

| #  |     |                |                        |                                                                                                                                                               |                | Farnell / Element14 |         |                     |                 | Digi-Key |                  |                 | Mouser |                     |                 |     |
|----|-----|----------------|------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------|---------------------|---------|---------------------|-----------------|----------|------------------|-----------------|--------|---------------------|-----------------|-----|
|    | Qty | Part name      | Package                | Reference designator                                                                                                                                          | Board name     | Qty                 | Code    | Part Number         | Unit price<br>€ | MOQ      | Part Number      | Unit price<br>€ | MOQ    | Part Number         | Unit price<br>€ | MOQ |
| 1  | 1   | 2x3-pin socket | THT; 2x3-pin socket    | MCU-ICSP                                                                                                                                                      | Arduino Shield | 1                   | 7991983 | M20-7830346         | 1,210           | 10       | M20-7830346      | 1,000           |        | M20-7830346         | 0,940           |     |
| 2  | 17  | 100n 16V X7R   | 0603                   | C9, C20, C32, C43, C44, C45, C49, C50, C51, C54, C56, C59, C63, C65, C69, C72, C73                                                                            | Power board    | 34                  |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 5   | 100n 16V X7R   | 0603                   | C81, C82, C83, C84, C85                                                                                                                                       | AUX PS         | 5                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 27  | 100n 16V X7R   | 0603                   | C97, C98, C99, C100, C101, C102, C104, C106, C107, C108, C109, C111, C113, C114, C121, C122, C123, C124, C125, C126, C127, C128, C132, C134, C136, C139, C141 | Arduino Shield | 27                  |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    |     |                |                        |                                                                                                                                                               |                | 66                  | 2496832 | 0603B104K160CT      | 0,012           | 10       | 0603YC104KAT2 A  | 0,010           |        | 06033C104K4T4 A     | 0,025           |     |
| 3  | 1   | 220u 16V       | SMD ELCO; Ø6.3 x 7.7mm | C78                                                                                                                                                           | AUX PS         | 1                   | 1870605 | MCESL16V227M6.3X7.7 | 0,213           | 10       | 399-6679-1-ND    | 0,410           | 1      | 80-EDK227M016A9 HAA | 0,407           | 1   |
| 4  | 5   | 10n 50V X7R    | 0805                   | C118, C131, C135, C137, C138                                                                                                                                  | Arduino Shield | 5                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 7   | 10n 50V X7R    | 0805                   | C25, C28, C35, C42, C47, C70, C74                                                                                                                             | Power board    | 14                  |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    |     |                |                        |                                                                                                                                                               |                | 19                  | 1759246 | MC0805B103K500 CT   | 0,009           | 10       | CL21B103KBCN NNC | 0,027           |        | GRM216R71H10 3KA01D | 0,014           |     |
| 5  | 2   | 10u 50V X7R    | 1210                   | C90, C110                                                                                                                                                     | Arduino Shield | 2                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 7   | 10u 50V X7R    | 1210                   | C10, C16, C22, C24, C29, C30, C55                                                                                                                             | Power board    | 14                  |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    |     |                |                        |                                                                                                                                                               |                | 16                  | 2362133 | GRM32ER71H106 KA12L | 0,748           | 1        | CL32B106KBJN NWE | 0,335           |        | GRM32ER71H10 6KA12L | 0,376           |     |
| 6  | 2   | 10u 10V        | 1206, Tantalum         | C105, C129                                                                                                                                                    | Arduino Shield | 2                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 3   | 10u 10V        | 1206, Tantalum         | C23, C31, C57                                                                                                                                                 | Power board    | 6                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    |     |                |                        |                                                                                                                                                               |                | 8                   | 1457413 | T491A106K010AT      | 0,260           | 5        | T491A106K010A T  | 0,340           |        | T491A106K010A T     | 0,344           |     |
| 7  | 2   | 120p 50V NP0   | 0805 / 0603            | C17, C39                                                                                                                                                      | Power board    | 4                   | 1414667 | C0805C121J5GAC TU   | 0,044           | 10       | CL21C121JBAN NNC | 0,058           |        | C0805C121J5GA CTU   | 0,031           |     |
| 8  | 2   | 18p 50V NP0    | 0805 / 0603            | C116, C120                                                                                                                                                    | Arduino Shield | 2                   | 2320820 | MC0805N180J101 CT   | 0,026           | 10       | CL21C180JBAN NNC | 0,090           |        | C0805C180J5GA CTU   | 0,100           |     |
| 9  | 2   | 1n 50V NP0     | 0805 / 0603            | C52, C53                                                                                                                                                      | Power board    | 4                   | 1759227 | MC0805N102J500 CT   | 0,029           | 10       | CL21C102JBCN NNC | 0,065           |        | C0805C102J5GA CTU   | 0,038           |     |
| 10 | 2   | 1u 100V X7R    | 1206, 100V             | C8, C33                                                                                                                                                       | Power board    | 4                   | 2320876 | MC1206B105K101 CT   | 0,200           | 5        | CL31B105KCHN NNE | 0,253           |        | GRM31CR72A10 5KA01L | 0,227           |     |
| 11 | 7   | 1u 50V X7R     | 0805, 50V              | C11, C26, C46, C48, C58, C64, C66                                                                                                                             | Power board    | 14                  |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    | 1   | 1u 50V X7R     | 0805, 50V              | C156                                                                                                                                                          | Arduino board  | 1                   |         |                     |                 |          |                  |                 |        |                     |                 |     |
|    |     |                |                        |                                                                                                                                                               |                | 15                  | 2118131 | C0805C105K5RAC TU   | 0,215           | 5        | CL21B105KBFN NNE | 0,129           |        | 08055C105K4T2 A     | 0,135           |     |
| 12 | 1   | 22n 50V X7R    | 0805                   | C115                                                                                                                                                          | Arduino Shield | 1                   | 1759252 | MC0805B223K500 CT   | 0,016           | 10       | CL21B223KBAN NNC | 0,058           |        | C0805C223K5R AC     | 0,031           |     |
| 13 | 5   | 2n2 50V NP0    | 0805 / 0603            | C36, C37, C38, C40, C71                                                                                                                                       | Power board    | 10                  | 1759236 | MC0805N222J500 CT   | 0,052           | 10       | CL21C222JBFN NNG | 0,078           |        | GRM2165C1H22 2JA01D | 0,076           |     |

| #  | RS Components |                |          |                         |                 |     | TME                    |                 |     | THT SMD |  | Price calculation for 1 set |                           |              |             |
|----|---------------|----------------|----------|-------------------------|-----------------|-----|------------------------|-----------------|-----|---------|--|-----------------------------|---------------------------|--------------|-------------|
|    | Qty           | Part name      | Code     | Part Number             | Unit price<br>€ | MOQ | Code / Part Number     | Unit price<br>€ | MOQ |         |  | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 1  | 1             | 2x3-pin socket | 681-6832 | M20-7830346             | 0,899           | 5   | ZL262-6DG              | 0,070           | 10  | 1       |  | TME                         | 0,070 €                   | 1            | 0,070       |
| 2  | 17            | 100n 16V X7R   |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 5             | 100n 16V X7R   |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 27            | 100n 16V X7R   |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    |               |                | 391-246  | 0603YC104JAT2<br>A      | 0,004           | 50  | CL10B104KO8NNNC        | 0,004           | 100 | 66      |  | RS                          | 0,004 €                   | 100          | 0,400       |
| 3  | 1             | 220u 16V       | 839-1770 | 865080345012            | 0,280           | 10  | SC1C227M6L07KVR        | 0,061           | 10  | 1       |  | TME                         | 0,061 €                   | 1            | 0,061       |
| 4  | 5             | 10n 50V X7R    |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 7             | 10n 50V X7R    |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    |               |                | 461-4013 | CC0805KRX7R9<br>BB103   | 0,007           | 50  | CL21B103JBANNNC        | 0,006           | 100 | 19      |  | TME                         | 0,006 €                   | 20           | 0,120       |
| 5  | 2             | 10u 50V X7R    |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 7             | 10u 50V X7R    |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    |               |                | 766-1214 | CL32B106KBJN<br>NNE     | 0,601           | 10  | CL32B106KBJNNNE        | 0,201           | 10  | 16      |  | TME                         | 0,201 €                   | 16           | 3,216       |
| 6  | 2             | 10u 10V        |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 3             | 10u 10V        |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    |               |                | 538-2278 | T491A106K010A<br>T      | 0,196           | 10  | T491A106K010AT         | 0,085           | 10  | 8       |  | TME                         | 0,085 €                   | 10           | 0,845       |
| 7  | 2             | 120p 50V NP0   | 723-6209 | GRM2165C1H1<br>21JA01D  | 0,035           | 100 | CL21C121JBANNNP        | 0,007           | 100 | 4       |  | TME                         | 0,007 €                   | 10           | 0,069       |
| 8  | 2             | 18p 50V NP0    | 648-0935 | C0805C180J5G<br>ACTU    | 0,157           | 10  | CL21C180JBANNNC        | 0,071           | 100 | 2       |  | Farnell                     | 0,026 €                   | 2            | 0,053       |
| 9  | 2             | 1n 50V NP0     | 378-710  | 0805CG102J9B<br>B       | 0,021           | 25  | CL21C102JBCNNNC        | 0,010           | 100 | 4       |  | TME                         | 0,010 €                   | 10           | 0,097       |
| 10 | 2             | 1u 100V X7R    | 740-7590 | C3216X7R2A10<br>5K160AA | 0,174           | 10  | GRM31CR72A105KA0<br>1L | 0,128           | 10  | 4       |  | TME                         | 0,128 €                   | 10           | 1,279       |
| 11 | 7             | 1u 50V X7R     |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    | 1             | 1u 50V X7R     |          |                         |                 |     |                        |                 |     |         |  |                             |                           |              |             |
|    |               |                | 766-1062 | CL21B105KBFN<br>NNF     | 0,041           | 100 | CL21B105KBFNNG         | 0,014           | 100 | 15      |  | TME                         | 0,014 €                   | 15           | 0,214       |
| 12 | 1             | 22n 50V X7R    | 464-6701 | 08055C223KAT<br>2A      | 0,015           | 50  | CL21B223KBANNNC        | 0,008           | 100 | 1       |  | TME                         | 0,008 €                   | 10           | 0,084       |
| 13 | 5             | 2n2 50V NP0    | 802-9905 | C0805C222J5G<br>ACTU    | 0,043           | 100 | GRM2165C1H222JA0<br>1D | 0,015           | 100 | 10      |  | TME                         | 0,015 €                   | 10           | 0,145       |

| #  |     |                                      |                                    |                              |                | Farnell / Element14 |         |                      |                 |     | Digi-Key           |                 |     | Mouser             |                 |     |
|----|-----|--------------------------------------|------------------------------------|------------------------------|----------------|---------------------|---------|----------------------|-----------------|-----|--------------------|-----------------|-----|--------------------|-----------------|-----|
|    | Qty | Part name                            | Package                            | Reference designator         | Board name     | Qty                 | Code    | Part Number          | Unit price<br>€ | MOQ | Part Number        | Unit price<br>€ | MOQ | Part Number        | Unit price<br>€ | MOQ |
| 14 | 2   | 22u 50V                              | SMD ELCO; Ø8x10.2mm                | C89, C94                     | Arduino board  | 2                   | 2326151 | EEE1HA220WAP         | 0,341           | 1   | 493-9884-1-ND      | 0,280           | 1   | 647-UWT1H220MCL6GS | 0,339           | 1   |
| 15 | 4   | 3n3 50V X7R or NP0                   | 0805 / 0603                        | C60, C61, C67, C68           | Power board    | 8                   | 1759291 | MC0805B332K101CT     | 0,015           | 10  | CL21B332KBANNNC    | 0,045           |     | C0805C332K5RAC     | 0,024           |     |
| 16 | 1   | 470n 50V X7R                         | 0805, 50V                          | C7                           | Power board    | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 2   | 470n 50V X7R                         | 0805, 50V                          | C87, C92                     | Arduino Shield | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    |     |                                      |                                    |                              |                | 4                   | 2470492 | GRM21BR71H474KA88L   | 0,163           | 5   | CL21B474KBFNFNE    | 0,139           |     | C0805C474K5RACTU   | 0,103           |     |
| 17 | 2   | 470p 50V NP0                         | 0805 / 0603                        | C14, C19                     | Power board    | 4                   | 1759217 | MC0805N471J500CT     | 0,023           | 10  | CL21C471JBANNNC    | 0,090           |     | 08055A471JAT2A     | 0,091           |     |
| 18 | 2   | 47n 50V X7R                          | 0805                               | C133, C140                   | Arduino Shield | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 1   | 47n 50V X7R                          | 0805                               | C79                          | AUX PS         | 1                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    |     |                                      |                                    |                              |                | 3                   | 2496983 | 0805B473K500CT       | 0,023           | 10  | CL21B473KBCNNNC    | 0,090           |     | 08055C473KAT2A     | 0,091           |     |
| 19 | 1   | 47n 400V Polyester Film              | THT R=7,5mm                        | C76                          | AUX PS         | 1                   | 2468839 | B32520E6473K000      | 0,358           | 1   | -                  |                 |     | -                  |                 |     |
| 20 | 2   | 47p 50V NP0                          | 0805 / 0603                        | C34, C41                     | Power board    | 4                   | 1414692 | C0805C470J5GAC TU    | 0,028           | 10  | CL21C470JBANNNC    | 0,043           |     | C0805C470J5GACTU   | 0,029           |     |
| 21 | 1   | 47u 35V                              | SMD ELCO; Ø6.3 x 5.8mm             | C103                         | Arduino Shield | 1                   | 9695850 | EEEFK1V470P          | 0,493           | 1   | EEEFK1V470P        | 0,440           |     | EEEFK1V470P        | 0,443           |     |
| 22 | 1   | 47u 50V                              | SMD ELCO; Ø8x10.2mm                | C13                          | Power board    | 2                   | 9695931 | EEEFK1H470P          | 0,622           | 1   | PCE3815CT-ND       | 0,600           | 1   | 667-EEE-FK1H470P   | 0,754           | 1   |
| 23 | 4   | 4n7 100V X7R                         | 0805                               | C1, C2, C4, C18              | Power board    | 8                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 4   | 4n7 100V X7R                         | 0805                               | C88, C91, C93, C95           | Arduino board  | 4                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    |     |                                      |                                    |                              |                | 12                  | 1759293 | MC0805B472K101CT     | 0,019           | 10  | CL21B472KCANNNC    | 0,065           |     | GRM21AR72D472KW01D | 0,050           |     |
| 24 | 1   | 4u7 10V                              | 1206, Tantalum                     | C130                         | Arduino Shield | 1                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 1   | 4u7 10V                              | 1206, Tantalum                     | C21                          | Power board    | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    |     |                                      |                                    |                              |                | 3                   | 1457428 | T491A475K016AT       | 0,238           | 5   | T491A475K010AT     | 0,310           |     | T491A475K010AT     | 0,299           |     |
| 25 | 2   | 4u7 100V X7R                         | 1210, 100V, X7R                    | C5, C6                       | Power board    | 4                   | 2211140 | CGA6M3X7S2A475K200AB | 1,560           | 1   | GRJ32DC72A475KE11L | 1,240           |     | GRJ32DC72A475KE11L | 1,250           |     |
| 26 | 2   | 6n8 50V X7R or NP0                   | 0603                               | C117, C119                   | Arduino Shield | 2                   | 1759100 | MC0603B682K500CT     | 0,007           | 10  | CL10B682KB8NNNC    | 0,090           |     | GRM188R71H682KA01J | 0,091           |     |
| 27 | 1   | 6n8 (X1 / Y2) PP Film 300Vac 1000Vdc | THT R=10mm                         | C75                          | AUX PS         | 1                   | 2478385 | R413F16804000M       | 0,528           | 1   | R413F16804000M     | 0,520           |     | R413F16804000M     | 0,525           |     |
| 28 | 1   | 1F 5,5V Backup Cap                   | THT                                | C112                         | Arduino Shield | 1                   | 9697497 | EEC-S5R5H105         | 4,660           | 1   | EEC-S5R5H105       | 3,480           |     | EEC-S5R5H105       | 3,510           |     |
| 29 | 1   | 100u 63V                             | SMD ELCO; Ø10 x 10.2mm             | C15                          | Power board    | 2                   | 9696040 | EEEFK1J101P          | 0,846           | 1   | EEE-FK1J101P       | 0,930           |     | EEE-FK1J101P       | 0,932           |     |
| 30 | 2   | 18u 50V                              | SMD ELCO <b>Polymer</b> ; Ø8x6.9mm | C3                           | Power bord     | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 2   | 18u 50V                              | SMD ELCO <b>Polymer</b> ; Ø8x6.9mm | C86, C96                     | Arduino Shield | 2                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    |     |                                      |                                    |                              |                | 4                   | 2354813 | 50SVPF18M            | 1,830           | 1   | P18942CT-ND        | 1,430           | 1   | 667-50SVPF18M      | 1,720           | 1   |
| 31 | 1   | BAS316                               | SOD-323                            | D12                          | AUX PS         | 1                   |         |                      |                 |     |                    |                 |     |                    |                 |     |
|    | 6   | BAS316                               | SOD-323                            | D13, D14, D15, D16, D18, D21 | Arduino Shield | 6                   |         |                      |                 |     |                    |                 |     |                    |                 |     |

| #  | RS Components |                                      |          |                      |                 |     | TME                |                 |     | THT SMD |     | Price calculation for 1 set |                           |              |             |
|----|---------------|--------------------------------------|----------|----------------------|-----------------|-----|--------------------|-----------------|-----|---------|-----|-----------------------------|---------------------------|--------------|-------------|
|    | Qty           | Part name                            | Code     | Part Number          | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ | THT     | SMD | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 14 | 2             | 22u 50V                              | 520-2009 | UWT1H220MCL1GB       | 0,174           | 25  | UWT1H220MCL6GS     | 0,009           | 10  |         | 2   | TME                         | 0,009 €                   | 5            | 0,047       |
| 15 | 4             | 3n3 50V X7R or NP0                   | 237-7009 | GRM216R71H332KA01D   | 0,038           | 50  | CL21B332KBANNNC    | 0,007           | 100 |         | 8   | TME                         | 0,007 €                   | 10           | 0,069       |
| 16 | 1             | 470n 50V X7R                         |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 2             | 470n 50V X7R                         |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    |               |                                      | 766-1053 | CL21B474KBF4PNG      | 0,085           | 50  | CL21B474KBFNNNG    | 0,015           | 100 |         | 4   | TME                         | 0,015 €                   | 10           | 0,153       |
| 17 | 2             | 470p 50V NP0                         | 378-700  | 0805CG471J9B B       | 0,021           | 25  | CL21C471JBANNNC    | 0,009           | 100 |         | 4   | TME                         | 0,009 €                   | 2            | 0,018       |
| 18 | 2             | 47n 50V X7R                          |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 1             | 47n 50V X7R                          |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    |               |                                      | 391-303  | 08055C473KAT2A       | 0,011           | 50  | CC0805KRX7R9473    | 0,008           | 100 |         | 3   | TME                         | 0,008 €                   | 3            | 0,025       |
| 19 | 1             | 47n 400V Polyester Film              | 668-9993 | B32520C6473K189      | 0,241           | 10  | -                  |                 |     | 1       |     | RS                          | 0,241 €                   | 1            | 0,241       |
| 20 | 2             | 47p 50V NP0                          | 264-4270 | C0805C470J5GACTU     | 0,014           | 25  | CC0805JRNPO9470    | 0,007           | 100 |         | 4   | TME                         | 0,007 €                   | 10           | 0,074       |
| 21 | 1             | 47u 35V                              | 565-623  | EEEFK1V470AP         | 0,165           | 5   | EEEFK1V470P        | 0,157           | 5   |         | 1   | TME                         | 0,157 €                   | 10           | 1,572       |
| 22 | 1             | 47u 50V                              | 537-0590 | EEEFK1H470P          | 0,170           | 5   | EEEFK1H470P        | 0,197           | 5   |         | 2   | RS                          | 0,170 €                   | 5            | 0,850       |
| 23 | 4             | 4n7 100V X7R                         |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 4             | 4n7 100V X7R                         |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    |               |                                      | 698-3364 | 08051C472KAZ2A       | 0,036           | 25  | CL21B472KCANNNC    | 0,006           | 100 |         | 12  | TME                         | 0,006 €                   | 20           | 0,126       |
| 24 | 1             | 4u7 10V                              |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 1             | 4u7 10V                              |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    |               |                                      | 538-2341 | T491A475K016A T      | 0,179           | 10  | T491A475M010AT     | 0,128           | 5   |         | 3   | TME                         | 0,128 €                   | 5            | 0,640       |
| 25 | 2             | 4u7 100V X7R                         | 915-5415 | CGA6M3X7S2A475K200AB | 0,686           | 5   | -                  |                 |     |         | 4   | RS                          | 0,686 €                   | 4            | 2,744       |
| 26 | 2             | 6n8 50V X7R or NP0                   | 147-825  | C0603C682K5RACTU     | 0,007           | 50  | CL10B682JB8NNNC    | 0,004           | 100 |         | 2   | TME                         | 0,004 €                   | 10           | 0,042       |
| 27 | 1             | 6n8 (X1 / Y2) PP Film 300Vac 1000Vdc | 871-2489 | 890334023003C S      | 0,420           | 10  | MKP-Y2-6N8         | 0,158           | 5   | 1       |     | TME                         | 0,158 €                   | 1            | 0,158       |
| 28 | 1             | 1F 5,5V Backup Cap                   | 339-6843 | EECS5R5H105          | 3,556           | 1   | EECS5R5H105        | 2,190           | 1   | 1       |     | TME                         | 2,190 €                   | 1            | 2,190       |
| 29 | 1             | 100u 63V                             | 708-3623 | EEEFK1J101P          | 0,641           | 5   | EEEFK1J101P        | 0,380           | 5   |         | 2   | TME                         | 0,380 €                   | 2            | 0,760       |
| 30 | 2             | 18u 50V                              |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 2             | 18u 50V                              |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    |               |                                      | -        |                      |                 |     | -                  |                 |     |         | 4   | Digikey                     | 1,430 €                   | 5            | 7,150       |
| 31 | 1             | BAS316                               |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |
|    | 6             | BAS316                               |          |                      |                 |     |                    |                 |     |         |     |                             |                           |              |             |

| #  |     |                    |                   |                                     |                | Qty | Farnell / Element14 |                    |                 |     | Digi-Key           |                 |     | Mouser             |                 |     |
|----|-----|--------------------|-------------------|-------------------------------------|----------------|-----|---------------------|--------------------|-----------------|-----|--------------------|-----------------|-----|--------------------|-----------------|-----|
|    | Qty | Part name          | Package           | Reference designator                | Board name     |     | Code                | Part Number        | Unit price<br>€ | MOQ | Part Number        | Unit price<br>€ | MOQ | Part Number        | Unit price<br>€ | MOQ |
| 32 | 9   | BAS316             | SOD-323           | D2, D3, D4, D5, D6, D7, D8, D9, D10 | Power board    | 18  |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    |     |                    |                   |                                     |                | 25  | 8734275             | BAS316,115         | 0,192           | 5   | BAS316,115         | 0,175           |     | BAS316,115         | 0,174           |     |
|    |     |                    |                   |                                     |                |     |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    | 1   | BAT54S             | SOT-23            | D19                                 | Arduino Shield | 1   | 1621835             | BAT54S             | 0,125           | 10  | BAT54SLT1G         | 0,150           |     | BAT54SLT1G         | 0,145           |     |
|    | 1   | SKL16              | SOD-123F          | D11                                 | AUX PS         | 1   |                     |                    |                 |     |                    |                 |     |                    |                 |     |
| 33 | 1   | SKL16              | SOD-123F          | D20                                 | Arduino Shield | 1   |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    |     |                    |                   |                                     |                | 2   | 1510688             | PMEG4005EH         | 0,091           | 5   | 1727-3876-1-ND     | 0,430           | 1   | 771-PMEG4005EH-T/R | 0,405           | 1   |
|    |     |                    |                   |                                     |                |     |                     |                    |                 |     |                    |                 |     |                    |                 |     |
| 34 | 1   | STPS15H100         | TO-252            | D1                                  | Power board    | 2   | 2344052             | STPS15H100CB-TR    | 1,070           | 1   | STPS15H100CB       | 0,900           |     | STPS15H100CB       | 0,896           |     |
| 35 | 1   | 50mA, polyfuse     | 1210              | F1                                  | Arduino board  | 1   | 1861176             | MC36203            | 0,163           | 5   | 507-1476-1-ND      | 0,200           | 1   | 530-OZCJ0005FF2E   | 0,101           | 1   |
| 36 | 3   | 60R@100MHz         | 0603 Ferrite Bead | FB1, FB2, FB3                       | Power board    | 6   |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    | 3   | 60R@100MHz         | 0603 Ferrite Bead | FB4, FB5, FB6                       | AUX PS         | 3   |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    | 1   | 60R@100MHz         | 0603 Ferrite Bead | FB7                                 | Arduino Shield | 1   |                     |                    |                 |     |                    |                 |     |                    |                 |     |
|    |     |                    |                   |                                     |                | 10  | 1635704             | 742792602          | 0,210           | 1   | 742792602          | 0,210           |     | 742792602          | 0,160           |     |
|    |     |                    |                   |                                     |                |     |                     |                    |                 |     |                    |                 |     |                    |                 |     |
| 37 | 1   | LTC3864EMSE#PBF    | MSOP-12           | IC1                                 | Power board    | 2   | 2293128             | LTC3864EMSE#PBF    | 4,520           | 1   | LTC3864EMSE#PBF    | 3,960           |     | -                  |                 |     |
| 38 | 1   | DAC8552IDGKTG4     | MSOP-8 (VSSOP-8)  | IC10                                | Power board    | 2   | 1329584             | DAC8552IDGKTG4     | 6,420           | 1   | DAC8552IDGKT       | 7,660           |     | DAC8552IDGKR       | 6,510           |     |
| 39 | 1   | ADG465BRTZ         | SOT-23            | IC11                                | Power board    | 2   | 2376952             | ADG465BRTZ-REEL7   | 1,690           | 1   | Discontinued       |                 |     | Discontinued       |                 |     |
| 40 | 1   | TS5A9411DCKT       | SC-70             | IC12                                | Power board    | 2   | 1755582             | TS5A9411DCKT       | 1,050           | 1   | TS5A9411DCKR       | 0,560           |     | TS5A9411DCKR       | 0,534           |     |
| 41 | 1   | ADS1120IPWR        | TSSOP-16          | IC13                                | Power board    | 2   | 2402249             | ADS1120IPWR        | 6,760           | 1   | ADS1120IPWR        | 6,250           |     | ADS1120IPWR        | 6,100           |     |
| 42 | 1   | LP339D             | SOIC-14           | IC14                                | Power board    | 2   | 9589686             | LP339D             | 0,573           | 1   | LP339DR            | 0,520           |     | LP339DR            | 0,498           |     |
| 43 | 1   | TPD4E002DRLR       |                   | IC15                                | AUX PS         | 1   | 1755329             | TPD4E002DRLR       | 0,275           | 1   | 296-21694-1-ND     | 0,660           | 1   | 595-TPD4E002DRLR   | 0,594           | 1   |
| 44 | 1   | TPD2E001DZDR       |                   | IC16                                | AUX PS         | 1   | 2335446             | TPD2E001DZDR       | 0,506           | 1   | 296-24770-1-ND     | 0,580           | 1   | 595-TPD2E001DZDR   | 0,519           | 1   |
| 45 | 1   | ADUM3160BRWZ       |                   | IC17                                | AUX PS         | 1   | 1843660             | ADUM3160BRWZ       | 7,070           | 1   | ADUM3160BRWZ-ND    | 7,290           | 1   | 584-ADUM3160BRWZ   | 6,660           | 1   |
| 46 | 1   | TLC5925IDBQR       | SSOP-24           | IC18                                | Arduino Shield | 1   | 1694438             | TLC5925IDBQR       | 1,520           | 1   | TLC5925IDBQR       | 1,370           |     | TLC5925IDBQR       | 1,330           |     |
| 47 | 2   | Si8641EC-B-IS1     | SOIC-16           | IC19, IC23                          | Arduino Shield | 2   | 2423294             | Si8641EC-B-IS1     | 3,210           | 1   | Si8641EC-B-IS1     | 2,780           |     | Si8641EC-B-IS1     | 2,720           |     |
| 48 | 1   | LP2951D            | SOIC-8            | IC2                                 | Power board    | 2   | 1755066             | LP2951D            | 0,573           | 1   | LP2951DR           | 0,520           |     | LP2951DR           | 0,498           |     |
| 49 | 2   | Si8651EC-B-IS1     | SOIC-16           | IC20, IC21                          | Arduino Shield | 2   | 2423323             | Si8651EC-B-IS1     | 3,150           | 1   | Si8651EC-B-IS1     | 3,190           |     | Si8651EC-B-IS1     | 3,060           |     |
| 50 | 1   | LD1117S33TR        | TO-252            | IC22                                | Arduino Shield | 1   | 1202826             | LD1117S33TR        | 0,187           | 5   | 497-1242-1-ND      | 0,400           | 1   | 511-LD1117S33      | 0,403           | 1   |
| 51 | 1   | PCA21125T/Q900/1,1 | TSSOP-14          | IC24                                | Arduino Shield | 1   | 2400445             | PCA21125T/Q900/1,1 | 1,870           | 1   | PCA21125T/Q900/1,1 | 1,610           |     | PCA21125T/Q900/1,1 | 1,660           |     |
| 52 | 1   | AT25256B           | SOIC-8            | IC25                                | Arduino Shield | 1   | 1841577             | AT25256B-SSHL-B    | 1,190           | 1   | AT25256B-SSHL-B    | 1,300           |     | AT25256B-SSHL-B    | 1,290           |     |
| 53 | 1   | W5500              | LQFP-48           | IC26                                | Arduino Shield | 1   | -                   |                    |                 |     | W5500              | 3,750           |     | W5500              | 2,390           |     |
| 54 | 1   | BC857BS            | SOT-363           | IC27                                | Arduino Shield | 1   | 1653608             | BC857BDW1T1G       | 0,141           | 1   | BC857BDW1T1G       | 0,210           |     | BC857BDW1T1G       | 0,199           |     |
| 55 | 1   | TLC555             | SOIC-8            | IC28                                | Arduino Shield | 1   | 9589880             | NE555DR            | 0,300           | 1   | NE555D             | 0,350           |     | NE555D             | 0,353           |     |

| #  | RS Components |                    |          |                     |                 |     | TME                |                 |     | THT SMD |  | Price calculation for 1 set |                           |              |             |
|----|---------------|--------------------|----------|---------------------|-----------------|-----|--------------------|-----------------|-----|---------|--|-----------------------------|---------------------------|--------------|-------------|
|    | Qty           | Part name          | Code     | Part Number         | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |         |  | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 9  |               | BAS316             |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    |               |                    | 397-2914 | BAS316,115          | 0,195           | 50  | BAS316,115         | 0,019           | 25  | 25      |  | TME                         | 0,019 €                   | 25           | 0,463       |
| 32 | 1             | BAT54S             | 670-8797 | BAT54S              | 0,202           | 10  | BAT54S.215         | 0,017           | 50  | 1       |  | TME                         | 0,017 €                   | 1            | 0,017       |
| 33 | 1             | SKL16              |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    | 1             | SKL16              | 485-571  | PMEG4005EH          | 0,101           | 20  | SKL16              | 0,095           | 5   | 2       |  | Farnell                     | 0,091 €                   | 10           | 0,910       |
| 34 | 1             | STPS15H100         | 795-9075 | STPS15H100CB<br>-TR | 0,924           | 5   | -                  |                 |     | 2       |  | Mouser                      | 0,896 €                   | 2            | 1,792       |
| 35 | 1             | 50mA, polyfuse     | -        |                     |                 |     | SM005-60           | 0,092           | 10  | 1       |  | TME                         | 0,092 €                   | 1            | 0,092       |
| 36 | 3             | 60R@100MHz         |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    | 3             | 60R@100MHz         |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    | 1             | 60R@100MHz         |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    |               |                    | 669-4049 | 742792602           | 0,172           | 10  | LCBA-600           | 0,027           | 25  | 10      |  | TME                         | 0,027 €                   | 10           | 0,269       |
|    |               |                    |          |                     |                 |     |                    |                 |     | 0       |  |                             |                           |              |             |
| 37 | 1             | LTC3864EMSE#PBF    | -        |                     |                 |     | -                  |                 |     | 2       |  | Digikey                     | 3,960 €                   | 2            | 7,920       |
| 38 | 1             | DAC8552IDGKTG4     | 662-1498 | DAC8552IDGKT        | 6,524           | 1   | -                  |                 |     | 2       |  | Farnell                     | 6,420 €                   | 2            | 12,840      |
| 39 | 1             | ADG465BRTZ         | -        |                     |                 |     | -                  |                 |     | 2       |  | Farnell                     | 1,690 €                   | 2            | 3,380       |
| 40 | 1             | TS5A9411DCKT       | 459-459  | TS5A9411DCKT        | 0,570           | 10  | -                  |                 |     | 2       |  | Mouser                      | 0,534 €                   | 2            | 1,068       |
| 41 | 1             | ADS1120IPWR        | -        |                     |                 |     | -                  |                 |     | 2       |  | Mouser                      | 6,100 €                   | 2            | 12,200      |
| 42 | 1             | LP339D             | 661-2659 | LP339DR             | 0,175           | 10  | LP339D             | 0,244           | 3   | 2       |  | RS                          | 0,175 €                   | 2            | 0,350       |
| 43 | 1             | TPD4E002DRLR       | 709-9060 | TPD4E002DRLR        | 0,199           | 10  | -                  |                 |     | 1       |  | RS                          | 0,199 €                   | 1            | 0,199       |
| 44 | 1             | TPD2E001DZDR       | 812-0171 | TPD2E001DZDR        | 0,193           | 25  | -                  |                 |     | 1       |  | RS                          | 0,193 €                   | 3            | 0,579       |
| 45 | 1             | ADUM3160BRWZ       | 796-9041 | ADUM3160BRW<br>Z    | 5,880           | 1   | ADUM3160BRWZ-RL    | 4,040           | 1   | 1       |  | TME                         | 4,040 €                   | 1            | 4,040       |
| 46 | 1             | TLC5925IDBQR       | 812-3984 | TLC5925IDBQR        | 1,109           | 10  | -                  |                 |     | 1       |  | RS                          | 1,109 €                   | 1            | 1,109       |
| 47 | 2             | Si8641EC-B-IS1     | 753-2438 | Out of stock        |                 |     | -                  |                 |     | 2       |  | Mouser                      | 2,720 €                   | 2            | 5,440       |
| 48 | 1             | LP2951D            | 796-8095 | LP2951D             | 0,613           | 5   | LP2951CM/NOPB      | 0,495           | 1   | 2       |  | TME                         | 0,495 €                   | 2            | 0,990       |
| 49 | 2             | Si8651EC-B-IS1     | 753-2497 | Si8651EC-B-IS1      | 3,038           | 1   | -                  |                 |     | 2       |  | RS                          | 3,038 €                   | 2            | 6,076       |
| 50 | 1             | LD1117S33TR        | 714-0697 | LD1117S33TR         | 0,175           | 10  | LD1117S33TR        | 0,183           | 3   | 1       |  | RS                          | 0,175 €                   | 1            | 0,175       |
| 51 | 1             | PCA21125T/Q900/1,1 | -        |                     |                 |     | -                  |                 |     | 1       |  | Digikey                     | 1,610 €                   | 1            | 1,610       |
| 52 | 1             | AT25256B           | 738-0079 | AT25256B-<br>SSHL-B | 1,267           | 2   | 25AA256-I/SN       | 1,290           | 1   | 1       |  | Farnell                     | 1,190 €                   | 1            | 1,190       |
| 53 | 1             | W5500              | -        |                     |                 |     | W5500              | 2,190           | 1   | 1       |  | TME                         | 2,190 €                   | 1            | 2,190       |
| 54 | 1             | BC857BS            | 690-0101 | BC857BDW1T1<br>G    | 0,022           | 25  | BC857BS            | 0,027           | 25  | 1       |  | RS                          | 0,022 €                   | 1            | 0,022       |
| 55 | 1             | TLC555             | 662-4006 | TLC555CDR           | 0,218           | 10  | TLC555CDR          | 0,384           | 3   | 1       |  | RS                          | 0,218 €                   | 1            | 0,218       |

| #  |     |                                      |                                                                                         |                                                |                | Qty | Farnell / Element14 |                     |                 |     | Digi-Key            |                 |     | Mouser             |                 |     |
|----|-----|--------------------------------------|-----------------------------------------------------------------------------------------|------------------------------------------------|----------------|-----|---------------------|---------------------|-----------------|-----|---------------------|-----------------|-----|--------------------|-----------------|-----|
|    | Qty | Part name                            | Package                                                                                 | Reference designator                           | Board name     |     | Code                | Part Number         | Unit price<br>€ | MOQ | Part Number         | Unit price<br>€ | MOQ | Part Number        | Unit price<br>€ | MOQ |
| 56 | 1   | SN74LVC08APWR                        | TSSOP-14                                                                                | IC29                                           | Arduino Shield | 1   | 1102978             | SN74LVC08APWR       | 0,236           | 1   | 296-1221-1-ND       | 0,350           | 1   | 595-SN74LVC08APWR  | 0,335           | 1   |
| 57 | 1   | TL783CKTTR                           | TO-263-3                                                                                | IC3                                            | Power board    | 2   | 2075436             | TL783CKTTR          | 2,070           | 1   | 296-20778-1-ND      | 2,270           | 1   | 595-TL783CKTTR     | 2,220           | 1   |
| 58 | 1   | SN74LV1T34DBVR                       | SOT-23                                                                                  | IC30                                           | Arduino Shield | 1   | 2499914             | SN74LV1T34DBVR      | 0,457           | 1   | SN74LV1T34DBVR      | 0,410           |     | SN74LV1T34DBVR     | 0,398           |     |
| 59 | 1   | TPS3705-33D                          | SOIC-8                                                                                  | IC31                                           | Arduino Shield | 1   | 2296066             | TPS3705-33D         | 1,330           | 1   | TPS3705-33DR        | 1,580           |     | TPS3705-33D        | 1,840           |     |
| 60 | 1   | SN74LVC2G02DCTR                      | SSOP-8                                                                                  | IC32                                           | Arduino Shield | 1   | 1236358             | SN74LVC2G02DCTR     | 0,452           | 1   | SN74LVC2G02DCTR     | 0,590           |     | SN74LVC2G02DCTR    | 0,570           |     |
| 61 | 1   | LTC3260EMSE#PBF                      | MSOP-16                                                                                 | IC4                                            | Power board    | 2   | 2115838             | LTC3260EMSE#PBF     | 7,660           | 1   | LTC3260EMSE#PBF-ND  | 6,780           | 1   | -                  |                 |     |
| 62 | 2   | TL072CD                              | SOIC-8                                                                                  | IC5, IC6                                       | Power board    | 4   | 1467663             | TL072CDT            | 0,252           | 5   | TL072CDT            | 0,430           |     | TL072CDT           | 0,416           |     |
| 63 | 1   | LTC2050HVCS8#PBF                     | SOIC-8                                                                                  | IC7                                            | Power board    | 2   | 1330903             | LTC2050HVCS8#PBF    | 2,110           | 1   | LTC2050HVCS8#PBF-ND | 2,850           | 1   | -                  |                 |     |
| 64 | 1   | MCP23S17-E/SS                        | SSOP-28                                                                                 | IC8                                            | Power board    | 2   | 1467675             | MCP23S17-E/SS       | 1,280           | 1   | MCP23S17-E/SS-ND    | 1,270           | 1   | 579-MCP23S17-E/SS  | 1,320           | 1   |
| 65 | 1   | REF5025AIDG4                         | SOIC-8                                                                                  | IC9                                            | Power board    | 2   | 1439622             | REF5025AIDG4        | 3,720           | 1   | REF5025AIDR         | 2,990           |     | REF5025AIDR        | 2,910           |     |
| 66 | 1   | 1-726388-2                           | THT                                                                                     | J2                                             | Arduino board  | 1   | 2308760             | 1-726388-2          | 0,085           | 10  | A121493-ND          | 0,210           | 1   | 571-1-726388-2     | 0,235           | 1   |
| 67 | 2   | ZL303-03P                            | THT                                                                                     | JP9, JP10                                      | AUX PS         | 2   |                     |                     |                 |     |                     |                 |     |                    |                 |     |
| 68 | 2   | RT424005                             | THT                                                                                     | K_PAR, K_SER                                   | Arduino Shield | 2   |                     |                     |                 |     |                     |                 |     |                    |                 |     |
|    | 1   | RT424005                             | THT                                                                                     | K_DOUT2                                        | AUX PS         | 1   |                     |                     |                 |     |                     |                 |     |                    |                 |     |
|    |     |                                      |                                                                                         |                                                |                | 3   | 9950168             | G2RL-2 5DC          | 3,940           | 1   | RTE24005            | 2,920           |     | RTE24005           | 2,850           |     |
| 69 | 2   | G6K-2F-5DC                           | SMD, relay                                                                              | K_S1, K_S2                                     | Arduino Shield | 2   | 4446185             | G6K-2F 5DC          | 5,870           | 1   | G6K-2F DC5          | 3,860           |     | G6K-2F-5DC         | 4,000           |     |
| 70 | 1   | SK 145/37,5                          | THT Heatsink for installation of Q21 and Q22 like on the picture <a href="#">here</a> . | KK1                                            | AUX PS         | 1   | 4621414             | SK 145/37,5 STS-220 | 3,530           | 1   | -                   |                 |     | -                  |                 |     |
|    | 1   | M3 nut                               | For mounting Q21, Q22 to KK1                                                            |                                                | AUX PS         | 1   | -                   |                     |                 |     | -                   |                 |     | -                  |                 |     |
|    | 1   | Washer externally serrated M3, D=6mm | For mounting Q21, Q22 to KK1                                                            |                                                | AUX PS         | 1   | 7096471             | 6797/3.0            | 1,870           | 100 | -                   |                 |     | -                  |                 |     |
|    | 1   | M3x8, black finish                   | For mouniting Q21, Q22 to KK1                                                           |                                                | AUX PS         | 1   | -                   |                     |                 |     | -                   |                 |     | -                  |                 |     |
| 71 | 1   | RN112-4-02                           | THT, <b>solder on the bottom layer!</b>                                                 | L1                                             | Power board    | 2   | 2730089             | RN112-4-02          | 1,570           | 1   | 817-1535-ND         | 2,510           | 1   | 631-RN112-4/02     | 2,290           | 1   |
| 72 | 1   | 470uH                                | SMD; 7.3mm x 7.3mm                                                                      | L5                                             | AUX PS         | 1   | 2455059             | SRR0745A-471M       | 0,918           | 1   | SRR0745A-471M       | 0,770           |     | SRR0745A-471M      | 0,814           |     |
| 73 | 1   | 33uH - 7443551331                    | SMD; 13.2mm x 12.8mm                                                                    | L2                                             | Power board    | 2   | 2211631             | Würth - 7443551331  | 3,070           | 1   | 7443551331          | 3,380           |     | 7443551331         | 2,970           |     |
| 74 | 2   | IHLP2020CZER3R3M11                   | SMD; 5.49mm x 5.18mm                                                                    | L3, L4                                         | Power board    | 4   | 1741325             | IHLP2020CZER3R3M11  | 1,410           | 5   | IHLP2020CZER3R3M11  | 2,160           |     | IHLP2020CZER3R3M11 | 1,030           |     |
| 75 | 1   | TFT_320QVT                           | THT; 2x20-pin socket                                                                    | LCD1                                           | Arduino Shield | 1   | 7992033             | M20-7832046         | 2,750           | 1   | M20-7832046         | 3,160           |     | M20-7832046        | 2,530           |     |
| 76 | 2   | HSMG-C170                            | 0805 Green                                                                              | LED_O1, LED_O2                                 | Arduino Shield | 2   | 5790852             | HSMG-C170           | 0,204           | 10  | HSMG-C170           | 0,490           |     | 630-HSMG-C170      | 0,060           |     |
| 77 | 5   | HSMH-C170                            | 0805 Red                                                                                | LED_CC1, LED_CC2, LED_PROG1, LED_PROG2, LED_SP | Arduino Shield | 5   | 5790840             | HSMH-C170           | 0,488           | 5   | HSMH-C170           | 0,440           |     | 630-HSMH-C170      | 0,060           |     |
| 78 | 1   | HSMD-C170                            | 0805 Orange                                                                             | LED_PWR                                        | Arduino Shield | 1   | 5790864             | HSMD-C170           | 0,240           | 5   | HSMD-C170           | 0,440           |     | 630-HSMD-C170      | 0,060           |     |
| 79 | 4   | HSMY-C170                            | 0805 Yellow                                                                             | LED_CV1, LED_CV2, LED_S1, LED_S2               | Arduino Shield | 4   | 5790876             | HSMY-C170           | 0,330           | 5   | HSMY-C170           | 0,440           |     | 630-HSMY-C170      | 0,060           |     |

| #  | RS Components |                                      |          |                     |                 |     | TME                |                 |     | THT SMD |  | Price calculation for 1 set |                           |              |             |
|----|---------------|--------------------------------------|----------|---------------------|-----------------|-----|--------------------|-----------------|-----|---------|--|-----------------------------|---------------------------|--------------|-------------|
|    | Qty           | Part name                            | Code     | Part Number         | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |         |  | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 56 | 1             | SN74LVC08APWR                        | 662-8588 | SN74LVC08APWR       | 0,240           | 10  | -                  |                 |     | 1       |  | Farnell                     | 0,236 €                   | 1            | 0,236       |
| 57 | 1             | TL783CKTTR                           | 660-7455 | TL783CKTTR          | 1,904           | 5   | -                  |                 |     | 2       |  | RS                          | 1,904 €                   | 2            | 3,808       |
| 58 | 1             | SN74LV1T34DBVR                       | -        |                     |                 |     | -                  |                 |     | 1       |  | Mouser                      | 0,398 €                   | 1            | 0,398       |
| 59 | 1             | TPS3705-33D                          | 662-3331 | TPS3705-33D         | 0,528           | 5   | -                  |                 |     | 1       |  | RS                          | 0,528 €                   | 1            | 0,528       |
| 60 | 1             | SN74LVC2G02DCTR                      | -        |                     |                 |     | SN74LVC2G02DCTR    | 0,252           | 5   | 1       |  | TME                         | 0,252 €                   | 1            | 0,252       |
| 61 | 1             | LTC3260EMSE#PBF                      | 851-6768 | LTC3260EMSE#PBF     | 5,800           | 1   | -                  |                 |     | 2       |  | RS                          | 5,800 €                   | 2            | 11,600      |
| 62 | 2             | TL072CD                              | 857-907P | TL072CD             | 0,252           | 1   | TL072CD            | 0,164           | 3   | 4       |  | TME                         | 0,164 €                   | 4            | 0,654       |
| 63 | 1             | LTC2050HVCS8#PBF                     | 822-6746 | LTC2050HVCS8#PBF-ND | 2,155           | 2   | -                  |                 | 1   | 2       |  | Farnell                     | 2,110 €                   | 2            | 4,220       |
| 64 | 1             | MCP23S17-E/SS                        | 669-6452 | MCP23S17-E/SS       | 1,168           | 5   | MCP23S17-E/SS      | 1,290           | 1   | 2       |  | RS                          | 1,168 €                   | 2            | 2,336       |
| 65 | 1             | REF5025AIDG4                         | 404-304  | REF5025AID          | 3,500           | 1   | -                  |                 |     | 2       |  | Mouser                      | 2,910 €                   | 2            | 5,820       |
| 66 | 1             | 1-726388-2                           | 680-5772 | 1-726388-2          | 0,060           | 100 | 1-726388-2         | 0,082           | 10  | 1       |  | RS                          | 0,060 €                   | 1            | 0,060       |
| 67 | 2             | ZL303-03P                            |          |                     |                 |     | ZL303-03P          | 0,027           | 20  | 2       |  | TME                         | 0,027 €                   | 4            | 0,107       |
| 68 | 2             | RT424005                             |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    | 1             | RT424005                             |          |                     |                 |     |                    |                 |     |         |  |                             |                           |              |             |
|    |               |                                      | 198-6898 | RTE24005            | 4,676           | 1   | RT424005           | 1,260           | 1   | 3       |  | TME                         | 1,260 €                   | 3            | 3,780       |
| 69 | 2             | G6K-2F-5DC                           | 683-9633 | G6K2F5DC            | 4,928           | 1   | G6K-2F-5DC         | 2,490           | 1   | 2       |  | TME                         | 2,490 €                   | 2            | 4,980       |
| 70 | 1             | SK 145/37,5                          | -        |                     |                 |     | -                  |                 |     | 1       |  | Farnell                     | 3,530 €                   | 1            | 3,530       |
|    | 1             | M3 nut                               | -        |                     |                 |     | B3/BN117           | 0,005           | 100 |         |  | TME                         | 0,005 €                   | 1            | 0,005       |
|    | 1             | Washer externally serrated M3, D=6mm | -        |                     |                 |     | B3/BN789           | 0,008           | 100 |         |  | TME                         | 0,008 €                   | 1            | 0,008       |
|    | 1             | M3x8, black finish                   | -        |                     |                 |     | M3X8/D7985B        | 0,019           | 100 |         |  | TME                         | 0,019 €                   | 1            | 0,019       |
| 71 | 1             | RN112-4-02                           | 219-3261 | RN112-4-02          | 3,160           | 1   | -                  |                 |     | 2       |  | Farnell                     | 1,570 €                   | 2            | 3,140       |
| 72 | 1             | 470uH                                | 770-1182 | DR74-471-R          | 0,977           | 5   | DE0704-470         | 0,254           | 5   | 1       |  | TME                         | 0,254 €                   | 1            | 0,254       |
| 73 | 1             | 33uH - 7443551331                    | -        |                     |                 |     | -                  |                 |     | 2       |  | Mouser                      | 2,970 €                   | 2            | 5,940       |
| 74 | 2             | IHLP2020CZER3R3M11                   | 748-6912 | IHLP2020CZER3R3M01  | 1,518           | 5   | -                  |                 |     | 4       |  | Mouser                      | 1,030 €                   | 4            | 4,120       |
| 75 | 1             | TFT_320QVT                           | 681-6851 | M20-7832046         | 3,027           | 5   | ZL262-40DG         | 0,329           | 2   | 1       |  | TME                         | 0,329 €                   | 2            | 0,658       |
| 76 | 2             | HSMG-C170                            | 435-6767 | HSMG-C170           | 0,206           | 50  | HSMG-C170          | 0,095           | 5   | 2       |  | Mouser                      | 0,060 €                   | 2            | 0,120       |
| 77 | 5             | HSMH-C170                            | 486-0468 | HSMH-C170           | 0,188           | 25  | HSMH-C170          | 0,057           | 10  | 5       |  | TME                         | 0,057 €                   | 5            | 0,287       |
| 78 | 1             | HSMD-C170                            | 486-0525 | HSMD-C170           | 0,231           | 25  | HSMD-C170          | 0,059           | 10  | 1       |  | TME                         | 0,059 €                   | 1            | 0,059       |
| 79 | 4             | HSMY-C170                            | 486-0519 | HSMY-C170           | 0,248           | 25  | HSMY-C170          | 0,060           | 10  | 4       |  | Mouser                      | 0,060 €                   | 4            | 0,240       |



| #  |     |                        |                                                                                           |                              |                | Farnell / Element14 |         |                      |                 | Digi-Key |                        |                 | Mouser |                      |                 |     |
|----|-----|------------------------|-------------------------------------------------------------------------------------------|------------------------------|----------------|---------------------|---------|----------------------|-----------------|----------|------------------------|-----------------|--------|----------------------|-----------------|-----|
|    | Qty | Part name              | Package                                                                                   | Reference designator         | Board name     | Qty                 | Code    | Part Number          | Unit price<br>€ | MOQ      | Part Number            | Unit price<br>€ | MOQ    | Part Number          | Unit price<br>€ | MOQ |
| 80 | 1   | 10K/Beta:3570K         | 0805                                                                                      | NTC1                         | Power board    | 2                   | 1612623 | NTCS0805E3103J<br>MT | 0,413           | 1        | NTCS0805E3103<br>JMT   | 0,250           |        | NTCS0805E3103<br>JMT | 0,145           |     |
| 81 | 1   | MOC3052                | SMD; SDIP-6                                                                               | OK1                          | AUX PS         | 1                   | 2453236 | MOC3052SM            | 0,884           | 1        | MOC3052SM              | 0,910           |        | MOC3052SM            | 0,750           |     |
| 82 | 1   | MOC3062                | SMD; SDIP-6                                                                               | OK2                          | AUX PS         | 1                   | 2322554 | MOC3062SR2VM         | 0,977           | 1        | MOC3062SM              | 1,110           |        | MOC3062SM            | 0,924           |     |
| 83 | 2   | HCPL-181               | SOIC-4                                                                                    | OK3, OK4                     | AUX PS         | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 2   | HCPL-181               | SOIC-4                                                                                    | OK5, OK6                     | Arduino Shield | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    |     |                        |                                                                                           |                              |                | 4                   | 1244525 | HCPL-181-000E        | 0,342           | 1        | HCPL-181-000E          | 0,560           |        | HCPL-181-000E        | 0,150           |     |
| 84 | 2   | IRFR5305               | TO-252                                                                                    | Q1, Q7                       | Power board    | 4                   | 8649820 | IRFR5305PBF          | 0,994           | 1        | IRFR5305PBF-<br>ND     | 0,810           |        | 942-<br>IRFR5305PBF  | 0,805           |     |
|    |     | Option #1: SPD30P06P   | TO-252                                                                                    | Q1, Q7                       | Power board    | 0                   | 2480881 | SPD30P06P G          | 0,980           | 1        | SPD30P06P<br>GCT-ND    | 1,030           |        | 726-<br>SPD30P06PG   | 1,020           |     |
|    |     | Option #2: SUD19P06-60 | TO-252                                                                                    | Q1, Q7                       | Power board    | 0                   | 2101465 | SUD19P06-60-GE3      | 1,590           | 5        | SUD19P06-60-<br>GE3    | 0,950           |        | SUD19P06-60-<br>GE3  | 1,070           |     |
| 85 | 5   | MMBT5551               | SOT-23                                                                                    | Q11, Q12, Q17, Q19, Q20      | Power board    | 10                  | 1459109 | MMBT5551LT1G         | 0,167           | 5        | MMBT5551LT1G           | 0,180           |        | MMBT5551LT1G         | 0,163           |     |
| 86 | 4   | MMBT5401               | SOT-23                                                                                    | Q2, Q9, Q10, Q18             | Power board    | 8                   | 1459108 | MMBT5401LT1G         | 0,167           | 10       | MMBT5401LT1G           | 0,180           |        | MMBT5401LT1G         | 0,163           |     |
| 87 | 2   | BTA26-600              | THT                                                                                       | Q21, Q22                     | AUX PS         | 2                   | 1057286 | BTA26-600BRG         | 2,840           | 1        | BTA26-600BRG           | 2,930           |        | BTA26-600BRG         | 3,110           |     |
| 88 | 1   | IRLL2705PBF            | SOT-223                                                                                   | Q13                          | Power board    | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 1   | IRLL2705PBF            | SOT-223                                                                                   | Q23                          | AUX PS         | 1                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    |     |                        |                                                                                           |                              |                | 3                   | 8651230 | IRLL2705PBF          | 0,578           | 1        | IRLL2705PBF-<br>ND     | 0,630           | 1      | 942-<br>IRLL2705PBF  | 0,622           | 1   |
| 89 | 1   | IRFR48ZPB              | TO-252                                                                                    | Q14                          | Power board    | 2                   | 1013388 | IRFR48ZPBF           | 1,310           | 1        | IRFR48ZTRLPBF<br>CT-ND | 1,090           | 1      | 942-<br>IRFR48ZPBF   | 1,110           | 1   |
| 90 | 5   | IRLML2246TRPBF         | SOT-23                                                                                    | Q26, Q27, Q28, Q29, Q31      | Arduino Shield | 5                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 1   | IRLML2246TRPBF         | SOT-23                                                                                    | Q15                          | Power board    | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    |     |                        |                                                                                           |                              |                | 7                   | 1888166 | IRLML2246TRPBF       | 0,287           | 1        | IRLML2246TRPB<br>F     | 0,400           |        | IRLML2246TRPB<br>F   | 0,389           |     |
| 91 | 2   | 2N7002                 | SOT-23                                                                                    | Q24, Q25                     | AUX PS         | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 3   | 2N7002                 | SOT-23                                                                                    | Q3, Q16, Q34                 | Power board    | 6                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 3   | 2N7002                 | SOT-23                                                                                    | Q30, Q32, Q33                | Arduino Shield | 3                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    |     |                        |                                                                                           |                              |                | 11                  | 1713823 | 2N7002-7-F           | 0,135           | 5        | 2N7002LT1G             | 0,130           |        | 2N7002LT1G           | 0,118           |     |
| 92 | 1   | IRFP250N               | THT, solder on the bottom<br>layer! See pic <a href="#">here</a> and <a href="#">here</a> | Q4                           | Power board    | 2                   | 8649260 | IRFP250NPBF          | 2,080           | 1        | IRFP250NPBF            | 1,870           |        | IRFP250NPBF          | 1,870           |     |
| 93 | 1   | BC857C                 | SOT-23                                                                                    | Q5                           | Power board    | 2                   | 8734771 | BC857C,215           | 0,022           | 10       | BC857CLT1G             | 0,120           |        | BC857CLT1G           | 0,109           |     |
| 94 | 2   | BCP56-16.115           | SOT-223                                                                                   | Q6, Q8                       | Power board    | 4                   | 1081258 | BCP56-16,115         | 0,256           | 5        | BCP56-16T1G            | 0,360           |        | BCP56-16,115         | 0,340           |     |
| 95 | 4   | 0R                     | 0805                                                                                      | JP1, JP2, JP3, R56           | Power board    | 8                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    | 2   | 0R                     | 0805                                                                                      | JP4, JP8                     | Arduino Shield | 2                   |         |                      |                 |          |                        |                 |        |                      |                 |     |
|    |     |                        |                                                                                           |                              |                | 10                  | 9233750 | RC0805JR-070RL       | 0,010           | 10       | RC2012J000CS           | 0,014           |        | RC0805JR-<br>070RL   | 0,012           |     |
| 96 | 6   | 100K 1%                | 0805                                                                                      | R12, R15, R22, R23, R73, R75 | Power board    | 12                  |         |                      |                 |          |                        |                 |        |                      |                 |     |

| #  | RS Components |                          |          |                   |              |     | TME                |              |     | THT SMD |  | Price calculation for 1 set |                     |           |             |
|----|---------------|--------------------------|----------|-------------------|--------------|-----|--------------------|--------------|-----|---------|--|-----------------------------|---------------------|-----------|-------------|
|    | Qty           | Part name                | Code     | Part Number       | Unit price € | MOQ | Code / Part Number | Unit price € | MOQ |         |  | Best Supplier               | Lowest unit price € | Order Qty | Line Cost € |
| 80 | 1             | 10K/Beta:3570K           | 697-4601 | NB12K00103JB B    | 0,392        | 5   | NTCS0805E3103JMT   | 0,190        | 5   | 2       |  | Mouser                      | 0,145 €             | 2         | 0,290       |
| 81 | 1             | MOC3052                  | 761-3690 | MOC3052SM         | 0,739        | 5   | MOC3052SR2VM       | 0,380        | 2   | 1       |  | TME                         | 0,380 €             | 1         | 0,380       |
| 82 | 1             | MOC3062                  | 806-6064 | MOC3062SM         | 0,718        | 10  | MOC3062XSM         | 0,410        | 1   | 1       |  | TME                         | 0,410 €             | 1         | 0,410       |
| 83 | 2             | HCPL-181                 |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 2             | HCPL-181                 |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    |               |                          | 693-5277 | HCPL-181-000E     | 0,343        | 10  | HCPL-181-000E      | 0,250        | 2   | 4       |  | Mouser                      | 0,150 €             | 4         | 0,600       |
| 84 | 2             | IRFR5305                 | 543-2496 | IRFR5305PBF       | 0,994        | 1   | IRFR5305PBF        | 0,540        | 1   | 4       |  | TME                         | 0,540 €             | 2         | 1,080       |
|    |               | Option #1: SPD30P06P     | 898-6864 | SPD30P06P G       | 0,861        | 1   | SPD30P06PGBTMA1    | 0,780        | 1   |         |  |                             |                     |           |             |
|    |               | Option #2: SUD19P06-60 - |          |                   |              |     | -                  |              |     |         |  |                             |                     |           |             |
| 85 | 5             | MMBT5551                 | 545-0400 | MMBT5551LT1G      | 0,129        | 10  | MMBT5551           | 0,020        | 25  | 10      |  | TME                         | 0,020 €             | 25        | 0,510       |
| 86 | 4             | MMBT5401                 | 545-0393 | MMBT5401LT1G      | 0,151        | 10  | MMBT5401           | 0,021        | 25  | 8       |  | TME                         | 0,021 €             | 25        | 0,513       |
| 87 | 2             | BTA26-600                | 714-0515 | BTA26-600BRG      | 3,038        | 1   | BTA26-600BRG       | 2,540        | 1   | 2       |  | TME                         | 2,540 €             | 2         | 5,080       |
| 88 | 1             | IRLL2705PBF              |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 1             | IRLL2705PBF              |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    |               |                          | 540-9907 | IRLL2705PBF       | 0,260        | 1   | IRLL2705PBF        | 0,307        | 1   | 3       |  | RS                          | 0,260 €             | 3         | 0,780       |
| 89 | 1             | IRFR48ZPB                | 688-7055 | IRFR48ZPBF        | 1,234        | 1   | IRFR48ZPBF         | 0,540        | 1   | 2       |  | TME                         | 0,540 €             | 2         | 1,080       |
| 90 | 5             | IRLML2246TRPBF           |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 1             | IRLML2246TRPBF           |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    |               |                          | 760-4432 | IRLML2246TRP BF   | 0,322        | 5   | IRLML2246TRPBF     | 0,100        | 5   | 7       |  | TME                         | 0,100 €             | 7         | 0,700       |
| 91 | 2             | 2N7002                   |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 3             | 2N7002                   |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 3             | 2N7002                   |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    |               |                          | 545-0012 | 2N7002LT1G        | 0,108        | 50  | 2N7002LT1G         | 0,019        | 25  | 11      |  | TME                         | 0,019 €             | 25        | 0,475       |
| 92 | 1             | IRFP250N                 | 541-0042 | IRFP250NPBF       | 2,100        | 1   | IRFP250NPBF        | 1,060        | 1   | 2       |  | TME                         | 1,060 €             | 2         | 2,120       |
| 93 | 1             | BC857C                   | 690-0105 | BC857CLT1G        | 0,102        | 25  | BC857C-DIO         | 0,020        | 25  | 2       |  | TME                         | 0,020 €             | 2         | 0,040       |
| 94 | 2             | BCP56-16.115             | 773-7633 | BCP56-16T3G       | 0,242        | 10  | BCP56-16.115       | 0,106        | 5   | 4       |  | TME                         | 0,106 €             | 4         | 0,424       |
| 95 | 4             | 0R                       |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    | 2             | 0R                       |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |
|    |               |                          | 679-0800 | CRCW08050000 Z0EA | 0,020        | 50  | SMD0805-0R         | 0,006        | 100 | 10      |  | TME                         | 0,006 €             | 15        | 0,090       |
| 96 | 6             | 100K 1%                  |          |                   |              |     |                    |              |     |         |  |                             |                     |           |             |

| #   |     |             |                                           |                                                                                                        |                | Farnell / Element14 |         |                     |                 | Digi-Key |                      |                 | Mouser |                      |                 |     |
|-----|-----|-------------|-------------------------------------------|--------------------------------------------------------------------------------------------------------|----------------|---------------------|---------|---------------------|-----------------|----------|----------------------|-----------------|--------|----------------------|-----------------|-----|
|     | Qty | Part name   | Package                                   | Reference designator                                                                                   | Board name     | Qty                 | Code    | Part Number         | Unit price<br>€ | MOQ      | Part Number          | Unit price<br>€ | MOQ    | Part Number          | Unit price<br>€ | MOQ |
|     | 1   | 100K 1%     | 0805                                      | R123                                                                                                   | AUX PS         | 1                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 4   | 100K 1%     | 0805                                      | R135, R146, R160, R178                                                                                 | Arduino Shield | 4                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 17                  | 2352619 | RCV0805100KFKE<br>A | 0,080           | 10       | RC0805FR-<br>07100KL | 0,019           |        | RC0805FR-<br>07100KL | 0,015           |     |
| 97  | 2   | 100K 0.1%   | 0805                                      | R43, R53                                                                                               | Power board    | 4                   | 1577686 | ERA6AEB104V         | 0,205           | 5        | RT0805BRD0710<br>0KL | 0,350           |        | CPF0805B100KE        | 0,095           |     |
|     | 1   | 100R 1%     | 0805                                      | R116                                                                                                   | AUX PS         | 1                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 1   | 100R 1%     | 0805                                      | R155                                                                                                   | Arduino Shield | 1                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
| 98  | 3   | 100R 1%     | 0805                                      | R7, R8, R42                                                                                            | Power board    | 6                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 8                   | 9332375 | MC01W08051100R      | 0,002           | 10       | RC0805FR-<br>07100RL | 0,019           |        | RC0805FR-<br>07100RL | 0,015           |     |
|     | 2   | 10K 1%      | 0805                                      | R121, R122                                                                                             | AUX PS         | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
| 99  | 5   | 10K 1%      | 0805                                      | R139, R145, R149, R157, R165                                                                           | Arduino Shield | 5                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 19  | 10K 1%      | 0805                                      | R3, R10, R11, R19, R27, R40,<br>R49, R51, R58, R64, R69, R72,<br>R74, R82, R91, R94, R95, R98,<br>R102 | Power board    | 38                  |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 45                  | 9237755 | RC0805FR-0710KL     | 0,011           | 10       | RC0805FR-<br>0710KL  | 0,019           |        | RC0805FR-<br>0710KL  | 0,015           |     |
| 100 | 1   | 10R 1%      | 1206                                      | R143                                                                                                   | Arduino Shield | 1                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 3   | 10R 1%      | 1206                                      | R9, R33, R81                                                                                           | Power board    | 6                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 7                   | 9236643 | RC1206FR-0710RL     | 0,017           | 10       | RC1206FR-<br>0710RL  | 0,029           |        | RC1206FR-<br>0710RL  | 0,022           |     |
| 101 | 1   | 12K4 1%     | 0805                                      | R144                                                                                                   | Arduino Shield | 1                   | 2141850 | MC01W0805112K4      | 0,002           | 10       | RC0805FR-<br>0712K4L | 0,090           |        | RC0805FR-<br>0712K4L | 0,091           |     |
| 102 | 1   | 18-22R / 7W | THT, RM 5mm, radial, max.<br>Height 40 mm | R103                                                                                                   | AUX PS         | 1                   | 1687978 | SQM7-22RJI          | 0,474           | 1        | SQMW722RJ            | 0,590           |        | 280-PRM7-20-<br>RC   | 0,378           |     |
| 103 | 2   | 16K 1%      | 0805                                      | R17, R34                                                                                               | Power board    | 4                   | 9332677 | MC01W0805116K       | 0,002           | 10       | RC0805FR-<br>0716KL  | 0,019           |        | RC0805FR-<br>0716KL  | 0,015           |     |
| 104 | 4   | 180R 1%     | 0805                                      | R134, R147, R148, R150                                                                                 | Arduino Shield | 4                   | 2447583 | MCWR08X1800FT<br>L  | 0,006           | 10       | RC0805FR-<br>07180RL | 0,019           |        | RC0805FR-<br>07180RL | 0,015           |     |
| 105 | 2   | 1K 1%       | 0805                                      | R114, R120                                                                                             | AUX PS         | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 2   | 1K 1%       | 0805                                      | R163, R164                                                                                             | Arduino Shield | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 5   | 1K 1%       | 0805                                      | R28, R38, R68, R78, R92                                                                                | Power board    | 10                  |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 14                  | 1099800 | WCR0805-1K0FI       | 0,018           | 10       | RC0805FR-<br>071KL   | 0,019           |        | RC0805FR-<br>071KL   | 0,015           |     |
| 106 | 2   | 1K8 1%      | 0805                                      | R24, R55                                                                                               | Power board    | 4                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 2   | 1K8 1%      | 0805                                      | R130, R151                                                                                             | Arduino Shield | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 6                   | 2447595 | MCWR08X1801FT<br>L  | 0,006           | 10       | RC0805FR-<br>071K8L  | 0,019           |        | RC0805FR-<br>071K8L  | 0,015           |     |
| 107 | 2   | 1R 1%       | 0805                                      | R129, R132                                                                                             | Arduino Shield | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     | 1   | 1R 1%       | 0805                                      | R6                                                                                                     | Power board    | 2                   |         |                     |                 |          |                      |                 |        |                      |                 |     |
|     |     |             |                                           |                                                                                                        |                | 4                   | 2141629 | MC01W080511R0       | 0,002           | 10       | RC0805FR-<br>071RL   | 0,090           |        | RC0805FR-<br>071RL   | 0,091           |     |

| #   | RS Components |             |          |                       |                 |     | TME                    |                 |     | THT | SMD | Price calculation for 1 set |                           |              |             |
|-----|---------------|-------------|----------|-----------------------|-----------------|-----|------------------------|-----------------|-----|-----|-----|-----------------------------|---------------------------|--------------|-------------|
|     | Qty           | Part name   | Code     | Part Number           | Unit price<br>€ | MOQ | Code / Part Number     | Unit price<br>€ | MOQ |     |     | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
|     | 1             | 100K 1%     |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 4             | 100K 1%     |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 223-0691 | CRG0805F100K          | 0,007           | 50  | SMD0805-100K-1%        | 0,008           | 100 |     | 17  | RS                          | 0,007 €                   | 17           | 0,119       |
| 97  | 2             | 100K 0.1%   | 666-2673 | CPF0805B100K<br>E     | 0,112           | 5   | RN73C2A100KBTDF        | 0,513           | 2   |     | 4   | Mouser                      | 0,095 €                   | 4            | 0,380       |
| 98  | 1             | 100R 1%     |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 1             | 100R 1%     |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 3             | 100R 1%     |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 679-0807 | CRCW0805100<br>RFKEA  | 0,031           | 50  | RC0805FR-07100R        | 0,008           | 100 |     | 8   | Farnell                     | 0,002 €                   | 10           | 0,020       |
| 99  | 2             | 10K 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 5             | 10K 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 19            | 10K 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 223-0562 | CRG0805F10K           | 0,021           | 50  | RC0805FR-0710K         | 0,008           | 100 |     | 45  | TME                         | 0,008 €                   | 50           | 0,385       |
| 100 | 1             | 10R 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 3             | 10R 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 740-9085 | CR1206-FX-<br>10R0ELF | 0,028           | 50  | CRCW120610R0FKTA<br>BC | 0,014           | 100 |     | 7   | TME                         | 0,014 €                   | 10           | 0,137       |
| 101 | 1             | 12K4 1%     | 679-0863 | CRCW080512K<br>4FKEA  | 0,008           | 50  | -                      |                 |     |     | 1   | Farnell                     | 0,002 €                   | 10           | 0,023       |
| 102 | 1             | 18-22R / 7W | 199-8087 | SQMW722RJ             | 0,725           | 5   | -                      |                 |     | 1   |     | Mouser                      | 0,378 €                   | 1            | 0,378       |
| 103 | 2             | 16K 1%      | 679-0920 | CRCW080516K<br>0FKEA  | 0,014           | 50  | SMD0805-16K-1%         | 0,008           | 100 |     | 4   | Farnell                     | 0,002 €                   | 10           | 0,020       |
| 104 | 4             | 180R 1%     | 223-0326 | CRG0805F180R          | 0,006           | 50  | SMD0805-180R-1%        | 0,008           | 100 |     | 4   | Farnell                     | 0,024 €                   | 10           | 0,240       |
| 105 | 2             | 1K 1%       |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 2             | 1K 1%       |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 5             | 1K 1%       |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 223-0427 | CRG0805F1K0           | 0,013           | 50  | RC0805FR-071K          | 0,008           | 100 |     | 14  | TME                         | 0,008 €                   | 15           | 0,116       |
| 106 | 2             | 1K8 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 2             | 1K8 1%      |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 679-1033 | CRCW08051K8<br>0FKEA  | 0,011           | 50  | SMD0805-1K8-1%         | 0,008           | 100 |     | 6   | Farnell                     | 0,006 €                   | 10           | 0,063       |
| 107 | 2             | 1R 1%       |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     | 1             | 1R 1%       |          |                       |                 |     |                        |                 |     |     |     |                             |                           |              |             |
|     |               |             | 721-5631 | ERJ6BQF1R0V           | 0,246           | 5   | RC0805FR-071R          | 0,009           | 100 |     | 4   | Farnell                     | 0,002 €                   | 10           | 0,022       |

| #   |     |           |         |         |                                                                        | Qty            | Farnell / Element14 |         |                     |                 | Digi-Key |                       |                 | Mouser |                              |                 |     |
|-----|-----|-----------|---------|---------|------------------------------------------------------------------------|----------------|---------------------|---------|---------------------|-----------------|----------|-----------------------|-----------------|--------|------------------------------|-----------------|-----|
|     | Qty | Part name |         | Package | Reference designator                                                   |                | Board name          | Code    | Part Number         | Unit price<br>€ | MOQ      | Part Number           | Unit price<br>€ | MOQ    | Part Number                  | Unit price<br>€ | MOQ |
| 108 | 2   | 24K       | 0.1%    | 0805    | R44, R54                                                               | Power board    | 4                   | 1670195 | ERA3AEB243V         | 0,184           | 10       | YAG1843CT-ND          | 0,330           | 1      | 660-<br>RN732ATTD240<br>2B25 | 0,292           | 1   |
| 109 | 2   | 22R       | 1%      | 0805    | R124, R125                                                             | AUX PS         | 2                   | 2447609 | MCWR08X22R0FT<br>L  | 0,007           | 10       | 0603YC104KAT2<br>A    | 0,090           | 1      | 603-RC0805FR-<br>0722RL      | 0,094           | 1   |
| 110 | 11  | 220R      | 1%      | 0805    | R21, R31, R35, R36, R41, R47,<br>R57, R76, R77, R79, R80               | Power board    | 22                  |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 3   | 220R      | 1%      | 0805    | R110, R113, R118                                                       | AUX PS         | 3                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 2   | 220R      | 1%      | 0805    | R166, R177                                                             | Arduino Shield | 2                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     |     |           |         |         |                                                                        |                | 27                  | 1099795 | WCR0805-220RFI      | 0,024           | 10       | RC0805FR-<br>07220RL  | 0,019           |        | RC0805FR-<br>07220RL         | 0,015           |     |
| 111 | 2   | 3K9       | 0.1%    | 0805    | R60, R70                                                               | Power board    | 4                   | 9237690 | RC0805FR-073K9L     | 0,022           | 10       | 311-3.90KCRCT-<br>ND  | 0,080           | 1      | 603-RC0805FR-<br>073K9L      | 0,085           | 1   |
| 112 | 3   | 2K2       | 1%      | 0805    | R106, R107, R119                                                       | AUX PS         | 3                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 6   | 2K2       | 1%      | 0805    | R29, R30, R45, R61, R90, R93                                           | Power board    | 12                  |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     |     |           |         |         |                                                                        |                | 15                  | 9237534 | RC0805FR-072K2L     | 0,011           | 10       | RC0805FR-<br>072K2L   | 0,019           |        | RC0805FR-<br>072K2L          | 0,015           |     |
| 113 | 1   | 2R2       | 5% / 2W | 2512    | R26                                                                    | Power board    | 2                   | 1376975 | RC2512JK-<br>7W2R2L | 0,557           | 10       | CRM2512-JW-<br>2R2ELF | 0,320           |        | CRM2512-JW-<br>2R2ELF        | 0,341           |     |
| 114 | 3   | 316K      | 1%      | 0805    | R13, R20, R25                                                          | Power board    | 6                   | 2671011 | WR08X3163FTL        | 0,026           | 10       | 311-316KCRCT-<br>ND   | 0,080           | 1      | 667-ERJ-<br>6ENF3163V        | 0,085           | 1   |
| 115 | 2   | 330R      | 1%      | 0805    | R83, R101                                                              | Power board    | 4                   | 9333037 | MC01W08051330R      | 0,002           | 10       | RC0805FR-<br>07330RL  | 0,090           |        | RC0805FR-<br>07330RL         | 0,091           |     |
| 116 | 4   | 330R      | 5% / 2W | 2512    | R104, R105, R108, R111                                                 | AUX PS         | 4                   | 1265196 | 3520330RJT          | 0,122           | 10       | RHC2512FT330R         | 0,760           |        | 3521330RFT                   | 0,580           |     |
| 117 | 2   | 470R      | 1%      | 0805    | R37, R50                                                               | Power board    | 4                   | 1099798 | WCR0805-470RFI      | 0,024           | 10       | RC0805FR-<br>07470RL  | 0,019           |        | RC0805FR-<br>07470RL         | 0,015           |     |
| 118 | 2   | 47K       | 1%      | 0805    | R154, R158                                                             | Arduino Shield | 2                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 7   | 47K       | 1%      | 0805    | R5, R66, R67, R85, R86, R87,<br>R100                                   | Power board    | 14                  |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     |     |           |         |         |                                                                        |                | 16                  | 2447664 | MCWR08X4702FT<br>L  | 0,006           | 10       | RC0805FR-<br>0747KL   | 0,019           |        | RC0805FR-<br>0747KL          | 0,015           |     |
| 119 | 11  | 4K7       | 1%      | 0805    | R126, R127, R128, R131, R133,<br>R136, R137, R156, R159, R161,<br>R162 | Arduino Shield | 11                  |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 1   | 4K7       | 1%      | 0805    | R16                                                                    | Power board    | 2                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     |     |           |         |         |                                                                        |                | 13                  | 9333266 | MC01W080514K7       | 0,002           | 10       | RC0805FR-<br>074K7L   | 0,019           |        | RC0805FR-<br>074K7L          | 0,015           |     |
| 120 | 4   | 49R9      | 1%      | 0805    | R138, R140, R141, R142                                                 | Arduino Shield | 4                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 2   | 49R9      | 1%      | 0805    | R109, R112                                                             | AUX PS         | 2                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     |     |           |         |         |                                                                        |                | 6                   | 2141727 | MC01W0805149R9      | 0,002           | 10       | RC0805FR-<br>0749R9L  | 0,019           |        | RC0805FR-<br>0749R9L         | 0,015           |     |
| 121 | 1   | 51K       | 1%      | 0805    | R48                                                                    | Power board    | 2                   | 9334653 | MC01W0805551K       | 0,015           | 10       | RC0805FR-<br>0751KL   | 0,019           |        | RC0805FR-<br>0751KL          | 0,015           |     |
| 122 | 2   | 5K1       | 1%      | 0805    | R18, R84, R97                                                          | Power board    | 4                   | 9333320 | MC01W080515K1       | 0,002           | 10       | RC0805FR-<br>075K1L   | 0,019           |        | RC0805FR-<br>075K1L          | 0,015           |     |
| 123 | 2   | 5K6       | 1%      | 0805    | R115, R117                                                             | AUX PS         | 2                   |         |                     |                 |          |                       |                 |        |                              |                 |     |
|     | 2   | 5K6       | 1%      | 0805    | R88, R99                                                               | Power board    | 4                   |         |                     |                 |          |                       |                 |        |                              |                 |     |

| #   | RS Components |              |          |                       |                 |     | TME                   |                 |     | THT SMD |  | Price calculation for 1 set |                           |              |             |
|-----|---------------|--------------|----------|-----------------------|-----------------|-----|-----------------------|-----------------|-----|---------|--|-----------------------------|---------------------------|--------------|-------------|
|     | Qty           | Part name    | Code     | Part Number           | Unit price<br>€ | MOQ | Code / Part Number    | Unit price<br>€ | MOQ |         |  | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 108 | 2             | 24K 0.1%     |          |                       |                 |     | AR0805-24K-0.1%       | 0,111           | 10  | 4       |  | TME                         | 0,111 €                   | 4            | 0,442       |
| 109 | 2             | 22R 1%       | 223-0203 | CRG0805F22R           | 0,006           | 50  | SMD0805-22R-1%        | 0,008           | 100 | 2       |  | RS                          | 0,006 €                   | 2            | 0,012       |
| 110 | 11            | 220R 1%      |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              | 0,000       |
|     | 3             | 220R 1%      |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 2             | 220R 1%      |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     |               |              | 223-0332 | CRG0805F220R          | 0,024           | 50  | RC0805FR-07220R       | 0,007           | 100 | 27      |  | TME                         | 0,007 €                   | 50           | 0,357       |
| 111 | 2             | 3K9 0.1%     | -        |                       |                 |     | AR0805-3K9-0.1%       | 0,099           | 10  | 4       |  | Farnell                     | 0,022 €                   | 4            | 0,090       |
| 112 | 3             | 2K2 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 6             | 2K2 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     |               |              | 679-1207 | CRCW08052K2<br>0FKEA  | 0,027           | 50  | SMD0805-2K2-1%        | 0,008           | 100 | 15      |  | TME                         | 0,008 €                   | 30           | 0,242       |
| 113 | 1             | 2R2 5% / 2W  | 720-3231 | CRM2512-JW-<br>2R2ELF | 0,406           | 5   | WF25P-2R2-5%          | 0,042           | 50  | 2       |  | TME                         | 0,042 €                   | 2            | 0,084       |
| 114 | 3             | 316K 1%      | -        |                       |                 |     | CRCW0805316KFKA<br>BC | 0,012           | 100 | 6       |  | TME                         | 0,012 €                   | 10           | 0,116       |
| 115 | 2             | 330R 1%      | 740-9022 | CR0805-FX-<br>3300GLF | 0,025           | 50  | RC0805FR-07330R       | 0,007           | 100 | 4       |  | Farnell                     | 0,002 €                   | 10           | 0,020       |
| 116 | 4             | 330R 5% / 2W | 755-1224 | 3521330RFT            | 0,182           | 10  | WF25P-330R-5%         | 0,042           | 50  | 4       |  | TME                         | 0,042 €                   | 10           | 0,419       |
| 117 | 2             | 470R 1%      | 223-0376 | CRG0805F470R          | 0,024           | 50  | RC0805FR-07470R       | 0,007           | 100 | 4       |  | TME                         | 0,007 €                   | 10           | 0,073       |
| 118 | 2             | 47K 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 7             | 47K 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     |               |              | 679-1434 | CRCW080547K<br>0FKEA  | 0,010           | 50  | RC0805FR-0747K        | 0,007           | 100 | 16      |  | Farnell                     | 0,006 €                   | 20           | 0,126       |
| 119 | 11            | 4K7 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 1             | 4K7 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     |               |              | 223-0528 | CRG0805F4K7           | 0,011           | 50  | RC0805FR-074K7        | 0,008           | 100 | 13      |  | Farnell                     | 0,002 €                   | 20           | 0,040       |
| 120 | 4             | 49R9 1%      |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 2             | 49R9 1%      |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     |               |              | 679-1462 | CRCW080549R<br>9FKEA  | 0,011           | 50  | RC0805FR-0749R9       | 0,007           | 100 | 6       |  | Farnell                     | 0,002 €                   | 10           | 0,020       |
| 121 | 1             | 51K 1%       | 679-1525 | CRCW080551K<br>0FKEA  | 0,020           | 50  | RC0805FR-0751K        | 0,006           | 100 | 2       |  | TME                         | 0,006 €                   | 10           | 0,061       |
| 122 | 2             | 5K1 1%       | 679-1569 | CRCW08055K1<br>0FKEA  | 0,027           | 50  | RC0805FR-075K1        | 0,007           | 100 | 4       |  | Farnell                     | 0,002 €                   | 10           | 0,021       |
| 123 | 2             | 5K6 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |
|     | 2             | 5K6 1%       |          |                       |                 |     |                       |                 |     |         |  |                             |                           |              |             |

| #   |     |                                                       |                                                                 |                                             |                | Farnell / Element14 |         |                    |                 | Digi-Key |                       |                 | Mouser |                      |                 |     |
|-----|-----|-------------------------------------------------------|-----------------------------------------------------------------|---------------------------------------------|----------------|---------------------|---------|--------------------|-----------------|----------|-----------------------|-----------------|--------|----------------------|-----------------|-----|
|     | Qty | Part name                                             | Package                                                         | Reference designator                        | Board name     | Qty                 | Code    | Part Number        | Unit price<br>€ | MOQ      | Part Number           | Unit price<br>€ | MOQ    | Part Number          | Unit price<br>€ | MOQ |
| 124 |     |                                                       |                                                                 |                                             |                | 6                   | 2447693 | MCWR08X5601FT<br>L | 0,006           | 10       | RC0805FR-075K6L       | 0,019           |        | RC0805FR-075K6L      | 0,015           |     |
|     |     |                                                       |                                                                 |                                             |                |                     |         |                    |                 |          |                       |                 |        |                      |                 |     |
|     | 3   | 750R 1%                                               | 0805                                                            | R46, R89, R96                               | Power board    | 6                   |         |                    |                 |          |                       |                 |        |                      |                 |     |
|     | 2   | 750R 1%                                               | 0805                                                            | R152, R153                                  | Arduino Shield | 2                   |         |                    |                 |          |                       |                 |        |                      |                 |     |
|     |     |                                                       |                                                                 |                                             |                | 8                   | 9333525 | MC01W08051750R     | 0,002           | 10       | RC0805FR-07750RL      | 0,019           |        | RC0805FR-07750RL     | 0,015           |     |
| 125 | 2   | 7K5 0.1%                                              | 0805                                                            | R39, R52                                    | Power board    | 4                   | 1670239 | ERA6AEB752V        | 0,312           | 10       | RT0805BRD077K5L       | 0,350           |        | RT0805BRD077K5L      | 0,357           |     |
| 126 | 2   | 82R (0.1 or 1%)                                       | 0805 / 0603                                                     | R62, R71                                    | Power board    | 4                   | 1577592 | ERA3AEB820V        | 0,185           | 10       | P82DBCT-ND            | 0,370           | 1      | 667-ERA-6AEB820V     | 0,547           | 1   |
| 127 | 2   | 0R010 1% / 2W                                         | 2512, 2-3 W (max. ±75 PPM/°C)                                   | R4, R65, R65A, R65B                         | Power board    | 4                   | 1435947 | CRA2512-FZ-R010ELF | 0,484           | 10       | CRA2512-FZ-R010ELF    | 0,540           |        | CRA2512-FZ-R010ELF   | 0,568           |     |
|     | 3   | Option #1: 3 x R030 / 2W                              | 2512, 2-3 W (max. ±75 PPM/°C)                                   | R65, R65A, R65B                             | Power board    | 6                   | 2321759 | CRA2512-FZ-R030ELF | 0,556           | 10       | LVM25FVR030E CT-ND    | 0,520           | 1      | 652-CRA2512FZR030ELF | 0,510           | 1   |
| 128 | 1   | ??? (or 0R if not used)                               | 1206 / 0805 (low TCR)                                           | R179                                        | Power board    | 2                   |         |                    | 0,000           |          |                       | 0,000           |        |                      | 0,000           |     |
| 129 | 1   | 0R082 1%                                              | 1210 / 1206 (low TCR)                                           | R63                                         | Power board    | 2                   | 2483564 | TLM2BDR082FTE      | 0,417           | 10       | A109594CT-ND          | 0,410           | 1      | 754-RL1220T-R082-G   | 0,306           | 1   |
| 130 | 1   | 1M 1%                                                 | 0805                                                            | R176                                        | Arduino Shield | 1                   | 2447596 | MCWR08X1004FT<br>L | 0,006           | 10       | 311-1.00MCRCT-ND      | 0,090           | 1      | 603-RC0805FR-071ML   | 0,094           | 1   |
| 131 | 2   | 4x10K 5%                                              | 1206; resistor array                                            | RN1, RN2                                    | Arduino Shield | 2                   | 1770137 | CAY16-103J4LF      | 0,110           | 10       | CAY16-103J4LF         | 0,090           |        | CAY16-103J4LF        | 0,095           |     |
| 132 | 1   | CG2-470L                                              | THT                                                             | SAR1                                        | AUX PS         | 1                   | 1846854 | 2027-47-BLF        | 1,850           | 1        | 2027-47-BLF           | 1,270           |        | 2027-47-BLF          | 1,340           |     |
| 133 | 1   | LD-BZEN-0903                                          | THT                                                             | SP1 Buzzer                                  | Arduino Shield | 1                   | -       |                    |                 |          | -                     |                 |        | TE092703-6           | 2,200           |     |
| 134 | 1   | A101SYCQ04                                            | THT, solder on the bottom layer. See pic <a href="#">here</a> . | SW1                                         | Arduino Shield | 1                   | 2292959 | A101SYCQ04         | 2,760           | 1        | A101SYCQ04            | 3,000           |        | A101SYCQ04           | 2,640           |     |
| 135 | 1   | PEC12R-4225F-S0024                                    | THT                                                             | SW2 incremental encoder, shaft length 25 mm | Arduino Shield | 1                   | 2663533 | PEC12R-4225F-S0024 | 1,580           | 1        | PEC12R-4225F-S0024-ND | 1,180           | 1      | 652-PEC12R-4225F-S24 | 1,150           | 1   |
| 136 | 1   | 1301.9316                                             | SMD; tactile switch                                             | SW3                                         | Arduino Shield | 1                   | 1217765 | 1301.9316          | 0,302           | 1        | FSM6JSMA              | 0,210           |        | 1301.9316            | 0,270           |     |
| 137 | 1   | VTX-214-005-0512                                      | THT                                                             | TR1                                         | AUX PS         | 1                   | 2627176 | VTX-214-005-0512   | 5,980           | 1        | -                     |                 |        | -                    |                 |     |
| 138 | 2   | ERZE14A431                                            | THT                                                             | VAR1, VAR2                                  | AUX PS         | 2                   | 2291852 | ERZE14A431         | 0,546           | 1        | P15589-ND             | 0,990           | 1      | 667-ERZ-E14A431      | 0,905           | 1   |
| 139 | 2   | ERZE11A431                                            | THT                                                             | VAR3, VAR4                                  | AUX PS         | 2                   | 2291831 | ERZE11A431         | 0,418           | 1        | P16688-ND             | 0,470           | 1      | 667-ERZ-E11A431      | 0,472           | 1   |
| 140 | 1   | 39-30-1039                                            | THT 4,2mm 3-pin                                                 | X1                                          | Power board    | 2                   | 2425045 | 39-30-1039         | 0,550           | 1        | WM18442-ND            | 0,630           | 1      | 538-39-30-1039       | 0,585           | 1   |
| 141 | 1   | 2411-01                                               | THT, solder on the bottom layer!                                | X11 USB Connector                           | AUX PS         | 1                   | 1177884 | 2411-01            | 1,050           | 1        | 952-1767-ND           | 0,730           |        | 710-61400413321      | 1,200           |     |
| 142 | 4   | ZL305-08 (or similar with 0.1" raster and 5mm height) | THT, solder on the bottom layer! Two headers per one connector. | X12, X14 Front Treminal                     | Arduino Shield | 4                   | 1804161 | CES-108-01-G-S     | 2,420           | 5        | SAM10955-ND           | 2,340           | 1      | -                    |                 |     |
| 143 | 2   | TSW-113-07-F-D                                        | THT; 2x13-pin header                                            | X13, X15 Power board main connectors        | Arduino Shield | 2                   | 2025182 | TSW-113-07-F-D     | 2,240           | 5        | S5566-ND              | 2,150           | 1      | 710-61302621121      | 1,410           |     |
| 144 | 1   | 22-23-2021                                            | THT                                                             | X17 AUX temp                                | Arduino Shield | 1                   | 1462926 | 22-23-2021         | 0,100           | 1        | 22-23-2021            | 0,140           |        | 22-23-2021           | 0,141           |     |
| 145 | 1   | SSW-113-02-T-D-RA                                     | THT; 2x13-pin socket                                            | X2                                          | Power board    | 2                   | 1805583 | SSW-113-02-G-D-RA  | 5,700           | 2        | SSW-113-02-G-D-RA     | 5,340           |        | -                    |                 |     |
| 146 | 1   | 39-30-3055                                            | THT 4,2mm 5pin                                                  | X3 AC In                                    | AUX PS         | 1                   | 9963561 | 39303055           | 0,530           | 1        | 39-30-3055            | 1,180           |        | 39-30-3055           | 0,923           |     |
| 147 | 1   | 09185107324                                           | THT; 2x5-pin header                                             | X5                                          | AUX PS         | 1                   |         |                    |                 |          |                       |                 |        |                      |                 |     |
|     | 1   | 09185107324                                           | THT; 2x5-pin header                                             | X16                                         | Arduino Shield | 1                   |         |                    |                 |          |                       |                 |        |                      |                 |     |
|     |     |                                                       |                                                                 |                                             |                | 2                   | 1096985 | 09 18 510 7324     | 1,220           | 1        | 09185107324           | 1,460           |        | 09185107324          | 1,460           |     |
| 148 | 1   | 22-23-2031                                            | THT                                                             | X4 FAN Connector                            | AUX PS         | 1                   | 1462950 | 22-23-2031         | 0,081           | 1        | 22-23-2031            | 0,210           |        | 22-23-2031           | 0,198           |     |

| #   | RS Components |                                                       |          |                    |              |     | TME                 |              |     | THT SMD |  | Price calculation for 1 set |                     |           |             |
|-----|---------------|-------------------------------------------------------|----------|--------------------|--------------|-----|---------------------|--------------|-----|---------|--|-----------------------------|---------------------|-----------|-------------|
|     | Qty           | Part name                                             | Code     | Part Number        | Unit price € | MOQ | Code / Part Number  | Unit price € | MOQ |         |  | Best Supplier               | Lowest unit price € | Order Qty | Line Cost € |
| 124 |               |                                                       | 679-1572 | CRCW08055K60FKEA   | 0,021        | 50  | SMD0805-5K6-1%      | 0,008        | 100 | 6       |  | Farnell                     | 0,006 €             | 10        | 0,063       |
|     | 3             | 750R 1%                                               |          |                    |              |     |                     |              |     |         |  |                             |                     |           |             |
|     | 2             | 750R 1%                                               |          |                    |              |     |                     |              |     |         |  |                             |                     |           |             |
| 125 |               |                                                       | 679-1660 | CRCW0805750RFKEA   | 0,010        | 50  | CRCW0805750RFKTA BC | 0,012        | 100 | 8       |  | Farnell                     | 0,002 €             | 20        | 0,040       |
|     | 2             | 7K5 0.1%                                              | 666-2588 | CPF0805B7K5E       | 0,280        | 5   | RN73C2A7K5BTDF      | 0,520        | 2   | 4       |  | RS                          | 0,280 €             | 5         | 1,400       |
|     | 2             | 82R (0.1 or 1%)                                       | 565-863  | ERA6AEB820V        | 0,046        | 5   | AR0805-82R-0.1%     | 0,113        | 10  | 4       |  | RS                          | 0,046 €             | 10        | 0,460       |
| 127 | 2             | 0R010 1% / 2W                                         | 693-4381 | CRA2512-FZ-R010ELF | 0,515        | 5   | LRP2512-R010-1%     | 0,151        | 5   | 4       |  | TME                         | 0,151 €             | 5         | 0,754       |
|     | 3             | Option #1: 3 x R030 / 2W                              | 869-5495 | TLM3ADR030FTE      | 0,447        | 1   | LRP12FTDRR030       | 0,145        | 1   |         |  |                             |                     |           |             |
| 128 | 1             | ??? (or 0R if not used)                               |          |                    | 0,000        |     |                     | 0,000        |     | 2       |  | Farnell                     | 0,000 €             | 5         | 0,000       |
| 129 | 1             | 0R082 1%                                              | 869-5283 | TLM2BDR082FTE      | 0,114        | 10  | CS1206-0R082-1%-HP  | 0,156        | 10  | 2       |  | RS                          | 0,114 €             | 5         | 0,570       |
| 130 | 1             | 1M 1%                                                 | 223-0821 | CRG0805F1M0        | 0,019        | 50  | RC0805FR-071M       | 0,008        | 100 | 1       |  | Farnell                     | 0,006 €             | 5         | 0,029       |
| 131 | 2             | 4x10K 5%                                              | 522-5585 | CAY16-103J4LF      | 0,020        | 50  | DR1206-10K-4/8      | 0,007        | 100 | 2       |  | TME                         | 0,007 €             | 2         | 0,013       |
| 132 | 1             | CG2-470L                                              | 878-3652 | CG2-470L           | 2,279        | 10  | CG2-470L            | 1,450        | 1   | 1       |  | Digikey                     | 1,270 €             | 1         | 1,270       |
| 133 | 1             | LD-BZEN-0903                                          | -        |                    |              |     | LD-BZEN-0903        | 0,504        | 3   | 1       |  | TME                         | 0,504 €             | 3         | 1,512       |
| 134 | 1             | A101SYCQ04                                            | 710-9788 | A101SYCQ04         | 2,576        | 1   | -                   |              |     | 1       |  | RS                          | 2,576 €             | 1         | 2,576       |
| 135 | 1             | PEC12R-4225F-S0024                                    | 781-6811 | PEC12R-4225F-S0024 | 1,120        | 1   | -                   |              | 1   | 1       |  | RS                          | 1,120 €             | 1         | 1,120       |
| 136 | 1             | 1301.9316                                             | 718-2443 | FSM6JSMATR         | 0,818        | 5   | 1301.9316           | 0,220        | 5   | 1       |  | Digikey                     | 0,210 €             | 1         | 0,210       |
| 137 | 1             | VTX-214-005-0512                                      | -        |                    |              |     | -                   |              |     | 1       |  | Farnell                     | 5,980 €             | 1         | 5,980       |
| 138 | 2             | ERZE14A431                                            | 785-8960 | ERZE14A431         | 0,928        | 5   | -                   |              |     | 2       |  | Farnell                     | 0,546 €             | 2         | 1,092       |
| 139 | 2             | ERZE11A431                                            | 785-8904 | ERZE11A431         | 0,249        | 25  | -                   |              |     | 2       |  | RS                          | 0,249 €             | 2         | 0,498       |
| 140 | 1             | 39-30-1039                                            | 670-5751 | 39-30-1039         | 0,550        | 5   | MX-5566-03A3        | 0,498        | 1   | 2       |  | TME                         | 0,498 €             | 2         | 0,996       |
| 141 | 1             | 2411-01                                               | -        |                    |              |     | 2411-01             | 0,660        | 1   | 1       |  | TME                         | 0,660 €             | 1         | 0,660       |
| 142 | 4             | ZL305-08 (or similar with 0.1" raster and 5mm height) | 766-6626 | CES-108-01-G-S     | 1,080        | 1   | ZL305-08            | 0,560        | 1   | 4       |  | TME                         | 0,560 €             | 4         | 2,240       |
| 143 | 2             | TSW-113-07-F-D                                        | -        |                    |              |     | -                   |              |     | 2       |  | Mouser                      | 1,410 €             | 2         | 2,820       |
| 144 | 1             | 22-23-2021                                            | 679-5583 | 22-23-2021         | 0,087        | 10  | MX-22-23-2021       | 0,070        | 10  | 1       |  | TME                         | 0,070 €             | 1         | 0,070       |
| 145 | 1             | SSW-113-02-T-D-RA                                     | -        |                    |              |     | ZL263-26DG          | 0,399        | 2   | 2       |  | TME                         | 0,399 €             | 2         | 0,798       |
| 146 | 1             | 39-30-3055                                            | 670-5861 | 39-30-3055         | 0,563        | 5   | -                   |              |     | 1       |  | Farnell                     | 0,530 €             | 1         | 0,530       |
| 147 | 1             | 09185107324                                           |          |                    |              |     |                     |              |     |         |  |                             |                     |           |             |
|     | 1             | 09185107324                                           |          |                    |              |     |                     |              |     |         |  |                             |                     |           |             |
|     |               |                                                       | 740-7108 | 09185107324        | 1,442        | 1   | T821-1-10-S1        | 0,290        | 2   | 2       |  | TME                         | 0,290 €             | 2         | 0,580       |
| 148 | 1             | 22-23-2031                                            | 679-5587 | 22-23-2031         | 0,083        | 10  | MX-22-23-2031       | 0,080        | 10  | 1       |  | TME                         | 0,080 €             | 1         | 0,080       |



| #   | Qty | Part name                           | Package                                 | Reference designator                                  | Board name     | Qty | Farnell / Element14 |                       |                 |     | Digi-Key              |                 |     | Mouser           |                 |     |
|-----|-----|-------------------------------------|-----------------------------------------|-------------------------------------------------------|----------------|-----|---------------------|-----------------------|-----------------|-----|-----------------------|-----------------|-----|------------------|-----------------|-----|
|     |     |                                     |                                         |                                                       |                |     | Code                | Part Number           | Unit price<br>€ | MOQ | Part Number           | Unit price<br>€ | MOQ | Part Number      | Unit price<br>€ | MOQ |
| 149 | 1   | CTB9300/3A                          | THT                                     | X6 DOUT2 Connector                                    | AUX PS         | 1   | 3882044             | CTB9300/3A            | 0,176           | 1   | ED2800-ND             | 0,350           | 1   | 710-691311700103 | 0,620           | 1   |
| 150 | 1   | LMJ2138812S0LOT6C or WE 74990101210 | THT, <b>solder on the bottom layer!</b> | X7 RJ45 Connector                                     | AUX PS         | 1   | 2356129             | 74990101210           | 7,110           | 1   | 732-4497-5-ND         | 9,450           | 1   | 710-74990101210  | 6,960           | 1   |
| 151 | 1   | 826629-8                            | THT 8-Pin Header                        | X8                                                    | AUX PS         | 1   |                     |                       |                 |     |                       |                 |     |                  |                 |     |
|     | 6   | 826629-8                            | THT 8-Pin Header                        | MCU-ADCL, MCU-ADCH, MCU-COMM, MCU-PWML, MCU-PWMH, X18 | Arduino Shield | 6   |                     |                       |                 |     |                       |                 |     |                  |                 |     |
|     |     |                                     |                                         |                                                       |                | 7   | 1022256             | M20-9990845           | 0,117           | 10  | M20-9990845           | 0,240           |     | M20-9990845      | 0,317           |     |
| 152 | 1   | 826629-6                            | THT 6-Pin Header                        | MCU-POWER                                             | Arduino Shield | 1   | 1022255             | M20-9990646           | 0,161           | 10  | 952-2270-ND           | 0,220           | 1   | 855-M20-9990646  | 0,226           | 1   |
| 153 | 1   | 10-89-7361                          | THT 2x18-Pin Header                     | MCU-DIGITAL                                           | Arduino Shield | 1   | 2356147             | 61303621121           | 1,580           | 1   | WM50022-36-ND         | 3,020           | 1   | 538-10-89-7361   | 1,680           | 1   |
| 154 | 1   | 826629-5                            | THT 5-Pin Header                        | X10                                                   | AUX PS         | 1   | 2452473             | 826629-5              | 0,631           | 50  | 826629-5              | 0,660           |     | M20-9990545      | 0,217           |     |
| 155 | 1   | 32.768kHz                           | THT                                     | Y1                                                    | Arduino Shield | 1   | 1611828             | AB38T-32.768KHZ       | 0,185           | 1   | AB38T-32.768KHZ       | 0,150           |     | AB38T-32.768KHZ  | 0,155           |     |
| 156 | 1   | 25MHz                               | SMD, 11.5mm x 4.7mm                     | Y2                                                    | Arduino Shield | 1   | 2467741             | ABLS-25.000MHZ-B4-F-T | 0,393           | 1   | ABLS-25.000MHZ-B4-F-T | 0,240           |     | ABLS-25.0M-F-T   | 0,260           |     |
| 157 | 1   | SMAJ51A                             | DO-214AC                                | ZD1                                                   | Power board    | 2   | 1578999             | SMAJ51A               | 0,163           | 5   | SMAJ51ALFCT-ND        | 0,370           | 1   | 576-SMAJ51A      | 0,405           | 1   |
| 158 | 5   | SMAJ18A                             | DO-214AC                                | ZD8, ZD9, ZD11, ZD12, ZD14                            | Arduino Shield | 5   |                     |                       |                 |     |                       |                 |     |                  |                 |     |
|     | 1   | SMAJ18A                             | DO-214AC                                | ZD6                                                   | AUX PS         | 1   |                     |                       |                 |     |                       |                 |     |                  |                 |     |
|     |     |                                     |                                         |                                                       |                | 6   | 1749305             | SMAJ18A-TR            | 0,070           | 10  | SMA6J18A-TR           | 0,340           |     | SMA6J18A-TR      | 0,407           |     |
| 159 | 1   | BZT52C4V3                           | SOD-123                                 | ZD13                                                  | Arduino Shield | 1   | 2077927             | BZT52C4V3             | 0,146           | 1   |                       |                 |     | 821-BZT52C4V3    | 0,108           | 1   |
| 160 | 1   | BZX384-C15.115                      | SOD-323                                 | ZD2                                                   | Power board    | 2   | 8735506             | BZX384-C15            | 0,182           | 5   | MM3Z15VT1G            | 0,130           |     | MM3Z15VT1G       | 0,118           |     |
| 161 | 1   | PDZ6.2B                             | SOD-323                                 | ZD3                                                   | Power board    | 2   | 1757863             | PDZ6.2B,115           | 0,266           | 5   | MM3Z6V2T1G            | 0,130           |     | MM3Z6V2T1G       | 0,118           |     |
| 162 | 2   | P4SMAJ48A                           | DO-214AC                                | ZD7, ZD10                                             | Arduino Shield | 2   | 1749310             | SMAJ48A-TR            | 0,264           | 1   | SMAJ48A-TR            | 0,340           |     | SMAJ48A-TR       | 0,340           |     |
| 163 | 2   | 1.5KE400CA                          | THT                                     | ZD4, ZD5                                              | AUX PS         | 2   | 2341650             | 1.5KE400CARL          | 0,777           | 1   | 1.5KE400CA-TP         | 0,560           |     | 1.5KE400CA-TP    | 0,549           |     |

| Not installed |                  |                                            |                        |                |   |   |  |  |  |  |  |
|---------------|------------------|--------------------------------------------|------------------------|----------------|---|---|--|--|--|--|--|
| 2             | 1u 50V X7R       | 0805, 50V                                  | C104A, C109A           | Arduino Shield | 2 |   |  |  |  |  |  |
| 1             | n.c.             | 0805                                       | C12                    | Power board    | 2 | - |  |  |  |  |  |
| 1             | 1u               | 0805                                       | C149                   | Arduino Shield | 1 | - |  |  |  |  |  |
| 4             | 1n               | 0805                                       | C142, C143, C147, C148 | Power board    | 8 | - |  |  |  |  |  |
| 1             | n.c.             | 1206                                       | C144                   | Power board    | 2 | - |  |  |  |  |  |
| 2             | 2m2              | THT, Ø18mm, <b>solder on bottom layer!</b> | C145, C146             | Power board    | 4 | - |  |  |  |  |  |
| 2             | 470n 50V X7R     | 0805, 50V                                  | C150, C153             | Arduino Shield | 2 |   |  |  |  |  |  |
| 2             | 4n7 100V X7R     | 0805                                       | C151, C152             | Arduino Shield | 2 |   |  |  |  |  |  |
| 1             | 100n             | 0805                                       | C154                   | Arduino Shield | 1 | - |  |  |  |  |  |
| 1             | 220n X7R         | 0805                                       | C155                   | Arduino Shield | 1 | - |  |  |  |  |  |
| 1             | 1uF/50V Tant.    | 6032                                       | C27                    | power bord     | 1 | - |  |  |  |  |  |
| 1             | n.c.             | 0805                                       | C62                    | Power board    | 2 | - |  |  |  |  |  |
| 2             | 47u 35V          | SMD ELCO, Ø6.3 x 5.8mm                     | C77, C80               | AUX PS         | 2 |   |  |  |  |  |  |
| 1             | SMBJ5.0A-TR      | DO-214AA                                   | D17                    | Arduino Shield | 1 | - |  |  |  |  |  |
| 4             | STPS15H100       | TO-252                                     | D22, D23, D24, D25     | Power board    | 8 | - |  |  |  |  |  |
| 1             | 74LVC1G125GW.125 | TSSOP-5                                    | IC33                   | Arduino board  | 1 | - |  |  |  |  |  |

| #             | RS Components |                                     |          |                    |                 |     | TME                |                 |     | THT SMD |        | Price calculation for 1 set |                        |           |             |
|---------------|---------------|-------------------------------------|----------|--------------------|-----------------|-----|--------------------|-----------------|-----|---------|--------|-----------------------------|------------------------|-----------|-------------|
|               | Qty           | Part name                           | Code     | Part Number        | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |         |        | Best Supplier               | Lowest unit price<br>€ | Order Qty | Line Cost € |
| 149           | 1             | CTB9300/3A                          |          |                    |                 |     | TBG-5.0-PW-3P      | 0,114           |     | 1       |        | TME                         | 0,114 €                | 1         | 0,114       |
| 150           | 1             | LMJ2138812S0LOT6C or WE 74990101210 | 814-9875 | 74990101210        | 7,180           | 1   | LMJ2138812S0LOT6C  | 2,950           | 1   | 1       |        | TME                         | 2,950 €                | 1         | 2,950       |
| 151           | 1             | 826629-8                            |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
|               | 6             | 826629-8                            |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
|               |               |                                     | 681-2997 | M20-9990845        | 0,125           | 10  | ZL201-08G          | 0,065           | 10  | 7       |        | TME                         | 0,065 €                | 10        | 0,649       |
| 152           | 1             | 826629-6                            | 745-7062 | M20-9990646        | 0,244           | 10  | ZL201-06G          | 0,037           | 10  | 1       |        | TME                         | 0,037 €                | 1         | 0,037       |
| 153           | 1             | 10-89-7361                          | 828-1569 | 61303621121        | 1,626           | 1   | -                  |                 |     | 1       |        | Farnell                     | 1,580 €                | 1         | 1,580       |
| 154           | 1             | 826629-5                            | 681-2981 | M20-9990545        | 0,160           | 10  | ZL201-05G          | 0,032           | 25  | 1       |        | TME                         | 0,032 €                | 1         | 0,032       |
| 155           | 1             | 32.768kHz                           | 226-1443 | LFXTAL002995       | 0,532           | 1   | 32.768K-TC38       | 0,144           | 5   | 1       |        | TME                         | 0,144 €                | 1         | 0,144       |
| 156           | 1             | 25MHz                               | 814-9550 | QCS25.0000F18 B23R | 0,217           | 10  | 25.00M-SMDHC49S    | 0,373           | 2   | 1       |        | RS                          | 0,217 €                | 1         | 0,217       |
| 157           | 1             | SMAJ51A                             | 687-3309 | SMAJ51A R3         | 0,073           | 25  | SMAJ51A-LF         | 0,175           | 3   | 2       |        | RS                          | 0,073 €                | 2         | 0,146       |
| 158           | 5             | SMAJ18A                             |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
|               | 1             | SMAJ18A                             |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
|               |               |                                     | 795-9268 | SMA6J18A-TR        | 0,112           | 25  | P4SMAJ18A-DIO      | 0,105           | 5   | 6       |        | Farnell                     | 0,070 €                | 6         | 0,420       |
| 159           | 1             | BZT52C4V3                           | 545-3027 | MMSZ5229BT1 G      | 0,135           | 20  | BZT52C4V3-DIO      | 0,019           | 25  | 1       |        | TME                         | 0,019 €                | 1         | 0,019       |
| 160           | 1             | BZX384-C15.115                      | 802-4568 | MM3Z15VST1G        | 0,013           | 200 | BZX384-C15.115     | 0,019           | 25  | 2       |        | RS                          | 0,013 €                | 2         | 0,026       |
| 161           | 1             | PDZ6.2B                             | 725-8247 | PDZ6.2B,115        | 0,014           | 100 | PDZ6.2B            | 0,019           | 25  | 2       |        | RS                          | 0,014 €                | 2         | 0,028       |
| 162           | 2             | P4SMAJ48A                           | 687-3286 | SMAJ48A            | 0,098           | 25  | P4SMAJ48A-DIO      | 0,102           | 5   | 2       |        | RS                          | 0,098 €                | 2         | 0,196       |
| 163           | 2             | 1.5KE400CA                          | 486-4381 | 1.5KE400CA         | 0,781           | 5   | 1.5KE400CA         | 0,256           | 3   | 2       |        | TME                         | 0,256 €                | 2         | 0,512       |
|               |               |                                     |          |                    |                 |     |                    |                 |     | 3       | 59 659 | 197,84 €                    |                        |           |             |
| Not installed |               |                                     |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
| 2             | 1u            | 50V X7R                             |          |                    |                 |     |                    |                 |     | 2       |        |                             |                        |           |             |
| 1             | n.c.          |                                     |          |                    |                 |     |                    |                 |     | 2       |        |                             |                        |           |             |
| 1             | 1u            |                                     |          |                    |                 | -   |                    |                 |     | 1       |        |                             |                        |           |             |
| 4             | 1n            |                                     |          |                    |                 |     |                    |                 |     | 8       |        |                             |                        |           |             |
| 1             | n.c.          |                                     |          |                    |                 |     |                    |                 |     | 2       |        |                             |                        |           |             |
| 2             | 2m2           |                                     |          |                    |                 | -   |                    |                 |     | 4       |        |                             |                        |           |             |
| 2             | 470n          | 50V X7R                             |          |                    |                 |     |                    |                 |     | 2       |        |                             |                        |           |             |
| 2             | 4n7           | 100V X7R                            |          |                    |                 |     |                    |                 |     | 2       |        |                             |                        |           |             |
| 1             | 100n          |                                     |          |                    |                 | -   |                    |                 |     | 1       |        |                             |                        |           |             |
| 1             | 220n          | X7R                                 |          |                    |                 |     |                    |                 |     | 1       |        |                             |                        |           |             |
| 1             | 1uF/50V       | Tant.                               |          |                    |                 |     |                    |                 |     | 1       |        |                             |                        |           |             |
| 1             | n.c.          |                                     |          |                    |                 | -   |                    |                 |     | 2       |        |                             |                        |           |             |
| 2             | 47u           | 35V                                 |          |                    |                 |     |                    |                 |     |         |        |                             |                        |           |             |
| 1             | SMBJ5.0A      | -TR                                 |          |                    |                 |     |                    |                 |     | 1       |        |                             |                        |           |             |
| 4             | STPS15H       | 100                                 |          |                    |                 | -   |                    |                 |     | 8       |        |                             |                        |           |             |
| 1             | 74LVC1G       | 125GW.125                           |          |                    |                 |     |                    |                 |     | 1       |        |                             |                        |           |             |

| # |     |                              |               |                                         |                | Farnell / Element14 |      |             |                 | Digi-Key |             |                 | Mouser |             |                 |     |
|---|-----|------------------------------|---------------|-----------------------------------------|----------------|---------------------|------|-------------|-----------------|----------|-------------|-----------------|--------|-------------|-----------------|-----|
|   | Qty | Part name                    | Package       | Reference designator                    | Board name     | Qty                 | Code | Part Number | Unit price<br>€ | MOQ      | Part Number | Unit price<br>€ | MOQ    | Part Number | Unit price<br>€ | MOQ |
| 1 |     | TPA6205A1DGN                 | MSOP-8        | IC34                                    | Arduino board  | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | 693072010801                 | Micro SD card | J7                                      | Arduino board  | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | HSMY-C170                    | 0805 Yellow   | LED                                     | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | n.c.                         | 0805          | R1                                      | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | 1R 1%                        | 0805          | R136A, R140A                            | Arduino Shield | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | 47K 1%                       | 0805          | R174                                    | Arduino Shield | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | n.c.                         | 1206          | R167                                    | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | 12K                          | 1208          | R168                                    | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | 20K 1%                       | 0805          | R169, R175                              | Arduino board  | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | 1K 1%                        | 0805          | R170, R171                              | Arduino Shield | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | 10K 1%                       | 0805          | R172, R173                              | Arduino Shield | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | n.c.                         | 0805          | R2, R14                                 | Power board    | 4                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 2 |     | n.c.                         | 0805          | R32, R59                                | Power board    | 4                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | LD-BZEN-0903                 | THT           | SP2, if used mount SP1 on this position | Arduino Shield | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | 826629-5                     | THT           | X9                                      | AUX PS         | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | 282836-2                     | THT           | X19                                     | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | PCA-6B-20-HL-3 or 52746-2071 | SMT           | X20 3.5" Riverdi TFT LCD                | Arduino board  | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | FFC 20-pin cable 150 mm      |               | 3.5" Riverdi TFT LCD                    | Arduino board  | 1                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | n.c.                         |               | ZD15                                    | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |
| 1 |     | PDZ5.6B                      |               | ZD16                                    | Power board    | 2                   | -    |             |                 |          |             |                 |        |             |                 |     |

| # | RS Components                   |           |      |             |                 |     | TME                |                 |     | THT |   | SMD |  | Price calculation for 1 set |                        |           |             |
|---|---------------------------------|-----------|------|-------------|-----------------|-----|--------------------|-----------------|-----|-----|---|-----|--|-----------------------------|------------------------|-----------|-------------|
|   | Qty                             | Part name | Code | Part Number | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |     |   |     |  | Best Supplier               | Lowest unit price<br>€ | Order Qty | Line Cost € |
| 1 | TPA6205A1DGN                    |           |      |             |                 |     |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | 693072010801                    |           |      |             |                 |     |                    |                 |     |     |   |     |  |                             |                        |           |             |
| 1 | HSMY-C170                       |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 1 | n.c.                            |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 2 | 1R 1%                           |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 1 | 47K 1%                          |           |      |             |                 |     |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | n.c.                            |           |      |             |                 | -   |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 1 | 12K                             |           |      |             |                 | -   |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 2 | 20K 1%                          |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 2 | 1K 1%                           |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 2 | 10K 1%                          |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 2 | n.c.                            |           |      |             |                 | -   |                    |                 |     |     | 4 |     |  |                             |                        |           |             |
| 2 | n.c.                            |           |      |             |                 | -   |                    |                 |     |     | 4 |     |  |                             |                        |           |             |
| 1 | LD-BZEN-0903                    |           |      |             |                 |     |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | 826629-5                        |           |      |             |                 | -   |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | 282836-2                        |           |      |             |                 | -   |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 1 | PCA-6B-20-HL-3 or<br>52746-2071 |           |      |             |                 |     |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | FFC 20-pin cable 150<br>mm      |           |      |             |                 |     |                    |                 |     |     | 1 |     |  |                             |                        |           |             |
| 1 | n.c.                            |           |      |             |                 |     |                    |                 |     |     | 2 |     |  |                             |                        |           |             |
| 1 | PDZ5.6B                         |           |      |             |                 | -   |                    |                 |     |     | 2 |     |  |                             |                        |           |             |

| #                            |                                              |                                                                                                                                                                    |                                                           |                      |                | Farnell / Element14 |                 |             |                 | Digi-Key        |             |                 | Mouser  |             |                 |     |
|------------------------------|----------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------|----------------------|----------------|---------------------|-----------------|-------------|-----------------|-----------------|-------------|-----------------|---------|-------------|-----------------|-----|
|                              | Qty                                          | Part name                                                                                                                                                          | Package                                                   | Reference designator | Board name     | Qty                 | Code            | Part Number | Unit price<br>€ | MOQ             | Part Number | Unit price<br>€ | MOQ     | Part Number | Unit price<br>€ | MOQ |
| Power module AC input option |                                              |                                                                                                                                                                    |                                                           |                      |                |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | 2200uF 63V                                   | THT, <b>solder on bottom layer!</b>                                                                                                                                | C145, C146                                                | Power board          | 4              | 1822562             | UVR1J222MHD     | 2,540       | 1               | UVR1H222MHD     | 1,680       | UVR1H222MHD     | 1,710   |             |                 |     |
|                              | Option #1:<br>UVZ1H222MHD                    | THT, <b>solder on bottom layer!</b>                                                                                                                                | C145, C146                                                | Power board          | 0              | 1822570             | UVZ1H222MHD     | 2,420       | 1               | UVZ1H222MHD     | 1,500       | UVZ1H222MHD     | 1,690   |             |                 |     |
|                              | Option #2:<br>UVZ1J222MHD                    | THT, <b>solder on bottom layer!</b>                                                                                                                                | C145, C146                                                | Power board          | 0              | 1822575             | UVZ1J222MHD     | 2,420       | 1               | UVZ1J222MHD     | 2,210       | UVZ1J222MHD     | 2,780   |             |                 |     |
| 4                            | STPS15H100                                   | TO-252                                                                                                                                                             | D22, D23, D24, D25                                        | Power board          | 8              | 2344052             | STPS15H100CB-TR | 1,070       | 1               | STPS15H100CB    | 0,900       | STPS15H100CB    | 0,896   |             |                 |     |
| 1                            | 12K 1%                                       | 1206                                                                                                                                                               | R168                                                      | Power board          | 2              | 1100220             | WCR1206-12KFI   | 0,026       | 10              | RC1206FR-0712KL | 0,090       | RC1206FR-0712KL | 0,091   |             |                 |     |
| 1                            | 282836-2                                     | THT, Terminal Block                                                                                                                                                | X19                                                       | Power board          | 2              | 3089034             | 282836-2        | 0,452       | 1               | 282836-2        | 0,830       | 282836-2        | 0,385   |             |                 |     |
| 1                            | INDEL TST450/014                             | -                                                                                                                                                                  | Transformer: toroidal; 450VA; 230VAC; 2x40V; 2x5.62A; 4kg | Enclosure            | 1              | -                   |                 |             |                 | VPT100-5000     | 81,040      | VPM100-5000     | 129,850 |             |                 |     |
| Other                        |                                              |                                                                                                                                                                    |                                                           |                      |                |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 1                            | MEAN WELL LRS-150-48                         | Power module 48VDC; 3.3A                                                                                                                                           |                                                           | Power board          | 2              | -                   |                 |             |                 | -               |             | LRS-150-48      | 23,980  | 1           |                 |     |
|                              | Option #1: MEAN WELL LRS-150F-48             | Power module 48VDC; 3.3A (auto-range)                                                                                                                              |                                                           | Power board          | 0              | -                   |                 |             |                 | -               |             | LRS-150F-48     | 28,190  | 1           |                 |     |
| 0                            | Heatsink 70 x 120 mm                         | Not required if Varisom enclosure kit is purchased!                                                                                                                |                                                           | Power board          | 0              | -                   |                 |             |                 | -               |             | -               |         |             |                 |     |
| 1                            | Arduino Due                                  |                                                                                                                                                                    |                                                           | Arduino Shield       | 1              | 2250861             | A000062         | 40,660      | 1               |                 |             |                 |         |             |                 |     |
| 1                            | 3.2" TFT LCD                                 | Search on eBay, Aliexpress, Banggood etc. for TFT_320QVT with ILI9341 controller (for example: <a href="#">eBay</a> ). It should looks like <a href="#">this</a> . |                                                           |                      | Arduino Shield | 1                   | -               |             |                 |                 |             |                 |         |             |                 |     |
| 1                            | Varisom enclosure kit                        | Enclosure, AC/DC mounting rail, TFT display mounting rail, handles, foot                                                                                           |                                                           |                      | Enclosure      | 1                   | -               |             |                 |                 |             |                 |         |             |                 |     |
| 1                            | PCB+PCBA                                     |                                                                                                                                                                    |                                                           |                      | Enclosure      | 1                   | -               |             |                 |                 |             |                 |         |             |                 |     |
| Nuts & bolts                 |                                              |                                                                                                                                                                    |                                                           |                      |                |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 1                            | 12V fan 60x60mm                              |                                                                                                                                                                    |                                                           | Enclosure            | 1              | -                   |                 |             |                 | -               |             | -               |         |             |                 |     |
| 4                            | FSP-2                                        | Fastener for fan                                                                                                                                                   |                                                           | Enclosure            | 4              | -                   |                 |             |                 | -               |             | -               |         |             |                 |     |
| 1                            | FG-06                                        | Finger guard, 60x60mm, metal                                                                                                                                       |                                                           | Enclosure            | 1              | 2292912             | MC32696         | 0,567       | 1               | -               |             | -               |         |             |                 |     |
| 2                            | MC000006                                     | Insert into 2 x headers 5mm height                                                                                                                                 | X12, X14 Front Treminal                                   | Arduino Shield       | 2              | 2007972             | MC000006        | 1,900       | 1               | -               |             | -               |         |             |                 |     |
| 2                            | 0.4 mm thermal silicone pad                  | Power module's Q4 mounting on heatsink                                                                                                                             |                                                           | Enclosure            | 2              |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | 5 mm thick thermal silicone pad (20 x 75 mm) | Mounted below power pre-regulator                                                                                                                                  | Shenzhen 3KS Electronic Material                          | Enclosure            | 2              |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | BS-244DSM-R                                  | Binding post 4mm, red                                                                                                                                              | J1, J5                                                    | Arduino Shield       | 2              | -                   |                 |             |                 |                 |             |                 |         |             |                 |     |
| 1                            | BS-244DSM-G                                  | Binding post 4mm, green                                                                                                                                            | J3                                                        | Arduino Shield       | 1              | -                   |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | BS-244DSM-B                                  | Binding post 4mm, black                                                                                                                                            | J4, J6                                                    | Arduino Shield       | 2              | -                   |                 |             |                 |                 |             |                 |         |             |                 |     |
| 5                            | Washer, spring M5                            | Binding posts                                                                                                                                                      |                                                           | Arduino Shield       | 5              | -                   |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | M3x5 countersunk, black finish               | Rear and front panel, bottom holes                                                                                                                                 |                                                           | Enclosure            | 3              |                     |                 |             |                 |                 |             |                 |         |             |                 |     |
| 2                            | M3x5 countersunk, black finish               | AC/DC mounting rail                                                                                                                                                |                                                           | Enclosure            | 2              |                     |                 |             |                 |                 |             |                 |         |             |                 |     |

| #                     | RS Components                                |           |                 |             |                 |                        | TME                |                 |     | THT SMD |         | Price calculation for 1 set |                        |           |             |
|-----------------------|----------------------------------------------|-----------|-----------------|-------------|-----------------|------------------------|--------------------|-----------------|-----|---------|---------|-----------------------------|------------------------|-----------|-------------|
|                       | Qty                                          | Part name | Code            | Part Number | Unit price<br>€ | MOQ                    | Code / Part Number | Unit price<br>€ | MOQ |         |         | Best Supplier               | Lowest unit price<br>€ | Order Qty | Line Cost € |
| Power module AC input |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 2                     | 2200uF 63V                                   | 862-3229  | UVR1H222MHD     | 2,156       | 1               | UVR1H222MHD            | 1,100              | 1               |     |         |         |                             |                        |           |             |
|                       | Option #1:<br>UVZ1H222MHD                    | 845-4755  | UVZ1H222MHD     | 1,218       | 5               | UVZ1H222MHD            | 0,973              | 1               |     |         |         |                             |                        |           |             |
|                       | Option #2:<br>UVZ1J222MHD                    | 862-1759  | UVZ1J222MHD     | 2,814       | 1               | UVZ1J222MHD            | 1,593              | 1               | 4   |         | TME     | 1,593 €                     | 4                      | 6,372     |             |
| 4                     | STPS15H100                                   | 795-9075  | STPS15H100CB-TR | 0,924       | 5               | -                      |                    |                 |     | 8       | Mouser  | 0,896 €                     | 8                      | 7,168     |             |
| 1                     | 12K 1%                                       | 223-2401  | CRG1206F12K     | 0,008       | 50              | RC1206JR-0712K         | 0,006              | 100             |     | 2       | TME     | 0,006 €                     | 2                      | 0,013     |             |
| 1                     | 282836-2                                     | 361-7667  | 282836-2        | 0,414       | 5               | 282836-2               | 0,280              | 2               | 2   |         | TME     | 0,280 €                     | 2                      | 0,560     |             |
| 1                     | INDEL TST450/014                             |           |                 |             |                 | TST450/014             | 36,500             | 1               | 1   |         | TME     | 36,500 €                    | 1                      | 36,500    |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| Other                 |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 1                     | MEAN WELL LRS-150-48 -                       |           |                 |             |                 | LRS-150-48             | 17,000             | 1               | -   |         | TME     | 17,000 €                    | 2                      | 34,000    |             |
|                       | Option #1: MEAN WELL - LRS-150F-48           |           |                 |             |                 | LRS-150F-48            | 18,000             | 1               | -   |         |         |                             |                        |           |             |
| 0                     | Heatsink 70 x 120 mm -                       |           |                 |             |                 | -                      |                    |                 | -   |         |         |                             |                        | 0,000     |             |
| 1                     | Arduino Due                                  | 769-7412  | A000062         | 33,680      | 1               | lthead, Eckstein, etc. | 19,480             |                 | -   |         | TME     | 19,480 €                    | 1                      | 19,480    |             |
| 1                     | 3.2" TFT LCD                                 |           |                 |             |                 | lthead, Eckstein, etc. | 12,140             |                 | -   |         | TME     | 12,140 €                    | 1                      | 12,140    |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 1                     | Varisom enclosure kit                        |           |                 |             |                 |                        |                    |                 | -   |         |         |                             |                        |           |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 1                     | PCB+PCBA                                     |           |                 |             |                 |                        |                    |                 | -   |         |         |                             |                        |           |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 65,62 €               |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| Nuts & bolts          |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 1                     | 12V fan 60x60mm                              | -         |                 |             |                 | MB60251V1-G99          | 2,590              | 1               |     |         | TME     | 2,590 €                     | 1                      | 2,590     |             |
| 4                     | FSP-2                                        | -         |                 |             |                 | FSP-2                  | 0,140              | 5               |     |         | TME     | 0,140 €                     | 1                      | 0,140     |             |
| 1                     | FG-06                                        | -         |                 |             |                 | FG-06                  | 0,513              | 1               |     |         | TME     | 0,513 €                     | 1                      | 0,513     |             |
| 2                     | MC000006                                     | -         |                 |             |                 | -                      |                    |                 |     |         | Farnell | 1,900 €                     | 2                      | 3,800     |             |
|                       |                                              |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 2                     | 0.4 mm thermal silicone pad                  |           |                 |             |                 | SMICA-SOT93            | 0,214              | 10              |     |         | TME     | 0,214 €                     | 20                     | 4,270     |             |
| 2                     | 5 mm thick thermal silicone pad (20 x 75 mm) |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 2                     | BS-244DSM-R                                  |           |                 |             |                 | BS-244DSM-R            | 1,120              | 1               |     |         | TME     | 1,120 €                     | 2                      | 2,240     |             |
| 1                     | BS-244DSM-G                                  |           |                 |             |                 | BS-244DSM-G            | 1,120              | 1               |     |         | TME     | 1,120 €                     | 1                      | 1,120     |             |
| 2                     | BS-244DSM-B                                  |           |                 |             |                 | BS-244DSM-B            | 1,140              | 1               |     |         | TME     | 1,140 €                     | 2                      | 2,280     |             |
| 5                     | Washer, spring M5                            |           |                 |             |                 | B5/BN672               | 0,010              | 100             |     |         | TME     | 0,010 €                     | 5                      | 0,049     |             |
| 2                     | M3x5 countersunk, black finish               |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |
| 2                     | M3x5 countersunk, black finish               |           |                 |             |                 |                        |                    |                 |     |         |         |                             |                        |           |             |

| # |                                        |                                                              |         |                      |                | Farnell / Element14 |         |             |                 | Digi-Key |             |                 | Mouser |             |                 |     |
|---|----------------------------------------|--------------------------------------------------------------|---------|----------------------|----------------|---------------------|---------|-------------|-----------------|----------|-------------|-----------------|--------|-------------|-----------------|-----|
|   | Qty                                    | Part name                                                    | Package | Reference designator | Board name     | Qty                 | Code    | Part Number | Unit price<br>€ | MOQ      | Part Number | Unit price<br>€ | MOQ    | Part Number | Unit price<br>€ | MOQ |
| 2 | M3x5 countersunk, black finish         | Display mounting rail to front panel top holes               |         |                      | Enclosure      | 2                   |         |             |                 |          |             |                 |        |             |                 |     |
| 2 | M3x5 countersunk, black finish         | AC inlet                                                     |         |                      | Enclosure      | 2                   |         |             |                 |          |             |                 |        |             |                 |     |
| 8 | M3x5 countersunk, black finish         | Top and bottom plates, side holes                            |         |                      | Enclosure      | 8                   |         |             |                 |          |             |                 |        |             |                 |     |
| 8 | M3x5 countersunk, black finish         | Power board heatsink top and bottom plate mounting           |         |                      | Enclosure      | 8                   |         |             |                 |          |             |                 |        |             |                 |     |
|   |                                        |                                                              |         |                      |                | 25                  | -       |             |                 |          |             |                 |        |             |                 |     |
| 4 | M4x6                                   | Front panel handles                                          |         |                      | Enclosure      | 4                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 1 | M3 nut                                 | Earth connection                                             |         |                      | Enclosure      | 1                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 1 | Washer externally serrated M3, D=6mm   | Earth connection                                             |         |                      | Enclosure      | 1                   |         |             |                 |          |             |                 |        |             |                 |     |
| 2 | Washer externally serrated M3, D=6mm   | Power module's Q4 mounting on heatsink                       |         |                      | Enclosure      | 2                   |         |             |                 |          |             |                 |        |             |                 |     |
|   |                                        |                                                              |         |                      |                | 3                   | 7096471 | 6797/3.0    | 1,870           | 100      |             |                 |        |             |                 |     |
| 2 | M3x12, cheese head                     | Power module's Q4 mounting on heatsink                       |         |                      | Enclosure      | 2                   |         |             |                 |          |             |                 |        |             |                 |     |
| 1 | M3x12, cheese head                     | Enclosure feet for Earth connection                          |         |                      | Enclosure      | 1                   |         |             |                 |          |             |                 |        |             |                 |     |
|   |                                        |                                                              |         |                      |                | 3                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 4 | Washer M3, 8mm                         | Enclosure feet                                               |         |                      | Enclosure      | 4                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 5 | M3x8, black finish                     | AUX PS mounting, ext                                         |         |                      | AUX PS         | 5                   |         |             |                 |          |             |                 |        |             |                 |     |
| 2 | M3x8, black finish                     | Three part heatsink joints                                   |         |                      | Power board    | 4                   |         |             |                 |          |             |                 |        |             |                 |     |
| 3 | M3x8, black finish                     | Enclosure feet                                               |         |                      | Enclosure      | 3                   |         |             |                 |          |             |                 |        |             |                 |     |
| 4 | M3x8, black finish                     | Power module mounting on heatsink                            |         |                      | Power board    | 8                   |         |             |                 |          |             |                 |        |             |                 |     |
|   |                                        |                                                              |         |                      |                | 20                  | -       |             |                 |          |             |                 |        |             |                 |     |
| 5 | M3x5                                   | AUX PS mounting, int                                         |         |                      | AUX PS         | 5                   |         |             |                 |          |             |                 |        |             |                 |     |
| 4 | M3x5                                   | TFT display to display mounting rail                         |         |                      | Enclosure      | 4                   |         |             |                 |          |             |                 |        |             |                 |     |
| 1 | M3x5                                   | AC/DC terminals cover                                        |         |                      | Enclosure      | 1                   |         |             |                 |          |             |                 |        |             |                 |     |
| 4 | M3x5                                   | AC/DC mounting rail                                          |         |                      | Enclosure      | 4                   |         |             |                 |          |             |                 |        |             |                 |     |
|   |                                        |                                                              |         |                      |                | 14                  | -       |             |                 |          |             |                 |        |             |                 |     |
| 2 | TFF-M3X40/DR124                        | 40 mm metal spacer, M3 (a pair is required for dual channel) |         |                      | Enclosure      | 2                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 5 | Screwed spacer sleeve; hexagonal       | 14 mm, M3                                                    |         |                      | AUX PS         | 5                   | 1466812 | 05.03.143   | 0,397           | 4        |             |                 |        |             |                 |     |
| 5 | Screwed spacer sleeve; M5; 8mm; brass  | Extend binding post for PCB mounting                         |         |                      | Arduino Shield | 5                   | -       |             |                 |          |             |                 |        |             |                 |     |
| 8 | Spacer sleeve; 5mm; cylindrical; brass | Power module mounting on heatsink                            |         |                      | Enclosure      | 8                   | 1733405 | D01475      | 0,106           | 10       |             |                 |        |             |                 |     |
| 4 | FIX-3-2                                | 2mm spacer between TFT display and display mounting frame    |         |                      | Arduino Shield | 4                   |         |             |                 |          |             |                 |        |             |                 |     |

| # | RS Components |                                        |      |             |                 |     | TME                |                 |     | THT |  | SMD |  | Price calculation for 1 set |                           |              |             |
|---|---------------|----------------------------------------|------|-------------|-----------------|-----|--------------------|-----------------|-----|-----|--|-----|--|-----------------------------|---------------------------|--------------|-------------|
|   | Qty           | Part name                              | Code | Part Number | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |     |  |     |  | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 2 |               | M3x5 countersunk, black finish         |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 2 |               | M3x5 countersunk, black finish         |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 8 |               | M3x5 countersunk, black finish         |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 8 |               | M3x5 countersunk, black finish         |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
|   |               |                                        |      |             |                 |     | M3X5/D965B         | 0,013           | 100 |     |  |     |  | TME                         | 0,013 €                   | 25           | 0,331       |
| 4 |               | M4x6                                   |      |             |                 |     | B4X6/BN3334        | 0,014           | 100 |     |  |     |  | TME                         | 0,014 €                   | 10           | 0,135       |
| 1 |               | M3 nut                                 |      |             |                 |     | B3/BN117           | 0,005           | 100 |     |  |     |  | TME                         | 0,005 €                   | 1            | 0,005       |
| 1 |               | Washer externally serrated M3, D=6mm   |      |             |                 |     | B3/BN789           | 0,009           | 100 |     |  |     |  | TME                         | 0,009 €                   | 10           | 0,089       |
| 2 |               | Washer externally serrated M3, D=6mm   |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
|   |               |                                        |      |             |                 |     | B3/BN789           | 0,008           | 100 |     |  |     |  | TME                         | 0,008 €                   | 3            | 0,025       |
| 2 |               | M3x12, cheese head                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 1 |               | M3x12, cheese head                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
|   |               |                                        |      |             |                 |     | M3X12/D7985-A2     | 0,011           | 100 |     |  |     |  | TME                         | 0,011 €                   | 3            | 0,034       |
| 4 |               | Washer M3, 8mm                         |      |             |                 |     | B8X0.4/BN806       | 0,026           | 100 |     |  |     |  | TME                         | 0,026 €                   | 4            | 0,103       |
| 5 |               | M3x8, black finish                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 2 |               | M3x8, black finish                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 3 |               | M3x8, black finish                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 4 |               | M3x8, black finish                     |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
|   |               |                                        |      |             |                 |     | M3X8/D7985B        | 0,019           | 100 |     |  |     |  | TME                         | 0,019 €                   | 20           | 0,371       |
| 5 |               | M3x5                                   |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 4 |               | M3x5                                   |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 1 |               | M3x5                                   |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
| 4 |               | M3x5                                   |      |             |                 |     |                    |                 |     |     |  |     |  |                             |                           |              |             |
|   |               |                                        |      |             |                 |     | M3X5/D7985         | 0,013           | 100 |     |  |     |  | TME                         | 0,013 €                   | 14           | 0,178       |
| 2 |               | TFF-M3X40/DR124                        |      |             |                 |     | TFF-M3X40/DR124    | 0,156           | 10  |     |  |     |  | TME                         | 0,156 €                   | 2            | 0,312       |
| 5 |               | Screwed spacer sleeve; hexagonal       |      |             |                 |     | B3X14/BN3320       | 0,309           | 10  |     |  |     |  | TME                         | 0,309 €                   | 5            | 1,547       |
| 5 |               | Screwed spacer sleeve; M5; 8mm; brass  |      |             |                 |     | TFM-M5X8/DR218     | 0,187           | 10  |     |  |     |  | TME                         | 0,187 €                   | 5            | 0,934       |
| 8 |               | Spacer sleeve; 5mm; cylindrical; brass |      |             |                 |     | DR316/3.2X5        | 0,057           | 10  |     |  |     |  | TME                         | 0,057 €                   | 8            | 0,456       |
| 4 |               | FIX-3-2                                |      |             |                 |     | FIX-3-2            | 0,016           | 10  |     |  |     |  | TME                         | 0,016 €                   | 4            | 0,064       |



| #            |     |                         |                                                             |                                         |                | Farnell / Element14 |         |                   |                 | Digi-Key |             |                 | Mouser |                    |                 |     |
|--------------|-----|-------------------------|-------------------------------------------------------------|-----------------------------------------|----------------|---------------------|---------|-------------------|-----------------|----------|-------------|-----------------|--------|--------------------|-----------------|-----|
|              | Qty | Part name               | Package                                                     | Reference designator                    | Board name     | Qty                 | Code    | Part Number       | Unit price<br>€ | MOQ      | Part Number | Unit price<br>€ | MOQ    | Part Number        | Unit price<br>€ | MOQ |
| 12           |     | Light pipe for LED      | Round; Ø3mm; Front: convex; straight                        |                                         | Arduino Shield | 12                  | 2293496 | PLP2-500          | 0,627           | 10       |             |                 |        |                    |                 |     |
| 1            |     | Schurter 4304.6090      | C14 IEC inlet, switch, 2 fuse drawer is included            |                                         | Enclosure      | 1                   | 2080294 | 4304.6090         | 9,200           | 1        | 486-1084-ND | 13,080          | 1      | 693-4304.6090      | 11,760          | 1   |
| 2            |     | 4A Fuse                 | 230 VAC                                                     |                                         | AUX PS         | 2                   | -       |                   |                 |          |             |                 |        |                    |                 |     |
|              |     | 8A Fuse                 | 115 VAC option                                              |                                         |                | 0                   | -       |                   |                 |          |             |                 |        |                    |                 |     |
| 0,05         |     | CB-HFT50.8/1M-BL        | Heat shrink sleeve; 2:1, 50.8mm                             |                                         | AUX PS         | 0,05                | -       |                   |                 |          |             |                 |        |                    |                 |     |
| 1            |     | A3116068                | Encoder knob head                                           |                                         | Arduino Shield | 1                   | -       |                   |                 |          | -           |                 |        | -                  |                 |     |
| 1            |     | A3216007                | Encoder knob cap; grey                                      |                                         | Arduino Shield | 1                   | -       |                   |                 |          | -           |                 |        | -                  |                 |     |
| 1            |     | SD card 8Gb, min. 4Mb/s |                                                             |                                         | Arduino Shield | 1                   | -       |                   |                 |          | -           |                 |        | 908-AP8GSDHC4-B    | 8,710           | 1   |
| 1            |     | CTB92VG/3S              | Pluggable terminal block; female; 5mm; angled 90° for DOUT2 |                                         | AUX PS         | 1                   | 3881921 | CTB92VG/3S        | 1,070           | 1        |             |                 |        |                    |                 |     |
| 2            |     | JUMPER-2.0/B            | 2mm jumper for JP9, JP10                                    |                                         | AUX PS         | 2                   | 2396302 | M22-1900046       | 0,191           | 1        | S3404-ND    | 0,110           | 1      |                    |                 |     |
|              |     |                         |                                                             |                                         |                |                     |         |                   |                 |          |             |                 |        |                    |                 |     |
| Wire harness |     |                         |                                                             |                                         |                |                     |         |                   |                 |          |             |                 |        |                    |                 |     |
| 1            |     | 10K NTC                 | AUX temperature sensor                                      |                                         | Arduino Shield | 1                   | 1187031 | NTCLE100E3103J B0 | 0,489           | 1        | BC2301-ND   | 0,640           | 1      | 594-2381-640-63103 | 0,245           | 1   |
| 0,03         |     | HIS-1.2/0.6-RD          | Heat shrink sleeve; red                                     | AUX temp sensor                         | Arduino Shield | 0,03                | -       |                   |                 |          | -           |                 |        | -                  |                 |     |
| 1            |     | 39-01-4030              | Receptacle for X1                                           | DC power input                          | Power board    | 2                   | 9963480 | 39-01-4030        | 0,219           | 1        | 39-01-4030  | 0,300           |        | 39-01-4030         | 0,292           |     |
| 1            |     | 39-01-4050              | Receptacle for X3                                           | AC power input                          | AUX PS         | 1                   | 9963502 | 39-01-4050        | 0,327           | 1        | 39-01-4050  | 0,360           |        | 39-01-4050         | 0,358           |     |
| 1            |     | 22-01-2035              | 3-pin receptacle for X4                                     | Cooling fan                             | AUX PS         | 1                   | 143127  | 22-01-2035        | 0,192           | 10       | 22-01-2035  | 0,310           |        | 22-01-2035         | 0,290           |     |
| 1            |     | 22-01-2025              | 2-pin receptacle for X17                                    | AUX temp sensor                         | Arduino Shield | 1                   | 143126  | 22-01-2025        | 0,179           | 10       | WM2613-ND   | 0,270           | 10     | 538-22-01-2025     | 0,236           | 1   |
| 2            |     | NSR-08                  | Receptacle for X8, X18                                      | Ethernet cable                          | AUX PS         | 2                   | 865667  | M20-1060800       | 0,231           | 10       | 952-2234-ND | 0,340           | 1      | 855-M20-1060800    | 0,330           | 1   |
| 1            |     | NSDR-KEY                | Polarising key                                              | Ethernet cable                          | AUX PS         | 1                   | 512023  | M20-003           | 0,149           | 100      | 952-2360-ND | 0,250           | 1      | 855-M20-003        | 0,245           | 1   |
| 3            |     | 39-00-0078              | Pins for X1                                                 | DC power input                          | Power board    | 6                   |         |                   |                 |          |             |                 |        |                    |                 |     |
| 5            |     | 39-00-0078              | Pins for X3                                                 | AC power input                          | AUX PS         | 5                   |         |                   |                 |          |             |                 |        |                    |                 |     |
|              |     |                         |                                                             |                                         |                | 11                  | 9732675 | 39-00-0078 100pc  | 13,300          | 1        | 39-00-0078  | 0,144           |        | 39-00-0078         | 0,112           |     |
|              |     |                         |                                                             |                                         |                |                     |         |                   |                 |          |             |                 |        |                    |                 |     |
| 3            |     | 08-50-0114              | Pins for X4                                                 | Cooling fan                             | AUX PS         | 3                   |         |                   |                 |          |             |                 |        |                    |                 |     |
| 2            |     | 08-50-0114              | Pins for X17                                                | MAIN temperature sensor                 | Arduino board  | 2                   |         |                   |                 |          |             |                 |        |                    |                 |     |
|              |     |                         |                                                             |                                         |                | 5                   | 2063734 | 08-50-0114        | 0,030           | 10       | 08-50-0114  | 0,170           |        | 08-50-0114         | 0,141           |     |
|              |     |                         |                                                             |                                         |                |                     |         |                   |                 |          |             |                 |        |                    |                 |     |
| 21           |     | NDR-T                   | Contact; female; 28÷22AWG; NSR/NDR; tinned                  | X8, X18                                 | Arduino Shield | 21                  | 1022219 | M20-1180042       | 0,064           | 100      | 952-2158-ND | 0,130           |        | 855-M20-1180042    | 0,127           | 1   |
| 1            |     | BM 91103                | Ring terminal; M3; 0.5+1 mm2                                | Chassis Earth                           | Enclosure      | 1                   | 7356528 | LRB-1.0T-M3       | 0,102           | 100      |             |                 |        |                    |                 |     |
| 4            |     | BM01148                 | Female quick disconnect                                     | AC switch patch cables                  | Enclosure      | 2                   |         |                   |                 |          |             |                 |        |                    |                 |     |
| 1            |     | BM01148                 | Female quick disconnect                                     | AC inlet Earth (Side B)                 | Enclosure      | 1                   |         |                   |                 |          |             |                 |        |                    |                 |     |
| 2            |     | BM01148                 | Female quick disconnect                                     | Lower AC/DC module power input (Side B) | Enclosure      | 2                   |         |                   |                 |          |             |                 |        |                    |                 |     |
| 1            |     | BM01148                 | Female quick disconnect                                     | Cable set #1                            | Arduino board  | 1                   |         |                   |                 |          |             |                 |        |                    |                 |     |

| #            | RS Components |                         |          |                      |                 |     | TME                |                 |     | THT | SMD | Price calculation for 1 set |                           |              |             |
|--------------|---------------|-------------------------|----------|----------------------|-----------------|-----|--------------------|-----------------|-----|-----|-----|-----------------------------|---------------------------|--------------|-------------|
|              | Qty           | Part name               | Code     | Part Number          | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |     |     | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 12           |               | Light pipe for LED      |          |                      |                 |     | PLP2-625           | 0,331           | 5   |     |     | TME                         | 0,331 €                   | 12           | 3,972       |
| 1            |               | Schurter 4304.6090      | 867-7308 | 4304.6090            | 9,050           | 1   | 4304.6090          | 3,594           | 1   |     |     | TME                         | 3,594 €                   | 1            | 3,594       |
| 2            |               | 4A Fuse                 |          |                      |                 |     | ZKT-4A             | 0,095           | 10  |     |     | TME                         | 0,095 €                   | 2            | 0,189       |
|              |               | 8A Fuse                 |          |                      |                 |     | ZKT-8A/125V        | 0,094           | 10  |     |     | TME                         | 0,094 €                   | 0            | 0,000       |
| 0,05         |               | CB-HFT50.8/1M-BL        |          |                      |                 |     | CB-HFT50.8/1M-BL   | 1,241           | 1   |     |     | TME                         | 1,241 €                   | 1            | 1,241       |
| 1            |               | A3116068                | -        |                      |                 |     | A3116068           | 1,495           | 1   |     |     | TME                         | 1,495 €                   | 1            | 1,495       |
| 1            |               | A3216007                | -        |                      |                 |     | A3216007           | 0,563           | 1   |     |     | TME                         | 0,563 €                   | 1            | 0,563       |
| 1            |               | SD card 8Gb, min. 4Mb/s |          |                      |                 |     | S400-0080R11       | 3,840           | 1   |     |     | TME                         | 3,840 €                   | 1            | 3,840       |
| 1            |               | CTB92VG/3S              |          |                      |                 |     | TBW-5.0-3P         | 0,420           | 1   |     |     | TME                         | 0,420 €                   | 1            | 0,420       |
| 2            |               | JUMPER-2.0/B            |          |                      |                 |     | JUMPER-2.0/B       | 0,051           | 10  |     |     | TME                         | 0,051 €                   | 1            | 0,051       |
|              |               |                         |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              | 25,64 €     |
| Wire harness |               |                         |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 1            |               | 10K NTC                 | 754-6645 | NTCLE100E310<br>3JB0 | 0,334           | 5   | NTCLE100E3103JB0   | 0,269           |     |     |     | Mouser                      | 0,245 €                   | 1            | 0,245       |
| 0,03         |               | HIS-1.2/0.6-RD          | -        |                      |                 |     | HIS-1.2/0.6-RD     | 1,295           | 10  |     |     | TME                         | 1,295 €                   | 1            | 1,295       |
| 1            |               | 39-01-4030              | 510-9685 | 39-01-4030           | 0,232           | 5   | MX-5557-03R2       | 0,132           | 5   |     |     | TME                         | 0,132 €                   | 2            | 0,264       |
| 1            |               | 39-01-4050              | 510-9708 | 39-01-4050           | 0,188           | 5   | MX-5557-05R2       | 0,240           | 2   |     |     | RS                          | 0,188 €                   | 1            | 0,188       |
| 1            |               | 22-01-2035              | 296-4940 | 22-01-2035           | 0,204           | 5   | MX-6471-031        | 0,050           | 10  |     |     | TME                         | 0,050 €                   | 1            | 0,050       |
| 1            |               | 22-01-2025              |          |                      |                 |     | MX-6471-021        | 0,048           | 10  |     |     | TME                         | 0,048 €                   | 1            | 0,048       |
| 2            |               | NSR-08                  |          |                      |                 |     | NSR-08             | 0,087           | 10  |     |     | TME                         | 0,087 €                   | 2            | 0,173       |
| 1            |               | NSDR-KEY                |          |                      |                 |     | NSDR-KEY           | 0,035           | 20  |     |     | TME                         | 0,035 €                   | 1            | 0,035       |
| 3            |               | 39-00-0078              |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 5            |               | 39-00-0078              |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|              |               |                         | 215-5887 | 39-00-0078<br>100pc  | 14,100          | 1   | MX-5556-T3L        | 0,074           | 10  |     |     | TME                         | 0,074 €                   | 11           | 0,816       |
| 3            |               | 08-50-0114              |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 2            |               | 08-50-0114              |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|              |               |                         | 172-9178 | 08-50-0114           | 0,085           | 100 | MX-0850-0114       | 0,047           | 10  |     |     | Farnell                     | 0,030 €                   | 5            | 0,150       |
| 21           |               | NDR-T                   | 681-2887 | 122-4777             | 0,041           | 100 | NDR-T              | 0,027           | 25  |     |     | TME                         | 0,027 €                   | 21           | 0,566       |
| 1            |               | BM 91103                |          |                      |                 |     | BM 91103           | 0,048           | 10  |     |     | TME                         | 0,048 €                   | 1            | 0,048       |
| 4            |               | BM01148                 |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 1            |               | BM01148                 |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 2            |               | BM01148                 |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 1            |               | BM01148                 |          |                      |                 |     |                    |                 |     |     |     |                             |                           |              |             |

| #    | Qty | Part name                  | Package                                                  | Reference designator               | Board name     | Qty  | Farnell / Element14 |                 |                 |     | Digi-Key    |                 |     | Mouser      |                 |     |
|------|-----|----------------------------|----------------------------------------------------------|------------------------------------|----------------|------|---------------------|-----------------|-----------------|-----|-------------|-----------------|-----|-------------|-----------------|-----|
|      |     |                            |                                                          |                                    |                |      | Code                | Part Number     | Unit price<br>€ | MOQ | Part Number | Unit price<br>€ | MOQ | Part Number | Unit price<br>€ | MOQ |
|      |     |                            |                                                          |                                    |                | 6    | 3625424             | STO-1.0T-187N-8 | 0,057           | 100 |             |                 |     |             |                 |     |
| 2    |     | H0.75/14D/GY               | Bootlace ferrule; insulated, 0.75mm2                     | Cable set #1                       | Enclosure      | 2    |                     |                 |                 |     |             |                 |     |             |                 |     |
| 4    |     | H0.75/14D/GY               | Bootlace ferrule; insulated, 0.75mm2                     | Cable set #2                       | Enclosure      | 4    |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 6    | 841195              | H0,75/14.       | 0,135           | 100 |             |                 |     |             |                 |     |
| 2    |     | H0.75/15D2/GY              | Bootlace ferrule, twin entry; insulated, 0.75mm2         | Cable set #1                       | Enclosure      | 2    |                     |                 |                 |     |             |                 |     |             |                 |     |
| 3    |     | H0.75/15D2/GY              | Bootlace ferrule, twin entry; insulated, 0.75mm2         | Cable set #2                       | Enclosure      | 3    |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 5    | 1121751             | 9037410000      | 0,120           | 100 |             |                 |     |             |                 |     |
| 1    |     | Cat5E cable, stranded wire |                                                          | Ethernet cable                     | Arduino Shield | 1    | 1734894             | PS11029         | 1,120           | 1   |             |                 |     |             |                 |     |
| 0,05 |     | LGY0.75/25-BR              | Insulated wire, stranded, <b>brown</b> , 0.75 mm2        | AC switch patch cables             | Enclosure      | 0,05 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,2  |     | LGY0.75/25-BR              | Insulated wire, stranded, <b>brown</b> , 0.75 mm2        | Lower AC/DC module power input     | Enclosure      | 0,2  |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,07 |     | LGY0.75/25-BR              | Insulated wire, stranded, <b>brown</b> , 0.75 mm2        | Upper AC/DC module power input     | Enclosure      | 0,07 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,11 |     | LGY0.75/25-BR              | Insulated wire, stranded, <b>brown</b> , 0.75 mm2        | AUX PS module power input          | Enclosure      | 0,11 |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 0,43 | 2528103             | PP001205        | 0,239           | 1   |             |                 |     |             |                 |     |
| 0,05 |     | LGY0.75/25-BL              | Insulated wire, stranded, <b>blue</b> , 0.75 mm2         | AC switch patch cables             | Enclosure      | 0,05 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,2  |     | LGY0.75/25-BL              | Insulated wire, stranded, <b>blue</b> , 0.75 mm2         | Lower AC/DC module power input     | Enclosure      | 0,2  |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,07 |     | LGY0.75/25-BL              | Insulated wire, stranded, <b>blue</b> , 0.75 mm2         | Upper AC/DC module power input     | Enclosure      | 0,07 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,11 |     | LGY0.75/25-BL              | Insulated wire, stranded, <b>blue</b> , 0.75 mm2         | AUX PS module power input          | Enclosure      | 0,11 |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 0,43 | 2528092             | PP001196        | 0,239           | 1   |             |                 |     |             |                 |     |
| 0,42 |     | LGY0.75/25-RD              | Insulated wire, stranded, <b>red</b> , 0.75 mm2          | Cable set #1, Power board X1 cable | Enclosure      | 0,42 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,33 |     | LGY0.75/25-RD              | Insulated wire, stranded, <b>red</b> , 0.75 mm2          | Cable set #2, Power board X1 cable | Enclosure      | 0,33 |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 0,75 | 2528175             | PP001270        | 0,481           | 1   |             |                 |     |             |                 |     |
| 0,42 |     | LGY0.75/25-BK              | Insulated wire, stranded, <b>black</b> , 0.75 mm2        | Cable set #1, Power board X1 cable | Enclosure      | 0,42 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,33 |     | LGY0.75/25-BK              | Insulated wire, stranded, <b>black</b> , 0.75 mm2        | Cable set #2, Power board X1 cable | Enclosure      | 0,33 |                     |                 |                 |     |             |                 |     |             |                 |     |
|      |     |                            |                                                          |                                    |                | 0,75 | 2528082             | PP001186        | 0,481           | 1   |             |                 |     |             |                 |     |
| 0,42 |     | LGY0.75/25-YL/GR           | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2 | Cable set #1, Power board X1 cable | Enclosure      | 0,42 |                     |                 |                 |     |             |                 |     |             |                 |     |
| 0,07 |     | LGY0.75/25-YL/GR           | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2 | Cable set #1, AC/DC module Earth   | Enclosure      | 0,07 |                     |                 |                 |     |             |                 |     |             |                 |     |

| #    | RS Components |                            |      |             |                 |     | TME                |                 |     | THT | SMD | Price calculation for 1 set |                           |              |             |
|------|---------------|----------------------------|------|-------------|-----------------|-----|--------------------|-----------------|-----|-----|-----|-----------------------------|---------------------------|--------------|-------------|
|      | Qty           | Part name                  | Code | Part Number | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |     |     | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
|      |               |                            |      |             |                 |     | BM01148            | 0,047           | 10  |     |     | TME                         | 0,047 €                   | 6            | 0,281       |
| 2    |               | H0.75/14D/GY               |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 4    |               | H0.75/14D/GY               |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | H0.75/14D/GY       | 0,023           | 20  |     |     | TME                         | 0,023 €                   | 6            | 0,140       |
| 2    |               | H0.75/15D2/GY              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 3    |               | H0.75/15D2/GY              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | H0.75/15D2/GY      | 0,036           | 10  |     |     | TME                         | 0,036 €                   | 5            | 0,180       |
| 1    |               | Cat5E cable, stranded wire |      |             |                 |     | CA00600.00C01      | 6,800           | 1   |     |     | Farnell                     | 1,120 €                   | 1            | 1,120       |
| 0,05 |               | LGY0.75/25-BR              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,2  |               | LGY0.75/25-BR              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,07 |               | LGY0.75/25-BR              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,11 |               | LGY0.75/25-BR              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | LGY0.75/25-BR      | 0,340           | 25  |     |     | Farnell                     | 0,239 €                   | 1            | 0,239       |
| 0,05 |               | LGY0.75/25-BL              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,2  |               | LGY0.75/25-BL              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,07 |               | LGY0.75/25-BL              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,11 |               | LGY0.75/25-BL              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | LGY0.75/25-BL      | 0,340           | 25  |     |     | Farnell                     | 0,239 €                   | 1            | 0,239       |
| 0,42 |               | LGY0.75/25-RD              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,33 |               | LGY0.75/25-RD              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | LGY0.75/25-RD      | 0,340           | 25  |     |     | TME                         | 0,340 €                   | 1            | 0,255       |
| 0,42 |               | LGY0.75/25-BK              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,33 |               | LGY0.75/25-BK              |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                            |      |             |                 |     | LGY0.75/25-BK      | 0,340           | 25  |     |     | TME                         | 0,340 €                   | 1            | 0,255       |
| 0,42 |               | LGY0.75/25-YL/GR           |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,07 |               | LGY0.75/25-YL/GR           |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |

| #    |                   |                                                            |                                                         |                      |            | Farnell / Element14 |                     |             |                 | Digi-Key |             |                 | Mouser |             |                 |     |
|------|-------------------|------------------------------------------------------------|---------------------------------------------------------|----------------------|------------|---------------------|---------------------|-------------|-----------------|----------|-------------|-----------------|--------|-------------|-----------------|-----|
|      | Qty               | Part name                                                  | Package                                                 | Reference designator | Board name | Qty                 | Code                | Part Number | Unit price<br>€ | MOQ      | Part Number | Unit price<br>€ | MOQ    | Part Number | Unit price<br>€ | MOQ |
| 0,17 | LGY0.75/25-YL/GR  | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2   | Chassis Earth                                           | Enclosure            | 0,17       |                     |                     |             |                 |          |             |                 |        |             |                 |     |
| 0,35 | LGY0.75/25-YL/GR  | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2   | Arduino Shield Earth                                    | Enclosure            | 0,35       |                     |                     |             |                 |          |             |                 |        |             |                 |     |
| 0,33 | LGY0.75/25-YL/GR  | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2   | Cable set #2, Power board X1 cable                      | Enclosure            | 0,33       |                     |                     |             |                 |          |             |                 |        |             |                 |     |
| 0,12 | LGY0.75/25-YL/GR  | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2   | Cable set #2, AC/DC module Earth                        | Enclosure            | 0,12       |                     |                     |             |                 |          |             |                 |        |             |                 |     |
| 0,15 | LGY0.75/25-YL/GR  | Insulated wire, stranded, <b>green-yellow</b> , 0.75 mm2   | AUX PS module Earth                                     | Enclosure            | 0,15       |                     |                     |             |                 |          |             |                 |        |             |                 |     |
|      |                   |                                                            |                                                         |                      | 1,61       | 2528140             | PP001239            |             | 0,481           | 1        |             |                 |        |             |                 |     |
| 0,29 | LGY0.35/25-BR     | Insulated wire, stranded, <b>any color</b> , max. 0.35 mm2 | AUX temp sensor                                         | Arduino Shield       | 0,29       | 2425402             | MC6A-7/0.2T2-BN-100 |             | 0,095           | 1        |             |                 |        |             |                 |     |
| 1    | Arduino USB cable | USB micro to 5-pin receptacle cable, 30 or 50 cm           | Shenzhen Wonderwing Electronics<br>Or search Aliexpress |                      | 1          | -                   |                     |             |                 |          |             |                 |        |             |                 |     |
| 1    | FC10300-0         | Ribbon cable with IDC connectors, 30 cm                    |                                                         | Arduino Shield       | 1          | -                   |                     |             |                 |          |             |                 |        |             |                 |     |

All prices are net prices (without VAT)

Please note that BOM does not contain ordering number for parts on reels or that which includes re-reeling fee (e.g. Farnell). Take also into account that total cost is higher because min. quantity (MOQ) for many parts is larger then what is needed for single unit.

| #    | RS Components |                   |      |             |                 |     | TME                |                 |     | THT | SMD | Price calculation for 1 set |                           |              |             |
|------|---------------|-------------------|------|-------------|-----------------|-----|--------------------|-----------------|-----|-----|-----|-----------------------------|---------------------------|--------------|-------------|
|      | Qty           | Part name         | Code | Part Number | Unit price<br>€ | MOQ | Code / Part Number | Unit price<br>€ | MOQ |     |     | Best<br>Supplier            | Lowest<br>unit price<br>€ | Order<br>Qty | Line Cost € |
| 0,17 |               | LGY0.75/25-YL/GR  |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,35 |               | LGY0.75/25-YL/GR  |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,33 |               | LGY0.75/25-YL/GR  |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,12 |               | LGY0.75/25-YL/GR  |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
| 0,15 |               | LGY0.75/25-YL/GR  |      |             |                 |     |                    |                 |     |     |     |                             |                           |              |             |
|      |               |                   |      |             |                 |     | LGY0.75/25-YL/GR   | 0,340           | 25  |     |     | TME                         | 0,340 €                   | 2            | 0,546       |
| 0,29 |               | LGY0.35/25-BR     |      |             |                 |     | LGY0.35/25-BR      | 0,210           | 25  |     |     | Farnell                     | 0,095 €                   | 1            | 0,095       |
| 1    |               | Arduino USB cable |      |             |                 |     | -                  |                 |     |     |     | Farnell                     | 0,000 €                   | 1            | 0,000       |
| 1    |               | FC10300-0         |      |             |                 |     | FC10300-0          | 1,040           | 1   |     |     | TME                         | 1,040 €                   | 1            | 1,040       |
|      |               |                   |      |             |                 |     |                    |                 |     |     |     |                             |                           |              | 8,27 €      |

**Total 297,36 €**

PCBA (min. 50 pcs) Estimated 40,00  
PCBs (min. 20 pcs) Estimated 30,00  
Enclosure (min. 20 pcs) Estimated 51,00  
**121,00**

**Estimated total (no shipping costs included): 418,36 €**