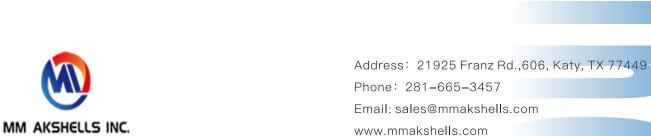


MM AKSHELLS Inc.

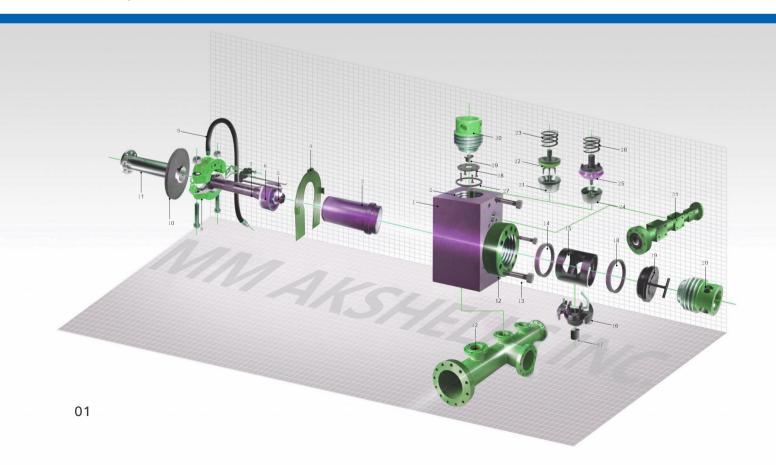


6, Katy, TX 77449



MM AKSHELLS INC.

- MM's products cover more than 23,000
 components of the power and hydraulic mud
 pumps, including gears, crankshafts, bearings,
 pistons, cylinder liners, valve seats, valve
 bodies, etc.
- © Every product we provide complies with US API specifications and quality standards with the original O.E.M code.
- We have state-of-the-art production equipment that can produce pump components for new and old models, including nonstandard parts.













FLUIDENDEXPENDABLES

- **©**Liners
- ©Valves & seats
- ©Piston & piston rubbers
- ©Piston rods & extension rods
- OCylinder heads & valve covers

INSTRUMENTATION&OTHERPARTS

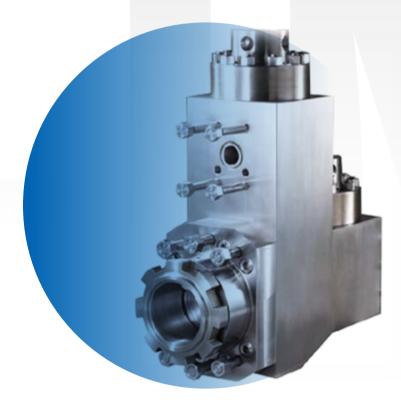
- ©Pressure gauges
- OHydraulic seat pullers
- @Oilfield chains
- @Gasket & baffles
- ODampeners
- ©Manifolds, discharge & suction
- ©Diaphragms & discharge crosses

POWEREND

- OCrankshafts
- ©Bearings
- ©Crossheads & guides
- ©Pinion shaft
- @Gears



MM offers premium fluid-end modules for all well-known mud pumps. All modules are made from internally hardened AlSI 8620 or 4135 alloy steels with precise machining, complex heat treatment, and strict inspection in order to provide extremely durable modules for high-demand pumping requirements in current oil and gas industry. The interchangeable suction and discharge connections enable adaptability to most OEM fluid ends, eliminating extensive spare part inventories.



Features

- Operating pressure ranges are 5,000, 7,500, and 10,000 PSI
- @Valve-over-valve and L-shaped (one-bonded or two-pieces)
- ©Fully interchangeable with standard OEM equipment
- Olncomparable manufacturing technology and quality control assure durability
- @Most of MM's modules are coated with our corrosion resistant material to maximize service time





Liners

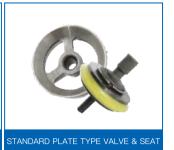
	Liners Hy-Chrome		Ceramic	Hardened Steel	Chrome Plated	
DESCRIPTION		Hy-chrome Liner	Ceramic Liner	Hardened Steel Liner	Chrome Plated Liner	
Material Hardness		AISI 1045 HI CR-CF	AISI 1045 Ceramic	AISI 1045 (carburized and quenched bore)	AISI 1045 (chrome-plated bore)	
		HRC59~69	HRC84~92	HRC58~62	HRC58~62	
	Normal Service Life time (Hr)	800	2000~4000 800		800	
Operating Condition	Operating Pressure (Max. psi)	7500	7500	7500	7500	
	Temperature	20 ~ 230 °F	20 ~ 338 °F	20 ~ 230 °F	20 ~ 230 °F	
	PH. (Normal.)	7.5~10.2	10 ~ 12	7.5~10.2	7.5~10.2	
	Hydrogen Sulfide (Max.) ppm	22	22	22	22	
Ŏ	Sand Solids (Normal)	0.21% Oil Based and Oil Emulsion	0.21% Oil Based and Oil Emulsion	0.21% Oil Based and Oil Emulsion	0.21% Oil Based and Oil Emulsion	



















Pistons & Valves















Piston	Rubber	Urethane Bonded	Blue Lightning	Green Bonded	Urethane HT High–Temp	High-Temp	Bull nose
Material	AISI 5140 Buna-N Rubber	AISI 5140 Urethane 711	AISI 5140 Polyurethane	AISI 5140 Urethane 711	AISI 5140 Polyurethane	AISI 5140 Polyurethane	AISI 5140 Dual Urethane
Hardness	HB285~341 85+/ – 5	HB285~341 90+/ - 5	HB285~341 90+/ - 5	HB285~341 90+/ – 5	HB285~341 90+/ – 5	HB285~341 90+/ – 5	HB285~341 90+/ - 5
Operating Pressure (Max. psi)	5000	6300	7500	7500	7500	7500	7500
Temperature	32 ~ 175 °F	20 ~ 200 °F	20 ~ 220 °F	220 ~ 250 °F	20 ~ 300 °F	20 ~ 325 °F	20 ~ 200 °F
PH. (Normal.)	7.5~10.2	7.5~10.2	7.5~10.2	7.5~10.2	7.5~10.2	7.5~10.2	7.5~10.2
Hydrogen Sulfide (Max.) ppm	22	22	22	22	22	22	22
Sand Solids、 (Normal)	0.21% Oil Based and Oil Emulsion	0.21% Oil Based and Oil Emulsion					

MM's pistons are made to exact tolerances and include a variety of extended wear materials yielding excellent service life. Pistons include combinations from 3" to 8" sizes and available for all pressures.





Piston Rods & Extension Rods

MM's full line of piston rods and extension rods are available for various pumps. Made of forged alloy steel with thermal refining treatment, the result yields excellent mechanical characteristic. Duplex and triplex components are available.



Cylinder Heads & Valve Covers

MM's cylinder heads and valve covers are made from forged alloy steel and designed for quick and easy access to valves and liners during maintenance operations.







Gasket & Baffles

MM's gaskets for valve covers, cylinder heads and liner seals are made of polyurethane, rubber and or a combination of fabric and rubber resulting in a durable and flexible material unyielding to high pressures and temperature.