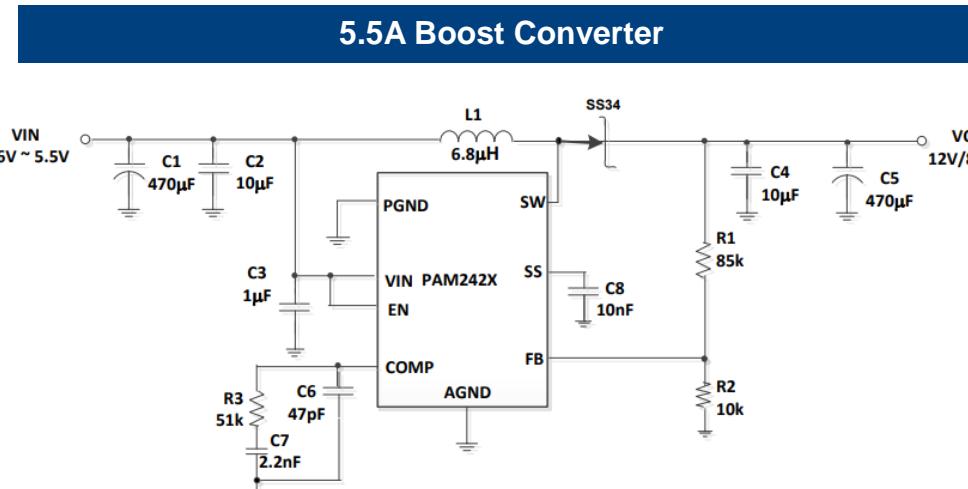
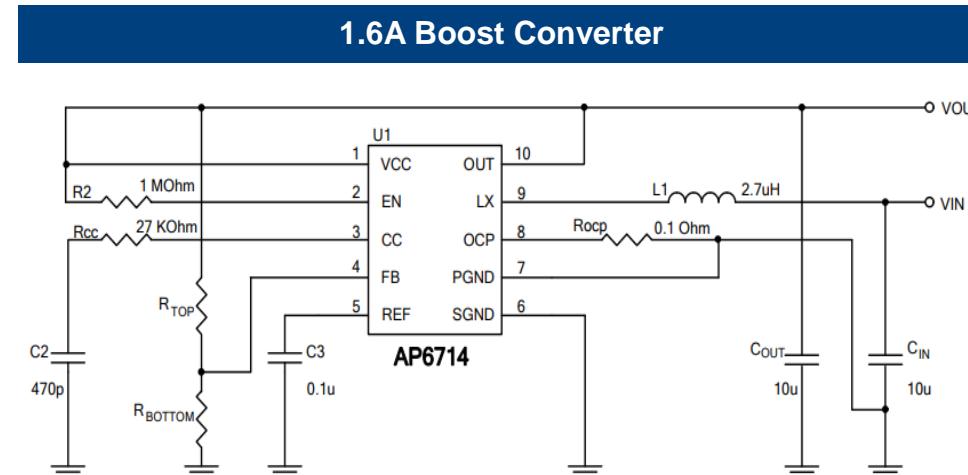


Boost Converter

Boost converters or regulators are used in many instances from providing small supplies where higher voltages may be needed, to much higher power requirements. The boost converter has many similarities to the buck converter. The fundamental circuit for a boost converter consists of an inductor, diode, capacitor, switch and error amplifier with switch control circuitry. In the basic block diagram, the operation of the boost converter can be seen that the output voltage appearing across the load is sensed by the sense/ error amplifier and an error voltage is generated that controls the switch. An inductor and capacitor are both energy storing devices in a boost converter. They store energy and delivers the increased voltage in output load.



Reference	KEMET Part Number
C _{IN} , C _{OUT}	<ul style="list-style-type: none">C0805C106K8RACTUA700V106M12RATE040
C ₂	<ul style="list-style-type: none">C0402C471K8GACTUGPC7.3471M63K33TR12
C ₃	<ul style="list-style-type: none">C1206C104K8GACTUGMC10.2104K63A31TR16
L ₁	<ul style="list-style-type: none">H.DI-1280G-2R7
Reference	KEMET Part Number
C ₁ , C ₅	<ul style="list-style-type: none">T491E477K010ATEDH477M010A9MAA
C ₂ , C ₄	<ul style="list-style-type: none">C0805C106K8RACTUT520A106M010ATE080
C ₃	<ul style="list-style-type: none">C0603C105K8PACTM
C ₆	<ul style="list-style-type: none">C2220C470JCGACTUA72MF0047AA00M
C ₇	<ul style="list-style-type: none">C1210C226K3RACTUGMC5.7222K50J33TR12
C ₈	<ul style="list-style-type: none">C0603C103K8GACTUGMC5.7103K50J33TR12
L ₁	<ul style="list-style-type: none">PLC-1035-6R8S