



Laminate Cross-Reference Chart & Governmental Agencies Specifications

NEMA Grade	Military Spec.	Military Spec. Type	JAN-P-13 Type LTS	Navy 17-P-5 Type	Army 71-484 Type	ASTM (D-709) Type	MIL-I-24768	Federal Spec. L-L-31 (Formerly HHP-256)		AAF Spec 12032	Grade Description
								Type	Grade		
-	-	PMB	M-1	PBM	I	I	/12	I	X	-	Paper Filler-Hard Phenolic Resin
X	MIL-P6885 (Formerly AN-P-68)	I (Cross Laminated) II (Parallel Laminated)	M-2	PBM-1	I	I	-	I	X	-	
P XPC	- -	PMB-P PBM-PC	E-1 -	PBP -	- -	I-1 I	/19 /20	I I	P PC	- -	Paper Filler- Plasticized Phenolic Resin Paper Filler- Elasticized Phenolic Resin
XX	MIL-P-3115	PBG	E-2	PBG	I	I	/11	I	XX	-	Paper Filler-Hard Phenolic Resin
XXP	-	PBM-P	E-3	-	-	I-2	/21	I	XXP	-	Paper Filler- Plasticized Phenolic Resin-For Hot Punching
XXX	MIL-P-3115	PBE	E-4	PBE	I	I-4	/10	I	XXX	-	Paper Filler-Hard Phenolic Resin
FR-2	-	PBE-PCF	-	-	-	-	/25	-	-	-	Paper Filler- Plasticized Phenolic Resin-For Hot Punching
XXXP	-	-	-	-	-	-	-	-	-	-	
XXXP-C	MIL-P-3115	PBE-P	E-5	PBE	-	I-3	/22 /23	I	XXXP	-	
C	MIL-P-15035 MIL-P-55072*	FBM	M-4	FBM	II	II	/16	II	C	-	Medium Weight Cotton Fabric Filler-Hard Phenolic Resin
CE	MIL-P-15035	FBG	EM-1	FBG	II	II-5	/14	II	CE	-	Medium Weight Cotton Fabric Filler-Hard Phenolic Resin With Graphite Inclusion
-	MIL-P-5431	-	-	-	-	-	-	-	-	CG	
L	MIL-P-15035	FBI	M-3	FBI	II	II	/15	II	L	-	Fine Weave Cotton Fabric Filler-Hard Phenolic Resin
LE	MIL-P-15035	FBE	EM-2	FBE	II	II-5	/13	II	LE	-	
-	MIL-P-5431	-	-	-	-	-	-	-	-	LG	Fine Weave Cotton Fabric Filler-Hard Phenolic Resin With Graphite Inclusion
A	MIL-P-8059 (USAF)	PBA	H-1	PBH	-	III	-	III	A	-	Asbestos Paper Filler-Hard Phenolic Resin
AA	MIL-P-8059 (USAF)	FBA	MH-1	FBH	-	III	-	III	AA	-	Asbestos Paper Filler-Hard Phenolic Resin
-	-	-	M-5	GBM GBH	-	IV	-	IV	-	-	Staple Fibre Glass Cloth Filler-Melamine Resin
G-3	-	GPG	-	-	-	-	/18	IV	G-3	-	Glass Cloth Filler Phenolic Resin
G-5 G-7	MIL-P-15037 MIL-P-997	GMG GSG	MG-1 -	GMG GSG	- -	IV IV	/8 /17	IV IV	G-5 G-7	- -	Continuous Filament Glass Cloth Filler-Melamine Resin Continuous Filament Glass Cloth Filler-Silicone Resin
G-9	MIL-P-15037	GME	-	-	-	IV	/1	IV	-	-	Glass Cloth Filler Melamine Resin
G-10	MIL-P-18177	GEE	-	-	-	IV	/2	-	-	-	Continuous Filament Glass Cloth Filler-Epoxy Resin
G-11 FR-4	MIL-P-18177 -	GEB GEE-F	- -	- -	- -	IV IV	/3 /27	- IV	- -	- -	Continuous Filament Glass Cloth Filler-Epoxy Resin Glass Cloth Filler Epoxy FR Resin
FR-4	-	GEB-F	-	-	-	IV	/28	IV	-	-	Glass Cloth Filler Epoxy FR Resin
N-1	MIL-P-15047	NPG	-	-	-	V	/9	V	N-1	-	Nylon Fabric Filler-Phenolic Resin
-	MIL-P-14	CFI-20	-	-	III	-	-	III	-	-	Chopped Medium Weight Cotton Fabric-Hard Phenolic Resin
-	MIL-P-13949	PP	-	-	-	-	-	-	-	-	Grade XXXP Copper Clad
CPF	MIL-P-8655	-	-	-	-	-	-	-	-	-	Med. Weight Cotton Fabric Filler-Post Forming Phenolic Resin
FR-3	MIL-P-22324	PEE	-	-	-	-	/26	-	-	-	Paper Filler-Flame Retardent Epoxy Resin