

# Transmission Type... ZF 5HP-18



## Clutch Clearances

### Clutch A:

4 Friction ..... .051-.063" ..... Snap Ring  
5 Friction ..... .064-.076" ..... Snap Ring

Clutch B ..... .012-.019" ..... Snap Ring

### Clutch C1:

3 Friction ..... .037-.049" ..... Snap Ring  
4 Friction ..... .051-.063" ..... Snap Ring

### Clutch E:

4 Friction ..... .044-.083" ..... Snap Ring  
5 Friction ..... .059-.098" ..... Snap Ring

### Clutch F:

4 Friction ..... .051-.063" ..... Snap Ring  
5 Friction ..... .065-.076" ..... Snap Ring

### Clutch G:

3 Friction ..... .037-.049" ..... Snap Ring  
4 Friction ..... .051-.063" ..... Snap Ring

## Band Adjustment

Brake Band C2 ..... .053-.067" ..... Washers  
(In Pairs Only)

## Adjusted By:

## Torque Specifications

Pump to Intermediate Plate ..... 7.4 Ft. Lbs.

Pump To Case ..... 7.4 Ft. Lbs..

Guide Plate ..... 7.4 Ft. Lbs.

Wiring Harness ..... 15 Ft. Lbs.

### Overdrive Support

### Chain Cover

Valve Body (Short) ..... 6 Ft. Lbs.

Valve Body (Long) ..... 6 Ft. Lbs.

### Pressure Test Port Plug

### Speed Sensor Bolts

Pan ..... 7.4 Ft. Lbs.

### Accumulator Cover to Case

### Endcover Bolts

## Unit Endplays

## Location

## Selective

### Front Unit

### Middle Unit

### Rear Unit

### Differential

Input Shaft .0039-.0118" ..... Under Pump w/Needle Bearing ..... Thrust Washer

Output Flange .0059-.0317" ..... Between Output Shaft & Flange ..... Shim

### Chain Sprocket

# Transmission Type... ZF 5HP-18

Rebuilder's Kwik  
Reference Guide



## Clutch & Band Application Chart

Gear		Clutch "A"	Clutch "B"	Clutch "C1"	Band "C2"	Intermediate Sprag	Clutch "D"	Low Sprag	Clutch "E"	Clutch "F"	Clutch "G"
Reverse			Applied				Applied				Applied
D	1st	Applied						Holding			
	2nd	Applied		Applied	Applied	Holding					Applied
	3rd	Applied		Applied	Applied	Holding				Applied	
	4th	Applied		Applied*					Applied	Applied	
	5th			Applied*	Applied				Applied	Applied	
4	The same as DRIVE, but no 5th gear.										
3	The same as DRIVE, but no 4th or 5th gear.										
2	The same as DRIVE, but no 3rd, 4th or 5th gear.										
Converter Clutch may be ON or OFF depending on the vehicle's speed.											
* Applied but not effective.											

# Transmission Type... ZF 5HP-18

Rebuilder's Kwik  
Reference Guide



## Solenoid Application Chart

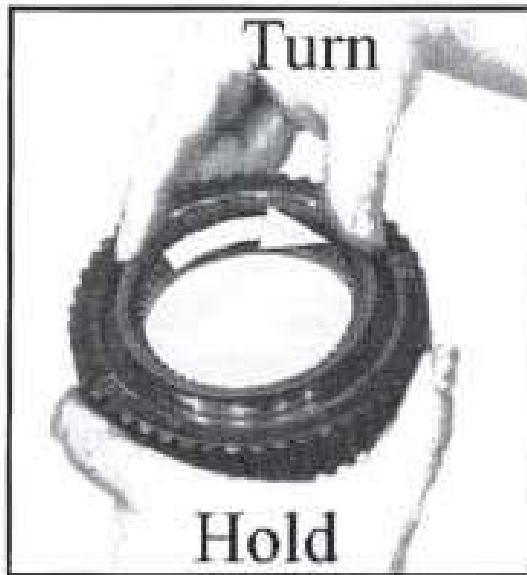
Gear		Shift Solenoid			Kick-Down Regulator	Lock-Up	
Solenoid ID		MV1	MV2	MV3	MV4	MV5	MV6
Reverse		On	On				
D	1st	On	On	On			
	2nd		On	On			
	3rd			On			On
	4th						On
	5th	On					On
2	1st	On	On				
Drive	3-2		On	On	On*		
Drive	5-4					On*	
Reverse Interlock				On			
* Regulated Apply							

# Transmission Type... ZF 5HP-18

Rebuilder's Kwik  
Reference Guide

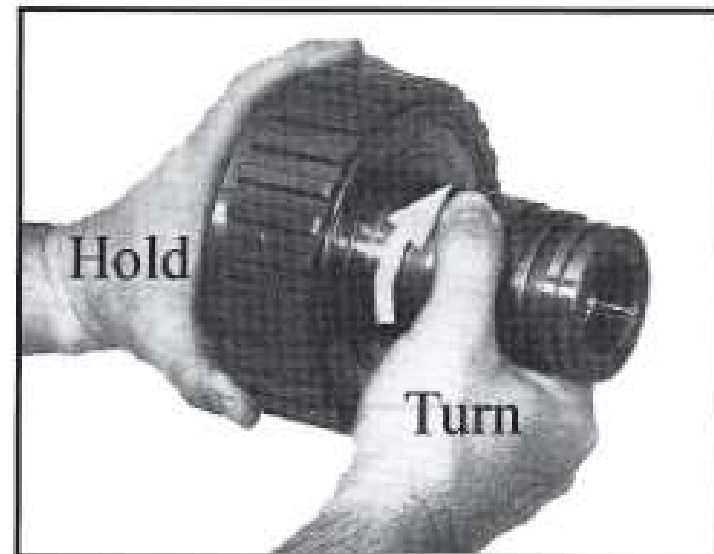


## Sprag Rotation



3rd Gear Freewheel

## 1st Gear Freewheel

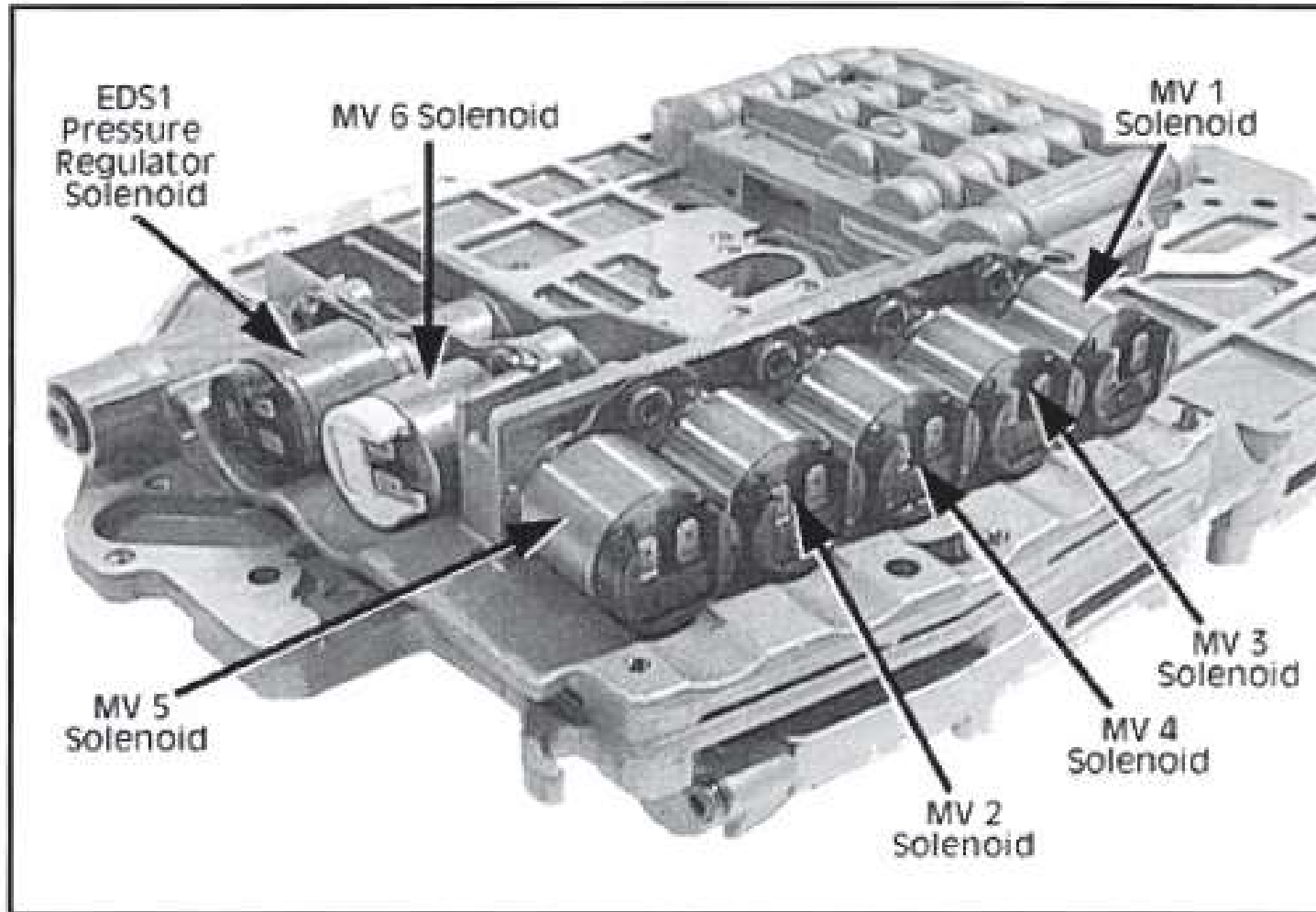


# Transmission Type... ZF 5HP-18

Rebuilder's Kwik  
Reference Guide



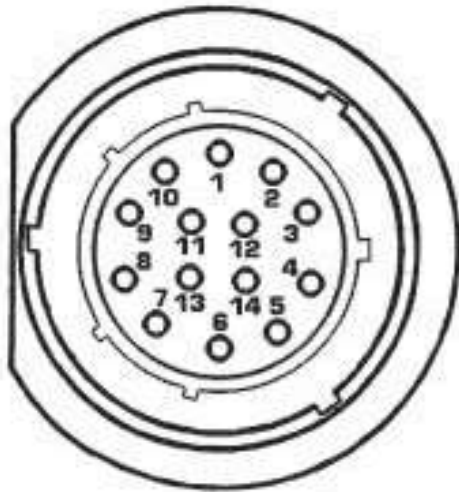
## Solenoid & Harness Information



# Transmission Type... ZF 5HP-18



## Solenoid & Harness Information (Continued)



Pin #	Wire Color	Function	Resistance
1	Gray	MV1 Solenoid	30 - 43 Ohms
2	Green	MV2 Solenoid	30 - 43 Ohms
3	Yellow	Turbine Sensor	265 Ohms (72°F)
4	Yellow	Turbine Sensor	265 Ohms (72°F)
5	Blue	EDS 1 Pressure Regulator Solenoid	5.2 - 6.8 Ohms
6	Tan	MV4 Solenoid	30 - 43 Ohms
7	White	MV3 Solenoid	30 - 43 Ohms
8	Brown	Output Sensor	265 Ohms (72°F)
9	Brown	Output Sensor	265 Ohms (72°F)
10	White	MV5 Solenoid	30 - 43 Ohms
11	Purple	Ground (All Solenoids)	-
12	White	Transmission Oil Temperature Sensor	-
13	Tan	Transmission Oil Temperature Sensor	-
14	Red	MV6 Solenoid	30 - 43 Ohms

# Transmission Type... ZF 5HP-18



## Checkball Locations

