SHAFT COUPLINGS

INSERT (3-JAW) TYPE — *FC SERIES*

PRECISION MACHINED BORED OR SOLID HUBS
THREE TYPES OF INSERTS for different service requirements.
NO LUBRICATION NEEDED
BORE SIZES FROM 3/8" TO 2-1/8"
COMPLETE WITH KEYWAY AND SETSCREW

COUPLING INSERTS

OIL-IMPREGNATED BOST-BRONZ—Recommended for high torque loads, particularly at slower speeds.

OIL-RESISTANT SYNTHETIC RUBBER—Recommended where quietness is desired, particularly at motor speeds.

POLYURETHANE—Recommended where moderate to heavy shock loads are encountered.

LOAD DATA

HORSEPOWER AND TORQUE RATING AT RECOMMENDED SPEEDS FOR INSERTS INDICATED

Coupling Size	Shaft Diameter Range	Maximum Horsepower Rating at RPM of *								Max. Torque (Lb. Ins.)
		50	100	300	690	870	1150	1750	3450	
XFCBB BOST-BRONZ INSERTS										
FC12	3/8–5/8	.16	.32	.95	2.2	2.8	3.6	5.6	—	200
FC15	1/2–7/8	.40	.79	2.4	5.5	6.9	9.1	13.9	—	500
FC20	1/2–1-1/8	.79	1.6	4.8	10.9	13.8	18.2	—	—	1000
FC25	3/4–1-3/8	1.4	2.9	8.6	19.7	24.8	—	—	—	1800
FC30	1–1-5/8	2.5	5.1	15.2	35.0	—	—	—	—	3200
FC38	1-1/4–1-7/8	5.6	11.1	33.3	—	—	—	—	—	7000
FC45	1-3/4–-2-1/8	8.7	17.5	—	—	—	—	—	—	11000
XFCR RUBBER INSERTS										
FC12	3/8–5/8	—	.10	.31	.71	.90	1.2	1.8	3.6	65
FC15	1/2–7/8	—	.20	.60	1.4	1.7	2.3	3.5	6.8	125
FC20	1/2–1-1/8	—	.40	1.2	2.7	3.5	4.6	6.9	13.7	250
FC25	3/4–1-3/8	—	.71	2.1	4.9	6.2	8.2	12.5	24.6	450
FC30	1–1-5/8	—	1.3	3.8	8.8	11.0	14.6	22.2	43.8	800
FC38	1-1/4–1-7/8	—	2.5	7.6	17.5	22.1	29.2	44.4	—	1600
FC45	1-3/4–2-1/8	—	4.4	13.3	30.7	38.7	51.1	77.7	—	2800
XFCA POLYURETHANE INSERTS										
FC12	3/8–5/8	.09	.19	.56	1.2	1.6	2.0	3.0	5.7	125
FC15	1/2–7/8	.18	.37	1.1	2.5	3.1	4.0	6.0	11.3	250
FC20	1/2–1-1/8	.35	.70	2.1	4.6	5.7	7.5	11.1	20.7	470
FC25	3/4–1-3/8	.62	1.2	3.7	8.1	10.1	13.1	19.3	35.8	845
FC30	1–1-5/8	1.1	2.2	6.5	14.4	17.9	23.3	34.3	63.6	1500
FC38	1-1/4–1-7/8	2.2	4.3	12.9	28.4	35.3	45.8	67.3	—	3000
FC45	1-3/4–2-1/8	3.7	7.5	22.4	49.2	61.0	79.0	115.9	—	5250

*For Uniform Load.

SELECTION PROCEDURE

1. From Table select Service Factor.
2. Determine Design Load

   Design HP = Application HP x S.F.
   or
   Design Torque = Application Torque x S.F.
3. Select coupling size from Load Rating Table which has a rating equal to or greater than the design load.

COUPLING SERVICE FACTORS

Load Classification	Service Factor
Uniform	1.00
Moderate Shock	1.75
Heavy Shock	2.50

$$HP = \frac{T \times RPM}{63{,}025}$$