



### **A. Bearing Assembly**

The Cobra bearing assembly is available in a mud lubricated flow-through or oil sealed design to meet a wide range of drilling applications. Both designs are configured with flow restrictors to allow for higher bit differential on the drill bit.

### **B. Flex Coupling Transmission Assembly**

The Cobra Flex Coupling Transmission is used to convert the eccentric motion of the motor (rotor) to a smooth concentric motion required by the bearing section. The Cobra Flex Coupling Transmission is an integral part of the drive assembly of the Cobra Downhole Motor. Manufactured from high yield strength alloy steel, the Cobra Flex Coupling Transmission can withstand the extreme power outputs of today's even wall, hard rubber and high performance power sections.

### **C. Adjustable Bent Housing/ Fixed Housing**

Cobra adjustable housings are available in 0°-3° settings, and include a specialized assembly for short radius drilling. The housing is easily adjustable and allows the operator to reset angles at the rig floor, eliminating the need to change assemblies or motors. Always follow the specifications for proper torquing of the assembly. Cobra also offers a complete line of fixed bent housings to produce a wide range of build rates.

### **D. Power Sections**

Cobra power sections are made up of a lobed rotor that fits inside an elastomer lined housing (stator). The rotor has one less lobe than the stator, creating a continuously sealing chamber. Drilling fluid or gas is forced through the motor, thereby turning the rotor and generating torque. Cobra stators can be injected with elastomers to work in many different drilling applications. Cobra rotors are manufactured to handle many different drilling conditions; special coatings are available for high chloride fluid applications.

### **E. Dump Valve/Blank Top Sub**

*optional* – Both the Dump Valve/Blank Top Sub employ the Cobra motor rotor-catch system which offers added security in case of connection failure. All rotor catch assemblies are manufactured of high strength alloy steel.