

**4 x 7 DAY TIME SWITCH
c/w INDIVIDULE AHR I/P's**

+ common 365 DAY HOLIDAY OFF override



240v AC POWERED

24V VERSION AVAILABLE

VOLTAGE FREE RELAY OUTPUTS

- **PRE-PROGRAMMED as 4 CHANNEL 7 DAY TIME SW. with HOLIDAY OFF OVERRIDE**
- **12 PROGRAMMABLE HOLIDAY BLOCK DATES (individual days or group of days)**
- **INDIVIDULE AFTER HOURS PUSH BUTTON INPUTS (AHR up to 99hrs run time)**
- **HOLIDAYS CAN BE SET FOR ONCE OFF OR REPEAT EACH YEAR (ie CHISTMAS)**
- **COMMON HOLIDAY OFF OVERRIDE FUNCTION INTERLOCKABLE WITH EACH OF THE FOUR TIME SWITCHES.**
- **INDIVIDULE TIME SWITCHES CAN BE SET FOR MULTIPLE ON/OFF's EACH DAY**
- **PLAIN ENGLISH SCROLLING LCD DISPLAY SHOWING OUTPUT & HOLIDAY STATUS**
- **EXISTING HOLIDAY PROGRAM DATE INFORMATION AVAILABLE ON LCD SCREEN**
- **TOGGLE ON / TOGGLE OFF AHR FUNCTION.**
- **DIN RAIL MOUNT, SUITS M.C.B ENCLOSURES**
- **OUTPUT RELAYS ARE POTENTIAL FREE & RATED AT 240v 10A (res.)**
- **MANUAL ALL ON & OFF KEYBOARD FACILITY (WILL AUTO RETURN TO AUTO AFTER 99HRS)**

This pre-programmed Siemens Logo PLC has been programmed for use as a 4 channel 7 day Time Switch with independent output voltage free relays (240v rated). Each time switch channel has its own multi on/off per day, 7 days a week time switch setting schedule plus individual after hours push button inputs. 12 Holiday Start / Finish blocks (single day or block of days ..ie easter) can be programmed as a common off HOLIDAY override to override any or all of the four time switches but are still able to individually triggered on by the their independent AHR inputs. The 4 time switches are each preset to operate Monday to Friday from 08:00 (8 am) till 17:30 (5:30pm), & the after hour timers preset for 2 hours operation, but all settings are user adjustable via the keypad onsite. Two of the PLC keyboard buttons have been assigned as Master Manual all ON & OFF buttons, but if left in Manual returns to Auto time switch control after 99 hours if not toggled back to Auto control by again pressing the PLC fascia button.

OPERATIONAL NOTES :

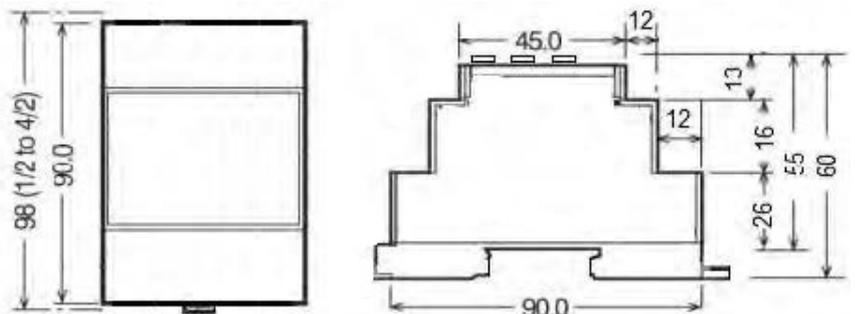
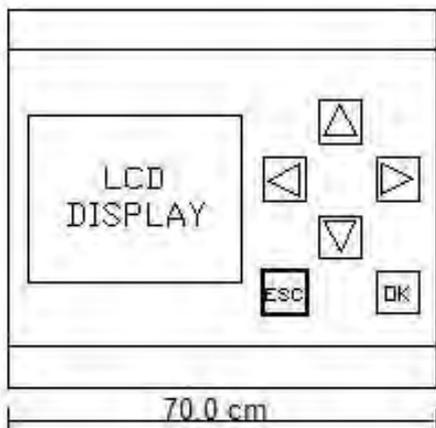
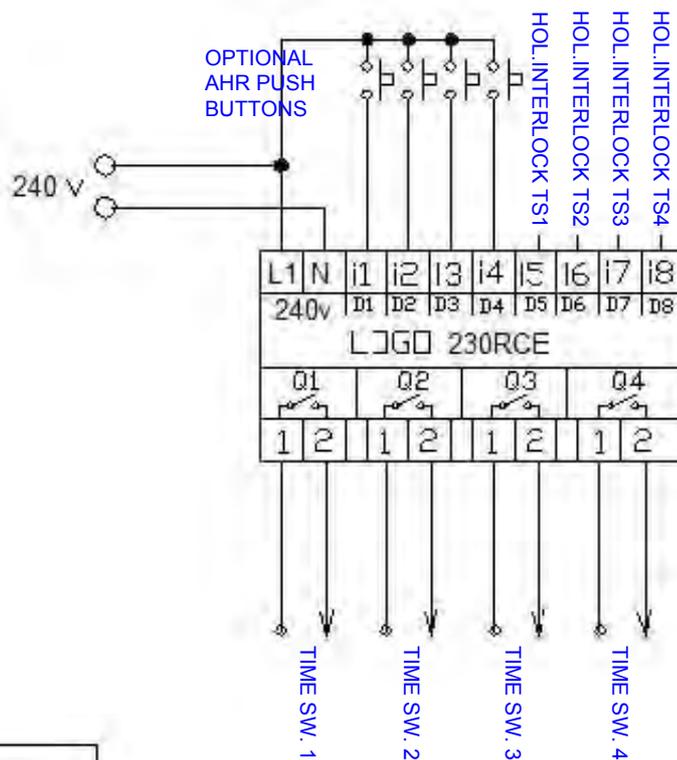
THE FOUR INTERNAL 7 DAY TIME SWITCHES CAN BE INDIVIDULLY INTERLOCKED TO NOT RESPOND TO THE COMMON HOLIDAY OFF OVERRIDE SCHEDULE. FITTING A LINK FROM "P1" TO i5, i6, i7 or i8 DISABLES THAT RELATIVE TIME SWITCH INTERLOCK TO THE COMMON HOLIDAY PROGRAM, ie: IF TIME SWITCH 4 IS USED FOR EXAMPLE TO ENABLE SECURITY LIGHTING AND IS TO ONLY OPERATE AS PER ITS 7 DAY TIME SWITCH PROGRAM AND NOT TO BE OVERRIDEN OFF BY THE HOLIDAY PROGRAM, A LINK SHOULD BE FITTED BETWEEN TERMINALS P1 & i8.

THE FOUR INDEPENDANT TIME SWITCH AFTER HOUR PUSH BUTTON INPUTS CAN BE LOOPED TO OPERATE FROM A COMMON SINGLE PUSH BUTTON OR ANY COMBINATION THAT IS REQUIRED.

PLC CONTROL PANEL



- PRESS + MANUAL ALL ON
- PRESS + MANUAL ALL OFF
- PRESS + ENERGISE BACK LIGHT
- PRESS + DISPLAY PROGRAMMED HOLIDAYS



HOW TO EDIT SETTINGS IN THE SIEMENS LOGO



THIS PRODUCT BEING A PRE PROGRAMMED PLC, ACCESS TO EDITABLE SETTINGS IS VIA ACCESSING DATA IN INTERNAL PROGRAM MEMORY LOCATIONS. TO EDIT VALUES -FOLLOW THE PROCEDURE BELOW.

FROM THE CURRENT DISPLAYED RUNNING SCREEN PRESS THE **DOWN** ARROW BUTTON UNTIL THE LAST SCREEN APPEARS SHOWING JUST THE **TIME & DATE** AS SHOWN IN THE NEXT SCREEN SHOT BELOW.



NOW PRESS THE **ESC** BUTTON TO CAUSE THE 1ST INTERNAL MENU SCREEN TO APPEAR.



"PROGRAM"

USE THE **DOWN** BUTTON TO HIGHLIGHT "**PROGRAM**", THEN PRESS **OK**, THE SCREEN BELOW WILL APPEAR.

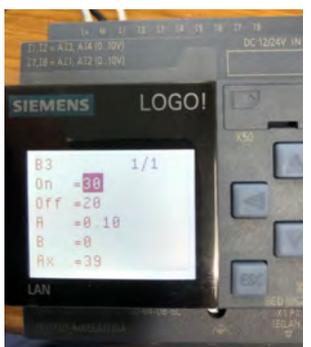


"SET PARAMETER"

PRESS **OK** ON THE ALREADY HIGHLIGHTED "**SET PARAMETER**" AND A THE LIST OF USED INTERNAL PROGRAM BLOCKS IS DISPLAYED STARTING AT "**B001**" (OR **NAMES** IF BLOCKS HAVE BEEN TAGGED ie "EASTER").



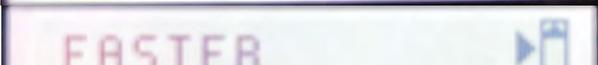
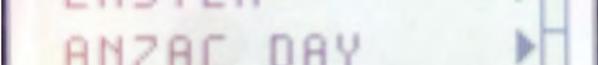
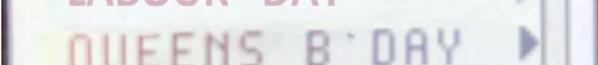
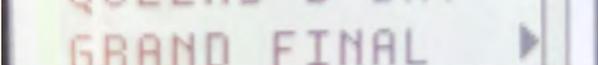
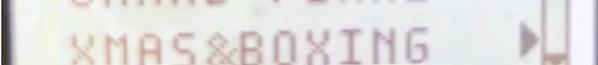
SCROLL DOWN THE PARAMETER LIST USING THE **DOWN** BUTTON TO THE LOGIC BLOCK THAT NEEDS EDITING . SEE ATTACHED LIST OF LOGIC BLOCKS WITH PARTICULAR SETTINGS THAT MAY NEED ADJUSTING TO SUIT SITE CONDITIONS ETC.



USE THE **UP** OR **DOWN** BUTTONS TO HIGHLIGHT THE PARTICULAR PARAMETER REQUIRING EDITING. PRESS THE **OK** BUTTON, THEN EDIT THE VALUE USING THE **UP, DOWN, LEFT & RIGHT** BUTTONS AS REQUIRED TO SET THE NEW VALUE, PRESS **OK** TO LOCK IN NEW VALUE, THEN PRESS **ESC** TO EXIT EDITING & / OR TO MOVE TO ANOTHER PARAMETER TO EDIT & REPEAT.

TO RETURN TO THE NORMAL RUNNING SCREEN, PRESS **ESC** UNTIL ONLY THE TIME & DATE SCREEN IS DISPLAYED, THEN PRESS THE **UP** BUTTON UNTIL THE DISPLAYED SCREEN NO LONGER CHANGES, THIS RETURNS THE LOGO TO ITS NORMAL DISPLAY & OPERATION.

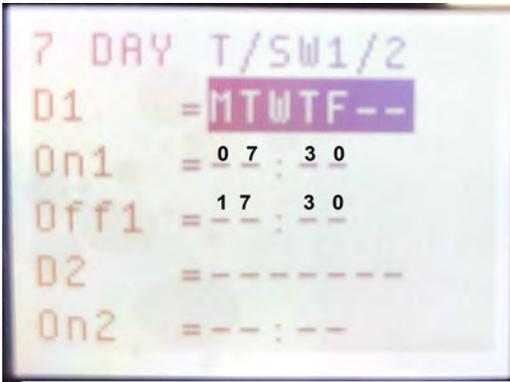
4 CHANNEL TIME SWITCH EDITABLE PARAMATER LIST

<u>LOGIC BLOCK</u>	<u>LCD SCREENS SHOWING BLOCK # OR TAG</u>	<u>USE</u>
B001		HOLIDAY 1
B002		HOLIDAY 2
B003		HOLIDAY 3
B004		HOLIDAY 4
B005		HOLIDAY 5
B006		HOLIDAY 6
(B007)		HOLIDAY 7
(B008)		HOLIDAY 8
(B009)		HOLIDAY 9
(B010)		HOLIDAY 10
(B011)		HOLIDAY 11
(B012)		HOLIDAY 12
(B013)		7 DAY TIME SW.
(B014)		AHR 1 TIMER
(B015)		AHR 2 TIMER
(B016)		AHR 3 TIMER
(B017)		AHR 4 TIMER
B018		N/A

OTHER N/A LOGIC BLOCKS NOT SHOWN

NOTE : IF A HOLIDAY MEMORY BLOCK LOCATION (B001 - B012) IS NOT USED, LEAVE BOTH ON & OFF DATES SET TO 2000-01-01

EXAMPLE LCD SCREENS FOR EDITING 7 DAY TIME SWITCH 1



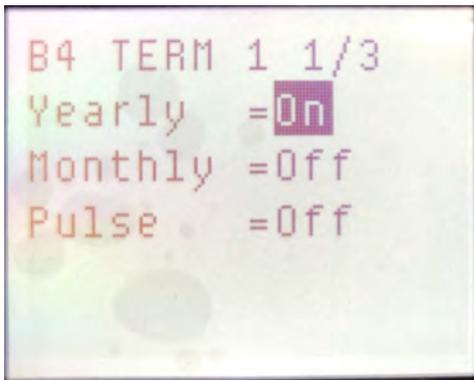
HIGHLIGHT "D1" TO SET WHICH DAYS OF THE WEEK ARE TO BE CONTROLLED BY THIS PARTICULAR INTERNAL TIME SWITCH, USE UP, DOWN, LEFT & RIGHT BUTTONS TO SELECT DAYS ("-" = DISABLED DAY).

SCROLL DOWN TO "On1" USING DOWN BUTTON TO HIGHLIGHT ON (START) TIME, PRESS OK, THEN USING UP,DOWN, LEFT & RIGHT BUTTONS SET REQUIRED TIME. REPEAT FOR "Off1" OFF (FINISH) TIME. 3 ON/OFF'S CAN BE SET PER DAY IF REQUIRED.

PRESS THE "ESC" BUTTON TO RETURN TO THE PROGRAM BLOCK LIST TO EDIT ANOTHER BLOCK OR REPEATEDLY PRESS "ESC" TO EXIT THE EDITING SCREENS & RETURN TO NORMAL DISPLAY & OPERATION.

EXAMPLE LCD SCREENS FOR EDITING HOLIDAYS

LOGIC BLOCK B001 TAGGED & DISPLAYED AS "B4 TERM 1" IN THIS EXAMPLE



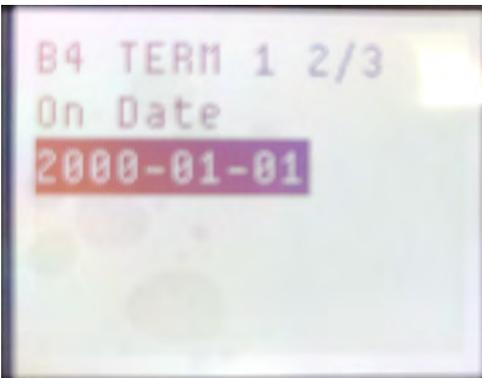
BLOCK TAG (LABEL) & page #

YEARLY ON = REPEATS EACH YEAR YEARLY

OFF = DOES NOT REPEAT YEARLY

MONTHLY ON = REPEATS EACH MONTH

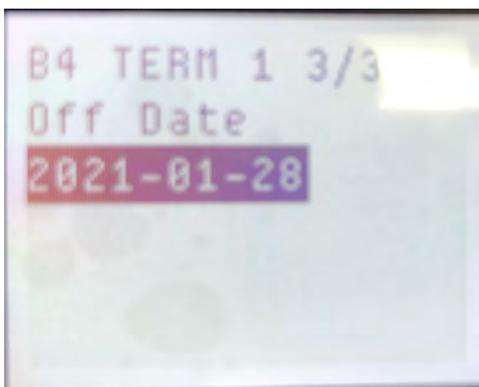
MONTHLY OFF = DOES NOT REPEAT MONTHLY



START DATE OF HOLIDAY

(YEAR / MONTH / DAY of MONTH)

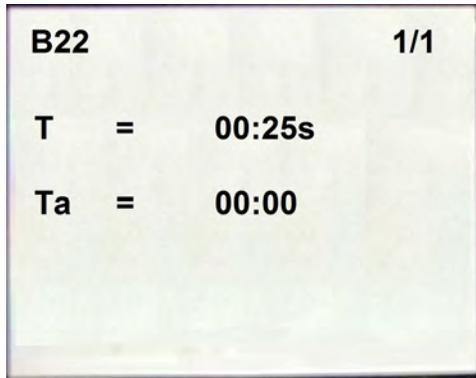
NOTE : IF SINGLE DAY HOLIDAY SET ON DATE AS HOLIDAY DATE, SET OFF DATE AS NEXT DAY DATE. IF BLOCK OF DAYS SET ON DATE AS 1ST HOLIDAY DATE & OFF DATE AS DAY AFTER LAST HOLIDAY DATE.



END DATE OF HOLIDAY

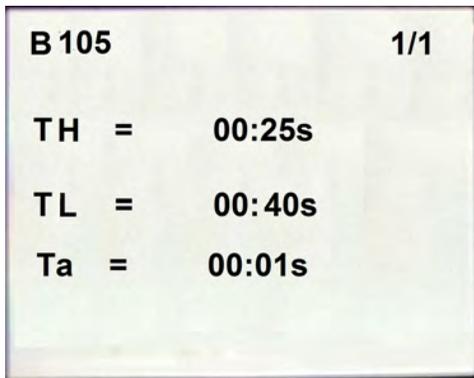
(SET TO DATE AFTER HOLIDAY)

EXAMPLE LCD SCREENS FOR EDITING **ON** or **OFF** DELAY TIMERS



HIGHLIGHT THE "T" VALUE USING THE UP, DOWN, LEFT, RIGHT & OK BUTTONS TO SET REQUIRED VALUE. PRESS THE "ESC" BUTTON TO RETURN TO THE PROGRAM BLOCK LIST . REPEATEDLY PRESS "ESC" TO EXIT THE EDITING SCREENS & RETURN TO NORMAL DISPLAY & OPERATION.

EXAMPLE LCD SCREENS FOR EDITING DELAY **ON**+**OFF** TIMERS



EDIT TH FOR THE ON DELAY SETTING &
TL FOR THE OFF DELAY SETTING