

● Company Profile


Since the establishment in 1981, Cosmo Electronics Corporation has become world's leading manufacturers in the field of Photo Couplers and Relay. We are listed on Taiwan Stock Exchange Corporation (TWSE) in 2000.

For past 40 years, through its relentless devotion to research and development, keep providing professional techniques and comprehensive service to customer. Cosmo is recognized as global leading company in OPTO electronics industry and reliable to all customers worldwide.

We have customers throughout the world, our product line divided into four major categories:

- **Photo Coupler**
- **Solid State Relay-MOSFET output**
- **Reed Relay**
- **Solid State Relay**



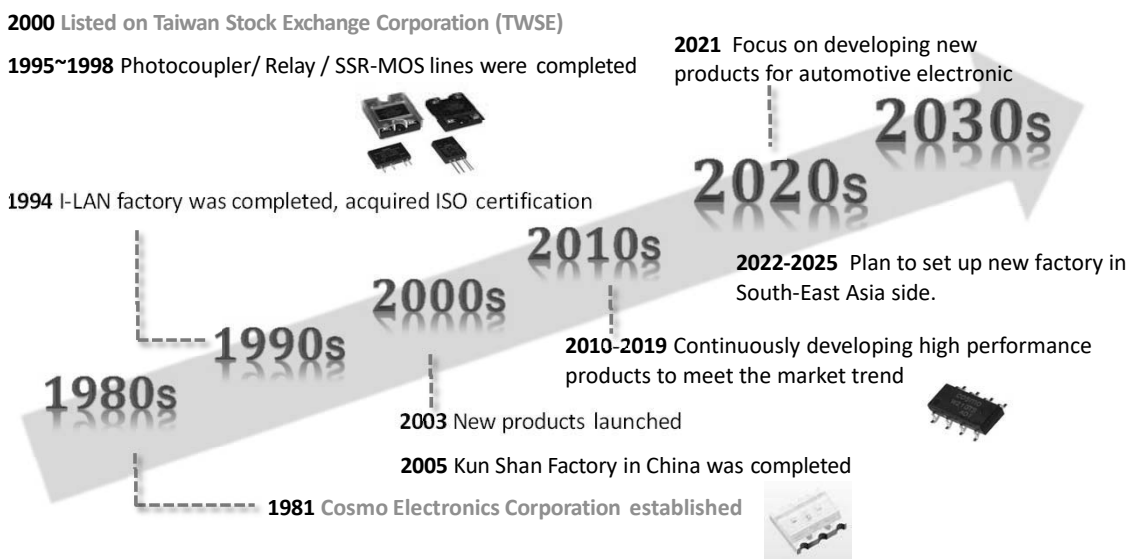
**Taiwan**   
 Headquarter(New Taipei city)  
 Factory1-(I-Lan)  
 Factory2-(I-Lan)

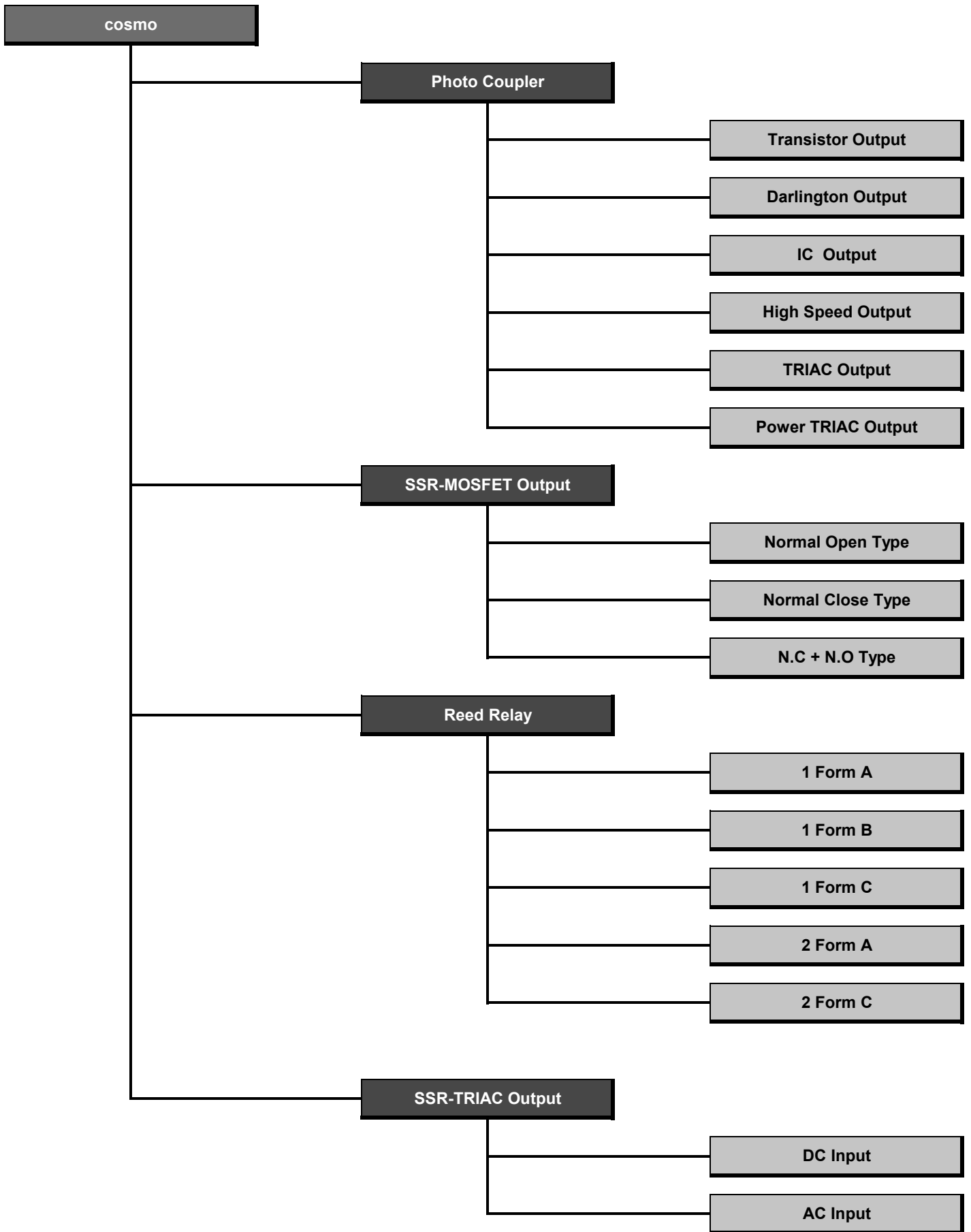
**China**   
 Factory(Kunshan)  
 Factory(Dongguan)

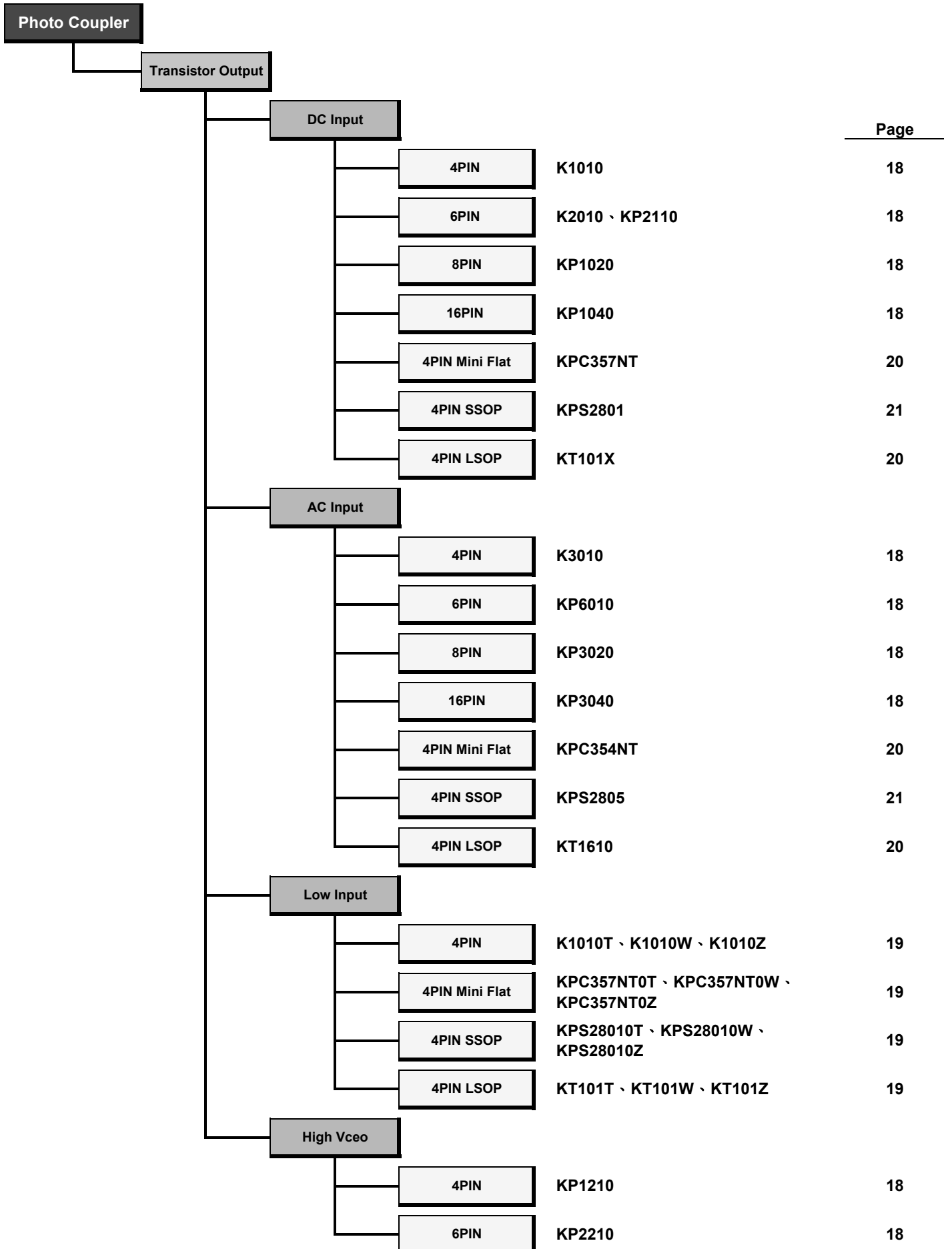
**Indonesia**   
 Factory(In preparation)

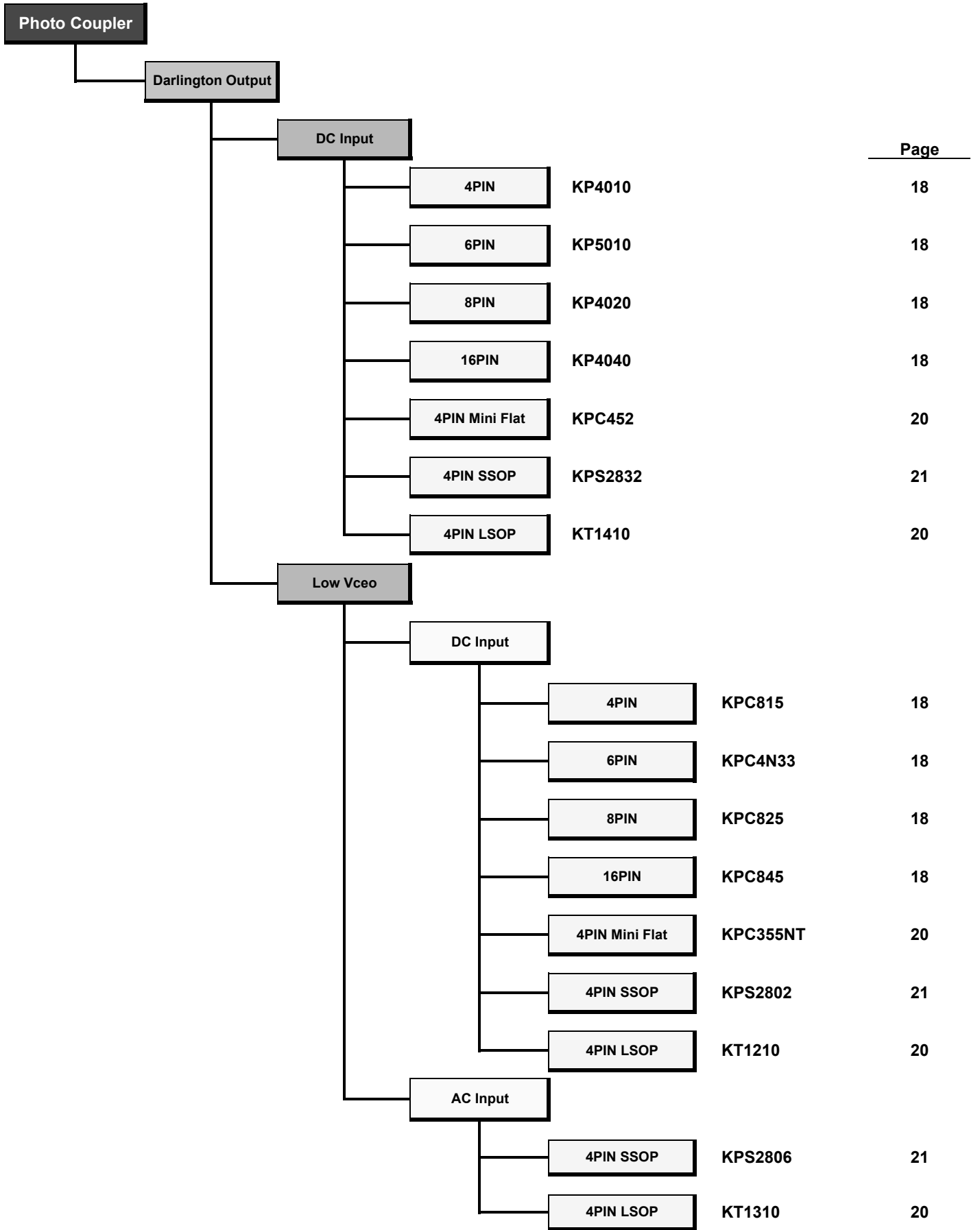
**Sales channel**  
 Asia / Europe / America  
 Africa / Oceania

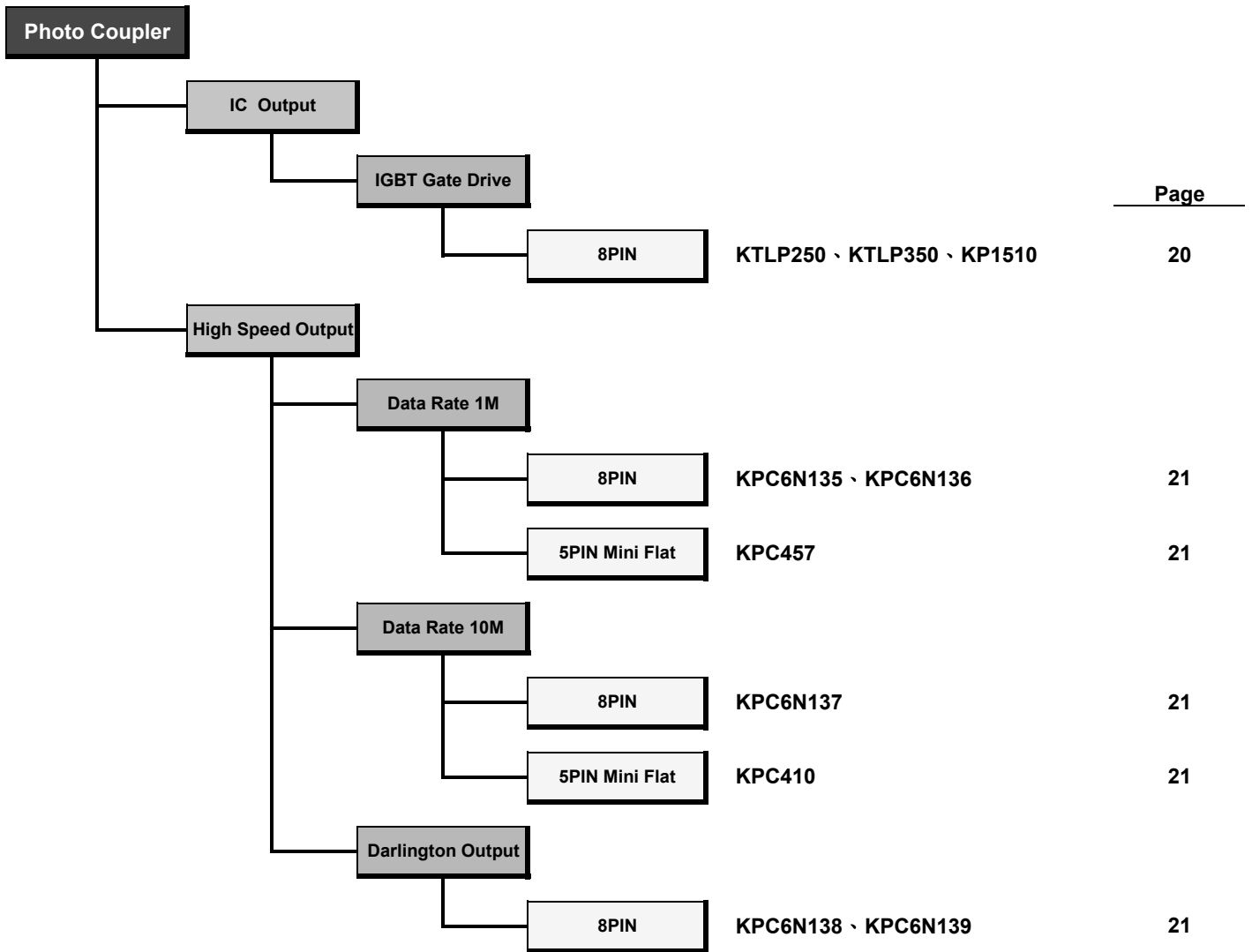
● Company Milestone

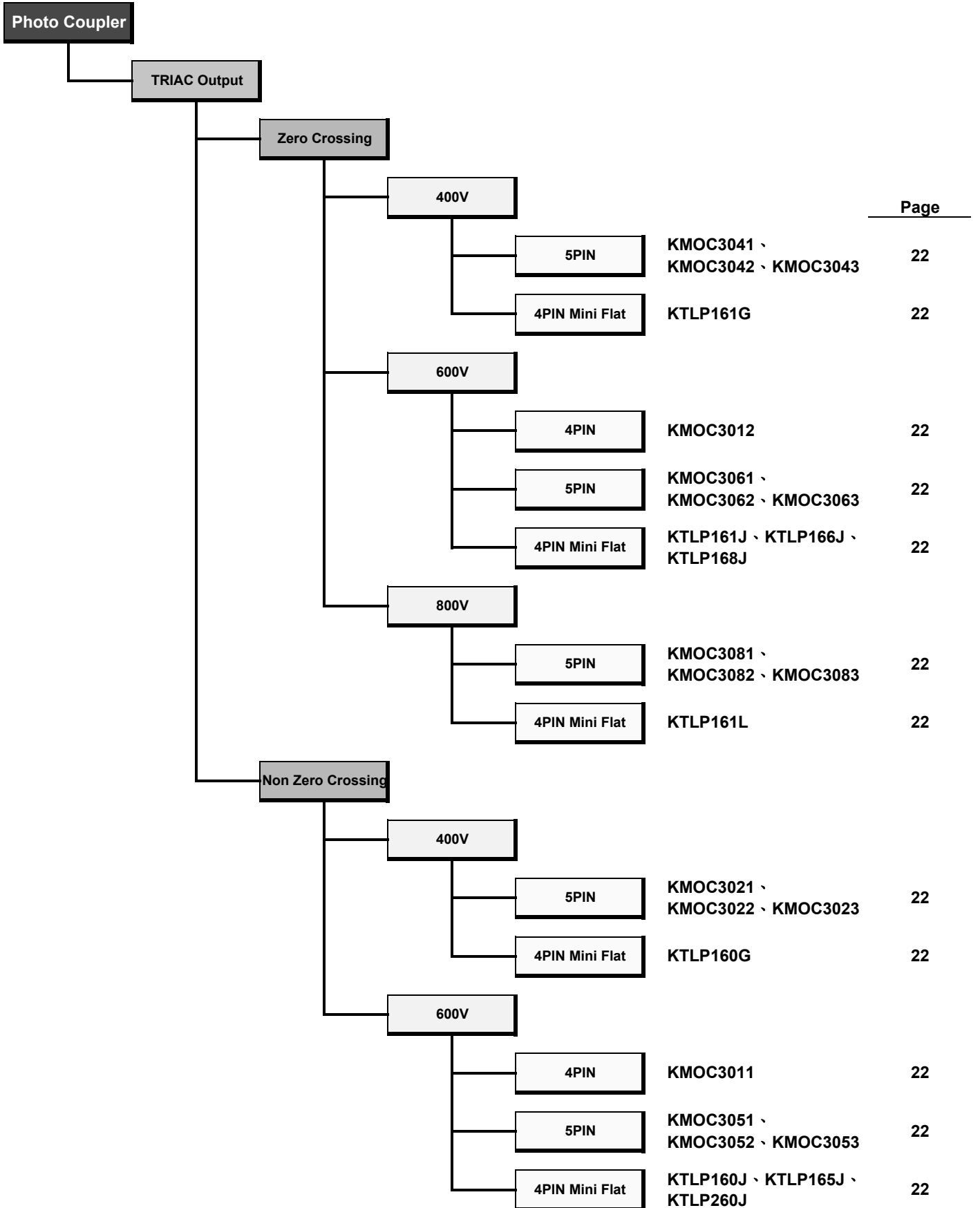


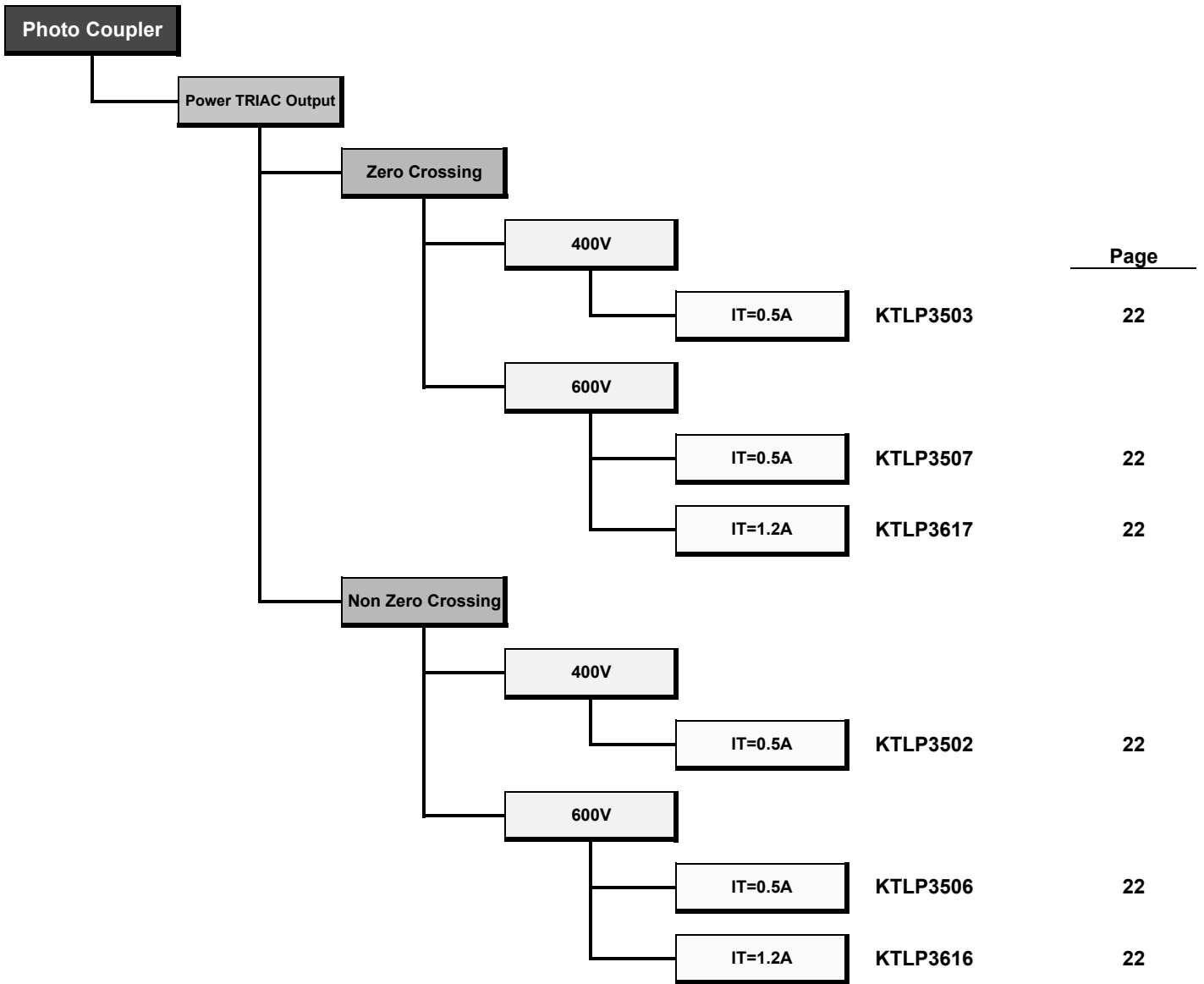


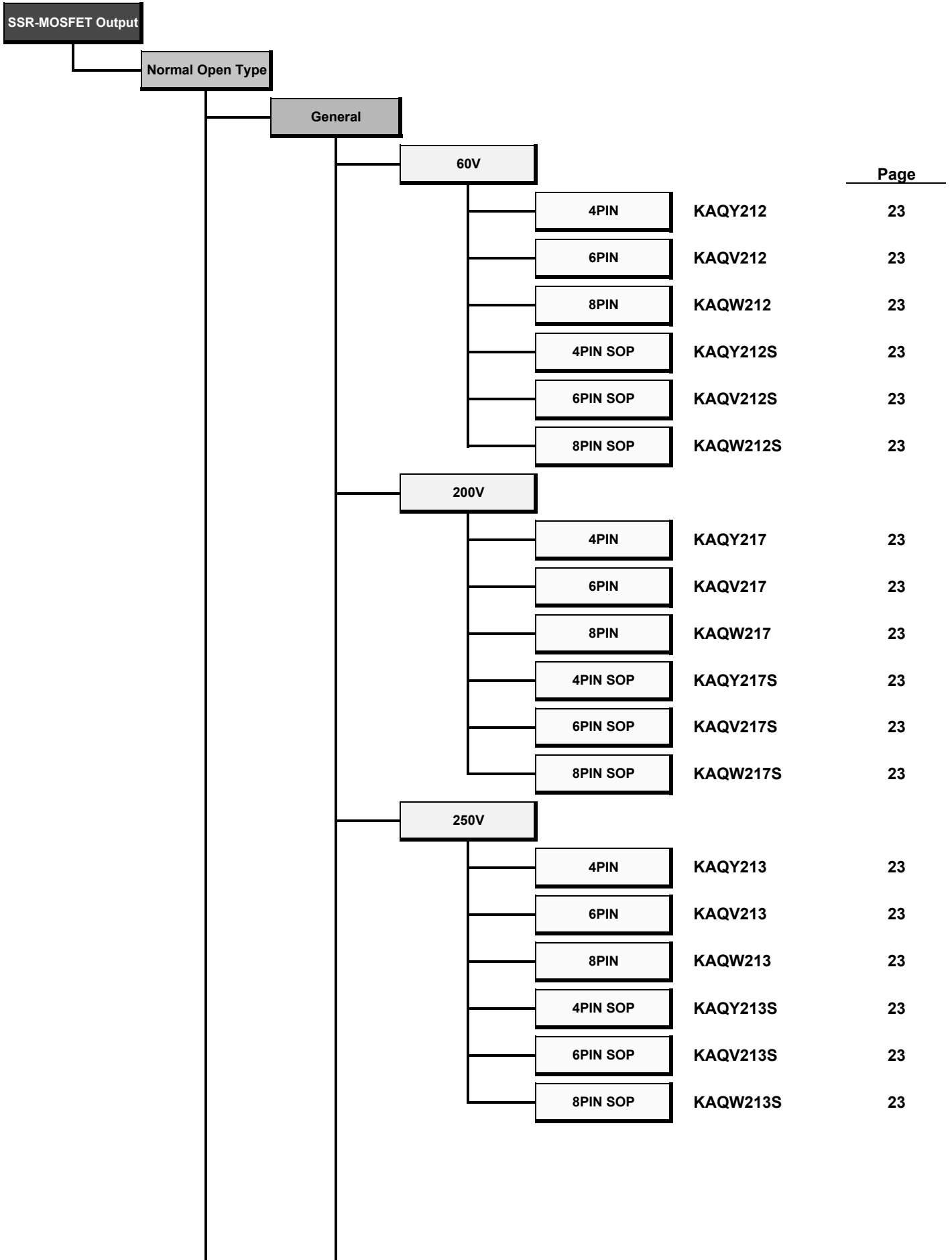






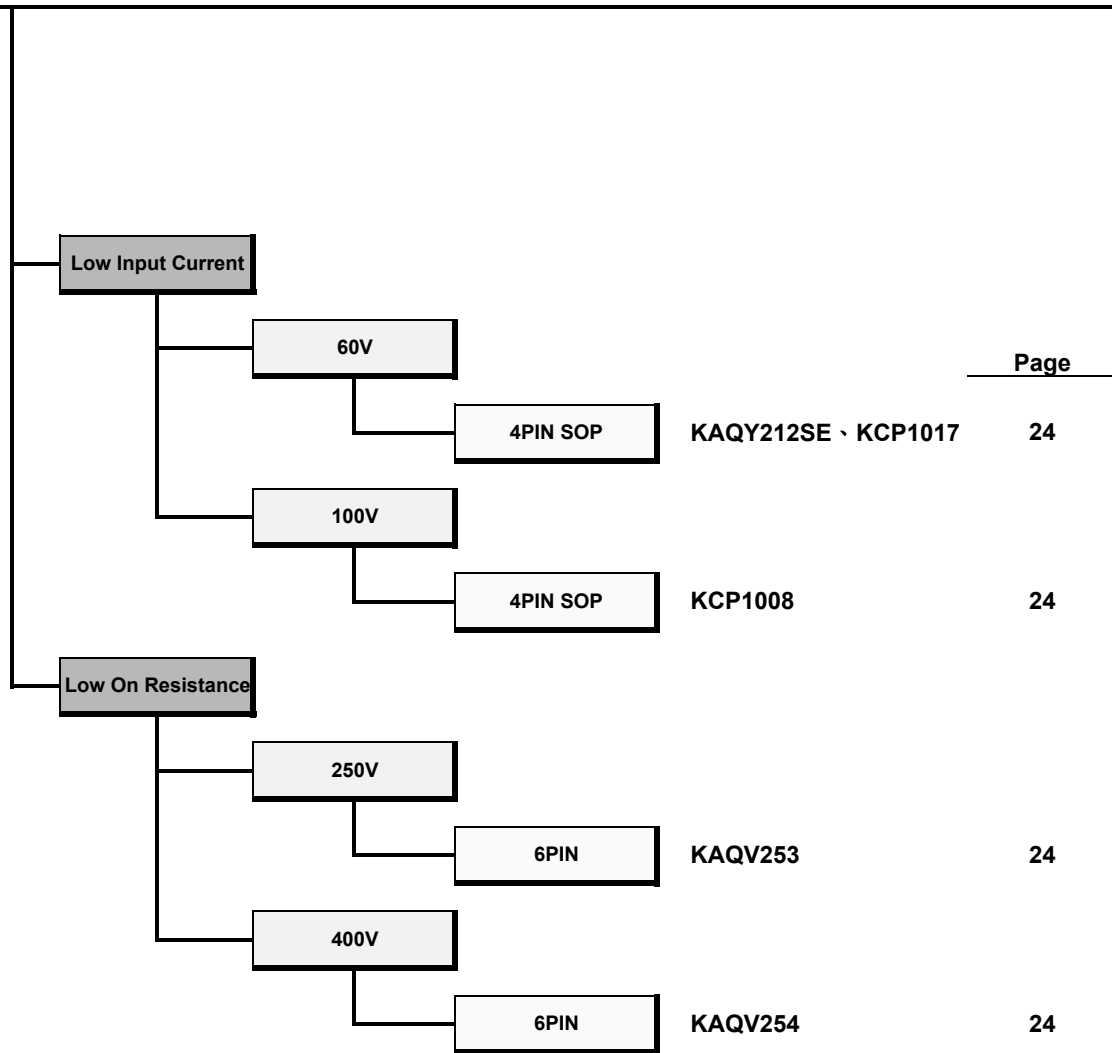


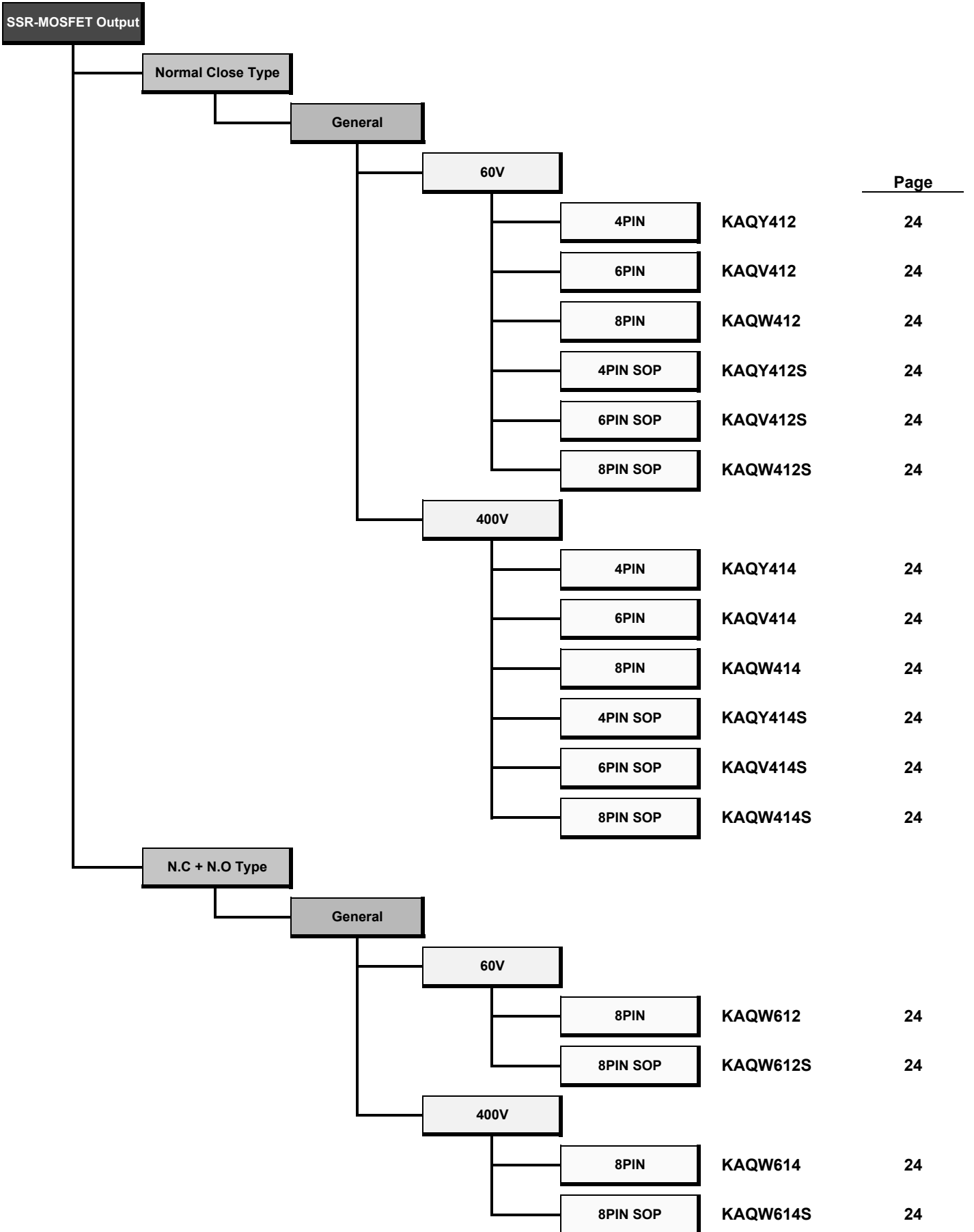


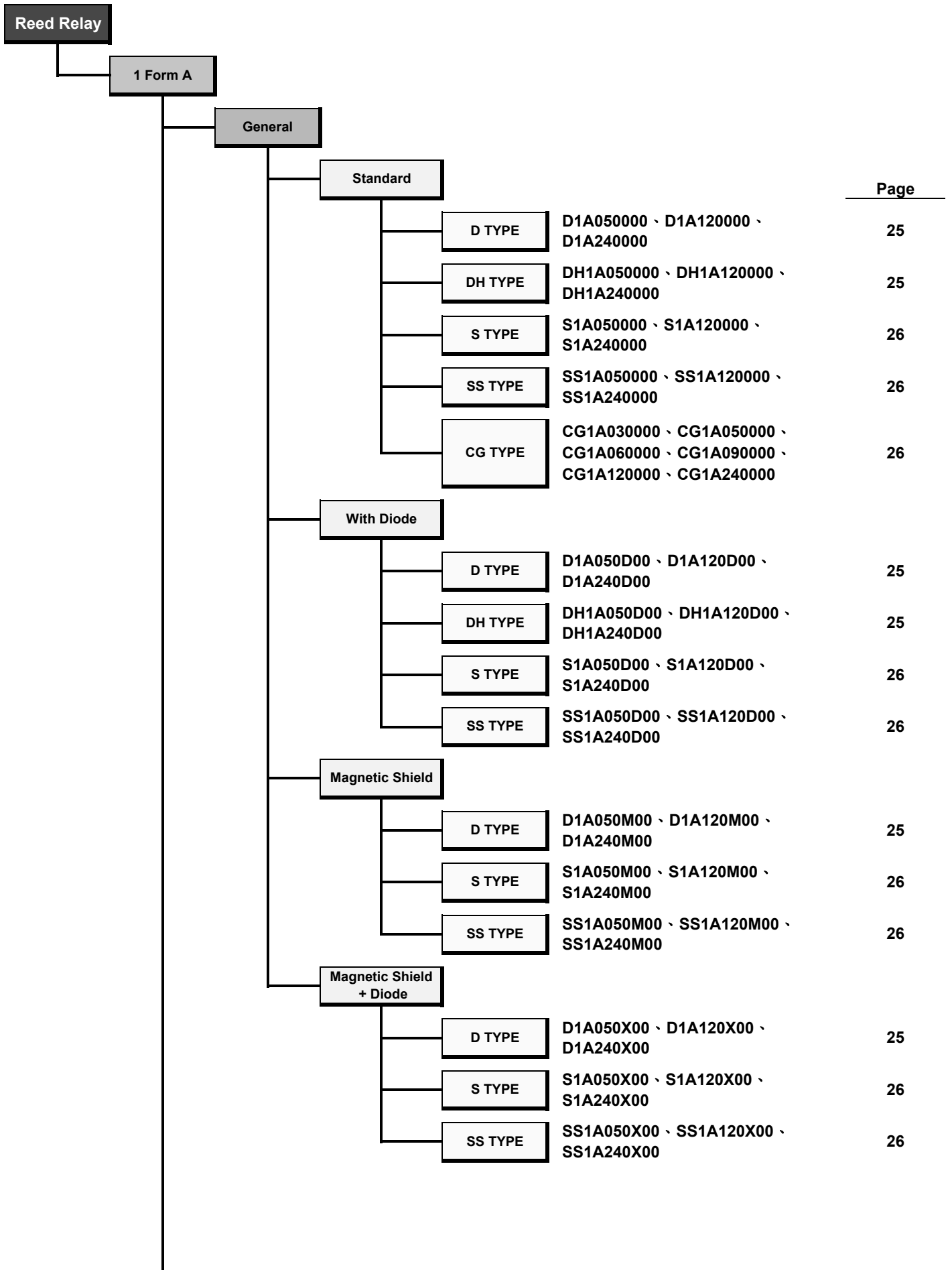


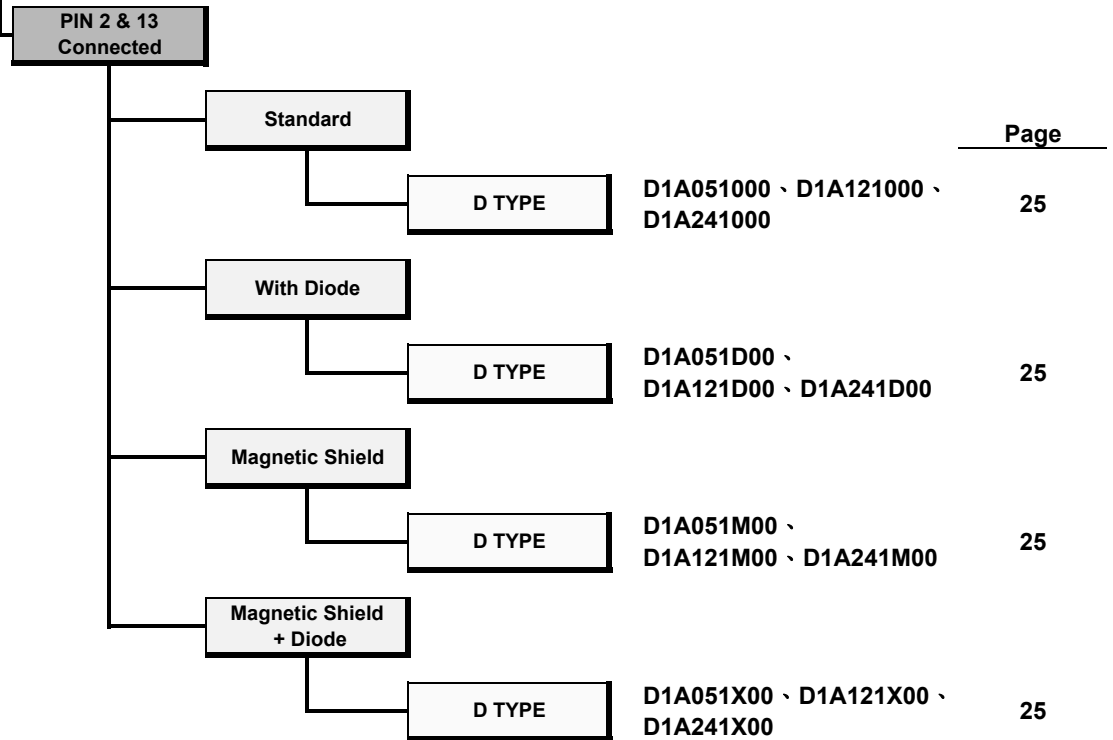


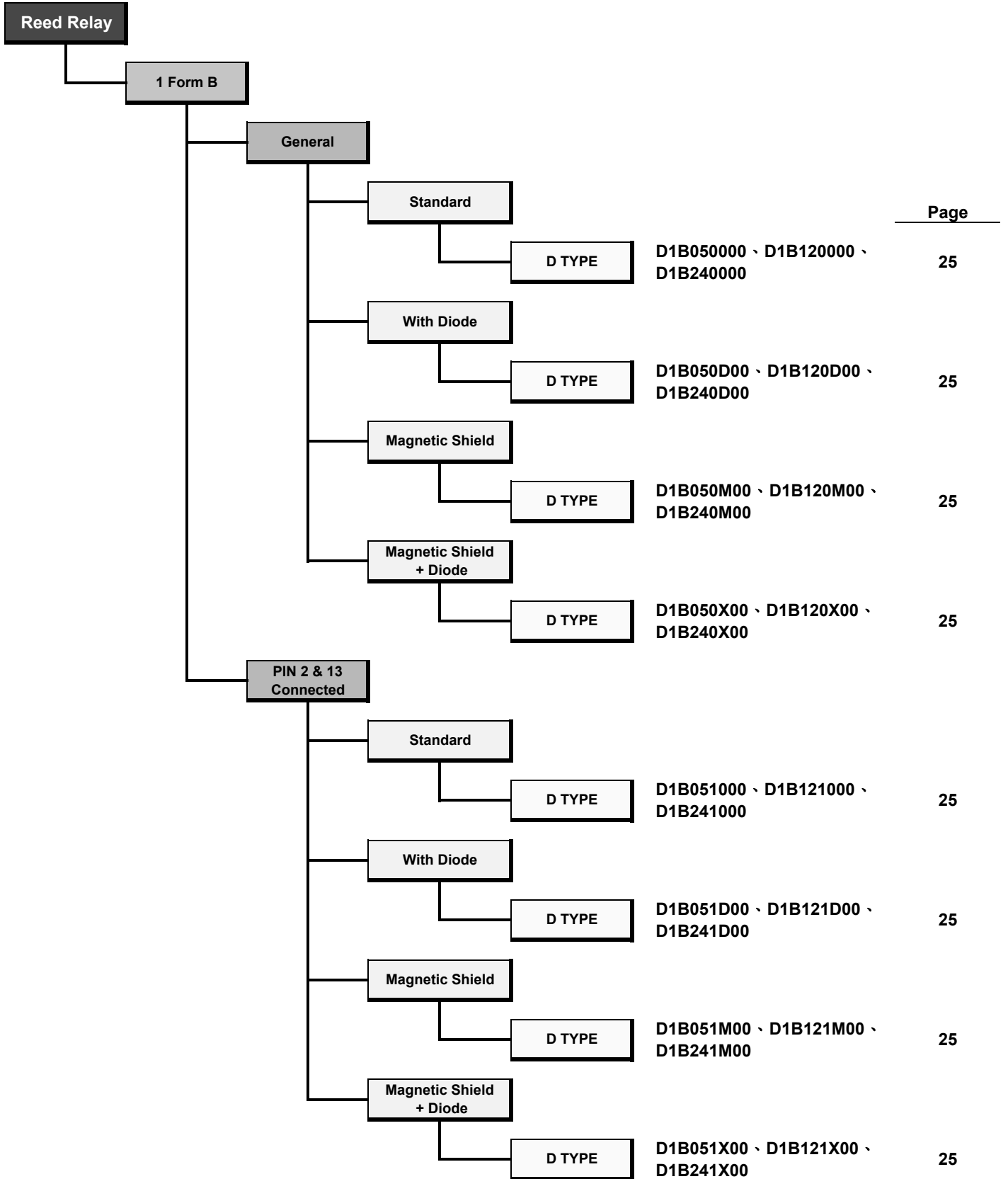
			<u>Page</u>
	<b>400V</b>		
	4PIN	KAQY214	23
	6PIN	KAQV214	23
	8PIN	KAQW214	23
	4PIN SOP	KAQY214S	23
	6PIN SOP	KAQV214S	23
	8PIN SOP	KAQW214S	23
	<b>600V</b>		
	4PIN	KAQY216	23
	6PIN	KAQV216	23
	8PIN	KAQW216	23
	4PIN SOP	KAQY216S	23
	6PIN SOP	KAQV216S	23
	8PIN SOP	KAQW216S	23

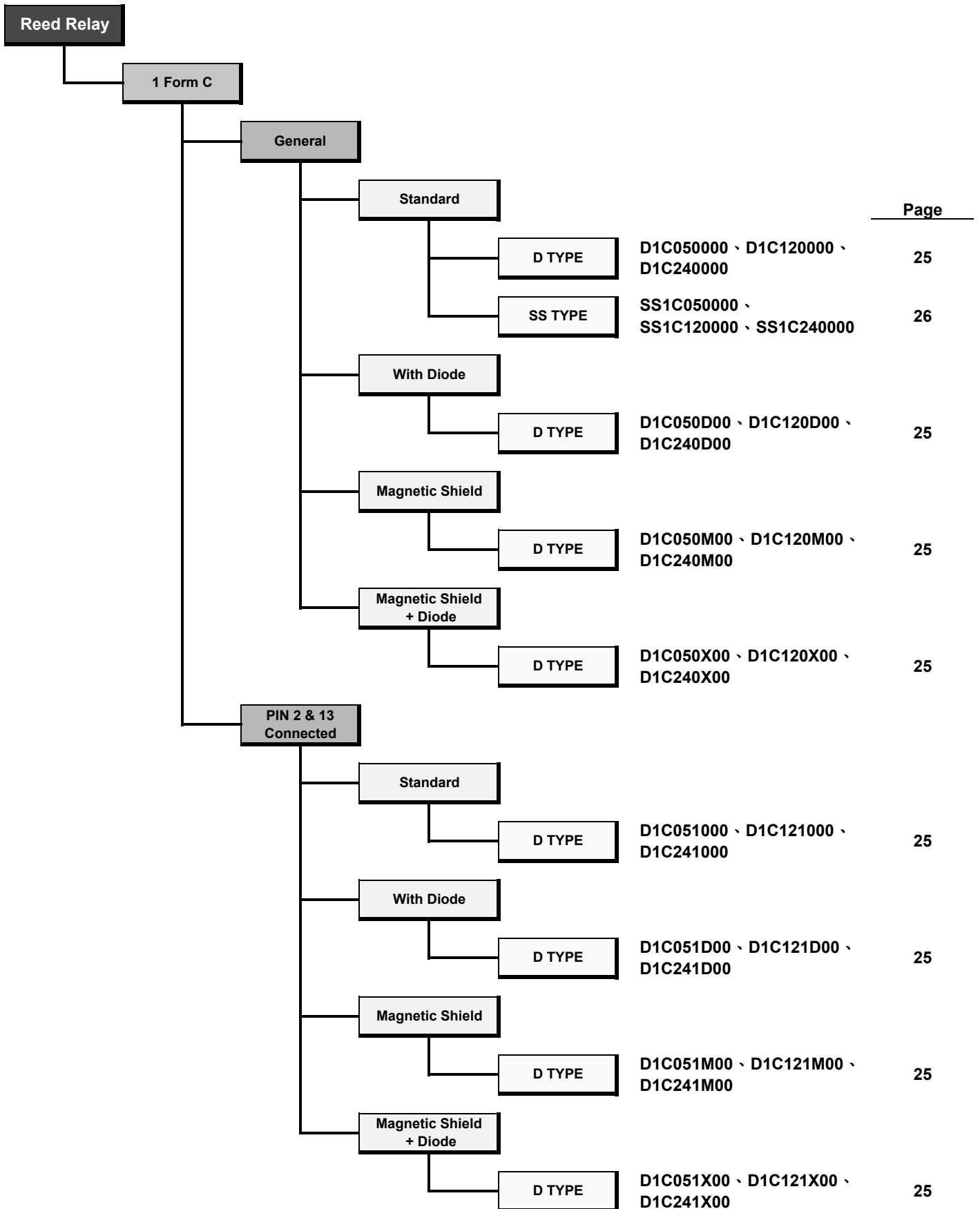


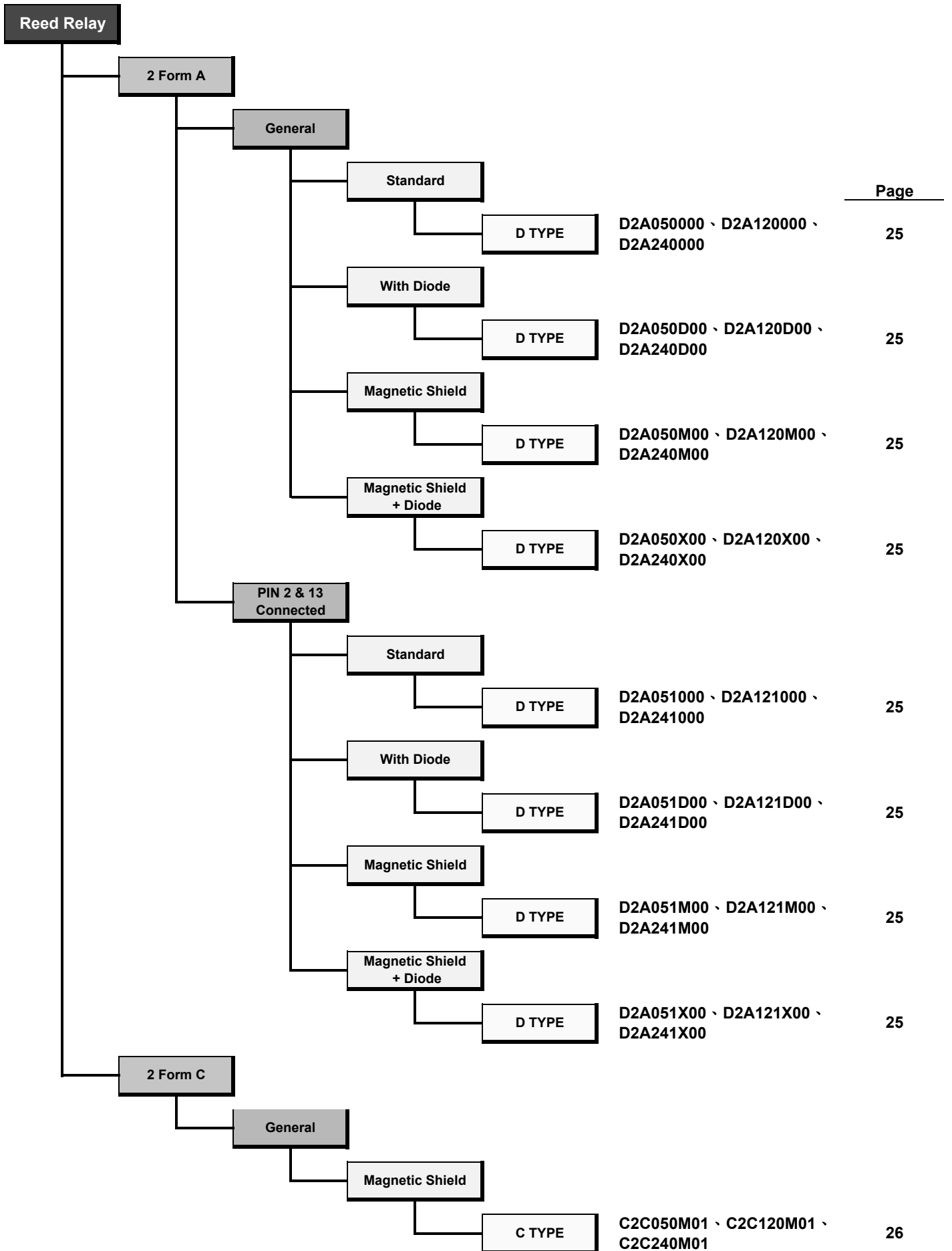




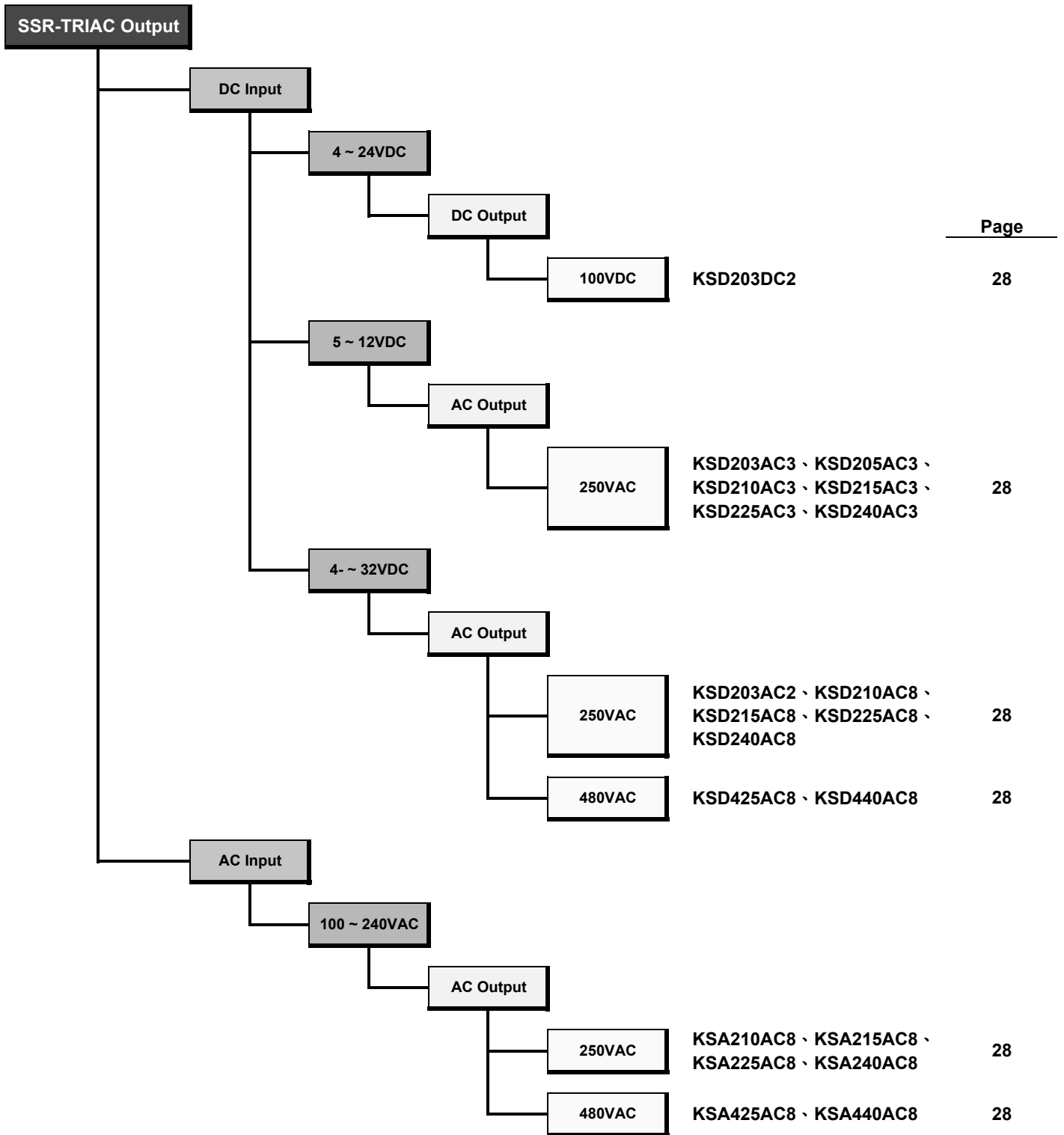


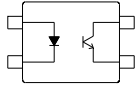
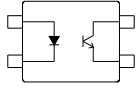
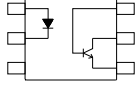
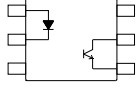
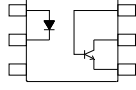
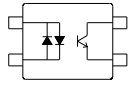
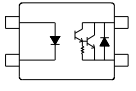
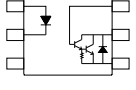
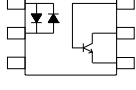
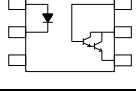
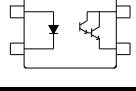




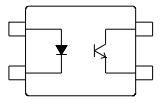
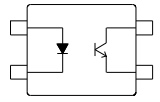
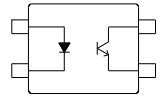
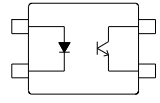
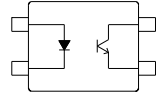
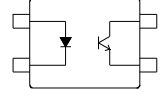
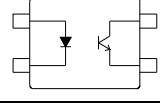
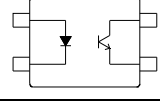
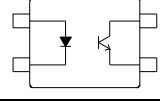
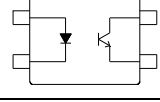
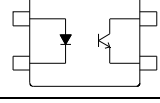
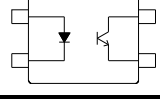


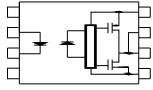
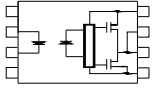
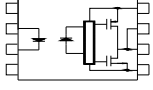


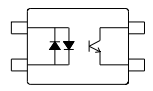
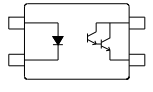
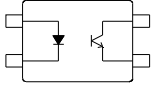
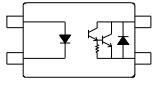


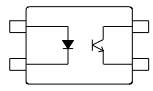
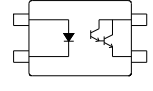
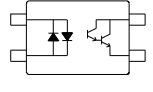
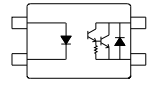
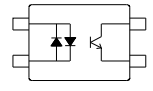
Transistor / Darlington Output													
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark	
		IF (mA)	V <sub>CE0</sub> (V)	IC (mA)	Viso (Vrms)	VF (V) Max.	CTR%		V <sub>CE(sat)</sub> (V) Max.	t <sub>r</sub> (us) Typ.	t <sub>f</sub> (us) Typ.	Series Product	Description
K1010		50	80	50	5000	1.4	50 ~ 600	IF=5mA V <sub>ce</sub> =5V	0.2	4	3	KP1020 KP1040	2-Channel 4-Channel
KP1210		50	350	50	5000	1.3	50 ~ 600	IF=5mA V <sub>ce</sub> =5V	0.4	3	2		
K2010		50	80	50	5000	1.4	60 ~ 600	IF=2mA V <sub>ce</sub> =5V	0.3	5	4		
KP2110		50	80	50	5000	1.4	60 ~ 600	IF=2mA V <sub>ce</sub> =5V	0.3	5	4		
KP2210		50	350	50	5000	1.3	50 ~ 600	IF=5mA V <sub>ce</sub> =5V	0.4	3	2		
K3010		± 50	80	50	5000	1.4	60 ~ 600	IF=±1mA V <sub>ce</sub> =5V	0.3	5	4	KP3020 KP3040	2-Channel 4-Channel
KP4010		50	300	150	5000	1.4	600 ~ 9000	IF=1mA V <sub>ce</sub> =2V	1.5	60	50	KP4020 KP4040	2-Channel 4-Channel
KP5010		50	300	150	5000	1.4	600 ~ 9000	IF=1mA V <sub>ce</sub> =2V	1.5	60	50		
KP6010		± 50	80	50	5000	1.4	60 ~ 600	IF=±1mA V <sub>ce</sub> =5V	0.3	5	4		
KPC4N33		50	30	150	5000	1.4	Min.500	IF=1mA V <sub>ce</sub> =2V	1.5	60	5		
KPC815		50	35	80	5000	1.4	600 ~ 7500	IF=1mA V <sub>ce</sub> =2V	1.0	5	60	KPC825 KPC845	2-Channel 4-Channel

## Low Input Current

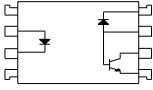
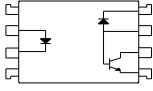
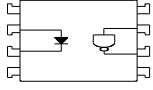
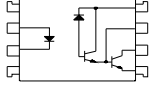
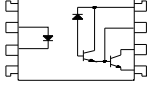
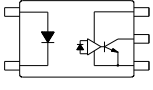
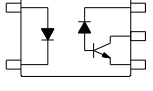
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	V <sub>CEO</sub> (V)	IC (mA)	Viso (Vrms)	V <sub>F</sub> (V) Max.	CTR%	V <sub>CE(sat)</sub> (V) Max.	t <sub>r</sub> (us) Typ.	t <sub>f</sub> (us) Typ.		
K1010T		50	80	50	5000	1.4	50 ~ 600	IF=1mA V <sub>ce</sub> =5V	0.2	4	3	
K1010W		50	80	50	5000	1.8	50 ~ 600	IF=0.5mA V <sub>ce</sub> =5V	0.2	4	3	
K1010Z		50	80	50	5000	1.8	50 ~ 600	IF=0.1mA V <sub>ce</sub> =5V	0.2	4	3	
KPC357NT0T		50	80	50	3750	1.4	100 ~ 600	IF=1mA V <sub>ce</sub> =5V	0.2	4	3	
KPC357NT0W		50	80	50	3750	1.8	100 ~ 600	IF=0.5mA V <sub>ce</sub> =5V	0.2	4	3	
KPC357NT0Z		50	80	50	3750	1.8	100 ~ 600	IF=0.1mA V <sub>ce</sub> =5V	0.2	4	3	
KPS28010T		50	80	50	3750	1.4	100 ~ 600	IF=1mA V <sub>ce</sub> =5V	0.2	4	3	
KPS28010W		50	80	50	3750	1.8	100 ~ 600	IF=0.5mA V <sub>ce</sub> =5V	0.2	4	3	
KPS28010Z		50	80	50	3750	1.8	100 ~ 600	IF=0.1mA V <sub>ce</sub> =5V	0.2	4	3	
KT101T		50	80	50	5000	1.4	50 ~ 600	IF=1mA V <sub>CE</sub> =5V	0.2	4	3	
KT101W		50	80	50	5000	1.8	50 ~ 600	IF=0.5mA V <sub>CE</sub> =5V	0.3	11	11	
KT101Z		50	80	50	5000	1.8	50 ~ 600	IF=0.1mA V <sub>CE</sub> =5V	0.3	11	11	

IC Output												
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	V <sub>CC</sub> (V)	IO (A)	V <sub>iso</sub> (Vrms)	ICCL (mA) Typ.	ICCH (mA) Typ.	IFLH (mA) Max.	VFHL (V) Min.	TPHL (us) Typ.	TPLH (us) Typ.	
KP1510		20	35	2.5	5000	2.5	2.5	5	0.7	0.3	0.3	
KTLP250		20	35	±1.5	5000	7.5	7	5	0.8	0.15	0.15	
KTLP350		20	35	±2.5	5000	2	2	5	0.8	0.26	0.26	

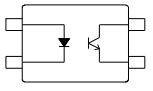
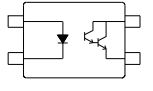
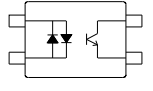
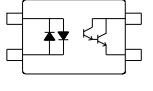
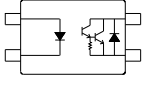
Mini Flat Type												
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	V <sub>CEO</sub> (V)	IC (mA)	V <sub>iso</sub> (Vrms)	VF (V) Max.	CTR%	VCE(sat) (V) Max.	t <sub>r</sub> (us) Typ.	t <sub>f</sub> (us) Typ.		
KPC354NT		±50	80	50	3750	1.4	20 ~ 400	IF=±1mA Vce=5V	0.3	4	3	
KPC355NT		50	35	150	3750	1.4	600~7500	IF=1mA Vce=2V	1.0	60	53	
KPC357NT		50	80	50	3750	1.4	50 ~ 600	IF=5mA Vce=5V	0.3	5	4	
KPC452		50	300	150	3750	1.4	Min.1000	IF=1mA Vce=2V	1.5	100	20	

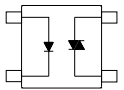
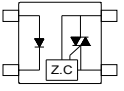
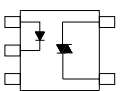
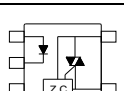
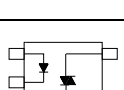
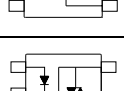
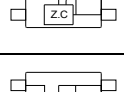
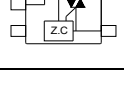
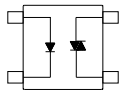
4LSOP Type												
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	V <sub>CEO</sub> (V)	IC (mA)	V <sub>iso</sub> (Vrms)	VF (V) Max.	CTR%	VCE(sat) (V) Max.	t <sub>r</sub> (us) Typ.	t <sub>f</sub> (us) Typ.		
KT101X		50	80	50	5000	1.4	50 ~ 600	IF=5mA VCE=5V	0.3	5	4	
KT1210		50	35	150	5000	1.4	Min.200	IF=1mA VCE=2V	1	200	200	
KT1310		±50	35	150	5000	1.4	Min.200	IF=±1mA VCE=2V	1	200	200	
KT1410		50	300	150	5000	1.4	Min.1000	IF=1mA VCE=2V	1.5	100	20	
KT1610		±50	80	50	5000	1.4	50 ~ 300	IF=±5mA VCE=5V	0.3	5	4	

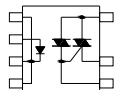
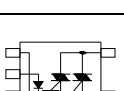
**High Speed Output**

Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	Vcc (V)	IO (mA)	Viso (Vrms)	Data Rate	CTR%	CMR (V/uS) Typ.	TPHL (us) Typ.	TPLH (us) Typ.		
KPC6N135		25	15	8	5000	1M	Min.7	IF=16mA Vo=0.4V Vcc=4.5V	1000	0.3	0.4	
KPC6N136		25	15	8	5000	1M	Min.19	IF=16mA Vo=0.4V Vcc=4.5V	1000	0.3	0.3	
KPC6N137		25	7	50	5000	10M	-	-	500	0.045	0.045	
KPC6N138		20	7	60	5000	-	Min.300	IF=1.6mA Vo=0.4V Vcc=4.5V	500	2	7	
KPC6N139		20	18	60	5000	-	Min.500	IF=1.6mA Vo=0.4V Vcc=4.5V	500	5	10	
KPC410		25	7	50	3750	10M	-	-	500	0.045	0.045	
KPC457		25	30	8	3750	1M	Min.19	IF=16mA Vo=0.4V Vcc=4.5V	30K	0.2	0.4	

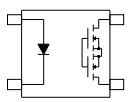
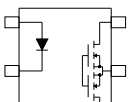
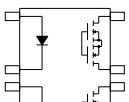
**4SSOP Type**

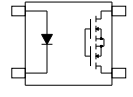
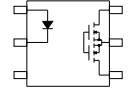
Model Number	Schematic	Absolute Maximum Ratings				Electro-optical Characteristics						Remark
		IF (mA)	VCEO (V)	IC (mA)	Viso (Vrms)	VF (V) Max.	CTR%	VCE(sat) (V) Max.	tr (us) Typ.	tf (us) Typ.		
KPS2801		50	80	50	3750	1.4	50 ~ 600	IF=5mA Vce=5V	0.3	3	5	
KPS2802		50	40	90	3750	1.4	Min.200	IF=1mA Vce=2V	1.0	200	200	
KPS2805		±50	80	50	3750	1.4	50 ~ 600	IF=±5mA Vce=5V	0.3	3	5	
KPS2806		±50	40	90	3750	1.4	Min.200	IF=±1mA Vce=2V	1.0	200	200	
KPS2832		50	300	60	3750	1.4	Min.400	IF=1mA Vce=2V	1.0	100	20	

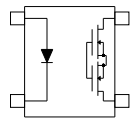
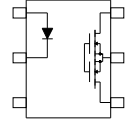
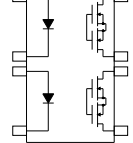
Triac Output											
Model Number	Schematic	Absolute Maximum Ratings			Electro-Optical Characteristics						Remark
		$I_F$ (mA)	$V_{DRM}$ (Vpeak)	$V_{ISO}$ (Vrms)	$V_F$ (V) Max.	$I_{DRM}$ (nA) Max.	$I_{FT}$ (mA) Max.	$V_{TM}$ (V) Max.	$V_{INH}$ (V) Max.	dv/dt (V/us) Min.	
KMOC3011		50	600	5300	1.4	500	10	3	-	1000	
KMOC3012		50	600	5300	1.4	500	10	3	20	1000	
KMOC3021		50	400	5300	1.4	100	15	3	-	1000	
KMOC3022							10				
KMOC3023							5				
KMOC3041		50	400	5300	1.4	500	15	3	20	1000	
KMOC3042							10				
KMOC3043							5				
KMOC3051		50	600	5300	1.4	500	15	3	-	1000	
KMOC3052							10				
KMOC3053							5				
KMOC3061		50	600	5300	1.4	500	15	3	20	1000	
KMOC3062							10				
KMOC3063							5				
KMOC3081		50	800	5300	1.4	500	15	3	20	1000	
KMOC3082							10				
KMOC3083							5				
KTLP160G		50	400	3750	1.4	1000	10	3	-	1000	
KTLP160J		50	600	3750	1.4	1000	10	3	-	1000	
KTLP165J		50	600	3750	1.4	1000	10	3	-	1000	
KTLP260J		50	600	3750	1.4	1000	10	3	-	1000	
KTLP161G		50	400	3750	1.4	1000	10	3	20	1000	
KTLP161J		50	600	3750	1.4	1000	10	3	20	1000	
KTLP166J		50	600	3750	1.4	1000	10	3	20	1000	
KTLP168J		50	600	3750	1.4	1000	3	3	20	1000	
KTLP161L		50	800	3750	1.4	1000	10	3	20	1000	

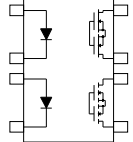
Power Triac Output												
Model Number	Schematic	Absolute Maximum Ratings				Electro-Optical Characteristics						Remark
		$I_F$ (mA)	$V_{DRM}$ (Vpeak)	$I_T$ (Arms)	$V_{ISO}$ (Vrms)	$V_F$ (V) Max.	$I_{DRM}$ (uA) Max.	$I_{FT}$ (mA) Max.	$V_{TM}$ (V) Max.	$V_{INH}$ (V) Max.	dv/dt (V/us) Min.	
KTLP3502		50	400	0.5	5300	1.4	100	10	3	-	200	
KTLP3506			600	1.2								
KTLP3616			600	1.2								
KTLP3503		50	400	0.5	5300	1.4	100	10	3	50	200	
KTLP3507			600	1.2								
KTLP3617			600	1.2								

## Normal Open Type

Model Number	Schematic	Absolute Maximum Ratings			Electro-Optical Characteristics							Remark
		V <sub>B</sub> (V)	I <sub>L</sub> (mA)	V <sub>ISO</sub> (Vrms)	V <sub>F</sub> (V) Max.	I <sub>FON</sub> (mA) Max.	I <sub>FOFF</sub> (mA) Min.	I <sub>TOFF</sub> (μA) Max.	R <sub>ON</sub> (Ω) Typ.	T <sub>ON</sub> (mS) Max.	T <sub>OFF</sub> (mS) Max.	
KAQY212S		60	400	1500	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQY212			400	5000	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQY217S		200	180	1500	1.5	3.0	0.2	1.0	6	1.0	1.0	
KAQY217			180	5000	1.5	3.0	0.2	1.0	6	1.0	1.0	
KAQY213S		250	200	1500	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQY213			200	5000	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQY214S		400	130	1500	1.5	3.0	0.2	1.0	20	1.0	1.0	
KAQY214			130	5000	1.5	3.0	0.2	1.0	20	1.0	1.0	
KAQY216S		600	120	1500	1.5	3.0	0.2	1.0	35	1.0	1.5	
KAQY216			120	5000	1.5	3.0	0.2	1.0	35	1.0	1.5	
KAQV212S		60	400	1500	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQV212			400	5000	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQV217S		200	180	1500	1.5	3.0	0.2	1.0	6	1.0	1.5	
KAQV217			180	5000	1.5	3.0	0.2	1.0	6	1.0	1.5	
KAQV213S		250	200	1500	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQV213			200	5000	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQV214S		400	130	1500	1.5	3.0	0.2	1.0	20	1.0	1.5	
KAQV214			130	5000	1.5	3.0	0.2	1.0	20	1.0	1.5	
KAQV216S		600	120	1500	1.5	3.0	0.2	1.0	35	1.0	1.5	
KAQV216			120	5000	1.5	3.0	0.2	1.0	35	1.0	1.5	
KAQW212S		60	400	1500	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQW212			400	5000	1.5	3.0	0.2	1.0	0.83	1.5	1.5	
KAQW217S		200	180	1500	1.5	3.0	0.2	1.0	6	1.0	1.0	
KAQW217			180	5000	1.5	3.0	0.2	1.0	6	1.0	1.0	
KAQW213S		250	200	1500	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQW213			200	5000	1.5	3.0	0.2	1.0	8	1.0	1.5	
KAQW214S		400	130	1500	1.5	3.0	0.2	1.0	20	1.0	1.0	
KAQW214			130	5000	1.5	3.0	0.2	1.0	20	1.0	1.0	
KAQW216S		600	120	1500	1.5	3.0	0.2	1.0	35	1.0	1.5	
KAQW216			120	5000	1.5	3.0	0.2	1.0	35	1.0	1.5	

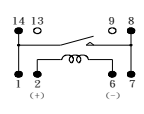
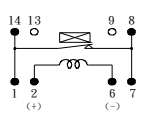
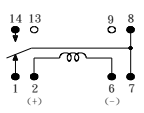
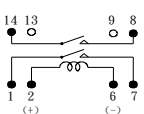
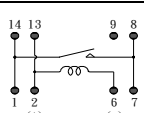
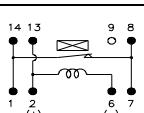
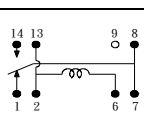
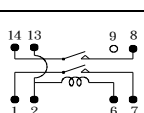
Normal Open / Low Input Current & ON Resistance Type												
Model Number	Schematic	Absolute Maximum Ratings			Electro-Optical Characteristics							
		V <sub>B</sub> (V)	I <sub>L</sub> (mA)	V <sub>ISO</sub> (Vrms)	V <sub>F</sub> (V) Max.	I <sub>FON</sub> (mA) Max.	V <sub>FOFF</sub> (V) Min.	I <sub>FOFF</sub> (mA) Min.	I <sub>TOFF</sub> (μA) Max.	R <sub>ON</sub> (Ω) Typ.	T <sub>ON</sub> (mS) Max.	T <sub>OFF</sub> (mS) Max.
KAQY212SE		60	200	1500	1.5	2.0	0.2	—	1.0	7	1.5	1.0
KCP1017		60	130	1500	1.5	1.0	0.5	—	1.0	7	1.0	1.0
KCP1008		100	150	1500	1.5	2.0	—	0.2	1.0	6	2.0	1.0
KAQV253		250	200	5000	1.5	3.0	—	0.2	1.0	5	1.0	1.5
KAQV254		400	150	5000	1.5	3.0	—	0.2	1.0	12	1.0	1.5

Normal Close Type													
Model Number	Schematic	Absolute Maximum Ratings			Electro-Optical Characteristics								Remark
		V <sub>B</sub> (V)	I <sub>L</sub> (mA)	V <sub>ISO</sub> (Vrms)	V <sub>F</sub> (V) Max.	I <sub>FOFF</sub> (mA) Max.	I <sub>FON</sub> (mA) Min.	I <sub>TOFF</sub> (μA) Max.	R <sub>ON</sub> (Ω) Typ.	T <sub>ON</sub> (mS) Max.	T <sub>OFF</sub> (mS) Max.		
KAQY412S		60	200	1500	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQY412			200	5000	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQY414S		400	130	1500	1.5	3.0	0.2	2.0	25	1.5	1.0		
KAQY414			130	5000	1.5	3.0	0.2	2.0	25	1.5	1.0		
KAQV412S		60	200	1500	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQV412			200	5000	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQV414S		400	130	1500	1.5	3.0	0.2	2.0	25	1.5	1.0		
KAQV414			130	5000	1.5	3.0	0.2	2.0	25	1.5	1.0		
KAQW412S		60	200	1500	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQW412			200	5000	1.5	3.0	0.2	2.0	2.5	1.5	1.5		
KAQW414S		400	130	1500	1.5	3.0	0.2	2.0	25	1.5	1.0		
KAQW414			130	5000	1.5	3.0	0.2	2.0	25	1.5	1.0		

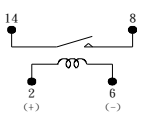
Normal Close + Normal Open Type													
Model Number	Schematic	Absolute Maximum Ratings			Electro-Optical Characteristics								Remark
		V <sub>B</sub> (V)	I <sub>L</sub> (mA)	V <sub>ISO</sub> (Vrms)	V <sub>F</sub> (V) Max.	I <sub>FON</sub> (mA) Max./Min.	I <sub>FOFF</sub> (mA) Min./Max.	I <sub>TOFF</sub> (μA) Max.	R <sub>ON</sub> (Ω) Typ.	T <sub>ON</sub> (mS) Max.	T <sub>OFF</sub> (mS) Max.		
KAQW612S		60	200	1500	1.5	N.O=3.0 N.C=0.2	N.O=0.2 N.C=3.0	N.O=1.0 N.C=2.0	N.O=0.83 N.C=2.50	N.O=1.5 N.C=1.5	N.O=1.5 N.C=1.5		
KAQW612			200	5000	1.5	N.O=3.0 N.C=0.2	N.O=0.2 N.C=3.0	N.O=1.0 N.C=2.0	N.O=0.83 N.C=2.50	N.O=1.5 N.C=1.5	N.O=1.5 N.C=1.5		
KAQW614S		400	130	1500	1.5	N.O=3.0 N.C=0.2	N.O=0.2 N.C=3.0	N.O=1.0 N.C=2.0	N.O=20 N.C=25	N.O=1.0 N.C=1.0	N.O=1.5 N.C=1.5		
KAQW614			130	5000	1.5	N.O=3.0 N.C=0.2	N.O=0.2 N.C=3.0	N.O=1.0 N.C=2.0	N.O=20 N.C=25	N.O=1.0 N.C=1.0	N.O=1.5 N.C=1.5		



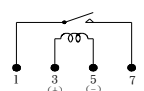
**D Type**

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% $\Omega$	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (m $\Omega$ max)	Insulation Resistance ( $\Omega$ min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
D1A050000		1 form A	500	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D1A120000		1 form A	1000	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D1A240000		1 form A	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500
D1B050000		1 form B	500	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D1B120000		1 form B	1000	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D1B240000		1 form B	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500
D1C050000		1 form C	200	5	3.75	1.0	150	$10^9$	3	100	0.25	500
D1C120000		1 form C	500	12	9	1.2	150	$10^9$	3	100	0.25	500
D1C240000		1 form C	2150	24	18	2.4	150	$10^9$	3	100	0.25	500
D2A050000		2 form A	140	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D2A120000		2 form A	500	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D2A240000		2 form A	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500
D1A051000		1 form A	500	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D1A121000		1 form A	1000	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D1A241000		1 form A	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500
D1B051000		1 form B	500	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D1B121000		1 form B	1000	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D1B241000		1 form B	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500
D1C051000		1 form C	200	5	3.75	1.0	150	$10^9$	3	100	0.25	500
D1C121000		1 form C	500	12	9	1.2	150	$10^9$	3	100	0.25	500
D1C241000		1 form C	2150	24	18	2.4	150	$10^9$	3	100	0.25	500
D2A051000		2 form A	140	5	3.75	1.0	100	$10^{11}$	10	200	0.5	500
D2A121000		2 form A	500	12	9	1.2	100	$10^{11}$	10	200	0.5	500
D2A241000		2 form A	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	500

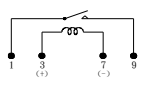
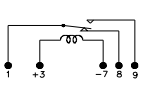
**DH Type**

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% $\Omega$	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (m $\Omega$ max)	Insulation Resistance ( $\Omega$ min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VAC min)
DH1A050000		1 form A	500	5	3.75	1.0	100	$10^{11}$	10	200	0.5	4000
DH1A120000		1 form A	1000	12	9	1.2	100	$10^{11}$	10	200	0.5	4000
DH1A240000		1 form A	2150	24	18	2.4	100	$10^{11}$	10	200	0.5	4000

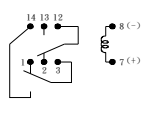
S Type

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% Ω	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (mΩ max)	Insulation Resistance (Ω min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
S1A050000		1 form A	500	5	3.75	1.0	100	10 <sup>11</sup>	10	200	0.5	1000
S1A120000		1 form A	1000	12	9	1.2	100	10 <sup>11</sup>	10	200	0.5	1000
S1A240000		1 form A	2000	24	18	2.4	100	10 <sup>11</sup>	10	200	0.5	1000

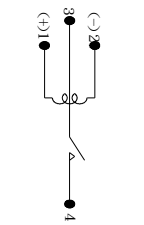
SS Type

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% Ω	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (mΩ max)	Insulation Resistance (Ω min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
SS1A050000		1 form A	500	5	3.75	1.0	100	10 <sup>11</sup>	10	200	0.5	2500
SS1A120000		1 form A	1000	12	9	1.2	100	10 <sup>11</sup>	10	200	0.5	2500
SS1A240000		1 form A	2000	24	18	2.4	100	10 <sup>11</sup>	10	200	0.5	2500
SS1C050000		1 form C	200	5	3.75	1.0	150	10 <sup>9</sup>	3	100	0.25	1000
SS1C120000		1 form C	500	12	9	1.2	150	10 <sup>9</sup>	3	100	0.25	1000
SS1C240000		1 form C	2000	24	18	2.4	150	10 <sup>9</sup>	3	100	0.25	1000


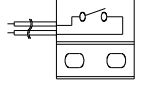
C Type

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% Ω	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (mΩ max)	Insulation Resistance (Ω min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
C2C050M01		2 form C	200	5	3.75	0.75	150	10 <sup>10</sup>	3	175	0.25	4000
C2C120M01		2 form C	500	12	9	1.8	150	10 <sup>9</sup>	3	100	0.25	4000
C2C240M01		2 form C	2000	24	18	3.6	150	10 <sup>9</sup>	3	100	0.25	4000

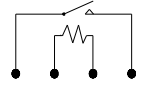
CG Type

Model Number	Schematic	Contact Form	Coil Ratings				Electrical Characteristics					
			Coil Resistance +/- 10% Ω	Nominal Coil Voltage (VDC)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (mΩ max)	Insulation Resistance (Ω min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
CG1A030000		1 form A	63	3	2.1	0.3	150	10 <sup>9</sup>	10	100	0.5	3000
CG1A050000		1 form A	500	5	3.5	0.5	150	10 <sup>9</sup>	10	100	0.5	3000
CG1A060000		1 form A	250	6	4.2	0.6	150	10 <sup>9</sup>	10	100	0.5	3000
CG1A090000		1 form A	700	9	6.3	0.9	150	10 <sup>9</sup>	10	100	0.5	3000
CG1A120000		1 form A	1050	12	8.4	1.2	150	10 <sup>9</sup>	10	100	0.5	3000
CG1A240000		1 form A	2080	24	16.8	2.4	150	10 <sup>9</sup>	10	100	0.5	3000

**Proximity Sensor Type**

Model Number	Schematic	Contact Form	Coil Resistance +/- 10% $\Omega$	Total Pull-In Sensitivity (AT)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (m $\Omega$ max)	Insulation Resistance ( $\Omega$ min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
P3-1A15		1 form A	—	10-40	—	—	150	$10^9$	1	24	0.1	150
P3-1A16		1 form A	—	10-40	—	—	150	$10^9$	1	24	0.1	150
P3-1A17		1 form A	—	10-40	—	—	150	$10^9$	1	24	0.1	150
P1-1A15 P010		1 form A	—	—	—	—	200	—	10	200	0.5	250

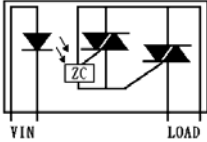
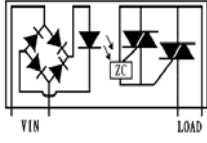
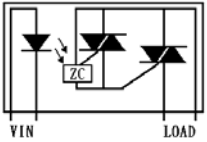
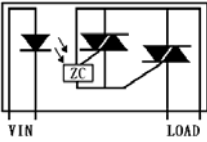
**Reed Sensor - MK Type**

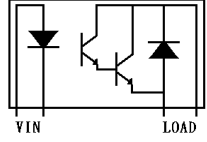
Model Number	Schematic	Contact Form	Resistance +/- 10% $\Omega$	Total Pull-In Sensitivity (AT)	Must Operate (VDC)	Must Release (VDC)	Contact Resistance (m $\Omega$ max)	Insulation Resistance ( $\Omega$ min)	Power Consumption (VA max)	Switching Voltage (VDC max)	Switching Current (A max)	Breakdown Voltage (VDC min)
MK-0150		1 form A	150	10-40	-	-	150	$10^9$	1	24	0.1	150

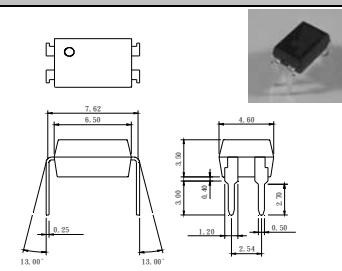
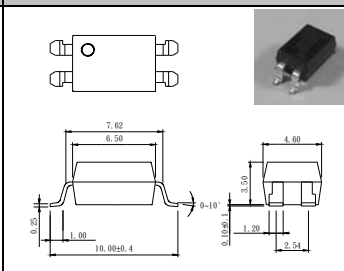
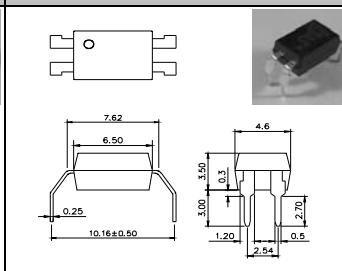
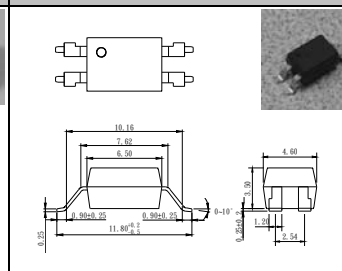
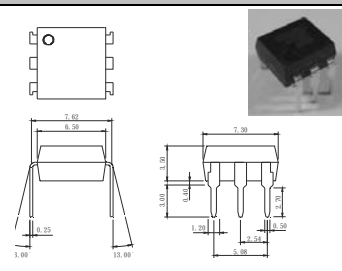
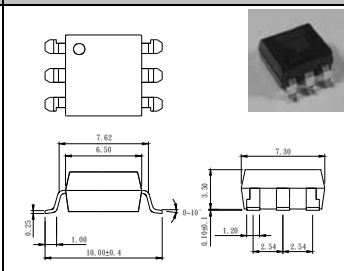
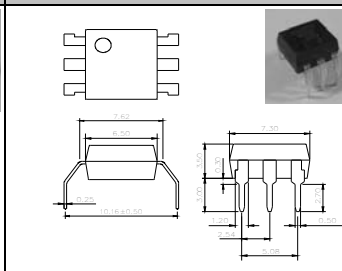
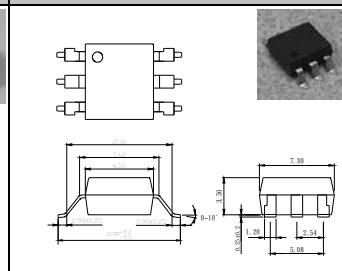
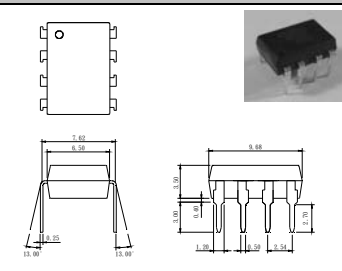
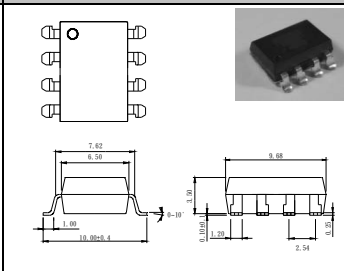
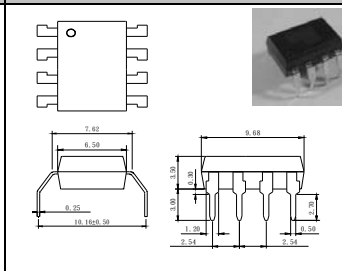
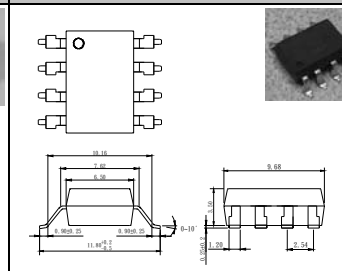
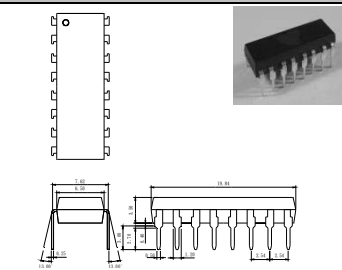
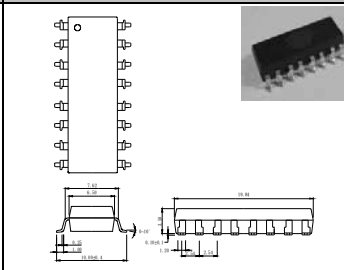
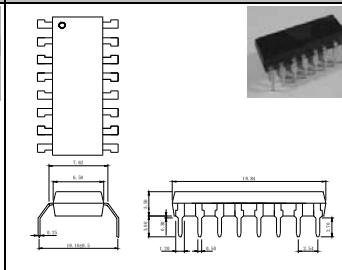
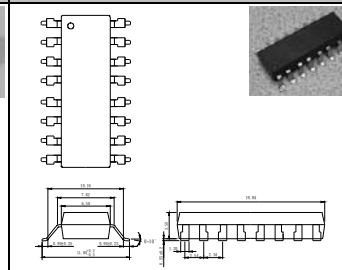
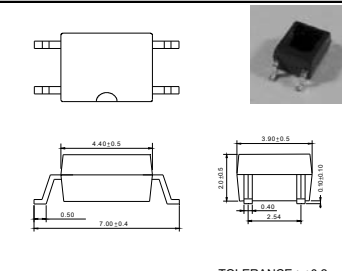
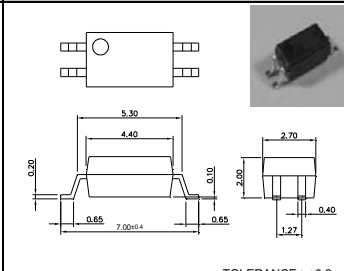
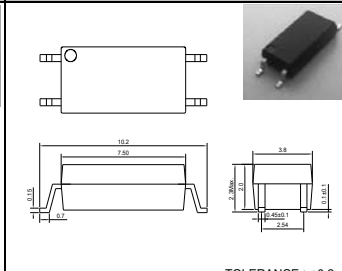
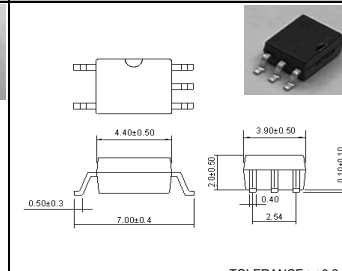
\* Standard + Diode = D (D1A050D00)

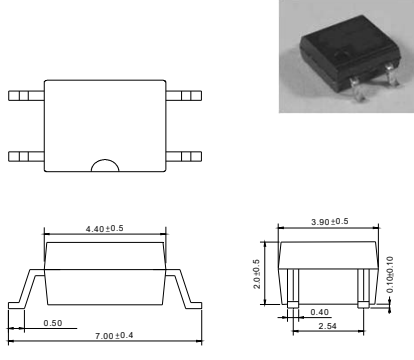
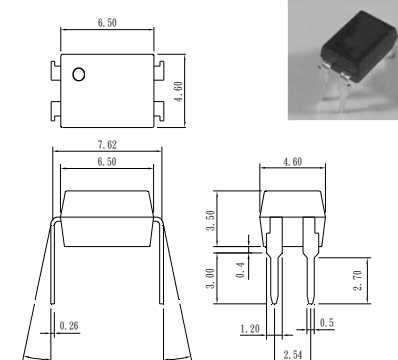
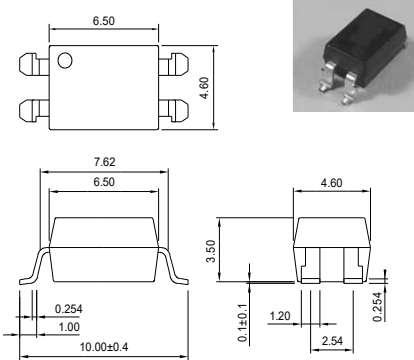
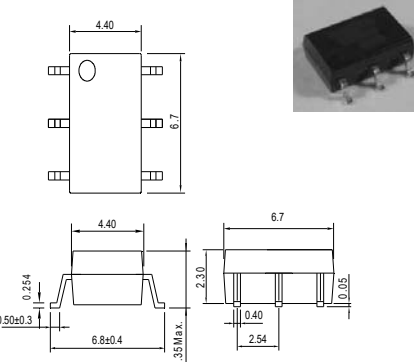
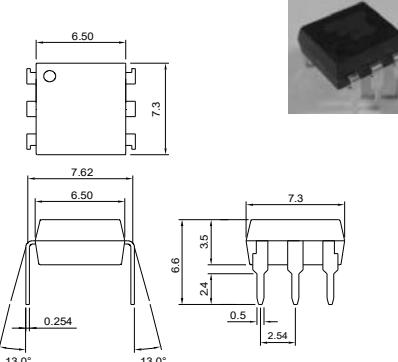
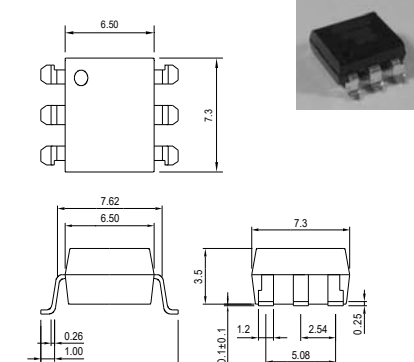
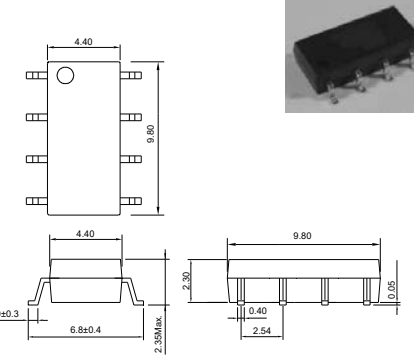
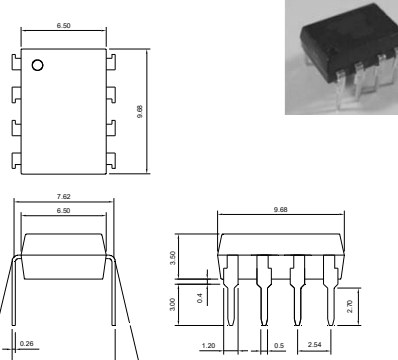
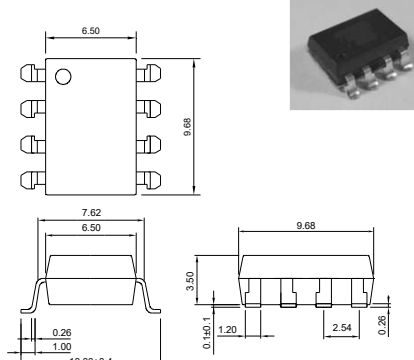
\* Standard + Electrostatic Shield = M (D1A050M00)


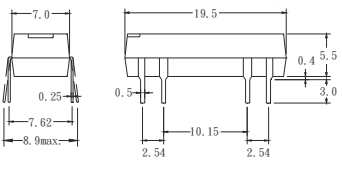

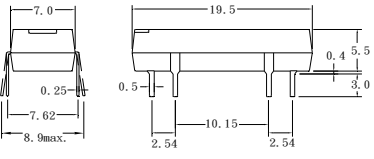

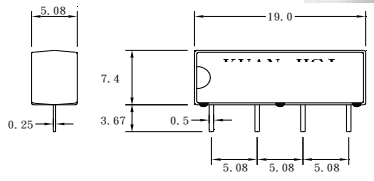
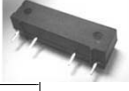
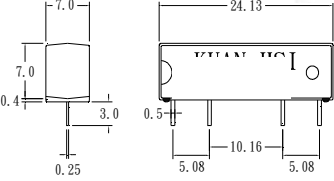

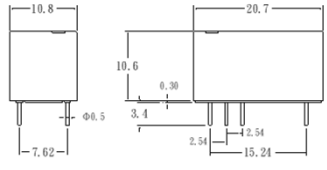

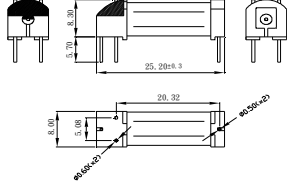

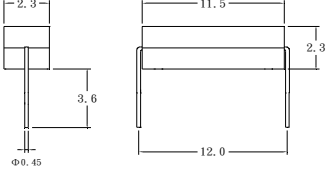

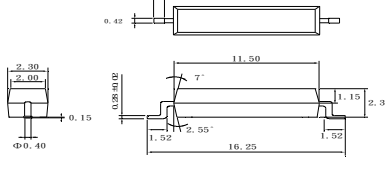

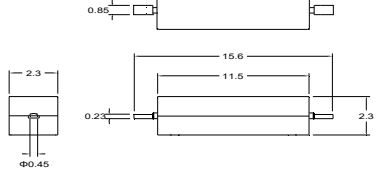

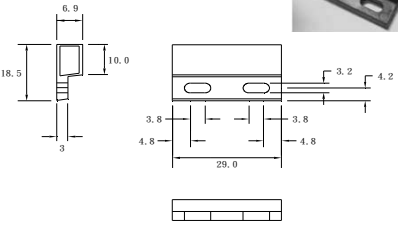
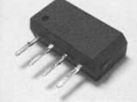
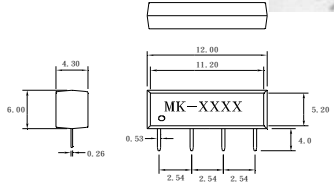
\* Electrostatic Shield + Diode = X (D1A050X00)

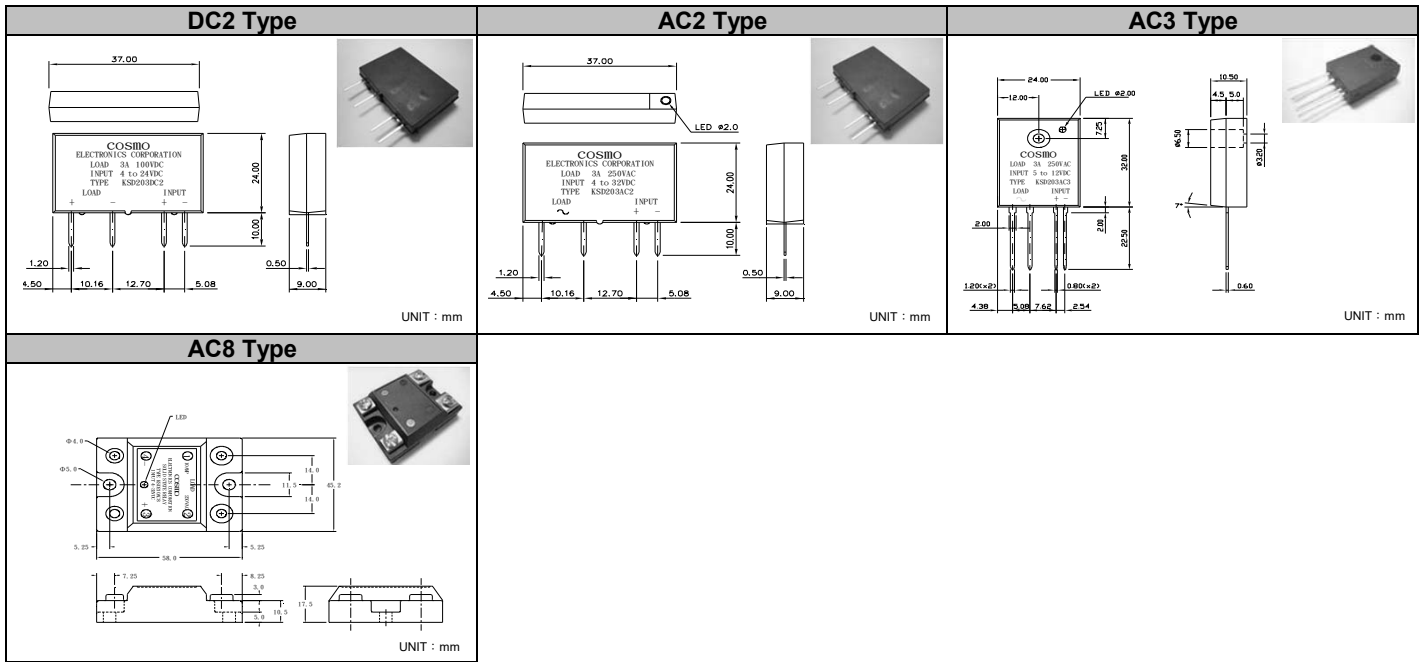
Triac Output											
Model Number	Schematic	Absolute Maximum Ratings						Electrical Characteristics			
		Input Voltage	Input Type	Output Voltage	Output Type	RMS on-state current (A)	Isolation voltage input to output (V)	On-state voltage (V max)	Leakage current (mA max)	Load Voltage Rating (VAC)	Zero Cross
KSD210AC8		4 ~ 32	VDC	250	VAC	10	4000	1.5	7	50~280	Y
KSD215AC8		4 ~ 32	VDC	250	VAC	15	4000	1.5	7	50~280	Y
KSD225AC8		4 ~ 32	VDC	250	VAC	25	4000	1.5	7	50~280	Y
KSD240AC8		4 ~ 32	VDC	250	VAC	40	4000	1.5	7	50~280	Y
KSD425AC8		4 ~ 32	VDC	480	VAC	25	4000	1.5	14	75~480	Y
KSD440AC8		4 ~ 32	VDC	480	VAC	40	4000	1.5	14	75~480	Y
KSA210AC8		100 ~ 240	VAC	250	VAC	10	4000	1.5	8	50~280	Y
KSA215AC8		100 ~ 240	VAC	250	VAC	15	4000	1.5	8	50~280	Y
KSA225AC8		100 ~ 240	VAC	250	VAC	25	4000	1.5	8	50~280	Y
KSA240AC8		100 ~ 240	VAC	250	VAC	40	4000	1.5	8	50~280	Y
KSA425AC8		100 ~ 240	VAC	480	VAC	25	4000	1.5	12	75~480	Y
KSA440AC8		100 ~ 240	VAC	480	VAC	40	4000	1.5	12	75~480	Y
KSD203AC3		5 ~ 12	VDC	250	VAC	3	4000	1.5	7	50~280	Y
KSD205AC3		5 ~ 12	VDC	250	VAC	5	4000	1.5	7	50~280	Y
KSD210AC3		5 ~ 12	VDC	250	VAC	10	4000	1.5	7	50~280	Y
KSD215AC3		5 ~ 12	VDC	250	VAC	15	4000	1.5	7	50~280	Y
KSD225AC3		5 ~ 12	VDC	250	VAC	25	4000	1.5	7	50~280	Y
KSD240AC3		5 ~ 12	VDC	250	VAC	40	4000	1.5	7	50~280	Y
KSD203AC2		4 ~ 32	VDC	250	VAC	3	4000	1.5	7	50~280	Y

Transistor Output											
Model Number	Schematic	Absolute Maximum Ratings						Electrical Characteristics			
		Input Voltage	Input Type	Collector voltage	Output Type	RMS on-state current (A)	Isolation voltage (V)	Collector-emitter saturation voltage (V max)	Leakage current (uA max)	Collector current (mA min)	Zero Cross
KSD203DC2		4 ~ 24	VDC	100	VDC	3	4000	2	15	50	—

4-pin DIP Type	4-pin SMD Type	4-pin H Type	4-pin L Type
 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>
6-pin DIP Type	6-pin SMD Type	6-pin H Type	6-pin L Type
 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>
8-pin DIP Type	8-pin SMD Type	8-pin H Type	8-pin L Type
 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>
16-pin DIP Type	16-pin SMD Type	16-pin H Type	16-pin L Type
 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>
4-pin Mini - Flat Type	4-pin SSOP Type	4-pin LSOP TYPE	5-pin Mini - Flat Type
 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>	 <p>TOLERANCE : ±0.2mm</p>

4-pin SOP Type	4-pin DIP Type	4-pin SMD Type
 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>
6-pin SOP Type	6-pin DIP Type	6-pin SMD Type
 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>
8-pin SOP Type	8-pin DIP Type	8-pin SMD Type
 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	 <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>

DIP Type	DH Type	SIP Type
  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>	  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>	  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>
SSIP Type	C Type	CG Type
  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>	  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>	  <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>
P3-1A15 Type	P3-1A16 Type	P3-1A17 Type
  <p>TOLERANCE : <math>\pm 0.2\text{mm}</math></p>	  <p>UNIT : mm</p>	  <p>UNIT : mm</p>
P1-1A15 Type	MK Type	
  <p>UNIT : mm</p>	  <p>TOLERANCE : <math>\pm 0.1\text{mm}</math></p>	





ONSEMI/ FAIRCHILD	cosmo	ONSEMI/ FAIRCHILD	cosmo	TOSHIBA	cosmo	VISHAY	cosmo
FOD785	K1010	MOC3061M	KMOC3061	TLP630	KP6010	SFH640	K3010
FOD817	K1010	MOC3062M	KMOC3062	TLP630	KP6010	K814P	K3010
FODM100X	KT101X	MOC3063M	KMOC3063	TLP183	KPS28010T	SFH620	K3010
H11A1	K2010	MOC3081M	KMOC3081	TLP352	KTLP350	SFH6206	K3010
CNY17	K2010	MOC3082M	KMOC3082	TLP184	KPC354NT	SFH628	K3010
TIL111	K2010	MOC3083M	KMOC3083	TLP185	KPC357NT	SFH6286	K3010
TIL117	K2010	FODM3022	KTLP160G	TLP187	KPC452	TCET1600	K3010
CNY17F	KP2110	FODM3052	KTLP160J	TLPN137	KPC6N137	SFH619A	KP4010
MCT6	KP1020	FODM3063	KTLP161J	TLP2362	KPC410	TCED1100	KP4010
MCT9001	KP1020	FODM3083	KTLP161L	TLP2309	KPC457	H11AA1	KP6010
FOD814	K3010			TLP293	KPS2801	4N32	KPC4N33
H11AA814	K3010			TLP292	KPS2805	4N33	KPC4N33
FOD852	KP4010			TLP361J	KMOC3012	K815P	KPC815
H11G1M	KP5010			TLP363J	KMOC3012	VO618A	K1010T
H11G2M	KP5010			TLP3052A	KMOC3022	VOL618A	KT101T
H11AA1	KP6010			TLP3052A	KMOC3023	SFH691AT	KPC354NT
H11AA2	KP6010			TLP3052A	KMOC3052	SFH690XT	KPC357NT
FODM121	KPC357NT			TLP3062A	KMOC3062	VOL617A	KT101X
FODM124	KPC357NT			TLP3063A	KMOC3063	TCLD1000	KT1210
FODM2701	KPC357NT			TLP3083	KMOC3082	6N135	KPC6N135
FODM2705	KPC354NT			TLP3783	KMOC3083	6N136	KPC6N136
FODM214	KPS2801			TLP265J	KTLP160G	6N137	KPC6N137
FODM8801	KPS2801			TLP265J	KTLP160J	6N139	KPC6N139
HMHA281	KPS2801			TLP265J	KTLP165J	K3021P	KMOC3021
FODM217	KPS2805			TLP265J	KTLP260J	K3022P	KMOC3022
HMHA280	KPS2805			TLP266J	KTLP161G	K3023P	KMOC3023
4N29	KPC4N33			TLP266J	KTLP161J	VO3052	KMOC3052
4N30	KPC4N33			TLP166J	KTLP166J	VO3053	KMOC3053
4N32	KPC4N33			TLP268J	KTLP168J	VO3062	KMOC3062
4N33	KPC4N33			TLP785	K1010	VO3063	KMOC3063
H11B1	KPC4N33			TLP785F	K1010	VOM160R	KTLP160J
TIL113	KPC4N33			TLP620	K3010	SFH615A	K1010
FOD3120	KP1510			TLP620F	K3010	SFH617A	K1010
6N135	KPC6N135			TLP626	K3010	TCET1100	K1010
6N136	KPC6N136			TLP627M	KP4010	VO615A	K1010
6N137	KPC6N137			TLP781	K1010	VO617A	K1010
6N138	KPC6N138			TLP781F	K1010	CNY117	K2010
6N139	KPC6N139					CNY17	K2010
MOC3021M	KMOC3021					CNY117F	KP2110
MOC3022M	KMOC3022					CNY17F	KP2110
MOC3023M	KMOC3023					MOC8101	KP2110
MOC3041M	KMOC3041					SFH640	KP2210
MOC3042M	KMOC3042						
MOC3043M	KMOC3043						
MOC3051M	KMOC3051						
MOC3052M	KMOC3052						
MOC3053M	KMOC3053						

RENASAS/ NEC	cosmo
PS2501	K1010
PS2561	K1010
PS2571	K1010
PS2581	K1010
PS2513	K1010
PS2503	K1010T
PS2505	K3010
PS2565	K3010
PS2381-1	KT101X
PS2502	KPC815
PS2705-1	KPC354NT
PS2702-1	KPC355NT
PS2701-1	KPC357NT
PS2761-1	KPC357NT
PS2711-1	KPC357NT0T
PS2733-1	KPC452
PS9113	KPC457
PS9513	KPC6N136
PS2801-1	KPS2801
PS2861B-1	KPS2801
PS2811-1	KPS28010T
PS2802-1	KPS2802
PS2805-1	KPS2805
PS2806-1	KPS2806
PS2833-1	KPS2832

LITEON	cosmo
LTV-817	K1010
LTV-816	K1010
4N25	K2010
4N26	K2010
4N27	K2010
4N28	K2010
4N35	K2010
4N37	K2010
CNY17-1	K2010
CNY17-2	K2010
CNY17-3	K2010
CNY17-4	K2010
LTV-702V	K2010
CNY17F-1	KP2110
CNY17F-2	KP2110
CNY17F-3	KP2110
CNY17F-4	KP2110
LTV-702F	KP2110
LTV-814	K3010
LTV-852	KP4010
LTV-725V	KP5010
LTV-815	KPC815
LTV-354T	KPC354NT
LTV-355T	KPC355NT
LTV-357T	KPC357NT
LTV-352T	KPC452
LTV-217	KPS2801
MOC3021	KMOC3021
MOC3022	KMOC3022
MOC3023	KMOC3023
MOC3052	KMOC3052
MOC3063	KMOC3063
MOC3083	KMOC3083

EVERLIGHT	cosmo
EL816	K1010
EL817	K1010
EL851	KP1210
4N25	K2010
4N26	K2010
4N27	K2010
4N28	K2010
4N35	K2010
4N36	K2010
4N37	K2010
4N38	K2010
CNY17-1	K2010
CNY17-2	K2010
CNY17-3	K2010
CNY17-4	K2010
H11A1	K2010
H11A2	K2010
H11A3	K2010
H11A4	K2010
H11A5	K2010
TIL113	K2010
CNY17F-1	KP2110
CNY17F-2	KP2110
CNY17F-3	KP2110
CNY17F-4	KP2110
EL814	K3010
EL852	KP4010
H11AA1	KP6010
H11AA2	KP6010
H11AA3	KP6010
H11AA4	KP6010
4N29	KPC4N33
4N30	KPC4N33
4N31	KPC4N33
4N32	KPC4N33
4N33	KPC4N33
H11B1	KPC4N33
H11B2	KPC4N33
H11B3	KPC4N33
H11B255	KPC4N33
TIL113	KPC4N33
EL815	KPC815
EL3120	KP1510
EL354N-G	KPC354NT
EL357N_G	KPC357NT

EVERLIGHT	cosmo
EL452_G	KPC452
EL1010	KT101X
ELM600	KPC410
ELM452	KPC457
EL3H7_G	KPS2801
EL3H4_G	KPS2805
ELT3052	KMOC3011
ELT3062	KMOC3012
EL3021	KMOC3021
EL3022	KMOC3022
EL3023	KMOC3023
EL3041	KMOC3041
EL3042	KMOC3042
EL3043	KMOC3043
EL3051	KMOC3051
EL3052	KMOC3052
EL3053	KMOC3053
EL3061	KMOC3061
EL3062	KMOC3062
EL3063	KMOC3063
EL3081	KMOC3081
EL3082	KMOC3082
EL3083	KMOC3083
ELM3022	KTLP160G
ELM3052	KTLP160J
ELM3042	KTLP161G
ELM3062	KTLP161J
ELM3064	KTLP168J

Broadcom/ Avago	cosmo
HCPL-817	K1010
4N25	K2010
CNY17	K2010
HCPL-814	K3010
HCPL-3120	KP1510
ACPL-T350	KTLP350
HCPL-354	KPC354NT
HCPL-181	KPC357NT
6N135	KPC6N135
6N136	KPC6N136
6N137	KPC6N137
6N138	KPC6N138
6N139	KPC6N139
HCPL-M600	KPC410
HCPL-M452	KPC457

SHARP	cosmo
PC3H71	KPS2801W
PC3H3	KPS2805
S2S3000F	KTLP160J
S2S4000F	KTLP161J
PR26MF11NSZF	KTLP3502
PR36MF51NSZF	KTLP3506
PR3BMF51NSKF	KTLP3616
PR26MF21NSZF	KTLP3503
PR36MF21NSZF	KTLP3507
PR3BMF21NSZF	KTLP3617
PC123	K1010
PC817	K1010
PC851	KP1210
PC852	KP4010
PC8171	K1010W
PC354N	KPC354NT
PC355N	KPC355NT
PC357N	KPC357NT
PC452	KPC452
PC410L0NIP0F	KPC410
PC457L0NIP0F	KPC457
PC3H7	KPS2801

PANASONIC	cosmo
AQY212S	KAQY212S
AQY212EH	KAQY212
AQY214S	KAQY214S
AQY214EH	KAQY214
AQY216EH	KAQY216
AQV212S	KAQV212S
AQV212	KAQV212
AQV217S	KAQV217S
AQV217	KAQV217
AQV214S	KAQV214S
AQV214	KAQV214
AQV214EH	KAQV214
AQV216S	KAQV216S
AQV216	KAQV216
AQW212S	KAQW212S
AQW212	KAQW212
AQW212EH	KAQW212
AQW217	KAQW217
AQW214S	KAQW214S
AQW214	KAQW214
AQW214EH	KAQW214
AQW216	KAQW216
AQW216EH	KAQW216
AQV253	KAQV253
AQV253H	KAQV253
AQV254	KAQV254
AQV254H	KAQV254
AQY412S	KAQY412S
AQY412EH	KAQY412
AQY414S	KAQY414S
AQY414EH	KAQY414
AQV412EH	KAQV412
AQV414S	KAQV414S
AQV414	KAQV414
AQV414EH	KAQV414
AQW414S	KAQW414S
AQW414	KAQW414
AQW414EH	KAQW414
AQW612S	KAQW612S
AQW612EH	KAQW612
AQW614	KAQW614
AQW614EH	KAQW614

RENESAS/ NEC	cosmo
PS7241E-1A	KAQY214S
PS7341-1A	KAQV214
PS7360-1A	KAQV216
PS7122A-2A	KAQW212
PS7241-2A	KAQW214S
PS7141-2A	KAQW214
PS7160-2A	KAQW216
PS7122A-1A	KAQV253

Broadcom/ AVAGO	cosmo
ASSR-1219-001E	KAQV212
ASSR-3211-001E	KAQV213
ASSR-4119-001E	KAQV214
ASSR-1228-002E	KAQW212
ASSR-3220-002E	KAQW213
ASSR-4128-002E	KAQW214

OMRON	cosmo
G3VM-61A1	KAQY212
G3VM-201G1	KAQY217S
G3VM-401G	KAQY214S
G3VM-401A	KAQY214
G3VM-601G	KAQY216S
G3VM-61H1	KAQV212S
G3VM-61B1	KAQV212
G3VM-201H1	KAQV217S
G3VM-401H	KAQV214S
G3VM-401B	KAQV214
G3VM-401BY	KAQV214
G3VM-601BY	KAQV216
G3VM-202J1	KAQW217S
G3VM-402J	KAQW214S
G3VM-402C	KAQW214
G3VM-353G	KAQY414S
G3VM-353A	KAQY414
G3VM-353H	KAQV414S
G3VM-353B	KAQV414
G3VM-354J	KAQW414S
G3VM-354C	KAQW414
G3VM-355JR	KAQW614S
G3VM-355CR	KAQW614

OKITA	cosmo
AB37S	KAQY212S
AB34S	KAQY217S
AB30S	KAQY214S
AB30	KAQY214
AA37	KAQV212
AA34	KAQV217
AA30	KAQV214
AA38	KAQV216
AC37	KAQW212
AC34	KAQW217
AC30S	KAQW214S
AC30	KAQW214
AC38	KAQW216
AG74S	KAQY414S
AG74	KAQY414
AE74	KAQV414
AH74S	KAQW414S
AH74	KAQW414
AK74S	KAQW614S
AK74	KAQW614

IXYS/ CP Clare	cosmo
CPC1014N	KAQY212S
CPC1025N	KAQY214S
CPC1390	KAQY214
CPC1394	KAQY216
PLA110	KAQV214
PLA190	KAQV214
PLA193	KAQV216
CPC2014N	KAQW212S
CPC2025N	KAQW214S
PAA110L	KAQW214
CPC1017N	KCP1017
CPC1008N	KCP1008
PLB190	KAQV414
CPC2125N	KAQW414S
XBB170	KAQW414

TOSHIBA	cosmo
TLP176AM	KAQY212S
TLP240A	KAQY212
TLP176D	KAQY217S
TLP240D	KAQY217
TLP176GA	KAQY214S
TLP224GA	KAQY214
TLP240GA	KAQY214
TLP240J	KAQY216
TLP197D	KAQV217S
TLP197GA	KAQV214S
TLP797GA	KAQV214
TLP797J	KAQV216
TLP200D	KAQW217S
TLP206GA	KAQW214S
TLP224GA-2	KAQW214
TLP798GA	KAQV254

Vishay	cosmo
LH1546AEF	KAQY214S
LH1546ADF	KAQY214
LH1540AAB	KAQV214
LH1546AAB	KAQV214
LH1522AB	KAQW412
LH1501BT	KAQV414
LH1520AB	KAQW414

Infineon	cosmo
PVT312	KAQV213
PVT412	KAQV214
PVT322A	KAQW213
PVT422P	KAQW214S
PVT422	KAQW214

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- g. Consumer electronics
- h. Telecommunication

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