


INTER PLANT STANDARD – STEEL INDUSTRY		
 IPSS	<b>SPECIFICATION FOR GEAR TYPE            FLEXIBLE COUPLINGS FOR STANDARD            DC MOTORS</b>	<b>IPSS: 1-01-021-18            (First Revision)</b>
	<i>Corresponding IS does not exist</i>	<b>Formerly-:            IPSS: 1-01-021-95</b>

## 0. FOREWORD

0.1 This Inter Plant Standard prepared by the Standards Committee on Mechanical Drives, IPSS 1:1, with the active participation of the representatives of all the steel plants and established manufacturers of gear type flexible couplings for standard dc motors, was adopted in December, 1995. Thereafter, this standard revised with first revision in **November, 2018**.

## 1. SCOPE

1.1 This standard specifies the requirements and dimension of gear type flexile couplings for use on standard dc Motors conforming to:

- A) AISE Standards
- B) IPSS Standards

## 2. SELECTION

2.1 IPSS: 1-01-007-18 Code of Practice for Selection of Couplings (first revision) shall be followed.

## 3. MATERIAL

3.1 The half casings and toothed hubs shall be made of steel 45c8 of IS: 2004-1991 Carbon steel forgings for general engineering purposes (third revision) or equivalent. The tooth shall be hardened to a hardness of 240 - 280 BHN.

## 4. DIMENSIONS

4.1 The dimensions of the couplings shall be as given in Table–1 read with Fig. 1.

## 5. DESIGNATION

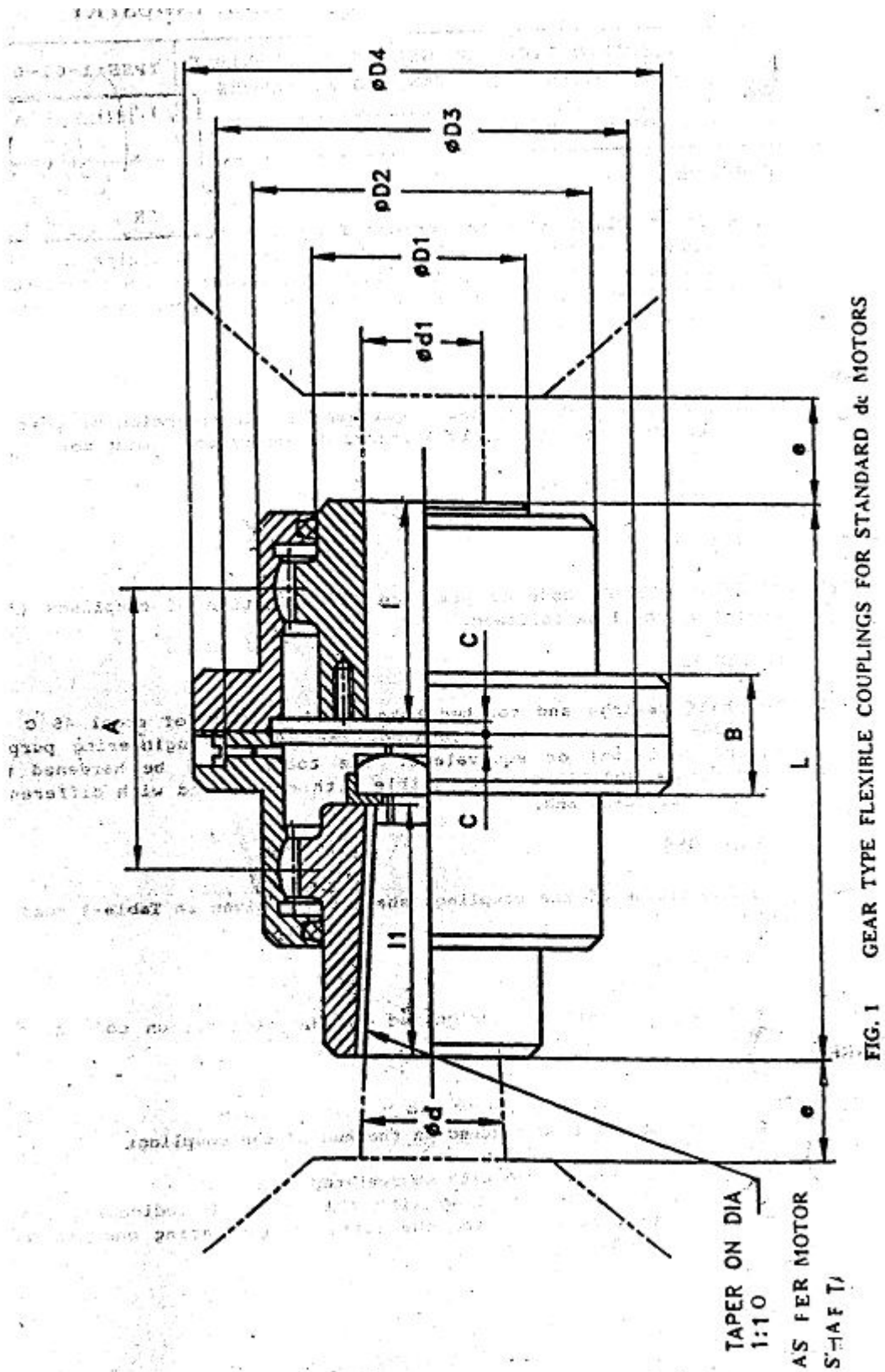
5.1 The coupling shall be designated by the designation code given in Table1.

## 6. MARKING

6.1 The following shall be punched on the hub of the coupling:

- a) Manufacturer’s logo with abbreviated name,

- b) Designation of coupling with the letter P indicating one hub having pilot bore, and the letter T indicating one hub having taper bore.



**TABLE 1**  
(Clause 4)  
**DIMENSIONS OF THE COUPLING**  
(All dimensions in mm)

Designation See Note	MOTOR FRAME NO	A	B	C	PILOT BORE mm	d	d <sub>1</sub>	e	d <sub>2</sub>	D <sub>1</sub>	D <sub>2</sub>	D <sub>3</sub>	D <sub>4</sub>	L	BOLT SIZE	NO	L	K W/ 100 r.p.m.	MAX r.p.m.	GD <sup>2</sup> kg/m <sup>2</sup>	QTY OF OIL LITRES	MASS Kg (Approx)
GCM 185	602/802	75	34	2.5	25	44.45	50	25	80	125	155	185	70	75	13	6	175	14.6	5000	0.21	0.50	15.1
	A, B & C																					
GCM 220	603/803	95	40	2.5	25	50.8	60	25	96	150	188	220	85	85	17	6	205	32.8	4000	0.42	0.75	21.5
GCM 250	606/806	125	40	2.5	40	63.5	75	25	115	175	215	250	105	100	17	8	240	58.37	3350	0.85	1.50	38.75
GCM 250	608/808	125	40	2.5	40	76.2	75	25	115	175	215	250	105	115	17	8	251	58.37	3350	0.85	1.50	38.35
GCM 290	610/810	145	50	5	45	82.55	90	28	135	200	245	290	115	110	21	8	274	83.4	2800	1.80	2.00	58.35
GCM 290	612/812	145	50	5	45	93.08	90	28	135	200	245	290	115	125	21	8	291	83.4	2800	1.80	2.00	57.85
GCM 320	614/814	160	50	5	60	107.96	105	28	160	230	273	320	125	125	21	8	294	122.99	2500	2.80	2.50	71.25
GCM 350	616/816	185	50	5	75	117.48	120	30	180	260	305	350	140	140	21	10	335	198.06	2120	4.60	3.00	96.00
GCM 380	618/818	210	50	5	90	127.0	140	30	220	290	335	380	160	150	21	12	356	245.97	1900	8.00	4.00	123.90

NOTE: GCM stands for gear coupling for motor. Then mention the dia meter dia.