



## Standard Operating Procedure for Extrusion

### Ultra Purge™ 5150

### Ready-To-Use Purging Compound with Ultra-X™

#### **Cleaning of Screw and Barrel - Extruder:**

1. We recommend keeping the barrel full of resin when adding Ultra Purge™ in the machine.
2. We recommend removing the finest layer of the screen pack. Make sure that the pressure or torque force remains within safety limits when running Ultra Purge™.
3. Add Ultra Purge™ (approximately 1.5 times the extruder barrel capacity).
4. Extrude at low speed until Ultra Purge™ is ejected from the machine.
5. We recommend letting Ultra Purge™ soak in the barrel for 5 minutes. Allow for a 10-minute soak time for difficult applications.
6. Add the next production resin directly after Ultra Purge™. (In case of material change with different working temperatures, empty the barrel from Ultra Purge™ before adding the next production resin and set the temperatures to the next production settings)
7. Extrude the next production resin at high speed to completely displace Ultra Purge™.
8. If possible, replace the screen pack during this phase.
9. If contamination persists repeat steps.

#### **Cleaning Blow Molding Extruder with Accumulator:**

1. Before starting the purging process, if possible, increase the accumulator temperature of at least 30°C/54°F.
2. The amount of Ultra Purge™ required (kg or lb) equals 7 times accumulator capacity - e.g. 4L accumulator needs 28 kg of Ultra Purge™ ready to use.
3. As soon as Ultra Purge™ is loaded in the machine, set the temperature of the accumulator back to normal production parameters. Please note that on large machines it usually takes more than 1 hour for the temperature to decrease.
4. Load Ultra Purge™ and make shots until Ultra Purge™ is ejected from the die.
5. Reduce the thickness of the parison and adjust accumulator shot size to the maximum allowed settings.
6. Let Ultra Purge™ soak in the barrel and accumulator for 5-10 minutes.
7. Add the next production resin directly after Ultra Purge™.

8. After 4-5 shots with thin parison, increase the parison thickness and make full shots with the production resin to flush away contamination.
9. Set all the parameters to the next production settings. If contamination persists repeat steps.

### **Cleaning for Shut-Down and Start-Up - Extruder:**

#### **SHUT DOWN**

1. We recommend keeping the barrel full of resin when adding Ultra Purge™ in the machine.
2. We recommend removing the finest layer of the screen pack. Make sure that the pressure or torque force remains within the safety limits when running Ultra Purge™.
3. Add Ultra Purge™ (1-barrel capacity).
4. Purge out until the barrel is completely empty. **DO NOT ADD RESIN AFTER ULTRA PURGE™!**
5. Turn off the machine completely (do not leave heaters in "Maintenance/Idle" mode).

#### **START-UP**

1. Turn on the machines to production settings, load half barrel capacity of Ultra Purge™ followed by your production resin and begin normal production.
2. If possible, replace the screen pack during this phase.
3. If contamination persists, follow the standard cleaning procedure. It is normal to see contamination being flushed out on startup.