

TorqShift® (5R110W) Cooler Filtration System

1. It is important to understand that this is a bypass filtration system, **NOT** a filter with a bypass built into it.
2. Just as critical to know and understand, is how the filtration system works in balance with the cooler system. Every component is tuned to the system, cooler flow and filtration flow.

Using the wrong filter element will upset the system balance between cooler and filtration flow, raising the temperature of the fluid, reducing system efficiency and causing transmission failures.

What is Bypass filtration?

Bypass filtration is technology that uses a calibrated percentage of the total system flow that passes the cooler(s) . This percentage of flow is filtered to a cleanliness level not achievable when using a full flow or in-line filter.

The Ford TorqShift® bypass filtration circuit is OEM calibrated to use a maximum of 10% of total cooler system flow for a filter efficiency rating of 99.98% at capturing particles of 5 micron or larger, compared to a felt transmission sump filter which traps 30 plus micron particles.

The system calibration is a delicate balance between the resistance to flow of the filter element, and the remaining pressure in the system.

The balance of bypass flow and filtration is achieved by the use of an Ultra High Efficient Depth Filtration filter element with an OEM designed resistance to flow.

Depth Filtration produces a cleanliness level that **cannot** be achieved by using a conventional, less efficient filter element with a higher flow rate.



Part No
515574

