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REFERENCE GUIDE TO LETTER SYMBOLS FOR SEMICONDUCTOR DEVICES

Foreword

This publication provides a quick reference to the letter symbols and corresponding terms that are defined in JESD77-B, *Terms, Definitions, and Letter Symbols for Discrete Semiconductor and Optoelectronic Devices*; JESD99-A, *Terms, Definitions, and Letter Symbols for Microelectronic Devices*, and JESD100-B, *Terms, Definitions, and Letter Symbols for Microcomputers, Microprocessors, and Memory Integrated Circuits*. It is intended to simplify interpretation of data sheets and specifications and to promote the uniform use of these symbols.

The symbols relate to ratings and characteristics found in data sheets and other specifications. Some abbreviations used in lieu of symbols are also included. These symbols and abbreviations include those used for all products within the scope of JEDEC. Sometimes, in different product areas, different symbols are applicable to similar concepts and, in other cases, the same symbol is applied to different concepts. The user must bear this in mind and consider context.

Annex A identifies the product associated with each referenced clause or subclause of the source standards (JESD77-B, JESD99-A, and JESD100-B). Annex B is provided as an aid to determining what symbol should be used and is organized by term. Annex C lists commonly used units of measurement. Annex D lists the metric multipliers used with the units of measurement.

The material contained in this publication was compiled under the cognizance of the JC-10 Committee on Terms, Definitions, and Symbols. The concept for this publication was approved by the JEDEC Solid State Products Engineering Council under Council Ballot JCB-92-43. The addition of Annex B was approved by the JEDEC Board of Directors under Board Ballot JCB-01-117. JEP104C replaces JEP104-B. JEP104C.01 is the first minor revision of JEP104C, June 2002. Annex E briefly shows entries that have changed.

Introduction

Symbols are listed in the following order: Roman letters, Greek letters, numerals, and mathematical symbols. Subscripting and punctuation marks are ignored for the purposes of alphabetizing. Uppercase letters precede lowercase letters for symbols that are otherwise identical.

Introduction (cont'd)

After the letter symbol (or abbreviation), the term associated with the symbol is given with a reference to the JEDEC standard in which the definition and other details may be found. See annex A to determine the products associated with the referenced subclauses.

As mentioned in the foreword, different symbols (particularly in the subscripts) are sometimes used for similar concepts for different products.

EXAMPLE

Threshold voltages are symbolized by different sets of subscripts, depending on the product.

$V_{GS(th)}$	gate-source threshold voltage	77/4.3.2
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is found in JESD77-B, subclause 4.3.2, and applies for field-effect transistors;

V_{IT}	input threshold voltage	99/2.3.2
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is found in JESD99-A, subclause 2.3.2, and applies for integrated circuits; and

$V_{(TO)}$	on-state threshold voltage, dc value, no alternating component	77/6.1.2
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is found in JESD77-B, subclause 6.1.2, and applies for thyristors.

The same symbol is sometimes used for different concepts.

EXAMPLE

I_D has three very different meanings respectively for field-effect transistors (4.3.2 of JESD77-B), thyristors (6.1.2 of JESD77-B) and thyristor surge protective devices (7.2.2 of JESD77-B), and varistor surge protective devices (7.1.2 of JESD77-B).

I_D	drain current, dc	77/4.3.2
	or	
	off-state current, dc value, no alternating component	77/6.1.2
		77/7.2.2
	or	
	standby current	77/7.1.2

REFERENCE GUIDE TO LETTER SYMBOLS FOR SEMICONDUCTOR DEVICES

SYMBOL	TERM	REF.
A	amplification, voltage or current	99/2.1.2.1
A_D	area, detector	77/5.2.2
A_{VC}	common-mode voltage amplification, large-signal	99/2.4.2
A_{vc}	common-mode voltage amplification, small-signal	99/2.4.2
A_{VD}	differential voltage amplification, large-signal	99/2.4.2
A_{vd}	differential voltage amplification, small-signal	99/2.4.2
A_{VS}	single-ended voltage amplification, large-signal	99/2.4.2
A_{vs}	single-ended voltage amplification, small-signal	99/2.4.2
B	bandwidth (also BW)	99/2.4.3
b	susceptance	77/1.2.1
b_{fs}	small-signal forward transfer susceptance, common-source (also $y_{fs(imag)}$)	77/4.3.2
b_{is}	small-signal input susceptance, common-source (also $y_{is(imag)}$)	77/4.3.2
B_n	noise equivalent bandwidth (formerly Δf)	77/5.2.2
B_{OM}	bandwidth, maximum output swing	99/2.4.3
b_{os}	small-signal output susceptance, common-source (also $y_{os(imag)}$)	77/4.3.2
b_{rs}	small-signal reverse transfer susceptance, common-source (also $y_{rs(imag)}$)	77/4.3.2
BV...	See $V_{(BR)}...$	
BW	bandwidth (also B)	99/2.4.3

SYMBOL	TERM	REF.
C	capacitance	77/1.2.1 77/7.2.2 99/2.1.2.1
C_c	case capacitance	77/3.6.2
C_{cb} or $C_{cb(dir)}$	interterminal capacitance, collector-base	77/4.1.2
C_{ce} or $C_{ce(dir)}$	interterminal capacitance, collector-emitter	77/4.1.2
C_{ds}	drain-source capacitance	77/4.3.2
C_{du}	drain-substrate capacitance	77/4.3.2
C_{eb} or $C_{eb(dir)}$	interterminal capacitance, emitter-base	77/4.1.2
CF	clamping factor	77/7.1.2
C_F	feedthrough capacitance	99/2.5.2.3
C_{gs}	gate-source capacitance	77/4.3.2
C_{ibo}	open-circuit input capacitance, common-base	77/4.1.2
C_{ibs}	short-circuit input capacitance, common-base	77/4.1.2
C_{ieo}	open-circuit input capacitance, common-emitter	77/4.1.2
C_{ies}	short-circuit input capacitance, common-emitter	77/4.1.2 77/4.4.2
C_{io}	input-to-output internal capacitance; transcapacitance	77/5.4.2
C_{iss}	short-circuit input capacitance, common-source	77/4.3.2
C_j	junction capacitance	77/3.6.2
CMRR	common-mode rejection ratio (also k_{CMR})	99/2.4.8
C_O	off-state capacitance	77/7.2.2

SYMBOL	TERM	REF.
C_{obo}	open-circuit output capacitance, common-base	77/4.1.2
C_{obs}	short-circuit output capacitance, common-base	77/4.1.2
C_{oeo}	open-circuit output capacitance, common-emitter	77/4.1.2
C_{oes}	short-circuit output capacitance, common-emitter	77/4.1.2 77/4.4.2
C_{oss}	short-circuit output capacitance, common-source	77/4.3.2
C_{rbs}	short-circuit reverse transfer capacitance, common-base	77/4.1.2
C_{rcs}	short-circuit reverse transfer capacitance, common-collector	77/4.1.2
C_{re}	common-emitter reverse transfer capacitance	77/4.4.2
C_{res}	short-circuit reverse transfer capacitance, common-emitter	77/4.1.2
C_{rss}	short-circuit reverse transfer capacitance, common-source	77/4.3.2
C_t	total capacitance	77/3.6.2
C_{tc}	depletion-layer capacitance, collector	77/4.1.2
CTE	charge-transfer efficiency (also η)	99/2.7.3
C_{te}	depletion-layer capacitance, emitter	77/4.1.2
CTI	charge-transfer inefficiency (also ϵ)	99/2.7.3
CTR	(preferred symbol is h_F) current transfer ratio	77/5.4.2
C_{t1}/C_{t2}	capacitance ratio	77/3.6.2
$(di_T/dt)_{cr}$	critical rate of rise of on-state current	77/6.1.2
$dv_{(com)}/dt$	critical rate of rise of commutating voltage [short form of $(dv_{D(com)}/dt)_{cr}$]	77/6.1.2
$(dv_{D(com)}/dt)_{cr}$	critical rate of rise of commutating voltage	77/6.1.2

SYMBOL	TERM	REF.
$(dv_D/dt)_{cr}$	critical rate of rise of off-state voltage	77/6.1.2
dv/dt	critical rate of rise of off-state voltage [short form of $(dv_D/dt)_{cr}$]	77/6.1.2
D^*	detectivity, D-star	77/5.2.2
D^{**}	detectivity, normalized	77/5.2.2
E	energy or illuminance (illumination) or irradiance	77/1.2.1 77/5.2.2 77/5.2.2
E_D	linearity error, differential	99/2.5.2.4
E_{DQ}	turn-off energy loss	77/6.1.2
E_e	irradiance	77/5.2.2
E_F	feedthrough error	99/2.5.2.4
E_{FS}	full-scale error	99/2.5.2.4
E_G	gain error	99/2.5.2.4
E_L	linearity error, end-point	99/2.5.2.4
$E_{L(adj)}$	linearity error, best-straight-line	99/2.5.2.4
E_O	offset error	99/2.5.2.4
E_{off}	turn-off switching loss	77/4.4.2
E_{on}	turn-on switching loss	77/4.4.2
E_p	pedestal (error)	99/2.5.2.4
E_{RO}	roll-over error	99/2.5.2.4

SYMBOL	TERM	REF.
E_{rs}	total switching loss	77/4.4.2
E_T	total error	99/2.5.2.4
E_V	illuminance (illumination)	77/5.2.2
E_{zs}	zero-scale error	99/2.5.2.4
F	spot noise figure; spot noise factor	77/2.2 99/2.4.10
$\overline{F}$	average noise figure; average noise factor	77/2.2 99/2.4.10
f	frequency	77/1.2.1 99/2.1.2.1
f_c	conversion rate	99/2.5.2.3
f_{co}	cutoff frequency	77/3.6.2
f_{hfb}	small-signal short-circuit forward current transfer cutoff frequency, common-base	77/4.1.2
f_{hfc}	small-signal short-circuit forward current transfer ratio cutoff frequency, common-collector	77/4.1.2
f_{hfe}	small-signal short-circuit forward current transfer ratio cutoff frequency, common-emitter	77/4.1.2
f_{max}	maximum clock frequency or maximum frequency of oscillation	99/2.3.5 77/4.1.2
f_{mod}	modulation frequency	77/5.2.2
$\overline{F}_o$	overall average noise figure	77/3.2.2
$\overline{F}_{os}$	standard overall average noise figure	77/3.2.2
FS	full scale	99/2.5.2.1

SYMBOL	TERM	REF.
f_{sb}	frequency of unity forward transmission coefficient, common-base	77/4.1.2
f_{sc}	frequency of unity forward transmission coefficient, common-collector	77/4.1.2
f_{sd}	frequency of unity forward transmission coefficient, common-drain	77/4.3.2
f_{se}	frequency of unity forward transmission coefficient, common-emitter	77/4.1.2
f_{sg}	frequency of unity forward transmission coefficient, common-gate	77/4.3.2
FS(nom)	full-scale value, nominal [also FSR(nom)]	99/2.5.2.1
FSR	full-scale range, (practical) [also FSR(pr)]	99/2.5.2.1
FSR(nom)	full-scale range, nominal [also FS(nom)]	99/2.5.2.1
FSR(pr)	full-scale range, (practical) [also FSR]	99/2.5.2.1
f_{ss}	frequency of unity forward transmission coefficient, common-source	77/4.3.2
FS–	full-scale, negative	99/2.5.2.1
FS+	full-scale, positive	99/2.5.2.1
f_T	transition frequency; frequency at which small-signal forward current transfer ratio (common-emitter) extrapolates to unity	77/4.1.2
f_1	frequency of unity current transfer ratio	77/4.1.2
G	gain, power	77/1.2.1 99/2.1.2.1
g	conductance	77/1.2.1
GA	glitch area	99/2.5.2.3

SYMBOL	TERM	REF.
GE	glitch energy	99/2.5.2.3
g_{fs}	small-signal forward transfer conductance, common-source (also $y_{fs(\text{real})}$)	77/4.3.2
g_{is}	small-signal input conductance, common-source (also $y_{is(\text{real})}$)	77/4.3.2
g_{MB}	static transconductance, common-base	77/4.1.2
g_{mb}	Use preferred symbol y_{fb} .	77/4.1.2
g_{MC}	static transconductance, common-collector	77/4.1.2
g_{mc}	Use preferred symbol y_{fc} .	77/4.1.2
g_{ME}	static transconductance, common-emitter	77/4.1.2
g_{me}	Use preferred symbol y_{fe} .	77/4.1.2
g_{me}	common-emitter small-signal transconductance	77/4.4.2
g_{os}	small-signal output conductance, common-source (also $y_{os(\text{real})}$)	77/4.3.2
G_P	insertion power gain, large-signal or power gain, large-signal	99/2.4.2 99/2.4.2
G_p	insertion power gain, small-signal or power gain, small-signal	99/2.4.2 99/2.4.2
G_{PB}	large-signal insertion power gain, common-base	77/4.1.2
G_{pb}	small-signal insertion power gain, common-base	77/4.1.2
G_{PC}	large-signal insertion power gain, common-collector	77/4.1.2
G_{pc}	small-signal insertion power gain, common-collector	77/4.1.2
G_{PE}	large-signal insertion power gain, common-emitter	77/4.1.2

SYMBOL	TERM	REF.
G_{pe}	small-signal insertion power gain, common-emitter	77/4.1.2
G_{pg}	small-signal insertion power gain, common-gate	77/4.3.2
G_{ps}	small-signal insertion power gain, common-source	77/4.3.2
g_{rs}	small-signal reverse transfer conductance, common-source (also $y_{rs(\text{real})}$)	77/4.3.2
G_T	transducer power gain, large-signal	99/2.4.2
G_t	transducer power gain, small-signal	99/2.4.2
G_{TB}	large-signal transducer power gain, common-base	77/4.1.2
G_{tb}	small-signal transducer power gain, common-base	77/4.1.2
G_{TC}	large-signal transducer power gain, common-collector	77/4.1.2
G_{tc}	small-signal transducer power gain, common-collector	77/4.1.2
G_{TE}	large-signal transducer power gain, common-emitter	77/4.1.2
G_{te}	small-signal transducer power gain, common-emitter	77/4.1.2
G_{tg}	small-signal transducer power gain, common-gate	77/4.3.2
G_{ts}	small-signal transducer power gain, common-source	77/4.3.2
h	matrix parameter	77/1.2.1
h_F	current transfer ratio	77/5.4.2
h_{FB}	static forward current transfer ratio, common-base	77/4.1.2
h_{fb}	small-signal short-circuit forward current transfer ratio, common-base	77/4.1.2
h_{FC}	static forward current transfer ratio, common-collector	77/4.1.2

SYMBOL	TERM	REF.
h_{fc}	small-signal short-circuit forward current transfer ratio, common-collector	77/4.1.2
h_{FE}	static forward current transfer ratio, common-emitter	77/4.1.2
h_{fe}	small-signal short-circuit forward current transfer ratio, common-emitter	77/4.1.2
h_{IB}	static input resistance, common-base	77/4.1.2
h_{ib}	small-signal short-circuit input impedance, common-base	77/4.1.2
h_{IC}	static input resistance, common-collector	77/4.1.2
h_{ic}	small-signal short-circuit input impedance, common-collector	77/4.1.2
h_{IE}	static input resistance, common-emitter	77/4.1.2
h_{ie}	small-signal short-circuit input impedance, common-emitter	77/4.1.2
$h_{ie(imag)}$	imaginary part of the small-signal short-circuit input impedance, common-emitter	77/4.1.2
$h_{ie(real)}$	real part of the small-signal short-circuit input impedance, common-emitter	77/4.1.2
h_{ob}	small-signal open-circuit output admittance, common-base	77/4.1.2
h_{oc}	small-signal open-circuit output admittance, common-collector	77/4.1.2
h_{oe}	small-signal open-circuit output admittance, common-emitter	77/4.1.2
$h_{oe(imag)}$	imaginary part of the small-signal open-circuit output admittance, common-emitter	77/4.1.2
$h_{oe(real)}$	real part of the small-signal open-circuit output admittance, common-emitter	77/4.1.2
h_{rb}	small-signal open-circuit reverse voltage transfer ratio, common-base	77/4.1.2

SYMBOL	TERM	REF.
h_{rc}	small-signal open-circuit reverse voltage transfer ratio, common-collector	77/4.1.2
h_{re}	small-signal open-circuit reverse voltage transfer ratio, common-emitter	77/4.1.2
I	luminous intensity or radiant intensity	77/5.3.2 77/5.3.2
I, i	current	77/1.2.1 99/2.1.2.1
I^2t	case nonrupture I^2t value	77/6.1.2
I^2t	I^2t value (of a surge on-state current)	77/6.1.2
I_B	base current, dc	77/4.1.2
I_b	base current, rms value of alternating component	77/4.1.2
i_B	base current, instantaneous total value	77/4.1.2
I_{BEV}	base cutoff current	77/4.1.2
$I_{(BO)}$	breakover current, dc	77/6.1.2 77/7.2.2
$i_{(BO)}$	breakover current, instantaneous total value	77/6.1.2
$I_{(BR)}$	breakdown current or reverse breakdown current, dc	77/7.2.2 77/6.1.2
$i_{(BR)}$	reverse breakdown current, instantaneous total value	77/6.1.2
$I_{B2(mod)}$	interbase modulated current	77/4.2.2
I_C	collector current, dc	77/4.1.2 77/4.4.2

SYMBOL	TERM	REF.
I_c	collector current, rms value of alternating component	77/4.1.2
i_C	collector current, instantaneous total value	77/4.1.2
I_{CBO}	collector cutoff current, emitter open	77/4.1.2
$I_{CC(DR)}$	data retention supply current	99/2.3.3
I_{CCH}	supply current, high-level output	99/2.3.3
I_{CCL}	supply current, low-level output	99/2.3.3
I_{CEO}	collector cutoff current, base open	77/4.1.2
I_{CER}	collector cutoff current, resistance between base and emitter	77/4.1.2
I_{CES}	collector cutoff current, base short-circuited to emitter	77/4.1.2
I_{CES}	collector cutoff current, gate short-circuited to emitter	77/4.4.2
I_{CEV}	collector cutoff current, voltage between base and emitter	77/4.1.2
I_{CEX}	collector cutoff current, circuit between base and emitter	77/4.1.2
I_{CM}	peak collector current	77/4.4.2
I_D	drain current, dc or off-state current, dc value, no alternating component or standby current	77/4.3.2 77/6.1.2 77/7.2.2 77/7.1.2 77/7.2.2
i_D	off-state current, instantaneous total value	77/6.1.2
$I_{D(AV)}$	off-state current, mean value averaged over a full cycle	77/6.1.2
$I_{DD(DR)}$	data retention supply current	99/2.3.3
I_{DDH}	supply current, high-level output	99/2.3.3

SYMBOL	TERM	REF.
I_{DDL}	supply current, low-level output	99/2.3.3
I_{DM}	off-state current, maximum (peak) total value	77/6.1.2
$I_{D(off)}$	drain cutoff current	77/4.3.2
$I_{D(on)}$	on-state drain current	77/4.3.2
I_{DQM}	off-state recovery current	77/6.1.2
I_{DRM}	repetitive peak off-state current	77/6.1.2 77/7.2.2
$I_{D(RMS)}$	off-state current, total rms value	77/6.1.2
I_{DSS}	zero-gate-voltage drain current	77/4.3.2
I_E	emitter current, dc	77/4.1.2 77/4.4.2
I_e	emitter current, rms value of alternating component or radiant intensity	77/4.1.2 77/5.3.2
i_E	emitter current, instantaneous total value	77/4.1.2
I_{EBO}	emitter cutoff current, collector open	77/4.1.2
I_{EB2O}	emitter reverse current	77/4.2.2
$I_{EC(ofs)}$	emitter-collector offset current	77/4.1.2
I_{ECS}	emitter cutoff current, base short-circuited to collector	77/4.1.2
I_{EEH}	supply current, high-level output	99/2.3.3
I_{EEL}	supply current, low-level output	99/2.3.3
$I_{E1E2(off)}$	emitter cutoff current	77/4.1.2

SYMBOL	TERM	REF.
I_F	forward current, dc value, no alternating component	77/2.2 77/3.1.2 77/7.2.2
I_f	forward current, rms value of alternating component	77/3.1.2
i_F	forward current, instantaneous total value	77/3.1.2
$I_{F(AV)}$	forward current, mean value averaged over a full cycle	77/3.1.2
I_{FG}	forward gate current	77/6.1.2
I_{FGB}	on-state gate bias current	77/6.1.2
I_{FGsus}	sustaining gate current	77/6.1.2
i_{FGT}	turn-on gate current	77/6.1.2
I_{FGTM}	peak turn-on gate drive current	77/6.1.2
I_{FM}	forward current, maximum (peak) total value	77/3.1.2
$I_{FM(OV)}$	forward current, overload	77/3.1.2
I_{FRM}	forward current, repetitive peak	77/3.1.2
$I_{F(RMS)}$	forward current, total rms value	77/3.1.2
I_{FS}	forward surge current	77/7.1.2
I_{FSM}	forward current, surge peak	77/3.1.2
I_{FSnom}	full-scale (current), nominal	99/2.5.2.1
I_{FSR}	full-scale (current) range, (practical)	99/2.5.2.1
I_{FSRnom}	full-scale (current) range, nominal	99/2.5.2.1
I_{FSRpr}	full-scale (current) range, (practical)	99/2.5.2.1
I_{FS-}	full-scale (current), negative	99/2.5.2.1

SYMBOL	TERM	REF.
I_{FS+}	full-scale (current), positive	99/2.5.2.1
I_G	gate current, dc value, no alternating component	77/4.3.2 77/4.4.2 77/6.1.2
i_G	gate current, instantaneous total value	77/6.1.2
I_{GAO}	gate reverse current, cathode open	77/6.2.2
I_{GAS}	gate reverse current, cathode short circuited to anode	77/6.2.2
$I_{G(AV)}$	gate current, mean value averaged over a full cycle	77/6.1.2
I_{GD}	gate nontrigger current	77/6.1.2
I_{GESF}	forward gate current, collector short-circuited to emitter	77/4.4.2
I_{GESR}	reverse gate current, collector short-circuited to emitter	77/4.4.2
I_{GF}	forward gate current	77/4.3.2 77/4.4.2
I_{GKO}	gate reverse current, anode open	77/6.2.2
I_{GKS}	gate reverse current, anode short circuited to cathode	77/6.2.2
I_{GM}	gate current, maximum (peak) total value	77/6.1.2
I_{GQ}	gate turn-off current, dc value, no alternating component	77/6.1.2
i_{GQ}	gate turn-off current, instantaneous total value	77/6.1.2
I_{GQM}	gate turn-off current, maximum (peak) total value	77/6.1.2
I_{GR}	reverse gate current	77/4.3.2 77/4.4.2
I_{GSS}	reverse gate current, drain short circuited to source	77/4.3.2

SYMBOL	TERM	REF.
I_{GSSF}	forward gate current, drain short circuited to source	77/4.3.2
I_{GSSR}	reverse gate current, drain short circuited to source	77/4.3.2
I_{GT}	gate trigger current, dc value, no alternating component	77/6.1.2
i_{GT}	gate trigger current, instantaneous total value	77/6.1.2
I_{GTM}	gate trigger current, maximum (peak) total value	77/6.1.2
I_H	holding current, dc value, no alternating component or holding current	77/6.1.2 77/7.2.2
i_H	holding current, instantaneous total value	77/6.1.2
I_I	inflection-point current	77/3.3.2
I_{IB}	input bias current	99/2.4.6
I_{IH}	high-level input current	99/2.3.3
I_{IK}	input clamp current	99/2.2.4
I_{IL}	low-level input current	99/2.3.3
I_{IO}	dc input-to-output current; isolation current or input offset current	77/5.4.2 99/2.4.6
$I_{I(standby)}$	standby current	99/2.6.4
I_L	latching current, dc or limiting current or load current	77/6.1.2 77/3.5.2 99/2.6.4
i_L	latching current, instantaneous total value	77/6.1.2
I_{lkg}	leakage current	99/2.2.4

SYMBOL	TERM	REF.
$I_{L(sd)}$	shutdown current (also $I_{O(sd)}$)	99/2.6.4
I_m	rated peak single-pulse transient current	77/7.2.2
$Im(h_{ie})$	Use preferred symbol $h_{ie(imag)}$.	77/4.1.2
$Im(h_{oe})$	Use preferred symbol $h_{oe(imag)}$.	77/4.1.2
$Im(y_{fs})$	Use preferred symbol b_{fs} or $y_{fs(imag)}$.	77/4.3.2
$Im(y_{ie})$	Use preferred symbol $y_{ie(imag)}$.	77/4.1.2
$Im(y_{is})$	Use preferred symbol b_{is} or $y_{is(imag)}$.	77/4.3.2
$Im(y_{oe})$	Use preferred symbol $y_{oe(imag)}$.	77/4.1.2
$Im(y_{os})$	Use preferred symbol b_{os} or $y_{os(imag)}$.	77/4.3.2
$Im(y_{rs})$	Use preferred symbol b_{rs} or $y_{rs(imag)}$.	77/4.3.2
I_n	detector noise current or noise current, equivalent input	77/5.2.2 77/2.2
I_O	average rectified output current, 50-Hz or 60-Hz sinewave input, 180° conduction angle or output current	77/3.1.2 99/2.6.4
I_{off}	off-state current	99/2.2.4
I_{OH}	high-level output current	99/2.3.3
I_{OK}	output clamp current	99/2.2.4
I_{OL}	low-level output current	99/2.3.3
I_{OM}	maximum output current swing	99/2.4.6

SYMBOL	TERM	REF.
I_{OS}	short-circuit current limit	99/2.6.4
	or	
	short-circuit output current	99/2.3.3 99/2.4.6
$I_{O(sd)}$	shutdown current (also $I_{L(sd)}$)	99/2.6.4
$I_{(OV)}$	overload forward current (also $I_{FM(OV)}$)	77/3.1.2
I_{OZ}	high-impedance-state output current	99/2.3.3
I_P	peak-point current	77/3.3.2
		77/4.2.2
		77/6.2.2
I_{PP}	peak impulse current	77/7.1.2
I_R	reverse current, dc value, no alternating component	77/2.2
		77/3.1.2
		77/6.1.2
I_r	reverse current, rms value of alternating component	77/3.1.2
i_R	reverse current, instantaneous total value	77/3.1.2
		77/6.1.2
$I_{R(AV)}$	reverse current, mean value averaged over a full cycle	77/3.1.2
		77/6.1.2
I_{RC}	reverse-conducting current, dc value, no alternating component	77/6.1.2
i_{RC}	reverse-conducting current, instantaneous total value	77/6.1.2
$I_{RC(AV)}$	reverse-conducting current, mean value averaged over a full cycle	77/6.1.2
I_{RCM}	reverse-conducting current, maximum (peak) total value	77/6.1.2
$I_{RCM(OV)}$	overload reverse-conducting current, maximum (peak) total value	77/6.1.2