Clutch/Converter Housings: Identification and Interchangeability

There is a difference between the 61-63 and the 64-69 housings and the crankshaft hubs, however, all combinations will work (Do not interchange manual and Powerglide housings: the Powerglide housing is too weak for a clutch and the manual housing will overheat a Powerglide). The one significant item of interest is that you can locate the crankshaft seal lips at different locations on the crankshaft hub depending on which combination you use. This can be useful if you have a groove worn in the hub from a crystallized seal. The clutch/converter housings have a casting number clearly stamped on them; this is not a part number but it makes it easy to at least determine if you have an early or late design. The only difference between the 61-63 and the 64-69 housing is the location of the seal mounting area of the housing, which was redesigned for 1964 and moved the location of the seal 0.070 towards the crankshaft gear. The crankshaft hub was also shortened by the same 0.070. This was done to accommodate the redesigned clutch but applied to Powerglide engine parts also since crankshafts could be interchanged.

- 1. Using a late model housing on an early model engine (crankshaft) will move the seal lip closer to the crankshaft gear, avoiding a grove if necessary. If you install an early model housing on a late model engine (crankshaft) you move the seal lips away from the crankshaft gear. Be sure to polish the new sealing area carefully. Do not use a crankshaft seal that has a metal press fit area instead of rubber they will fall out when hot.
- 2. I checked the flywheel to housing clearance and it is sufficient to interchange housings. I also checked how close the seal lip came to the flange at the back of the hub and all the combinations worked, although using a late housing on an early crankshaft would move the metal portion of the seal close to the flange be sure the seal is seated completely in the housing. This was checked using a CCP viton seal; other seals could be different.
- 3. CCP also sells a spacer that is 0.090 thick which you can install with your seal which will accomplish the same thing. It does move the seal very close to the flange on the hub. If you use the spacer I would suggest checking the clearance with a small piece of putty before making the addition permanent. Using a spacer also leaves less of the press fit area of the seal in contact with the housing but since there is a lot of area to begin with and the press fit is good, I would not expect any problems.
- 4. There are lots of folks around that have modified the FC/wagon crankcase to accept the late model crankshaft and cam and as far as I know, they all work fine; the above combinations would apply. The other change from early crankcase to the late crankcase is the lifter bore angle and the bore spacing which was changed to accommodate the redesigned camshaft in 1964: the new cam incorporated re-spacing of cam lobes, revised ramp angles and lift.

These are the casting numbers for the four different clutch/converter housings:

6255599 Early Powerglide* 6256583 Early Manual* *Stamped 2" Circle In

3832517 Late Powerglide 3832176 Late Manual Middle of "Horseshoe"