



# 2020 Products Catalog

## Korea

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### R&D Center

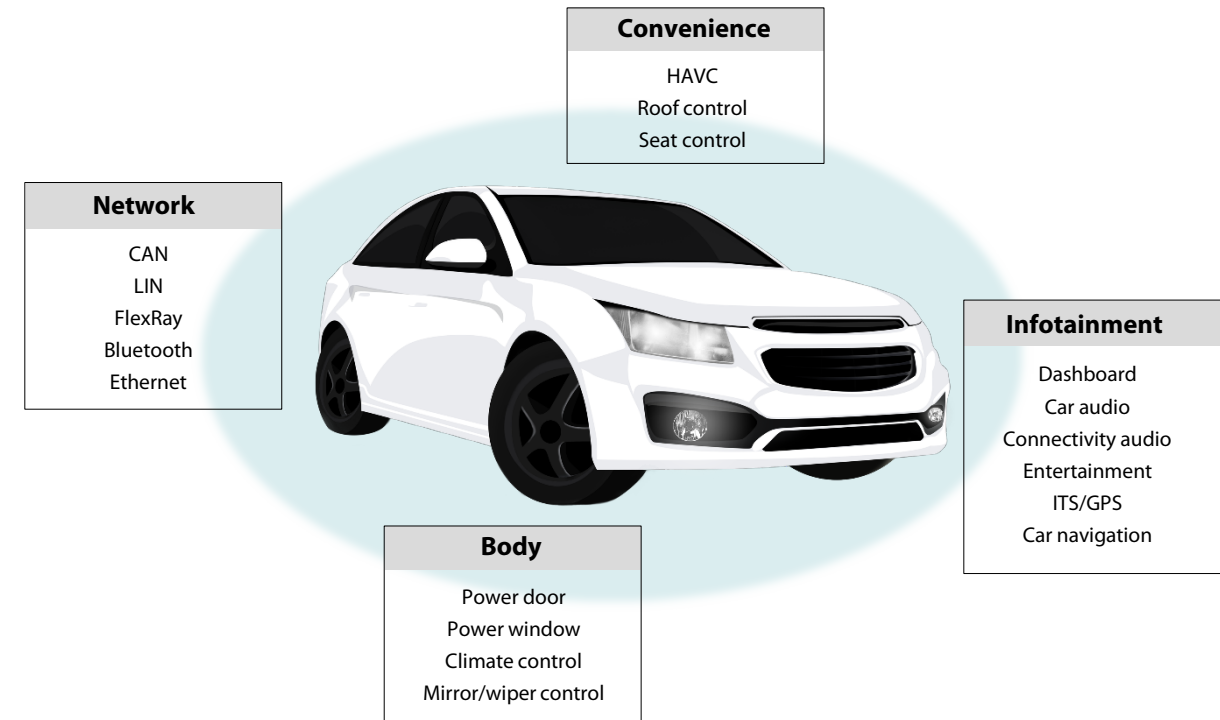
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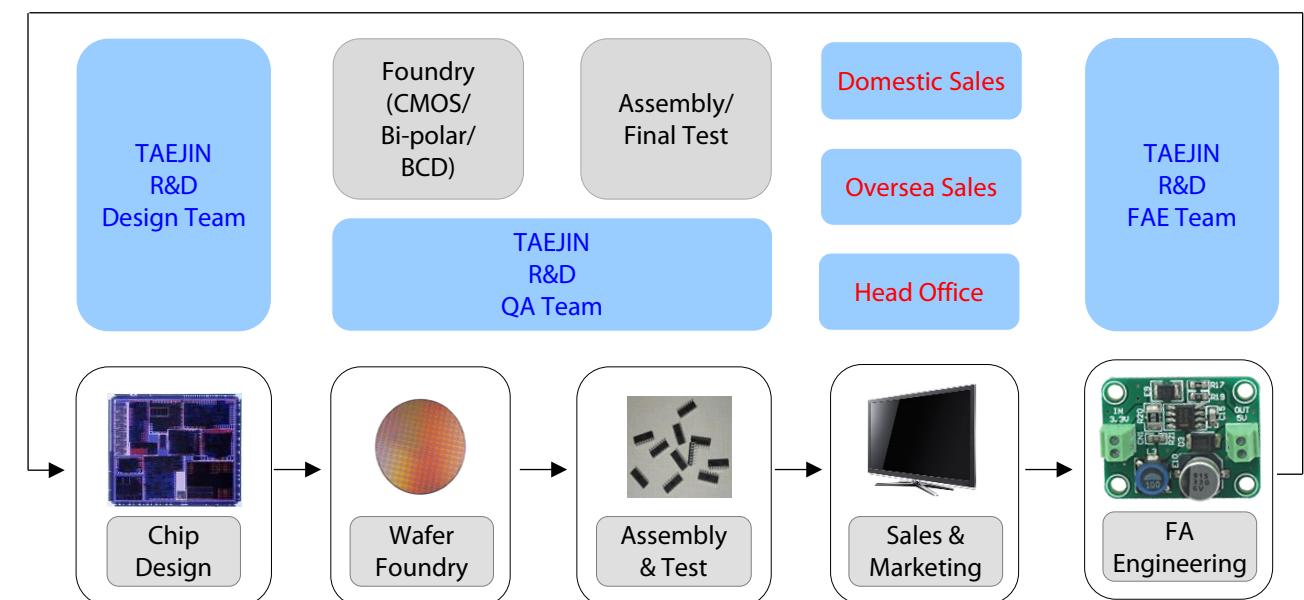
## MILESTONES

- 2000. May. - TAEJIN Technology founded and started producing voltage regulator ICs
- 2002. Dec. - ISO 9001 certified
- 2003. Sep. - Designated as "Korea Venture Company"
- 2006. Jul. - "INNO-BIZ certification" (Grade : Aa) acquired
- 2006. Sep. - Designated as "Specialized Components & Materials Company" by Korean Ministry of Commerce, Industry, and Energy
- 2006. Nov. - Awarded the "USD 5 millions in export"
- 2007. Jun. - Participated Korean Gov.'s "Enterprise for Developing Technology of Component & Materials"
- 2007. Nov. - ISO14001 certified
- 2009. May. - Applied for international PCT patent (PCT/KR2009/2454)
- 2009. Oct. - Registered two local patents of ULDO Voltage Regulator IC in USA
- 2010. Jun. - Designated as "Technological Innovation Company" by Korean Ministry of Knowledge Economy
- 2010. Nov. - Awarded the "USD 10 millions in export"
- 2010. Dec. - Registered a local patent of ULDO Voltage Regulator IC in JAPAN
- 2010. Dec. - Registered two local patents of ULDO Voltage Regulator IC in CHINA
- 2011. Aug. - "Green Certification" acquired
- 2014. Jan. - Registered domestic patents(27 items), Applied domestic patents(4 items)
- 2014. Jan. - Registered international patents(7 items), Applied international patents(5 items)
- 2014. Mar. - Developed the customized Power IC TJ2132
- 2015. Mar. - Developed the customized Power Distribution Switch TJ2242
- 2015. Jun. - Developed the High Voltage(Vin 60V) DC-DC Converter for Automotive
- 2015. Oct. - Selected as Technological Innovation Company by the Small & Medium Business Administration
- 2016. Mar. - Developed the customized Power IC Independent Control Multi-channel ULDO
- 2017. Jul. - "AEC-Q100" qualified
- 2018. Jul. - Developed Dual Channel ULDO IC LM2C1117
- 2018. Jul. - Developed Low Voltage Conversion High Current ULDO IC TJ2134

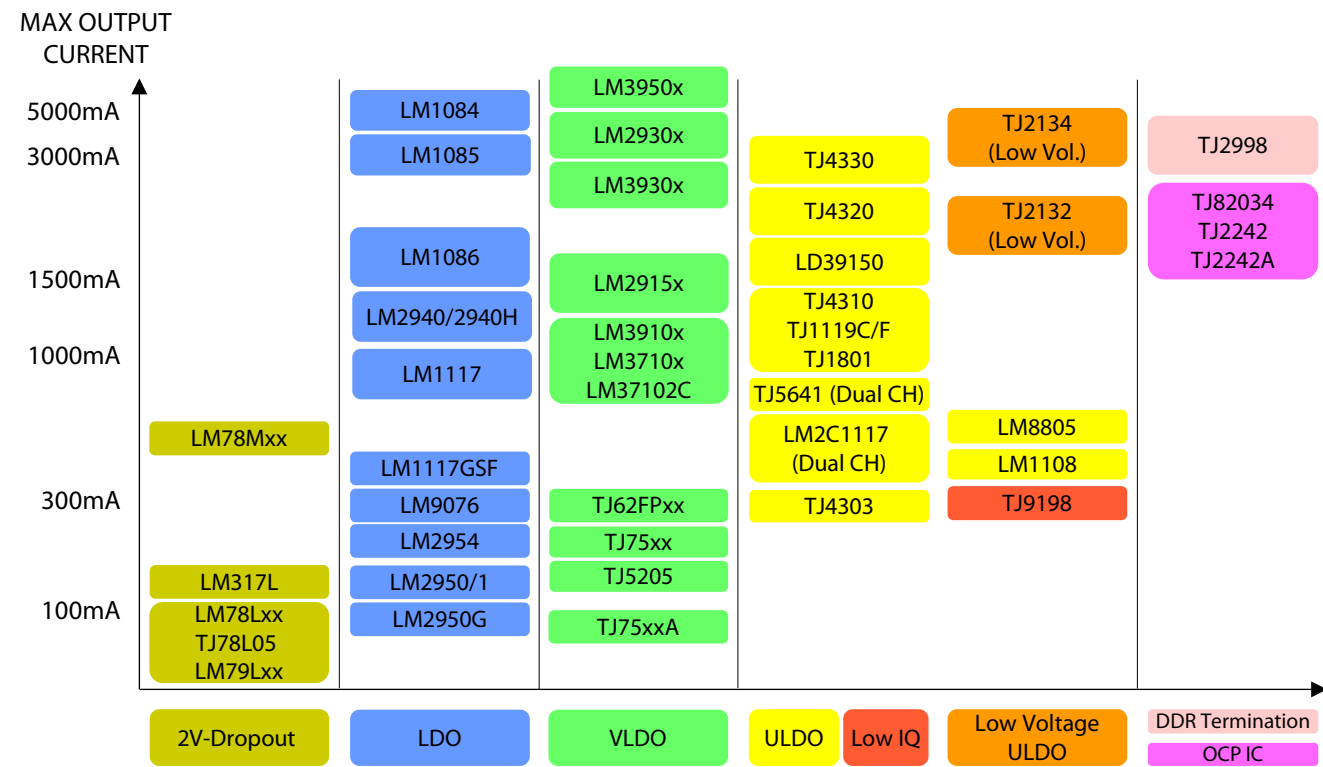
## AUTOMOTIVE APPLICATIONS



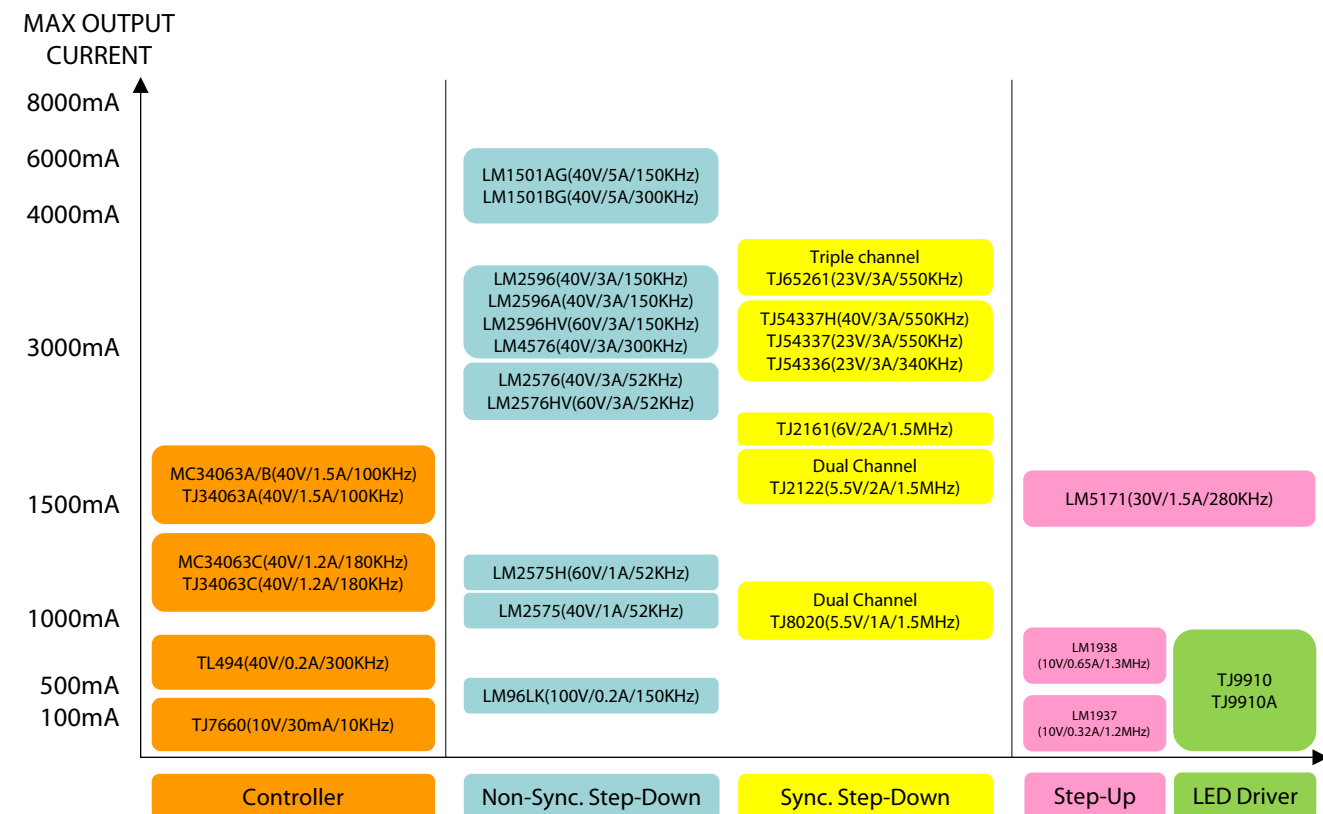
## PRODUCTION PROCEDURE



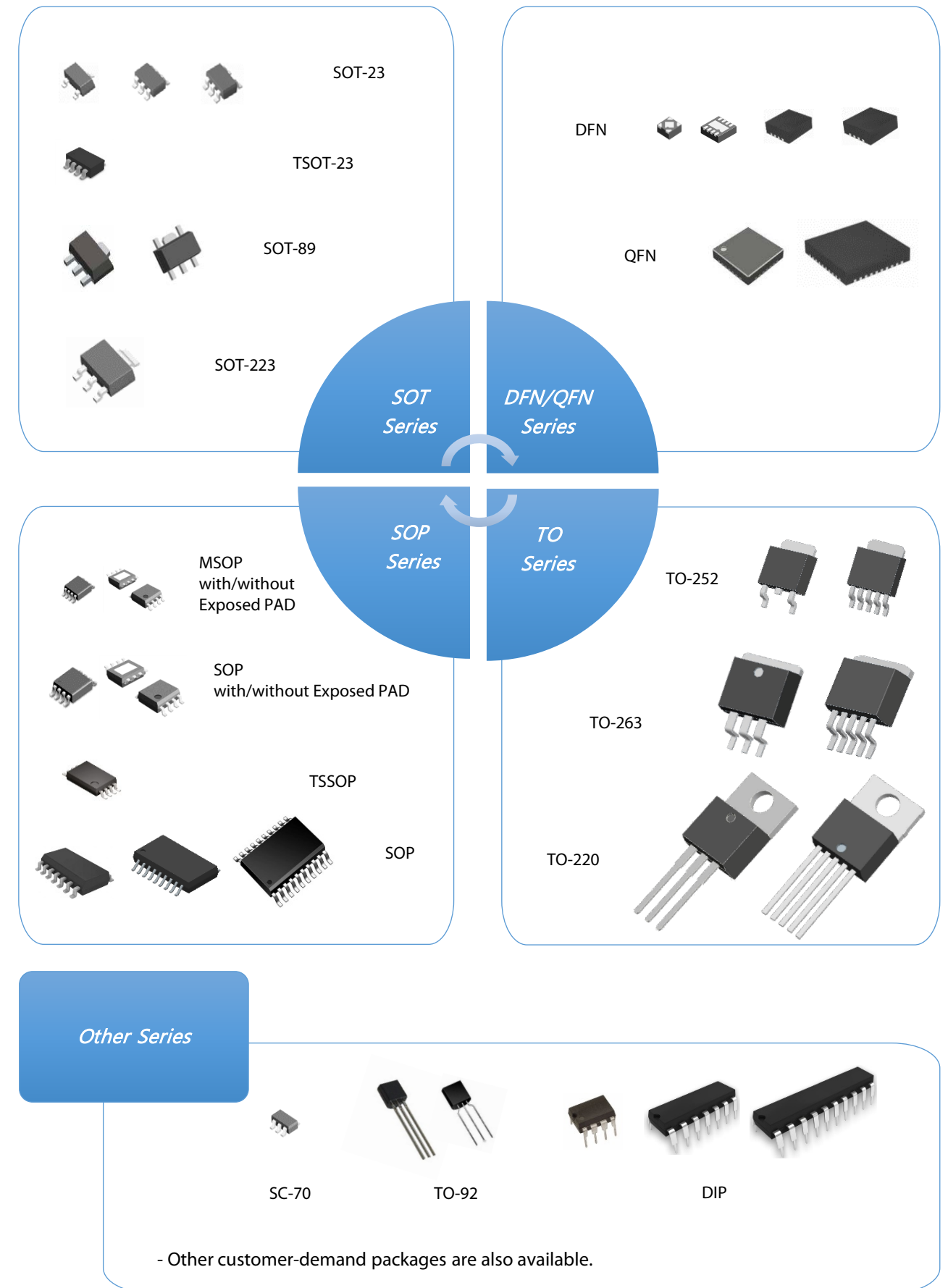
# LINEAR REGULATORS



# SWITCHING REGULATORS



# POPULAR PACKAGES



## DOMESTIC REGISTERED PATENTS (KOREA)

- 10-0442936 : Regulator circuit for generating of stability voltage
- 10-0456194 : Regulator circuit for generating of stability voltage
- 10-0523799 : Regulator circuit for generating of stability voltage
- 10-0617966 : Switching control regulator circuit for generating of stability voltage
- 10-0665454 : Switching control regulator circuit for generating of stability voltage
- 10-0813200 : Regulator circuit for generating of stability voltage
- 10-0836529 : Regulator circuit for generating of stability voltage
- 10-0900266 : Overheat protection circuit of a regulator
- 10-0900267 : Sub-1V output Voltage regulator of ultra low dropout type
- 10-0902084 : Voltage regulator and fabrication method there of
- 10-0930275 : Band Gap Reference Using CMOS
- 10-1184994 : Fusing circuit
- 10-1247219 : Current limit circuit
- 10-1268314 : Waveform generator
- 10-1299212 : LED Switching Driver
- 10-1301260 : Soft Start Circuit
- 10-1306865 : High Voltage IC
- 10-1306866 : Circuit for Preventing a Miss-operating by Reverse Current Detector
- 10-1319827 : Current Limit Apparatus
- 10-1414712 : DC-DC Converter System
- 10-1447189 : Level Shifter
- 10-1453005 : Apparatus for Driving Light Emitting Diode
- 10-1453003 : DC-DC Converter
- 10-1461066 : Current Control Signal Generator
- 10-1475740 : Waveform Generator
- 10-1532241 : Waveform Generator
- 10-1630600 : Voltage regulator having overcurrent protection circuit
- 10-1741170 : Voltage regulator having overcurrent protection circuit
- 10-1696403 : Soft Start Circuit of Switching Regulator
- 10-1773814 : Reverse Current Protection Circuit of Switch Device

## INTERNATIONAL REGISTERED PATENTS

- USA
- US 7,629,783 B2 : Ultra Low Dropout Voltage Regulator
  - US 7,999,525 B2 : Voltage Regulator and Method of Manufacturing the Same

- CHINA
- 705345 : 超低压降型电压调节器
  - 1049457 : 电压调节器其制造方法

- TAIWAN
- 381264 : Voltage Regulator and Method of Manufacturing the Same
  - 373699 : Ultra Low Dropout Voltage Regulator

- JAPAN
- 2007301057 : 超低压降下型電圧レギュレーター

## APPLICATION SPECIFIC CUSTOM IC

### Proven Primitive IPs

- \* Bandgap Reference – CMOS BGR/ High PSRR CMOS BGR/ Low Voltage CMOS BGR
- \* Low Input Voltage Reference Generator
- \* Ramp Generator/ Multiple Ramp Generator with Adjustable Phase Shift
- \* Current Limiter – Constant Current Limiter/ Foldback Current Limiter/ Cycle by Cycle Current Limiter
- \* Reverse Current Protection for DC-DC Converter/ Power Switch
- \* Internal Fixed Soft Start/ Programmable Soft Start with External Capacitor
- \* Under Voltage Lock Out with/without Deglitch
- \* Over Temperature Protection/ Short Circuit Protection
- \* Power Good Monitor with/without Deglitch
- \* Adjustable Oscillator/ Clock Generator/ Ramp Generator/ Multi-Ramp Generator with Phase shift
- \* Bootstrap using MOS Switch for High Side NMOS Switch for DC-DC Converter
- \* Other Primitives as 2-Stage AMPs/Folded Cascode AMPs/High Speed Comparators/ etc.

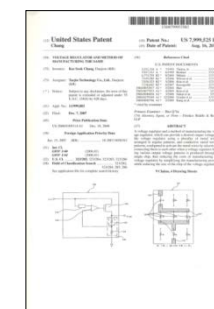
### Field of Development

- \* Linear Regulator with Special Functions (Soft Start, Power Good, Remote Load Sense, UVLO, etc.)
- \* Multi Channel Linear Regulators with Special Functions
- \* DC-DC Converters with Special Functions (Soft Start, Power Good, UVLO with/without Deglitch, etc.)
- \* Multi Channel DC-DC Converters with Special Functions
- \* Power Distribution Switches/ Multi Channel Power Management ICs
- \* Pure Analog or Power ICs

## INTERNATIONAL PATENTS



KOREA Patent



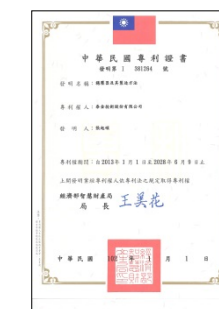
US Patent



JAPAN Patent

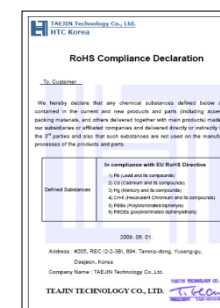


CHINA Patent

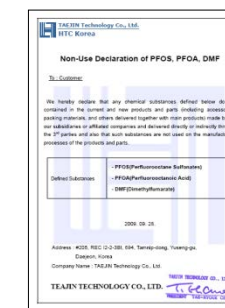


TAIWAN Patent

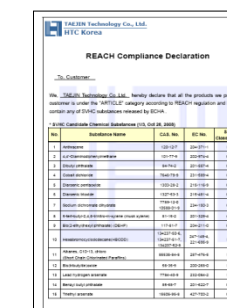
## ENVIRONMENTAL DECLARATIONS



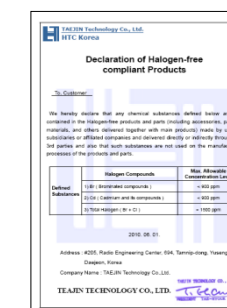
RoHS Compliance



Non-use of PFOS,PFOA,DMF



REACH Compliance



Halogen-free  
(only for Green Items)

## PRODUCT INDEX

## Non-Synchronous DC/DC Converter (Step-Down Switching Regulator)

LM96LK	0.2A Step-Down Voltage Regulator (150KHz)	SOP-8PP
LM2575	1.0A Step-Down Voltage Regulator (52KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2575HV	1.0A Step-Down Voltage Regulator (52KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2576	3.0A Step-Down Voltage Regulator (52KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2576HV	3.0A Step-Down Voltage Regulator (52KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2596	3.0A Step-Down Voltage Regulator (150KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2596HV	3.0A Step-Down Voltage Regulator (150KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM4576	3.0A Step-Down Voltage Regulator (300KHz)	SOP-8PP/ TO-263-5L/ TO-220-5L
LM1501AG	5.0A Step-Down Voltage Regulator (150KHz)	TO-263-5L/ TO-220-5L
LM1501BG	5.0A Step-Down Voltage Regulator (300KHz)	TO-263-5L/ TO-220-5L

## Step-Up DC/DC Converter (Step-Up Switching Voltage Regulator)

LM1937	0.32A Step-Up Switching Voltage Regulator (1.2MHz)	SOT-23-5L
LM1938	0.65A Step-Up Switching Voltage Regulator (1.3MHz)	SOT-23-6L
LM5171	1.5A Step-Up Switching Voltage Regulator (280KHz)	SOP-8

## Converter &amp; Controller

TJ9910	Universal High Brightness LED Driver	SOP-8
TJ9910A	Universal High Brightness LED Driver	SOP-8
TJ33120	High Voltage LED – 120mA Driver with Internal MOSFET	SOP-8
MC34063A/B	1.5A Step-Up/Down (Inverting) Converter Controller	SOP-8/ DIP-8
MC34063AH	1.5A Step-Up/Down (Inverting) Converter Controller	SOP-8/ DIP-8
TJ34063A	1.5A Step-Up/Down (Inverting) Converter Controller	SOP-8
MC34063C	1.2A Step-Up/Down (Inverting) Converter Controller	SOP-8/ DIP-8
TJ34063C	1.2A Step-Up/Down (Inverting) Converter Controller	SOP-8
LM3842/3	Current Mode PWM Controller	SOP-8/ DIP-8
TL494	Pulse-Width-Modulation Controller	SOP-16/ DIP-16
TJ7660	Charge Pump Voltage Converter	SOP-8/ DIP-8
LM7660	Charge Pump Voltage Converter	DIP-8
TJ1051	Constant Voltage & Current Controller (Op-Amp + V <sub>REF</sub> )	SOP-8/ SOT-23-6L

## Amplifier &amp; Comparator

LM358	Dual Operational Amplifier	DIP-8
TJ358	Dual Operational Amplifier	SOP-8/ TSSOP-8
LM2904	Dual Operational Amplifier	SOP-8/ DIP-8
LM4558	Low Noise Dual Operational Amplifier	SOP-8/ DIP-8
TJ324	Quad Operational Amplifier	SOP-14
LM324	Quad Operational Amplifier	DIP-14
LM2902	Quad Operational Amplifier	SOP-14
OP07	Low Offset Precision Operational Amplifier	SOP-8/ DIP-8
TJ393	Dual Voltage Comparator	SOP-8
LM393	Dual Voltage Comparator	DIP-8
TJ339	Quad Voltage Comparator	SOP-14
LM339	Quad Voltage Comparator	DIP-14
LM386	Low Voltage Audio Power Amplifier	SOP-8/ DIP-8

## DDR Memory Termination Regulator (Sink/ Source Linear Regulator)

TJ2998	DDR Memory Termination Voltage Regulator (MLCC Applicable)	SOP-8/ SOP-8PP
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## OCP IC

TJ2242	Single Adjustable Current Limit USB Power Switch	SOT-23-6L
TJ2242A	Single Adjustable Current Limit USB Power Switch	SOT-23-6L
TJ82034	2.5A Current Limit USB Power Switch	SOP-8

## Interface IC

TJ232	RS-232 Transceiver	SOP-16
MAX232	RS-232 Transceiver	DIP-16
TJ3232	RS-232 Transceiver	SOP-16
TJ485E	RS-485/RS-422 Transceiver	SOP-8
MAX485E	RS-485/RS-422 Transceiver	SOP-8/ DIP-8
TJ3485E	RS-485/RS-422 Transceiver	SOP-8/ DIP-8
MAX3485E	RS-485/RS-422 Transceiver	SOP-8/ DIP-8

## Driver

ULN2003A	Darlington 7-Digit Transistor Arrays	SOP-16/ DIP-16
ULN2003	Darlington 7-Digit Transistor Arrays	SOP-16/ DIP-16
ULN2004A	Darlington 7-Digit Transistor Arrays	SOP-16/ DIP-16
ULN2803A	Darlington 8-Digit Transistor Arrays	SOP-18/ DIP-18
CS8190	Precision Air-Core Tach/Speedo Driver with Return to Zero	DIP-16
L293D	Quadruple Half-H Driver	DIP-16

## Logic IC

74HC00	Quad 2 Input NAND	SOP-14/ DIP-14
74HC04	Hex Inverters	SOP-14/ DIP-14
74HC14	Hex Schmitt Trigger Inverters	SOP-14/ DIP-14
74HC595	8-bit Serial-In, Serial or Parallel Out Shift register with output latches	TSSOP-16/ SOP-16/ DIP-16

## PRODUCT INDEX

## CMOS ULDO (Ultra Low Drop Out) Voltage Regulator (Low ESR MLCC Applicable)

TJ9198	300mA Low Input Low Output, Low Quiescent CMOS LDO	DFN1x1-4/ SC-70-5L/ SOT-23-3/-5L
TJ4303	300mA ULDO Voltage Regulator	SOT-23-5L
LM1108	300mA CMOS LDO Regulator	SOT-23-3L/ SOT-89-3L
LM8805	600mA CMOS LDO Regulator	SOT-23-5L/ SOT-89-3L
LM2C1117	600mA Dual Channel ULDO Voltage Regulator	SOP-8PP
TJ5641	600mA Dual Channel ULDO Voltage Regulator	SOP-8PP
TJ1119C/F	1.0A ULDO Fixed Output Voltage Regulator	SOT-223-3L/ TO-252-3L
TJ1801	1.0A ULDO Voltage Regulator	SOP-8PP
TJ4310	1.0A ULDO Voltage Regulator	SOP-8/-8PP/ SOT-89-5L/ DFN2x3-8
LD39150	1.5A ULDO Voltage Regulator	TO-252-5
TJ2132	Sub-1V Output Low Vin 2.0A ULDO Voltage Regulator	SOP-8PP/ DFN3x3-8
TJ4320	2.0A ULDO Voltage Regulator	SOP-8PP/ TO-252-5L
TJ4330	3.0A ULDO Voltage Regulator	SOP-8PP/ TO-252-5L
TPS7A7002	3.0A ULDO Voltage Regulator	SOP-8PP
TJ2134/A	Sub-1V Output Low Vin 4.0A ULDO Voltage Regulator	SOP-8PP

## VLDO (Very Low Drop Out) Voltage Regulator

TJ75xxA	100mA CMOS Low Dropout Regulator	SOT-89-3L/ SOT-23-5L
LM2950/1	100mA LDO Voltage Regulator	TO-92/ SOP-8
LM2950G	100mA LDO Voltage Regulator	TO-92/ SC-70-5L
TJ5205	150mA Low Noise & High PSRR LDO Regulator	SOT-23-5L/ SOP-8/ SOP-8PP
LM9076	150mA Low IQ LDO with Delayed Reset Output	SOP-8/ TO-263-5L
TJ62FPxx	250mA Low Dropout Voltage Regulator	SOT-23-3L/ SOT-89-3L
TJ75xx	250mA CMOS Low Dropout Regulator	TO-92/ SOT-89-3L
LM2954	250mA LDO Voltage Regulator	TO-92/ TSOP-8/ TO-263/ TO-220
LM2940	1.0A LDO Regulator	SOT-223/ TO-220
LM2940H	1.0A High-Voltage LDO Regulator	SOP-8/ SOT-223/ TO-263
LM3710x	1.0A High-Voltage Very Low-Dropout Voltage Regulator	SOP-8/ TO-252/ SOT-223
LM37102C	1.0A High-Voltage Very Low-Dropout Voltage Regulator (MLCC)	SOP-8/ SOP-8PP
LM3910x	1.0A High-Voltage Very Low-Dropout Voltage Regulator	SOT-223/ SOP-8/ TO-252
LM2915x	1.5A High-Voltage Very Low-Dropout Voltage Regulator	TO-252/ TO-263/ TO-220
LM3930x	3.0A High-Voltage Very Low-Dropout Voltage Regulator	TO-263/ TO-220
LM2930x	3.0A High-Voltage Very Low-Dropout Voltage Regulator	TO-263/ TO-220
LM39502	5.0A High-Voltage Very Low-Dropout Voltage Regulator	TO-263/ TO-220

## LDO (Low Drop Out) Voltage Regulator

LM1117	1.0A LDO Fixed & Adjustable Voltage Regulator	SOT-89-3L/ SOT-223/ TO-252
LM1117G	1.0A LDO Fixed & Adjustable Voltage Regulator	SOT-23/ SOT-223
LM1086	1.5A LDO Fixed & Adjustable Voltage Regulator	TO-252/ TO-263
LM1085	3.0A LDO Fixed & Adjustable Voltage Regulator	TO-252/ TO-263
LM1084	5.0A LDO Fixed & Adjustable Voltage Regulator	TO-252/ TO-263

## Standard Linear Voltage Regulator

LM78Lxx	100mA Positive Fixed Voltage Regulator (5V~24V)	TO-92/ SOT-89-3L/ SOP-8
TJ78L05	100mA Positive Fixed Voltage Regulator (5V, MLCC Applicable)	SOT-89-3L
LM79Lxx	100mA Negative Fixed Voltage Regulator (-5V~-24V)	TO-92/ SOT-89-3L
LM317Lx	100mA Adjustable Voltage Regulator	TO-92/ SOT-89-3L/ SOP-8
LM78Mxx	500mA Positive Voltage Regulator (5V/15V)	TO-252-3L

## Voltage Reference

TL431/A/C	Programmable Precision Shunt Regulator(2.495V)	TO-92/ SOT-23-3L/ SOT-89-3L
TJ431/A/C	Programmable Precision Shunt Regulator(2.495V)	TO-92/ SOT-23-3L
LP431/A/C	Low IKA Programmable Precision Shunt Regulator(2.500V)	SOT-23-3L
LM431/A	Programmable Precision Shunt Regulator(2.500V)	SOT-23-3L (Reverse Type)
TJR431/A/C	Programmable Precision Shunt Regulator(2.495V)	SOT-23-3L (Reverse Type)
LPR431/A/C	Low IKA Programmable Precision Shunt Regulator(2.500V)	SOT-23-3L (Reverse Type)
TL432/A/C	Programmable Precision Shunt Regulator(1.240V)	TO-92/ SOT-23-3L/ SOT-89-3L
LM336	Programmable Shunt Regulator	TO-92/ SOP-8
LM385	Micropower Voltage Reference	TO-92/ SOP-8

## Timer

NE555	CMOS General Purpose Timer	SOP-8/ DIP-8
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## Others

DS1232	Micro-Monitor	SOP-8/ DIP-8
MC34118	Voice Switched Speakerphone Circuit	SOP-28
LM335	Precision Temperature Sensor	TO-92/ SOP-8

: Products Under Development

**PRODUCTS**

Non-Synchronous DC/DC Converter (Step-Down Switching Regulator)

Device Name	V <sub>OUT</sub> [V]	V <sub>FB</sub> [V]	V <sub>IN_MAX</sub> [V]	I <sub>OUT_MAX</sub> [A]	F <sub>SW</sub> [KHz]	PKG
LM96LK	ADJ	1.230	100	0.2	150	SOP-8PP
LM2575	ADJ/ 3.3/ 5.0/ 12	1.230	40	1.0	52	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2575HV	ADJ/ 3.3/ 5.0/ 12	1.230	60	1.0	52	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2576	ADJ/ 3.3/ 5.0/ 12/ 15	1.230	40	3.0	52	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2576HV	ADJ/ 3.3/ 5.0/ 12/ 15	1.230	60	3.0	52	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2596	ADJ/ 3.3/ 5.0/ 12/ 15	1.230	40	3.0	150	SOP-8PP/ TO-263-5L/ TO-220-5L
LM2596HV	ADJ/ 3.3/ 5.0/ 12/ 15	1.230	60	3.0	150	SOP-8PP/ TO-263-5L/ TO-220-5L
LM4576	ADJ/ 3.3/ 5.0/ 12/ 15	1.230	40	3.0	300	SOP-8PP/ TO-263-5L/ TO-220-5L
LM1501AG	ADJ/ 3.3/ 5.0/ 12	1.230	40	5.0	150	TO-263-5L/ TO-220-5L
LM1501BG	ADJ/ 3.3/ 5.0/ 12	1.230	40	5.0	300	TO-263-5L/ TO-220-5L

Step-Up Switching Voltage Regulator

Device Name	V <sub>IN</sub> [V]	I <sub>SW</sub> [A]	V <sub>SW_MAX</sub> [V]	I <sub>CC</sub> [μA]	F <sub>SW</sub> [KHz]	PKG
LM1937	2.5 ~ 10	0.32	36 (Absolute)	0.1 (Shut-down) 1900 (Operating)	1200	SOT-23-5L
LM1938	2.5 ~ 10	0.65	36 (Absolute)	0.1 (Shut-down) 2100 (Operating)	1300	SOT-23-6L
LM5171	2.7 ~ 30	1.50	40 (Absolute)	12 (Shut-down) 5500 (Operating)	280	SOP-8

**PRODUCTS**

CMOS ULDO Voltage Regulator (Low ESR MLCC Applicable)

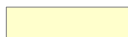
Device Name	V <sub>OUT</sub> [V]	V <sub>REF</sub> [V]	V <sub>IN_MIN</sub> [V]	V <sub>IN_MAX</sub> [V]	I <sub>OUT_MAX</sub> [A]	V <sub>DROP_TYP</sub> [V]	I <sub>Q_TYP</sub> [mA]	PKG
TJ9198 (EN)	0.8 ~ 3.6	Fixed	2.2	5.5	0.3	0.20 (@I <sub>LOAD</sub> =0.3A)	0.035	DFN1x1-4/ SC-70-5L/ SOT-23-3L/ 5L
TJ4303 (EN)	ADJ	0.6	2.5	6.0	0.3	0.20 (@I <sub>LOAD</sub> =0.3A)	0.10	SOT-23-5L
LM1108	1.5 ~ 5.0	Fixed	2.5	6.5	0.3	0.3 ~ 0.6 (@I <sub>LOAD</sub> =0.3A)	0.015	SOT-23-3L/ SOT-89-3L
LM8805 (EN)	ADJ/ 1.5 ~ 6.0	1.27	2.5	6.5	0.6	0.6 ~ 1.3 (@I <sub>LOAD</sub> =0.6A)	0.050	SOT-23-5L/ SOT-89-3L
LM2C1117 (Dual CH)	1.0 ~ 3.6	Fixed	2.5	5.5	CH1 : 0.6 CH2 : 0.6	0.24 (@I <sub>LOAD</sub> =0.6A)	0.14	SOP-8PP
TJ5641 (Dual CH)	1.0 ~ 3.3	Fixed	2.5	5.5	CH1 : 0.6 CH2 : 0.6	0.24 (@I <sub>LOAD</sub> =0.6A)	0.14	SOP-8PP
TJ1119C/F	1.0/ 1.2/ 1.5/ 1.8/ 2.5/ 2.8/ 3.3	Fixed	2.5	5.5	1.0	0.40 (@I <sub>LOAD</sub> =1.0A)	0.13	SOT-223-3L/ TO-252-3L
TJ1801 (EN/ PG/ SS)	ADJ	0.6	1.6	5.5	1.0	0.25 ~ 0.6 (@I <sub>LOAD</sub> =1.0A)	0.15	SOP-8PP
TJ4310 (EN/ PG/ SS)	ADJ	0.6	2.5	5.5	1.0	0.35 (@I <sub>LOAD</sub> =1.0A)	0.15	SOP-8PP/ SOT-89-5L/ DFN2x3-8
LD39150	ADJ	0.6	2.5	5.5	1.5	0.28 (@I <sub>LOAD</sub> =1.5A)	0.20	TO-252-5L
TJ2132 (EN/ PG/ SS)	ADJ	0.6	1.1	3.6	2.0	0.25 (@I <sub>LOAD</sub> =2.0A)	0.10	SOP-8PP/ DFN3x3-8
TJ4320 (EN/ PG/ SS)	ADJ	0.6	2.5	5.5	2.0	0.40 (@I <sub>LOAD</sub> =2.0A)	0.20	SOP-8PP/ TO-252-5L
TJ4330 (EN/ PG/ SS)	ADJ	0.6	2.5	5.5	3.0	0.40 (@I <sub>LOAD</sub> =3.0A)	0.20	SOP-8PP/ TO-252-5L
TP57A7002 (EN)	ADJ	0.6	2.5	5.5	3.0	0.40 (@I <sub>LOAD</sub> =3.0A)	0.20	SOP-8PP
TJ2134 (EN)	ADJ	0.8	1.3	3.6	4.0	0.24 (@I <sub>LOAD</sub> =4.0A)	0.15	SOP-8PP
TJ2134A (EN/ PG/ SS)	ADJ	0.8	1.3	3.6	4.0	0.24 (@I <sub>LOAD</sub> =4.0A)	0.15	SOP-8PP

OCP IC

Device Name	Channel	Enable Control	V <sub>IN</sub> [V]	I <sub>CC</sub> [μA]	I <sub>CON_MAX</sub> [A]	I <sub>LIMIT</sub> [A]	R <sub>DS_ON</sub> [mΩ]	PKG
TJ2242	Single	High	2.8 ~ 5.5	130	1.5	ADJ (0.2 ~ 2.25)	100	SOT-23-6L
TJ2242A	Single	High	2.8 ~ 5.5	90	1.5	ADJ (0.2 ~ 2.25)	100	SOT-23-6L
TJ82034	Single	High	2.8 ~ 5.5	80	1.5	2.5	70	SOP-8

Sink/ Source Linear Regulator

Device Name	Standards	A <sub>VIN</sub> [V]	P <sub>VIN</sub> [V]	V <sub>DDQ</sub> [V]	V <sub>OUT</sub> [V]	I <sub>SINK &amp; I<sub>SOURCE</sub></sub> [A]	PKG
TJ2998	DDR-II/III/IV	3.0 ~ 5.5	0 ~ 2.0	1.2 ~ 1.8	VTT/ VREF	2.0 (Cont.) 3.0 (Peak)	SOP-8/ SOP-8PP

 : Products Under Development

# PRODUCTS

## VLDO (Very Low Drop Out) Voltage Regulator

Device Name	V <sub>OUT</sub> [V]	V <sub>REF</sub> [V]	V <sub>IN_MIN</sub> [V]	V <sub>IN_MAX</sub> [V]	I <sub>OUT_MAX</sub> [A]	V <sub>DROP_TYP</sub> [V]	I <sub>Q_TYP</sub> [mA]	PKG
TJ75xxA	3.3/ 5.0	Fixed	2.7	30	0.1	0.60 (@I <sub>LOAD</sub> =50mA)	0.001	SOT-23-5L / SOT-89-3L
LM2950/1	3.3/ 5.0	Fixed	4.3	30 (Absolute)	0.1	0.38 (@I <sub>LOAD</sub> =0.1A)	0.075	TO-92/SOP-8
LM2950G	3.3/ 5.0	Fixed	4.3	30	0.1	0.38 (@I <sub>LOAD</sub> =0.1A)	0.075	TO-92/SC-70-5L
TJ5205 (EN/ Bypass)	ADJ/ 2.0~8.5	1.242	2.5	16	0.15	0.165 (@I <sub>LOAD</sub> =0.15A)	0.120	SOT-23-5L/ SOP-8/ SOP-8PP
LM9076 (EN/ RESET)	3.3/ 5.0	Fixed	5.35	40	0.15	0.15 (@I <sub>LOAD</sub> =0.15A)	0.025	SOP-8/ TO-263-5L
TJ62FPxx	2.8/ 3.0/ 3.3	Fixed	2.5	10	0.25	0.40 (@I <sub>LOAD</sub> =0.16A)	0.001	SOT-23-3L/ SOT-89-3L
TJ75xx	3.3/ 5.0	Fixed	2.7	20	0.25	0.40 (@I <sub>LOAD</sub> =0.16A)	0.001	TO-92/ SOT-89-3L
LM2954	ADJ/ 5.0	1.23	6.0	30 (Absolute)	0.25	0.47 (@I <sub>LOAD</sub> =0.25A)	0.090	TO-92/ SOP-8/ TO-263-3L/ TO-220-3L
LM2940	3.3/ 5.0	Fixed	4.3	30 (Absolute)	1.0	0.40 (@I <sub>LOAD</sub> =1.0A)	1.0	SOT-223-3L/ TO-220-3L
LM2940H	ADJ/ 3.3/ 5.0	1.24	4.3	60 (Absolute)	1.0	0.40 (@I <sub>LOAD</sub> =1.0A)	1.0	TO-263/ TO-220
LM3710x (EN/ Flag)	ADJ/ 2.5/ 5.0	1.24	2.25	16	1.0	0.47 (@I <sub>LOAD</sub> =1.0A)	0.70	SOT-223-3L/ SOP-8/ TO-252-5L
LM37102C (EN)	ADJ	1.24	2.5	16	1.0	0.50 (@I <sub>LOAD</sub> =1.0A)	3.8	SOP-8/ SOP-8PP
LM3910x (EN/ Flag)	ADJ/ 3.3/ 5.0	1.24	2.25	16	1.0	0.41 (@I <sub>LOAD</sub> =1.0A)	0.70	SOP-8/ SOT-223-3L/ TO-252
LM2915x (EN/ Flag)	ADJ/ 1.8/ 2.5/ 3.3/ 5.0/ 12	1.24	2.25	26	1.5	0.35 (@I <sub>LOAD</sub> =1.5A)	8	TO-252/ TO-263/ TO-220
LM3930x (EN/ Flag)	ADJ/ 1.8/ 2.5/ 3.3/ 5.0	1.25	2.25	16	3.0	0.40 (@I <sub>LOAD</sub> =3.0A)	10	TO-263/ TO-220
LM2930x (EN/ Flag)	ADJ/ 1.8/ 2.5/ 3.3/ 5.0/ 12	1.24	2.30	26	3.0	0.37 (@I <sub>LOAD</sub> =3.0A)	10	TO-263/ TO-220
LM39502 (EN)	ADJ	1.25	2.25	16	5.0	0.40 (@I <sub>LOAD</sub> =5.0A)	15	TO-263/ TO-220

## LDO (Low Drop Out) Voltage Regulator

Device Name	V <sub>OUT</sub> [V]	V <sub>REF</sub> [V]	V <sub>IN_MIN</sub> [V]	V <sub>IN_MAX</sub> [V]	I <sub>OUT_MAX</sub> [A]	V <sub>DROP_TYP</sub> [V]	I <sub>Q_TYP</sub> [mA]	PKG
LM1117	ADJ/ 1.2/ 1.5/ 1.8/ 2.5/ 3.3/ 5.0	1.25	2.7	20 (Absolute)	1.0	1.2 (@I <sub>LOAD</sub> =1.0A)	5	SOT-223/ SOT-89-3L/ TO-252
LM1117G	ADJ/ 1.2/ 1.5/ 1.8/ 2.5/ 3.3/ 5.0	1.25	2.7	20 (Absolute)	1.0	1.2 (@I <sub>LOAD</sub> =1.0A)	5	SOT-23/ SOT-223
LM1086	ADJ/ 1.5/ 1.8/ 2.5/ 3.3/ 5.0	1.25	3.0	12 (Absolute)	1.5	1.3 (@I <sub>LOAD</sub> =1.5A)	5	TO-252/ TO-263
LM1085	ADJ/ 1.5/ 1.8/ 2.5/ 3.3/ 5.0	1.25	3.0	12 (Absolute)	3.0	1.3 (@I <sub>LOAD</sub> =3.0A)	5	TO-252/ TO-263
LM1084	ADJ/ 1.5/ 1.8/ 2.5/ 3.3/ 5.0	1.25	3.0	12 (Absolute)	5.0	1.3 (@I <sub>LOAD</sub> =5.0A)	3	TO-252/ TO-263

# PRODUCTS

## Standard Linear Voltage Regulator

Device Name	V <sub>OUT</sub> [V]	Tolerance [%]	V <sub>IN_MIN</sub> [V]	V <sub>IN_MAX</sub> [V]	I <sub>OUT_MAX</sub> [A]	V <sub>DROP_TYP</sub> [V]	I <sub>Q_MAX</sub> [mA]	PKG
LM78L05	5	2/ 4	7	20	0.1	1.7	6	TO-92/ SOP-8/ SOT-89-3L
TJ78L05	5	4	7	20	0.1	1.7	6	SOT-89-3L
LM78Lxx	6/ 8/ 9/ 10/ 12/ 15/ 18/ 24	4	8 ~ 26.5	20 ~ 39	0.1	1.7	6 ~ 6.5	TO-92/ SOT-89-3L
LM79Lxx	-5/ -6/ -8/ -9/ -12/ -15/ -18/ -24	4	-7 ~ -27	-20 ~ -38	0.1	1.7	6 ~ 6.5	TO-92/ SOT-89-3L
LM317Lx	Adjustable (1.25 ~ 37)	4	3	40	0.1	3.0	10	TO-92/ SOP-8/ SOT-89-3L
LM78Mxx	5/ 15	4	7.2/ 17.5	25/ 30	0.5	2.0	6	TO-252-3L

## Voltage Reference

Device Name	Tolerance [%]	V <sub>REF</sub> [V]	V <sub>KA</sub> [V]	I <sub>KA_MAX</sub> [mA]	I <sub>KA(MIN)_MAX</sub> [mA]	PKG
TL431	- : 2, A : 1, C : 0.5	2.495	40	100	0.5	TO-92/ SOT-89-3L/ SOT-23-3L
TJ431	A : 1, C : 0.5	2.495	28	100	1.0	TO-92/ SOT-23-3L
LP431	A : 1, C : 0.5	2.500	36	100	0.08	SOT-23-3L
LM431	A : 1	2.500	40	100	0.5	SOT-23-3L (Reverse Pin)
TJR431	A : 1, C : 0.5	2.495	28	100	1.0	SOT-23-3L (Reverse Pin)
LPR431	A : 1, C : 0.5	2.500	36	100	0.08	SOT-23-3L (Reverse Pin)
TL432	A : 1, C : 0.5	1.240	18	100	0.08	TO-92/ SOT-89-3L/ SOT-23-3L
LM336	2.0	2.5/5.0(Fixed)	-	10	0.6	TO-92/ SOP-8
LM385	3.0	1.2/2.5 (Fixed) 1.24 (ADJ)	-	20	0.035	TO-92/ SOP-8

## Driver – Darlington Transistor Arrays

Device Name	VCE (Absolute) [V]	VIN (Absolute) [V]	Max Collector Current [mA]	V <sub>CE(SAT)</sub> [V]	Input Current I <sub>I(ON)</sub> [mA]	Input Voltage V <sub>I(ON)</sub> [V]	PKG
ULN2003A (7-Digit)	50	30	500	1.3 @ I <sub>C</sub> =300mA	0.93 @ V <sub>I</sub> =3.85V	3 @ I <sub>C</sub> =300mA	SOP-16/ DIP-16
ULN2003 (7-Digit)	40	30	500	1.3 @ I <sub>C</sub> =300mA	0.93 @ V <sub>I</sub> =3.85V	3 @ I <sub>C</sub> =300mA	SOP-16/ DIP-16
ULN2004A (7-Digit)	50	30	500	1.3 @ I <sub>C</sub> =300mA	0.35 @ V <sub>I</sub> =5.0V	8 @ I <sub>C</sub> =350mA	SOP-16/ DIP-16
ULN2803A (8-Digit)	50	30	500	1.3 @ I <sub>C</sub> =300mA	0.93 @ V <sub>I</sub> =3.85V	3 @ I <sub>C</sub> =300mA	SOP-18/ DIP-18

## Driver – Precision Air-Core Tach/Speedo Driver

Device Name	Supply Voltage (Absolute) [V]	Max. Input Freq. Range [kHz]	Output V <sub>SAT</sub> [V]	Output Voltage [V]	Differential Drive Voltage (V <sub>COS+</sub> -V <sub>COS-</sub> ) [V]	Differential Drive Voltage (V <sub>SIN+</sub> -V <sub>SIN-</sub> ) [V]	PKG
CS8190	24	20	0.15 @ I <sub>CC</sub> =10mA	7	6.5 @ θ=0° -6.5 @ θ=180°	6.5 @ θ=90° -6.5 @ θ=270°	DIP-16

## Driver – Quadruple Half-H Driver

Device Name	Max. Supply Voltage [V]	Logic Supply Voltage [V]	Max. Power Supply Current [mA]	Max. Logic Supply Current [mA]	Source Output Sat. Voltage [V]	Sink Output Sat. Voltage [V]	PKG
L293D	36	4.5 ~ 7	14	35	1.4	1.2	DIP-16

  : Products Under Development

# PRODUCTS

## Operational Amplifier

Device Name	Type	Supply Voltage V <sub>CC</sub> [V]	Input Offset V <sub>IO_MAX</sub> [mV]	Differential input V <sub>IDIFF</sub> [V]	Input Voltage V <sub>IN</sub> [V]	PKG
LM358N	Dual	45 (Absolute)	7	45 (Absolute)	-0.3~45 (Absolute)	DIP-8
TJ358	Dual	45 (Absolute)	7	45 (Absolute)	-0.3~45 (Absolute)	SOP-8/ TSSOP-8
LM2904	Dual	45 (Absolute)	7	±45 (Absolute)	-0.3~45 (Absolute)	SOP-8/ DIP-8
LM4558 (Low Noise)	Dual	±22 (Absolute)	5	±30 (Absolute)	±15 (Absolute)	SOP-8/ DIP-8
TJ324	Quad	40 (Absolute)	7	40 (Absolute)	-0.3~40 (Absolute)	SOP-14
LM324	Quad	40 (Absolute)	7	40 (Absolute)	-0.3~40 (Absolute)	DIP-14
LM2902	Quad	40 (Absolute)	7	40 (Absolute)	-0.3~40 (Absolute)	SOP-14
OP07	Single	22 (Absolute)	0.06	±30 (Absolute)	±22 (Absolute)	SOP8/ DIP8
LM386	Single	15 (Absolute)	Gain=46dB/ BW=30kHz/ THD=0.2%		± 0.4	SOP8/ DIP8

## Comparator

Device Name	Type	Supply Voltage [V]	Differential Input V <sub>IDIFF</sub> [V]	Input Voltage [V]	Input Offset V <sub>IO</sub> [mV]	Input Offset Current [nA]	Input Bias Current [nA]	PKG
TJ393	Dual	±18 or 36 (Absolute)	36 (Absolute)	-0.3 ~ 36 (Absolute)	2	5	-25	SOP-8
LM393	Dual	±18 or 36 (Absolute)	36 (Absolute)	-0.3 ~ 36 (Absolute)	2	5	-25	DIP-8
TJ339	Quad	±18 or 36 (Absolute)	36 (Absolute)	-0.3 ~ 36 (Absolute)	2	5	-25	SOP-14
LM339	Quad	±18 or 36 (Absolute)	36 (Absolute)	-0.3 ~ 36 (Absolute)	2	5	-25	DIP-14

## Converter & Controller – LED Driver

Device Name	Topology	V <sub>SUPPLY</sub> [V]	Current sense pull-in threshold V <sub>CS(HI)</sub> [mV]	I <sub>OUT</sub> [A]	Dimming	PKG
TJ9910	Buck	10 ~ 600	225 ~ 275	External FET	PWM/ Linear	SOP-8
TJ9910A	Buck	10 ~ 600	238 ~ 262	External FET	PWM/ Linear	SOP-8

Device Name	VDD [V]	VIN @ Drain [V]	Max. Supply Current uA	RON [Ω]	Min. Output Current [mA]	V <sub>UVLO</sub> [V]	PKG
TJ33120	5 ~ 9.5	20 ~ 400	400	40	114	4.0	SOP-8

## Converter & Controller – PWM Controller

Device Name	Supply Voltage V <sub>CC</sub> [V]	Reference Output V <sub>REF</sub> [V]	Frequency (max) [KHz]	UVLO Threshold V <sub>TH</sub> [V]	Duty Cycle (max) [%]	PKG
LM3842/3	30 (Absolute)	5	500	16/ 8.4	100	SOP-8/ DIP-8

Device Name	Supply Voltage V <sub>CC</sub> [V]	Reference Output [V]	Oscillator Frequency [KHz]	Collector Output Current [A]	C-E Saturation Voltage [V]	PKG
TL494	40	5	300	0.2	1.1 (@ CE) 1.5 (@ CC)	SOP-16/ DIP-16

## Converter & Controller – Charge Pump Voltage Converter

Device Name	Supply Voltage [V]	Output Voltage [V]	Supply Current [μA]	Power Efficiency [%]	Frequency [KHz]	PKG
TJ7660	10.5 (Absolute)	-nV <sub>IN</sub>	100	98	10	SOP-8/ DIP-8
LM7660	10.5 (Absolute)	-nV <sub>IN</sub>	100	98	10	DIP-8

# PRODUCTS

## Converter & Controller – Step-Up/Down Converter Controller

Device Name	Supply Voltage V <sub>CC</sub> [V]	Switch Current I <sub>SW</sub> [A]	Reference Accuracy [%]	Supply Current I <sub>CC_MAX</sub> [mA]	Comparator Input Range V <sub>IR</sub> [V]	PKG
MC34063A/B	40	1.5	2	4.0	-0.3 ~ 40 (Absolute)	SOP-8/ DIP-8
MC34063AH	60	1.5	2	4.0	-0.3 ~ 60 (Absolute)	SOP-8/ DIP-8
TJ34063A	40	1.5	2	4.0	-0.3 ~ 40 (Absolute)	SOP-8
MC34063C	40	1.2	2	4.0	-0.3 ~ 40 (Absolute)	SOP-8/ DIP-8
TJ34063C	40	1.2	2	4.0	-0.3 ~ 40 (Absolute)	SOP-8

## Constant Voltage & Current Controller

Device Name	Supply Voltage V <sub>CC</sub> [V]	Voltage Control Loop Ref. V <sub>REF</sub> [V]	Transconductance Gain(V <sub>CTRL</sub> ) [mA/mV]	Current Control Loop Ref. V <sub>SNESE</sub> [V]	Transconductance Gain(I <sub>CTRL</sub> ) [mA/mV]	PKG
TJ1051	12	1.21	3.5	0.2	7	SOT-23-6L/ SOP-8

## Interface IC

Device Name	Interface	Supply Voltage [V]	Supply Current [mA]	No. of Tx	No. of Rx	Data Rate (min) [kbps]	ESD Voltage	PKG
TJ232	RS-232	5.0	10	2	2	140	±2 kV	SOP-16
MAX232	RS-232	5.0	10	2	2	140	±2 kV	DIP-16
TJ232	RS-232	3.3 ~ 5.0	0.3	2	2	250	±15 kV	SOP-16
MAX485E	RS-485/ RS-422	5.0	0.9	1	1	5,000	±15 kV	SOP-8/ DIP-8
TJ3485E	RS-485/ RS-422	3.3	0.5	1	1	5,000	±15 kV	SOP-8/ DIP-8
MAX3485E	RS-485/ RS-422	3.3	0.5	1	1	5,000	±15 kV	SOP-8/ DIP-8

## Logic IC

Device Name	V <sub>CC(MIN)</sub> [V]	V <sub>CC(MAX)</sub> [V]	CH. [#]	I <sub>OL(MAX)</sub> [mA]	I <sub>OH(MAX)</sub> [mA]	V <sub>OL(MAX)</sub> @ V <sub>CC</sub> =6V	V <sub>OH(MIN)</sub> @ V <sub>CC</sub> =6V	t <sub>PD, TYP</sub> @ V <sub>CC</sub> =4.5V	PKG
74HC00	2	6	4	5.2	-5.2	0.4V @ I <sub>OL,MAX</sub>	5.2V @ I <sub>OH,MAX</sub>	9 ns	SOP-14/ DIP-14
74HC04	2	6	6	5.2	-5.2	0.4V @ I <sub>OL,MAX</sub>	5.2V @ I <sub>OH,MAX</sub>	9 ns	SOP-14/ DIP-14
74HC14	2	6	6	5.2	-5.2	0.4V @ I <sub>OL,MAX</sub>	5.2V @ I <sub>OH,MAX</sub>	15 ns	SOP-14/ DIP-14
74HC595	2	6	1	5.2	-5.2	0.4V @ I <sub>OL,MAX</sub>	5.2V @ I <sub>OH,MAX</sub>	20 ns	TSSOP/SOP/ DIP-16

## Timer

Device Name	V <sub>CC,MIN</sub> [V]	V <sub>CC,MAX</sub> [V]	F <sub>OSC,MAX</sub> [KHz]	I <sub>CC,TYP</sub> [uA]	I <sub>O,MAX</sub> [mA]	V <sub>OL,MAX</sub> @ V <sub>CC</sub> =15V [V]	V <sub>OH,MIN</sub> @ V <sub>CC</sub> =15V [V]	PKG
NE555	2	18	500	300	20	1.0	14.3	SOP-8/ DIP-8

## Micro-Monitor

Device Name	V <sub>CC</sub> [V]	I <sub>OL,MIN</sub> [mA]	I <sub>OH,MIN</sub> [mA]	V <sub>OL,MAX</sub> [V]	V <sub>OH,MIN</sub> [V]	t <sub>PB,MIN</sub> [ms]	t <sub>RST,MIN</sub> [ms]	t <sub>ST</sub> [ms]	PKG
DS1232	4.5~5.5	8	-8	0.4	V <sub>CC</sub> -0.5	20	250	20	SOP-8/ DIP-8

## Voice Switched Speakerphone Circuit

Device Name	V <sub>CC</sub> [V]	CD/MUT Input [V]	I <sub>VB</sub> [uA]	Attenuator Input Signal [mVrms]	MIC/Hybrid AMP Gain [dB]	Load Current [mA]	PKG
MC34118	3.5~6.5	V <sub>CC</sub>	500	350	40	± 2 @ RXO/TXO	SOP-28

## Precision Temperature Sensor

Device Name	Max. Reverse Current [mA]	Max. Forward Current [mA]	Specified Temp. [°C]	Operating V <sub>OUT</sub> [V]	Temp. Error [°C]	Temp. Non-Linearity [°C]	Vout Temp Coeff. [mV/°C]	PKG
LM335	15 (Absolute)	10 (Absolute)	-40~100	2.98	2	0.3	10	TO-92/ SOP-8

: Products Under Development



## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
Non-Synchronous DC/DC Converter	LM96LK					
	LM2575GDP-x.x	LM2574M-xx, LM2574N-xx, TL2575-xxIN, LM2575IN	LM2574DW-xx, LM2574N-xx, LM2575T-x.x, LM2575TV-x.x,	L6902D, A5970AD, L5970AD	LM2574-x.xXN, LM2575-x.xBN/, BWM / YN / YWM m MCP16301/H	BD90610EFJ-C
	LM2575GR-x.x	TL2575-xxIKTT, LM2575S-x.x, LM1575S-x.x, LM2595S-x.x	LM2575D2T-x.x NCV2575D2T-xx		LM2575-x.xBU/WU, MIC4575-x.xBU	
	LM2575GT-x.x	TL2575-xxIKV, LM2575T-x.x, LM1575T-x.x, LM2595T-x.x	LM2575T-x.x, LM2575TV-x.x,		LM2575-x.xBT/WT, MIC4575-x.xBT	
	LM2575HVDP-x.x	LM2574HVM-xx, LM2574HVN-xx, TL2575HV-xxIN		L4971, L4976		
	LM2575HVR-x.x	LM2575HVS-x.x, TL2575HV-xxIKTT				
	LM2575HVT-x.x	LM2575HVT-x.x TL2575HV-xxIKV				
	LM2576DP-x.x			L5972D	MIC4684BM/YM	BD9G401EFJ-M, BD90620EFJ-C
	LM2576R-x.x	LM2576S-x.x	LM2576D2T-x.x		LM2576-x.xBU/WU, MIC4576-x.xBU ,	
	LM2576T-x.x	LM2576T-x.x,	LM2576T-x.x		LM2576-x.xBT/WT, MIC4576-x.xBT	
	LM2576HVDP-x.x					
	LM2576HVR-x.x	LM2576HVS-x.x				
	LM2576HVT-x.x	LM2576HVT-x.x				
	LM2596DP-x.x	LM2594MX-x.x, LM2594N-x.x	LM2594D/PADJ	A5975D, L5987, L5973D		
	LM2596R-x.x	LM2596S-x.x, LM2595S-x.x,	LM2596DSADJG, LM2595DSADJG,		MIC4576-x.xBU	BD9701/2
	LM2596T-x.x	LM2596T-x.x, LM2595T-x.x,	LM2596TADJG, LM2595TADJG		MIC4576-x.xBT	BD9701/2
	LM2596HVDP-x.x	LM2594HVMX-x.x, LM2594HVN-x.x		L7987L, L4973		
	LM2596HVGR-x.x	LM2591HVS-x.x, LM2592HVS-x.x LM2593HVS-x.x				
	LM2596HVGT-x.x	LM2591HVT-x.x, LM2592HVT-x.x, LM2593HVT-x.x,				
	LM2596ADP-x.x					
	LM2596AR-x.x			L5973D		
	LM2596AT-x.x	LM2596R-x.x	LM2596DSADJG		MIC4576-x.xBU	BD9701/2
	LM4576	LM2596T-x.x	LM2596TADJG		MIC4576-x.xBT	BD9701/2
LM1501A/B	LM2596 LM2675-x.x	LM2596	A5975D, A7986A L5973D, L4976	MIC4576 MIC4684BM, MIC4680	BD9701/2, BD9G401EFJ-M	
TJ1501A/B	LM22678-x.x, LM2678D/S/T-x.x				BD90640EFJ-C	

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
Step-Up DC/DC Converter	LM19375F5	LM22678-x.x, LM2678D/S/T-x.x				BD90640EFJ-C
	LM19385F6	TPS61041, LM27313, TPS61165				MIC2287
	LM5171D	LM27313, TPS61165				MIC2287, MIC2289
LED Driver	TJ9910GD		CS5171, NCV5171EDR2G CS5173			MIC2172
	TJ9910AGD					HV9910BLG-G HV9861ALG-G
	TJ33120D					HV9910BLG-G HV9861ALG-G
Converter & Controller	MC34063AD	MC34063AD,	MC34063ADG, SC34063ADR2G NCP3066DR	MC34063ACD-TR, MC34063ECD-TR		
	MC34063AN	MC34063AP	MC34063AP1G, SC34063AP1G, NCP3066PG	MC34063ACN, MC34063ECN		
	MC34063BD	MC33063AD	MC33063ADG, SC33063ADR2G, NCP3066DR	MC34063ABD-TR		
	MC34063CD	MC33063AD, MC34063AD	MC33063ADG, SC33063ADR2G, NCP3066DR	MC34063ABD-TR		
	MC34063AHD					
	MC34063AHN					
	TJ34063AGD	MC33063AD, MC34063AD	MC34063ADG, MC33063ADG, SC33063ADR2G	MC34063ABD-TR		
	TJ34063CGD	MC33063AD, MC34063AD	MC33063ADG, SC33063ADR2G	MC34063ABD-TR		
	TL494D	TL494CD, TL494ID	TL494CD			
	TL494N	TL494CN, TL494IN	TL494CN, TL494IN			
	LM3842AD	UC3842D, TL3842BDR-8	UC3842AD / BD	UC3842BD, UC3844BD	MIC38C42BM	
	LM3842AN	UC3842N, TL3842BP	UC3842AN / BN	UC3842BN, UC3844BN	MIC38C42BN	
	LM3843AD	UC3843D, TL3843BDR-8	UC3843AD / BD	UC3843BD, UC3845BD	MIC38C43BM	
	LM3843AN	UC3843N, TL3843BP	UC3843AN / BN	UC3843BN, UC3845BN	MIC38C43BN	
	TJ7660D	LM2660MX	CAT660EVA-GT3			
	TJ7660N	TL7660CP				
	TJ1051					

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM	
VLDO Voltage Regulator	TJ75xxAGF/AGSF5	TLV704xxDBVR	MC78LC5xxHT1G	LDK320ADUxxR, LDK220UxxR	MCP1702T		
	LM2950/1D-x.x	LP295x	LP295x, NCV4264D50R2G		MIC295x		
	TJ2950G/GTF5-x.x	LP2950ACZ-x.x	LP2950ACZ-x.x		MIC2950		
	TJ5205 Series	TP5788xxDBVR, LP2985A-xxDBV, TP5761xxDBVR, TP5709xxDBVR		LD2981ABMxxTR, LD2985BMxxR, LD2980ABMxxTR, LDK220Mxx, LDK320Mxx	MIC5247-xxBM5, MIC5205-x.xYM5, MIC5235-3.3YM5		
	LM9076D	LM9076BMA/BMX-x.x					
	LM9076R	LM9076S/SX-x.x					
	TJ62FPxxGSF/GF						
	TJ75xxG/GF			MC78LC5xxHT1G	LDK320ADUxxR	MCP1701AT-xx, MCP1702/T	
	LM2954	LP2954				BD3650FP-M	
	LM2940S	LM2940IMP-x.x, LM2940CS/CT-x.x			MIC2940A-x.xWT/WU, MIC2941AWT/WU		
	LM2940T	LM2940CT-x.x, LM2940CS-x.x			MIC2940A-x.xWT/WU, MIC2941AWT/WU	BA033CC0T, BA05CC0T	
	LM2940HD						
	LM2940HR	LM2940S-x.x, LM2940IMP/CT-x.x			MIC2940A-x.xWT/WU, MIC2941AWU / WT		
	LM2940HT	LM2940CT-x.x, LM2940IMP/CS/LD-x.x			MIC2940A-x.xWT / WU, MIC2941AWT / WU		
	LM37100S-x.x			LD290805xxR	MIC39100-x.xWS, MIC37100-x.xWS		
	LM37101D-x.x	UCC381DP-x., UCC281DP-x.	MC33269DR2-x.xG		MIC39101-x.xYM, MIC37101-x.xYM		
	LM37102D	TL5209DR, UCC381DP-xADJ, UCC281DP-ADJ	MC33269DR2G		MIC39102YM, MIC37102YM		
	LM37102RS		NCP5661DTADJRKG	LDFPT, LD29080PT	MIC37102BR	BA00BCOWFP	
	LM37102CGD/GDP	TL5209DR, TP573801DCQR	MC33269DR2G		MIC39102BM, MIC37102BM		
	LM39100S-x.x			LD290805xx	MIC39100-x.xBS, MIC37100-x.xBS		
LM39100RS-x.x			LD29080DTxx, LDFxxDT, LD39080DTxx		BAxxBC0FP		
LM39101D-x.x	UCC381DP-x, UCC281DP-x.	MC33269DR2-x.xG		MIC39101-x.xYM, MIC37101-x.xYM			
LM39101RS-x.x			LDFxxPT		BAxxBCOWFP, BA00BCOWFPJ		

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
VLDO Voltage Regulator	LM39102D	TL5209DR, TP573801DCQR, UCC381DP-xADJ, UCC281DP-ADJ	MC33269DR2G		MIC39102YM, MIC37102YM	
	LM39102RS		NCP5661DTADJRKG	LDFPT, LD29080PTR	MIC37102BR	BA00BCOWFP
	LM29150RS-x.x			LD29150DTxxR, LD39150DTxx, LFXxAB/CDT		BDxxFC0FP-E2
	LM29150R-x.x	LM2940S-xx, LM2940CS-xx	NCP59150DSxx, NCV59150DSxx, NCP565D2Txx, NCV565D2Txx		MIC29150-x.xWU	BAxxDD0WHFP
	LM29150T-x.x	LM2940T-xx, LM2940CT-xx		LFXxAB/CV, LFXxAB/CV-DG	MIC29150-x.xWT	BAxxJCST
	LM29151R-x.x	TP57A45xxKTTR	NCP59150DSxx, NCV59150DSxx, NCP565D2Txx, NCV565D2Txx		MIC29151-x.xWU	
	LM29152RS			LD29150PTR, LD39150PTxx, LFXxAB/CPT	MIC29152WD	BA00CCOWFP, BD00FCOWFP-E2
	LM29152R	TP57A4501KTTR	NCP59150DSADJ, NCV59150DSADJ, NCP57152DSADJ, NCV57152DSADJ			
	LM29152T				MIC29152WT	BA00CCOWT, BA00JCSWT
	LM39300R-x.x		NCP59300DSxx, NCV59300DSxx, NCP5663DSxxR4G, NCV5663DSxxR4G	LD39300DTxx	MIC39300-x.xBU	
	LM39300T-x.x				MIC39300-x.xBT	
	LM39301R-x.x	TP5757xxKTT, LP3853/6ES-x.x	NCP59301DSxx, NCV59301DSxx	LD39300PTxx	MIC39301-x.xBU	BAxxDD0WHFP
	LM39301T-x.x	TP5757xxKC, LP3853/6ET-x.x			MIC39301-x.xBUT	
	LM39302R	TP575701KTT	NCP59302DSADJ, NCV59302DSADJ, NCP5663DSADJR4G, NCV5663DSADJR4G	LD29300P2MTR	MIC39302WU, MIC29302WU	
	LM39302T	TP575701KC,			MIC39302WU	
	LM29300R-x.x				MIC29300-x.xWU	
	LM29300T-x.x				MIC29300-x.xWT	
	LM29301R-x.x				MIC29301-x.xWU	
	LM29301T-x.x				MIC29301-x.xWT	
	LM29302R				MIC29302WU	
	LM29302T				MIC29302WT	
	LM39502R	TP575501KTT			MIC29502WU	
	LM39502T	TP575501KC			MIC29502WT	

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
CMOS ULDO Voltage Regulator (MLCC)	TJ9198	LP5907MFX-x.x, LP5907SNX-x.x, TLV703xx, TLV702xx, TPS721xxDBVR	NCP115ASNxx, NCP4589DSQxx, NCP4589DSNxx	LDLN025PU/M.xx, LD39020DTPUxx, LD39030DTPUxxR, LD3985MxxR	MIC5323, MCP1711T-xxI/OT, MCP1711T-xxI/5X, MIC5247-xxBM5	BDxxTD3WG
	TJ4303GSF5-x.x	TPS73201DBVR, TPS73001DBVR, TPS79101DBVR	CAT6220TDI-GT3	LDLC015MR	MIC5318YD5, MIC5319	
	LM1108					
	LM8805SF5-x.x	TLV702xxDBVR, TLV757xxPDBVR, TPS735xx	CAT6219-xxxTDG, CAT6219ADJTD		MIC5319-x.xYD5	BUxxSD5
	LM2C1117					
	TJ5641/H					
	TJ1119C/FGS-x.x	TLV1117LVxxDCYR, LM3940IMP-x.x			TC2117-x.xVDBTR, MIC37139-xxBS	BDxxIA5MEFJ-ME2
	TJ1119C/FGRS-x.x					
	TJ1801			LDL112		
	TJ4310 Series	TPS786xx	AT6243DCADJ-RKG	LDL112	MIC37102	BDxxICOWEFJ, BDxxKA5WF-E2
	TJ4320 Series	TPS796xxKTT, TPS78630, LP3965	AT6243DCADJ-RKG	LD39150	MIC37139	
	TJ2132 Series			LD49150		
	LD39150/ADJ			LD39150PT, LD39150DTxx, LD39150PU	MIC39150, MIC39152WD	
	TJ4330 Series	TPS758xx, TPS74401, TPS75701KTT, LP38501-TS-ADJ	NCP4632DDTADJ	LD39300	MIC37302	
TJ2134/AGDP	TPS7A85		LD49300PTxx			
LDO Voltage Regulator	LM1117S-x.x	REG1117/A-x.x, LM1117MP-x.x, LMS8117AMP-x.x	NCP1117STxxT3G, MC33269ST-x.x	LD1117SxxTR		
	LM1117F-x.x					
	LM1117RS-x.x	LM1117DT-x.x, LMS8117ADT-x.x	NCP1117DTxx, NCV1117DTxx, MC33269SDT-x.x	LD1117DTxxTR		BA1117FP-E2
	LM1117GS-x.x	REG1117/A-x.x, LM1117MP-x.x, LMS8117AMP-x.x	NCP1117STxx, NCV1117STxx, MC33269ST-x.x, NCV565STxx	LD1117SxxTR, LDL1117xxR		
	LM1086R/RS-x.x	LM1086		LD1086		
	LM1085R/RS-x.x	LMS1587IS/CS-x.x, LMS1587IT/CT-x.x, LM1085		LD1085		
	LM1084R/RS-x.x	LMS1585IS/CS-x.x, LMS1585IT/CT-x.x, LM1084	CS5205-1GDP	LD1084		

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
Standard Linear Voltage Regulator	LM78L05/F/D	UA78Lxx, LM78Lxx	MC78Lxx, KA78Lxx, LM78Lxx, NCV78L05ABDR2G	L78Lxx		BDxxFA1FP3
	TJ78L05GF	UA78Lxx, LM78Lxx	MC78Lxx, KA78Lxx, LM78Lxx	L78Lxx		BDxxFA1FP3
	LM78Lxx/F	UA78Lxx, LM78Lxx	MC78Lxx, KA78Lxx, LM78Lxx	L78Lxx		BDxxFA1FP3
	LM79Lxx/F	LM79Lxx	MC79Lxx	L79Lxx		
	LM317L/LF/LD	TL317, LM317L	LM317L	LM317L		
	LM78MxxRS	LM78Mxx	MC78Mxx, KA78Mxx			BA78MxxFP
Voltage Reference	TL431x	TL431/2, TL1431	TL431, LM431	TL431x, TL432		
	TJ431x	TL431/2	TL431, LM431	TL432		
	LP431GxSF	ATL432	NCP431			
	LM431xSF	TL431, LM431		TL1431, TL431		
	TJR431xSF	TL431, LM431		TL1431, TL431		
	LPR431GxSF	ATL431	NCP432			
	TL432x	TLV431, LMV431, TLVH431	TLV431	TS432, TLVH431		
	LM336	LM336Z/BZ-x.x, LM136Z/BZ-2.5, LM236Z/BZ-2.5	LM336Z25, LM336Z5X	LM336Z, BZ, LM236Z		
	LM336D	LM336M, BM-x.x, LM136M, BM-x.x, LM236M, BM-x.x		LM336D / DT, BD / BDT, LM236D/DT		
	LM385	LM385Z/BZ/BXZ/BYZ, LM185Z/BZ/BXZ/BYZ, LM285Z/BZ/BXZ/BYZ	LM385Z/BZ-x.x, LM185Z/BZ-x.x, LM285Z/BZ-x.x			
LM385D	LM385M/BM/BMX/BD, LM185M/BM/BMX, LM285M/BM/BMX	LM385D/BD-x.x, LM185D/BD-x.x, LM285D/BD-x.x				
Sink / Source Linear Regulator	TJ2998GD	LP2998	NCP51198		MIC5166	
	TJ2998GDP	LP2998	NCP51198		MIC5166	
OCP IC	TJ2242GSF6	TPS2553DBVR	NCP380HSNAJ		MIC2009YM6	BD2242G
	TJ2242AGSF6	TPS2553DBVR	NCP380HSNAJ		MIC2009YM6	BD2242G
	TJ82034HGD	LM3525M				BD82034

## CROSS REFERENCE GUIDE

Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
Operational Amplifier	LM358N	LM358N, LM258P	LM258N, LM358N, KA358, KA2904	LM258N		
	TJ358GD	LM258, LM358, LM2904D	LM258, LM358, LM2904D, KA258D, KA358D	LM358		LM358, BA10358
	TJ358GTD	LM358APW		LM358PT		LM358PT
	LM2904GD	LM258, LM358	LM258, LM358, LM2904D, KA258D, KA358D	LM2904DT, LM358		LM358, BA10358
	LM4558D	RC4558, RC4558I		MC4558CD		BA4558Y
	TJ4558GD	RC4558, RC4558I		MC4558CD		BA4558Y
	TJ324GD	LM224, LM324	LM224, LM324	LM324		LM324, BA10324A
	LM2902	LM224, LM324	LM224, LM324	LM324		LM324, BA10324A
	OP07CD	OP07CD, OP07DD, OP07CPS, OP07DPS				
	OP07CN	OP07CP, OP07DP, OP07CPS, OP07DPS		OP07C, OP07CN		
Comparator	TJ393GD	LM293D, LM393D, LM2903D	LM293D, LM393D, LM2903D	LM393D		LM393D, BA10393F
	TJ393GN	LM293P, LM393P, LM2903P	LM293N, LM393N, LM2903N	LM393		LM393, BA10393
	TJ339GD	LM339	LM239, LM339, MC3302	LM339		LM339, BA10339
	LM386D	LM386M, LM386MX, LM386MMX				
	TJ232ED	MAX232D, TPS232ECDR		ST3232BDR, ST3232BWR, ST3232BTR		
Interface IC	MAX232EN	MAX232N/IN				
	TJ3232D	TP53232ECPWR, MAX3232				
	TJ485ED	SN65HVD485E, SN75176BD				
	MAX485ED	SN75176AD, DS1487M, ADM485AR				
	MAX485EN	SN75176AP, DS1487N, ADM485AN				
	TJ3485ED					

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Catalog	TAEJIN	TI	ON-SEMI	ST	MICROCHIP	ROHM
Driver	ULN2003AD	ULN2003AD	ULN2003ADR2G	ULN2003DD1013TR		BA12003DF-Z
	ULN2003AN	ULN2003AN		ULN2003A		
	ULN2003D					BA12003DF-Z
	ULN2003N					
	ULN2004AD	ULN2004AD		ULN2004DD1013TR		BA12004DF-Z
	ULN2004AN	ULN2004AN		ULN2004A		
	ULN2803AD	ULN2803ADW				
	ULN2803AN	ULN2803AN				
	CS8190N		CS8190ENF16G, CS4121ENF16			
	L293DN	L293DNE, L293NE		L293D, L293DD		
Logic IC	74HC00D	SN74HC00D, SN74HC00DB/NS/PW	74HC00DR2G, 74HC00DTR2G	M74HC00M1R / RM13TR, M74HC00TTR		
	74HC00N	SN74HC00N, SN74HC00DB/NS/PW	74HC00DTR2G	M74HC00B1R, M74HC00TTR		
	74HC04D	SN74HC04D, SN74HC04DB/NS/PW	74HC04DR2G, 74HC04DTR2G	M74HC04RM13R, M74HC04YRM13TR, M74HC04TTR/YTTR		
	74HC04N	SN74HC04N, SN74HC04DB/NS/PW	74HC04DTR2G	M74HC04B1R, M74HC04TTR/YTTR		
	74HC14D	SN74HC14D, SN74HC14DB/NS/PW	74HC14DR2G, 74HC14DTR2G	M74HC14YRM13TR, M74HC14YTTR		
	74HC14N	SN74HC14N, SN74HC14DB/NS/PW	74HC14DTR2G	M74HC14YTTR		
	74HC595D	SN74HC595D, SN74HC595DW/N/DB/PW	74HC595DR2G, 74HC595DTR2G, MC74HCT595ADR2G	M74HC595RM13TR, M74HC595TTR		
	NE555D	NE555DX, LM555CM, SE / NA / SA555DX	LM555CM/CMX	NE555D/DT, SA555D/DT, SE555D/DT		
NE555N	NE555P, LM555CN, SE/NA/SA555P	LM555CN	NE555N, SA555N, SE555N			
Others	DS1232D				TC1232, MIC1232MY, MIC1232NY	
	MC34118D					
	LM335	LM335Z/AZ, LM135Z/AZ, LM235Z/AZ	LM335Z/AZ, LM135Z/AZ, LM235Z/AZ	LM335Z/AZ, LM135Z/AZ, LM235Z/AZ		
	LM335D	LM335M/AM, LM135M/AM, LM235M/AM	LM335M/AM, LM135M/AM, LM235M/AM	LM335D/AD, LM135D/AD, LM235D/AD		