

| Designation                                                                        | Qty      | Description                                                                                                         |
|------------------------------------------------------------------------------------|----------|---------------------------------------------------------------------------------------------------------------------|
| BAT1                                                                               | 1        | MPD BK 890                                                                                                          |
| C1                                                                                 | 1        | 72pF ±20% 50V X7R Ceramic Capacitor<br>Murata GRM32ER70A222K4001X                                                   |
| C3, C4, C5, C7, C8, C9, C11, C12, C13, C14, C40, C42, C43, C47, C49, C51, C52, C58 | 18       | 0.1uF 10, 25V ceramic capacitor (0603)<br>Kemet C0603C104K5RAC                                                      |
| C3, C6, C10, C17, C18, C28, C37, C39, C41, C44, C53                                | 11       | 1uF 10, 16V ceramic capacitor (0603)<br>Kemet C0603C1E106K5RAC                                                      |
| C15, C16                                                                           | 2        | 4.7uF ±20% 50V X7R ceramic capacitor (1206)<br>Murata GRM32ER70A475A122X                                            |
| C19, C20                                                                           | 2        | 120pF ±10% 25V ceramic capacitor (1210)<br>Murata GRM32ER70E120K152                                                 |
| C21, C22                                                                           | 2        | 17nF ±10% X7R 50V ceramic cap (0603)<br>Kemet C0603C277K5RAC                                                        |
| C23                                                                                | 1        | 10pF ±5% 50V COG, NPO Ceramic Capacitor (0603)<br>Murata GRM32ER70E10J50A010                                        |
| C24                                                                                | 1        | 10pF ±5% 50V COG, NPO Ceramic Capacitor (0603)<br>Murata GRM32ER70E10J50A010                                        |
| C25, C26                                                                           | 2        | 3.9pF ±10% 25V X7R Ceramic Capacitor (0603)<br>Murata GRM32ER70E390A010                                             |
| C27                                                                                | 1        | 2.2uF ±10% 100V X7R Ceramic Capacitor (1210)<br>Murata GRM32ER70A222K4001X                                          |
| C29, C36, C38                                                                      | 3        | 4.7nF ±10% 25V X7R Ceramic Capacitor (1210)<br>Murata GRM32ER70E479K01X                                             |
| C30, C31, C32, C34                                                                 | 4        | 10pF ±10% 10V X7R Ceramic Capacitor (1206)<br>Murata GRM32ER70E100K5RAC                                             |
| C32, C35                                                                           | 2        | 1000pF ±10% 16V X7R Ceramic Capacitor (0603)<br>Murata GRM32ER70E1000K5RAC                                          |
| C46, C48, C50                                                                      | 3        | 4.7uF ±10% 16V X7R Ceramic Capacitor (0805)<br>Murata GRM32ER70E475A122X                                            |
| C48, C54, C55, C56, C57                                                            | 5        | 10uF ±10% 25V X7R Ceramic Capacitor (1206)<br>Murata GRM32ER70E100K5RAC                                             |
| C59                                                                                | 1        | 0.47uF 10% 25V X7R Ceramic Capacitor (0603)<br>Murata GRM32ER70E475A122X                                            |
| D1                                                                                 | 1        | DIODE SCHOTTKY 20V 500MA SOD323P<br>NXP PMEG4005E4114                                                               |
| D2                                                                                 | 1        | DIODE SCHOTTKY 40V 500MA SOD123P<br>NXP PMEG4005E4115                                                               |
| D3, D4, D5, D6, D7, D8                                                             | 6        | LED GREEN 0.6W 0.603 SMD<br>OSRAM LEL148-G231-26-X                                                                  |
| D9, D10                                                                            | 2        | DIODE ARRAY SCHOTTKY 30V 6TSSOP<br>NXP BAT76L115                                                                    |
| F1                                                                                 | 1        | PTC RESETTABLE 12A 30V 1206<br>Bourns HE-100M50-2                                                                   |
| H1, H3                                                                             | 2        | 8 Positions Header, Unshrouded, Breakaway Connector 0.100" (2.54mm) Through Hole Gold<br>Sullins PBC085AAN          |
| H2                                                                                 | 1        | 6 Positions Header, Unshrouded, Breakaway Connector 0.100" (2.54mm) Through Hole Gold<br>Sullins PBC065AAN          |
| H4                                                                                 | 1        | 10 Positions Header, Unshrouded, Breakaway Connector 0.100" (2.54mm) Through Hole Gold<br>Sullins PBC105AAN         |
| H5                                                                                 | 1        | CONNECTOR, FEMALE, THROUGH HOLE; SSQ SERIES; 0.025IN SQ POST SOCKET, RIGHT ANGLE; 6PINS<br>Samtec SSQ-106-02-L-S-RA |
| J1                                                                                 | 1        | CONN PWR JACK 2.1X5.5MM HIGH CUR<br>Molex 21-01-01-01                                                               |
| J2                                                                                 | 1        | CONN MOD JACK 6P6C R/A UNSHLD<br>TE Connectivity 955166-1                                                           |
| JP1                                                                                | 1        | CONN HEADER 3POS 100' SNGL GOLD<br>Samtec TSW-103-03-G-R                                                            |
| K1, K8                                                                             | 8        | RELAY GEN PURPOSE SPDT 10A 5V<br>Panasonic JSL5V-F                                                                  |
| K9, K11                                                                            | 2        | RELAY GENERAL PURPOSE SPDT 1A 5V<br>TE Connectivity 120202C1001B001                                                 |
| L1                                                                                 | 1        | 22uH<br>Coilcraft LPS6225-223MR                                                                                     |
| L2                                                                                 | 1        | 25uH<br>Coilcraft LPS6225-253MR                                                                                     |
| L3                                                                                 | 1        | FIXED IND 100uH 520MA 890 MOHM<br>Wals 7400893140                                                                   |
| N1                                                                                 | 1        | MCU8PST N-CH 60V 230MA SOT-23<br>Infineon BSS138N-BS27XTSA2                                                         |
| Q1                                                                                 | 1        | TRANS NPN 40V 0.1A SOT-323<br>NXP BC847CDA2                                                                         |
| R1, R2                                                                             | 2        | RES SMD 5.3K OHM 5% 1/10W (0603)<br>ANY ANY                                                                         |
| R3, R4                                                                             | 2        | RES SMD 4.7K OHM 5% 1/10W (0603)<br>ANY ANY                                                                         |
| R5                                                                                 | 1        | RES SMD 49.9K OHM 5% 1/10W (0603)<br>ANY ANY                                                                        |
| R6, R7, R9, R40                                                                    | 4        | RES SMD 10K OHM 5% 1/10W (0603)<br>ANY ANY                                                                          |
| R10, R11, R22                                                                      | 3        | RES SMD 3.3M OHM 1% 1/10W (0603)<br>ANY ANY                                                                         |
| R12, R13, R23                                                                      | 3        | RES SMD 274K OHM 1% 1/10W (0603)<br>ANY ANY                                                                         |
| R14                                                                                | 1        | RES SMD 2.7K OHM 5% 1/10W (0603)<br>ANY ANY                                                                         |
| R15, R29                                                                           | 1        | RES SMD 1.8K OHM 5% 1/10W (0603)<br>ANY ANY                                                                         |
| R16                                                                                | 1        | RES SMD 121K OHM 1% 1/10W (0603)<br>ANY ANY                                                                         |
| R17                                                                                | 1        | RES SMD 82.5K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R18                                                                                | 1        | RES SMD 16.9K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R19                                                                                | 1        | RES SMD 15.2K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R20, R27                                                                           | 2        | RES SMD 60.4K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R21                                                                                | 1        | RES SMD 41.2K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R24                                                                                | 1        | RES SMD 499K OHM 1% 1/10W (0603)<br>ANY ANY                                                                         |
| R25                                                                                | 1        | RES SMD 40.2K OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R8, R26                                                                            | 1        | RES SMD 100K OHM 1% 1/10W (0603)<br>ANY ANY                                                                         |
| R28                                                                                | 1        | RES SMD 5.1K OHM 5% 1/10W (0603)<br>ANY ANY                                                                         |
| R30                                                                                | 1        | RES SMD 620 OHM 5% 1/10W (0603)<br>ANY ANY                                                                          |
| R31                                                                                | 1        | RES SMD 150 OHM 5% 1/10W (0603)<br>ANY ANY                                                                          |
| R32                                                                                | 1        | RES SMD 100 OHM 1% 1/10W (0603)<br>ANY ANY                                                                          |
| R33                                                                                | 1        | RES SMD 0.249 OHM 1% 1/10W (0603)<br>ANY ANY                                                                        |
| R34                                                                                | 1        | RES SMD 620 OHM 5% 1/10W (0603)<br>ANY ANY                                                                          |
| R37, R35                                                                           | 2        | RES SMD 1K OHM 1% 1/10W (0603)<br>ANY ANY                                                                           |
| R36, R38                                                                           | 2        | RES SMD 1M OHM 1% 1/10W (0603)<br>ANY ANY                                                                           |
| R39                                                                                | 1        | RES SMD 349 OHM 0.1% 1/10W (0603)<br>ANY ANY                                                                        |
| R0                                                                                 | 1        | RES SMD 0 OHM 1% 1/4W (0805)<br>ANY ANY                                                                             |
| SW1                                                                                | 1        | Toggle Switch SPST NO Thru Acluated Surface Mount<br>E-Switch 11-20042-100-1                                        |
| TB1, TB8                                                                           | 8        | CONN TERM BLOCK 3POS 5.0MM<br>Phoenix 1352709                                                                       |
| TB9                                                                                | 1        | PC TERM BLOCK 5MM 12POS GREEN<br>Phoenix 1356069                                                                    |
| TB10                                                                               | 1        | CONN TERM BLOCK 3POS 3.5MM<br>Phoenix 1359239                                                                       |
| TB11                                                                               | 1        | CONN TERM BLOCK 2POS 5.0MM<br>Phoenix 1356776                                                                       |
| TB12, TB13                                                                         | 2        | CONN TERM BLOCK 2POS 3.5MM<br>Phoenix 1356669                                                                       |
| U1                                                                                 | 1        | IC LVL XLTR LV 8MBPS 14-TSSOP<br>MAX3232EELC                                                                        |
| U2                                                                                 | 1        | IC LVL XLTR LV 8MBPS 8TDFN<br>MAX3232EELAT                                                                          |
| U3                                                                                 | 1        | TVS DIODE ESDPN<br>MAX3232EELAT                                                                                     |
| U4                                                                                 | 1        | IC LVL XLTR LV 8MBPS 14-TSSOP<br>MAX3232EELC                                                                        |
| U5                                                                                 | 1        | IC MASTER I2C-14WRK 1CH 8DFN<br>DS94B42HJ                                                                           |
| U6                                                                                 | 1        | IC RTC CLK/CALENDAR I2C 8-SOIC<br>DS92ZM02                                                                          |
| U7                                                                                 | 1        | IC RELAY DRIVER BCHAN 20-TQFN<br>MAX9292C19                                                                         |
| U8                                                                                 | 1        | IC REG BCK ADJ 1A DL SYNC 8-TQFN<br>MAX1324AD                                                                       |
| U9                                                                                 | 1        | IC REG BUCK ADJ 0.3A SYNC 8-TQFN<br>MAX1324C1AT                                                                     |
| U10                                                                                | 1        | IC REG LDO 5V 0.1A 8TDFN<br>MAX5951AAT                                                                              |
| U11                                                                                | 1        | IC REG LDO 3.3V 0.1A 8TDFN<br>MAX5951BATA                                                                           |
| U12                                                                                | 1        | IC REG SWTCHD CAP INV ADJ 8SOIC<br>MAX987TSC4                                                                       |
| U13                                                                                | 1        | IC ADC 800KSPS 40TQFN<br>MAX130003L                                                                                 |
| U14                                                                                | 1        | IC OPAMP GP 1MHz RRIO BUMAX<br>MAX4445AUA                                                                           |
| U15                                                                                | 1        | IC EEPROM 1KBIT 8TDFN<br>DS94C02TAR                                                                                 |
| NA                                                                                 | 6        | SWTSD Reel-Fast Surface Mount Spacer<br>PEM 18MTSD-440-12-ET                                                        |
| PCB                                                                                | 1        | PC Board MARKED 0.025 Building Automation Shield                                                                    |
| Pack-out                                                                           | 6        | MACHINE SCREEN PAN PHILLIPS 4-40<br>B&E Fastenal Supply PMSSS 446 0025 P4                                           |
| Pack-out                                                                           | 6        | BUMPER CYLINDRICAL 0.5" DIA BLK<br>Knudsen 720                                                                      |
| Pack-out                                                                           | 1        | 24VDC Wall Adapter<br>AT2524-14000000-14-01                                                                         |
| Pack-out                                                                           | 1        | MOD CORD REVERSED 6-6 BLACK 7'<br>AIGW09VAT-5-26-6589-7H                                                            |
| Pack-out                                                                           | 1        | BOX=3, 34X3, 34X15X16 WFOAM                                                                                         |
| Pack-out                                                                           | 0.000192 | LABEL= 0.75 X 2.0                                                                                                   |
| Pack-out                                                                           | 0.001157 | TAPE=ESD TRANSPARENT 3"X1"X12"V0                                                                                    |
| Pack-out                                                                           | 1        | LABEL= TOP LABEL REFDES BOX, 2"X5"                                                                                  |