

MOTOR CONTROLLER

GENERAL INFORMATION

The SMC 505 series is applied to the automatic changeover system. In this system, 2 or 3 motors are monitored their operations and the controllers communicate with each other, and in case some trouble occurs to the running motor, pressure or control system, the stand-by motor starts automatically and runs instead of the running motor or parallel with running motor.

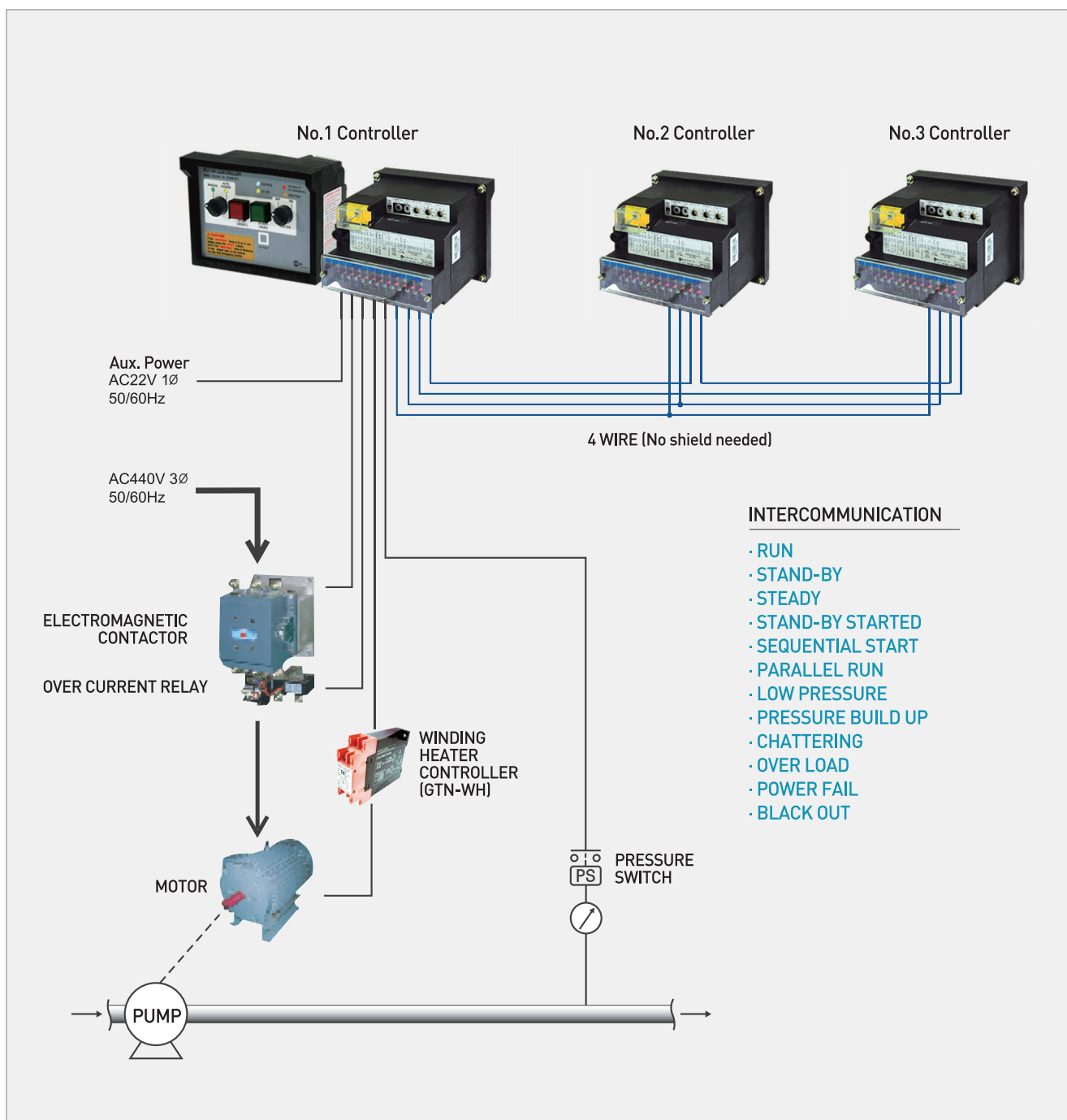
As the major point, SMC 505 series has common circuit to 2 or 3 stand-by, so design and maintenance can be done economically. And it has interlock device and auto-changeover function (by 4 wires hardware intercommunication function between running, stand-by and steady state which is not under influence of noise.) for various abnormal conditions.

As a result, SMC 505 series can expansively applied to the special function.

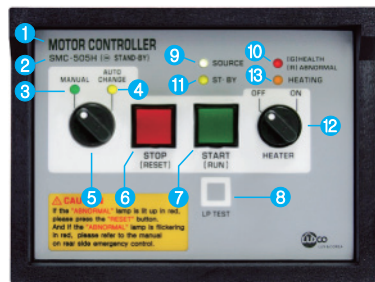
And also, it has sequential start function (UVP / UVR), self diagnosis, alarm signal output, remote control and manual emergency control function.

Note.) Refer to the technical manual to see the detail description of function.

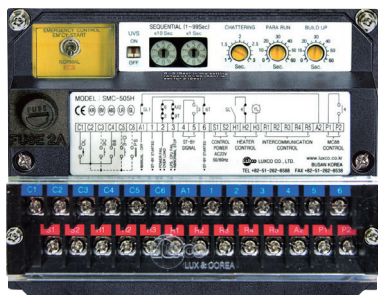
SYSTEM LAYOUT



SMC-505H



REAR VIEW



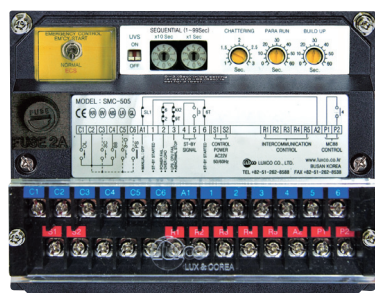
SIDE VIEW



SMC-505



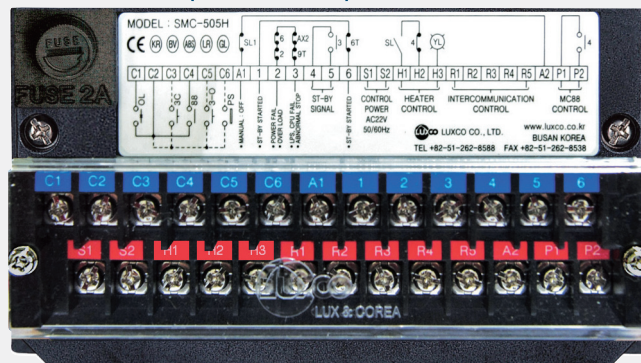
REAR VIEW



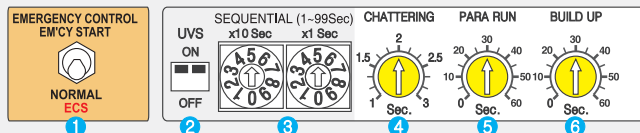
FRONT VIEW LAYOUT

- 1 NAME OF PRODUCT MOTOR CONTROLLER
- 2 MODEL NAME SMC-505 OR 505H
- 3 MANUAL MODE INDICATOR LIGHT UP IN GREEN
- 4 AUTO CHANGE MODE INDICATOR LIGHT UP IN YELLOW
- 5 MANUAL/ AUTO CHANGE SWITCH Ø18 SELECTOR SWITCH
- 6 STOP BUTTON 18 x 18 RED
- 7 START BUTTON WITH LAMP 18 x 18 GREEN
- 8 LAMP TEST BUTTON TACT SWITCH
- 9 SOURCE INDICATOR LIGHT UP IN WHITE
- 10 CONDITION INDICATOR DUAL COLOR LED
- HEALTH : LIGHT UP IN GREEN
- ABNORMAL :
① LIGHT UP STEADILY IN "RED" WITH ALARM SIGNAL OUTPUT.(SYSTEM ABNORMAL)
② FLICKERING IN "RED" WITH ALARM SIGNAL OUTPUT.(SELF DIAGNOSIS SYSTEM : CPU FAIL)
- 11 STAND-BY INDICATOR LIGHT UP IN YELLOW
- 12 HEATER SWITCH Ø18 SELECTOR SWITCH
- 13 HEATING INDICATOR LIGHT UP IN ORANGE

T.B LAYOUT (SMC-505H)

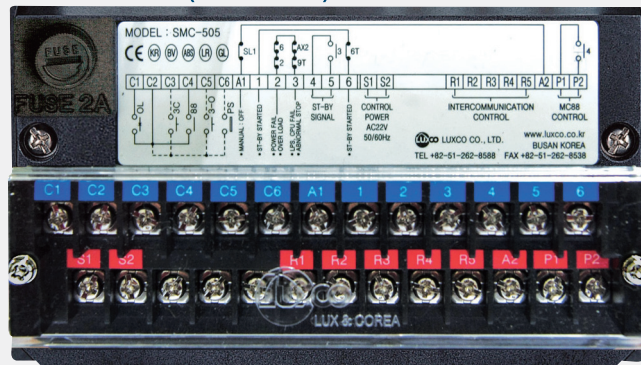


PRE. SET (SWITCH & TIMER) (SMC-505 & 505H)



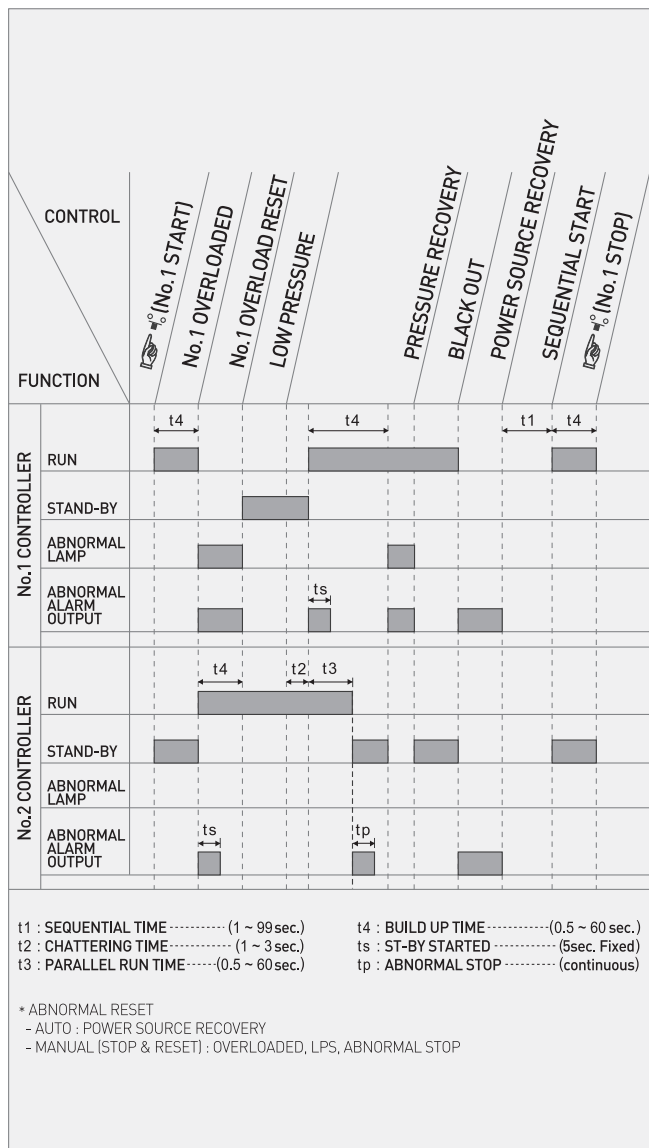
- 1 ECS SWITCH EM'CY START BY TOGGLE SWITCH
- 2 UVS SWITCH SEQUENTIAL START BY DIP SWITCH
UVR - UNDER VOLTAGE RELEASE : (SEQUENTIAL START ACTION)
UVS SET "ON" POSITION
UVP - UNDER VOLTAGE PROTECTION : (NO SEQUENTIAL START ACTION)
UVS SET "OFF" POSITION
- 3 SEQUENTIAL TIMER 1-99 SEC. ADJUSTABLE BY DIGITAL SWITCH
0-1 (SEC.) IN THE SETTING RANGE OF 0-99 (SEC.) IS SET FOR 1(SEC.)
- 4 CHATTERING TIMER 1-3 SEC. ADJUSTABLE BY V / R
- 5 PARA RUN TIMER 0.5-60 SEC. ADJUSTABLE BY V / R
- 6 BUILD UP TIMER 0.5-60 SEC. ADJUSTABLE BY V / R

T.B LAYOUT (SMC-505)

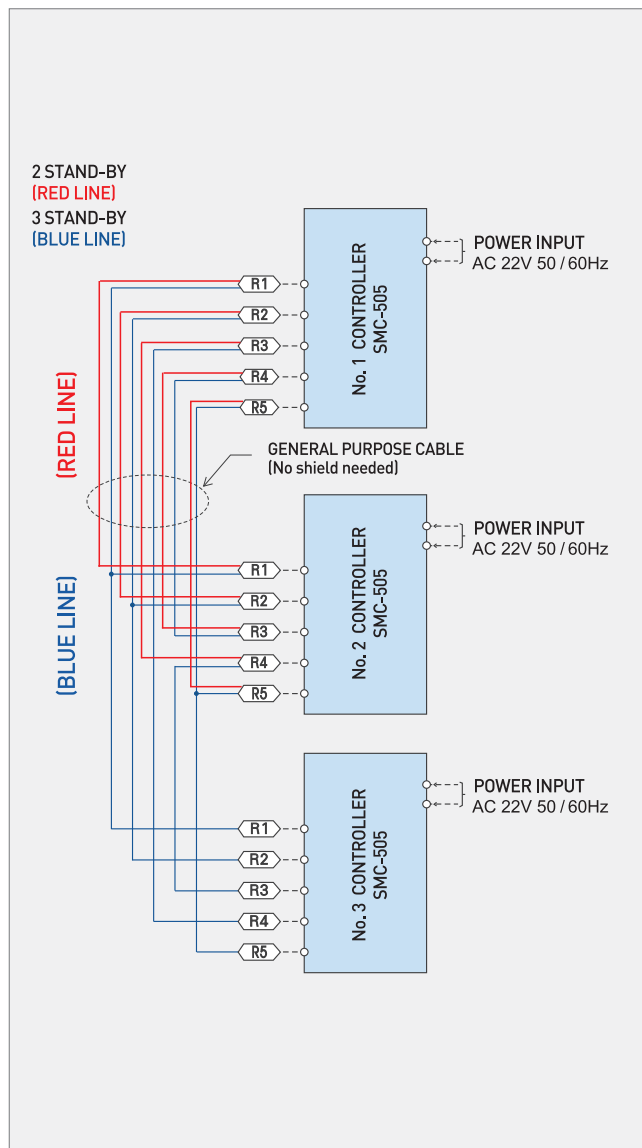


MOTOR CONTROLLER

FUNCTION TIMING FLOW CHART FOR 2 STAND-BY



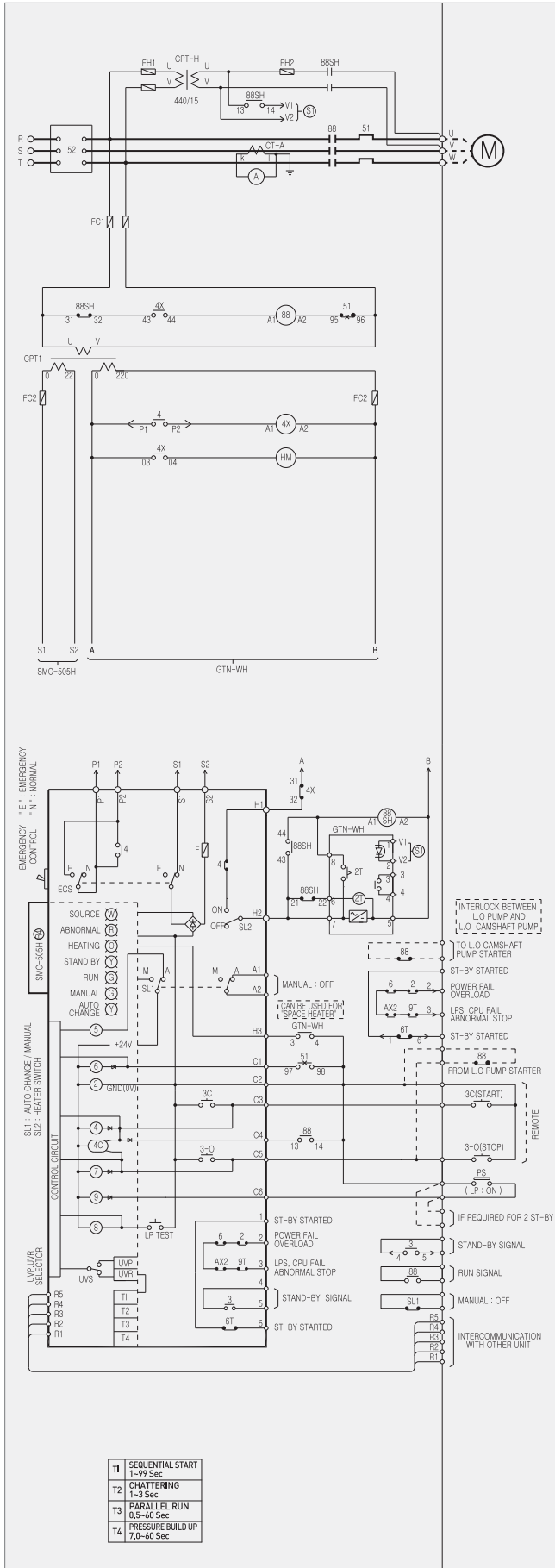
TRANSMISSION / RECEIPT WIRING DIAGRAM



FUNCTION TABLE

MODE			CONDITION		
No.1 STARTER	No.2 STARTER	No.3 STARTER	No.1 MOTOR	No.2 MOTOR	No.3 MOTOR
AUTO CHANGE	AUTO CHANGE	AUTO CHANGE	RUN	STAND-BY	STEADY
			STEADY	RUN	STAND-BY
			STAND-BY	STEADY	RUN
			RUN	ABNORMAL	STAND-BY
			STAND-BY	RUN	ABNORMAL
			ABNORMAL	STAND-BY	RUN
			RUN	RUN	STAND-BY
			STAND-BY	RUN	RUN
AUTO CHANGE	AUTO CHANGE	MANUAL or EMERGENCY CONTROL	RUN	STAND-BY	
			STAND-BY	RUN	
MANUAL or EMERGENCY CONTROL	AUTO CHANGE	AUTO CHANGE		RUN	STAND-BY
				STAND-BY	RUN
AUTO CHANGE	MANUAL or EMERGENCY CONTROL	AUTO CHANGE	STAND-BY		RUN
			RUN		STAND-BY

SMC-505H CONNECTION DIAGRAM



SMC-505 CONNECTION DIAGRAM

