DRAWING NO. SYMBOL1 | SHT. 1 | REV. 2

GENERAL SYMBOLS

LINE SYMBOLS

- PROCESS LINE
- SECONDARY PROCESS LINE
- HYDRAULIC
- PNEUMATIC SIGNAL OR UNDETERMINED SIGNAL FOR PROCESS FLOW DIAGRAM
- ELECTRICAL SIGNAL
- CAPILLARY TUBING (FILLED SYSYEM)
- HEAT TRACING
- SOFTWARE
- SONIC

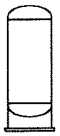
MOUNTING SYMBOLS

- LOCAL MOUNTED INSTRUMENT
- BOARD MOUNTED (MAIN CONTROL PANEL)
- BOARD MOUNTED (LOCAL PANEL)
- BOARD MOUNTED (BEHIND MAIN PANEL)
- BOARD MOUNTED (BEHIND LOCAL PANEL)
- DCS SHARED DISPLAY INDICATOR, CONTROLLER, ETC. W/OPERATOR ACCESS
- DCS SHARED DISPLAY INDICATOR, CONTROLLER, ETC. W/LIMITED OPERATOR ACCESS
- FAH / FAL – SOFTWARE ALARMS
- FR XXX – RECORDER
- INDICATOR LIGHT

ABBREVIATIONS

A/S	AIR SUPPLY
CSC	CAR SEAL CLOSED
CSC	CAR SEAL OPEN
FC	FAIL CLOSED
FO	FAIL OPEN
FL	FAIL IN LAST POSITION
NC	NORMALLY CLOSED
*	DENOTES FURNISHED W/EQUIPMENT
NV	NORMALLY VENTED
9	STREAM NUMBER

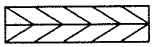
EQUIPMENT SYMBOLS

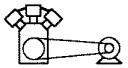

VESSEL


CONDENSER

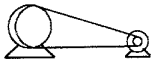

CENTRIFUGAL PUMP


ELECTRIC MOTOR

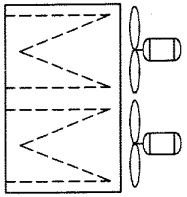

SCREW COMPRESSOR


RECIPROCATING COMPRESSOR


OIL TRAP


ROTARY VANE COMPRESSOR


BLOWER


EVAPORATOR

COMPONENT SYMBOLS

- RUPTURE DISK
- TEST INSERT
- TEMPORARY STRAINER (CONE TYPE)
- STRAINER (Y-TYPE)
- STRAINER (BASKET TYPE)
- STRAINER (T-TYPE)
- DRAIN HUB
- FLAME ARRESTOR
- COUPLING W/PLUG
- EXPANSION JOINT
- SAMPLE CONNECTION
- FLEXIBLE HOSE
- HOSE COUPLING
- LINE INSULATION (3)
- LINE INSULATION W/ELECTRICAL TRACE
- UNION
- LINE REDUCER
- LINE CAP
- BREAK OUT FLANGES
- STEAM TRAP (T)
- DIAPHRAM SEAL
- JACKET

SELF-ACTUATED VALVES

- SELF CONTAINED REGULATOR
- TEMPERATURE CONTROL VALVE
- RELIEF VALVE

VALVE SYMBOLS

- GATE VALVE
- BALL VALVE
- GLOBE VALVE
- PLUG VALVE
- CHECK VALVE
- THREE-WAY VALVE
- FOUR-WAY VALVE
- ANGLE VALVE
- BUTTERFLY VALVE
- NEEDLE VALVE
- EXCESS FLOW VALVE
- PHILLIPS VALVE

ACTUATOR SYMBOLS

- DIAPHRAGM
- SINGLE ACTING PISTON
- MOTOR
- DIGITAL
- SOLENOID
- VANE
- SPRING RETURN, PRESSURE RELIEF OR SAFETY VALVES ONLY
- ELECTRO HYDRAULIC ACTUATOR
- HANDWHEEL

MISCELLANEOUS SYMBOLS

- SP XXX – SPECIALTY ITEM
- LINE CONTINUATION
- A – TO ATMOSPHERE

REV.	DESCRIPTION	BY	DATE	CHK'D	APP'D

DWG. STATUS: PRELIM / BID / CONSTR. / AS BUILT

	CHECKED BY	CHECKED DATE	APPROVED BY	APPROVED DATE

APE: W. O.:

CONSTRUCTION BY / DATE

DESIGN

DRAWN

UPDATE DATE: 2/07/01
CAD FILE NO.: SYMBOL1
SCALE: NONE

DRAWING NUMBER: SYMBOL1
SHT. 1 OF 2