WASP

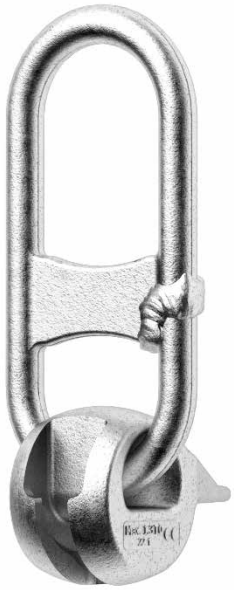
ANNUAL REPORT REUSABLE DM 2006/42/CE

HOOK FOR TIMBER ELEMENTS TRANSPORT

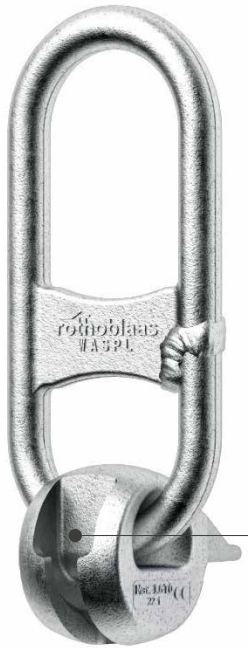
FAST
Fastened with just one screw, it allows time savings due to its quick assembly and disassembly.

INGENIOUS
The lifting hook can be used for both axial and lateral loads.

CERTIFIED
Compliant to OSHA Section 1926.753(e)(2) and ASME BTH01 2023 and certified according to the EU Machinery Directive 2006/42/EC.



WASP



WASPL

VIDEO MANUALS

FIELDS OF USE

- Solid timber or glulam beams
- CLT panels for floor or wall
- Prefabricated TIMBER FRAME walls
- Small special timber components

VERSATILITY

Various installation options with different types of screws for load conditions and different material.

MATERIAL

WASP is made of very high strength carbon steel.
WASPL is forged from high-strength steel.
Both versions are coated with white electro-galvanising for a long service life.

REUSABLE SCREWS

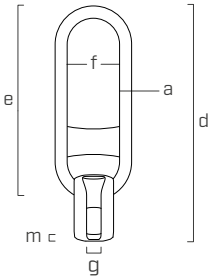
Thanks to compatibility with the innovative VGS PLATE, the lifting system allows the fasteners to be reused even after handling. This reduces waste and project costs while maintaining high safety standards.

CODE

CODE	max. capacity		suitable screws	pcs
WASP	1300 kg	*2860 lbs*	VGSPL Ø11 | *0.44"* - VGS Ø11 | *0.44"*	2
WASPL	1600 kg	*3530 lbs*	VGSPL Ø11 | *0.44"* - VGS Ø11 | *0.44"* - VGS Ø13 | *0.51"*	1

DIMENSIONS

CODE	a	d	e	f	g	m	*a*	*d*	*e*	*f*	*g*	*m*
	[mm]	[mm]	[mm]	[mm]	[mm]	[mm]	*[in]*	*[in]*	*[in]*	*[in]*	*[in]*	*[in]*
WASP	12	185	157	40	12	6	*0.472*	*7.283*	*6.181*	*1.575*	*0.472*	*0.236*
WASPL	14	205	180	54	13	8	*0.551*	*8.071*	*7.087*	*2.126*	*0.512*	*0.315*

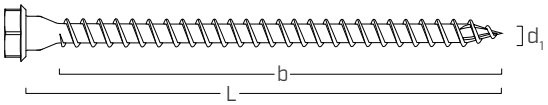


COMPATIBLE SCREWS

VGS PLATE - pan head screw for lifting

Zn ELECTRO PLATED

REUSABLE

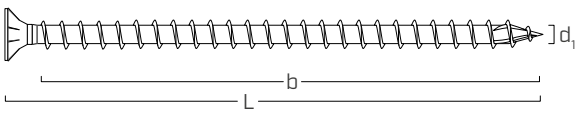


d_1 [mm] *[in]*	CODE	L [mm]	b [mm]	*L* *[in]*	*b* *[in]*	pcs	suitable for WASP	suitable for WASPL
11 *0.44* **SW 17 TX 50**	**VGSPL1160**	60	50	*2 3/8*	*1 7/8*	25	●	●
	VGSPL1180	80	70	*3 1/8*	*2 11/16*	25	●	●
	VGSPL11100	100	90	*4*	*3 7/16*	25	●	●
	VGSPL11120	120	110	*4 3/4*	*4 1/4*	25	●	●
	VGSPL11140	140	130	*5 1/2*	*5 1/16*	25	●	●
	VGSPL11160	160	150	*6 1/4*	*5 13/16*	25	●	●
	VGSPL11180	180	170	*7 1/8*	*6 5/8*	25	●	●
	VGSPL11200	200	190	*8*	*7 3/8*	25	●	●
	VGSPL11240	240	230	*9 1/2*	*9*	25	●	●
	VGSPL11280	280	270	*11*	*10 9/16*	25	●	●

VGS - full thread screw with countersunk head

Zn ELECTRO PLATED

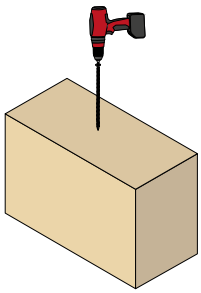
DO NOT RE-USE



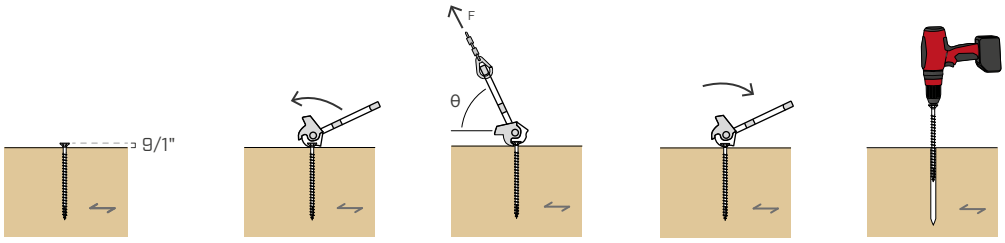
d_1 [mm]*[in]*	CODE	L [mm]	b [mm]	*L* *[in]*	*b* *[in]*	pcs	suitable for WASP	suitable for WASPL
11 *0.44* **TX 50**	**VGS1180**	80	70	*3 1/8*	*2 3/4*	25	●	●
	VGS11100	100	90	*4*	*3 1/2*	25	●	●
	VGS11125	125	115	*4 15/16*	*4 1/2*	25	●	●
	VGS11150	150	140	*6*	*5 1/2*	25	●	●
	VGS11175	175	165	*6 7/8*	*6 1/2*	25	●	●
	VGS11200	200	190	*8*	*7 1/2*	25	●	●
	VGS11225	225	215	*8 7/8*	*8 7/16*	25	●	●
	VGS11250	250	240	*10*	*9 1/2*	25	●	●
	VGS11275	275	265	*10 7/8*	*10 7/16*	25	●	●
13 *0.52* **TX 50**	**VGS1380**	80	70	*3 1/8*	*2 3/4*	25	-	●
	VGS13100	100	90	*4*	*3 1/2*	25	-	●
	VGS13150	150	140	*6*	*5 1/2*	25	-	●
	VGS13200	200	190	*8*	*7 1/2*	25	-	●
	VGS13250	250	240	*10*	*9 1/2*	25	-	●
	VGS13300	300	280	*11 3/4*	*11*	25	-	●

WASP INSTALLATION

PERPENDICULAR INSTALLATION



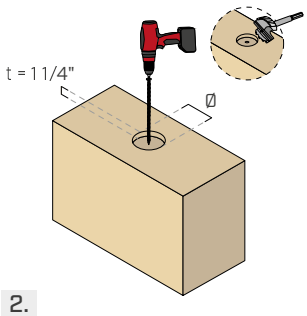
1.



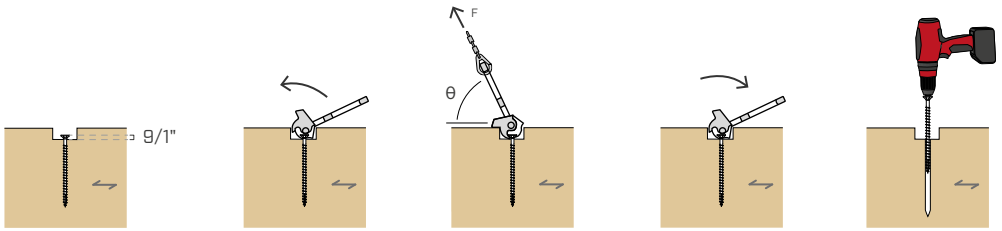
1a. 1b. 1c. 1d. 1e.

1. Insertion of the screw into the timber element to be lifted.
1a. The screw head must protrude approx. 9/16".
1b. Hook positioning.
1c. Lifting of the structure (perpendicular or inclined force).
1d. Hook removal (unhooking).
1e. For safety reasons, insert or completely remove the screw from the timber element after use.

INSTALLATION WITH MILLING



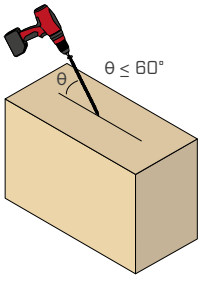
2.



2a. 2b. 2c. 2d. 2e.

2. Make the milling cut, WASP-Ø2 3/16" and WASPL-Ø2 9/16", to accommodate the hook. Insertion of the screw into the timber element to be lifted.
2a. The screw head must protrude approx. 15 mm from the bottom of the milling cut.
2b. Hook positioning.
2c. Lifting of the structure (perpendicular or inclined force).
2d. Hook removal (unhooking).
2e. After use, the screw can remain in place. Optional insert or completely remove the screw from the timber element.

INCLINED INSTALLATION



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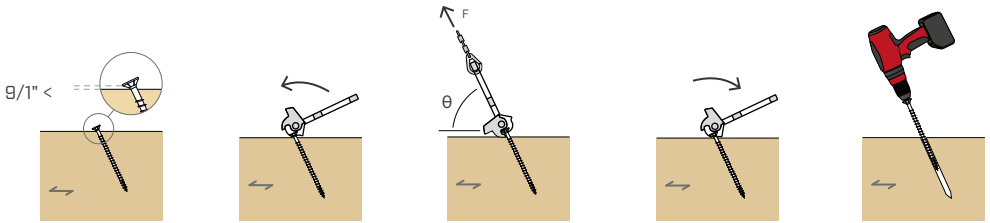


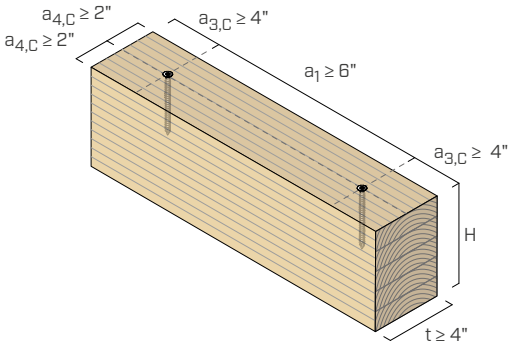
3a. 3b. 3c. 3d. 3e.

3. Check the lifting angle θ and insert the screw at the same angle.
3a. The screw head must protrude approx. 9/16".
3b. Hook positioning.
3c. Structure lifting (lifting chain always in line with transport hook and screw inclination).
3d. Hook removal (unhooking).
3e. For safety reasons, insert or completely remove the screw from the timber element after use.

MINIMUM DISTANCES

SCREW | TIMBER BEAM

PERPENDICULAR



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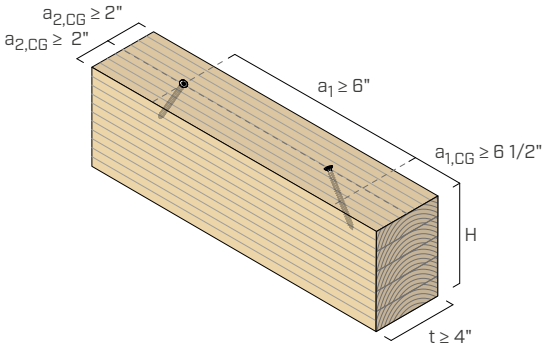
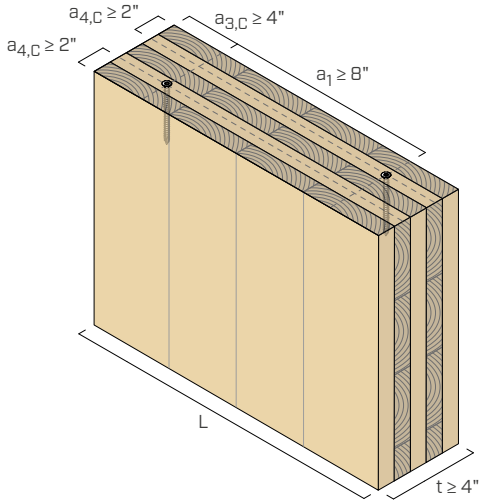


SCREW | CLT WALL

PERPENDICULAR



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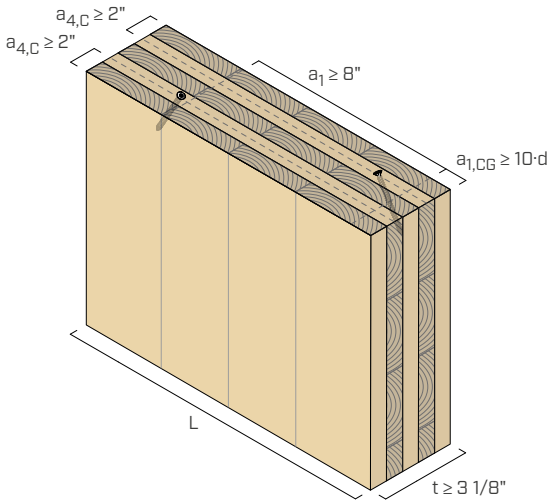
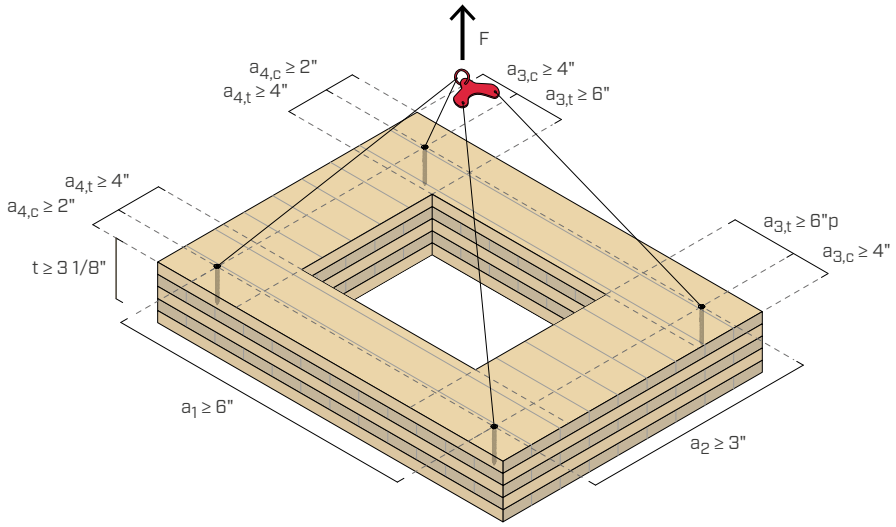


SCREW | CLT FLOOR

PERPENDICULAR - INCLINED

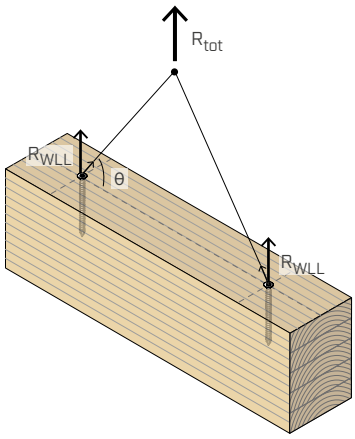


NOTES:

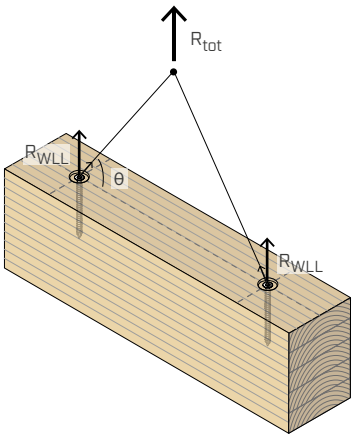
- The minimum distances are in accordance with ICC-ES ESR-4645 and are valid if no other information is specified in the timber data sheet.
- The minimum distances for CLT apply unless otherwise specified by the timber manufacturer.

RIGGING CAPACITY | HOOK WITH VGS Ø11 |0.44" AND VGS Ø13 |0.51"

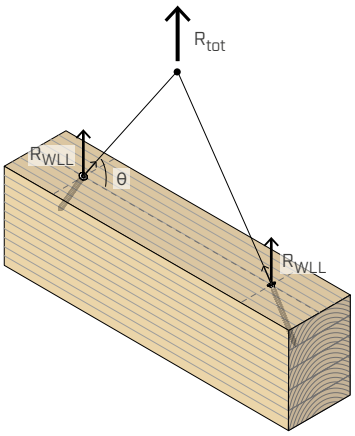
HORIZONTAL BEAM | STATICALLY DEFINED SYSTEM



PERPENDICULAR



PERPENDICULAR WITH MILLING



INCLINED

LOAD CAPACITY PER STOPPING POINT

WASP | WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø11 x 80 **Ø0.44 x 3 1/8**	90	571	571	571
	75	535	551	559
	60	443	494	518
	45	311	403	457
Ø11 x 100 **Ø0.44 x 4**	90	809	809	809
	75	739	782	795
	60	577	701	745
	45	400	572	675
Ø11 x 125 **Ø0.44 x 4 15/16**	90	1065	1065	1065
	75	938	1029	1048
	60	677	922	988
	45	437	753	907
Ø11 x 150 **Ø0.44 x 6**	90	1355	1355	1355
	75	1146	1308	1335
	60	768	1173	1263
	45	466	958	1171
Ø11 x 175 **Ø0.44 x 6 7/8**	90	1593	1593	1593
	75	1306	1539	1572
	60	828	1380	1490
	45	483	1127	1388
Ø11 x 200 **Ø0.44 x 8**	90	1900	1900	1900
	75	1498	1835	1875
	60	893	1646	1781
	45	501	1332	1667
Ø11 x 225 **Ø0.44 x 8 7/8**	90	2139	2139	2139
	75	1637	2066	2112
	60	936	1852	2008
	45	511	1442	1885
Ø11 x 250 **Ø0.44 x 10**	90	2446	2446	2446
	75	1804	2362	2415
	60	983	2118	2299
	45	522	1545	2164
Ø11 x 275 **Ø0.44 x 10 7/8**	90	2684	2684	2684
	75	1926	2593	2652
	60	1014	2325	2526
	45	529	1645	2381

WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø13 x 80 **Ø0.51 x 3 1/8**	90	437	437	437
	75	422	422	419
	60	378	378	360
	45	309	309	258
Ø13 x 100 **Ø0.51 x 4**	90	707	707	707
	75	671	683	687
	60	574	613	617
	45	441	500	504
Ø13 x 150 **Ø0.51 x 6**	90	1325	1325	1325
	75	1201	1280	1299
	60	921	1148	1205
	45	627	937	1066
Ø13 x 200 **Ø0.51 x 8**	90	1944	1944	1944
	75	1664	1877	1911
	60	1138	1683	1792
	45	702	1374	1629
Ø13 x 250 **Ø0.51 x 10**	90	2562	2562	2562
	75	2079	2475	2523
	60	1297	2219	2379
	45	748	1811	2191
Ø13 x 300 **Ø0.51 x 11 3/4**	90	3103	3103	3103
	75	2408	2997	3059
	60	1405	2687	2893
	45	776	2194	2684

RIGGING CAPACITY | HOOK WITH VGS PLATE Ø11 |0.44”

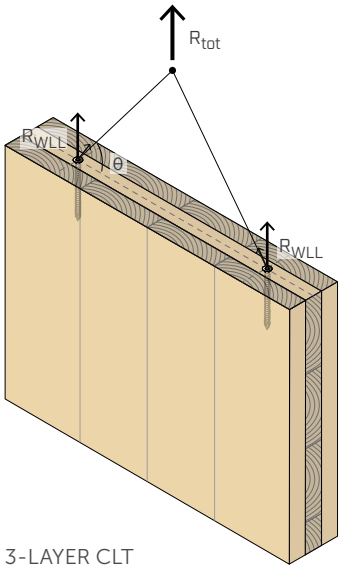
HORIZONTAL BEAM | STATICALLY DEFINED SYSTEM

LOAD CAPACITY PER STOPPING POINT

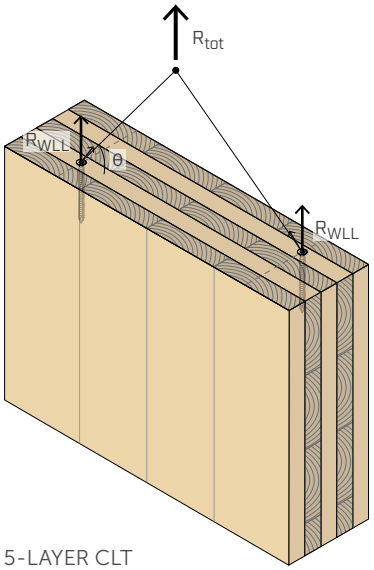
WASP | WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGSPL Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø11 x 60 **Ø0.44 x 2 3/8**	90	366	366	366
	75	348	354	357
	60	300	317	324
	45	232	259	271
Ø11 x 80 **Ø0.44 x 3 1/8**	90	571	571	571
	75	535	551	559
	60	443	494	518
	45	328	403	457
Ø11 x 100 **Ø0.44 x 4**	90	809	809	809
	75	739	782	795
	60	577	701	745
	45	400	572	675
Ø11 x 120 **Ø0.44 x 4 3/4**	90	1014	1014	1014
	75	899	979	998
	60	659	878	939
	45	431	717	861
Ø11 x 140 **Ø0.44 x 5 1/2**	90	1218	1218	1218
	75	1050	1177	1200
	60	728	1055	1133
	45	453	861	1047
Ø11 x 160 **Ø0.44 x 6 1/4**	90	1423	1423	1423
	75	1193	1374	1403
	60	786	1232	1328
	45	471	1006	1233
Ø11 x 180 **Ø0.44 x 7 1/8**	90	1661	1661	1661
	75	1350	1605	1639
	60	844	1439	1554
	45	488	1175	1450
Ø11 x 200 **Ø0.44 x 8**	90	1900	1900	1900
	75	1498	1835	1875
	60	893	1646	1781
	45	501	1344	1667
Ø11 x 240 **Ø0.44 x 9 1/2**	90	2309	2309	2309
	75	1731	2230	2280
	60	963	2000	2170
	45	518	1633	2040
Ø11 x 280 **Ø0.44 x 11**	90	2718	2718	2718
	75	1943	2626	2685
	60	1018	2354	2558
	45	530	1922	2412

RIGGING CAPACITY | HOOK WITH VGS Ø11 | 0.44" AND VGS Ø13 | 0.51"

VERTICAL CLT PANEL[*]



3-LAYER CLT



5-LAYER CLT

LOAD CAPACITY PER STOPPING POINT

WASP | WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø11 x 80 **Ø0.44 x 3 1/8**	90	382	382	382
	75	309	369	375
	60	168	331	347
	45	99	270	307
Ø11 x 100 **Ø0.44 x 4**	90	542	542	542
	75	417	524	533
	60	227	470	499
	45	137	383	452
Ø11 x 125 **Ø0.44 x 4 15/16**	90	713	713	713
	75	549	689	702
	60	302	618	662
	45	181	504	608
Ø11 x 150 **Ø0.44 x 6**	90	908	908	908
	75	681	877	895
	60	377	786	846
	45	227	628	785
Ø11 x 175 **Ø0.44 x 6 7/8**	90	1067	1067	1067
	75	802	1031	1053
	60	447	924	998
	45	241	686	926
Ø11 x 200 **Ø0.44 x 8**	90	1273	1273	1273
	75	908	1230	1256
	60	475	1054	1193
	45	247	743	1065
Ø11 x 225 **Ø0.44 x 8 7/8**	90	1433	1433	1433
	75	984	1384	1415
	60	493	1146	1345
	45	251	796	1199
Ø11 x 250 **Ø0.44 x 10**	90	1639	1639	1639
	75	1073	1583	1618
	60	512	1237	1540
	45	255	847	1334
Ø11 x 275 **Ø0.44 x 10 7/8**	90	1798	1798	1798
	75	1137	1737	1777
	60	525	1323	1692
	45	258	895	1468

WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø13 x 80 **Ø0.51 x 3 1/8**	90	293	293	293
	75	271	283	281
	60	187	253	242
	45	112	207	173
Ø13 x 100 **Ø0.51 x 4**	90	474	474	474
	75	424	458	460
	60	254	410	414
	45	152	335	338
Ø13 x 150 **Ø0.51 x 6**	90	888	888	888
	75	757	858	870
	60	421	769	807
	45	254	628	714
Ø13 x 200 **Ø0.51 x 8**	90	1302	1302	1302
	75	1025	1258	1281
	60	589	1128	1201
	45	342	789	1091
Ø13 x 250 **Ø0.51 x 10**	90	1716	1716	1716
	75	1256	1658	1691
	60	677	1343	1594
	45	358	904	1468
Ø13 x 300 **Ø0.51 x 11 3/4**	90	2079	2079	2079
	75	1432	2008	2049
	60	720	1800	1938
	45	367	1470	1798

(*) When transporting CLT boards vertically, the screw must always be tightened in a transverse position (perpendicular to the direction of the grain). If the screws cannot be tightened in the centre of the element, e.g. because they would be parallel to the fibres in a longitudinal layer, they must be installed offset in the next inner transverse layer (see illustration "5-layer CLT" above).

RIGGING CAPACITY | HOOK WITH VGS PLATE Ø11 | 0.44”

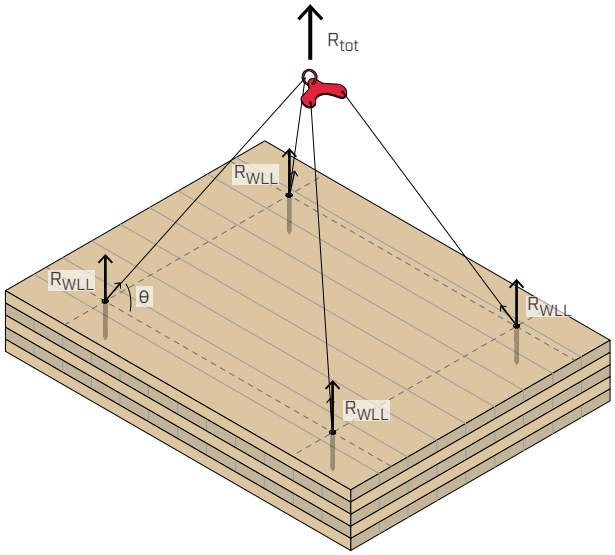
VERTICAL CLT PANEL[*]

LOAD CAPACITY PER STOPPING POINT

WASP | WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGSPL Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø11 x 60 **Ø0.44 x 2 3/8**	90	245	245	245
	75	200	237	239
	60	109	212	217
	45	64	173	182
Ø11 x 80 **Ø0.44 x 3 1/8**	90	382	382	382
	75	315	369	375
	60	172	331	347
	45	103	270	307
Ø11 x 100 **Ø0.44 x 4**	90	542	542	542
	75	414	524	533
	60	228	470	499
	45	136	383	452
Ø11 x 120 **Ø0.44 x 4 3/4**	90	679	679	679
	75	530	656	669
	60	293	588	629
	45	177	480	577
Ø11 x 140 **Ø0.44 x 5 1/2**	90	816	816	816
	75	627	788	804
	60	350	707	759
	45	210	530	701
Ø11 x 160 **Ø0.44 x 6 1/4**	90	953	953	953
	75	742	921	940
	60	413	826	889
	45	250	585	826
Ø11 x 180 **Ø0.44 x 7 1/8**	90	1113	1113	1113
	75	846	1075	1098
	60	473	905	1041
	45	285	628	946
Ø11 x 200 **Ø0.44 x 8**	90	1273	1273	1273
	75	935	1230	1256
	60	526	964	1193
	45	318	660	1040
Ø11 x 240 **Ø0.44 x 9 1/2**	90	1547	1547	1547
	75	1145	1494	1528
	60	645	1141	1454
	45	347	772	1266
Ø11 x 280 **Ø0.44 x 11**	90	1821	1821	1821
	75	1302	1759	1799
	60	682	1577	1714
	45	355	1288	1616

RIGGING CAPACITY | HOOK WITH VGS Ø11 |0.44" AND VGS Ø13 | 0.51"

HORIZONTAL CLT PANEL | STATICALLY DEFINED SYSTEM



LOAD CAPACITY PER STOPPING POINT

WASP | WASP L screw VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	assembly variant: perpendicular R_{WLL} [lb]	perpendicular with milling R_{WLL} [lb]	inclined R_{WLL} [lb]
Ø11 x 80 **Ø0.44 x 3 1/8**	90	571	571	571
	75	505	551	559
	60	368	494	518
	45	239	403	457
Ø11 x 100 **Ø0.44 x 4**	90	809	809	809
	75	703	782	795
	60	494	701	745
	45	311	572	675
Ø11 x 125 **Ø0.44 x 4 15/16**	90	1065	1065	1065
	75	880	1029	1048
	60	566	922	988
	45	333	753	907
Ø11 x 150 **Ø0.44 x 6**	90	1355	1355	1355
	75	1061	1308	1335
	60	628	1173	1263
	45	350	958	1171
Ø11 x 175 **Ø0.44 x 6 7/8**	90	1593	1593	1593
	75	1197	1539	1572
	60	668	1380	1490
	45	360	1127	1388
Ø11 x 200 **Ø0.44 x 8**	90	1900	1900	1900
	75	1356	1835	1875
	60	709	1646	1781
	45	369	1310	1667
Ø11 x 225 **Ø0.44 x 8 7/8**	90	2139	2139	2139
	75	1469	2066	2112
	60	736	1852	2008
	45	375	1413	1885
Ø11 x 250 **Ø0.44 x 10**	90	2446	2446	2446
	75	1602	2362	2415
	60	764	2118	2299
	45	381	1512	2164
Ø11 x 275 **Ø0.44 x 10 7/8**	90	2684	2684	2684
	75	1698	2593	2652
	60	783	2317	2526
	45	385	1607	2381

WASP L screw VGS Ø x L [mm] **Ø x L [inch]**	θ [°]	assembly variant: perpendicular R_{WLL} [lb]	perpendicular with milling R_{WLL} [lb]	inclined R_{WLL} [lb]
Ø13 x 80 **Ø0.51 x 3 1/8**	90	437	437	437
	75	405	422	419
	60	327	378	360
	45	235	309	258
Ø13 x 100 **Ø0.51 x 4**	90	707	707	707
	75	632	683	687
	60	471	613	617
	45	313	500	504
Ø13 x 150 **Ø0.51 x 6**	90	1325	1325	1325
	75	1130	1280	1299
	60	766	1148	1205
	45	470	937	1066
Ø13 x 200 **Ø0.51 x 8**	90	1944	1944	1944
	75	1530	1877	1911
	60	912	1683	1792
	45	510	1374	1629
Ø13 x 250 **Ø0.51 x 10**	90	2562	2562	2562
	75	1874	2475	2523
	60	1011	2219	2379
	45	534	1773	2191
Ø13 x 300 **Ø0.51 x 11 3/4**	90	3103	3103	3103
	75	2138	2997	3059
	60	1075	2687	2893
	45	548	2194	2684

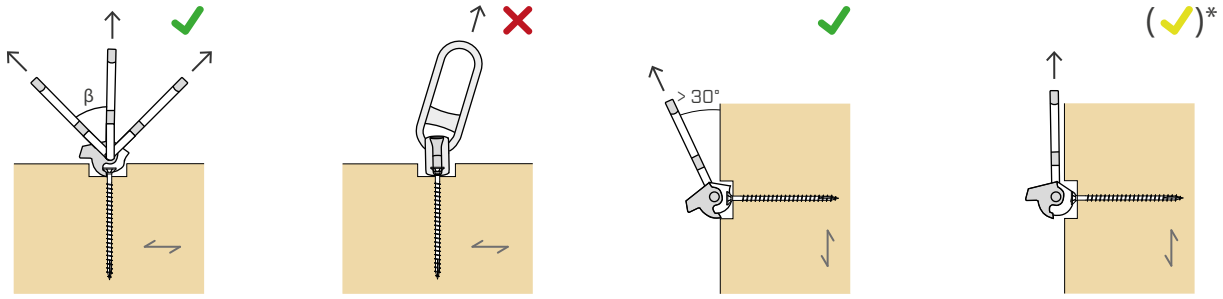
RIGGING CAPACITY | HOOK WITH VGS PLATE Ø11 |0.44”

HORIZONTAL CLT PANEL | STATICALLY DEFINED SYSTEM

LOAD CAPACITY PER STOPPING POINT

WASP | WASP L screw		assembly variant		
		perpendicular	perpendicular with milling	inclined
VGSPL Ø x L [mm] **Ø x L [inch]**	θ [°]	R_{WLL} [lb]	R_{WLL} [lb]	R_{WLL} [lb]
Ø11 x 60 **Ø0.44 x 2 3/8**	90	366	366	366
	75	333	354	357
	60	257	317	324
	45	177	259	271
Ø11 x 80 **Ø0.44 x 3 1/8**	90	571	571	571
	75	505	551	559
	60	368	494	518
	45	239	403	457
Ø11 x 100 **Ø0.44 x 4**	90	809	809	809
	75	703	782	795
	60	494	701	745
	45	311	572	675
Ø11 x 120 **Ø0.44 x 4 3/4**	90	1014	1014	1014
	75	846	979	998
	60	553	878	939
	45	330	717	861
Ø11 x 140 **Ø0.44 x 5 1/2**	90	1218	1218	1218
	75	978	1177	1200
	60	601	1055	1133
	45	343	861	1047
Ø11 x 160 **Ø0.44 x 6 1/4**	90	1423	1423	1423
	75	1101	1374	1403
	60	640	1232	1328
	45	353	1006	1233
Ø11 x 180 **Ø0.44 x 7 1/8**	90	1661	1661	1661
	75	1234	1605	1639
	60	678	1439	1554
	45	362	1175	1450
Ø11 x 200 **Ø0.44 x 8**	90	1900	1900	1900
	75	1356	1835	1875
	60	709	1646	1781
	45	369	1344	1667
Ø11 x 240 **Ø0.44 x 9 1/2**	90	2309	2309	2309
	75	1544	2230	2280
	60	752	2000	2170
	45	378	1633	2040
Ø11 x 280 **Ø0.44 x 11**	90	2718	2718	2718
	75	1711	2626	2685
	60	786	2354	2558
	45	385	1922	2412

DIRECTIONS OF APPLICATION ALLOWED

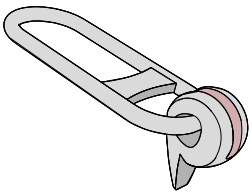


(*) See the "ELEVATION OF CLT ELEMENTS FROM HORIZONTAL TO VERTICAL" test.

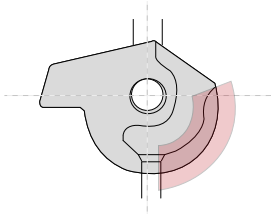
MAINTENANCE

ALWAYS FOLLOW THE INSTRUCTIONS IN THE MANUAL

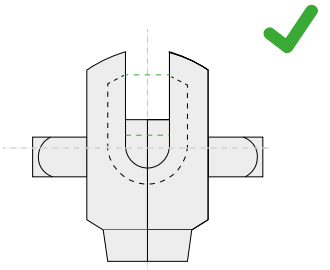
Prior to the inspection, the anchor's round head should be cleaned. Even if, under normal conditions, the lifting anchor does not show signs of wear, it should be checked at least annually by a skilled operator. Damage due to wear must be verified by a skilled operator. Plastic deformations (e.g. irreversible bending or punching) and cracks lead to the replacement of the hook; repairs and, in particular, welding on the hook are inadmissible.



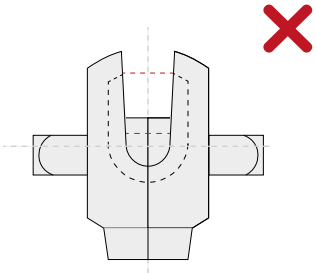
Isometric view of the WASP anchor.
The part of the anchor that must be checked is highlighted in red.



Section view of the WASP anchor round head.
The part of the eyelet subject to checking is highlighted in red.



Bottom view of the WASP anchor round head. The distance between the flanges corresponding to the closure of the eyelet is equal to that of the opening of the eyelet.
Check passed.

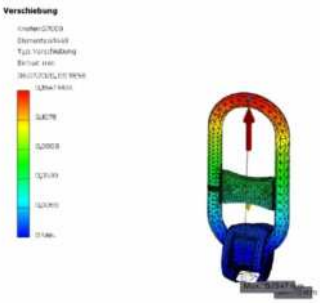


Bottom view of the anchor round head. The distance between the flanges corresponding to the closure of the eyelet is equal to that of the opening of the eyelet.
Check NOT passed.

WANT TO KNOW MORE?

For further technical information on the product, see the manual and further documents at www.rothoblaas.com.

ELEVATION OF CLT ELEMENTS FROM HORIZONTAL TO VERTICAL



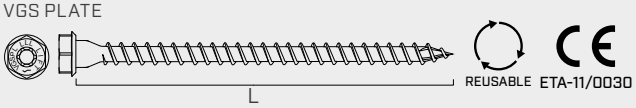
For test reports and capacities for elevation of CLT elements, contact the Rothoblaas Technical Office.

NOTES:

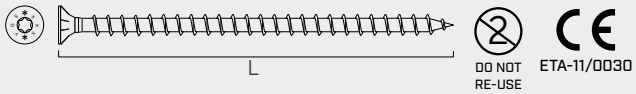
- Approved screws:

	VGS PLATE [mm | *in*]	VGS [mm | *in*]
WASP	Ø11 mm | *0.44"*	Ø11 mm | *0.44"*
WASPL	Ø11 mm | *0.44"*	Ø11 mm | *0.44"* - Ø13 mm | *0.51"*

VGS PLATE



VGS



- SP. G conversion:

G	Factor
0,35	0,85
0,42	1,0
0,49	1,1
0,55	1,2

GENERAL PRINCIPLES:

- The choice of fastener length is to be based each time on the dimensions of the wooden element, on the fastener's positioning, on the lift angle, and on the weight of the load to be lifted. In all cases, it is recommended that the connectors have greater length than the minimum required, but such that the tip does not protrude from the element to be lifted.
- The rigging capacity values (WLL) provided are based on calculations made according to ICC-ES Evaluation Report ESR-4645, the AWC-NDS 2018, AWC Technical Report 12, and the results of tests performed. Values provided in accordance with OSHA section 1926.753(e)(2), design values in accordance with OSHA section 1910.253(c)(26), with a safety factor meeting or exceeding 5.0 to maintain consistency across design approaches.
- A Specific Gravity of G = 0.42 was considered in the calculation. For application with different timber species and Specific Gravity the conversion table with the modification factors shall be used. The calculated value must never exceed the maximum capacity of 2860 lb for the WASP 3530 lb for the WASPL.
- All values of screw capacity are adjusted by a dynamic acceleration factor of 1/1.1, a load duration factor CD = 1.25, temperature factor Ct = 1.0, and wet service factor CM = 1.0, and assume screws are installed on-site directly prior to lifting.
- Checks for potential reductions in strength due to possible brittle failure related to the geometry of the lifted element must be conducted separately in accordance with AWC-NDS, particularly in scenarios where less than 70% of the beam depth is engaged by the fastener.
- All CLT calculations assume a load-to-grain angle of 90°, regardless of orientation, with no dowel length reductions considered for edge-grain lifting.
- For rigging capacity calculation in installation configurations other than those indicated here, contact Rothoblaas Technical Department.
- The rigging capacity values provided are calculated in the case of the plate fixed with screws inserted without pre-drilling. In accordance with ICC Evaluation Report ESR-4645. All minimum distance specifications must be increased for specific gravity values greater than 0.50.
- Fasteners must be installed in accordance with their relevant installation guide to avoid damage and maintain full performance in accordance to their design strength parameters.
- The use of pulse screw guns/impact wrenches is not permitted. Respect the insertion angle with the help of a pilot hole and/or installation template. Avoid bending. Ensure correct tightening. We recommend the use of torque-controlled screwdrivers, e.g. with TORQUE LIMITER. Alternatively, tighten with a torque wrench.
- VGS screws may only be used once. Once tightened and loaded, the screws must not be loosened and used a second time to secure the transport plate. As soon as the timber element to be transported has been lifted to its final position and the transport plate is no longer needed for this purpose, the screws must be unscrewed and disposed of properly.
- The VGS PLATE is the only fastener eligible for reuse. Refer to the technical data sheets and instruction manuals for VGS PLATE and the corresponding JIG REUSE when using either with the WASP/WASPL device.
- The lifting device may only be used by qualified personnel. The user manual (supplied as a QR code on the product and available at www.rothoblaas.com) must be read and understood before use. The information and instructions contained therein must be followed. If in doubt, contact the Rothoblaas Technical Department before use.