

Tecothane® Soft

Type: Clear Grades

Features: Medical Grade Soft Elastomeric TPUs with excellent resilience, recoverability, and chemical resistance. This aromatic polyester hydrocarbon-based TPU is up to 65% bio-sourced.

Process: Extrusion or Injecting Molding

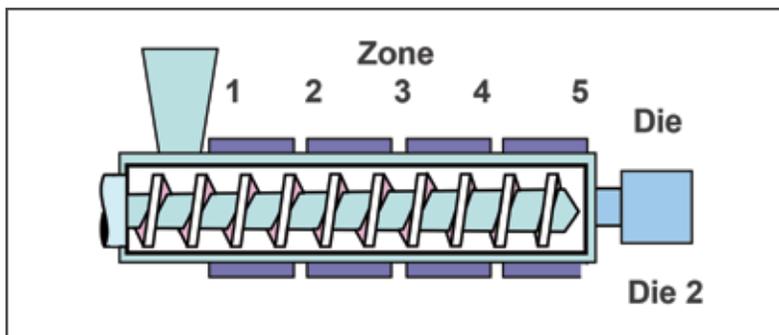
Products & Properties	ASTM Test	AR-75A	AR-85A	AR-95A
Durometer (Shore Hardness)	D785	79A	89A	97A
Specific Gravity	D792	1.03	1.05	1.07
Ultimate Tensile (psi)	D412	2000	3100	4400
Ultimate Elongation (%)	D412	530	400	370
Tensile (psi)				
at 100% Elongation	D412	730	1300	1600
at 200% Elongation	D412	1000	1800	2300
at 300% Elongation	D412	1300	2400	3500
Flexural Modulus (psi)	D790	2500	6700	21000
Vicat Softening Point (°C)	D1525	75	56	62
Mold Shrinkage (in/in) (1"x.25"x6" bar)	D955	0.08	0.05	0.02

Note: These test results are based on small samples of Tecothane® polyurethanes and do not necessarily represent average results from larger test samples. This information should not be used for establishing engineering, manufacturing guidelines or specifications.

Handling Conditions: Properties of all thermoplastic polyurethane products in the molten state are adversely affected by moisture. For best results, always dry the material at least two hours at 80°C (180°F) or overnight at 65°C (150°F) in a machine mounted dehumidifying dryer (a desiccant dryer delivering air at 1 liter/sec/ kg at -40°C dew point (1 cfm/lb at -40°F dew point). A dehumidifying dryer hopper or one shot loader is also recommended. Depending on the applied processing technique, the maximum moisture level should be 0.02%. Never to exceed 500°F (260°C) melt temperature.

Processing Conditions: Tecothane® Soft TPU's can be processed on any conventional extruder or molder.

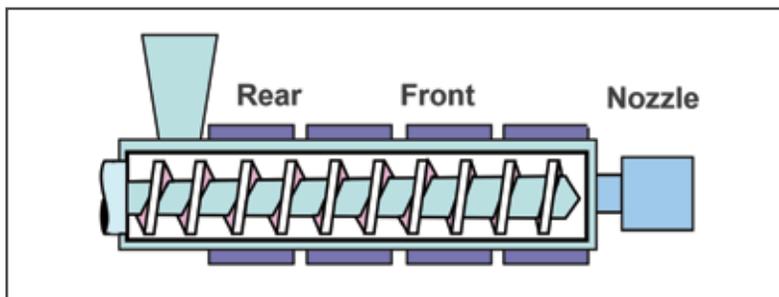
Recommended Starting Extrusion Temperature Profile:



	AR-75A	AR-85A	AR-95A
	°F/°C	°F/°C	°F/°C
Zone 1	390/199	390/199	400/204
Zone 2	400/204	400/204	410/210
Zone 3	410/210	410/210	420/215
Zone 4	410/210	410/210	420/215
Adapter 5	400/204	400/204	410/210
Die	400/204	400/204	410/210

Screen Pack Recommendation: 100/500/250

Recommended Starting Injection Molding Temperature Profile:



	AR-75A	AR-85A	AR-95A
	°F/°C	°F/°C	°F/°C
Rear	365/185	365/185	392/200
Front	365/185	383/195	401/205
Nozzle	365/180	374/190	392/200
Melt	365/185	385/195	400/205
Mold	50-80/10-27	50-80/10-27	50-80/10-27

For further information, refer to Lubrizol Life Science Health processing guides.