

TYNEP® – Thermoplastic – Polyester

STANDARD GRADES

- **P3050** - PST, Unreinforced, medium flow
- **P4300** - PBT, 30% glass fiber reinforced
- **P4308** - PST, 30%glass fiber, improved impact
- **P5308** - PBT/PC, 30% glass fiber, alloyed for improved flatness
- **P7408** - PBT, 40% glass/mineral reinforced, improved impact
- **P8150** - PBT/PET, 15% glass fiber. alloyed for improved surface gloss
- **E4450** - PET, 45% glass fiber reinforced
- **E4308** - PET. 30% glass reinforced, improved impact
- **E7350** - PET, 35% glass/mineral reinforced

TYPICAL PROPERTIES*	UNIT	ASTM Test	P3050	P4300	P4308	P5308	P7408	P8150	E4450	E4308	E7350
GENERAL											
Specific Gravity											
Water Absorption; 24 hrs	- %	D792 D570	1.10 0.20	1.15 0.20	1.25 0.20	1.22 0.16	1.10 0.20	1.15 0.20	1.25 0.20	1.22 0.16	1.38 0.08
Mold Shrinkage	10 ³ in/in	D955	5-7	5-7	2-4	6-9	5-7	5-7	2-4	6-9	2-6
Flow											
Cross Flow											



Mechanical											
Tensile Strength at Break											
Elongation @	lb/in ²	D638	7,600	17,000	16,000	15,000	11,000	13,000	27,000	23,000	15,000
Yield	%	D638	200	3.0	2.0	3.0	2.0	3.0	2.0	2.0	2.0
Flexural Strength	lb/in ²	D790	12,000	27,000	25,000	27,000	17,000	19,000	36,000	34,000	22,000
Flexural Modulus	10 ³ lb/in ²	D790	330	1,200	1,000	1,000	1,100	650	1,700	1,200	1,100
Izod Impact (¼") -notched	ft-lbs/in	D256	1.0	1.4	2.4	1.8	1.3	0.6	2.1	1.7	1.2
-un-notched	ft-lbs/in	D256	60	15	14	13	8	5	17.0	11.0	10.0
Electrical											
Dielectric Strength air/.062											
Volumn	V/mil	D149	585	584	680	730	750	600	490	490	530
Resisitivity	ohm-cm	D257	3.0E+16	3.0E+16	7.5E+16	1.0E+15	6.0E+16	6.0E+16	1.0E+15	1.0E+15	1.0E+15
Dielectric Constant @ 1Mhz	-	D150	3.0	3.6	3.5	3.6	4.0	3.5	4.0	3.8	3.9
Dissipation Factor @1Mhz	-	D150	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02



Thermal											
Deflection Temp											
@ 264psi	F	D648	320	410	400	410	410	400	450	440	420
@66 psi	F	D648	125	415	430	340	380	320	480	480	480

*Data measured on natural color specimens.

