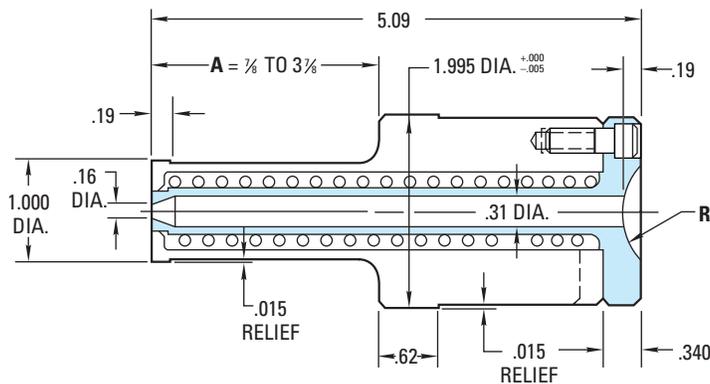


S-Series Straight-Shot™



U.S. Patent No. 4,273,525



NOTE:

The expansion factor must be taken into consideration prior to machining for and installation of the bushing. This factor (BE) must then be added to the A dimension. The formula for determining this expansion factor is as follows:
 $BE = "A" \text{ dimension} \times 0.00000633 \times \text{nozzle set point} - 68^{\circ}\text{F}$ (assuming the mold is at 68°F during operation). If mold temperature is different, substitute 68°F with actual mold temperature.

EXAMPLE:

Given a setpoint of 500°F:
 $BE = 1.375 \times 0.0000063 \times (500 - 68) = .004$ thus $1.375 + .004 = 1.379$.
 Please note that the above information is given as an example. Variations may occur based on mold configuration and cooling factor. In some instances, it may be necessary to obtain an empirical factor.

Larger Shots – Extended Heater Life

DME developed Straight-Shot Hot Sprue Bushings to eliminate sprues, permit larger shots and faster fills, and greatly extend heater life.

The bushings feature an unrestricted “straight-shot” channel to feed the part or runner. Material in the channel is heated by a special helical tubular heater which surrounds the melt stream. This heater distributes heat uniformly throughout the bushing and is virtually impervious to moisture, gases and plastics contamination.

The helical tubular heater (120 or 240 volt) is thermocouple equipped so temperature can be closely controlled using a DME single-zone Closed Loop Temperature Controller.

The Standard S-Series Straight-Shot is designed for direct part gating or for feeding half-round or trapezoidal runners. It is supplied with a .16 diameter gate and no gate land. Available in seven standard shoulder lengths with either a 1/2" or 3/4" spherical radius and 120 or 240 volt heater. The S-Series Straight-Shot can be retrofitted to almost any mold that uses a conventional sprue bushing.

NOTE: 5° heater lead is standard. For 90° lead, add “90” to end of item number (e.g., SSBT4507S190).

R	WITH 120 VOLT HEATER	SHOULDER LENGTH A	WITH 240 VOLT HEATER
	ITEM NUMBER		ITEM NUMBER
1/2	SSBT4507S1	7/8	SSBT4507S2
	SSBT4513S1	1 1/8	SSBT4513S2
	SSBT4517S1	1 1/4	SSBT4517S2
	SSBT4523S1	2 1/8	SSBT4523S2
	SSBT4527S1	2 1/4	SSBT4527S2
	SSBT4533S1	3 1/8	SSBT4533S2
	SSBT4537S1	3 3/8	SSBT4537S2
3/4	SSBT6507S1	7/8	SSBT6507S2
	SSBT6513S1	1 1/8	SSBT6513S2
	SSBT6517S1	1 1/4	SSBT6517S2
	SSBT6523S1	2 1/8	SSBT6523S2
	SSBT6527S1	2 1/4	SSBT6527S2
	SSBT6533S1	3 1/8	SSBT6533S2
	SSBT6537S1	3 3/8	SSBT6537S2

Typical Applications

