

SWIVELS



Applications

Thrust bearing swivels are used to prevent wire rope or chain from transferring their normal twisting motion to the item being lifted. Green Pin® swivels without bearings are not designed to rotate under load, but are intended as positioning devices only. For rotation under load, thrust bearing swivels or needle bearing swivels should be used. Our swivels can be supplied with two types of end fittings.

Range

Green Pin® offers four types of swivels:

- Grade 8 needle bearing swivels (eye-eye/clevis-clevis), ranging from WLL 1.12 up to 12.8 tons;
- Grade 10 needle bearing swivel (eye-eye) ranging from WLL 1.4 up to 16 tons;
- Swivels (eye-eye/jaw-eye), ranging from WLL 0.39 up to 20.5 tons;
- Thrust bearing swivels (eye-eye), ranging from WLL 1 up to 40 tons.

Van Beest offers a wide range of other swivels to complement the Green Pin® assortment.

Design

Green Pin® swivels are drop forged. Thrust bearing swivels are machined from carbon steel. The range of thrust bearing swivels we supply are fitted with grease nipples to ensure long life and smooth operation. The greasing schedule must be adjusted to the frequency and intensity of use. The needle bearing swivels do not require greasing during use.

Each swivel is generally marked with:

- Working Load Limit - e.g. 2.4 t
- manufacturer's symbol - e.g. GP
- size in mm and/or inch - e.g. 13 and/or 1/2" or 5/8"
- traceability code - e.g. HA
- steel grade (specific products) - 8 or 10
- item code (specific products) - e.g. ELR
- origin (specific products) - e.g. France

Finish

Green Pin® thrust- and needle bearing swivels are painted. Eye-eye and jaw-eye swivels are hot dipped galvanized. Grade 8 products were painted yellow or red under the Excel® brand. However, grade 8 swivels under the Green Pin® brand will be painted white. Grade 10 products are painted blue and will remain so.

Certification

Specific details of certificate availability can be found on each product page. Please verify your certification requirements at the time of order.

Instructions for use

Swivels should be inspected before use to ensure that:

- all markings are legible;
- a swivel with the correct WLL has been selected;
- the bolt, nut or any other locking system cannot vibrate out of position;
- swivels are free from nicks, gouges and cracks;
- swivels and the other components are all of the same steel grade;
- swivels are not distorted or unduly worn.

Also:

- swivels must be used for in-line lifting only;
- swivels may not be heat treated as this may affect their WLL;
- never modify, repair or reshape a swivel by machining, welding, heating or bending as this may affect the WLL.

The WLL should be applied in-line. Avoid overloads. Side loading is not allowed since the swivels are not designed for this purpose. Never replace a swivel pin or nut with a pin other than the one designed for the purpose, as otherwise the swivel may not be suitable for the load imposed. Swivels must be regularly inspected in accordance with the safety standards given in the country of use. This is required because the products in use may be affected by issues such as wear, misuse and overloading, which may lead to deformation and alteration of the material structure. Inspection should take place at least every six months and more frequently when the swivels are used in severe operating conditions.

Assembly

Swivels with a clevis can be connected directly to a lifting chain. Swivels with an eye-fitting must be connected to lifting chain through a connector such as a connecting link.



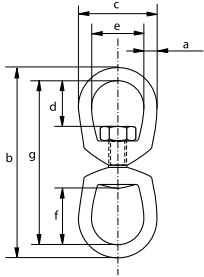
Green Pin® EE Swivel

Swivel with eye-eye end-fitting

- **Material:** high tensile steel, quenched and tempered
- **Safety factor:** MBL equals 5 x WLL
- **Standard:** US Federal Spec. RR-C-271, Type VII, Class 2
- **Finish:** hot dipped galvanized
- **Certification:** 2.1 2.2



G-7713



working load limit	diameter	length outside	width outside	length inside	width inside	length inside	length	weight each
t	a mm	b mm	c mm	d mm	e mm	f mm	g mm	kg
0.39	6	87	32	18	19	27	75	0.1
0.57	8	106	41	21	25	32	90	0.18
1.02	10	129	51	24	32	38	109	0.3
1.6	13	164	64	33	38	51	138	0.6
2.4	16	199	76	40	44	60	167	1
3.3	19	221	89	44	51	67	183	1.82
4.5	22	257	102	52	57	78	213	2.55
5.7	25	295	114	59	64	89	245	4.06
8.2	32	337	143	68	80	94	273	7.43
20.5	38	501	178	102	102	150	425	20.8



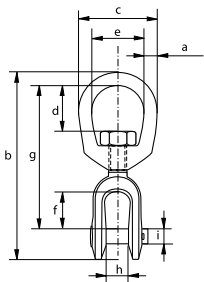
Green Pin® JE Swivel CP

Swivel with jaw-eye end-fitting and cotter pin

- **Material:** high tensile steel, quenched and tempered
- **Safety factor:** MBL equals 5 x WLL
- **Standard:** US Federal Spec. RR-C-271, Type VII, Class 3
- **Finish:** hot dipped galvanized
- **Certification:** 2.1 2.2



G-7723



working load limit	diameter	length	width outside	length inside	width inside	length inside	length	width inside	diameter pin	weight each
t	a mm	b mm	c mm	d mm	e mm	f mm	g mm	h mm	i mm	kg
0.39	6	84	32	18	19	22	67	12	6	0.09
0.57	8	98	41	21	25	22	75	13	8	0.16
1.02	10	121	51	24	32	27	92	16	10	0.32
1.6	13	154	64	33	38	33	114	19	13	0.57
2.4	16	186	76	40	44	38	135	24	16	1.12
3.3	19	211	89	44	51	44	154	29	19	1.76
4.5	22	242	102	52	57	52	178	30	22	2.66
5.7	25	290	114	59	64	71	217	44	29	4.02
8.2	32	329	143	68	80	71	230	52	35	7.14
20.5	38	501	178	106	102	113	364	73	50	24.8

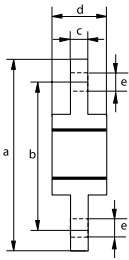
Green Pin® Thrust Bearing EE Swivel

Swivel with eye-eye end-fitting and thrust bearings

- **Material:** carbon steel
- **Safety factor:** MBL equals 5 x WLL
- **Finish:** painted black
- **Certification:** 2.1 2.2 MTC^a



P-7740



working load limit	length	length	thickness	diameter	diameter hole	weight each
t	a mm	b mm	c mm	d mm	e mm	kg
1	174	128	12.5	49	21	1.4
2	223	173	19	68	22	3.5
3	278	210	26	79	29	6.4
5	290	222	26	89	31	7.9
8	366	276	40	106	43	15.2
10	390	300	40	118	49	19.1
15	457	355	40	128	49	26.6
20	474	372	40	118	51	25
30	612	472	64	138	59	50
40	760	600	68	168	65	-

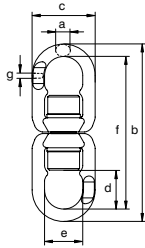


Green Pin® Needle Bearing Swivel EE GR8

Grade 8 needle bearing eye-eye swivel



ELR



- **Material:** alloy steel, grade 8, quenched and tempered
- **Safety factor:** MBL equals 4 x WLL
- **Finish:** painted red (R) or white
- **Temperature range:** -40°C up to +200°C
- **Certification:** 2.1 2.2 3.1 MTC^b
- **Note:** equipped with two needle roller thrust bearings to enable rotation under load

for chain diameter		working load limit	diameter		length outside	width outside	length inside	width inside	length	thickness	weight each
mm	inch		t	a mm							
5-6	$\frac{3}{16} - \frac{7}{32}$	1.12	11	150	56	33	32	126	6	0.61	
7-8	$\frac{1}{4} - \frac{5}{16}$	2	14	181	65	40	37	153	8	1.07	
10	$\frac{3}{8}$	3.2	18	226	79	47	48	195	11	1.9	
13	$\frac{1}{2}$	5.4	20	268	96	59	58	227	14	3.17	
16	$\frac{5}{8}$	8.2	23	331	121	67	73	281	17	6.44	
18-20	$\frac{3}{4}$	12.8	28	378	132	88	82	328	22	7.75	

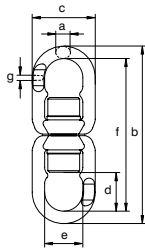


Green Pin® Needle Bearing Swivel EE GR10

Grade 10 needle bearing eye-eye swivel



UELR



- **Material:** alloy steel, grade 10, quenched and tempered
- **Safety factor:** MBL equals 4 x WLL
- **Finish:** painted blue
- **Temperature range:** -40°C up to +200°C
- **Certification:** 2.1 2.2 3.1 MPI^b
- **Note:** equipped with two needle roller thrust bearings to enable rotation under load

for chain diameter		working load limit	diameter		length outside	width outside	length inside	width inside	length	thickness	weight each
mm	inch		t	a mm							
6	$\frac{7}{32}$	1.4	11	150	56	33	32	126	6	0.61	
8	$\frac{9}{32} - \frac{5}{16}$	2.6	14	181	65	40	37	153	8	1.07	
10	$\frac{3}{8}$	4	18	226	79	47	48	195	11	1.9	
13	$\frac{1}{2}$	6.8	20	268	96	59	58	227	14	3.17	
16	$\frac{5}{8}$	10.3	23	331	121	67	73	281	17	6.44	
20	$\frac{3}{4}$	16	28	378	132	88	82	328	22	7.75	

