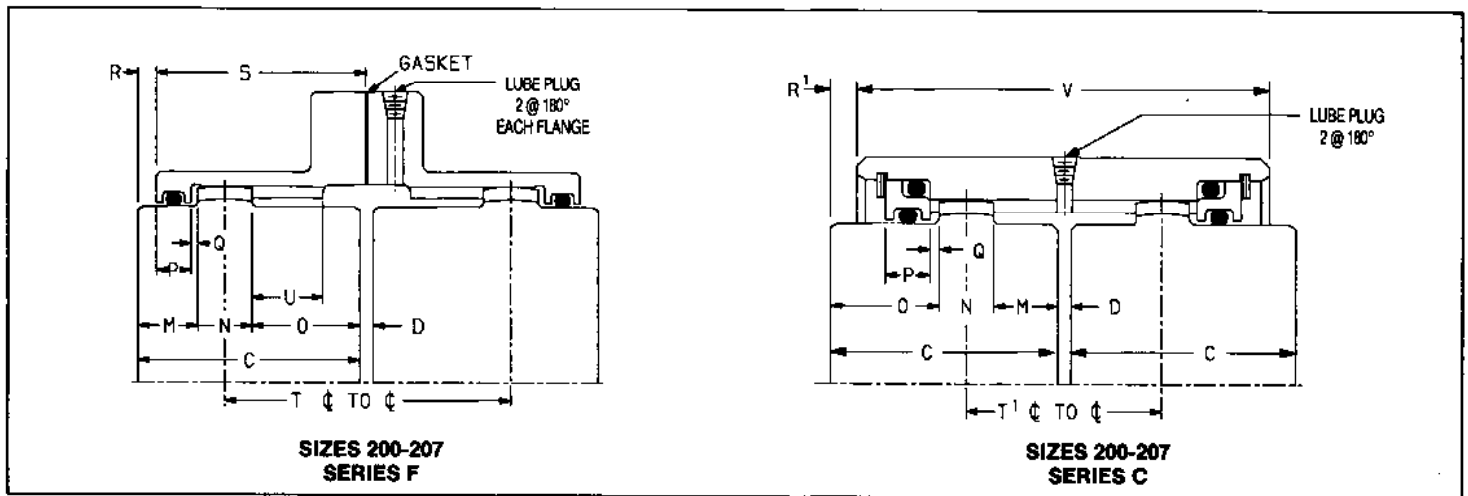
SIZES 216-230 HAVE EXPOSED BOLTS (EB) WITH NUTS AND LOCKWASHERS.

NON-STANDARD BOLT CIRCLES CAN BE MADE FROM UNDRILLED STOCK UNIVERSAL SLEEVES IN SIZES 201 $\frac{1}{2}$ -205 $\frac{1}{2}$.

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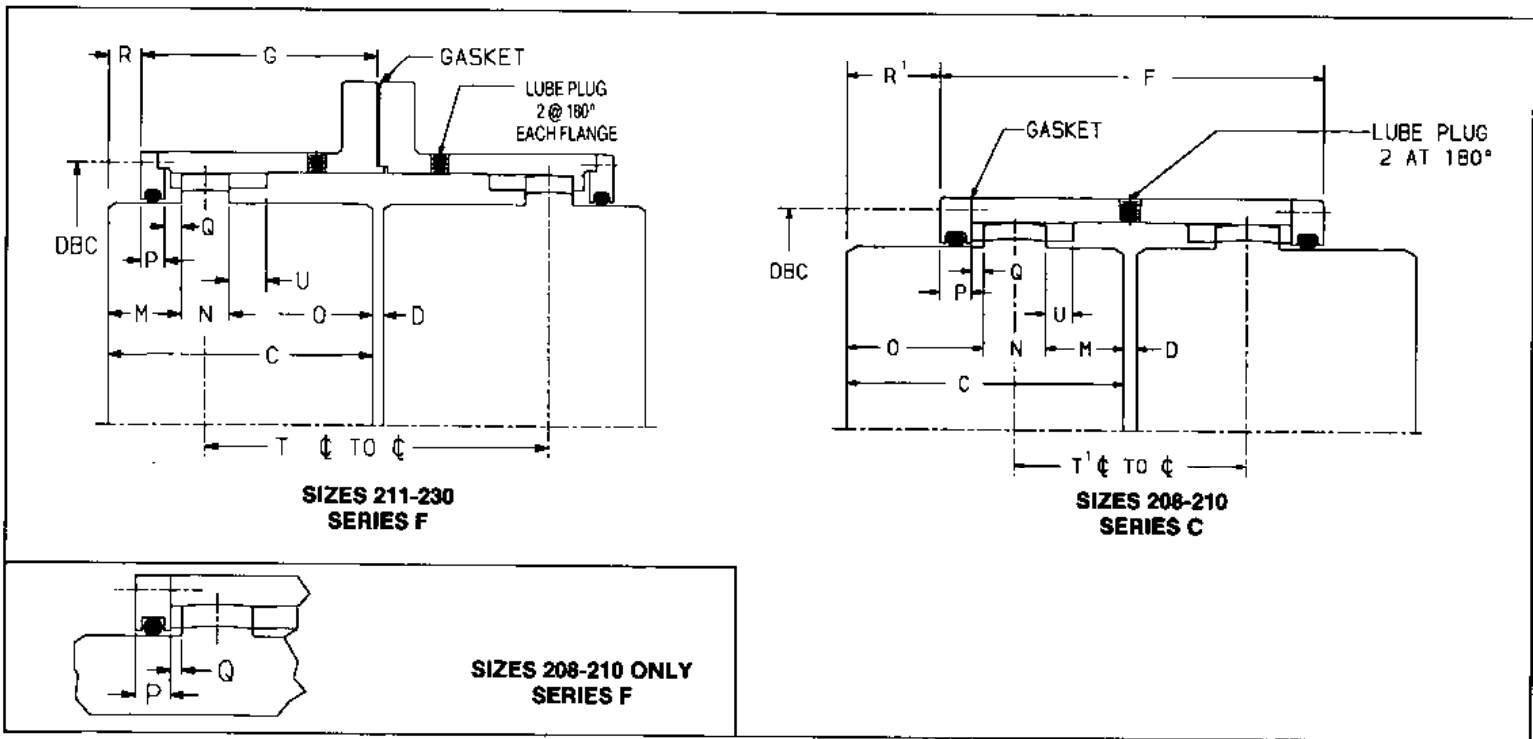
Flexible Couplings

Additional Dimensions Series F and C



Size	SERIES F												SERIES C			
	C	D	M	N	O	P	Q	R	S	T	U	Lube Plug Size and Thread NPTF	R'	T'	V	Lube Plug Size and Thread NPTF
F200	1.06	.12	.53	.31	.22	.31	.03	.19	.92	.88	.44	1/16 - 27	—	—	—	—
C200	1.06	.12	.22	.31	.53	.31	.03	—	—	—	—	—	—	.88	2.25	—
201	1.38	.12	.45	.38	.55	.31	.05	.09	1.33	1.59	.24	1/16 - 27	—	1.41	2.88	—
201¼	1.69	.12	.47	.38	.84	.31	.06	.09	1.64	2.19	.50	1/16 - 27	.28	1.44	2.94	1/16 - 27
201½	1.94	.12	.62	.53	.78	.31	.08	.23	1.77	2.22	.28	1/8 - 27	.22	1.89	3.56	1/8 - 27
202	2.44	.12	.69	.62	1.12	.38	.08	.23	2.27	3.00	.62	1/8 - 27	.47	2.12	4.06	1/8 - 27
202½	3.03	.19	.80	.75	1.48	.38	.09	.31	2.81	3.91	.89	1/4 - 18	.81	2.54	4.62	1/8 - 27
203	3.59	.19	.97	.88	1.75	.56	.11	.30	3.39	4.56	1.16	1/4 - 18	.89	3.01	5.59	1/8 - 27
203¼	4.19	.25	1.09	1.00	2.09	.56	.12	.41	3.91	5.44	1.41	1/4 - 18	1.10	3.43	6.43	1/8 - 27
204	4.75	.25	1.19	1.12	2.44	.62	.14	.41	4.46	6.25	1.75	1/4 - 18	1.35	3.75	7.06	1/8 - 27
204½	5.31	.31	1.27	1.25	2.80	.62	.16	.48	4.98	7.16	1.80	1/4 - 18	1.68	4.10	7.58	1/4 - 18
205	6.03	.31	1.33	1.38	3.33	.62	.19	.52	5.67	8.34	2.23	1/4 - 18	2.18	4.35	8.01	1/4 - 18
205½	6.62	.31	1.34	1.50	3.78	.62	.19	.53	6.25	9.38	2.72	1/4 - 18	2.64	4.49	8.28	1/4 - 18
206	7.41	.31	1.50	1.62	4.28	.62	.22	.67	6.89	10.50	2.94	1/4 - 18	3.11	4.93	8.91	1/4 - 18
207	8.69	.38	2.00	1.75	4.94	.62	.31	1.06	7.81	12.00	3.09	1/4 - 18	3.66	6.13	10.44	1/4 - 18

Additional Dimensions Series F and C



Size	C	D	M	N	O	P	Q	U	D.B.C.	SEAL RETAINER		SERIES F			SERIES C		
										No.	Size	G	R	T	F	R'	T'
208	9.75	.38	2.78	1.75	5.22	.88	.34	2.81	17.72	20	3/8-16	8.36	1.56	12.56	11.88	4.00	7.69
209	10.75	.50	3.09	2.00	5.66	.88	.41	3.06	19.81	24	3/8-16	9.19	1.81	13.81	13.25	4.38	8.68
210	12.00	.50	3.53	2.12	6.34	.88	.41	3.25	21.50	16	1/2-13	10.00	2.25	15.31	14.38	5.06	9.68
211	13.00	.50	3.81	2.38	6.81	1.00	.44	.75	23.75	16	1/2-13	10.88	2.38	16.50	—	—	—
212	14.00	.50	4.19	2.62	7.19	1.00	.50	.94	25.75	18	1/2-13	11.56	2.69	17.50	—	—	—
213	15.00	.75	4.44	2.88	7.69	1.00	.50	1.19	27.75	18	1/2-13	12.44	2.94	19.00	—	—	—
214	16.00	.75	4.81	3.12	8.06	1.00	.50	1.19	29.75	18	1/2-13	13.06	3.31	20.00	—	—	—
215	17.00	.75	5.25	3.25	8.50	1.00	.57	1.25	31.75	20	1/2-13	13.69	3.69	21.00	—	—	—
216	18.00	1.00	9.06	3.38	5.56	1.31	.59	1.38	34.25	20	3/4-10	11.31	7.19	15.50	—	—	—
218	20.00	1.00	11.00	3.50	5.50	1.31	.66	1.50	38.25	24	3/4-10	11.44	9.06	15.50	—	—	—
220	22.00	1.00	12.94	3.62	5.44	1.31	.72	1.50	42.25	24	3/4-10	11.56	10.94	15.50	—	—	—
222	24.00	1.00	14.88	3.75	5.38	1.38	.75	1.56	46.50	30	3/4-10	11.72	12.78	15.50	—	—	—
224	28.00	1.00	16.75	4.00	5.25	1.38	.78	1.56	50.50	30	3/4-10	11.88	14.62	15.50	—	—	—
226	28.00	1.00	18.50	4.50	5.00	1.38	.84	1.75	55.50	36	3/4-10	12.19	16.31	15.50	—	—	—
228	30.00	1.00	20.25	5.00	4.75	1.38	1.06	2.00	59.50	36	3/4-10	12.69	17.81	15.50	—	—	—
230	32.00	1.00	22.25	5.00	4.75	1.38	1.06	2.00	63.50	36	3/4-10	12.69	19.81	15.50	—	—	—

Amerigear 200 Series

Flexible Couplings

Alignment and Installation Instructions

Purpose: The purpose of aligning equipment is to avoid transmission of unwanted stresses to bearings, shafts, couplings, etc.

How: By providing minimum angularity and offset of shaft axis at normal operating conditions (Figs. 1 and 2).

Why: To increase life of bearings, couplings, shafts and seals. To get at the root of serious malfunctions involving shutdowns and costly repairs.

When:

1. During installation, before grouting.
2. Immediately after initial operation.
3. When final operating conditions and final temperature are attained.
4. Seasonally.
5. Whenever first symptoms of trouble occur — vibration, undue noise, sudden overheating of bearings.

Practical Considerations:

1. Verify shaft separation.
2. Locate rotor in running position (for example, on sleeve bearing motors).
3. Anticipate thermal changes.
4. Read instructions and review drawings.

Tools:

1. Dial indicator with attaching device.
2. Feeler gauges.
3. Inside micrometer.
4. Outside micrometer.
5. Snap gauges.
6. Straightedge.

Angular Misalignment Measurement:

1. Measure at 4 points the space between the shaft ends (Fig. 3).
2. Rotate both shafts 180° and repeat.
3. Perform calculations for angle.

Offset Misalignment Measurement:

1. Rotate shaft A (with dial indicator mounted) and note readings of shaft B offset (Fig. 4).
2. Or use straightedge and feeler gauge (Fig. 5).

CAUTION: Misalignment at installation should not exceed 1/3 of rated catalog misalignment.

CAUTION: Rotating equipment is potentially dangerous and could cause injury or damage if not properly protected. Follow applicable codes and regulations.

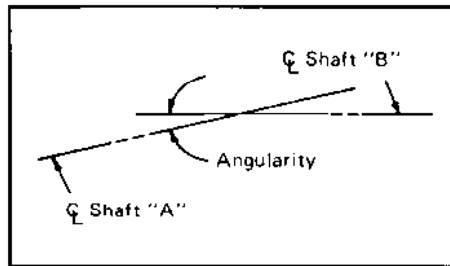


Figure 1 — Angularity is the acute angle formed at the intersection of the axes of the driving and the driven machine shafts. When shafts are exactly parallel, angular misalignment is zero; but vertical or horizontal displacement of axes may be present (See Fig. 2).

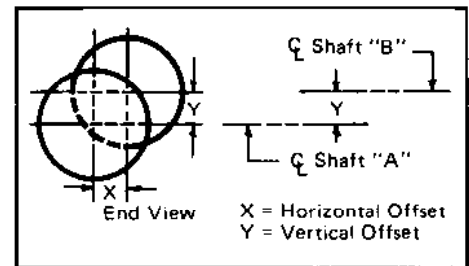


Figure 2 — Concentric alignment (also called offset alignment or parallel offset) is the relationship between the shaft axes in terms of vertical and horizontal displacements of the axis of one shaft from the axis of the other shaft.

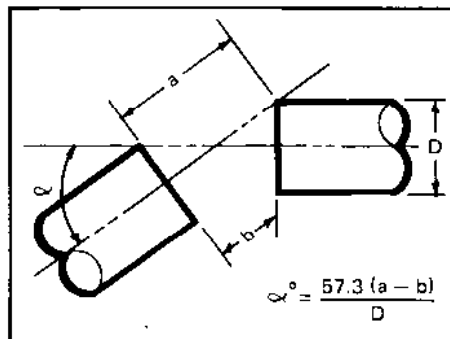


Figure 3 — To determine relative angular shaft-positions of driving and driven machines, measure at four points the space between the shaft ends. Choose the largest (a) and smallest dimension (b).

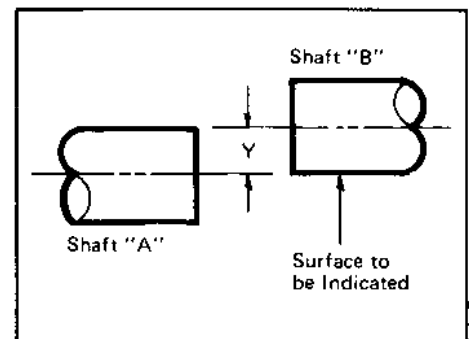


Figure 4 — To measure offsets with a dial indicator, attach the indicator to shaft "A," rotate shaft, and indicate to the periphery of shaft "B." To obtain actual displacements of shafts, divide dial indicator readings by 2.

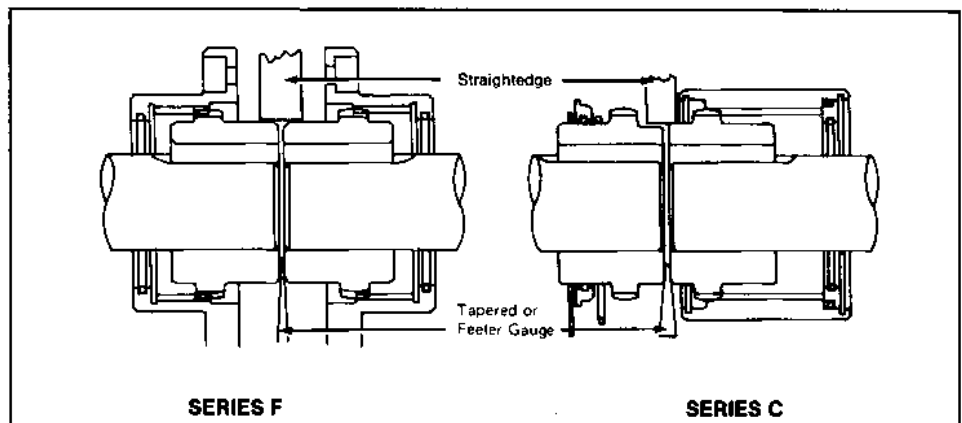
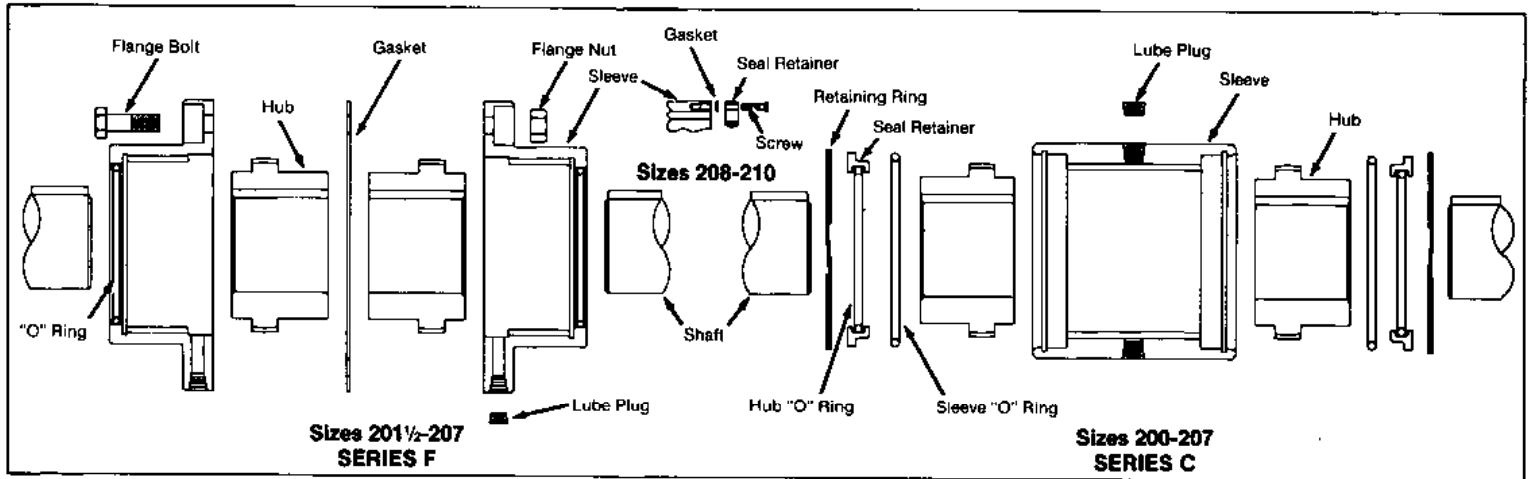


Figure 5 — Lay straightedge on one hub and measure gap between straightedge and other hub with feeler gauge. Measure at top, bottom, and both sides. Feeler gauge readings indicate actual displacements of shafts.

Installation and Lubrication Instructions



Installation

Disassemble coupling and clean all parts. Follow the appropriate 6 steps below and you are ready to go! Installed and lubricated in accordance with the instructions, your Amerigear 200 Series coupling is prepared for a life of dependable, trouble-free service.

Series F Installation

Step 1. Lightly coat grease on "O" rings and insert "O" rings into grooves of sleeve (into grooves of seal retainer for sizes 208 and larger). Place sleeves for sizes 200-207 over shaft ends. For sizes 208 and larger, place only the seal retainers with "O" rings inserted, on shaft. Care should be taken not to damage seal on shaft key seat.

Step 2. Check key fits and coat keys and keyways with oil resistant sealing compound (Permatex No. 2) to prevent leakage. Install size 201 to 207 hubs on shafts with long ends flush with shaft ends. Install size 200 hub on shaft with short end flush with shaft end. For shrink fits, apply heat to hubs uniformly, preferably submerged in oil not exceeding 350°F. Do not allow "O" ring seals to contact heated hubs.

CAUTION: Care must be taken to avoid personal injury in the heating and handling of coupling hubs that are shrink fit shaft mounted.

For sizes 208 and larger, place retainer gaskets and sleeves over hubs and onto shafts.

Step 3. Align shafts allowing clearance as per tabulation or in accordance with Dimension "D" from Engineering Data. Check gap with taper or feeler gauge at 90° points and align hubs with straightedge at 90° points.

Step 4. After thoroughly coating hub and sleeve teeth with lubricant, slip sleeves onto

hubs, carefully engaging teeth (do not damage seal surface). Place sleeve gasket between sleeves and align bolt holes.

Step 5. Secure sleeves, using care to tighten fasteners uniformly. See tabulation "Flange Bolt Tightening Torque." For sizes 208 and larger, bolt seal retainers to sleeves.

Step 6. Remove both Dryseal lube plugs and add grease in the amount given in the Lubricant Quantity Table. Install lube plugs using Permatex No. 2 for sealing and seat securely.

Series C Installation

Step 1. For sizes 200-207 place retainer ring, seal retainer with "O" ring seated in retainer groove, and sleeve "O" ring on each shaft. For sizes 208 and larger, place seal retainer with "O" ring inserted, and gasket over shaft. For CS Series, place retainer ring on shaft on which CS rigid hub will be mounted.

Step 2. Check key fits and coat keys and keyways with oil resistant compound to prevent leakage. Install hubs on shafts with short ends flush with shaft ends. For shrink fits, apply heat to hubs uniformly, preferably submerged in oil not exceeding 350°F. Do not allow "O" rings to contact heated hubs.

CAUTION: Care must be taken to avoid personal injury in the heating and handling of coupling hubs that are shrink fit shaft mounted.

Step 3. Slip sleeve over hub mounted on longest shaft.

Step 4. Align shafts allowing clearance as per tabulation or from Engineering Data, Dimension "D." Check gap with taper or feeler gauge at 90° intervals. Also align hubs with straightedge at 90° points.

Step 5. Pack hub and sleeve teeth with grease. Force grease into shaft gap. Lightly coat grease on "O" rings. Slide sleeve over hubs to center position. Remove Dryseal lube plugs and add grease in the amount given in the Lubricant Quantity Table.

Step 6. For sizes 200-207, install sleeve "O" rings in sleeve counterbores — then press seal retainer assembly in place. Use fingertips or blunt tool. Seat retaining rings in grooves using a winding motion. Recheck to assure retaining rings are positively seated. For sizes 208 and larger, bolt seal end plates to sleeves.

SIZE	HUB SEPARATION			FLANGE BOLT TIGHTENING TORQUE FT. LBS.*	
	F & C	FS	CS	F Exposed	F Shrouded
200	.125	.078	.125	10	10
201	.125	.078	.125	10	10
201½	.125	.078	.125	10	10
201½	.125	.156	.125	29	32
202	.125	.156	.125	63	32
202½	.188	.188	.188	125	69
203	.188	.188	.188	125	69
203½	.250	.219	.250	210	133
204	.250	.312	.250	210	133
204½	.312	.344	.312	210	133
205	.312	.344	.312	313	232
205½	.312	.344	.312	313	232
206	.312	.406	.312	313	340
207	.375	.500	.375	440	476
208	.375	.500	—	600	—
209	.500	.562	—	800	—
210	.500	.625	—	1,200	—

*Tightening torque based on unlubricated threads; if threads are lubricated derate torque to 75% of above values.

Amerigear 200 Series

Flexible Couplings

Maintenance and Lubrication

LUBRICANTS

LUBRICANT MANUFACTURER	GENERAL	MOIST/WET	HIGH TORQUE	150° - 300°F	CLASS III*
American Lubricants Co.	Alubco Bison 1650	Same	Same	Same	Same
Amoco Oil Co.	Amoco CPLG Grease or Amolith #2	Amoco CPLG Grease or Amolith #2	Amoco CPLG Grease or Amolith #2	Rykon EP-2	Amoco CPLG Grease
Atlantic Richfield Co.	Litholene HEP 2	Litholene HEP 2	Same	Caldron EP-2	Caldron EP-2 or Pennant NL 220
Brooks Technology	Superplex or Benalene 350	Superplex or Benalene 350	Superplex or Benalene 350	Superplex or Benalene 350	Superplex Extra Light or Gearguard 460
Chevron, Inc.	Duralith EP-2 NLGI 2	Duralith EP-2 NLGI 2	Duralith EP-2 NLGI 2	Duralith EP-2 NLGI 2	Gear Compound EP ISO 460
Citgo Petroleum Corp.	Premium Lithium EP-2	Premium Lithium EP-2	Premium Lithium EP-2	Premium Lithium EP-2	AP or EP Compound 460
Exxon Co.	Pen-O-Led EP Grease	Rolubricant EP-300	Rolubricant EP-300	Unirex N2	Terestic 460
Far Best Corp.	Molyvis ST-200	Same	Same	Same	Same
Fiske Bros. Refining Co.	Lubriplate 630AA	Lubriplate 630AA	Lubriplate 630AA	Lubriplate 1200-2	Lubriplate No. 8
Huls America, Inc.	Anderol 786	Same	Same	Same	Same
Kendall Refining Co.	L-424 or All Purpose W/Moly L1-2M	L-424 or All Purpose W/Moly L1-2M	---	L-424 or All Purpose W/Moly L1-2M	Super Blu L-427
Mobil Oil Co.	Mobilux EP-111	Mobilux EP-111	Mobilux EP-111	Mobil Temp 78	Mobilgrease 29
Pennzoil Co.	Pennlith EP 711 or Pennlith EP 712	EP 711 or EP 712	EP 711 or EP 712	Pennzoil 707L or Pennlith EP 712	Maxol EP 460 or Pennzgear 460
Sun Refining Co.	Sunaplex 991 EP or Prestige 741 EP	Same	Same	Same	---
Syn-Tech, Inc.	3913-G1	3913-G1	3913-G1	3913-G1	3913-G
Texaco, Inc.	Multifak EP-2	Multifak EP-2	Multifak EP-2	Thermatex EP-2	---
UNOCAL 76	UNOBA EP-2	UNOBA EP-2	UNOBA EP-2	UNOBA EP-2	MP Gear Lube LS 85W/140

For low temp. (-65°), Aeroshell #22 by Shell Oil Co., Anderol 793 by Huls America, Inc. For low speeds, lubricant manufacturer should be consulted.

LUBRICANT QUANTITIES

Coupling Size	LUBRICATION			
	SERIES F*		SERIES C	
	Wt. Lbs.	Vol. Qts.	Wt. Lbs.	Vol. Qts.
200	.020	.010	.015	.008
201	.045	.025	.036	.020
201½	.060	.033	.045	.025
202	.140	.070	.080	.040
202½	.200	.110	.080	.040
203	.380	.200	.160	.090
203½	.540	.290	.240	.120
204	.820	.430	.240	.120
204½	1.080	.580	.440	.240
205	1.540	.820	.540	.290
205½	2.580	1.380	1.000	.530
206	3.120	1.660	1.120	.590
206½	3.480	1.860	1.020	.540
207	7.040	3.760	2.700	1.440
208	9.160	4.840	5.580	2.970
209	11.700	6.240	7.620	4.060
210	14.140	7.540	9.500	5.050

Maintenance — The Amerigear Coupling requires a minimum of maintenance. Nevertheless, to ensure a trouble-free life a few checks and proper lubrication should be performed at regular intervals.

Ameridrives suggests that the maximum interval between checks and relube be one year. This is only a guide, and the actual interval should be in accordance with good operating practices for application.

To disassemble Series F remove flange fasteners, separate sleeves, slide sleeves over hubs, clean out old lubricant, and inspect seals and gear teeth. Reassemble, starting with Step 3 under Series F installation instructions on the previous page.

To disassemble Series C, remove one snap ring, slide sleeves off hubs, clean out old lubricant and inspect seals and gear teeth. Reassemble, starting at Step No. 4 under Series C installation instructions on the previous page.

If proper alignment of shafts is assured and it is not practical to disassemble coupling, remove both lube plugs and add grease in sufficient amount to overflow with lubricant holes in horizontal position. Recommended lubricants and quantities are listed on this page.

NOTE: Sizes 200 and 201 Series C are supplied without lube plugs — lubricate per Series C, Step No. 5

The lubricants listed above are recommended by the lubricant manufacturers for the indicated conditions. Those shaded are reported by lubricant manufacturers to comply with the intent of AGMA 9001. This list is solely for our customers' convenience and does not constitute an endorsement. The listing is not intended to be complete nor necessarily current due to continuous research and improvement by the various manufacturers.

Series F, FM, FA, FE use quantities recommended. For FE, apply one-half in one end and one-half in other end. Series FS, FMS, FAS use one-half the quantities recommended.

Series C, CM, CA use quantities as shown. Series CS, CMS, CAS use one-half the quantities recommended.

*Series F, Class III use quantities as recommended for Series F but limited to the greases shown in Class III column above or the following oils:

Citgo EP Compound 460 by Citgo Corp.; Terestic 460 by Exxon; Lubriplate No. 8 by Fiske Bros.

American®

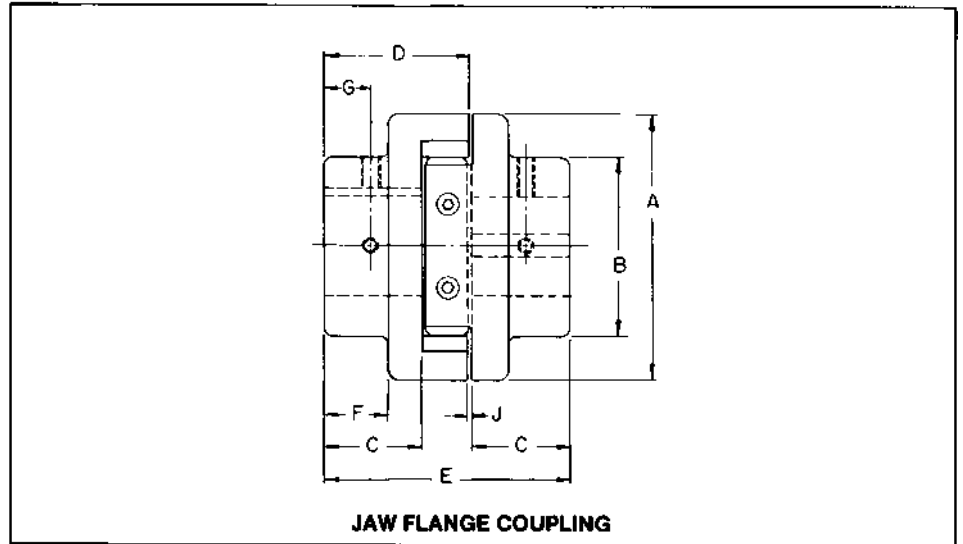
Flexible Couplings

Jaw Flange Couplings Sizes 3-13

American

Application: Meets requirements of standard medium duty applications for shaft sizes up to 3". Compensates for all three types of misalignments and is particularly suitable for vertical or blind assembly installation.

Description: The American coupling consists of three basic parts — two identical jaw flanges and a floating center member. The jaw flanges are positioned at right angles to each other and engage opposite parallel surfaces of the center member as shown by the cutaway view on page 5. American flexible couplings are normally furnished bored for a clearance or push fit on the shafts as specified, and with a standard keyway (when specified) in each bore and two setscrews for each hub. (Sizes 3, 4, and 6 have one setscrew.)



Cplg. Size	Nominal Max. Bore In.	Absolute Max. Bore* In.	Max. Distance Bottom of Keyway to Bore Axis* In.	Max. Speed RPM	Load Capacity HP Per 100 RPM	Parallel Offset Capacity In.	DIMENSIONS									Weights (Lbs.) Solid Cplg.
							A	B	C	D	E	F	G	H**	J	
3	.50	.50	.34	3,600	.05	.031	1.62	1.00	.75	1.25	2.03	.56	.37	—	.03	.48
4	.75	.75	.50	3,600	.09	.062	1.87	1.37	.75	1.25	2.03	.53	.37	—	.03	.70
6	1.00	1.00	.62	3,600	.16	.062	2.62	1.87	1.12	1.75	2.91	.76	.50	—	.03	1.80
8	1.25	1.37	.87	6,300	2.20	.094	3.00	2.37	1.37	2.12	3.56	.87	.50	1.25	.06	6.00
8½	1.37	1.62	1.00	5,300	4.20	.094	3.75	2.62	1.50	2.37	3.94	.87	.50	1.50	.06	9.80
9	1.75	2.00	1.25	5,000	6.00	.094	4.12	3.12	1.75	2.75	4.56	1.00	.62	1.56	.06	14.20
10	2.00	2.25	1.37	4,160	10.80	.156	5.25	3.62	2.25	3.37	5.69	1.37	1.00	2.12	.06	15.50
11	2.25	2.50	1.56	3,670	14.00	.156	6.00	4.12	2.50	3.75	6.31	1.50	1.00	1.94	.06	37.00
12	2.62	3.00	1.75	2,770	21.00	.281	7.50	4.87	2.75	4.25	7.06	1.62	1.00	2.75	.06	64.00
13	3.12	3.62	2.12	2,250	30.00	.281	9.00	5.75	3.00	4.75	7.81	1.75	1.25	3.50	.06	115.00

*ABSOLUTE MAXIMUM BORE MAY BE USED PROVIDING THE MAXIMUM DISTANCE, BOTTOM OF KEYWAY TO BORE AXIS, IS NOT EXCEEDED.

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