

Injection Moulding Instructions Moulding through a Hot Runner (Comprehensive (M) Version)

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Grade Selection

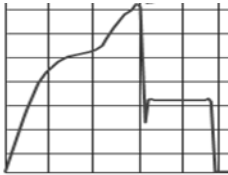
Product	Materials	Instructions
PCP 100	- Polyolefins, TPU's*, TPE's*	- Basic
	- Polyolefins, TPU's*, TPE's*	- Comprehensive (M)
	- POM, PA's*, PBT*, PPO*	- Comprehensive (O)
	- Polyolefins, TPU's*, TPE's*, POM*, PA's*	- Decarbonisation
PCP HMEX	- Antistatic (ESD) Polyolefins, PE100, PE80	- Comprehensive (M)
	- POM, PA's*, low mfi Polyolefins	- Comprehensive (O)
	- Polyolefins, POM, PA's*, PBT*, PPO*	- Decarbonisation
PCP CFT	- ABS, SAN, Polyolefins	- Basic
	- ABS, SAN, Polyolefins	- Comprehensive (M)
PCP CHMEX	- HIPS, GPPS	- Basic
	- HIPS, GPPS	- Comprehensive (M)

***May require re-flushing with commodity polymer due to hydrolysis nature of next material**

Aquapurge products are not intended to be incorporated in finished plastic goods. In the view of the many factors that may affect processing and application, users should make their own independent determination that the products are suitable for their intended use and can be used safely and legally.

Colour Change Instructions - Moulding through a Hot Runner

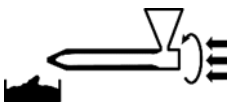
Information Gathering (A - B)



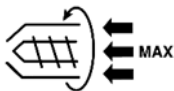
A) Take note of current Peak Injection Pressure (**PIP**)

B) Increase **PIP** Limit to maximum

Cleaning Screw and Barrel (C - F)



C) Empty Machine of last material



D) Increase Back Pressure to Maximum and purge till white



E) Dose 1 kg per 100 Tonne of Machine
(i.e. 500 Tonne = 5 kg)

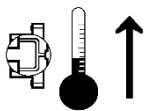
F) Once clear, decrease back pressure to running conditions, stop feeding **PCP** and screw back and inject until completely empty

Cleaning Hot Runner (G - K)

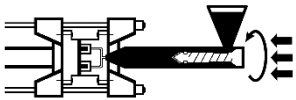


- G) Determine if your hot runner is a valve gate or open gate type.
- **Valve Gate:** mix **PCP** at 40% with your next material at 60%
 - **Open Gate:** mix the **PCP** between 10% and 40% with the next material, so that when moulding, PIP increases by 30%
 - **Sequential Gate:** as per Valve Gate but also set all gates to open all at once

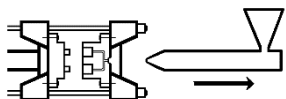
H) Add **PCP** mix to the clean hopper



- I) If standard practise, you may enhance cleaning performance by increasing Tip and Manifold heats by up to 50°C (**max 280°C**)



J) Continue moulding until all colour has been removed



K) Retract injection unit and completely empty of **PCP**

Cleaning Screw & Barrel (L)

- L) Follow Cleaning Screw and Barrel procedures C – F with the NEXT MATERIAL

Cleaning Hot Runner (M)

- M) Start moulding with next material, ensuring all **PCP** is removed **BEFORE** reducing Tip and Manifold temperatures or splitting tool for tip (cap) removal.

Safety Precaution



Do not use **PCP** for material with processing temperatures below 160°C



Do not use **PCP** for material with processing temperatures above 290°C



PPE

Wear suitable protective clothing when cleaning down equipment, using, handling or viewing the hot or cold **PCP**



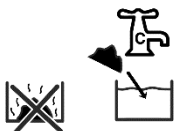
If contact with skin occurs, wash with cool water



In case of eye contact, irrigate with plenty of cool water



Do not swallow product



In situations of excessive shear heat place purgings in cool water to eliminate fumes