PVC Additives

An extensive range to improve processability and characteristics of PVC products

The third most widely produced synthetic plastic polymer after polyethylene (PP) and polypropylene (PE), polyvinyl chloride (PVC) comes in two basic forms: rigid and flexible. PVC is used in construction applications such as pipes, doors and windows, as well as in the packaging, automotive, household and furniture, and medical sectors. Flexible PVC today often replaces rubber in plumbing, electrical cable insulation, imitation leather, signage and inflatable products.

Mainly used for PVC, plasticizers improve the flexibility and durability of plastic end products. They also act as softeners, extenders and lubricants.

SONGWON offers a comprehensive range of PVC stabilizers and plasticizers. In our PVC application lab in Ulsan, Korea, we support customers with expert formulation and performance evaluations.

Product range selection guide

One Pack Systems (solid)

Type of stabilizer		Floorings	Decorative films	Artificial leathers	Wall papers	Plastisols	Flexible profiles	Electric wires and cables	Food contacts	Rigid films	Pipes	Fittings	Automotive	Window profiles
CaZn	SONGSTAB™ BP-39AC						■	■	■				■	
	SONGSTAB™ BP-490						■	■					■	
	SONGSTAB™ BP-491						■	■					■	
	SONGSTAB™ BP-90NE						■	■					■	
	SONGSTAB™ BP-91NE						■	■					■	
	SONGSTAB™ BP-878F	■												
	SONGSTAB™ SW SERIES										■	■		
	SONGSTAB™ WP SERIES													■
	SONGSTAB™ CZ-67P			■	■									
	SONGSTAB™ CZ-71P	■											■	

Mixed Metal Stabilizers (liquid)

BaCd	SONGSTAB™ BC-102	■		■		■	■							
	SONGSTAB™ BC-540	■	■	■		■	■							
BaZn	SONGSTAB™ BZ-150T	■	■				■							
	SONGSTAB™ BZ-170T	■	■	■			■							
	SONGSTAB™ BZ-184T	■	■	■			■							
	SONGSTAB™ BZ-153T	■	■				■							
	SONGSTAB™ BZ-500	■	■				■							
	SONGSTAB™ BZ-501	■	■				■							
	SONGSTAB™ BZ-510	■	■				■							
	SONGSTAB™ BZ-300	■	■				■							
	SONGSTAB™ BZ-215	■					■							
	SONGSTAB™ BZ-609	■		■		■								
	SONGSTAB™ BZ-700	■		■		■								
	SONGSTAB™ BZ-701	■		■		■								
	SONGSTAB™ BZ-620T	■		■		■								
Kickers	SONGSTAB™ BZ-119	■		■	■									
	SONGSTAB™ BZ-806F	■		■										
	SONGSTAB™ BZ-815K	■		■	■									
	SONGSTAB™ BZ-191	■		■	■									
	SONGSTAB™ BZ-900P	■		■	■									
CaZn	SONGSTAB™ CZ-200						■		■					
	SONGSTAB™ CZ-400	■				■	■		■					

	Type of stabilizer		Floorings	Decorative films	Artificial leathers	Wall papers	Plastisols	Flexible profiles	Electric wires and cables	Food contacts	Rigid films	Pipes	Fittings	Automotive	Window profiles
Organotin Stabilizers	Methyl Tin	SONGSTAB™ MT-800							■	■	■	■			
		SONGSTAB™ MT-800D							■	■	■	■			
		SONGSTAB™ MT-1000							■	■	■	■			
		SONGSTAB™ MT-830							■		■	■			
	Butyltin	SONGSTAB™ BT-107N								■	■	■			
		SONGSTAB™ BT-711C								■	■	■			
		SONGSTAB™ TM-506								■	■	■			
		SONGSTAB™ TM-300P								■	■	■			
		SONGSTAB™ TM-600P								■	■	■			
	Octyltin	SONGSTAB™ OT-713R							■	■	■	■			
		SONGSTAB™ TM-710M							■	■	■	■			
Co-Stabilizers		SONGSTAB™ SB-11	■	■	■			■				■	■	■	■
		SONGSTAB™ AC-215P	■		■	■									
		SONGSTAB™ SB-102	■					■	■					■	
		SONGSTAB™ PI-311	■	■	■		■	■			■				
		SONGSTAB™ E-700	■	■	■	■	■	■	■	■	■			■	
Lubricants		SONGSTAB™ BS							■	■					
		SONGSTAB™ SL-29		■					■	■					
		SONGSTAB™ SL-31										■	■		
		SONGSTAB™ SL-40							■	■					
		SONGSTAB™ SL-101							■	■					

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Plasticizers

	Hose pipes	Artificial leathers	Sheets	Electrical wires and cables	Gloves	Films	Wallpaper	Refrigerator sealing strips	Food packaging materials
SONGCIZER™ DOA	■	■	■					■	■
SONGCIZER™ TOTM	■			■					
SONGCIZER™ P-900	■		■	■	■	■		■	
SONGCIZER™ P-1500	■		■	■	■	■		■	
SONGCIZER™ P-2600	■		■	■	■	■		■	
SONGCIZER™ P-2600S	■		■	■	■	■		■	
SONGCIZER™ P-2700	■		■	■	■	■		■	
SONGCIZER™ P-2800	■		■	■	■	■		■	
SONGCIZER™ P-3000	■		■	■	■	■	■	■	

Antioxidants and UV Absorbers

- SONGNOX® 1010
- SONGNOX® 1076
- SONGSORB® 1000
- SONGSORB® 2340
- SONGSORB® 3260
- SONGSORB® 8100
- SABO®STAB UV 312

One Pack Systems (solid)

CaZn	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BP-39AC Complex of CaZn compounds and lubricants PW	5.0 ~ 7.0	• Excellent heat stability and processability • Low odor and volatiles • Semi-rigid or flexible clear extrusion	• Transparent electric wires and cables • Transparent profiles • Non toxic transparent hoses
SONGSTAB™ BP-490 Complex of CaZn compounds and lubricants PW	5.0 ~ 7.0	• Excellent heat stability (90~105°C) and processability • Low odor and volatiles • Semi-rigid or flexible extrusion • Light colored product	• 90~105°C electric wires • Light colored end products
SONGSTAB™ BP-491 Complex of CaZn compounds and lubricants PW	5.0 ~ 7.0	• Excellent heat stability (90~105°C) and processability • Low odor and volatiles • Semi-rigid or flexible extrusion • Dark colored product	• 90~105°C electric wires • Dark colored end products
SONGSTAB™ BP-90NE Complex of CaZn compounds and lubricants PW	10.0 ~ 13.0	• Excellent heat stability (105~125°C) and processability • Low odor and volatiles • Semi-rigid or flexible extrusion • High Congo red value • Light colored product	• 105~125°C electric wires • Light colored end products
SONGSTAB™ BP-91NE Complex of CaZn compounds and lubricants PW	10.0 ~ 13.0	• Excellent heat stability (105~125°C) and processability • Low odor and volatiles • Semi-rigid or flexible extrusion • High Congo red value • Dark colored product	• 105~125°C electric wires • Dark colored end products
SONGSTAB™ BP-878F Complex of CaZn compounds and lubricants PW	2.0 ~ 5.0	• Excellent heat stability and processability • Low odor and volatiles • Standard expanded flexible PVC for calendering	• Flooring (calender)
SONGSTAB™ SW series Complex of CaZn compounds and lubricants PW	3.0 ~ 7.0	• Excellent heat stability, processability and initial color • Excellent external lubricant complex • Suitable for standard PVC pipes and fittings	• Pipes • Fittings
SONGSTAB™ WP series Complex of CaZn compounds and lubricants PW	5.0 ~ 7.0	• Excellent heat stability and processability • No heavy metals • Suitable for window profiles	• Window profiles
SONGSTAB™ CZ-67P Complex of CaZn compounds and lubricants PW	1.0 ~ 2.0	• Stabilizer for expanded PVC leather and wall paper of paste resin • Fine uniform cell structure and wide blow-ratio even used alone • Low VOC emission	• Artificial leather, wallcovering
SONGSTAB™ CZ-71P Complex of CaZn compounds and lubricants PW	2.0 ~ 4.0	• One pack stabilizer for flexible calendering products • Synergistic effects when used with epoxy plasticizers • Low VOC emission	• Flexible profiles • Extrusion calendering • Opaque PVC tapes

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Mixed Metal Stabilizers (liquid)

BaCd	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BC-102 Complex of Cd-Ba-Zn organics LQ	1.5 ~ 2.5	• Good heat and light stability and excellent transparency • Can be boosted with metal soaps and/or epoxy plasticizers	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BC-540 Complex of Cd-Ba-Zn organics LQ	2.0 ~ 3.0	• One pack stabilizer with lubricant • Excellent heat stability, weatherability and processability	• Flexible, semi-rigid calendering and extrusion

BaZn	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BZ-150T Complex of Ba-Zn organics LQ	1.5 ~ 2.5	• Require lubricant system for flexible and semi-rigid calendering products • Good transparency • With high filler or TiO_2 loadings, excellent whiteness obtainable	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-170T Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for flexible and semi-rigid calendering products • Not required to use with lubricants or metal soaps • Synergistic effects when used with epoxy plasticizers • Excellent whiteness obtainable when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-184T Complex of Ba-Zn organics LQ	3.0 ~ 5.0	• Stabilizer for semi-rigid and low plasticized calendering products • Synergistic effects when used with epoxy plasticizers • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-153T Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for flexible and semi-rigid calendering products • Not required with lubricants or metal soaps • Synergistic effects when used with epoxy plasticizers • Low VOC emission, phenol free • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-500 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for semi-rigid and low plasticized calendering products at low concentrations • Synergistic effects when used with epoxy plasticizers • Low VOC emission, phenol and PTBBA free • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion

BaZn	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BZ-501 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for semi-rigid and low plasticized calendering products • Synergistic effects when used with epoxy plasticizers • Low VOC emission, PTBBA free • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-510 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for semi-rigid and low plasticized calendering products • Synergistic effects when used with epoxy plasticizers • Low VOC emission, phenol free • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-300 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for flexible and semi-rigid calendering products • Not required to use with lubricants or metal soaps • Synergistic effects when used with epoxy plasticizers • Low VOC emission • Excellent whiteness obtained when used with solid co-stabilizer (BP-275S, etc.)	• Flexible, semi-rigid calendering and extrusion
SONGSTAB™ BZ-215 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for flexible calendering products • Synergistic effects when used with epoxy plasticizers • Good transparency and no migration	• Flexible calendering
SONGSTAB™ BZ-609 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Heat stabilizer for flooring top layer • Excellent transparency and color stability • No reddishness and good initial color	• Plastisols (Ink binder, filled and layers)
SONGSTAB™ BZ-700 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Heat stabilizer for flooring skin layer of paste resin • Excellent clarity and color stability • No reddishness and initial color • Low VOC emission • Free from phenol and PTBBA	• Plastisols (Ink binder, filled and layers)
SONGSTAB™ BZ-701 Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Heat stabilizer for flooring skin layer of paste resin • Excellent clarity and color stability • No reddishness and initial color • Low VOC emission • PTBBA free	• Plastisols (Ink binder, filled and layers)
SONGSTAB™ BZ-620T Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Heat stabilizer for flooring skin layer of paste resin • Excellent transparency and color stability, low VOC emission • No reddishness and good initial color	• Plastisols (Ink binder, filled and layers)

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Kickers	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BZ-119 Complex of K-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for foamed leather and wallcovering of paste resin • Fast foaming • Fine uniform cell structure obtained even with high filler loadings	• Foamed plastisols (artificial leathers, wallcovering)
SONGSTAB™ BZ-806F Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for chemically blown PVC foams • Expanded leather with very fine uniform cell structure is obtained • Good lubricity, no plate-out and no blooming	• Calendering for blow molding (floorings)
SONGSTAB™ BZ-815K Complex of Ba-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for blown wallcovering • Fine uniform cell structure obtained even with high filler loadings	• Foamed Plastisols (artificial leathers, wall covering)
SONGSTAB™ BZ-191 Complex of K-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for foamed leather and wallcovering • Fast foaming • Fine uniform cell structure obtained even with high filler loadings • Low VOC emission	• Foamed Plastisols (artificial leathers, wall covering)
SONGSTAB™ BZ-900P Complex of Na-Zn organics LQ	2.0 ~ 3.0	• Stabilizer for foamed leather and wallcovering • Very fast foaming • Fine uniform cell structure obtained even with high filler loadings • Low VOC emission	• Foamed Plastisols (artificial leathers, wall covering)

CaZn			
SONGSTAB™ CZ-200 Complex of CaZn organics LQ	3.0 ~ 4.0	• One pack stabilizer for flexible calendering products • Good transparency and anti-blooming properties • Synergistic effects when used with epoxy plasticizer • Good heat stability	• Flexible calendering
SONGSTAB™ CZ-400 Complex of CaZn organics LQ	2.5 ~ 3.5	• Good transparency and anti-blooming • Synergistic effects when used with epoxy plasticizer	• Profiles and general purpose films

Organotin Stabilizers

Methyltin	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ MT-800 Mono, Dimethyltin mercaptide complex LQ	1.5 ~ 2.5	• Excellent initial color, heat stability and transparency • Methyltin mercaptide requires slightly higher external lubricant level than octyltin mercaptide	• Rigid calendering and extrusion
SONGSTAB™ MT-800D Dimethyltin mercaptide LQ	1.5 ~ 2.5	• Excellent initial color, heat stability and transparency • Methyltin mercaptide requires slightly higher external lubricant level than octyltin mercaptide	• Rigid calendering and extrusion
SONGSTAB™ MT-1000 Dimethyltin mercaptide LQ	1.5 ~ 2.5	• Excellent heat stability and transparency • Methyltin mercaptide requires slightly higher external lubricant level than octyltin mercaptide	• Rigid calendering and extrusion
SONGSTAB™ MT-830 Mono, Dimethyltin mercaptide and sulfide complex LQ	1.0 ~ 2.0	• Excellent heat stability due to very high tin content (32%) • Limits vicat softening point reduction by lower dosage level • Suitable for PVC fitting and C-PVC products	• Rigid extrusion and injection • C-PVC
Butyltin			
SONGSTAB™ BT-107N Butyltin mercaptide complex LQ	2.0 ~ 3.0	• Excellent heat stability and transparency • No blooming even when used for soft products • Excellent resistance to water	• Rigid calendering and extrusion
SONGSTAB™ BT-711C Butyltin mercaptide LQ	2.0 ~ 3.0	• Excellent heat stability and transparency • No blooming even when used for soft products • Excellent resistance to water	• Rigid calendering and extrusion
SONGSTAB™ TM-506 Butyltin maleate ester complex LQ	2.5 ~ 3.5	• Excellent heat stability, weatherability and transparency • No sulfur staining	• Rigid calendering and extrusion
SONGSTAB™ TM-300P Dibutyltin 3-mercapto propionate PW	1.0 ~ 2.0	• Excellent initial color in rigid PVC • Excellent heat stability – avoid lowering of softening point and impact strength of rigid vinyl products	• Rigid extrusion • CPVC
SONGSTAB™ TM-600P Dibutyltin maleate PW	1.0 ~ 2.0	• Polymeric butyltin maleate stabilizer (powder form) • Excellent heat stability, light stability and transparency • Avoid lowering of softening point and impact strength of rigid vinyl products • Excellent heat stability of PVC-ABS and PVC-NBR polymer blend	• Rigid extrusion • CPVC
Octyltin			
SONGSTAB™ OT-713R Octyltin mercaptide LQ	2.0 ~ 3.0	• General purpose • Good initial color • Excellent heat stability and transparency	• Rigid calendering and extrusion
SONGSTAB™ TM-710M Dioctyltin maleate ester complex LQ	2.0 ~ 3.0	• Reasonable heat stability • Excellent transpareny and weatherability • Crystalize at low temperatures reversible (does not affect the properties of this product) • No Sulphur staining	• Rigid calendering and extrusion

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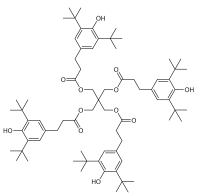
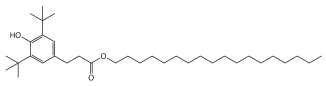
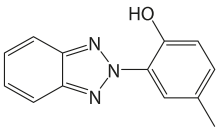
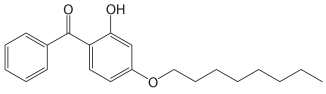
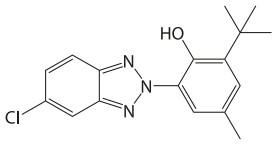
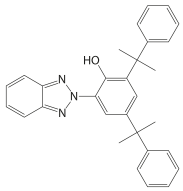
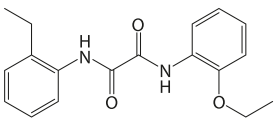
Co-Stabilizers

	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ Pi-311 Organophosphite compound LQ	0.3 ~ 1.0	• Transparency and initial color are improved in combination with metal soaps • Good weatherability	• Flexible, semi-rigid calendering and extrusion • Plastisols
SONGSTAB™ E-700 Epoxidized soybean oil LQ	0.0 ~ 5.0	• No toxic co-stabilizer • Acts synergistically with mixed metal stabilizers to increase heat stability • Max. recommended amount 3.0 PHR (risk of migration)	• Flexible, semi-rigid calendering and extrusion • Plastisols
SONGSTAB™ SB-102 Booster LQ	0-2~1.0	• Improve long term heatstability (70~120°C) • Prevent amine discoloration	• Rigid and flexible PVC
SONGSTAB™ SB-11 Booster PW	0-2~1.0	• Improve long term heatstability (70~120°C) • Prevent amine discoloration	• Rigid and flexible PVC
SONGSTAB™ AC-215P Acrylic copolymer complex LQ	0.5 ~ 1.5	• Fine uniform cell structure and large blow molding ratio in combination with kickers such as BZ-191	• Plastisols (artificial leathers, wallcovering)

Lubricants

	Dosage (PHR)	Characteristics	Applications
SONGSTAB™ BS Butyl stearate LQ	0.5 ~ 1.5	• Suitable as internal lubricant • Excellent compatibility with metallic soaps and organotin stabilizers • Fast fusing properties	• Calendering and extrusion
SONGSTAB™ SL-29 Fatty acid ester and wax complex PW	0.3 ~ 1.5	• Excellent external lubricant complex • Good processability for rigid PVC • Rigid calendering for transparent products	• Rigid calendering
SONGSTAB™ SL-31 Fatty acid ester and PE wax complex PW	3.0 ~ 4.0	• Excellent external lubricant complex for suitable for rigid PVC and C-PVC pipes	• C-PVC and rigid PVC pipes
SONGSTAB™ SL-40 Fatty acid ester and wax complex PW	0.3 ~ 1.5	• Excellent external lubricant complex	• Rigid extrusion
SONGSTAB™ SL-101 Fatty acid ester and wax complex PW	0.3 ~ 1.5	• Internal lubricant complex • Rigid calendering and extrusion for transparent products • Antistatic property	• Rigid calendering and extrusion

Antioxidants and UV Absorbers

		Molecular Weight	Melting Range (°C)	Solubility (g/100 g solvent at 25°C)		TGA (°C, % mass loss)	
SONGNOX® 1010 Tetrakis[methylene-3-(3,5-di-tertbutyl-4-hydroxyphenyl) propionate] methane CAS NO. 6683-19-8 PW, FF, DF		1178	110.0 ~ 125.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	< 0.05 < 0.1 < 50.0 < 0.1 48.0 24.2 > 50.0	353 370 425	5% 10% 50%
SONGNOX® 1076 Octadecyl-3-(3,5-di-tert-butyl-4-hydroxyphenyl) propionate CAS NO. 2082-79-3 PW, CP, SB, LQ		531	50.0 ~ 55.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	0.5 > 50.0 > 50.0 < 0.1 > 50.0 > 50.0 > 50.0	330 347 387	5% 10% 50%
SONGSORB® 1000 2-(2'-hydroxy-5'-methylphenyl) benzotriazole CAS NO. 2440-22-4 PW		225	128.0 ~ 132.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	< 0.05 < 0.1 3.0 < 0.1 7.1 6.1 5.1	225 242 289	5% 10% 50%
SONGSORB® 8100 2-hydroxy-4-n-octoxybenzophenone CAS NO. 1843-05-6 PW		326	> 47.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	0.3 18.0 > 50.0 1.0 > 50.0 > 50.0 > 50.0	280 297 344	5% 10% 50%
SONGSORB® 3260 2-(2'-hydroxy-3'-tert-butyl-5'-methylphenyl)-5-chlorobenzotriazole CAS NO. 3896-11-5 PW		316	138.0 ~ 141.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	0.7 1.5 1.5 0.1 10.4 11.8 3.2	217 232 287	5% 10% 50%
SONGSORB® 2340 2-[2-hydroxy-3,5-di(1,1-dimethylbenzyl) phenyl]-2H-benzotriazole CAS NO. 70321-86-7 PW, FF		448	137.0 ~ 141.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	< 0.05 < 0.1 2.5 < 0.1 18.1 13.1 5.1	337 357 409	5% 10% 50%
SABO®STAB UV 312 N-(2-ethoxylphenyl)-N'-(2-ethylphenyl-oxamide CAS NO. 23949-66-8 PW		312	124.0 ~ 128.0	Squalane n-Hexane Acetone Ethanol Toluene Xylene Ethyl acetate	< 0.05 < 0.1 4.0 < 0.1 7.3 5.2 5.0	266 286 333	5% 10% 50%

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Plasticizers

	Color (APHA)	Acid Value (mgKOH/g)	Heat Loss (125°C 3hours)	Volume Resistivity (30°C)	Refractive Index (25°C)	Viscosity (c p s/25°C)	Features
SONGCIZER™ DOA Di(2-ethylhexyl) adipate CAS NO. 103-23-1 LQ	< 50	< 0.1	< 0.1	> 1×10^{11}	1444 ~ 1450	–	• Resistant to cold temperatures • Good compatibility • Phthalate free
SONGCIZER™ TOTM Tri-2-ethylhexyltrimellitate CAS NO. 3319-31-1 VL	< 120	< 0.2	< 0.1	> 5×10^{11}	1481 ~ 1487	–	• Heat resistant • Low volatility • Migration resistance
SONGCIZER™ P-900 Poly di(2-ethyl hexyl) 1,4-cyclohexanedimethanol adipate CAS NO. 1574656-80-6 VL	< 500	< 3.0	< 0.1	–	–	500 ~1500	• No phthalate • Medium viscosity • Migration resistant
SONGCIZER™ P-1500 Polydi(2-ethylhexyl) glycoladipate CAS NO. 3319-31-1 VL	< 300	< 1.0	< 0.5	–	1454 ~ 1460	100 ~ 200	• No phthalate • Low viscosity
SONGCIZER™ P-2600 Polydi(2-ethylhexyl) glycoladipate CAS NO. 73018-26-5 VL	< 300	< 2.0	< 0.5	–	1462 ~ 1468	2700 ~ 3500	• No phthalate • Medium viscosity
SONGCIZER™ P-2600S Poly di (2-ethyl hexyl) 1,4 cyclohexanedimethanol adipate CAS NO. 1574656-80-6 VL	< 500	< 3.0	< 0.1	–	–	500 ~ 1500	• No phthalate • Medium viscosity
SONGCIZER™ P-2700 Polydi(2-ethylhexyl) glycoladipate CAS NO. 73018-26-5 VL	< 300	< 2.0	< 0.5	–	1466 ~ 1467	4000 ~ 6000	• No phthalate • High viscosity • Migration resistant
SONGCIZER™ P-2800S Poly di (Iso-nonyl) glycoladipate CAS NO. 1404200-65-2 VL	< 400	< 2.0	< 0.5	–	1466 ~ 1467	3000 ~ 6500	• No phthalate • High viscosity • Odorless
SONGCIZER™ P-3000 Polydi(2-ethylhexyl) glycoladipate CAS NO. 63149-79-1 VL	< 300	< 2.0	< 0.5	–	1462 ~ 1468	2000 ~ 3200	• No phthalate • Medium viscosity • Migration resistant

Standard Packaging

- **PVC Stabilizers, Liquids:** 200 kg Steel Drum
1000 kg IBC
- **PVC Stabilizers, Solids:** 20 kg Paper Bag
500 kg Big Bag
- **Organotin Stabilizers:** 200 kg Steel Drum
1000 kg IBC
- **Plasticizers, Liquids:** 200 kg Steel Drum
1000 kg IBC
20 MT ISO Tank

Key to Abbreviations of Physical Forms

- **PW:** Powder
- **SB:** Semi Bead
- **SL:** Solid
- **FF:** Free Flow
- **DW:** Dispersion
- **MB:** Micro Beads
- **FC:** Fusion Crystal
- **LQ:** Liquid or Molten
- **BD:** Beads
- **DF:** Dust Free Flow
- **CP:** Crystalline Powder
- **PS:** Pastilles
- **GR:** Granule
- **FG:** Fine Grind
- **VL:** Viscous Liquid

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Transport and Storage

As a general guideline, we recommend storing the products mentioned in this brochure in their original sealed containers in a cold and dry place. For more detailed information on a specific product, please refer to the corresponding **Technical Data Sheet.**

By law, a number of chemical products must be labeled in respect of transport, storage and handling. Thus corresponding care is a prerequisite for their appropriate handling. Furthermore, local legal regulations may apply.

Detailed information is given in the respective **Safety Data Sheets.**

About SONGWON Industrial Group

SONGWON, which was founded in 1965 and is headquartered in Ulsan, South Korea, is a leader in the development, production and supply of specialty chemicals.

The second largest manufacturer of polymer stabilizers worldwide, SONGWON operates group companies all over the world, offering the combined benefits of a global framework and readily accessible local organizations.

Dedicated experts work closely together with customers to develop tailor-made solutions that meet individual requirements.

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SONGWON provides customers with warranties and representations as to the chemical or technical specifications, compositions and/or the suitability for use for any particular purpose exclusively in individual written agreements.

The facts and figures contained herein have been carefully compiled to the best of SONGWON's knowledge but are essentially intended for informational purposes only.

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