

Geometrical parameters on the front sides of the jelly rolls

Main article

Design, properties, and manufacturing of cylindrical Li-ion battery cells – A generic overview

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Table 1. Sony / Murata US18650VTC4

Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.50	0.60
Lowest anode to highest cathode	0.25	0.25
Lowest cathode to highest cathode	0.30	0.30
Overhang anode to cathode, max	0.80	0.85
Overhang anode to cathode, min	0.70	0.70

Table 2. Sony / Murata US18650VTC6

Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.25	0.40
Lowest anode to highest cathode	0.15	0.30
Lowest cathode to highest cathode	0.60	0.30
Overhang anode to cathode, max	0.45	0.75
Overhang anode to cathode, min	0.30	0.55

Table 3. Samsung INR18650-25R

Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.60	0.45
Lowest anode to highest cathode	0.15	0.15
Lowest cathode to highest cathode	0.40	0.30
Overhang anode to cathode, max	1.00	0.80
Overhang anode to cathode, min	0.65	0.50

Table 4. Samsung INR18650-35E

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.50	0.50
Lowest anode to highest cathode	0.25	0.20
Lowest cathode to highest cathode	0.10	0.15
Overhang anode to cathode, max	0.65	0.65
Overhang anode to cathode, min	0.40	0.60

Table 5. Samsung ICR 18650-22P

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.60	0.50
Lowest anode to highest cathode	0.25	0.25
Lowest cathode to highest cathode	0.20	0.10
Overhang anode to cathode, max	0.80	0.75
Overhang anode to cathode, min	0.70	0.70

Table 6. Sanyo UR18650RX

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.40	0.65
Lowest anode to highest cathode	0.45	0.35
Lowest cathode to highest cathode	0.55	0.35
Overhang anode to cathode, max	0.90	1.00
Overhang anode to cathode, min	0.70	0.90

Table 7. Panasonic NCR18650B

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.20	0.15
Lowest anode to highest cathode	0.60	0.30
Lowest cathode to highest cathode	0.4,	0.20
Overhang anode to cathode, max	0.70	0.40
Overhang anode to cathode, min	0.55	0.25

Table 8. LG INR18650-MJ1

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.60	0.65
Lowest anode to highest cathode	0.20	0.20
Lowest cathode to highest cathode	0.20	0.20
Overhang anode to cathode, max	0.75	0.90
Overhang anode to cathode, min	0.60	0.80

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Table 9. LG INR18650-HG2L

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.40	0.40
Lowest anode to highest cathode	0.35	0.35
Lowest cathode to highest cathode	0.30	0.35
Overhang anode to cathode, max	0.75	0.75
Overhang anode to cathode, min	0.60	0.70

Table 10. LG ICR 18650-HE2

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.35	0.55
Lowest anode to highest cathode	0.30	0.30
Lowest cathode to highest cathode	0.30	0.35
Overhang anode to cathode, max	0.75	1.05
Overhang anode to cathode, min	0.30	0.75

Table 11. Sanyo Panasonic NCR2070C

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.50	0.75
Lowest anode to highest cathode	0.10	0.45
Lowest cathode to highest cathode	0.10	0.20
Overhang anode to cathode, max	0.90	1.00
Overhang anode to cathode, min	0.65	0.80

Table 12. Panasonic NCR20700B

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.85	0.50
Lowest anode to highest cathode	0.25	0.25
Lowest cathode to highest cathode	0.20	0.25
Overhang anode to cathode, max	1.15	0.60
Overhang anode to cathode, min	0.95	0.85

Table 13. Sony / Murata US21700VTC6A

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.60	0.35
Lowest anode to highest cathode	0.20	0.35
Lowest cathode to highest cathode	0.50	0.45
Overhang anode to cathode, max	1.00	0.80
Overhang anode to cathode, min	0.65	0.60

Table 14. Samsung INR21700-40T

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.30	0.25
Lowest anode to highest cathode	0.25	0.30
Lowest cathode to highest cathode	0.30	0.30
Overhang anode to cathode, max	0.60	0.65
Overhang anode to cathode, min	0.50	0.60

Table 15. Samsung INR21700-33J

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.55	0.65
Lowest anode to highest cathode	0.10	0.25
Lowest cathode to highest cathode	0.30	0.20
Overhang anode to cathode, max	0.70	1.00
Overhang anode to cathode, min	0.55	0.75

Table 16. Samsung INR21700-50E

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.40	0.30
Lowest anode to highest cathode	0.25	0.20
Lowest cathode to highest cathode	0.30	0.30
Overhang anode to cathode, max	0.65	0.70
Overhang anode to cathode, min	0.50	0.50

Table 17. LG Chem INR21700-M50T

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.20	0.35
Lowest anode to highest cathode	0.45	0.45
Lowest cathode to highest cathode	0.40	0.35
Overhang anode to cathode, max	0.60	0.80
Overhang anode to cathode, min	0.45	0.50

Table 18. LG INR21700-M50LT

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Parameter [mm]	Negative terminal	Positive terminal
Highest anode to lowest cathode	0.20	0.55
Lowest anode to highest cathode	0.20	0.10
Lowest cathode to highest cathode	0.15	0.15
Overhang anode to cathode, max	0.50	0.70
Overhang anode to cathode, min	0.35	0.65

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