



## 12LS-18

12V 18Ah

VdS G112074

Design lifetime 5 years



Q-Batteries Security Akku 12LS-18 is an AGM battery with VdS-approval. It is designed for stand-by applications such as burglar-systems or UPS-systems.

### Application:

burglar-systems, UPS-systems,  
fire-detecting-systems,  
telecommunication-systems

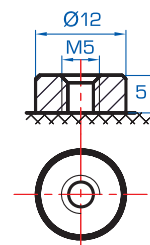
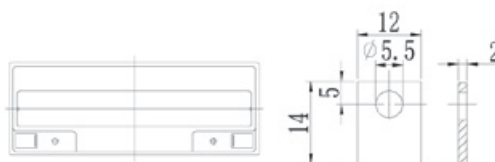
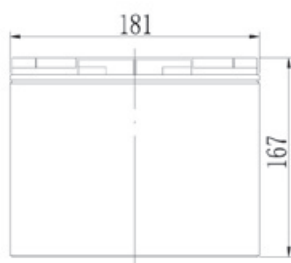


### Specification:

Voltage Per Unit	12 V		
Capacity	18 Ah (20 h) cell voltage 1.8V / cell		
Cells Per Unit	6		
Weight	ca. 5,7 kg +/- 3%		
Max. Discharge Current	270 A (5 sec.)		
Internal Resistance	ca. 17m $\Omega$		
Operating Temperature Range Normal	Discharge: - 15°C - 50°C	Charge: -10°C - 50°C	Storage: - 20°C - 50°C
Operating Temperature Range	25°C $\pm$ 5°C		
Self Discharge	Valve Regulated Lead Acid (VRLA) batteries can be stored for more than 6 months at 25°C. Self-discharge ratio less than 3% per month at 25°C. Please charge batteries before using.		
Terminal	F3, F13		
Container Material	A.B.S. (UL94-HB)		

### Dimensions:

181 Length x 77 Width x 167 mm Height



F13 (Schraubanschluss M5)

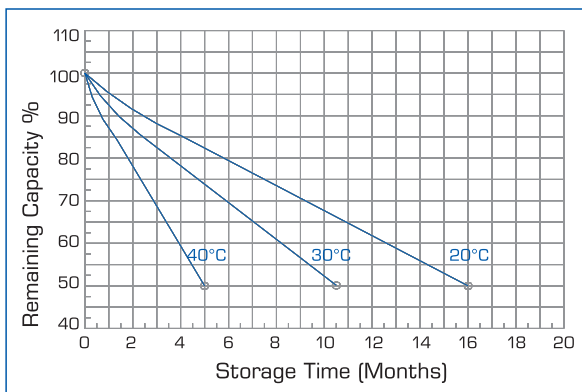
## Constant current discharge characteristics: A (25°C)

FV/Time	5 Min.	10 Min.	15 Min.	30 Min.	1 HR	3 HR	5 HR	10 HR	20 HR
9,60 V	63,0	39,6	31,5	18,9	10,8	4,38	2,92	1,64	0,91
10,2 V	59,9	37,6	30,2	18,1	10,4	4,32	2,88	1,63	0,91
10,8 V	56,3	35,4	28,7	17,2	9,85	4,23	2,82	1,62	0,90

## Constant current discharge characteristics: Watt (25°C)

FV/Time	5 Min.	10 Min.	15 Min.	30 Min.	1 HR	3 HR	5 HR	10 HR	20 HR
9,60 V	703	447	359	217	125	52,1	34,9	19,7	11,0
10,2 V	668	424	345	208	120	51,3	34,4	19,6	10,9
10,8 V	628	399	327	198	114	50,3	33,7	19,6	10,8

## Storage characteristic:



## Charging Method:

Charge the batteries at least once every six months, if they are stored at 25°C

Constant Voltage (V)  
 $-0.2C \times 2h + 2.4-2.45V/Cell \times 24h$ , max. Current 0.3CA

Constant Current (A)  
 $-0.2C \times 2h + 0.1CA \times 12h$

Fast  
 $-0.2C \times 2h + 0.3CA \times 4.0h$

## Capacity Factors with different Temperature:

Battery Type		-20°C	-10°C	0°C	5°C	10°C	20°C	25°C	30°C	40°C	45°C
GEL Battery	6V & 12V	50%	70%	83%	85%	90%	98%	100%	102%	104%	105%
	2V	60%	75%	85%	88%	92%	99%	100%	103%	105%	106%
AGM Battery	6V & 12V	46%	66%	76%	83%	90%	98%	100%	103%	107%	109%
	2V	55%	70%	80%	85%	92%	99%	100%	104%	108%	110%