

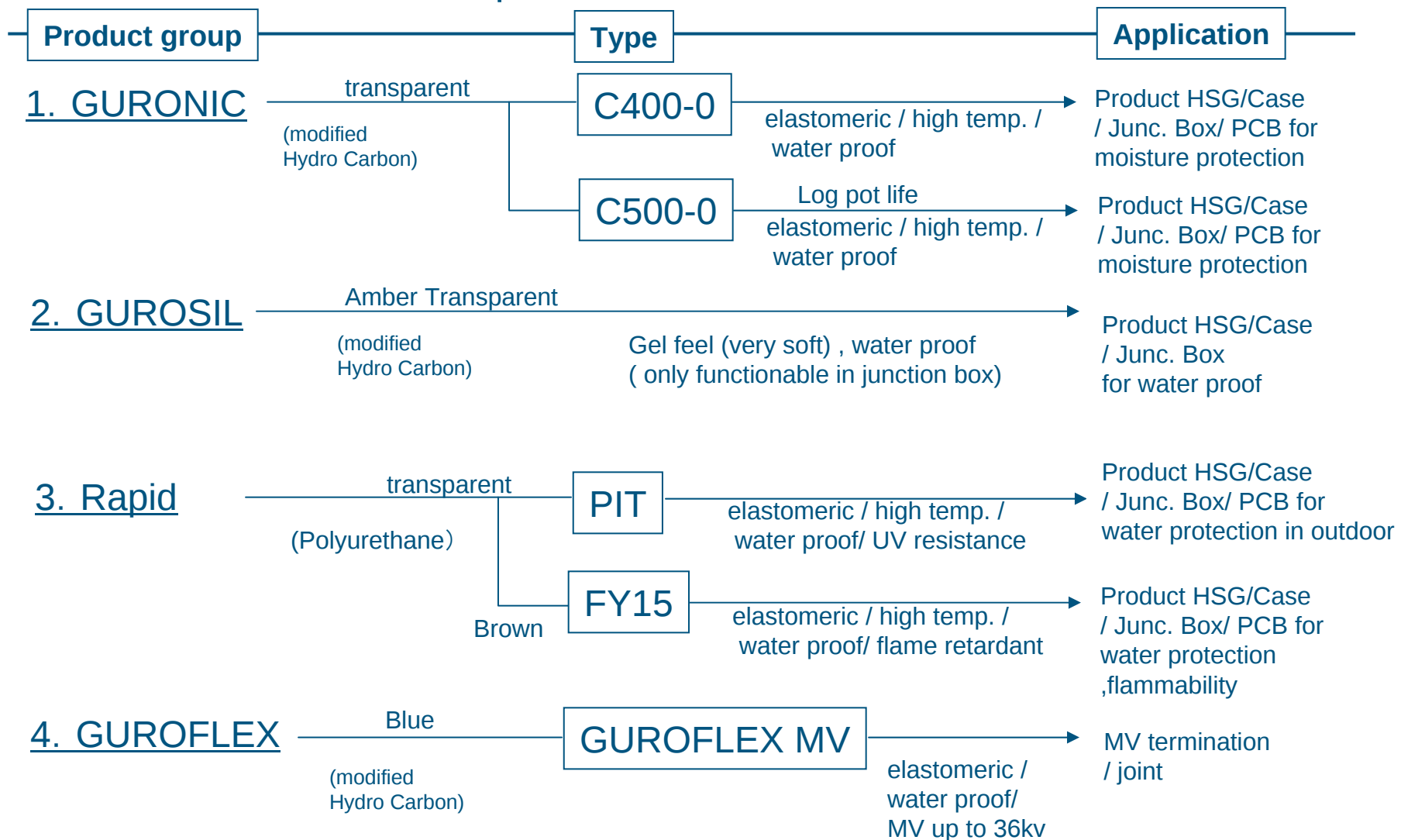


Energy-GURO Products Introduction

Tyco Electronics Japan G.K. 2010

2010年11月15日

GURO Products Group



GEL Products Comparison

	TycoE	TycoE	TycoE	TycoE	TycoE	TycoE	TycoE	Raytech	3M
	GUROSIL GEL	GURONI C400	GURONIC C500	RAPID PIT	RAPID FY15	GUROFLEX -MV	Power GEL	Magic GEL (Raytech)	3M High Resin
MATERIAL	modified hydrocarbon	modified hydrocarbon	modified hydrocarbon	polyurethane	polyurethane	modified hydrocarbon	silicone	silicone	polyurethane
Color	amber transparent	transparent	transparent	transparent	brown	blue	opaque	transparent	transparent
Pot Life 23C(min)	20	10	60	50	20	30	–	2	33
Cure Time (hr)	4	8	48	1(80c)	3	12	–	2	12
Mixing Ratio	1:1	1:1	1:1	100:19	100:11.2	2:1	–	–	1:1
Hardness Shore00	18	75	75	A50	A71	A10	<0	7	–
Viscosity (23c)	3 Pa·S	7 Pa·S	7 Pa·S	19	12.6	7 Pa·S	3 Pa·S	3 Pa·S	–
Temperature Range	–40 – 90	–70 – 120	–70 – 120	–40 – 150	–40 – 140	–40 – 90	–40 – 95	–40 – 120	–40 – 80
Dielectric Strength	20KV/mm	31KV/mm	31KV/mm	24KV/mm	18KV/mm	25KV/mm	40KV/mm	16KV/mm	17KV/mm
Water uptake 23c, 24h	0.3%	0.2%	0.2%	0.24%	0.22%	0.2%	0.05%	0.05%	0.2%
Hot Water Stability 90c	<1days	>30days	>30days	>30days	>30days	>30days	>30days	–	–
Adhesion	Low	Good	Good	Good	Good	Good	Low	Low	–
Removable	Yes	Yes (not easy)	Yes (not easy)	Yes (not easy)	No	No	Yes (not easy)	Yes	Yes
Re-enterable	Yes	With repair	With repair	With repair	–	–	With repair	Yes	Yes
Device on PCB protection	No	Yes	Yes	Yes	Yes	–	No	?	?
No hazard	Yes	Yes	Yes	Xi	Xn	Yes	No	No	Yes
Flammability	No	No	No	No	Good	No	No	No	No
UV Resistance	No	No	No	Good	No	No	Good	No	No

GURO Products Group

Product group

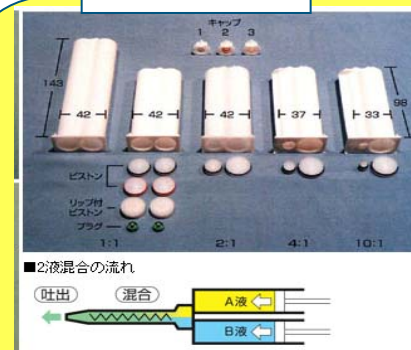
1. GURONIC



Packing style



Customize



2. GUROSIL



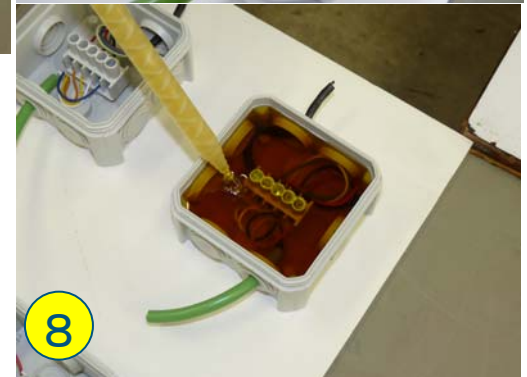
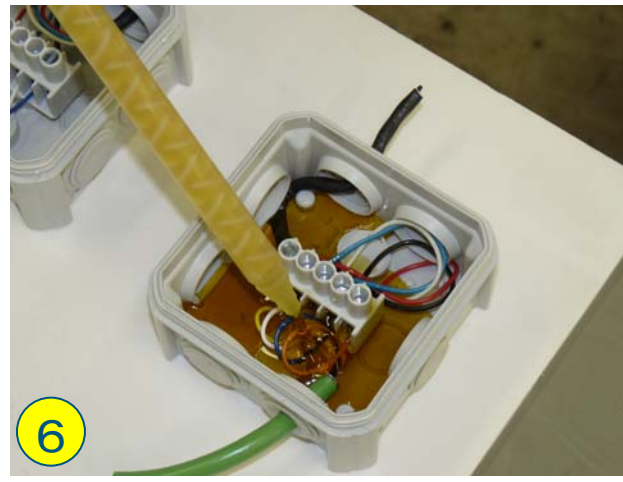
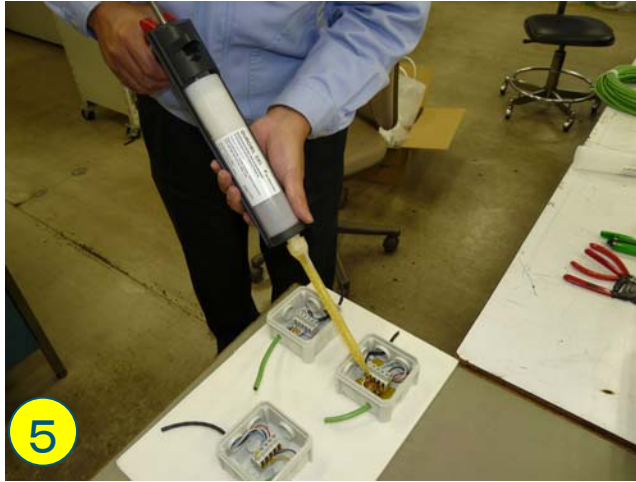
3. Rapid



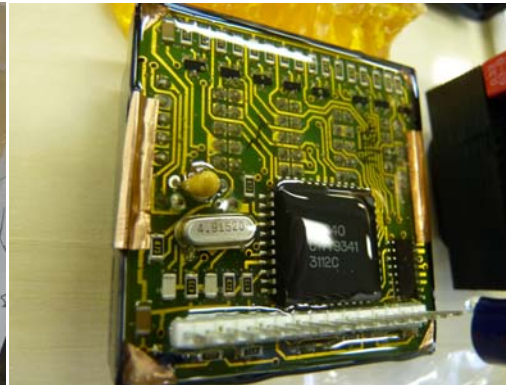
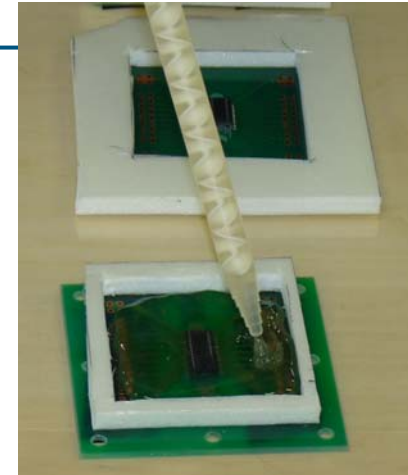
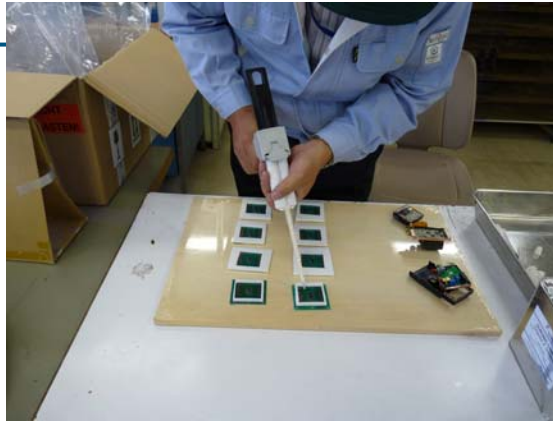
4. GUROFLEX



GURO-SIL Instruction



GURONIC Instruction



GURONIC / RAPID

GUROSIL



GURO-SIL Reliability



Test samples inside opened pressure tank



Test samples taken out of the pressure tank



Test sample 1 after 1000h in water



Test sample 2 after 1000h in water

EN60529 (IP68) •IP68 tested up to 18m water depth for over 1000h