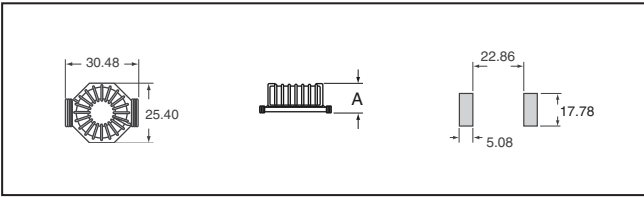




# Surface Mount High Current Toroid Inductors

## PM2110 and PM2120 Series



| L (µH) @ 1kHz            | I <sub>dc</sub> (A) | L (µH) ±20% @ Rated I | DCR (Ω) Max. | Dim. A (mm) Max. | Digi-Key Part No. | Price Each |      |      | J.W. Miller Part No. |
|--------------------------|---------------------|-----------------------|--------------|------------------|-------------------|------------|------|------|----------------------|
|                          |                     |                       |              |                  |                   | 1          | 10   | 25   |                      |
| <b>PM2110 Series 20%</b> |                     |                       |              |                  |                   |            |      |      |                      |
| 1.00                     | 22.70               | 0.80                  | 0.00         | 14.48            | M8754-ND          | 1.89       | 1.42 | 1.27 | PM2110-1R0M-RC       |
| 5.60                     | 13.70               | 3.90                  | 0.01         | 14.48            | M8755-ND          | 1.89       | 1.42 | 1.27 | PM2110-5R6M-RC       |
| <b>PM2110 Series 10%</b> |                     |                       |              |                  |                   |            |      |      |                      |
| 10.00                    | 11.70               | 6.50                  | 0.01         | 14.48            | M8756-ND          | 1.89       | 1.42 | 1.27 | PM2110-100K-RC       |
| 12.00                    | 11.30               | 7.60                  | 0.01         | 14.48            | M8757-ND          | 1.89       | 1.42 | 1.27 | PM2110-120K-RC       |
| 15.00                    | 10.70               | 9.20                  | 0.01         | 14.48            | M8758-ND          | 1.89       | 1.42 | 1.27 | PM2110-150K-RC       |
| 18.00                    | 10.20               | 10.70                 | 0.01         | 14.48            | M8759-ND          | 1.89       | 1.42 | 1.27 | PM2110-180K-RC       |
| 22.00                    | 9.70                | 12.70                 | 0.01         | 14.48            | M8760-ND          | 1.89       | 1.42 | 1.27 | PM2110-220K-RC       |
| 27.00                    | 8.20                | 16.00                 | 0.01         | 13.72            | M8761-ND          | 1.89       | 1.42 | 1.27 | PM2110-270K-RC       |
| 33.00                    | 7.00                | 20.10                 | 0.02         | 13.21            | M8762-ND          | 1.89       | 1.42 | 1.27 | PM2110-330K-RC       |
| 39.00                    | 6.80                | 23.20                 | 0.02         | 15.75            | M8763-ND          | 1.89       | 1.42 | 1.27 | PM2110-390K-RC       |
| 47.00                    | 6.50                | 27.20                 | 0.02         | 15.75            | M8764-ND          | 1.89       | 1.42 | 1.27 | PM2110-470K-RC       |
| 56.00                    | 6.20                | 31.60                 | 0.02         | 15.75            | M8765-ND          | 1.89       | 1.42 | 1.27 | PM2110-560K-RC       |
| 68.00                    | 5.90                | 37.10                 | 0.03         | 15.75            | M8766-ND          | 1.89       | 1.42 | 1.27 | PM2110-680K-RC       |
| 100.00                   | 5.40                | 51.40                 | 0.03         | 15.75            | M8767-ND          | 1.89       | 1.42 | 1.27 | PM2110-101K-RC       |
| 150.00                   | 4.30                | 77.30                 | 0.05         | 14.99            | M8768-ND          | 1.89       | 1.42 | 1.27 | PM2110-151K-RC       |
| 180.00                   | 3.70                | 96.30                 | 0.07         | 13.46            | M8769-ND          | 1.89       | 1.42 | 1.27 | PM2110-181K-RC       |
| 220.00                   | 3.50                | 113.80                | 0.07         | 15.24            | M8770-ND          | 1.89       | 1.42 | 1.27 | PM2110-221K-RC       |
| 270.00                   | 3.40                | 134.90                | 0.08         | 15.24            | M8771-ND          | 1.89       | 1.42 | 1.27 | PM2110-271K-RC       |

| L (µH) @ 1kHz            | I <sub>dc</sub> (A) | L (µH) ±20% @ Rated I | DCR (Ω) Max. | Dim. A (mm) Max. | Digi-Key Part No. | Price Each |      |      | J.W. Miller Part No. |
|--------------------------|---------------------|-----------------------|--------------|------------------|-------------------|------------|------|------|----------------------|
|                          |                     |                       |              |                  |                   | 1          | 10   | 25   |                      |
| 330.00                   | 3.20                | 159.50                | 0.09         | 15.24            | M8772-ND          | 1.89       | 1.42 | 1.27 | PM2110-331K-RC       |
| 390.00                   | 3.10                | 182.90                | 0.10         | 15.24            | M8773-ND          | 1.89       | 1.42 | 1.27 | PM2110-391K-RC       |
| 470.00                   | 2.60                | 230.40                | 0.13         | 14.48            | M8774-ND          | 1.89       | 1.42 | 1.27 | PM2110-471K-RC       |
| 820.00                   | 2.00                | 394.10                | 0.22         | 15.24            | M8775-ND          | 1.89       | 1.42 | 1.27 | PM2110-821K-RC       |
| 1000.00                  | 1.90                | 463.70                | 0.24         | 15.24            | M8776-ND          | 1.89       | 1.42 | 1.27 | PM2110-102K-RC       |
| <b>PM2120 Series 20%</b> |                     |                       |              |                  |                   |            |      |      |                      |
| 2.20                     | 19.70               | 1.80                  | 0.00         | 20.83            | M8777-ND          | 2.08       | 1.56 | 1.39 | PM2120-2R2M-RC       |
| 4.70                     | 16.60               | 3.70                  | 0.01         | 20.83            | M8778-ND          | 2.08       | 1.56 | 1.39 | PM2120-4R7M-RC       |
| 5.60                     | 15.60               | 4.20                  | 0.01         | 20.83            | M8779-ND          | 2.08       | 1.56 | 1.39 | PM2120-5R6M-RC       |
| 6.80                     | 14.70               | 5.00                  | 0.01         | 20.83            | M8780-ND          | 2.08       | 1.56 | 1.39 | PM2120-6R8M-RC       |
| <b>PM2120 Series 10%</b> |                     |                       |              |                  |                   |            |      |      |                      |
| 10.00                    | 13.90               | 7.20                  | 0.01         | 20.83            | M8781-ND          | 2.08       | 1.56 | 1.39 | PM2120-100K-RC       |
| 12.00                    | 12.70               | 8.30                  | 0.01         | 20.83            | M8782-ND          | 2.08       | 1.56 | 1.39 | PM2120-120K-RC       |
| 15.00                    | 12.20               | 10.20                 | 0.01         | 20.83            | M8783-ND          | 2.08       | 1.56 | 1.39 | PM2120-150K-RC       |
| 18.00                    | 11.80               | 12.00                 | 0.01         | 20.83            | M8784-ND          | 2.08       | 1.56 | 1.39 | PM2120-180K-RC       |
| 22.00                    | 11.00               | 14.20                 | 0.01         | 20.83            | M8785-ND          | 2.08       | 1.56 | 1.39 | PM2120-220K-RC       |
| 27.00                    | 10.40               | 16.90                 | 0.01         | 20.83            | M8786-ND          | 2.08       | 1.56 | 1.39 | PM2120-270K-RC       |
| 33.00                    | 10.10               | 20.30                 | 0.01         | 20.83            | M8787-ND          | 2.08       | 1.56 | 1.39 | PM2120-330K-RC       |
| 39.00                    | 9.60                | 23.30                 | 0.01         | 20.83            | M8788-ND          | 2.08       | 1.56 | 1.39 | PM2120-390K-RC       |
| 47.00                    | 8.20                | 29.20                 | 0.02         | 20.07            | M8789-ND          | 2.08       | 1.56 | 1.39 | PM2120-470K-RC       |
| 56.00                    | 7.90                | 33.90                 | 0.02         | 20.07            | M8790-ND          | 2.08       | 1.56 | 1.39 | PM2120-560K-RC       |
| 68.00                    | 6.70                | 42.20                 | 0.03         | 19.56            | M8791-ND          | 2.08       | 1.56 | 1.39 | PM2120-680K-RC       |
| 82.00                    | 6.40                | 49.50                 | 0.03         | 22.10            | M8792-ND          | 2.08       | 1.56 | 1.39 | PM2120-820K-RC       |
| 100.00                   | 6.10                | 58.70                 | 0.04         | 22.10            | M8793-ND          | 2.08       | 1.56 | 1.39 | PM2120-101K-RC       |
| 120.00                   | 5.80                | 68.10                 | 0.04         | 22.10            | M8794-ND          | 2.08       | 1.56 | 1.39 | PM2120-121K-RC       |
| 150.00                   | 5.50                | 82.50                 | 0.04         | 22.10            | M8795-ND          | 2.08       | 1.56 | 1.39 | PM2120-151K-RC       |
| 180.00                   | 5.30                | 96.20                 | 0.05         | 21.08            | M8796-ND          | 2.08       | 1.56 | 1.39 | PM2120-181K-RC       |
| 220.00                   | 5.00                | 113.70                | 0.05         | 21.08            | M8797-ND          | 2.08       | 1.56 | 1.39 | PM2120-221K-RC       |
| 330.00                   | 3.60                | 183.40                | 0.10         | 19.81            | M8798-ND          | 2.08       | 1.56 | 1.39 | PM2120-331K-RC       |
| 390.00                   | 3.50                | 211.60                | 0.11         | 19.81            | M8799-ND          | 2.08       | 1.56 | 1.39 | PM2120-391K-RC       |
| 470.00                   | 3.30                | 247.10                | 0.12         | 21.59            | M8800-ND          | 2.08       | 1.56 | 1.39 | PM2120-471K-RC       |
| 1000.00                  | 2.50                | 499.70                | 0.22         | 20.83            | M8801-ND          | 2.08       | 1.56 | 1.39 | PM2120-102K-RC       |

## Surface Mount Dual Toroid Inductors



The PM3602 and PM3604 Series are versatile surface mount coils that can provide different functions in a single package. A bifilar method is used in the winding of these coils. The user can utilize these coils in four different ways, depending on the external connection chosen:

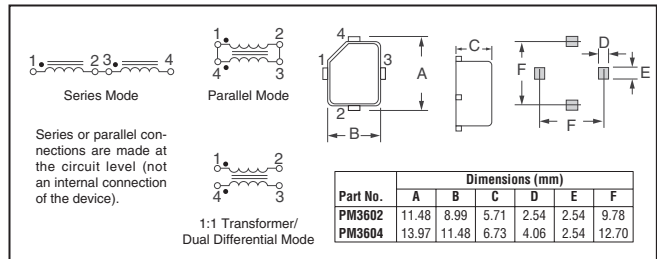
- (1) Parallel Connection: Doubles the current capacity
- (2) Series Connection: 4 times the parallel inductance
- (3) Dual Inductor: Creates two differential mode inductors
- (4) 1:1 Ratio Transformer: For isolation and some flyback applications

**Features:**

- Toroidal core design to minimize RFI radiation • Low loss core material • Encapsulated in case for pick and place capability • Reflow soldering • Hi-pot 500V • Operating temperature: -55°C - 125°C

**Typical Applications:**

- Switching power supplies • Converters • Data communications • Processor/controller circuits • Personal computers • Filters



| Parallel             |                             |           |                          | Series    |                             |           |                          | Digi-Key Part No. | Price Each |     |     | Digi-Key Part No. | Tape and Reel |         | J.W. Miller Part No. |
|----------------------|-----------------------------|-----------|--------------------------|-----------|-----------------------------|-----------|--------------------------|-------------------|------------|-----|-----|-------------------|---------------|---------|----------------------|
| L ±20% µH            | I <sub>dc</sub> (Amps) Max. | L ±20% µH | R <sub>dc</sub> (Ω) Max. | L ±20% µH | I <sub>dc</sub> (Amps) Max. | L ±20% µH | R <sub>dc</sub> (Ω) Max. |                   | 1          | 10  | 25  |                   | Qty.          | Pricing |                      |
| <b>PM3602 Series</b> |                             |           |                          |           |                             |           |                          |                   |            |     |     |                   |               |         |                      |
| 5                    | 2.41                        | 3.8       | 0.023                    | 20        | 1.20                        | 15.2      | 0.09                     | M10135CT-ND       | 1.23       | .92 | .82 | M10135TR-ND       | 400           | 245.32  | PM3602-5-RC          |
| 8                    | 1.90                        | 6.1       | 0.037                    | 32        | 0.95                        | 23.2      | 0.15                     | M10136CT-ND       | 1.23       | .92 | .82 | M10136TR-ND       | 400           | 245.32  | PM3602-8-RC          |
| 10                   | 1.83                        | 7.4       | 0.040                    | 40        | 0.92                        | 29.6      | 0.16                     | M10137CT-ND       | 1.23       | .92 | .82 | M10137TR-ND       | 400           | 245.32  | PM3602-10-RC         |
| 15                   | 1.45                        | 11.1      | 0.063                    | 60        | 0.73                        | 44.4      | 0.25                     | M10138CT-ND       | 1.23       | .92 | .82 | M10138TR-ND       | 400           | 245.32  | PM3602-15-RC         |
| 20                   | 1.25                        | 15.2      | 0.086                    | 80        | 0.63                        | 60.8      | 0.34                     | M10139CT-ND       | 1.23       | .92 | .82 | M10139TR-ND       | 700           | 429.31  | PM3602-20-RC         |
| 25                   | 1.17                        | 18.5      | 0.098                    | 100       | 0.59                        | 74.0      | 0.39                     | M10162CT-ND       | 1.23       | .92 | .82 | M10162TR-ND       | 400           | 245.32  | PM3602-25-RC         |
| 33                   | 0.98                        | 24.8      | 0.14                     | 132       | 0.49                        | 99.2      | 0.56                     | M10140CT-ND       | 1.23       | .92 | .82 | M10140TR-ND       | 400           | 245.32  | PM3602-33-RC         |
| 50                   | 0.78                        | 37.5      | 0.22                     | 200       | 0.38                        | 150.0     | 0.88                     | M10141CT-ND       | 1.23       | .92 | .82 | M10141TR-ND       | 400           | 245.32  | PM3602-50-RC         |
| 68                   | 0.72                        | 49.6      | 0.26                     | 272       | 0.36                        | 198.4     | 1.04                     | M10142CT-ND       | 1.23       | .92 | .82 | M10142TR-ND       | 400           | 245.32  | PM3602-68-RC         |
| 100                  | 0.58                        | 74.0      | 0.40                     | 400       | 0.29                        | 296.0     | 1.60                     | M10143CT-ND       | 1.23       | .92 | .82 | M10143TR-ND       | 400           | 245.32  | PM3602-100-RC        |
| 150                  | 0.47                        | 111       | 0.60                     | 600       | 0.24                        | 444.0     | 2.40                     | M10144CT-ND       | 1.23       | .92 | .82 | M10144TR-ND       | 400           | 245.32  | PM3602-150-RC        |
| 200                  | 0.40                        | 150.0     | 0.84                     | 800       | 0.20                        | 600.0     | 3.36                     | M8673-ND          | 1.23       | .92 | .82 | —                 | —             | —       | PM3602-200-B-RC      |
| 300                  | 0.32                        | 225.0     | 1.31                     | 1200      | 0.16                        | 900.0     | 5.24                     | M10147CT-ND       | 1.23       | .92 | .82 | M10147TR-ND       | 400           | 245.32  | PM3602-300-RC        |
| <b>PM3604 Series</b> |                             |           |                          |           |                             |           |                          |                   |            |     |     |                   |               |         |                      |
| 5                    | 3.30                        | 3.8       | 0.019                    | 20        | 1.65                        | 15.2      | 0.076                    | M10148CT-ND       | 1.23       | .92 | .82 | M10148TR-ND       | 400           | 253.50  | PM3604-5-RC          |
| 8                    | 3.00                        | 5.8       | 0.024                    | 32        | 1.50                        | 23.2      | 0.096                    | M10149CT-ND       | 1.23       | .92 | .82 | M10149TR-ND       | 400           | 253.50  | PM3604-8-RC          |
| 10                   | 2.70                        | 7.3       | 0.028                    | 40        | 1.35                        | 29.2      | 0.11                     | M10150CT-ND       | 1.23       | .92 | .82 | M10150TR-ND       | 400           | 253.50  | PM3604-10-RC         |
| 15                   | 2.20                        | 11.0      | 0.041                    | 60        | 1.10                        | 44.0      | 0.16                     | M10151CT-ND       | 1.23       | .92 | .82 | M10151TR-ND       | 400           | 253.50  | PM3604-15-RC         |
| 20                   | 2.02                        | 14.2      | 0.049                    | 80        | 1.01                        | 56.8      | 0.20                     | M10152CT-ND       | 1.23       | .92 | .82 | M10152TR-ND       | 400           | 253.50  | PM3604-20-RC         |
| 25                   | 1.91                        | 17.0      | 0.054                    | 100       | 0.96                        | 68.0      | 0.22                     | M10153CT-ND       | 1.23       | .92 | .82 | M10153TR-ND       | 400           | 253.50  | PM3604-25-RC         |
| 33                   | 1.60                        | 23.1      | 0.078                    | 132       | 0.80                        | 92.4      | 0.31                     | M10154CT-ND       | 1.23       | .92 | .82 | M10154TR-ND       | 400           | 253.50  | PM3604-33-RC         |
| 50                   | 1.28                        | 35.5      | 0.12                     | 200       | 0.64                        | 142.0     | 0.48                     | M10155CT-ND       | 1.23       | .92 | .82 | M10155TR-ND       | 400           | 253.50  | PM3604-50-RC         |
| 68                   | 1.19                        | 46.2      | 0.14                     | 272       | 0.60                        | 184.8     | 0.56                     | M10156CT-ND       | 1.23       | .92 | .82 | M10156TR-ND       | 400           | 253.50  | PM3604-68-RC         |
| 100                  | 0.98                        | 68.0      | 0.21                     | 400       | 0.49                        | 272.0     | 0.84                     | M10157CT-ND       | 1.23       | .92 | .82 | M10157TR-ND       | 400           | 253.50  | PM3604-100-RC        |
| 150                  | 0.78                        | 103.5     | 0.32                     | 600       | 0.39                        | 414.0     | 1.28                     | M10158CT-ND       | 1.23       | .92 | .82 | M10158TR-ND       | 400           | 253.50  | PM3604-150-RC        |
| 200                  | 0.65                        | 140.0     | 0.47                     | 800       | 0.33                        | 560.0     | 1.88                     | M10159CT-ND       | 1.23       | .92 | .82 | M10159TR-ND       | 400           | 253.50  | PM3604-200-RC        |
| 250                  | 0.60                        | 172.5     | 0.53                     | 1000      | 0.30                        | 690.0     | 2.12                     | M10160CT-ND       | 1.23       | .92 | .82 | M10160TR-ND       | 400           | 253.50  | PM3604-250-RC        |
| 300                  | 0.52                        | 213.0     | 0.73                     | 1200      | 0.26                        |           |                          |                   |            |     |     |                   |               |         |                      |