



Differential Resistor Kits



Figure 1. Top View of the Differential Resistor Kits



Figure 2. Front View of the Differential Resistor Kits



Figure 3. Bottom View of the Differential Resistor Kits



Figure 4. Back View of the Differential Resistor Kits



Figure 5. Internal View of the Differential Resistor Kits

FEATURES

Different amount of resistors for different values to match usage patterns: more pieces for commonly used values and less pieces for rarely used values

Find any value of resistors in seconds

Can easily be put on a workbench

Solve the workbench clutter problem

Save space and time

Increase work efficiency

Portable and can easily be transported to another site

Long lifetime

APPLICATIONS

The electronic labs, electronic production lines, etc.

DESCRIPTION

The Differential Resistor Kits is a series of Super Surface Mount Resistor Kits™ designed for storing a full line resistors of all different values separately in our unique sturdy and snap-lockable enclosures. It has different amount of resistors for different values: 50 PCs per value for rarely used values and 300 PCs per value for commonly used values, thus, the kits have a long usage time while not wasting components for rarely used resistors. In addition, operating the enclosure is easy: you can obtain a resistor of any value in seconds, resulting in a higher efficiency. The Differential Resistor Kits measures only 11"(L) × 8.5"(W) (the letter paper size) × 2.2"(H) or 279mm(L) × 216mm(W) × 45mm(H), and they can easily be put on a workbench, stored on a shelf, or transported to another site, making them the best choice for building prototypes or reworking printed

circuit boards. There are 4 stackable enclosures per resistor kit as shown in Figure 6 below.



Figure 6. Stackable 4 Enclosures per Kit

Inside the enclosure, there are 128 individually lidded compartments, 0.87"(L) × 0.59"(W) × 0.63"(D), or 22mm(L) × 15mm(W) × 16mm(D), forming a 8 x 16 matrix, see Figure 5 above. Each lid has clearly printed legend indicating the value of the resistors inside that compartment. The lid is of ergonomically designed, it looks nice and can be open and closed comfortably. It takes seconds to obtain any value of resistors.

The Differential Resistor Kits can be stored easily on a bench shelf as shown in Figure 7 below.

The resistance values and their quantities are shown in the Value Table below.



Figure 7. Putting the Differential Resistor Kits on a Shelf



APPLICATIONS INFORMATION

Figures below show how to use the kits. Make sure that the small lids are closed tightly after usage and before closing the outside top cover. Do not flip the enclosure top side down because the resistors inside may leak out from the compartments.



Figure 8. Opening the Top Cover of the Enclosure



Figure 9. Opening the Lid of the Compartment



Figure 10. Picking a Resistor



Value and Quantity Table

Values							Quantity (PCs)	Values					Quantity (PCs)
1.00Ω	10.0Ω	100Ω	1.00K	10.0K	100K	1.00M	300	31.6Ω	316Ω	3.16K	31.6K	316K	50
0Ω	10.2Ω	102Ω	1.02K	10.2K	102K	1.50M	50	32.4Ω	324Ω	3.24K	32.4K	324K	50
0.10Ω	10.5Ω	105Ω	1.05K	10.5K	105K	2.00M	50	33.2Ω	332Ω	3.32K	33.2K	332K	300
0.50Ω	10.7Ω	107Ω	1.07K	10.7K	107K	2.49M	50	34.0Ω	340Ω	3.40K	34.0K	340K	50
	11.0Ω	110Ω	1.10K	11.0K	110K		300	34.8Ω	348Ω	3.48K	34.8K	348K	50
1.50Ω	11.3Ω	113Ω	1.13K	11.3K	113K	3.01M	50	35.7Ω	357Ω	3.57K	35.7K	357K	300
2.00Ω	11.5Ω	115Ω	1.15K	11.5K	115K	4.02M	50	36.5Ω	365Ω	3.65K	36.5K	365K	50
2.49Ω	11.8Ω	118Ω	1.18K	11.8K	118K	4.99M	50	37.4Ω	374Ω	3.74K	37.4K	374K	50
	12.1Ω	121Ω	1.21K	12.1K	121K		300	38.3Ω	383Ω	3.83K	38.3K	383K	50
3.01Ω	12.4Ω	124Ω	1.24K	12.4K	124K	5.90M	50	39.2Ω	392Ω	3.92K	39.2K	392K	300
4.02Ω	12.7Ω	127Ω	1.27K	12.7K	127K	6.81M	50	40.2Ω	402Ω	4.02K	40.2K	402K	50
	13.0Ω	130Ω	1.30K	13.0K	130K	10.0M	300	41.2Ω	412Ω	4.12K	41.2K	412K	50
4.99Ω	13.3Ω	133Ω	1.33K	13.3K	133K	7.50M	50	42.2Ω	422Ω	4.22K	42.2K	422K	50
5.90Ω	13.7Ω	137Ω	1.37K	13.7K	137K	8.25M	50	43.2Ω	432Ω	4.32K	43.2K	432K	300
6.81Ω	14.0Ω	140Ω	1.40K	14.0K	140K	9.09M	50	44.2Ω	442Ω	4.42K	44.2K	442K	50
7.50Ω	14.3Ω	143Ω	1.43K	14.3K	143K	15.0M	50	45.3Ω	453Ω	4.53K	45.3K	453K	50
8.25Ω	14.7Ω	147Ω	1.47K	14.7K	147K	20.0M	50	46.4Ω	464Ω	4.64K	46.4K	464K	50
	15.0Ω	150Ω	1.50K	15.0K	150K		300	47.5Ω	475Ω	4.75K	47.5K	475K	300
9.09Ω	15.4Ω	154Ω	1.54K	15.4K	154K		50	48.7Ω	487Ω	4.87K	48.7K	487K	50
	15.8Ω	158Ω	1.58K	15.8K	158K		50	49.9Ω	499Ω	4.99K	49.9K	499K	300
	16.2Ω	162Ω	1.62K	16.2K	162K		300	51.1Ω	511Ω	5.11K	51.1K	511K	300
	16.5Ω	165Ω	1.65K	16.5K	165K		50	52.3Ω	523Ω	5.23K	52.3K	523K	50
	16.9Ω	169Ω	1.69K	16.9K	169K		50	53.6Ω	536Ω	5.36K	53.6K	536K	50
	17.4Ω	174Ω	1.74K	17.4K	174K		50	54.9Ω	549Ω	5.49K	54.9K	549K	50
	17.8Ω	178Ω	1.78K	17.8K	178K		50	56.2Ω	562Ω	5.62K	56.2K	562K	300
	18.2Ω	182Ω	1.82K	18.2K	182K		300	57.6Ω	576Ω	5.76K	57.6K	576K	50
	18.7Ω	187Ω	1.87K	18.7K	187K		50	59.0Ω	590Ω	5.90K	59.0K	590K	50
	19.1Ω	191Ω	1.91K	19.1K	191K		50	60.4Ω	604Ω	6.04K	60.4K	604K	50
	19.6Ω	196Ω	1.96K	19.6K	196K		50	61.9Ω	619Ω	6.19K	61.9K	619K	300
	20.0Ω	200Ω	2.00K	20.0K	200K		300	63.4Ω	634Ω	6.34K	63.4K	634K	50
	20.5Ω	205Ω	2.05K	20.5K	205K		50	64.9Ω	649Ω	6.49K	64.9K	649K	50
	21.0Ω	210Ω	2.10K	21.0K	210K		50	66.5Ω	665Ω	6.65K	66.5K	665K	50
	21.5Ω	215Ω	2.15K	21.5K	215K		50	68.1Ω	681Ω	6.81K	68.1K	681K	300
	22.1Ω	221Ω	2.21K	22.1K	221K		300	69.8Ω	698Ω	6.98K	69.8K	698K	50
	22.6Ω	226Ω	2.26K	22.6K	226K		50	71.5Ω	715Ω	7.15K	71.5K	715K	50
	23.2Ω	232Ω	2.32K	23.2K	232K		50	73.2Ω	732Ω	7.32K	73.2K	732K	50
	23.7Ω	237Ω	2.37K	23.7K	237K		50	75.0Ω	750Ω	7.50K	75.0K	750K	50
	24.3Ω	243Ω	2.43K	24.3K	243K		50	76.8Ω	768Ω	7.68K	76.8K	768K	50
	24.9Ω	249Ω	2.49K	24.9K	249K		300	78.7Ω	787Ω	7.87K	78.7K	787K	50
	25.5Ω	255Ω	2.55K	25.5K	255K		50	80.6Ω	806Ω	8.06K	80.6K	806K	50
	26.1Ω	261Ω	2.61K	26.1K	261K		50	82.5Ω	825Ω	8.25K	82.5K	825K	300
	26.7Ω	267Ω	2.67K	26.7K	267K		50	84.5Ω	845Ω	8.45K	84.5K	845K	50
	27.4Ω	274Ω	2.74K	27.4K	274K		300	86.6Ω	866Ω	8.66K	86.6K	866K	50
	28.0Ω	280Ω	2.80K	28.0K	280K		50	88.7Ω	887Ω	8.87K	88.7K	887K	50
	28.7Ω	287Ω	2.87K	28.7K	287K		50	90.9Ω	909Ω	9.09K	90.9K	909K	300
	29.4Ω	294Ω	2.94K	29.4K	294K		50	93.1Ω	931Ω	9.31K	93.1K	931K	50
	30.1Ω	301Ω	3.01K	30.1K	301K		300	95.3Ω	953Ω	9.53K	95.3K	953K	50
	30.9Ω	309Ω	3.09K	30.9K	309K		50	97.6Ω	976Ω	9.76K	97.6K	976K	50



ORDERING INFORMATION

Part #	Label on the Kits	Description
R08E96-50-300PCD	R0805-1%-510VALUE -50/300PCD	Resistor size 0805, 0603 or 0402, %1 tolerance, 510 total amount of values, 50PCs per value for rarely used values of resistors, 300PCs for commonly used ones.
R06E96-50-300PCD	R0603-1%-510VALUE -50/300PCD	
R04E96-50-300PCD	R0402-1%-510VALUE -50/300PCD	

NOTICE

- ATI warrants performance of its products for one year to the specifications applicable at the time of sale, except for those being damaged by excessive abuse. Products found not meeting the specifications within one year from the date of sale can be exchanged free of charge.
- ATI reserves the right to make changes to its products or to discontinue any product or service without notice, and advise customers to obtain the latest version of relevant information to verify, before placing orders, that information being relied on is current and complete.
- All products are sold subject to the terms and conditions of sale supplied at the time of order acknowledgment, including those pertaining to warranty, patent infringement, and limitation of liability. Testing and other quality control techniques are utilized to the extent ATI deems necessary to support this warranty. Specific testing of all parameters of each device is not necessarily performed, except those mandated by government requirements.
- Customers are responsible for their applications using ATI components. In order to minimize risks associated with the customers' applications, adequate design and operating safeguards must be provided by the customers to minimize inherent or procedural hazards. ATI assumes no liability for applications assistance or customer product design.
- ATI does not warrant or represent that any license, either express or implied, is granted under any patent right, copyright, mask work right, or other intellectual property right of ATI covering or relating to any combination, machine, or process in which such products or services might be or are used. ATI's publication of information regarding any third party's products or services does not constitute ATI's approval, warranty or endorsement thereof.
- IP (Intellectual Property) Ownership: ATI retains the ownership of full rights for special technologies and/or techniques embedded in its products, the designs for mechanics, optics, plus all modifications, improvements, and inventions made by ATI for its products and/or projects.