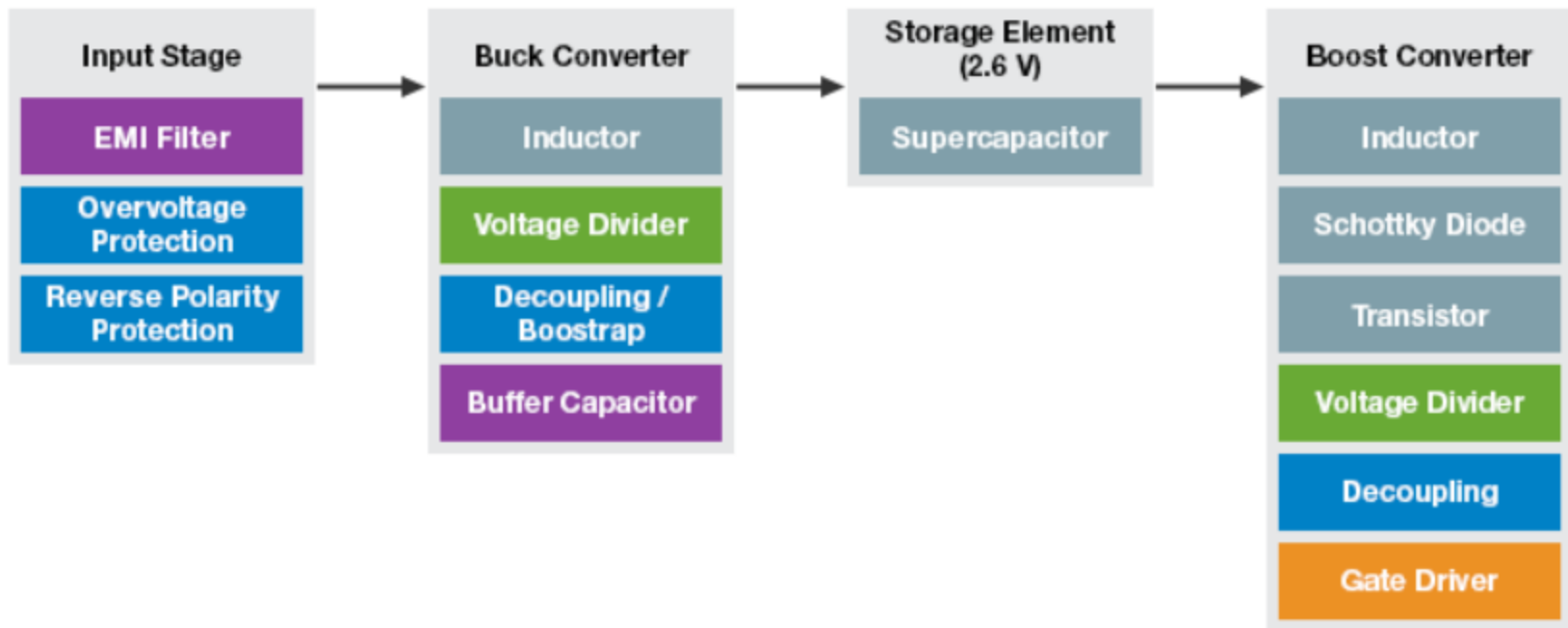


# Low Voltage UPS - Block Diagram

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# Low Voltage UPS - Parts

## INPUT STAGE - EMI FILTER

### INDUCTOR

Product Name	Status	Description	Features	Package	Q-Level
IHLP1616		IHLP Inductor SMD Best Saturation Behaviour	DCR down to 5mOhm	SMD	

### MLCC

Product Name	Status	Description	Features	Package	Q-Level
VJ0603Y		Multilayer Ceramic Chip Capacitor SMD High frequency applications	C = 0.5 pF ... 100 µF V= 10V... 100V	Radial	

## INPUT STAGE - OVERVOLTAGE PROTECTION

### TVS DIODE

Product Name	Status	Description	Features	Package	Q-Level
VTVS		Best Saturation Behaviour SMD SMF-Package	VWM= 5V... 63V PPPM=400W	SMD	AEC Q200

## INPUT STAGE - REVERSE POLARITY PROTECTION

### SCHOTTKY DIODE

Product Name	Status	Description	Features	Package	Q-Level
SS3P3L		Schottky Barrier Rectifier High Current Density	VRRM = 30 V IF = 3 A	SMD TO-277A	AEC Q101

# Low Voltage UPS - Parts

## BUCK CONVERTER - VOLTAGE DIVIDER

### CHIP RESISTOR

Product Name	Status	Description	Features	Package	Q-Level
CRCW-37		Lead- Free Thick Film Resistor SMD High pulse performance		s	

## BUCK CONVERTER - DECOUPLING/ BOOTSTRAP

### MLCC

Product Name	Status	Description	Features	Package	Q-Level
VJ0603Y		Multilayer Ceramic Chip Capacitor SMD High frequency applications	C = 0.5 pF ... 100 µF V= 10V... 100V	SMD	

## BUCK CONVERTER - BUFFER CAPACITOR

### MLCC

Product Name	Status	Description	Features	Package	Q-Level
VJ1210		Multilayer Ceramic Chip Capacitor SMD High frequency applications	C = 0.5 pF ... 100 µF V= 10V... 100V	SMD	

## BUCK CONVERTER - INDUCTOR

### INDUCTOR

Product Name	Status	Description	Features	Package	Q-Level
IHLP3232CZER		IHLP Inductor SMD Best Saturation Behaviour	DCR down to 1.6mOhm		

## STORAGE ELEMENT - SUPERCAPACITOR

### 220EDLC

Product Name	Status	Description	Features	Package	Q-Level
MAL22209100E3		EI Double Layer Capacitor Radial Leaded Low Impedance	C=40F ESR=18mOhm Imax = 35A	Radial 18x31mm	

# Low Voltage UPS - Parts

## BOOST CONVERTER - INDUCTOR

### INDUCTOR

Product Name	Status	Description	Features	Package	Q-Level
IHLP4040DZ		IHLP Inductor SMD Best Saturation Behaviour	DCR down to 33mOhm	SMD	

## BOOST CONVERTER - SCHOTTKY DIODE

### SCHOTTKY DIODE

Product Name	Status	Description	Features	Package	Q-Level
SS5P4		Schottky Barrier Rectifier High Current Density	VRRM = 40 V IF = 5 A	SMD TO-277A	AEC Q101

## BOOST CONVERTER - TRANSISTOR

### TRENCHFET N-MOS

Product Name	Status	Description	Features	Package	Q-Level
SiA468DJ		N-Channel 30V (DS) MOSFET SMD PowerPAKSC-70-6L	37.8A RDS(on) = 0.0084 Ω	SMD PowerPAK SC-70-6L	

## BOOST CONVERTER - VOLTAGE DIVIDER

### CHIPRESISTOR

Product Name	Status	Description	Features	Package	Q-Level
CRCW-37		Lead- Free Thick Film Resistor SMD High pulse performance		SMD	

# Low Voltage UPS - Parts

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## BOOST CONVERTER - DECOUPLING/ BOOTSTRAP

### MLCC

Product Name	Status	Description	Features	Package	Q-Level
VJ0603Y		Multilayer Ceramic Chip Capacitor SMD High frequency applications	C = 0.5 pF ... 100 $\mu$ F VR = 75V	SMD	

## BOOST CONVERTER - GATER DRIVER

### GATE RESISTOR

Product Name	Status	Description	Features	Package	Q-Level
CRCW-37		Lead- Free Thick Film Resistor SMD High pulse performance		SMD	

## SWITCHING DIODE

Product Name	Status	Description	Features	Package	Q-Level
1N4148W		Small Signal Fast Switching Diode SMD	VR = 75V	SMD SOD-123	AEC Q200