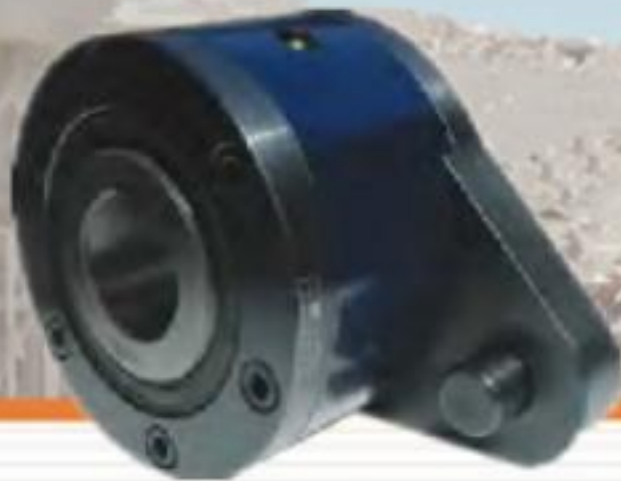


**BACKSTOP  
BKST-E  
KWN 31000**



**Product | Engineering Services  
Maintenance**

## Definition

When the slope of the conveyor is large and the load is carried upward, it has the tendency to reverse when it stops running upward due to the shutdown or the failure of the driving device. When the conveyor belt is reversed and the sliding force of the material is greater than the resistance generated by each friction of the conveyor, the conveyor belt will have a downward sliding acceleration due to the sliding force is greater than the resistance, and the material will accumulate at the tail of the conveyor, which will damage the conveyor belt and cause accidents in serious cases. In order to prevent the reverse movement of the conveyor, counteract this accelerating force, the application of reverse.

## Technical Features

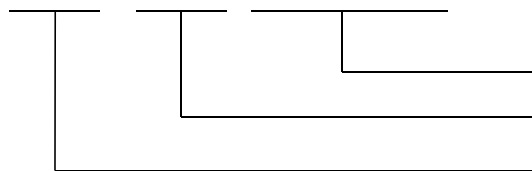
1. Large back-stopping torque and high reliability;
2. Long service life;
3. Light weight, easy installation and maintenance;
4. Suitable temperature  $-40^{\circ}\text{C}\sim+80^{\circ}\text{C}$ , beyond the range of consultation with us;
5. Allow free idling gliding speed;

## Application

The products are widely used in gear reducer matching, coking plant and transport machinery, conveyor, hoist, electric roller and other mechanical equipment that need to prevent reversal.

## Model Description

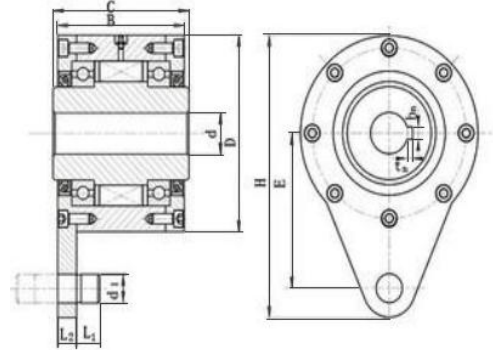
**BKST - E WBT 220**



Size NO.  
Mark of type  
Backstop

## WBC Type

Type WBC is a wedge type unidirectional clutch with bearing support and oil seal. The end cover of transmitting torque and the stop pin installed on it shall be connected with the hole on the wall of the working machine as a whole, and the match clearance between the stop pin and the hole shall be 1% of the diameter of the moving pin. The end cover is assembled, and the user can choose the rotation direction by himself



## Application

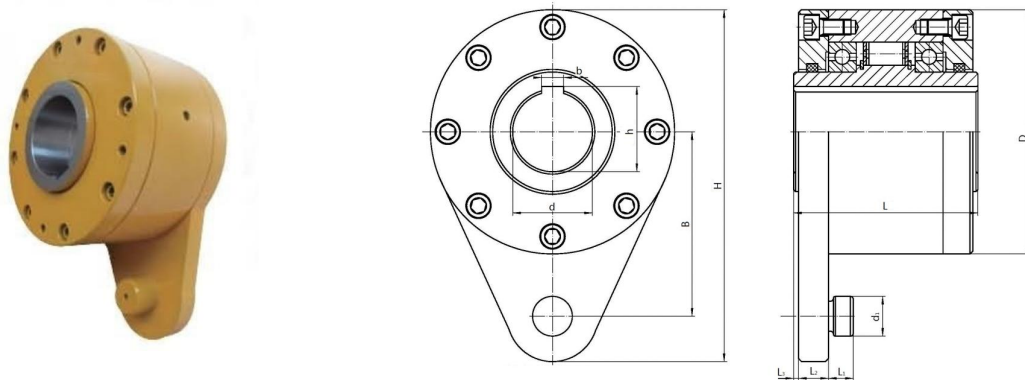
Mainly used for middle and low speed to prevent reversal, such as belt conveyor and bucket elevator, etc.

## Specifications and Sizes

Size	Rated reverse torque $T_n$ (N.m)	Max. speed of inner ring (rpm)	Structuresizes(mm)										Weight (kg)
			d [H7]	D	B	C	E	H	L <sub>1</sub>	L <sub>2</sub>	d <sub>1</sub>	t <sub>0</sub> Xb <sub>n</sub>	
1262	44	1200	12	62	42	44	44	87	10	14	10	4X1.8	1.4
1568	100	1200	15	68	52	54	47	93	10	14	10	5X2.3	1.8
2075	145	1000	20	75	58	60	54	103	10	14	12	6X2.8	2.3
2590	230	900	25	90	60	62	62	123	14	18	16	8X3.3	3.4
30100	400	800	30	100	68	70	68	135	14	18	16	10X3.3	4.5
35110	580	700	35	110	74	76	78	155	18	22	20	10X3.3	5.6
40125	820	600	40	125	86	88	85	170	18	22	20	12X3.3	8.5
45130	900	600	45	130	86	88	90	180	22	26	25	14X3.8	8.9
50150	1700	500	50	150	94	96	102	205	22	26	25	16X4.3	12.8
55160	2100	500	55	160	104	106	108	220	25	30	32	16X4.3	16.2
60170	2800	400	60	170	114	116	112	232	25	30	32	18X4.4	19.3
70190	4600	400	70	190	134	136	135	268	30	35	38	20X4.9	23.5
80210	6800	300	80	210	144	146	145	290	30	35	38	22X5.4	32.0
90230	11600	300	90	230	158	160	155	320	40	45	50	25X5.4	47.2

## WBF Type

Type WBF is a non-contact type backstop. Its internal structure adopts a new special-shaped wedge with optimized design. In addition to the impact resistance and huge stopper torque, it also cleverly utilizes the centrifugal force of its own rotation. When the forward rotation speed of the input shaft is higher than the minimum speed, the internal operation of the inverter can achieve no contact, zero wear and long service life.



## Application

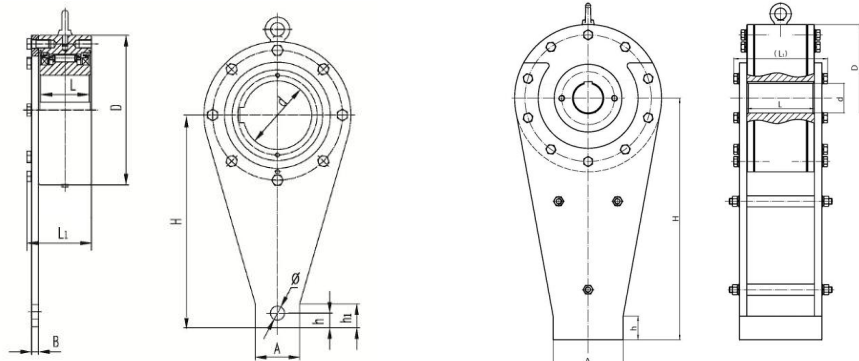
Mainly used for mining, bulk material collection of conveying device, lifting device has the design of reverse requirements.

## Specifications and Sizes

Size	Rated reverse torque (N.m)	Min.speed of non-contact (rpm)	Max.speed (r/min)	Bore size range (mm)	shaft length range(mm)	Structuresizes(mm)							Weight (kg)	
						D	d <sub>1</sub>	H	B	L	L <sub>1</sub>	L <sub>2</sub>		L <sub>3</sub>
10	1000	450	1500	32-50	120-142	190	28	278	150	162	25	20	5	28
16	1600	450	1500	45-60	125-148	208	32	305	160	167	25	22	5	31
25	2500	425	1500	50-70	130-152	230	38	330	170	172	25	25	5	38
40	4000	425	1500	60-80	135-162	245	42	358	185	183	28	30	5	49
63	6300	400	1500	70-90	155-178	260	45	378	195	196	30	35	5	62
80	8000	400	1500	80-100	160-182	275	48	410	210	200	35	35	5	73
100	10000	400	1500	90-110	170-218	295	52	440	225	238	35	45	5	98
125	12500	375	1500	100-130	180-248	330	58	492	250	262	40	50	8	154
160	16000	375	1000	110-140	200-258	360	62	532	260	273	40	55	8	175
200	20000	350	1000	120-150	205-258	405	65	590	300	275	50	58	8	241
250	25000	350	1000	130-160	230-268	440	70	646	335	285	50	63	8	256

## WBT Type

Type WBT is a low speed contact type backstop, which is arranged between several wedges according to certain rules. When the inner ring is rotating forward, the wedge is in touch with the inner and outer rings gently. When the inner ring is rotating backward, the special shaped block wedges the inner and outer rings tightly under the action of spring force, so as to bear the reverse torque. It has the advantages of compact structure, reliable reverse stop, easy release, convenient installation and strong practicability.



65-200

220-450

## Application

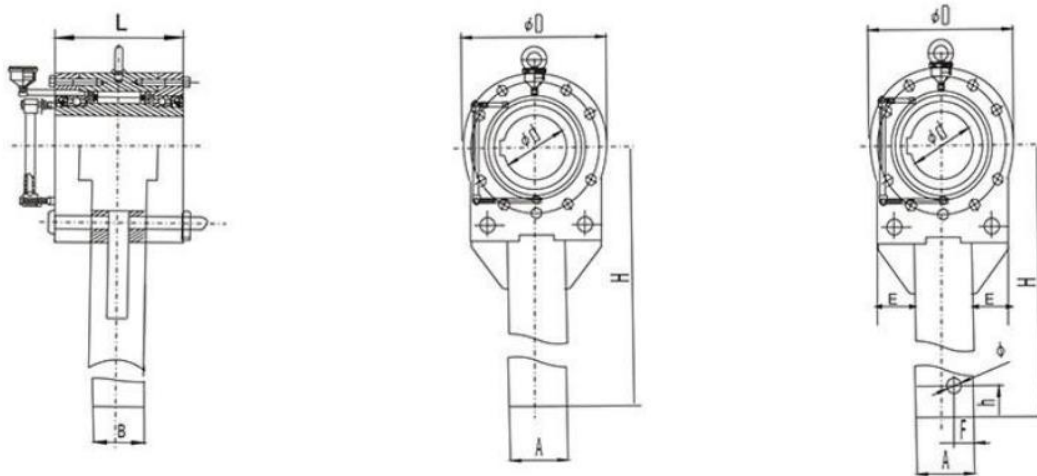
Mainly used for material lifting must be reversed occasions, widely used in belt conveyor machinery industry.

## Specifications and Sizes

Size	Rated reverse torque(N.m)	Bore size range (mm)	Max. speed of inner ring (rpm)	No-load torque(N.m)	Structuresizes(mm)									Max Weight (kg)
					A	B	D	H	h <sub>1</sub>	h	Φ	L	L <sub>1</sub>	
65	1600	50-65	150	4	50	6	160	226	30	16	13.5	85	106	13.5
75	2500	60-75		5	65	6	170	269	35	19	16.5	85	106	16.1
85	6000	70-85		8	95	9	210	329	45	29	20.5	110	135	29.2
95	8000	80-95		10	105	9	230	382	55	32	20.5	110	138	37.2
110	11000	90-110		15	110	12	270	425	60	40	26	110	141	46.1
130	16000	100-130	100	20	120	12	320	506	65	36	26	130	161	82.8
160	25000	120-160		35	120	20	360	612	65	32	31	140	183	125
200	38000	160-200		45	130	20	430	623	70	43	41	160	207	180
220	50000	160-220	80	75	238	259	500	820	80	--	--	230	303	351
250	90000	180-250	50	95	288	323	600	1000	100	--	--	290	367	675
270	125000	200-270		100	298	323	650	1100	110	--	--	290	367	737
300	180000	230-300		110	356	335	780	1300	135	--	--	290	392	1123
320	270000	250-320		140	386	345	850	1500	135	--	--	320	412	1425
350	320000	250-350		160	414	360	930	1600	135	--	--	360	426	1955
420	520000	320-420		220	474	484	1030	1800	165	--	--	450	550	2930
450	700000	350-450		250	526	494	1090	2000	165	--	--	480	574	3380

## WBTZ Type

Type WBTZ is a contact type low speed backstop with bearing support, filter interface, oil standard and labyrinth lubrication channel. It has the advantages of compact structure, light weight, reliable wedging, convenient installation and low installation accuracy. It can be directly installed on the drum shaft of the main engine, or directly installed on the reducer. It is a safety protection device for lifting transportation equipment. It has the advantages of high overrunning speed, large torque, high precision, long life, safer and more reliable.



## Application

Mainly used for the application of large dip angle conveyor, bucket elevator and other equipment with reverse requirements.

## Specifications and Sizes

Size	Rated reverse torque(N.m)	Max. speed of inner ring (rpm)	No-load torque(N.m)	Bore size range (mm)	Structuresizes(mm)									Max Weight (kg)
					A	B	D	H	h	$\Phi$	L	E	F	
160	16	150	20	100-130	120		320	506			150			98
250	25	150	35	120-160	140	80	360	800			150			112
400	40	150	45	160-200	160	88	430	850			160			182
500	50	150	75	160-220	200	100	500	1000			240			354
1000	100	150	95	180-250	250	120	600	1200			290			644
1300	130	90	100	200-270	280	120	650	1300	80	40	290	120	60	755
2000	200	90	110	230-300	320	130	780	1300	80	45	290	135	60	1088
2800	280	90	140	250-320	360	140	850	1500	100	50	320	150	70	1426
3300	330	80	160	260-350	400	140	930	1600	100	55	360	160	70	1921
5300	530	80	220	320-420	450	150	1030	1800	120	60	450	180	80	2945
7100	710	80	250	350-450	500	160	1090	2000	120	70	480	210	100	3518
10000	1000	70	280	380-480	560	170	1200	2200	150	80	500	230	110	4442



**SHENYANG KUDOSWORLD TECHNOLOGY CO., LTD**

Add: Orchard Summer Palace, No.209-2 Qingnian Street, Shenhe District, Shenyang City, China 110016

Tel: 0086 (024) 31976438

Fax: 0086(024) 3197 6437