

# TECHNICAL BULLETIN

**TB NO. 1041**

**Rev. 0**

**Subject: Maintenance Programs for Superior Compressors**

The basic intent of any preventive maintenance program is for unit protection to prevent major failures, insure on-line availability and to maintain cost of operating at a reasonable level per brake horsepower per year.

Each application must be reviewed and considerations would include: (1) annual operating hours, (2) load and general operating conditions, (3) importance of on-line availability, (4) manpower and (5) budgets.

The attached programs are typical for Superior horizontally opposed reciprocating compressors operating under normal conditions. Please refer to each program as a reminder of important items which should be included in your existing programs. The actual intervals of service may vary dependent on your application.

If you need additional copies, have any questions or desire additional information, please contact **EnDyn's** Technical Service Department or your local **PowerParts**<sup>®</sup> Distributor or **EnDyn** Field Sales Representative.

2-10-05

## MAINTENANCE PROGRAM

(Typical For Horizontally Opposed Reciprocating Compressors)

### INTRODUCTION

This maintenance schedule is for Horizontally Opposed Compressors operating under normal conditions. It may be necessary to change some of the intervals of service due to abnormal conditions associated with load, gas constituents, ambient temperatures, etc.

### MAINTENANCE CHART

ITEM	SERVICE	Daily / As Required	1000 Hours	4000 Hours	8000 Hours	30000 Hours
Operating Temperatures	Log Data	X				
Operating Pressures	Log Data	X				
Load & RPM	Log Data	X				
Water Level	Check	X				
Lube Oil Level	Check	X				
Lube Oil Consumption	Check	X				
Force Feed Lubricator	Check Level & Rate	X				
Leaks	Check/Repair	X				
Cooler & Water Pump Drive Belts	Check		X			
Fan Shaft Bearings	Lubricate		X			
Auxiliary Water Pump	Lubricate Bearings		X			
Compressor Valves	Check/Record Temperature		X			
Scrubber Liquid Level Control	Check For Proper Operation		X			
Safety Shutdowns	Test/Adjust		X			
Cooler	Inspect Tube Fins (external)			X		
Comp. To Engine Alignment	Check/Adjust			X		
Crankcase Lubrication	Drain, Wipe Crankcase, New Oil				X	
Rod & Main Bolts	Inspect/Retorque				X	
Crossheads, Pins, Bushings, Etc.	Check/Record Clearances				X	
Compressor Cylinder Bores	Clean/Record I.D.				X	
Compressor Pistons	Check OD/Install New Rings				X	
Compressor Piston Rod	Check OD/Rod Run-Out				X	
Pressure Packing Glands	Replace Packing, O-Rings, Gaskets				X	
Compressor Valves	Replace Plates, Springs & Buttons				X	
Auxiliary W/Pump	Repair As Needed				X	
Main Bearings	Check Clearance/Spot Check				X	
Rod Bearings	Check Clearance/Spot Check				X	
Gaskets & Seals	Replace					X
Rod Bearings	Replace					X
Main Bearings (sleeve type)	Replace					X
Crosshead Pin Bushings	Replace					X

Horizontally opposed Compressor Maintenance (cont'd)

ITEM	SERVICE	Daily / As Required	1000 Hours	4000 Hours	8000 Hours	30000 Hours
Crosshead Pins	Check/Replace As Needed					X
Wiper Glands	Rebuild Complete					X
Force Feed Lubricator	Repair As Needed					X
Compressor Cylinder Bores	Hone/Repair As Needed					X
Compressor Piston Rods	Repair/Replace As Needed					X
Packing Glands	Rebuild/New Packing					X
Compressor Valves	Rebuild/New Parts					X
VVP's	Repair As Needed					X
Compressor Piston	Clean/Replace With New Rings					X
Auxiliary Water Pump	Rebuild					X
Belts	Replace					X
Coupling Shims/Hardware	Inspect/Replace As Needed					X
Scrubber Dump Valves & Pilots	Rebuild					X
Controls	Check/Repair/Replace As Required					X
Cooler	Rod-Out/Clean All Sections					X
Fan & Drives	Check/Repair As Needed					X
Relief Valves	Check/Repair/Calibrate					X
Hoses	Replace All Hoses					X