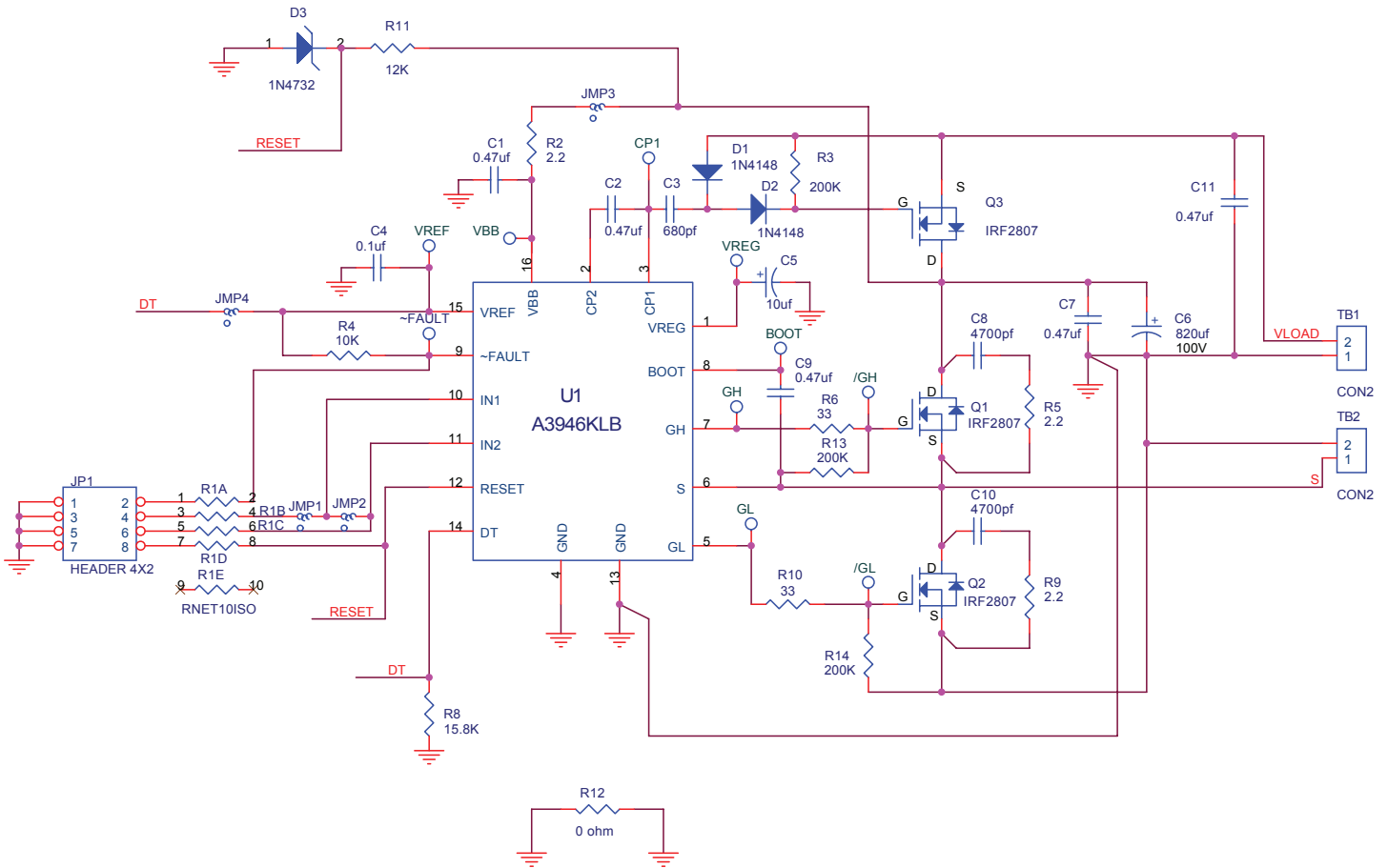
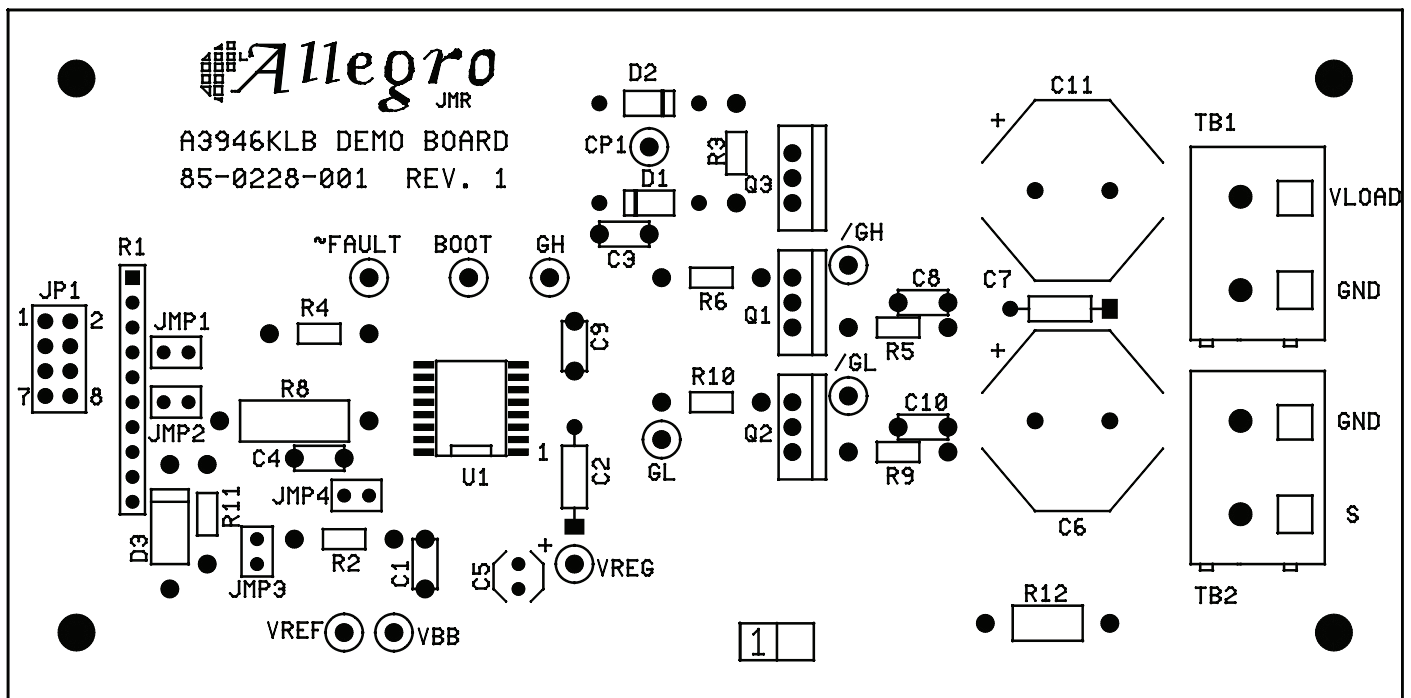


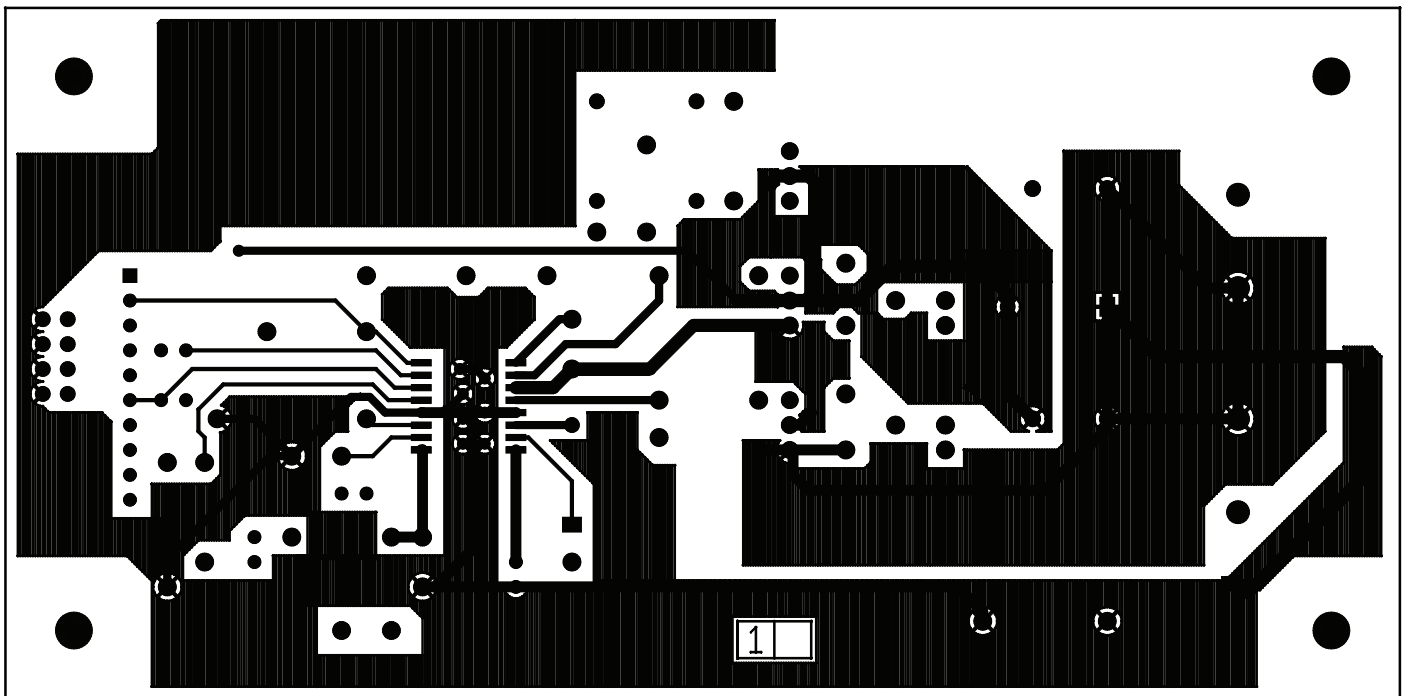
Demo Board Schematic/Layout

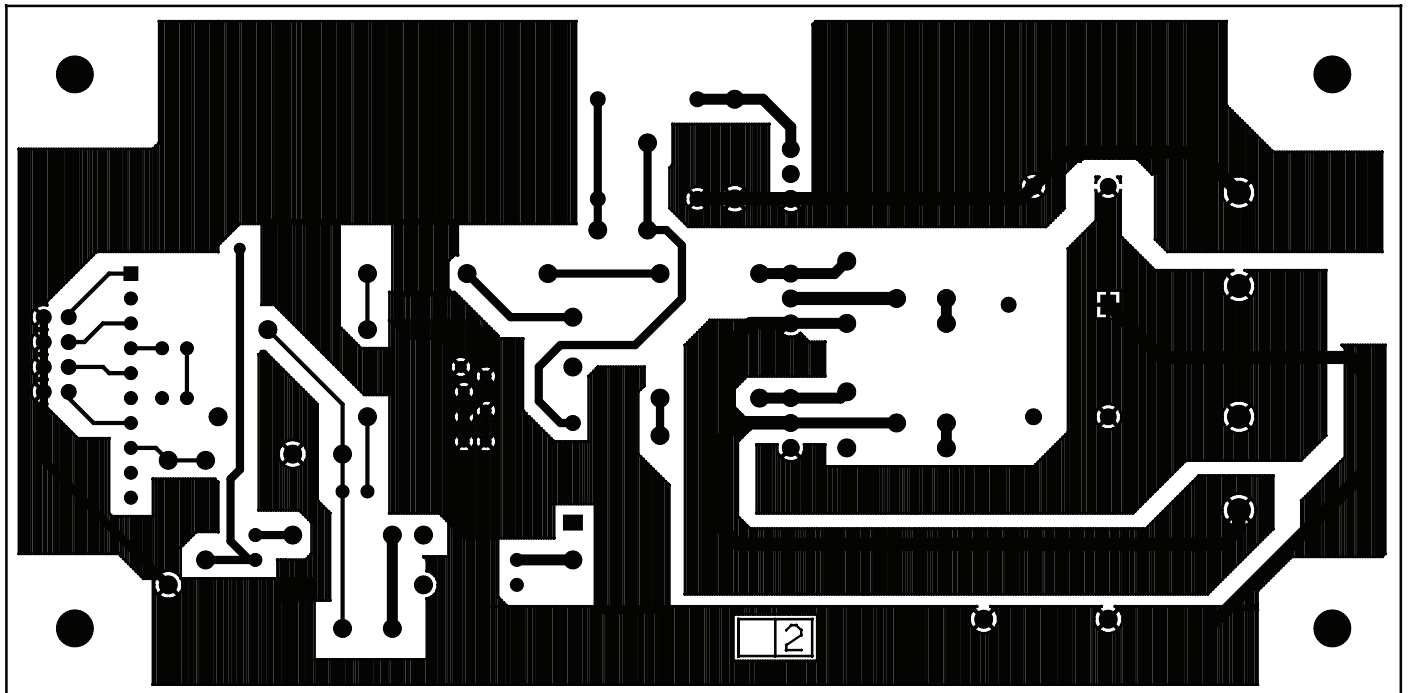
SCHEMATIC



LAYOUT







BILL OF MATERIALS

<u>Item</u>	<u>Qty</u>	<u>Reference</u>	<u>Part</u>	<u>Description</u>	<u>Comments</u>
1	10	CP1,VREG,VREF,VBB, GL,GH,BOOT,/GL,/GH ~FAULT	TP	Component Corporation 104-30-02 Test Points, Red Distributor; Papi Supply	
2	5	C1,C2,C7,C9,C11	0.47uf	Cap. 100V , Ceramic Kemet C330C474K1R5CA, X7R	Footprints are different; bend leads as necessary.
3	2	C8,C10	4700pf	Cap. 100V, X7R	
4	1	C4	0.1uf	Cap. Kemet, C322C104M1U5CA, 50V	
5	1	C5	10uf	Cap. Vishay 515D106M063JA6A or UCCEM630ELL100ME11D	
6	1	C6	820uf	Cap. Nichicon, UHE2A821MHT, 100V Aluminum, Electrolytic, HE series	
7	1	C3	680pf	Cap, 100V, MN	
8	2	D1,D2	1N4148	Diode	
9	1	D3	1N4732	Zener Diode, 4.7V, 1W	
10	4	JMP1 - JMP4	Header	3M 929834-01-36 Strip header 2 pins per header	
11	1	JP1	HEADER 4X2	Header, Dual, 3M 929665-01-36-1 Dual 4 pins per header	
12	3	Q1,Q2,Q3	IRF2807	International Rectifier, Mosfet N-Channel TO-220AB	
13	3	R3,R13,R14	200K	Resistor, ¼W, 5%, CC	Solder R13 and R14 to back of board from gate to source of Q1 and Q2, respectively.
14	1	R1	100 ohm	Bourns 4610x-102-101 10 pin isolated SIP	
15	3	R2,R5,R9	2.2 ohm	Resistor, 1/4W, 5%,	
16	1	R4	10K	Resistor, 1/4W, 5%,	
17	2	R10,R6	33	Resistor, 1/4W, 5%,	
18	1	R8	15.8K	Resistor, 1/2W, 1%,	
19	1	R11	12K	Resistor, 1W, 5%,	
20	1	R12	0 ohm	20AWG bus wire	
21	2	TB2,TB1	TERMBLK	Phoenix Contact 1714971, 2pos,9.52mm,PCB,MKDS 5/2-9.5	
22	1	U1	A3946KLB	Allegro Automotive Power Mosfet Half-Bridge Controller	
23	1		PCB	85-0228-001	
24	4	For JMP1 - JMP4	Shunt	3M 925250-R	
25	4		Bumper	Keystone 720, recessed, #4 screw, ¼"	
26	4		screw	4/40 x ¼" long, round head	
27	4		hex nut	#4	

Revision History

Number	Date	Description
–	September 9, 2016	Initial release

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