TOSHIBA

2020-05-07 Rev.2.0

RD Number: RD115

RD Title: TB62214AFG Evaluation circuit BOM

Item No.	Designator	Quantity	Value	Part Number	Manufacturer	Description	Package	Not Mount
1	C_VCC	1	0.1μF 25V	_	_	Chip capacitor	3.2mm×1.6mm	
2	C_VM2	1	0.1μF 50V	_	_	Chip capacitor	3.2mm×1.6mm	
3	CVREFA	1	0.1μF 25V	_	_	Chip capacitor	3.2mm×1.6mm	
4	CVREFB	1	0.1μF 25V	_	_	Chip capacitor	3.2mm×1.6mm	
5	C_VM1	1	100μF 50V	_	_	Electrolytic capacitor		
6	C_OSCM	1	270pF 25V	_	_	Chip capacitor	3.2mm×1.6mm	
7	CON1	1	Connector	_	_	Connector 4P 2.5		
8	OUT_A-	1	Check terminal	_	_	Logic pin		
9	OUT_A+	1	Check terminal	_	_	Logic pin		
10	OUT_B-	1	Check terminal	_	_	Logic pin		
11	OUT_B+	1	Check terminal	_	_	Logic pin		
12	RSA	1	Check terminal	_	_	Check terminal		
13	RSB	1	Check terminal	_	_	Check terminal		
14	VCC	1	Check terminal	_	_	Check terminal		
15	VDD	1	Check terminal	_	_	Check terminal		
16	VM	1	Check terminal	_	_	Logic pin		
17	VREFA	1	Check terminal	_	_	Check terminal		
18	VREFB	1	Check terminal	_	_	Logic pin		
19	OSCM	1	Check terminal	_	_	Check terminal		
20	INA1	1	Check terminal	_	_	Check terminal		
21	INA2	1	Check terminal	_	_	Check terminal		
22	РНА	1	Check terminal	_	_	Check terminal		
23	PHB	1	Check terminal	_		Check terminal		
24	INB1	1	Check terminal	_	_	Check terminal		
25	INB2	1	Check terminal	_	_	Check terminal		

26	STANDBY	1	Check terminal	_	_	Check terminal		
27	GND1	1	Check terminal	_	_	Logic pin		
28	GND2	1	Check terminal	_	_	Logic pin		
29	GND3	1	Check terminal	_	_	Logic pin		
30	JPVref1	1	Pin header 2P	_	_	Jumper		
31		1	Jump socket	_	_	Jumper Short		
32	JPVref2	1	Pin header 2P	_	_	Jumper		
33		1	Jump socket	_	_	Jumper Short		
34	JPVCC	1	Pin header 2P	_	_	Jumper		
35		1	Jump socket	_	_	Jumper Short		
36	R_MO_OUT	1	100kΩ 0.25W	_	_	Lead resistor	2.54mm Pitch	
37	R_OSCM	1	5.1kΩ	_	_	Resistor	3.2mm×1.6mm	
38	RVREF1	0	Not mount	_	_	Lead resistor	2.54mm Pitch	✓
39	RVREF2	0	Not mount	_	_	Lead resistor	2.54mm Pitch	✓
40	RRSA	1	0.51Ω 1W	_	_	Chip resistor	5.0mm×2.5mm	
41	RRSB	1	0.51Ω 1W	_	_	Chip resistor	5.0mm×2.5mm	
42	SW1	1	Pin header 3P	_	_	Jumper		
43		1	Jump socket	_	_	Jumper Short		
44	SW2	0	Pin header 3P	_	_	Jumper		✓
45		0	Jump socket	_	_	Jumper Short		✓
46	SW3	1	Pin header 3P	_	_	Jumper		
47		1	Jump socket	_	_	Jumper Short		
48	SW4	1	Pin header 3P	_	_	Jumper		
49		1	Jump socket	_	_	Jumper Short		
50	SW5	0	Pin header 3P	_	_	Jumper		✓
51		0	Jump socket	_	_	Jumper Short		✓
52	SW6	1	Pin header 3P	_	_	Jumper		
53		1	Jump socket	_	_	Jumper Short		
54	SW7	1	Pin header 3P	_	_	Jumper		
55		1	Jump socket	_	_	Jumper Short		
56	IC1	1	TB62214AFG	TB62214AFG	TOSHIBA	Motor driver IC	HSOP28	

Terms of Use

This terms of use is made between Toshiba Electronic Devices and Storage Corporation ("We") and customers who use documents and data that are consulted to design electronics applications on which our semiconductor devices are mounted ("this Reference Design"). Customers shall comply with this terms of use. Please note that it is assumed that customers agree to any and all this terms of use if customers download this Reference Design. We may, at its sole and exclusive discretion, change, alter, modify, add, and/or remove any part of this terms of use at any time without any prior notice. We may terminate this terms of use at any time and for any reason. Upon termination of this terms of use, customers shall destroy this Reference Design. In the event of any breach thereof by customers, customers shall destroy this Reference Design, and furnish us a written confirmation to prove such destruction.

1. Restrictions on usage

- 1. This Reference Design is provided solely as reference data for designing electronics applications. Customers shall not use this Reference Design for any other purpose, including without limitation, verification of reliability.
- 2. This Reference Design is for customer's own use and not for sale, lease or other transfer.
- 3. Customers shall not use this Reference Design for evaluation in high or low temperature, high humidity, or high electromagnetic environments.
- 4. This Reference Design shall not be used for or incorporated into any products or systems whose manufacture, use, or sale is prohibited under any applicable laws or regulations.

2. Limitations

- 1. We reserve the right to make changes to this Reference Design without notice.
- 2. This Reference Design should be treated as a reference only. We are not responsible for any incorrect or incomplete data and information.
- 3. Semiconductor devices can malfunction or fail. When designing electronics applications by referring to this Reference Design, customers are responsible for complying with safety standards and for providing adequate designs and safeguards for their hardware, software and systems which minimize risk and avoid situations in which a malfunction or failure of semiconductor devices could cause loss of human life, bodily injury or damage to property, including data loss or corruption. Customers must also

refer to and comply with the latest versions of all relevant our information, including without limitation, specifications, data sheets and application notes for semiconductor devices, as well as the precautions and conditions set forth in the "Semiconductor Reliability Handbook".

- 4. When designing electronics applications by referring to this Reference Design, customers must evaluate the whole system adequately. Customers are solely responsible for all aspects of their own product design or applications. WE ASSUME NO LIABILITY FOR CUSTOMERS' PRODUCT DESIGN OR APPLICATIONS.
- 5. No responsibility is assumed by us for any infringement of patents or any other intellectual property rights of third parties that may result from the use of this Reference Design. No license to any intellectual property right is granted by this terms of use, whether express or implied, by estoppel or otherwise.
- 6. THIS REFERENCE DESIGN IS PROVIDED "AS IS". WE (a) ASSUME NO LIABILITY WHATSOEVER, INCLUDING WITHOUT LIMITATION, INDIRECT, CONSEQUENTIAL, SPECIAL, OR INCIDENTAL DAMAGES OR LOSS, INCLUDING WITHOUT LIMITATION, LOSS OF PROFITS, LOSS OF OPPORTUNITIES, BUSINESS INTERRUPTION AND LOSS OF DATA, AND (b) DISCLAIM ANY AND ALL EXPRESS OR IMPLIED WARRANTIES AND CONDITIONS RELATED TO THIS REFERENCE DESIGN, INCLUDING WARRANTIES OR CONDITIONS OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, ACCURACY OF INFORMATION, OR NONINFRINGEMENT.

3. Export Control

Customers shall not use or otherwise make available this Reference Design for any military purposes, including without limitation, for the design, development, use, stockpiling or manufacturing of nuclear, chemical, or biological weapons or missile technology products (mass destruction weapons). This Reference Design may be controlled under the applicable export laws and regulations including, without limitation, the Japanese Foreign Exchange and Foreign Trade Law and the U.S. Export Administration Regulations. Export and re-export of this Reference Design are strictly prohibited except in compliance with all applicable export laws and regulations.

4. Governing Laws

This terms of use shall be governed and construed by laws of Japan.