DEPARTMENT OF THE NAVY
NAVAL SURFACE WARFARE CENTER
CARDEROCK DIVISION

NAVAL SHIP SYSTEMS
ENGINEERING STATION
PHILADELPHIA, PA 19112-5083

IN REPLY REFER TO

9503
Ser 9234/088
AUG 2 1 2003

From: Commander, Cardercock Division, Naval Surface Warfare Center, Philadelphia, PA 19112-5083
To: Commander, Naval Sea Systems Command, Washington, DC (Code 05L3)

Subj: FLEXIBLE RUBBER HOSE CHANGE TO PERIODIC MAINTENANCE

Ref: (a) COMNAVSEASYSCOM LTR Serial 03134/443 of 19 Dec 1997
(b) NAVSEA S6430-AE-TED-010-Technical Directive for Piping Devices and Flex Hose Assemblies
(c) Phoncon CNSL N431A9 (LCDR. Anderson)/NSWCCD-SSES Code 9234 (A. Pappalardo) of 04/18/03.

Encl: (1) Typical MHC Class Flex Hose Configuration
(2) Proposed Critical Flex Hose Spreadsheet for MHC Class Ships.

1. By reference (a), ACN 3A (NSDSA Control Number A48048) was issued to modify the criteria for determining the criticality and to extend the replacement requirements, stated in reference (b), to twelve years for critical applications. Periodic replacement for Non-Critical assemblies is only required when assemblies fail visual inspection or during in service operation.

2. As also stated in reference (a), hose lists are to be forwarded to Carderock Division, Naval Surface Warfare Center (NSWCCD-SSES) Code 9234 for review to develop a list of critical flex hose assemblies prior to forwarding the list to Commander, Naval Sea Systems Command (NAVSEA) 05 for approval.

3. As requested during Ref (c) Code 9234 was asked to establish a critical/non-critical flex hose list for MHC Class Ships. Enclosure (1) provides a typical list of installed flex hose assemblies. Enclosure (2) provides a proposed list of critical hose assemblies for use on all MHC Class Ships. Upon approval all applicable ships databases will be updated and distributed to each ship.

4. The NSWCCD-SSES points of contact are A. Pappalardo/D. Luciani, Code 9234, Commercial (215) 897-7242/7875 or DSN 443-7242/7875.

T. A. PERRY
By direction

Copy to:
NAVSEA Washington, DC (Codes 03N, PEO MUW PMS-490-4)
CONAVSURFLANT Norfolk, VA (N434, N431A9)
COMREGSUPPGRU Ingleside, TX (N4)
COMINEWARCOM Corpus Christi, TX (N4, N43)

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
H-HD-009	HALON CYLINDER DISCHARGE HOSE	HALON	1-27-0-E	1 1/2	260902	METAL
H-HD-010	HALON CYLINDER DISCHARGE HOSE	HALON	1-27-0-E	1 1/2	260902	METAL
H-HD-008	HALON CYLINDER DISCHARGE HOSE	HALON	1-34-0-E	1 1/2	260902	METAL
MNV-HYD-001	MINE NEUTRALIZATION VEHICLE HSU HIGH PRESSURE TO RESERVOIR	AN/SLQ-48	1-34-3-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER
MNV-HYD-002	MINE NEUTRALIZATION VEHICLE HSU LOW PRESSURE TO COMPENSATOR	AN/SLQ-48	1-34-3-Q	3/4	SAE100R83/4	SYNTHETIC RUBBER
MNV-HYD-003	MINE NEUTRALIZATION VEHICLE RETURN FROM VEHICLE TO HSU	AN/SLQ-48	1-34-3-Q	1	SAE100R81	SYNTHETIC RUBBER
FF-M/S-001	SMALL ARMS MAGAZINE SPRINKLING - INLET	FIRE FIGHTING	2-10-1-M	1/2	2651-8	SYNTHETIC RUBBER
FF-M/S-002	SMALL ARMS MAGAZINE SPRINKLING - OUTLET	FIRE FIGHTING	2-10-1-M	1/2	GH793-8	SYNTHETIC RUBBER
UCHS-A-001	UCHS AIR FILTER INLET	AN/SLQ-48	2-41-0-Q	1	1529-16	SYNTHETIC RUBBER
UCHS-A-002	UCHS AIR FILTER OUTLET	AN/SLQ-48	2-41-0-Q	1/4	SAE100R1/4	SYNTHETIC RUBBER
UCHS-S/W-003	UCHS ASW COOLER OUTLET	AN/SLQ-48	2-41-0-Q	3/8	SAE100R3/8	SYNTHETIC RUBBER
UCHS-S/W-001	UCHS ASW INLET	AN/SLQ-48	2-41-0-Q	3/8	SAE100R3/8	SYNTHETIC RUBBER
UCHS-S/W-002	UCHS ASW INLET TO COOLER	AN/SLQ-48	2-41-0-Q	3/8	SAE100R3/8	SYNTHETIC RUBBER
UCHS-HYD-006	UCHS CHARGE PRESSURE SWITCH	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER
UCHS-HYD-003	UCHS CHARGE/SERVO FILTER INLET	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER
UCHS-HYD-004	UCHS CHARGE/SERVO FILTER OUTLET	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER
UCHS-HYD-010	UCHS COMPENSATOR VENT VALVE	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
UCHS-A-003	UCHS COMPRESSED AIR CYLINDER TO CABLE ACCUMULATOR	AN/SLQ-48	2-41-0-Q	3/4	SAE100R83/4	SYNTHETIC RUBBER
UCHS-HYD-007	UCHS DIFFERENTIAL PRESSURE TRANSDUCER INLET A-1	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER
UCHS-HYD-008	UCHS DIFFERENTIAL PRESSURE TRANSDUCER INLET B-1	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER
UCHS-A-004	UCHS M/P AIR CHARGE TO COMPRESSED AIR CYLINDER	AN/SLQ-48	2-41-0-Q	1	1529-16	SYNTHETIC RUBBER
UCHS-HYD-009	UCHS MANIFOLD RETURN	AN/SLQ-48	2-41-0-Q	3/4	SAE100R83/4	SYNTHETIC RUBBER
UCHS-HYD-002	UCHS MANIFOLD TO COOLER	AN/SLQ-48	2-41-0-Q	1	SAE100R1	SYNTHETIC RUBBER
UCHS-HYD-005	UCHS PRECHARGE ACCUMULATOR	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER
UCHS-HYD-0173	UCHS RESERVOIR OUTLET	AN/SLQ-48	2-41-0-Q	1	1529-16	SYNTHETIC RUBBER
UCHS-HYD-011	UCHS SHUTTLE VALVE INLET (VA)	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER
UCHS-HYD-012	UCHS SHUTTLE VALVE INLET (VB)	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER
UCHS-HYD-001	UCHS SYSTEM PRESSURE GAGE	AN/SLQ-48	2-41-0-Q	1/2	2580-8	SYNTHETIC RUBBER
FF-M/S-003	EXPLOSIVE SECTIONS MAGAZINE SPRINKLING - INLET	FIRE FIGHTING	2-41-0-Q	1/2	2651-8	SYNTHETIC RUBBER
FF-M/S-004	EXPLOSIVE SECTIONS MAGAZINE SPRINKLING - OUTLET	FIRE FIGHTING	2-41-0-Q	1/2	2651-8	SYNTHETIC RUBBER
SD-D-002	SUMP PUMP INLET	SUMP DRAIN	2-41-0-Q	1 1/4	2580-20	SYNTHETIC RUBBER
SD-D-001	SUMP PUMP OUTLET	SUMP DRAIN	2-41-0-Q	1 1/4	2580-20	SYNTHETIC RUBBER
PVSP-L/O-001	PORT LUBE OIL HEATER INLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER
PVSP-L/O-002	PORT LUBE OIL HEATER OUTLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
PVSP-L/O-003	PORT LUBE OIL TRANSDUCER-PORT P1A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER
PVSP-L/O-004	PORT LUBE OIL TRANSDUCER-PORT P2A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER
SVSP-L/O-001	STBD LUBE OIL HEATER INLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER
SVSP-L/O-002	STBD LUBE OIL HEATER OUTLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER
SVSP-L/O-003	STBD LUBE OIL TRANSDUCER-PORT P1A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER
SVSP-L/O-004	STBD LUBE OIL TRANSDUCER-PORT P2A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER
1FP-F/M-001	FIREPUMP #1 INLET	FIREMAIN	3-13-2-E	3	FC132-48	SYNTHETIC RUBBER
1FP-F/M-002	FIREPUMP #1 OUTLET	FIREMAIN	3-13-2-E	3	FC132-48	SYNTHETIC RUBBER
1FP-F/M-003	FIREPUMP #1 PUMP PRIMING	FIREMAIN	3-13-2-E	1/2	2580-8	SYNTHETIC RUBBER
1AC-C/W-001	#1 AC PLANT CHILLER INLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1AC-C/W-002	#1 AC PLANT CHILLER OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1AC-C/W-003	#1 CHILLED WATER PUMP DISCHARGE	A/C	3-27-0-E	2	FC132-32	SYNTHETIC RUBBER
1AC-C/W-004	#1 CHILLED WATER PUMP SUCTION	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1AAC-S/W-001	#1A A/C PLANT S/W INLET	A/C	3-27-0-E	2 1/2	FC132-40	SYNTHETIC RUBBER
1AAC-S/W-002	#1A A/C PLANT S/W OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1AAC-C/W-001	#1A AC PLANT CONDENSER RELIEF VALVE DISCHARGE	A/C	3-27-0-E	1 1/4	1540-20	SYNTHETIC RUBBER
1BAC-S/W-001	#1B A/C PLANT S/W INLET	A/C	3-27-0-E	2 1/2	FC132-40	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
1BAC-S/W-002	#1B A/C PLANT S/W OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1BAC-C/W-001	#1B AC PLANT CONDENSER RELIEF VALVE DISCHARGE	A/C	3-27-0-E	1 1/4	1540-20	SYNTHETIC RUBBER
2AC-C/W-003	#2 AC PLANT CHILLER INLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2AC-C/W-004	#2 AC PLANT CHILLER OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2AC-C/W-001	#2 CHILLED WATER PUMP DISCHARGE	A/C	3-27-0-E	2	FC132-32	SYNTHETIC RUBBER
2AC-C/W-002	#2 CHILLED WATER PUMP SUCTION	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2AAC-S/W-001	#2A A/C PLANT S/W INLET	A/C	3-27-0-E	2 1/2	FC132-40	SYNTHETIC RUBBER
2AAC-S/W-002	#2A A/C PLANT S/W OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2AAC-C/W-001	#2A AC PLANT CONDENSER RELIEF VALVE DISCHARGE	A/C	3-27-0-E	1 1/4	1540-20	SYNTHETIC RUBBER
2BAC-S/W-001	#2B A/C PLANT S/W INLET	A/C	3-27-0-E	2 1/2	FC132-40	SYNTHETIC RUBBER
2BAC-S/W-002	#2B A/C PLANT S/W OUTLET	A/C	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2BAC-C/W-001	#2B AC PLANT CONDENSER RELIEF VALVE DISCHARGE	A/C	3-27-0-E	1 1/4	1540-20	SYNTHETIC RUBBER
BR-P/W-003	RECIRC BROMINATOR INLET FROM 3-13-0-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-005	RECIRC BROMINATOR INLET FROM 3-17-3-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-007	RECIRC BROMINATOR INLET FROM 3-17-4-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-004	RECIRC BROMINATOR OUTLET TO 3-13-0-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-006	RECIRC BROMINATOR OUTLET TO 3-17-3-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
BR-P/W-008	RECIRC BROMINATOR OUTLET TO 3-17-4-W	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-001	RECIRC BROMINATOR PUMP DISCHARGE	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
BR-P/W-002	RECIRC BROMINATOR PUMP SUCTION	BROMINATOR	3-27-0-E	1	2583-16	SYNTHETIC RUBBER
2FP-F/M-001	FIREPUMP #2 INLET	FIREMAIN	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2FP-F/M-002	FIREPUMP #2 OUTLET	FIREMAIN	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2FP-F/M-003	FIREPUMP #2 PUMP PRIMING	FIREMAIN	3-27-0-E	1/2	2580-8	SYNTHETIC RUBBER
2FP-F/M-004	FIREPUMP #2 SEACHEST SUCTION	FIREMAIN	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
2FP-F/M-005	FIREPUMP #3 SEACHEST VENT/PRIMING	FIREMAIN	3-27-0-E	2	FC132-32	SYNTHETIC RUBBER
FOP-F/O-001	FUEL OIL PURIFIER - INLET	FUEL OIL PURIFER	3-27-0-E	2	2580-32	SYNTHETIC RUBBER
FOP-F/O-002	FUEL OIL PURIFIER BYPASS	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER
FOP-F/O-004	FUEL OIL PURIFIER HEATER INLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER
FOP-F/O-005	FUEL OIL PURIFIER HEATER -OUTLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER
FOP-A-001	FUEL OIL PURIFIER L/P AIR	FUEL OIL PURIFER	3-27-0-E	3/8	2580-6	SYNTHETIC RUBBER
FOP-F/O-003	FUEL OIL PURIFIER OUTLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER
FOP-P/W-001	FUEL OIL PURIFIER PRIMING WATER INLET	FUEL OIL PURIFER	3-27-0-E	1 1/4	2580-20	SYNTHETIC RUBBER
FOP-P/W-002	FUEL OIL PURIFIER SHOOT WATER INLET	FUEL OIL PURIFER	3-27-0-E	1	2580-16	SYNTHETIC RUBBER
H-HD-006	HALON CYLINDER DISCHARGE HOSE	HALON	3-27-0-E	1 1/2	260902	METAL

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
H-HD-005	HALON CYLINDER DISCHARGE HOSE	HALON	3-27-0-E	1 1/2	260902	METAL
H-HD-007	HALON CYLINDER DISCHARGE HOSE	HALON	3-27-0-E	1 1/2	260902	METAL
1MPA-A-001	#1 M/P AIR COMPRESSOR DISCHARGE	M/P AIR	3-27-0-E	1/2	FC163-8	SYNTHETIC RUBBER
1MPA-S/W-001	#1 M/P AIR COMPRESSOR S/W COOLING OUTLET	M/P AIR	3-27-0-E	1	2580-16	SYNTHETIC RUBBER
1MPA-S/W-002	#1 M/P AIR COMPRESSOR S/W COOLING SUPPLY	M/P AIR	3-27-0-E	1	2580-16	SYNTHETIC RUBBER
OW-O/W-002	OILY WATER SEPERATOR INLET HOSE	OILY WASTE	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER
OWP-O/W-001	OILY WATER SEPERATOR PUMP DISCHARGE	OILY WASTE	3-27-0-E	2	2580-32	SYNTHETIC RUBBER
OWP-O/W-002	OILY WATER SEPERATOR PUMP SUCTION	OILY WASTE	3-27-0-E	2	2580-32	SYNTHETIC RUBBER
OW-O/W-001	OILY WATER SEPERATOR RECIRC LINE	OILY WASTE	3-27-0-E	3/8	2580-6	SYNTHETIC RUBBER
1PW-P/W-001	COLD POTABLE WATER PUMP #1 DISCHARGE	POTABLE WATER	3-27-0-E	2	2808-32	TEFLON
1PW-P/W-002	COLD POTABLE WATER PUMP #1 SUCTION	POTABLE WATER	3-27-0-E	2	2808-32	TEFLON
2PW-P/W-001	COLD POTABLE WATER PUMP #2 DISCHARGE	POTABLE WATER	3-27-0-E	2	2808-32	TEFLON
2PW-P/W-002	COLD POTABLE WATER PUMP #2 SUCTION	POTABLE WATER	3-27-0-E	2	2808-32	TEFLON
1HPW-P/W-001	HOT POTABLE WATER PUMP #1 DISCHARGE	POTABLE WATER	3-27-0-E	1	34PW-16	SYNTHETIC RUBBER
1HPW-P/W-002	HOT POTABLE WATER PUMP #1 SUCTION	POTABLE WATER	3-27-0-E	1	FC807-16	TEFLON
2HPW-P/W-001	HOT POTABLE WATER PUMP #2 DISCHARGE	POTABLE WATER	3-27-0-E	1	GH793-16	SYNTHETIC RUBBER
2HPW-P/W-002	HOT POTABLE WATER PUMP #2 SUCTION	POTABLE WATER	3-27-0-E	1	GH793-16	TEFLON

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
R/O-SW-002	BOOST INLET	REVERSE OSMOSIS	3-27-0-E	1	PUROSIL 70-100	SYNTHETIC RUBBER
R/O-SW-003	BOOST OUTLET	REVERSE OSMOSIS	3-27-0-E	1	PUROSIL 70-100	SYNTHETIC RUBBER
R/O-SW-001	HP PUMP INLET	REVERSE OSMOSIS	3-27-0-E	1	PUROSIL 70-100	SYNTHETIC RUBBER
R/O-SW-002	HP PUMP OUTLET	REVERSE OSMOSIS	3-27-0-E	3/4	2651-12	SYNTHETIC RUBBER
R/O-P-001	R/O UNIT PERMEATE OUTLET	REVERSE OSMOSIS	3-27-0-E	3/4	34PW-12	SYNTHETIC RUBBER
1SW-S/W-001	SEAWATER COOLING PUMP #1 PUMP PRIMING	SEAWATER	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER
1SW-S/W-002	SEAWATER COOLING PUMP #1 SEACHEST SUCTION	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
1SW-S/W-003	SEAWATER COOLING PUMP #1 SEACHEST VENT/PRIMING	SEAWATER	3-27-0-E	2	FC132-32	SYNTHETIC RUBBER
1SW-S/W-004	SEAWATER COOLING PUMP #1 DISCHARGE	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
1SW-S/W-005	SEAWATER COOLING PUMP #1 SUCTION	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
2SW-S/W-001	SEAWATER COOLING PUMP #2 PUMP PRIMING	SEAWATER	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER
2SW-S/W-002	SEAWATER COOLING PUMP #2 SEACHEST SUCTION	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
2SW-S/W-003	SEAWATER COOLING PUMP #2 SEACHEST VENT/PRIMING	SEAWATER	3-27-0-E	2	FC132-32	SYNTHETIC RUBBER
2SW-S/W-004	SEAWATER COOLING PUMP #2 DISCHARGE	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
2SW-S/W-005	SEAWATER COOLING PUMP #2 SUCTION	SEAWATER	3-27-0-E	5	2580-80	SYNTHETIC RUBBER
1ASDG-F/O-001	SSDG #1A FUEL OIL FILTER INLET	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER
1ASDG-F/O-002	SSDG #1A FUEL OIL RETURN	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
1ASDG-A-001	SSDG #1A L/P AIR TO LUBE OIL RESET VALVE	SSDG	3-27-0-E	3/8	2651-6	SYNTHETIC RUBBER
1ASDG-A-002	SSDG #1A START AIR SUPPLY	SSDG	3-27-0-E	1 1/4	1529-24	SYNTHETIC RUBBER
1ASDG-S/W-001	SSDG #1A SW COOLING INLET	SSDG	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1ASDG-S/W-002	SSDG #1A SW COOLING OUTLET	SSDG	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1BSDG-F/O-001	SSDG #1B FUEL OIL FILTER INLET	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER
1BSDG-F/O-002	SSDG #1B FUEL OIL RETURN	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER
1BSDG-A-001	SSDG #1B L/P AIR TO LUBE OIL RESET VALVE	SSDG	3-27-0-E	3/8	2651-6	SYNTHETIC RUBBER
1BSDG-A-002	SSDG #1B START AIR SUPPLY	SSDG	3-27-0-E	1 1/4	1529-24	SYNTHETIC RUBBER
1BSDG-S/W-001	SSDG #1B SW COOLING INLET	SSDG	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
1BSDG-S/W-002	SSDG #1B SW COOLING OUTLET	SSDG	3-27-0-E	3	FC132-48	SYNTHETIC RUBBER
3FP-F/M-001	FIREPUMP #3 INLET	FIREMAIN	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
3FP-F/M-002	FIREPUMP #3 OUTLET	FIREMAIN	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
3FP-F/M-003	FIREPUMP #3 PUMP PRIMING	FIREMAIN	3-34-0-E	1/2	2580-8	SYNTHETIC RUBBER
3FP-F/M-004	FIREPUMP #3 SEACHEST SUCTION	FIREMAIN	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
3FP-F/M-005	FIREPUMP #3 SEACHEST VENT/PRIMING	FIREMAIN	3-34-0-E	2	FC132-32	SYNTHETIC RUBBER
FOT-F/O-001	FUEL OIL TRANSFER PUMP INLET	FUEL OIL TRANSFER	3-34-0-E	3	2651-48	SYNTHETIC RUBBER
FOT-F/O-002	FUEL OIL TRANSFER PUMP OUTLET	FUEL OIL TRANSFER	3-34-0-E	3	2651-48	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
H-HD-001	HALON CYLINDER DISCHARGE HOSE	HALON	3-34-0-E	1 1/2	260902	METAL
H-HD-002	HALON CYLINDER DISCHARGE HOSE	HALON	3-34-0-E	1 1/2	260902	METAL
H-HD-003	HALON CYLINDER DISCHARGE HOSE	HALON	3-34-0-E	1 1/2	260902	METAL
H-HD-004	HALON CYLINDER DISCHARGE HOSE	HALON	3-34-0-E	1 1/2	260902	METAL
2MPA-A-001	#2 M/P AIR COMPRESSOR DISCHARGE	M/P AIR	3-34-0-E	1/2	1529-8	SYNTHETIC RUBBER
2MPA-S/W-001	#2 M/P AIR COMPRESSOR S/W COOLING OUTLET	M/P AIR	3-34-0-E	1	2580-16	SYNTHETIC RUBBER
2MPA-S/W-002	#2 M/P AIR COMPRESSOR S/W COOLING SUPPLY	M/P AIR	3-34-0-E	1	2580-16	SYNTHETIC RUBBER
1MPE-F/0-001	MAIN PRPLN ENG #1 FUEL OIL FILTER INLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
1MPE-F/0-002	MAIN PRPLN ENG #1 FUEL OIL OUTLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
1MPE-A-001	MAIN PRPLN ENG #1 L/P AIR TO LUBE OIL RESET VALVE	MAIN PROP	3-34-0-E	1/2	2651-8	SYNTHETIC RUBBER
1MPE-A-003	MAIN PRPLN ENG #1 START AIR REDUCING MANIFOLD INLET	MAIN PROP	3-34-0-E	3/4	1529-12	SYNTHETIC RUBBER
1MPE-A-002	MAIN PRPLN ENG #1 START AIR SUPPLY	MAIN PROP	3-34-0-E	1 1/4	1529-20	SYNTHETIC RUBBER
1MPE-S/W-001	MAIN PRPLN ENG #1 SW COOLING INLET	MAIN PROP	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
1MPE-S/W-002	MAIN PRPLN ENG #1 SW COOLING OUTLET	MAIN PROP	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
2MPE-F/0-001	MAIN PRPLN ENG #2 FUEL OIL FILTER INLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
2MPE-F/0-002	MAIN PRPLN ENG #2 FUEL OIL OUTLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
2MPE-A-001	MAIN PRPLN ENG #2 L/P AIR TO LUBE OIL RESET VALVE	MAIN PROP	3-34-0-E	1/2	2651-8	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
2MPE-A-003	MAIN PRPLN ENG #2 START AIR REDUCING MANIFOLD INLET	MAIN PROP	3-34-0-E	3/4	1529-12	SYNTHETIC RUBBER
2MPE-A-002	MAIN PRPLN ENG #2 START AIR SUPPLY	MAIN PROP	3-34-0-E	1 1/4	1529-20	SYNTHETIC RUBBER
2MPE-S/W-002	MAIN PRPLN ENG #2 SW COOLING INLET	MAIN PROP	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
2MPE-S/W-001	MAIN PRPLN ENG #2 SW COOLING OUTLET	MAIN PROP	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
2A-MSW-001	MSW 2A SEACHEST SUPPLY	SEAWATER	3-34-0-E	6	ER512-96	SYNTHETIC RUBBER
2B-MSW-001	MSW 2B SEACHEST SUPPLY	SEAWATER	3-34-0-E	6	ER512-96	SYNTHETIC RUBBER
3SW-S/W-001	SEAWATER COOLING PUMP #3 PUMP PRIMING	SEAWATER	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
3SW-S/W-002	SEAWATER COOLING PUMP #3 SEACHEST SUCTION	SEAWATER	3-34-0-E	5	2580-80	SYNTHETIC RUBBER
3SW-S/W-003	SEAWATER COOLING PUMP #3 SEACHEST VENT/PRIMING	SEAWATER	3-34-0-E	2	FC132-32	SYNTHETIC RUBBER
3SW-S/W-004	SEAWATER COOLING PUMP #3 DISCHARGE	SEAWATER	3-34-0-E	5	2580-80	SYNTHETIC RUBBER
3SW-S/W-005	SEAWATER COOLING PUMP #3 SUCTION	SEAWATER	3-34-0-E	5	2580-80	SYNTHETIC RUBBER
2SDG-F/O-001	SSDG #2 FUEL OIL FUEL OIL FILTER INLET	SSDG	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
2SDG-F/O-002	SSDG #2 FUEL OIL RETURN	SSDG	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER
2SDG-A-001	SSDG #2 L/P AIR TO LUBE OIL RESET VALVE	SSDG	3-34-0-E	3/8	2651-6	SYNTHETIC RUBBER
2SDG-A-002	SSDG #2 START AIR SUPPLY	SSDG	3-34-0-E	1 1/4	1529-20	SYNTHETIC RUBBER
2SDG-S/W-001	SSDG #2 SW COOLING INLET	SSDG	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER
2SDG-S/W-002	SSDG #2 SW COOLING OUTLET	SSDG	3-34-0-E	3	FC132-48	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
BC-HYD-015	CONTROL CONSOLE PRESSURE GAGE	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-007	HOIST SHEAVE MOTOR-BRAKE #1	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-008	HOIST SHEAVE MOTOR-BRAKE #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-005	HOIST SHEAVE MOTOR-DRAIN #1	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-006	HOIST SHEAVE MOTOR-DRAIN #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-002	HOIST SHEAVE MOTOR-IN #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-004	HOIST SHEAVE MOTOR-IN #2	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-001	HOIST SHEAVE MOTOR-OUT #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-003	HOIST SHEAVE MOTOR-OUT #2	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-011	JIB CYLINDER-LOWER #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-012	JIB CYLINDER-LOWER #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-009	JIB CYLINDER-RAISE #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER
BC-HYD-010	JIB CYLINDER-RAISE #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-013	MAIN CYLINDER-LOWER	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
BC-HYD-014	MAIN CYLINDER-RAISE	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER
MNV-HYD-004	MINE NEUTRALIZATION VEHICLE HSU HIGH PRESSURE TO RESERVOIR	AN/SLQ-48	FANTAIL	1/2	SAE100R81/2	SYNTHETIC RUBBER
MNV-HYD-005	MINE NEUTRALIZATION VEHICLE HSU LOW PRESSURE TO COMPENSATOR	AN/SLQ-48	FANTAIL	3/4	SAE100R83/4	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
MNV-HYD-006	MINE NEUTRALIZATION VEHICLE RETURN FROM VEHICLE TO HSU	AN/SLQ-48	FANTAIL	1	SAE100R81	SYNTHETIC RUBBER
MPC-HYD-025	CONTROL CONSOLE PRESSURE GAGE	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-001	HOIST SHEAVE MOTOR #1 DRAIN #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-002	HOIST SHEAVE MOTOR #1 DRAIN #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-003	HOIST SHEAVE MOTOR #1 SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-004	HOIST SHEAVE MOTOR #1 SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-005	HOIST SHEAVE MOTOR #1 SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-006	HOIST SHEAVE MOTOR #1 SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-007	HOIST SHEAVE MOTOR #2 DRAIN #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-008	HOIST SHEAVE MOTOR #2 DRAIN #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-009	HOIST SHEAVE MOTOR #2 SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-010	HOIST SHEAVE MOTOR #2 SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-011	HOIST SHEAVE MOTOR #2 SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-012	HOIST SHEAVE MOTOR #2 SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-013	JIB CYLINDER LOWER #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-014	JIB CYLINDER LOWER #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-015	JIB CYLINDER RAISE #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER

TYPICAL MHC CLASS FLEX HOSE CONFIGURATION

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE
MPC-HYD-016	JIB CYLINDER RAISE #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-017	MAIN CYLINDER LOWER	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-018	MAIN CYLINDER RAISE	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-019	SHEAVE BRAKE SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-020	SHEAVE BRAKE SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-021	SHEAVE BRAKE SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-022	SHEAVE BRAKE SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-023	SHEAVE BRAKE SUPPLY #5	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-024	SHEAVE BRAKE SUPPLY #6	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER
MPC-HYD-026	TURRET MOTOR SUCTION	MULTI PURPOSE CRANE	FANTAIL	1 1/4	2781-20	SYNTHETIC RUBBER
MPC-HYD-027	TURRET MOTOR SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER
MPC-HYD-028	TURRET MOTOR SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
MNV-HYD-001	MINE NEUTRALIZATION VEHICLE HSU HIGH PRESSURE TO RESERVOIR	AN/SLQ-48	1-34-3-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
MNV-HYD-002	MINE NEUTRALIZATION VEHICLE HSU LOW PRESSURE TO COMPENSATOR	AN/SLQ-48	1-34-3-Q	3/4	SAE100R83/4	SYNTHETIC RUBBER	CRITICAL
MNV-HYD-003	MINE NEUTRALIZATION VEHICLE RETURN FROM VEHICLE TO HSU	AN/SLQ-48	1-34-3-Q	1	SAE100R81	SYNTHETIC RUBBER	CRITICAL
FF-M/S-001	SMALL ARMS MAGAZINE SPRINKLING - INLET	FIRE FIGHTING	2-10-1-M	1/2	2651-8	SYNTHETIC RUBBER	CRITICAL
FF-M/S-002	SMALL ARMS MAGAZINE SPRINKLING - OUTLET	FIRE FIGHTING	2-10-1-M	1/2	GH793-8	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-006	UCHS CHARGE PRESSURE SWITCH	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-003	UCHS CHARGE/SERVO FILTER INLET	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-004	UCHS CHARGE/SERVO FILTER OUTLET	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-010	UCHS COMPENSATOR VENT VALVE	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-007	UCHS DIFFERENTIAL PRESSURE TRANSDUCER INLET A-1	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-008	UCHS DIFFERENTIAL PRESSURE TRANSDUCER INLET B-1	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-009	UCHS MANIFOLD RETURN	AN/SLQ-48	2-41-0-Q	3/4	SAE100R83/4	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-002	UCHS MANIFOLD TO COOLER	AN/SLQ-48	2-41-0-Q	1	SAE100R1	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-005	UCHS PRECHARGE ACCUMULATOR	AN/SLQ-48	2-41-0-Q	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-0173	UCHS RESERVOIR OUTLET	AN/SLQ-48	2-41-0-Q	1	1529-16	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-011	UCHS SHUTTLE VALVE INLET (VA)	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER	CRITICAL
UCHS-HYD-012	UCHS SHUTTLE VALVE INLET (VB)	AN/SLQ-48	2-41-0-Q	1/4	SAE100R81/4	SYNTHETIC RUBBER	CRITICAL

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
UCHS-HYD-001	UCHS SYSTEM PRESSURE GAGE	AN/SLQ-48	2-41-0-Q	1/2	2580-8	SYNTHETIC RUBBER	CRITICAL
FF-M/S-003	EXPLOSIVE SECTIONS MAGAZINE SPRINKLING - INLET	FIRE FIGHTING	2-41-0-Q	1/2	2651-8	SYNTHETIC RUBBER	CRITICAL
FF-M/S-004	EXPLOSIVE SECTIONS MAGAZINE SPRINKLING - OUTLET	FIRE FIGHTING	2-41-0-Q	1/2	2651-8	SYNTHETIC RUBBER	CRITICAL
PVSP-L/O-001	PORT LUBE OIL HEATER INLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER	CRITICAL
PVSP-L/O-002	PORT LUBE OIL HEATER OUTLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER	CRITICAL
PVSP-L/O-003	PORT LUBE OIL TRANSDUCER-PORT P1A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER	CRITICAL
PVSP-L/O-004	PORT LUBE OIL TRANSDUCER-PORT P2A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER	CRITICAL
SVSP-L/O-001	STBD LUBE OIL HEATER INLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER	CRITICAL
SVSP-L/O-002	STBD LUBE OIL HEATER OUTLET	VSP	2-46-0-E	32 MM	ARGUS 2ST32AOAO	SYNTHETIC RUBBER	CRITICAL
SVSP-L/O-003	STBD LUBE OIL TRANSDUCER-PORT P1A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER	CRITICAL
SVSP-L/O-004	STBD LUBE OIL TRANSDUCER-PORT P2A	VSP	2-46-0-E	8 MM	ARGUS 490908	SYNTHETIC RUBBER	CRITICAL
FOP-F/O-001	FUEL OIL PURIFIER - INLET	FUEL OIL PURIFER	3-27-0-E	2	2580-32	SYNTHETIC RUBBER	CRITICAL
FOP-F/O-002	FUEL OIL PURIFIER BYPASS	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER	CRITICAL
FOP-F/O-004	FUEL OIL PURIFIER HEATER INLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER	CRITICAL
FOP-F/O-005	FUEL OIL PURIFIER HEATER -OUTLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER	CRITICAL
FOP-F/O-003	FUEL OIL PURIFIER OUTLET	FUEL OIL PURIFER	3-27-0-E	1 1/2	2580-24	SYNTHETIC RUBBER	CRITICAL
1ASDG-F/O-001	SSDG #1A FUEL OIL FILTER INLET	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
1ASDG-F/O-002	SSDG #1A FUEL OIL RETURN	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
1BSDG-F/O-001	SSDG #1B FUEL OIL FILTER INLET	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
1BSDG-F/O-002	SSDG #1B FUEL OIL RETURN	SSDG	3-27-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
FOT-F/O-001	FUEL OIL TRANSFER PUMP INLET	FUEL OIL TRANSFER	3-34-0-E	3	2651-48	SYNTHETIC RUBBER	CRITICAL
FOT-F/O-002	FUEL OIL TRANSFER PUMP OUTLET	FUEL OIL TRANSFER	3-34-0-E	3	2651-48	SYNTHETIC RUBBER	CRITICAL
1MPE-F/O-001	MAIN PRPLN ENG #1 FUEL OIL FILTER INLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
1MPE-F/O-002	MAIN PRPLN ENG #1 FUEL OIL OUTLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
2MPE-F/O-001	MAIN PRPLN ENG #2 FUEL OIL FILTER INLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
2MPE-F/O-002	MAIN PRPLN ENG #2 FUEL OIL OUTLET	MAIN PROP	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
2SDG-F/O-001	SSDG #2 FUEL OIL FUEL OIL FILTER INLET	SSDG	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
2SDG-F/O-002	SSDG #2 FUEL OIL RETURN	SSDG	3-34-0-E	3/4	2580-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-015	CONTROL CONSOLE PRESSURE GAGE	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-007	HOIST SHEAVE MOTOR-BRAKE #1	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-008	HOIST SHEAVE MOTOR-BRAKE #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-005	HOIST SHEAVE MOTOR-DRAIN #1	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-006	HOIST SHEAVE MOTOR-DRAIN #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-002	HOIST SHEAVE MOTOR-IN #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
BC-HYD-004	HOIST SHEAVE MOTOR-IN #2	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-001	HOIST SHEAVE MOTOR-OUT #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-003	HOIST SHEAVE MOTOR-OUT #2	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-011	JIB CYLINDER-LOWER #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-012	JIB CYLINDER-LOWER #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-009	JIB CYLINDER-RAISE #1	BOAT CRANE	BOAT DECK	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
BC-HYD-010	JIB CYLINDER-RAISE #2	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-013	MAIN CYLINDER-LOWER	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
BC-HYD-014	MAIN CYLINDER-RAISE	BOAT CRANE	BOAT DECK	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MNV-HYD-004	MINE NEUTRALIZATION VEHICLE HSU HIGH PRESSURE TO RESERVOIR	AN/SLQ-48	FANTAIL	1/2	SAE100R81/2	SYNTHETIC RUBBER	CRITICAL
MNV-HYD-005	MINE NEUTRALIZATION VEHICLE HSU LOW PRESSURE TO COMPENSATOR	AN/SLQ-48	FANTAIL	3/4	SAE100R83/4	SYNTHETIC RUBBER	CRITICAL
MNV-HYD-006	MINE NEUTRALIZATION VEHICLE RETURN FROM VEHICLE TO HSU	AN/SLQ-48	FANTAIL	1	SAE100R81	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-025	CONTROL CONSOLE PRESSURE GAGE	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-001	HOIST SHEAVE MOTOR #1 DRAIN #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-002	HOIST SHEAVE MOTOR #1 DRAIN #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-003	HOIST SHEAVE MOTOR #1 SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-004	HOIST SHEAVE MOTOR #1 SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
MPC-HYD-005	HOIST SHEAVE MOTOR #1 SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-006	HOIST SHEAVE MOTOR #1 SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-007	HOIST SHEAVE MOTOR #2 DRAIN #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-008	HOIST SHEAVE MOTOR #2 DRAIN #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-009	HOIST SHEAVE MOTOR #2 SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-010	HOIST SHEAVE MOTOR #2 SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-011	HOIST SHEAVE MOTOR #2 SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-012	HOIST SHEAVE MOTOR #2 SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-013	JIB CYLINDER LOWER #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-014	JIB CYLINDER LOWER #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-015	JIB CYLINDER RAISE #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-016	JIB CYLINDER RAISE #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-017	MAIN CYLINDER LOWER	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-018	MAIN CYLINDER RAISE	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-019	SHEAVE BRAKE SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-020	SHEAVE BRAKE SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-021	SHEAVE BRAKE SUPPLY #3	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL

PROPOSED MHC CLASS CRITICAL FLEX HOSE LIST

HOSE NUMBER	EQUIPMENT DESCRIPTION	SYSTEM	LOCATION	SIZE	PART NUMBER	TYPE	DESIGNATION
MPC-HYD-022	SHEAVE BRAKE SUPPLY #4	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-023	SHEAVE BRAKE SUPPLY #5	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-024	SHEAVE BRAKE SUPPLY #6	MULTI PURPOSE CRANE	FANTAIL	3/8	2781-6	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-026	TURRET MOTOR SUCTION	MULTI PURPOSE CRANE	FANTAIL	1 1/4	2781-20	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-027	TURRET MOTOR SUPPLY #1	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL
MPC-HYD-028	TURRET MOTOR SUPPLY #2	MULTI PURPOSE CRANE	FANTAIL	3/4	2781-12	SYNTHETIC RUBBER	CRITICAL