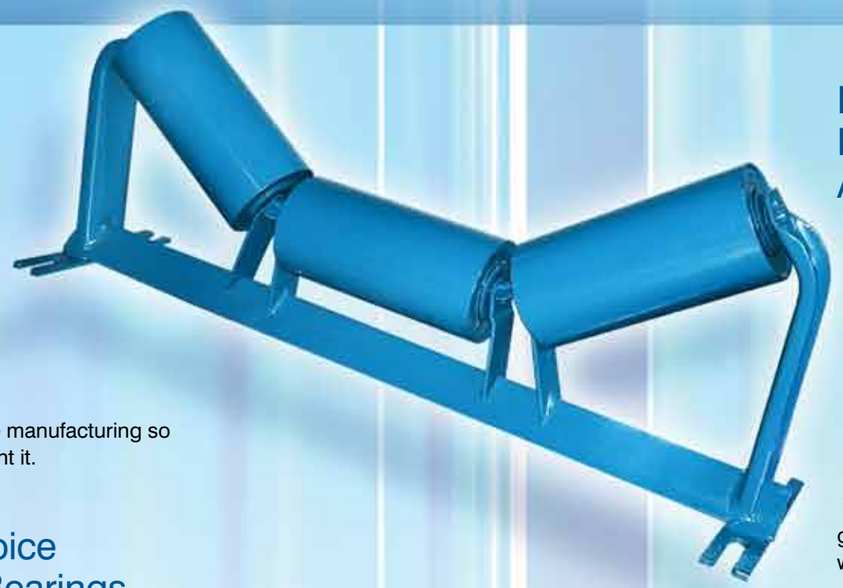
Introducing A Major New Innovation In Conveyors & Conveying

What You Want, When You Want It.℠

WHAT A CONCEPT!



Real People Answering Your Call

Technology is great, but when you need to order something in a hurry, you sure don't need to sit through a bunch of recordings and have to push buttons.

Components In Stock

We carry large inventories and have flexible manufacturing so you can have what you want, when you want it.

A Choice Of Bearings

We provide you with the options that you want. If you want to go with ball bearings, we have them, ready to go. If you want to go with roller bearings, we have them, ready to go, too. We are committed to your right to choose, without compromise.

The Option Of Regreasable Or Sealed Bearings

You know what works best in your operation. If you want regreasable or sealed bearings — we stock both.

Knowledgeable Experts That Can Actually Help

We have experienced people to help you select the right conveyor components to help you solve your conveying challenges. Put us to the test, we're ready.

Responsiveness That Saves You Time.

We know that time is a valuable asset, so we are not going to waste it. We are going to get you what you want. End of story.

JUST CALL:

800.388.7701

INTRODUCING

A ***NEW*** COMPANY THAT'S ALREADY THE OLDEST IN THE BUSINESS™

GOODMAN GH™ HEWITT

CONVEYORS & COMPONENTS

A *NEW* COMPANY THAT'S ALREADY THE OLDEST IN THE BUSINESS™

GOODMAN CONVEYOR

Hewitt-Robins CONVEYOR COMPONENTS

In 1891, Thomas Robins, founder of Hewitt-Robins, developed the first practical conveyor system for moving heavy abrasive materials utilizing steel idler rolls and rubber covered belting. Many of the other key technologies employed in belt conveying soon followed. In 1945, the Robins Conveying Belt Company merged with the Hewitt Rubber Company and the Hewitt-Robins brand was established.

Jeffrey Manufacturing was founded in 1877 and Goodman Equipment in 1898. Goodman Conveyor was formed in 1984 by merging the conveyor divisions of these two companies.

Today, Goodman-Hewitt brings together the thoroughbreds of the industry and more than a century of experience and know-how to create a new kind of conveyor & components company—one that brings a major, new, innovative concept to the industry by delivering "What You Want, When You Want It SM". What a concept!

GOODMAN G·H™ HEWITT

CONVEYORS & COMPONENTS

P.O. Box 866 • 645 Floyd Wright Drive • Belton, South Carolina 29627
P 800.388.7701 • F 877.233.8092

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What You Want, When You Want It.SM

CEMA B
CEMA C
CEMA D

GOODMAN GH™ HEWITT

CONVEYORS & COMPONENTS

What You Want, When You Want It.℠

CEMA B, C & D Ball Bearing Series — CEMA C & D Roller Bearing Series

IDLER IDENTIFICATION GUIDE

C5-35 T-36 B U

CEMA SERIES & ROLL DIA.
B - 4" & 5"
C- 4", 5", & 6"
D - 5" & 6"
E - 6" & 7"

ANGLE
10° - V-RETURN
20°
35°
45°

IDLER TYPE
T = Troughing Idler
TP = Troughing Idler Picking/Feeder
TO = Troughing Idler Offset
TPO = Troughing Idler Picking Feeder Offset
TI = Troughing Idler Impact
TPI = Troughing Idler Picking/Feeder Impact
TOI = Troughing Idler Offset Impact
TA = Troughing Self-Aligning
TAB = Troughing Self-Aligning Bidirectional Reversing
TSS = Troughing Scale Service
TSQ = Troughing Scale Quality
TCM = Troughing Inside Channel Mount
TCMI = Troughing Inside Channel Mount Impact
TSM = Troughing Low Profile Standard Mount
TV = Troughing Idler Variable Trough Angle
TW = Troughing Wire Rope or Rigid Rail
RF = Return/Flat Roll (hangers or stands separate)
RFD = Return/Flat Disc (hangers or stands separate)
RFI = Return/Flat Impact (hangers or stands separate)
RA = Return Self-Aligning
RAD = Return Self-Aligning Disc
RAB = Return Self-Aligning Bidirectional Reversing
RAW = Return Self-Aligning Wobbler
RV = Return V
FV = Inverted V
FA = Flat Carrying Self-Aligning
L = Live Shaft (Pillow block bearings separate)
LI = Live Shaft Impact (Pillow block bearings separate)

BELT WIDTH
B = 18" - 48"
C = 18" - 60"
D = 24" - 72"
E = 36" - 96"

BEARING
B = Ball Bearing Sealed
R = Tapered Roller Bearing Sealed

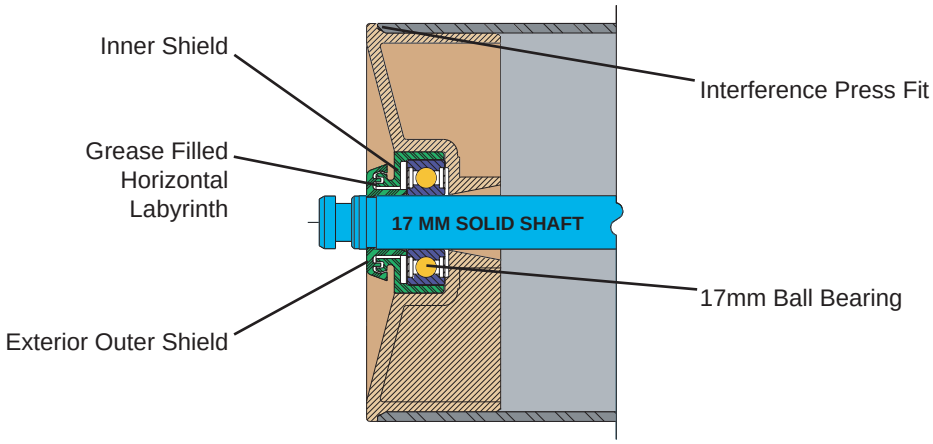
SUFFIX
U = Polyurethane
E = Polyethylene
G = Grain Troughing Idler
C = Catenary/Garland Idler
W = Wide base, BW+15"
7 = 7 gauge shell thickness
4 = 1/4" shell thickness
X = Special
XP = Special Project

RETROFIT ROLLS
CSL = return roll only GCC CSL Series
DBT = roll only Bucyrus
FMC = roll only FMC
PPI = roll only Precision
REX = roll only REX
SA = roll only Stephens Adamson
SUP = roll only Superior
SUPN = old Superior roll with nut
2000S = return roll HR 2000 S Series
Others = consult factory

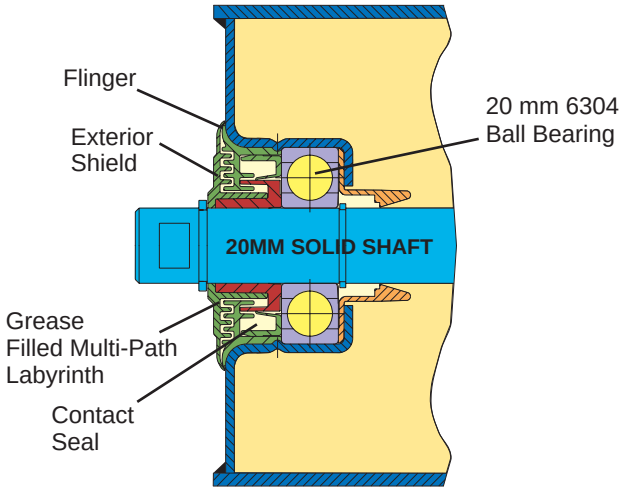
Roll Examples:

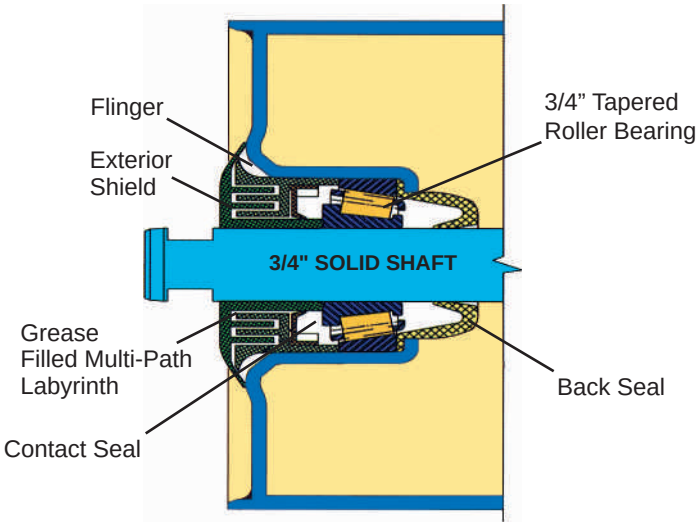
Troughing replacement roll	C5-T-36B
Impact troughing replacement roll	C5-TI-36B

B Series Roll Design Features

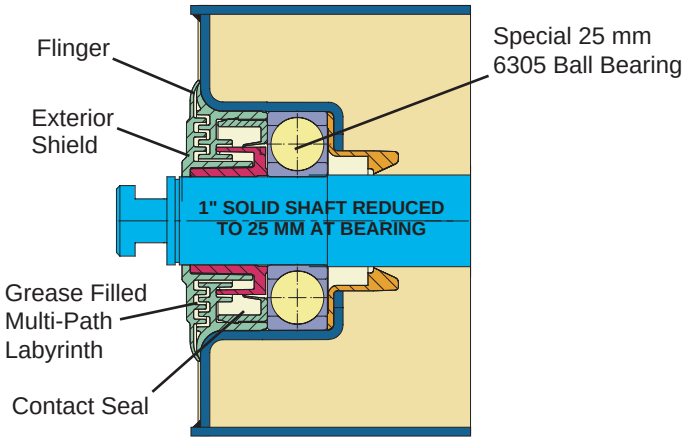


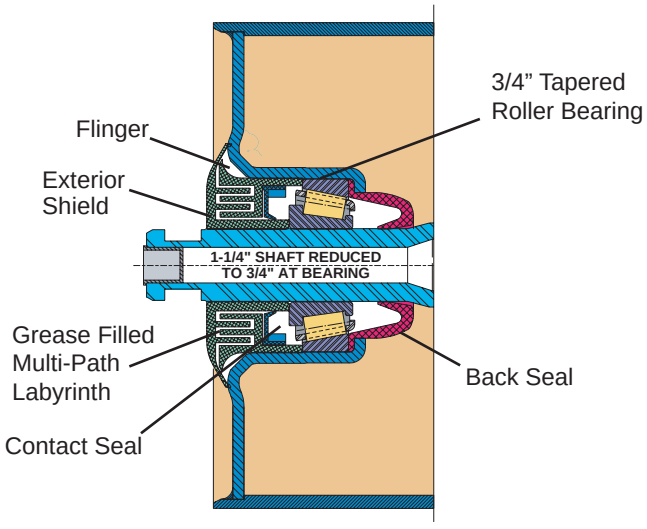
C Series Roll Design Features





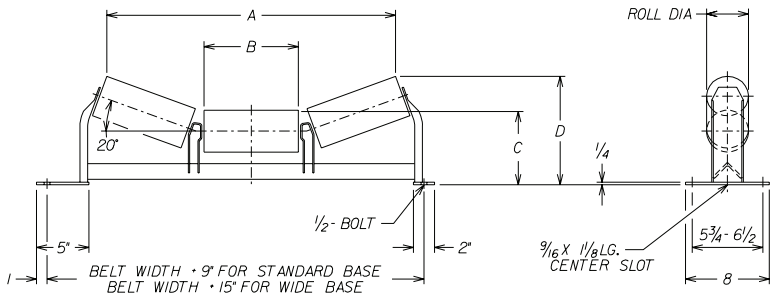
D Series Roll Design Features





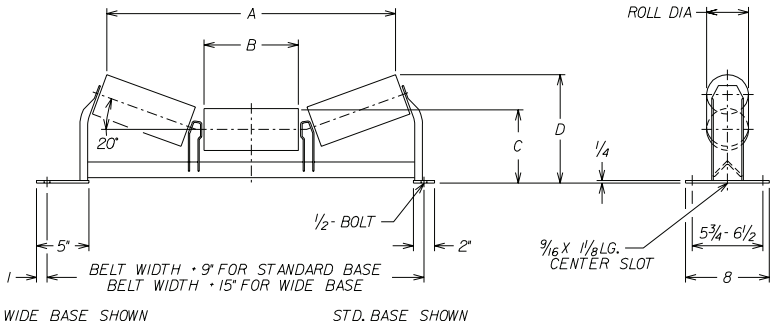
CEMA B BALL BEARING

20 DEG TROUGHING IDLER B4-20T-(BW)B 4" DIAMETER ROLL



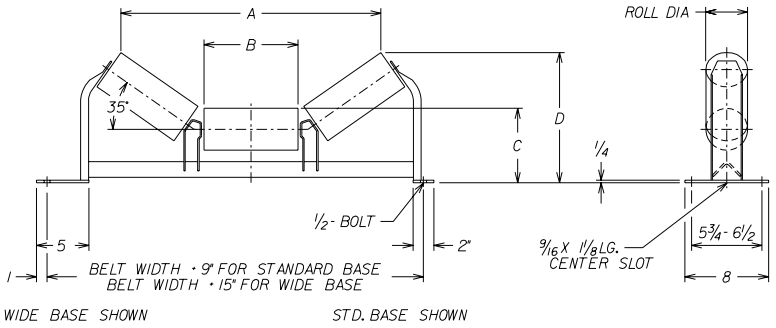
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	24	28	21-5/8	6-15/16	7-1/8	9-5/8
24	29	32	27-9/16	9	7-1/8	10-3/8
30	33	37	33-1/2	11-1/16	7-1/8	11-1/16
36	40	44	39-7/16	13-1/8	7-1/8	11-3/4
42	44	53	45-3/16	15-1/8	7-1/8	12-7/16
48	50	57	51	17-1/8	7-1/8	13-1/8

20 DEG TROUGHING IDLER B5-20T-(BW)B 5" DIAMETER ROLL



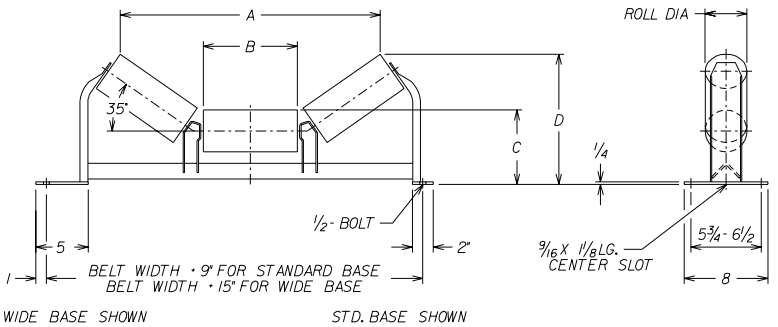
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	28	32	21-5/16	6-15/16	7-5/8	10-1/8
24	33	36	27-1/4	9	7-5/8	10-13/16
30	38	42	33-3/16	11-1/16	7-5/8	11-9/16
36	46	49	39-1/8	13-1/8	7-5/8	12-1/4
42	51	54	44-7/8	15-1/8	7-5/8	12-15/16
48	57	64	50-5/8	17-1/8	7-5/8	13-9/16

35 DEG TROUGHING IDLER B4-35T-(BW)B 4" DIAMETER ROLL



Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	25	29	19-7/16	6-15/16	7-1/8	11-1/4
24	30	33	24-7/8	9	7-1/8	12-1/2
30	34	38	30-5/16	11-1/16	7-1/8	13-5/8
36	41	45	35-3/4	13-1/8	7-1/8	14-13/16
42	45	48	41-1/16	15-1/8	7-1/8	16
48	51	-	45-5/16	17-1/8	7-1/8	17-1/8

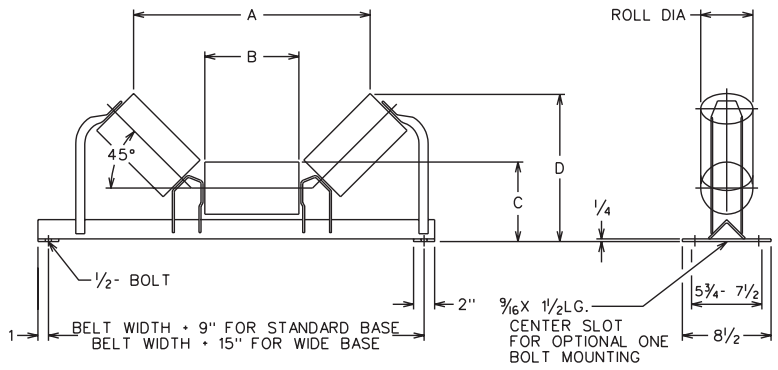
35 DEG TROUGHING IDLER B5-35T-(BW)B 5" DIAMETER ROLL



Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	28	-	18-7/8	6-15/16	7-5/8	11-11/16
24	34	37	24-1/4	9	7-5/8	12-7/8
30	39	43	29-3/4	11-1/16	7-5/8	14-1/16
36	47	50	35-3/16	13-1/8	7-5/8	15-1/4
42	52	55	40-7/16	15-1/8	7-5/8	16-3/8
48	58	-	45-3/4	17-1/8	7-5/8	17-1/2

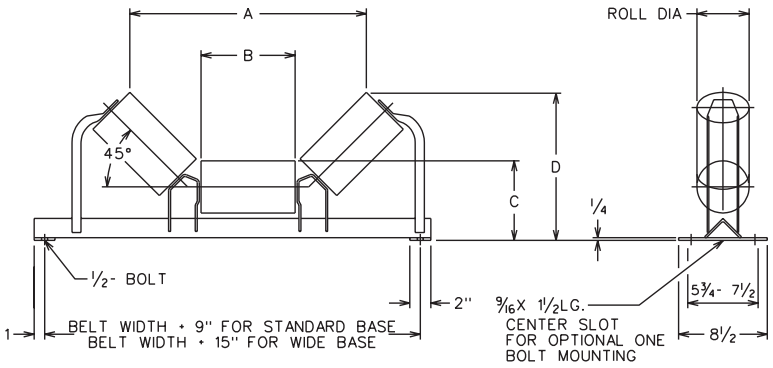
CEMA B BALL BEARING

45 DEG TROUGHING IDLER B4-45T-(BW)B 4" DIAMETER ROLL



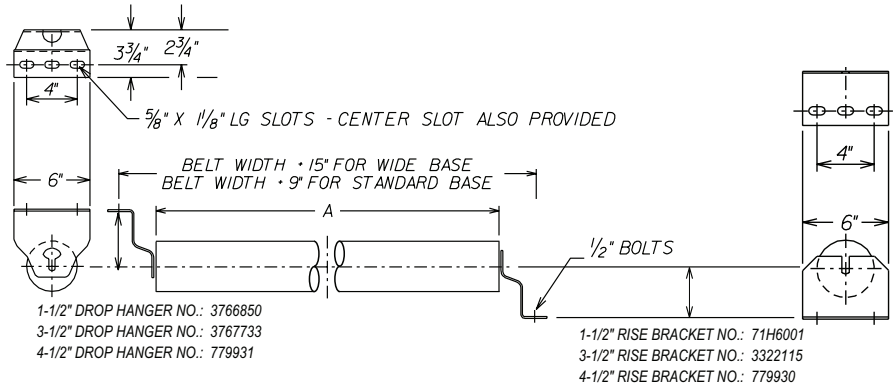
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
18	27	31	18-1/2	6-15/16	7-1/8	12-3/8
24	32	35	23-1/2	9	7-1/8	13-13/16
30	36	40	28-1/2	11-1/16	7-1/8	15-5/16
36	42	47	33-7/16	13-1/8	7-1/8	16-3/4
42	47	50	38-1/4	15-1/8	7-1/8	18-3/16
48	53	-	43-1/8	17-1/8	7-1/8	19-5/8

45 DEG TROUGHING IDLER B5-45T-(BW)B 5" DIAMETER ROLL



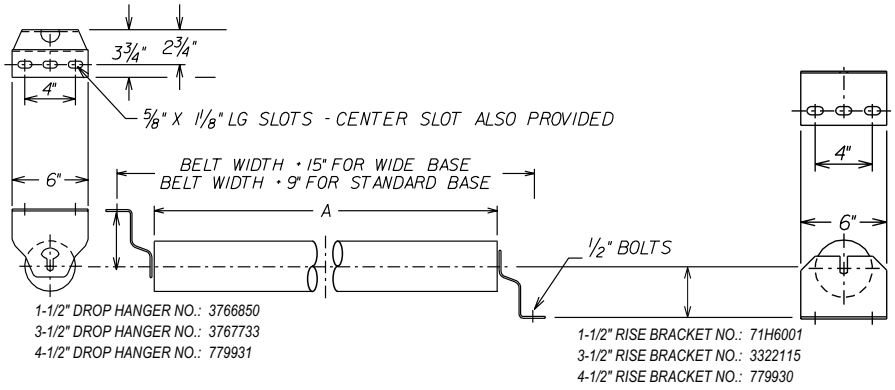
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
18	29	-	17-13/16	6-15/16	7-5/8	12-3/4
24	36	39	22-3/4	9	7-5/8	14-3/16
30	41	45	27-3/4	11-1/16	7-5/8	15-11/16
36	49	52	32-3/4	13-1/8	7-5/8	17-1/8
42	54	57	37-9/16	15-1/8	7-5/8	18-9/16
48	60	-	42-3/8	17-1/8	7-5/8	19-15/16

RETURN/FLAT CARRYING IDLER B4-RF-(BW)B 4" DIAMETER ROLL



BELT WIDTH	4" STD WT	A
18	15	21-1/8
24	18	27-1/8
30	21	33-1/8
36	24	39-1/8
42	27	45-1/8
48	31	51-1/8

RETURN/FLAT IDLER B5-RF-(BW)B 5" DIAMETER ROLL

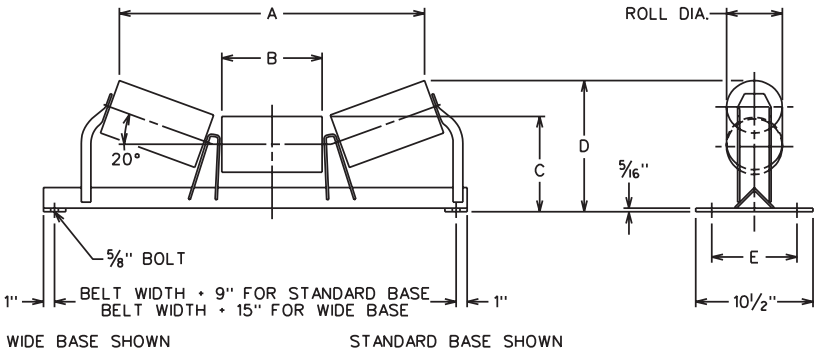


BELT WIDTH	5" STD WT	A
18	17	21-1/8
24	21	27-1/8
30	25	33-1/8
36	28	39-1/8
42	32	45-1/8
48	35	51-1/8

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt.

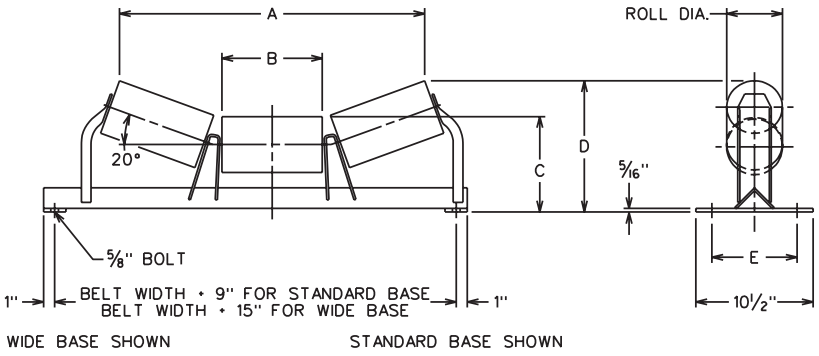
CEMA C BALL OR TAPERED ROLLER BEARING

20 DEG. TROUGHING IDLER C5-20T-(BW)B OR C5-20T-(BW)R 5" DIA ROLL



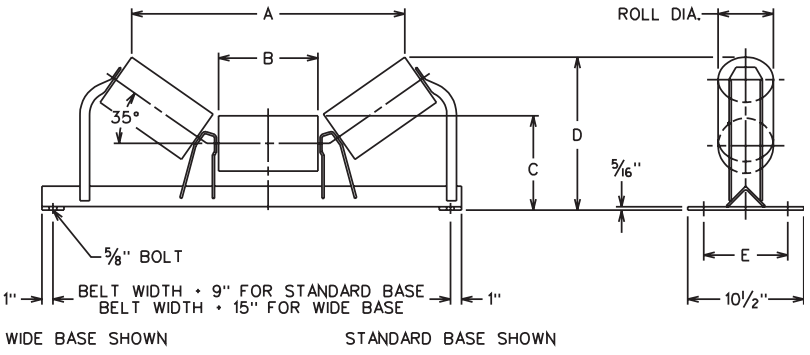
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	44	48	21-15/16	7-1/8	8-9/16	11-1/8	6¼ - 9
24	50	55	27-3/8	9	8-9/16	11-3/4	6¼ - 9
30	58	60	33-1/8	11	8-9-16	12-7/16	6¼ - 9
36	66	67	38-7/8	13	8-9/16	13-1/8	6¼ - 9
42	78	80	44-5/8	15	8-7/8	14-1/8	6¼ - 9
48	90	92	50-3/8	17	8-7/8	14-13/16	7 - 9
54	100	103	56-1/8	19	9-1/4	15-7/8	7 - 9
60	109	111	61-15/16	21	9-1/4	16-9/16	7 - 9

20 DEG. TROUGHING IDLER C6-20T-(BW)B OR C6-20T-(BW)R 6" DIA ROLL



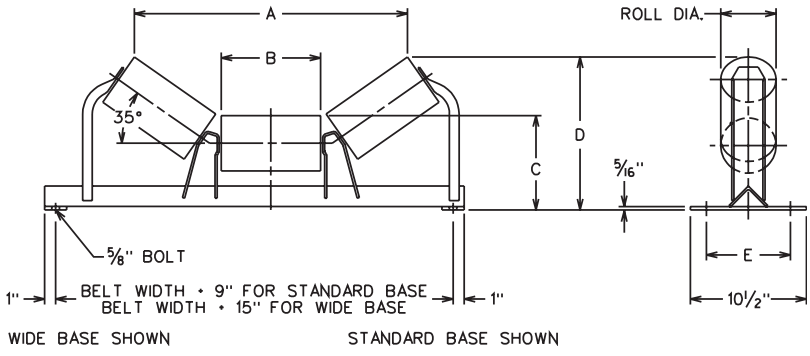
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	51	-	21-5/8	7-1/8	9-1/16	11-5/8	6¼ - 9
24	59	63	27	9	9-1/16	12-1/4	6¼ - 9
30	69	70	32-3/4	11	9-1/16	13-1/4	6¼ - 9
36	77	78	38-1/2	13	9-1/16	13-5/8	6¼ - 9
42	90	93	44-5/16	15	9-3/8	14-5/8	6¼ - 9
48	104	106	50-1/16	17	9-3/8	15-5/16	7 - 9
54	116	118	55-13/16	19	9-3/4	16-3/8	7 - 9
60	125	128	61-9/16	21	9-3/4	17	7 - 9

35 DEG. TROUGHING IDLER C5-35T-(BW)B OR C5-35T-(BW)R 5" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	45	50	19-13/16	7-1/8	8-9/16	12-13/16	6¼ - 9
24	51	57	24-3/4	9	8-9/16	13-7/8	6¼ - 9
30	60	62	30	11	8-9/16	15	6¼ - 9
36	68	70	35-5/16	13	8-9/16	16-3/16	6¼ - 9
42	81	83	40--9/16	15	8-7/8	17-5/8	6¼ - 9
48	93	95	45-7/8	17	8-7/8	18-13/16	7 - 9
54	106	108	51-1/8	19	9-1/4	20-5/16	7 - 9
60	115	118	56-3/8	21	9-1/4	21-7/16	7 - 9

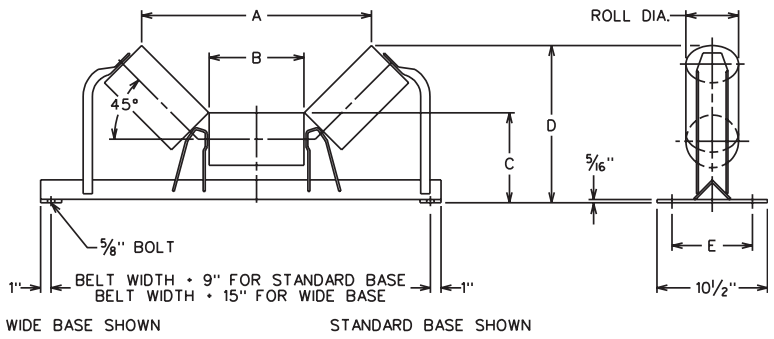
35 DEG. TROUGHING IDLER C6-35T-(BW)B OR C6-35T-(BW)R 6" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	52	57	19-1/4	7-1/8	9-1/16	13-3/16	6¼ - 9
24	59	65	24-3/16	9	9-1/16	14-5/16	6¼ - 9
30	71	73	29-7/16	11	91/16	15-7/16	6¼ - 9
36	79	81	34-3/4	13	9-1/16	16-9/16	6¼ - 9
42	93	95	40	15	9-3/8	18-1/16	6¼ - 9
48	107	109	45-1/4	17	9-3/8	19-3/16	7 - 9
54	121	124	50-9/16	19	9-3/4	20-11/16	7 - 9
60	132	134	55-13/16	21	9-3/4	21-7/8	7 - 9

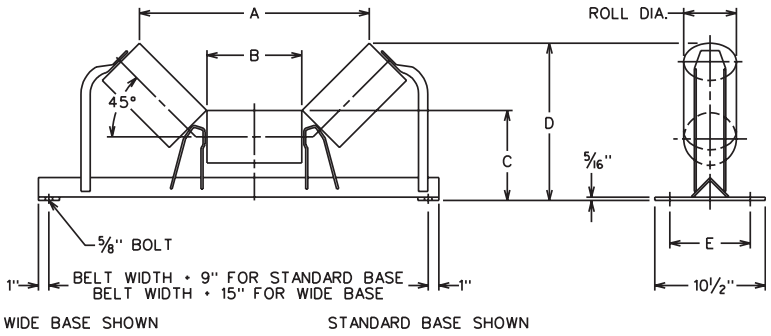
BALL OR TAPERED ROLLER BEARING CEMA C

45 DEG. TROUGHING IDLER C5-45T-(BW)B OR C5-45T-(BW)R 5" DIA ROLL



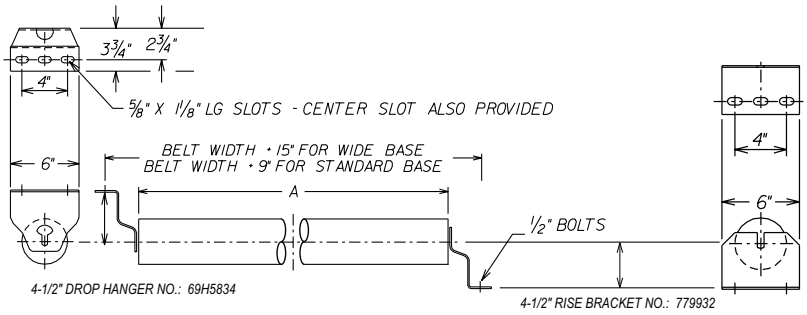
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	49	54	18-3/16	7-1/8	8-9/16	13-13/16	6¼ - 9
24	56	61	22-11/16	9	8-9/16	15-1/8	6¼ - 9
30	67	68	27-1/2	11	8-9/16	16-9/16	6¼ - 9
36	75	76	32-5/16	13	8-9/16	17-15/16	6¼ - 9
42	88	90	37-3/16	15	8-7/8	19-11/16	6¼ - 9
48	101	104	42	17	8-7/8	21-1/8	7 - 9
54	110	113	46-13/16	19	9-1/4	22-7/8	7 - 9
60	120	123	51-11/16	21	9-1/4	24-5/16	7 - 9

45 DEG. TROUGHING IDLER C6-45T-(BW)B OR C6-45T-(BW)R 6" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	49	54	17-7/16	7-1/8	9-1/16	14-3/16	6¼ - 9
24	56	61	22	9	9-1/16	15-1/2	6¼ - 9
30	67	68	26-13/16	11	9-1/16	16-7/8	6¼ - 9
36	75	76	31-5/8	13	9-1/16	18-5/16	6¼ - 9
42	88	90	36-1/2	15	9-3/8	20-1/16	6¼ - 9
48	101	104	41-5/16	17	9-3/8	21-1/2	7 - 9
54	110	113	46-1/8	19	9-3/4	23-1/4	7 - 9
60	120	123	50-15/16	21	9-3/4	24-11/16	7 - 9

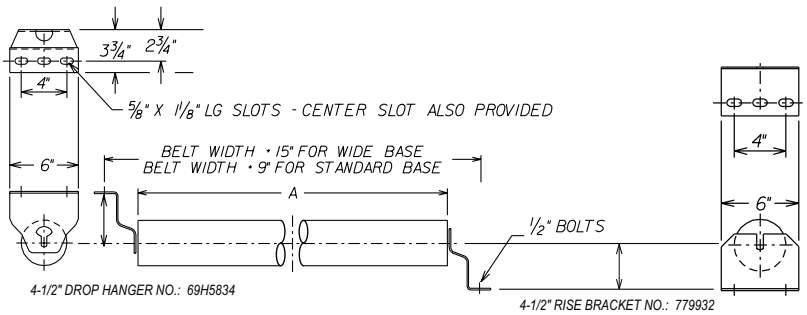
RETURN/FLAT CARRYING IDLER C5-RF-(BW)B OR C5-RF-(BW)R 5" DIA ROLL



Flat Carrying		
BELT WIDTH	5" STD WT	A
18	23	21
24	28	27
30	32	33
36	36	39
42	40	45
48	45	51

Contact factory for other drop and rise heights.
Drop/Stand weight included (4lbs/pr).

RETURN/FLAT CARRYING IDLER C6-RF-(BW)B OR C6-RF-(BW)R 6" DIA ROLL



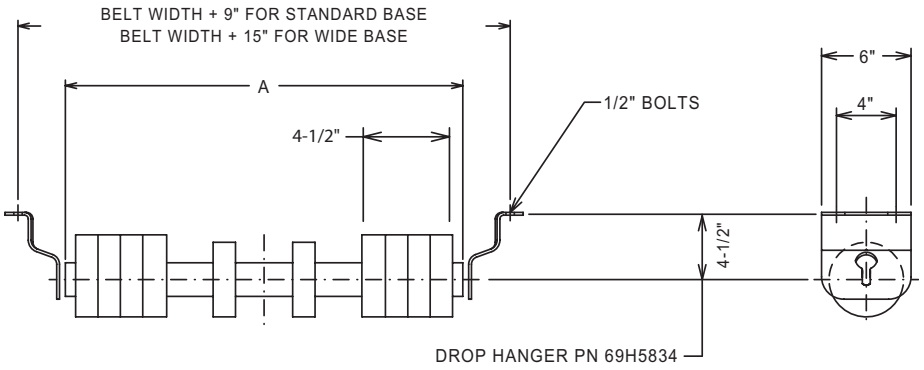
Flat Carrying		
BELT WIDTH	6" STD WT	A
18	29	21
24	34	27
30	40	33
36	45	39
42	51	45
48	57	51

Contact factory for other drop and rise heights.
Drop/Stand weight included (4lbs/pr).

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt. Consult factory for 4" diameter.

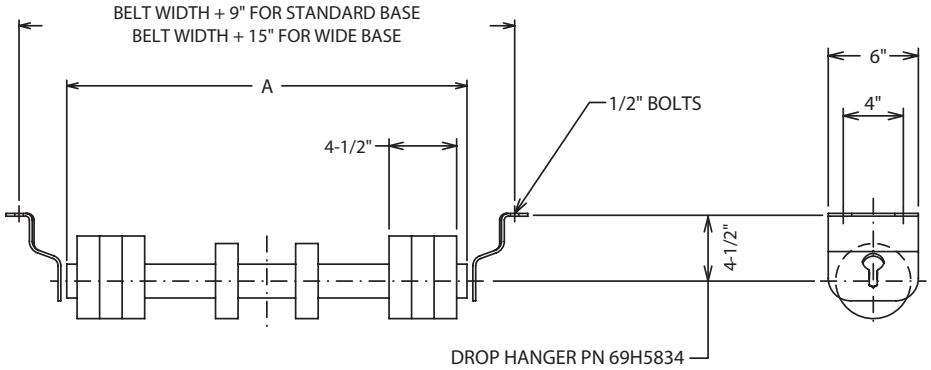
CEMA C BALL AND TAPERED ROLLER BEARING

DISC RETURN C5-RFD-(BW)B 5" DIA ROLL



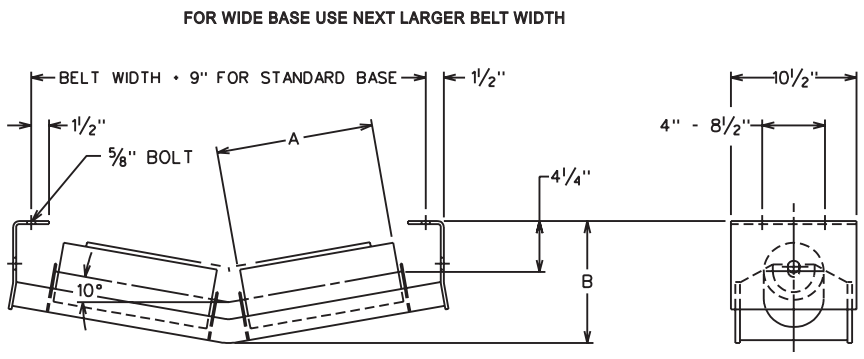
5 Inch Return RUBBER DISC		
BELT WIDTH	STD WT	A
18	24	21-1/8
24	29	27-1/8
30	34	33-1/8
36	39	39-1/8
42	44	45-1/8
48	49	51-1/8

DISC RETURN C6-RFD-(BW)B 6" DIA ROLL



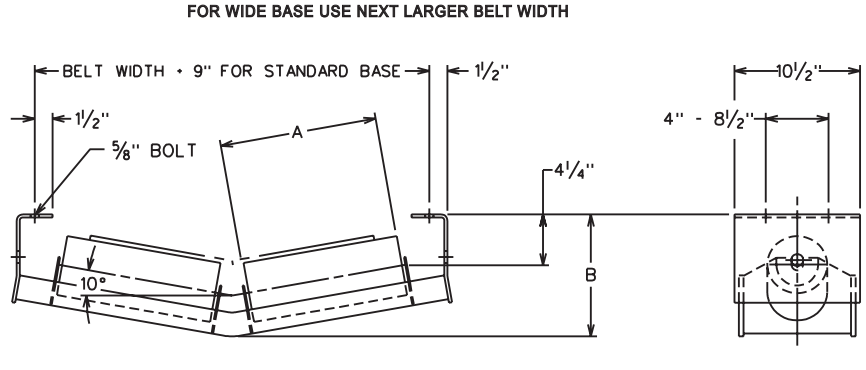
6 Inch Return RUBBER DISC		
BELT WIDTH	STD WT	A
18	30	21-1/8
24	35	27-1/8
30	42	33-1/8
36	48	39-1/8
42	54	45-1/8
48	61	51-1/8

10 DEG. V RETURN IDLER C5-10RV-(BW)B OR C5-10RV-(BW)R 5" DIA ROLL



BELT WIDTH	5" STD WT	A	B
24	63	13	10-1/4
30	71	17	10-3/4
36	76	19	11-5/16
42	83	23	11-13/16
48	87	27	12-5/16
54	101	29	12-7/8
60	107	33	13-3/8

10 DEG. V RETURN IDLER C6-10RV-(BW)B OR C6-10RV-(BW)R 6" DIA ROLL

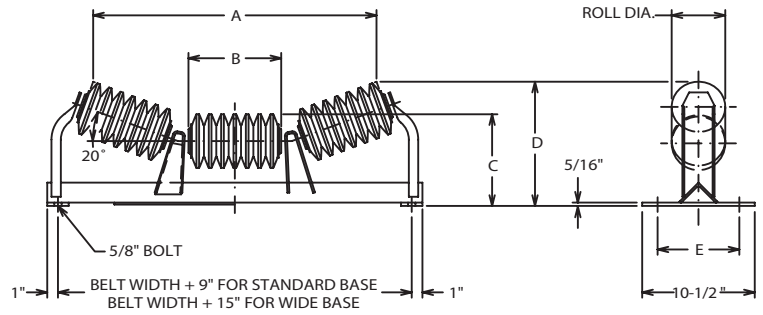


BELT WIDTH	6" STD WT	A	B
24	69	13	10-1/4
30	79	17	10-3/4
36	84	19	11-5/16
42	93	23	11-13/16
48	100	27	12-5/16
54	115	29	12-7/8
60	123	33	13-3/8

BALL BEARING — CEMA C

20 DEG. IMPACT TROUGHING IDLER — C5-20TI-(BW)B — 5" DIA ROLL

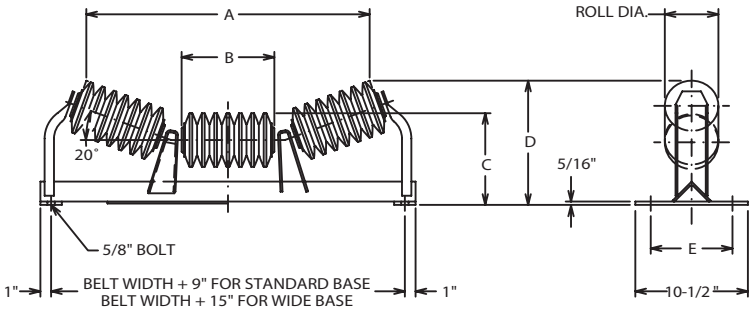
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	43	48	21	6-7/8	8-9/16	10-15/16	6¼ - 9
24	52	57	26-7/16	8-3/4	8-9/16	11-5/8	6¼ - 9
30	61	63	32-3/16	10-3/4	8-9/16	12-5/16	6¼ - 9
36	70	72	37-15/16	12-3/4	8-9/16	12-15/16	6¼ - 9
42	91	95	43-11/16	14-3/4	8-15/16	14	6¼ - 9
48	112	114	49-1/2	16-3/4	8-15/16	14-11/16	7 - 9
54	123	126	55-1/4	18-3/4	9-1/4	15-3/8	7 - 9
60	135	138	61	20-3/4	9-1/4	16-1/16	7 - 9

20 DEG. IMPACT TROUGHING IDLER — C6-20TI-(BW)B — 6" DIA ROLL

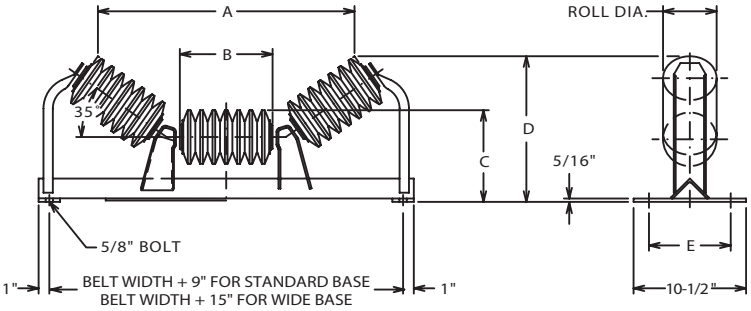
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	47	52	20-11/16	6-7/8	9-1/16	11-7/16	6¼ - 9
24	58	63	26-1/16	8-3/4	9-1/16	12-1/16	6¼ - 9
30	68	70	31-13/16	10-3/4	9-1/16	12-3/4	6¼ - 9
36	79	81	37-5/8	12-3/4	9-1/16	13-7/16	6¼ - 9
42	102	106	43-3/8	14-3/4	9-7/16	14-1/2	6¼ - 9
48	124	126	49-1/8	16-3/4	9-7/16	15-3/16	7 - 9
54	136	139	54-7/8	18-3/4	9-3/4	15-7/8	7 - 9
60	150	153	60-5/8	20-3/4	9-3/4	16-9/16	7 - 9

35 DEG. IMPACT TROUGHING IDLER — C5-35TI-(BW)B — 5" DIA ROLL

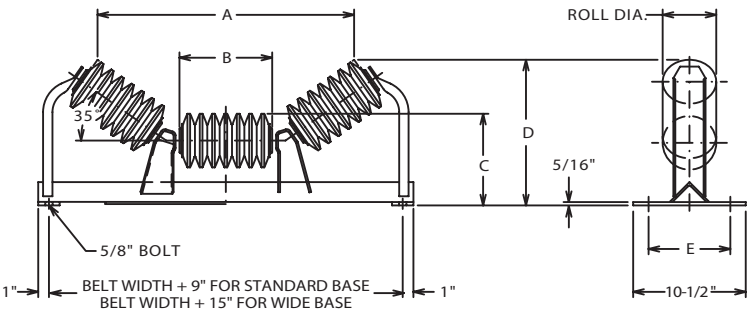
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	45	50	19	6-7/8	8-9/16	12-1/2	6¼ - 9
24	54	59	23-15/16	8-3/4	8-9/16	13-9/16	6¼ - 9
30	63	65	29-3/16	10-3/4	8-9/16	14-3/4	6¼ - 9
36	72	74	34-1/2	12-3/4	8-9/16	15-7/8	6¼ - 9
42	90	93	39-3/4	14-3/4	8-15/16	17-7/16	6¼ - 9
48	113	116	45	16-3/4	8-15/16	18-9/16	7 - 9
54	122	126	50-1/4	18-3/4	9-1/4	19-11/16	7 - 9
60	135	138	55-1/2	20-3/4	9-1/4	21-3/16	7 - 9

35 DEG. IMPACT TROUGHING IDLER — C6-35TI-(BW)B — 6" DIA ROLL

42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



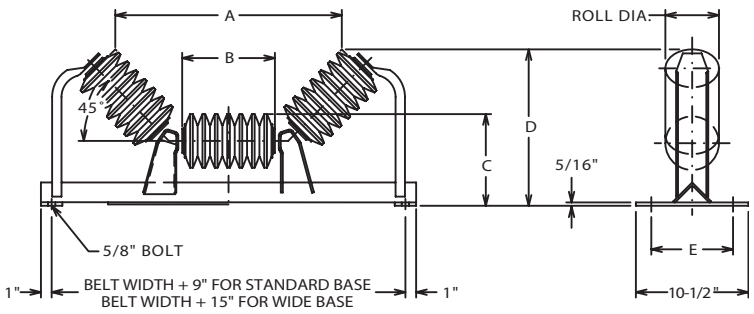
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	49	50	18-5/8	6-7/8	9-1/16	12-15/16	6¼ - 9
24	59	65	23-9/16	8-3/4	9-1/16	14	6¼ - 9
30	70	72	28-7/8	10-3/4	9-1/16	15-1/8	6¼ - 9
36	81	83	34-1/8	12-3/4	9-1/16	16-5/16	6¼ - 9
42	112	120	39-7/16	14-3/4	9-7/16	17-13/16	6¼ - 9
48	136	140	44-11/16	16-3/4	9-7/16	19	7 - 9
54	148	151	49-15/16	18-3/4	9-3/4	20-1/8	7 - 9
60	164	166	55-3/16	20-3/4	9-3/4	21-1/4	7 - 9

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt.

CEMA C BALL BEARING

45 DEG. IMPACT TROUGHING IDLER C5-45TI-(BW)B 5" DIA ROLL

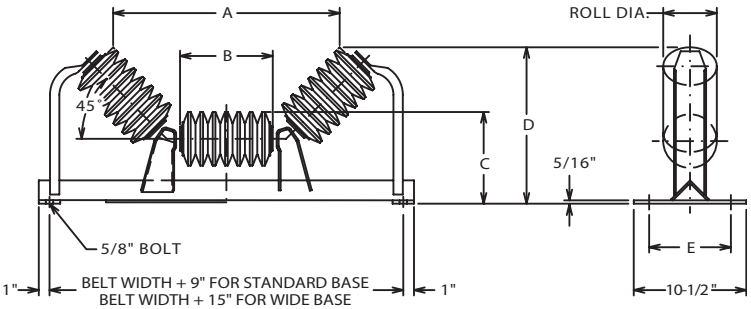
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	49	55	16-9/16	6-7/8	8-9/16	13-1/4	6¼ - 9
24	58	63	21-7/16	8-3/4	8-9/16	14-9/16	6¼ - 9
30	70	71	26-1/4	10-3/4	8-9/16	16	6¼ - 9
36	79	81	31-1/16	12-3/4	8-9/16	17-7/16	6¼ - 9
42	112	120	36	14-3/4	8-15/16	19-1/4	6¼ - 9
48	136	140	40-3/4	16-3/4	8-15/16	20-5/8	7 - 9
54	148	151	45-9/16	18-3/4	9-1/4	22-3/8	7 - 9
60	164	166	50-7/16	20-3/4	9-1/4	23-15/16	7 - 9

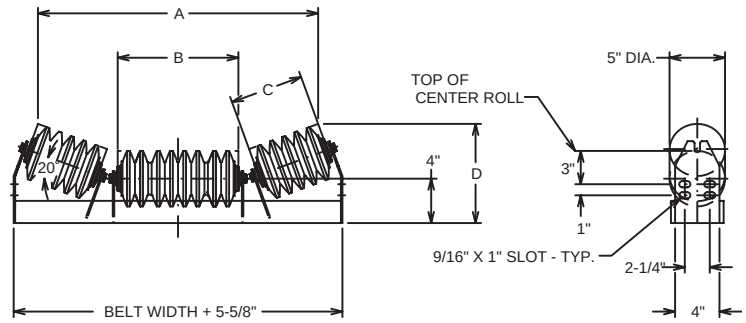
45 DEG. IMPACT TROUGHING IDLER C6-45TI-(BW)B 6" DIA ROLL

42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



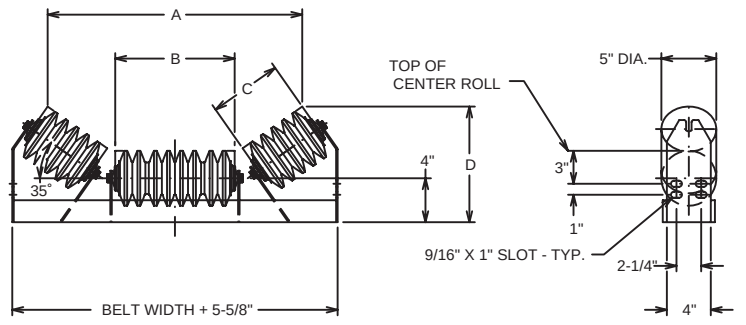
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
18	43	46	16-3/16	6-7/8	9-1/16	13-5/8	6¼ - 9
24	52	57	20-3/4	8-3/4	9-1/16	15-1/8	6¼ - 9
30	61	63	25-9/16	10-3/4	9-1/16	16-3/8	6¼ - 9
36	70	72	30-3/8	12-3/4	9-1/16	17-3/4	6¼ - 9
42	91	95	33-1/4	14-3/4	9-7/16	19-9/16	6¼ - 9
48	112	114	40-1/16	16-3/4	9-7/16	21	7 - 9
54	123	126	44-7/8	18-3/4	9-3/4	22-3/4	7 - 9
60	135	138	49-11/16	20-3/4	9-3/4	24-3/16	7 - 9

20 DEG. IMPACT CHANNEL MOUNT IDLER C5-20TCMI-(BW)B 5" DIA ROLL



BELT WIDTH	STD WT	A	B	C	D
24	44	25-1/4	11	6-3/4	8-15/16
30	49	31-1/2	13	9	9-11/16
36	57	37-1/4	15	11	10-3/8
42	65	43	17	13	11-1/16
48	73	48-3/4	19	15	11-3/4
54	80	54-1/2	21	17	12-7/16
60	87	60-1/2	23	19	13-1/8

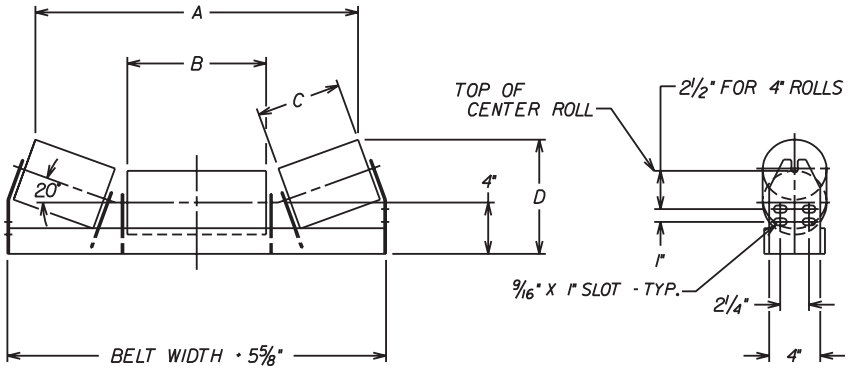
35 DEG. IMPACT CHANNEL MOUNT IDLER C5-35TCMI-(BW)B 5" DIA ROLL



BELT WIDTH	STD WT	A	B	C	D
24	45	23-3/16	11	6-3/4	10-1/2
30	50	28-7/8	13	9	11-13/16
36	59	34-1/8	15	11	13
42	66	39-7/16	17	13	14-1/8
48	75	44-11/16	19	15	15-1/4
54	82	50	21	17	16-7/16
60	89	55-1/4	23	19	17-9/16

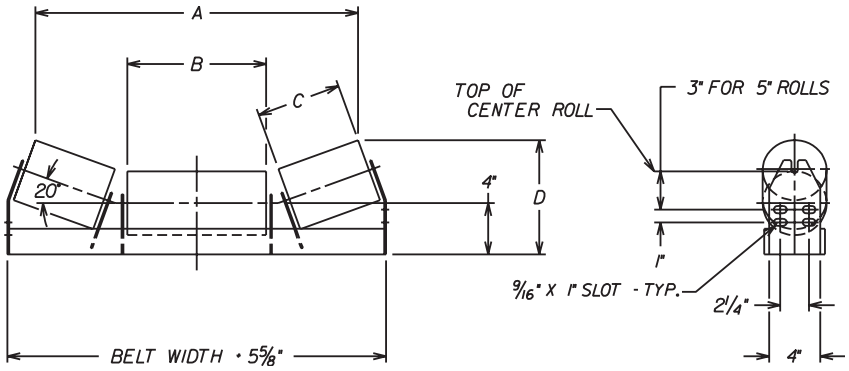
BALL BEARING CEMA C

20 DEG. CHANNEL MOUNT IDLER C4-20TCM-(BW)B 4 ” DIA ROLL



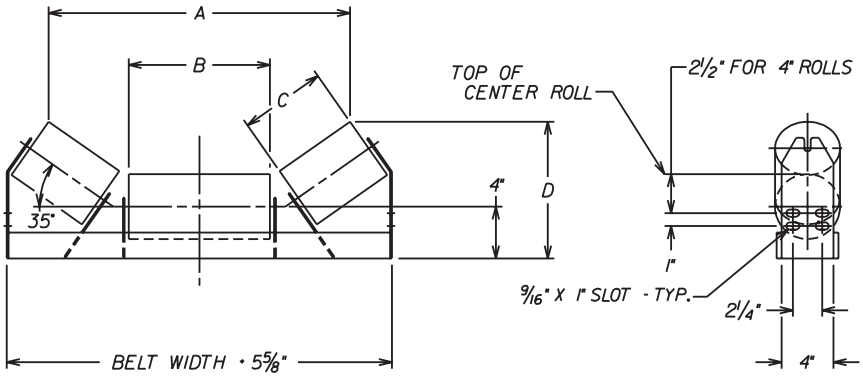
BELT WIDTH	STD WT	A	B	C	D
24	33	25-5/8	11	6-7/8	8-1/2
30	37	31-13/16	13	9	9-1/4
36	45	37-9/16	15	11	9-15/16
42	51	43-5/16	17	13	10-5/8
48	57	49-1/8	19	15	11-1/4
54	64	54-13/16	21	17	12
60	71	60-5/8	23	19	12-11/16

20 DEG. CHANNEL MOUNT IDLER C5-20TCM-(BW)B 5” DIA ROLL



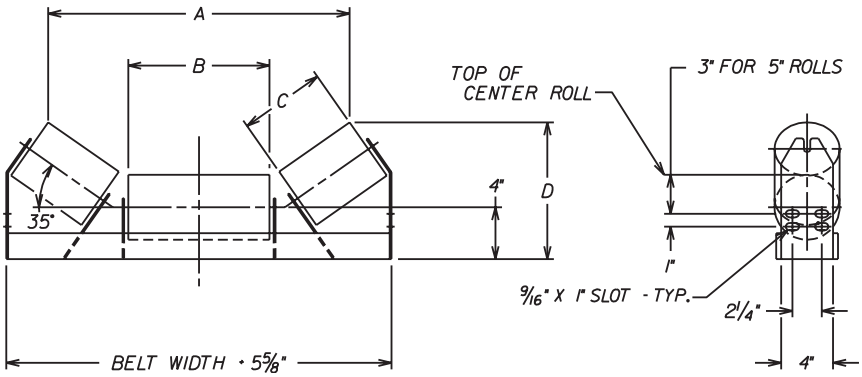
BELT WIDTH	STD WT	A	B	C	D
24	36	25-1/4	11	6-7/8	8-15/16
30	43	31-1/2	13	9	9-11/16
36	50	37-1/4	15	11	10-3/8
42	56	43	17	13	11-1/16
48	63	48-3/4	19	15	11-3/4
54	70	54-1/2	21	17	12-7/16
60	77	60-1/4	23	19	13-1/8

35 DEG. CHANNEL MOUNT IDLER C4-35TCM-(BW)B 4” DIA ROLL



BELT WIDTH	STD WT	A	B	C	D
24	34	23-3/4	11	6-7/8	10-1/8
30	38	29-7/16	13	9	11-7/16
36	46	34-3/4	15	11	12-9/16
42	52	40	17	13	13-11/16
48	59	45-1/4	19	15	14-7/8
54	65	50-9/16	21	17	16
60	72	55-13/16	23	19	17-1/8

35 DEG. CHANNEL MOUNT IDLER C5-35TCM-(BW)B 5” DIA ROLL

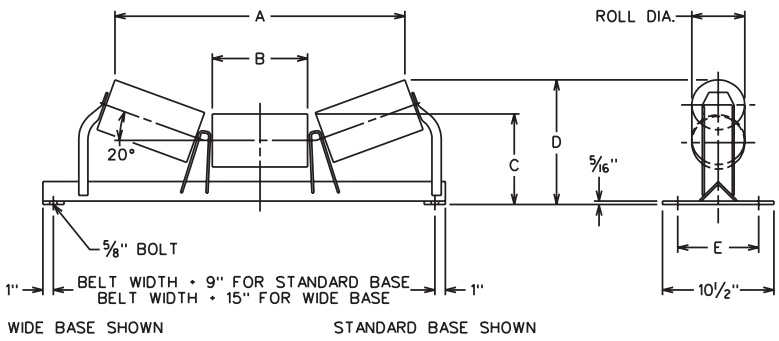


BELT WIDTH	STD WT	A	B	C	D
24	37	23-3/16	11	6-7/8	10-1/2
30	44	28-7/8	13	9	11-13/16
36	51	34-1/8	15	11	13
42	58	39-7/16	17	13	14-1/8
48	64	44-11/16	19	15	15-1/4
54	70	50	21	17	16-7/16
60	77	55-1/4	23	19	17-9/16

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8” bolt. CEMA allows 1/2” bolt through 36” belt width.
Bolt slots on drop hangers allow up to 1/2” bolt.

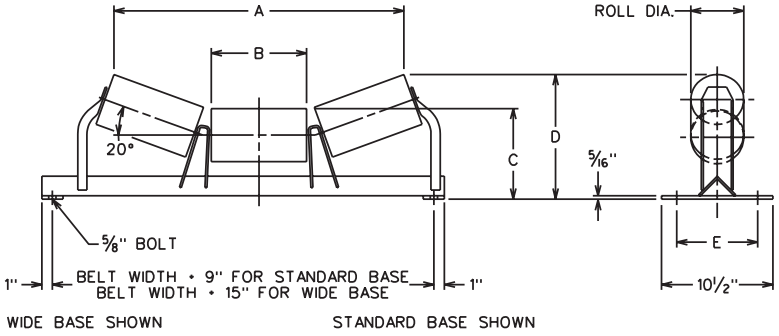
CEMA D BALL OR TAPERED ROLLER BEARING

20 DEG. TROUGHING IDLER D5-20T-(BW)B OR D5-20T-(BW)R 5" DIA ROLL



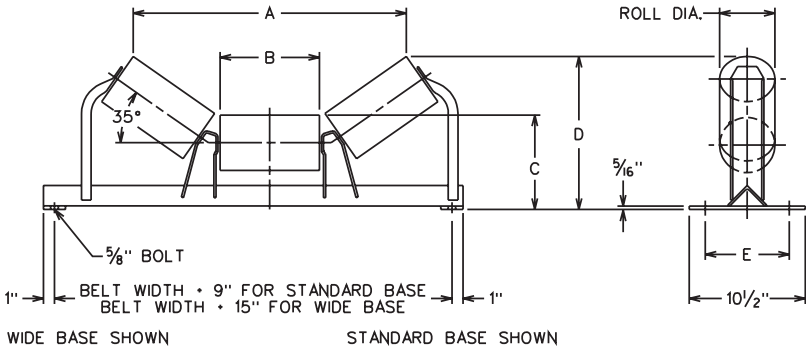
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	53	59	27-3/8	9	8-9/16	11-3/4	6¼ - 9
30	60	67	33-1/8	11	8-7/8	12-3/4	6¼ - 9
36	72	80	38-7/8	13	8-7/8	13-7/16	6¼ - 9
42	85	87	44-5/8	15	8-7/8	14-1/8	6¼ - 9
48	93	96	50-3/8	17	9-1/4	15-3/16	7 - 9
54	109	112	56-1/8	19	9-1/4	15-7/8	7 - 9
60	118	121	61-15/16	21	9-1/4	16-9/16	7 - 9
66	127	130	68-1/8	23	9-5/8	17-5/8	7½ - 9
72	136	139	73-7/8	25	9-5/8	18-5/16	7½ - 9

20 DEG. TROUGHING IDLER D6-20T-(BW)B OR D6-20T-(BW)R 6" DIA ROLL



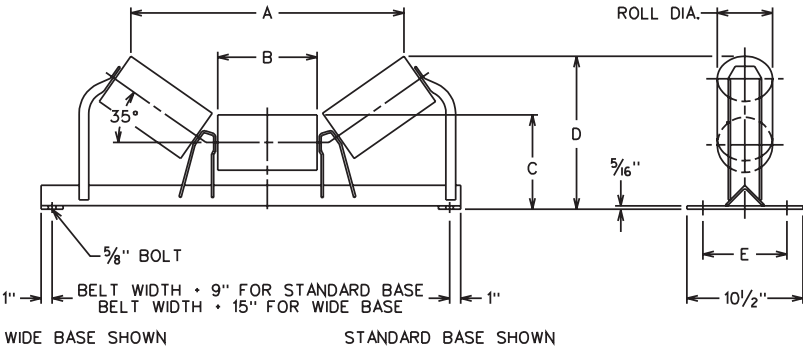
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	61	66	27	9	9-1/16	12-1/4	6¼ - 9
30	70	76	32-3/4	11	9-3/8	13-1/4	6¼ - 9
36	83	90	38-9/16	13	9-3/8	13-15/16	6¼ - 9
42	97	100	44-5/16	15	9-3/8	14-5/8	6¼ - 9
48	107	110	50-1/16	17	9-3/4	15-11/16	7 - 9
54	124	127	55-13/16	19	9-3/4	16-3/8	7 - 9
60	135	138	61-9/16	21	9-3/4	17	7 - 9
66	145	148	67-5/16	23	10-1/8	18-1/16	7½ - 9
72	155	158	73-1/16	25	10-1/8	18-3/4	7½ - 9

35 DEG. TROUGHING IDLER D5-35T-(BW)B OR D5-35T-(BW)R 5" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	54	60	24-3/4	9	8-9/16	13-7/8	6¼ - 9
30	62	69	30	11	8-7/8	15-5/16	6¼ - 9
36	75	82	35-5/16	13	8-7/8	16-1/2	6¼ - 9
42	87	90	40-9/16	15	8-7/8	17-5/8	6¼ - 9
48	96	99	45-7/8	17	9-1/4	19-3/16	7 - 9
54	114	117	51-1/8	19	9-1/4	20-5/16	7 - 9
60	124	127	56-3/8	21	9-1/4	21-7/16	7 - 9
66	134	137	61-11/16	23	9-5/8	23	7½ - 9
72	144	158	66-15/16	25	9-5/8	24-1/8	7½ - 9

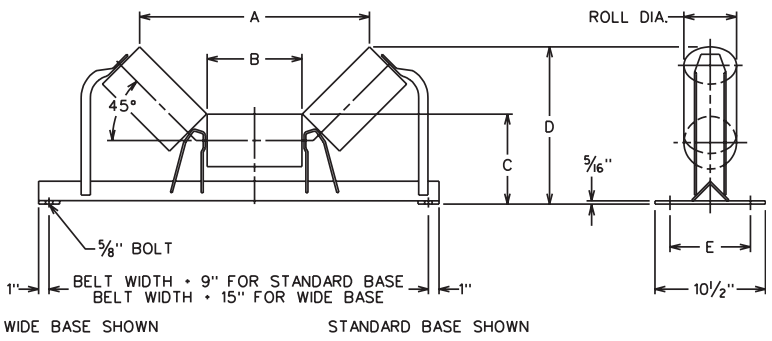
35 DEG. TROUGHING IDLER D6-35T-(BW)B OR D6-35T-(BW)R 6" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	62	68	24-3/16	9	9-1/16	14-5/16	6¼ - 9
30	72	78	29-7/16	11	9-3/8	15-13/16	6¼ - 9
36	85	93	34-3/4	13	9-3/8	16-7/8	6¼ - 9
42	100	102	40	15	9-3/8	18-1/16	6¼ - 9
48	110	112	45-1/4	17	9-3/4	19-9/16	7 - 9
54	129	133	50-9/16	19	9-3/4	20-11/16	7 - 9
60	141	144	55-13/16	21	9-3/4	21-7/8	7 - 9
66	152	155	61-1/8	23	10-1/8	23-3/8	7½ - 9
72	163	166	66-3/8	25	10-1/8	24-9/16	7½ - 9

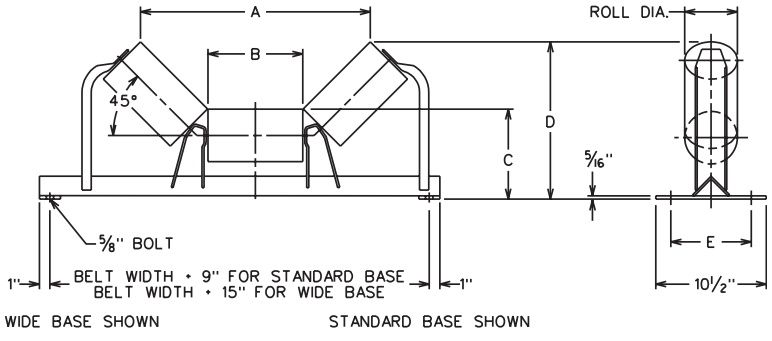
BALL OR TAPERED ROLLER BEARING CEMA D

45 DEG. TROUGHING IDLER D5-45T-(BW)B OR D5-45T-(BW)R 5" DIA ROLL



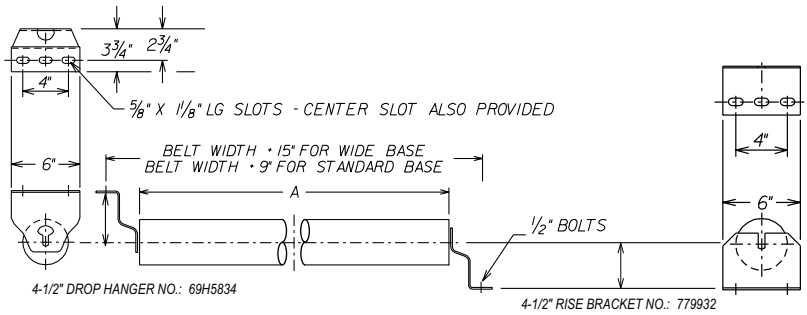
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	59	65	22-11/16	9	8-9/16	15-1/8	6¼ - 9
30	68	74	27-1/2	11	8-7/8	16-7/8	6¼ - 9
36	81	89	32-5/16	13	8-7/8	18-1/4	6¼ - 9
42	95	97	37-3/16	15	8-7/8	19-11/16	6¼ - 9
48	105	107	42	17	9-1/4	21-1/2	7 - 9
54	119	122	46-13/16	19	9-1/4	22-7/8	7 - 9
60	130	133	51-11/16	21	9-1/4	24-5/16	7 - 9
66	140	144	56-1/2	23	9-5/8	26-1/8	7½ - 9
72	151	155	61-5/16	25	9-5/8	27-1/2	7½ - 9

45 DEG. TROUGHING IDLER D6-45T-(BW)B OR D6-45T-(BW)R 6" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	59	65	22	9	9-1/16	15-1/2	6¼ - 9
30	68	74	26-13/16	11	9-3/8	17-3/16	6¼ - 9
36	81	89	31-5/8	13	9-3/8	18-5/8	6¼ - 9
42	95	97	36-1/2	15	9-3/8	20-1/16	6¼ - 9
48	105	107	41-5/16	17	9-3/4	21-7/8	7 - 9
54	119	122	46-1/8	19	9-3/4	23-1/4	7 - 9
60	130	133	50-15/16	21	9-3/4	24-11/16	7 - 9
66	140	144	55-3/4	23	10-1/8	26-7/16	7½ - 9
72	151	155	60-5/8	25	10-1/8	27-7/8	7½ - 9

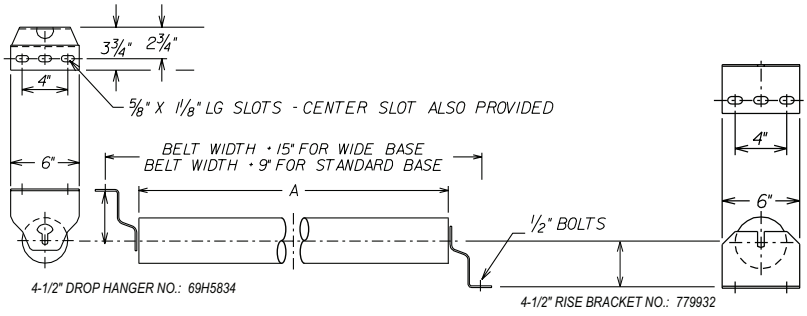
RETURN/FLAT CARRYING IDLER D5-RF-(BW)B OR D5-RF-(BW)R 5" DIA ROLL



Contact factory for other drop and rise heights.
Drop/Stand weight included (4lbs/pr).

5 Inch Flat Carrying		
BELT WIDTH	STD WT	A
24	30	27
30	34	33
36	39	39
42	44	45
48	49	51
54	54	57
60	59	63
66	63	69
72	68	75

RETURN/FLAT CARRYING IDLER D6-RF-(BW)B OR D6-RF-(BW)R 6" DIA ROLL



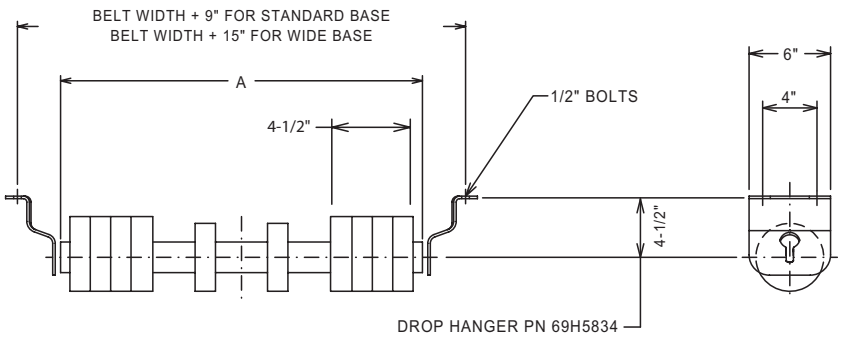
Contact factory for other drop and rise heights.
Drop/Stand weight included (4lbs/pr).

6 Inch Flat Carrying		
BELT WIDTH	STD WT	A
24	36	27
30	43	33
36	49	39
42	55	45
48	61	51
54	67	57
60	73	63
66	79	69
72	85	75

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt.

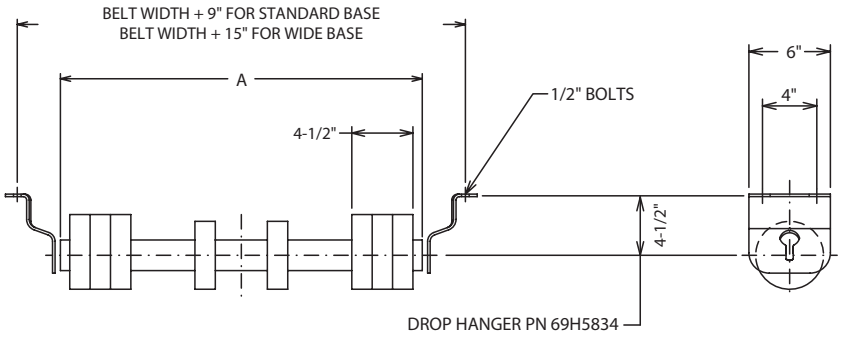
CEMA D BALL AND TAPERED ROLLER BEARING

DISC RETURN D5-RFD-(BW)B 5" DIA ROLL



5 Inch Return RUBBER DISC		
BELT WIDTH	STD WT	A
18	24	21-1/8
24	29	27-1/8
30	34	33-1/8
36	39	39-1/8
42	44	45-1/8
48	49	51-1/8

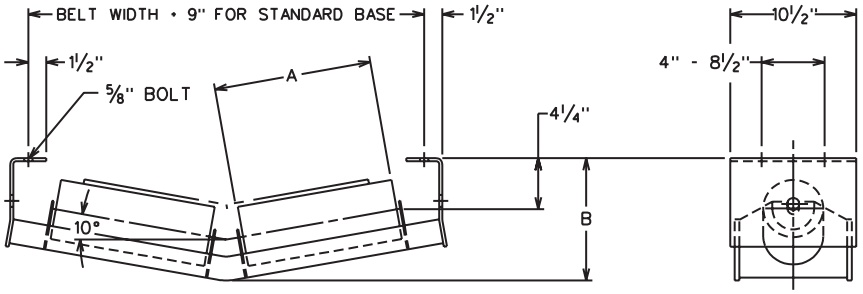
DISC RETURN D6-RFD-(BW)B 6" DIA ROLL



6 Inch Return RUBBER DISC		
BELT WIDTH	STD WT	A
18	30	21-1/8
24	35	27-1/8
30	42	33-1/8
36	48	39-1/8
42	54	45-1/8
48	61	51-1/8

10 DEG. V RETURN IDLER D5-10RV-(BW)B OR D5-10RV-(BW)R 5" DIA ROLL

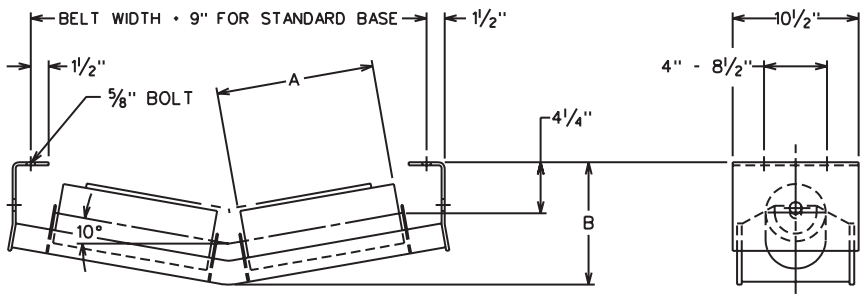
FOR WIDE BASE USE NEXT LARGER BELT WIDTH



BELT WIDTH	5" STD WT	A	B
24	63	13	10-1/4
30	71	17	10-3/4
36	76	19	11-5/16
42	83	23	11-13/16
48	87	27	12-5/16
54	101	29	12-7/8
60	107	33	13-3/8

10 DEG. V RETURN IDLER D6-10RV-(BW)B OR D6-10RV-(BW)R 6" DIA ROLL

FOR WIDE BASE USE NEXT LARGER BELT WIDTH

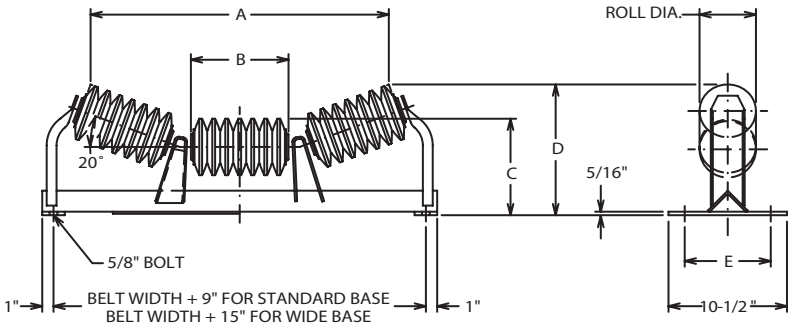


BELT WIDTH	6" STD WT	A	B
24	76	13	10-1/4
30	84	17	10-3/4
36	92	19	11-5/16
42	102	23	11-13/16
48	109	27	12-5/16
54	125	29	12-7/8
60	134	33	13-3/8
66	143	35	14
72	150	39	14-1/2

BALL BEARING CEMA D

20 DEG. IMPACT TROUGHING IDLER D5-20TI-(BW)B 5" DIA ROLL

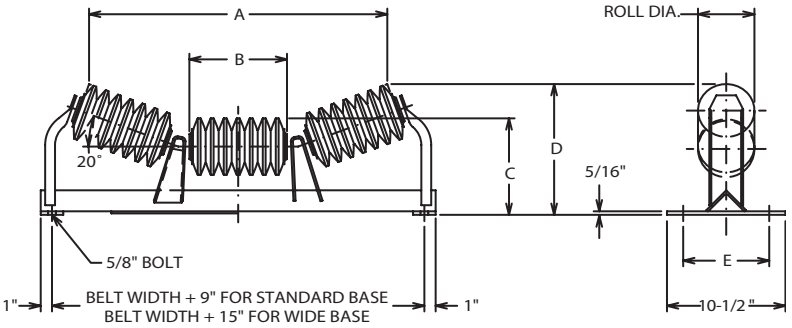
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	57	61	26-7/16	8-3/4	8-9/16	11-5/8	6¼ - 9
30	64	67	32-3/16	10-3/4	8-7/8	12-9/16	6¼ - 9
36	73	95	37-15/16	12-3/4	8-7/8	13-3/16	6¼ - 9
42	102	105	43-11/16	14-3/4	8-15/16	14	6¼ - 9
48	114	117	49-1/2	16-3/4	9-1/4	14-15/16	7 - 9
54	123	126	55-1/4	18-3/4	9-1/4	15-3/8	7 - 9
60	141	144	61	20-3/4	9-1/4	16-1/16	7 - 9
66	148	150	67-3/16	22-3/4	9-5/8	17-1/8	7½ - 9
72	154	158	72-15/16	24-3/4	9-5/8	17-13/16	7½ - 9

20 DEG. IMPACT TROUGHING IDLER D6-20TI-(BW)B 6" DIA ROLL

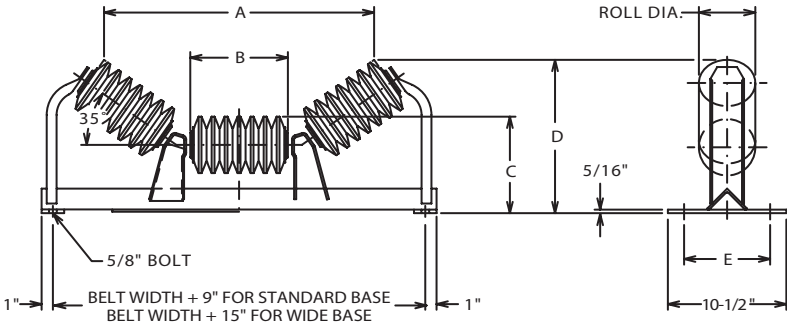
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	60	66	26-1/16	8-3/4	9-1/16	12-1/16	6¼ - 9
30	68	74	31-13/16	10-3/4	9-3/8	13	6¼ - 9
36	84	91	37-5/8	12-3/4	9-3/8	13-11/16	6¼ - 9
42	100	102	43-3/8	14-3/4	9-7/16	14-1/2	6¼ - 9
48	112	114	49-1/8	16-3/4	9-3/4	15-7/16	7 - 9
54	128	131	54-7/8	18-3/4	9-3/4	15-7/8	7 - 9
60	141	144	60-5/8	20-3/4	9-3/4	16-9/16	7 - 9
66	154	157	66-3/8	22-3/4	10-1/8	17-9/16	7½ - 9
72	163	166	72-1/8	24-3/4	10-1/8	18-1/4	7½ - 9

35 DEG. IMPACT TROUGHING IDLER D5-35TI-(BW)B 5" DIA ROLL

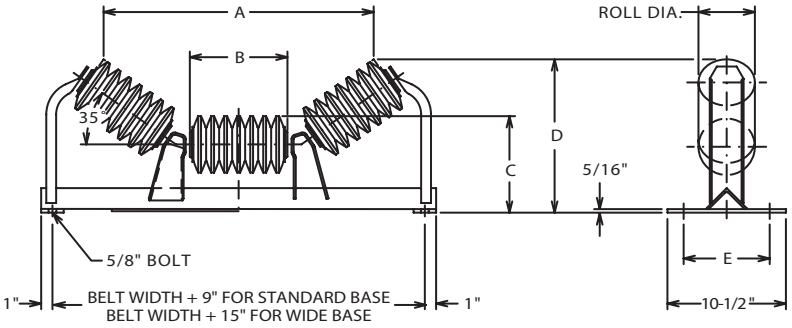
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	58	62	23-15/16	8-3/4	8-9/16	13-9/16	6¼ - 9
30	66	69	29-3/16	10-3/4	8-7/8	15	6¼ - 9
36	75	97	34-1/2	12-3/4	8-7/8	16-1/8	6¼ - 9
42	105	108	39-3/4	14-3/4	8-15/16	17-7/16	6¼ - 9
48	117	120	45	16-3/4	9-1/4	18-15/16	7 - 9
54	129	132	50-1/4	18-3/4	9-1/4	20-1/16	7 - 9
60	147	150	55-1/2	20-3/4	9-1/4	21-3/16	7 - 9
66	155	157	60-13/16	22-3/4	9-5/8	22-3/4	7½ - 9
72	162	165	66-1/16	24-3/4	9-5/8	23-7/8	7½ - 9

35 DEG. IMPACT TROUGHING IDLER D6-35TI-(BW)B 6" DIA ROLL

42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



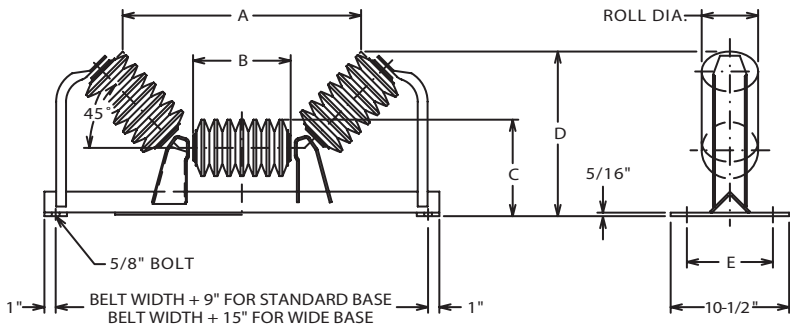
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	61	67	23-9/1	8-3/4	9-1/16	14	6¼ - 9
30	70	76	28-7/8	10-3/4	9-3/8	15-3/8	6¼ - 9
36	86	94	34-1/8	12-3/4	9-3/8	16-5/16	6¼ - 9
42	102	105	39-7/16	14-3/4	9-7/16	17-13/16	6¼ - 9
48	115	117	44-11/16	16-3/4	9-3/4	19-3/8	7 - 9
54	133	137	49-15/16	18-3/4	9-3/4	20-1/2	7 - 9
60	147	150	55-3/16	20-3/4	9-3/4	21-11/16	7 - 9
66	161	164	60-9/16	22-3/4	10-1/8	23-3/16	7½ - 9
72	171	174	5-13/16	24-3/4	10-1/8	24-3/8	7½ - 9

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt.

CEMA D BALL AND TAPERED ROLLER BEARING

45 DEG. IMPACT TROUGHING IDLER D5-45TI-(BW)B 5" DIA ROLL

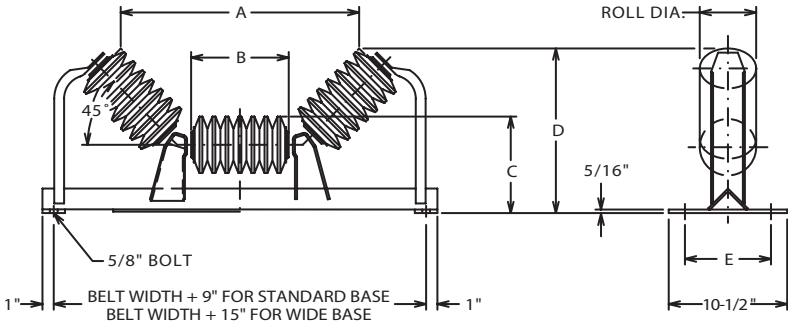
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	59	63	21-7/16	8-3/4	8-9/16	14-9/16	6¼ - 9
30	68	71	26-1/4	10-3/4	8-7/8	16-1/2	6¼ - 9
36	77	99	31-1/16	12-3/4	8-7/8	17-7/8	6¼ - 9
42	108	111	36	14-3/4	8-15/16	19-1/4	6¼ - 9
48	120	123	40-3/4	16-3/4	9-1/4	21-1/8	7 - 9
54	135	138	45-9/16	18-3/4	9-1/4	22-3/8	7 - 9
60	153	156	50-7/16	20-3/4	9-1/4	23-15/16	7 - 9
66	162	164	55-1/4	22-3/4	9-5/8	25-3/4	7½ - 9
72	170	172	60-1/16	24-3/4	9-5/8	27-1/8	7½ - 9

45 DEG. IMPACT TROUGHING IDLER D6-45TI-(BW)B 6" DIA ROLL

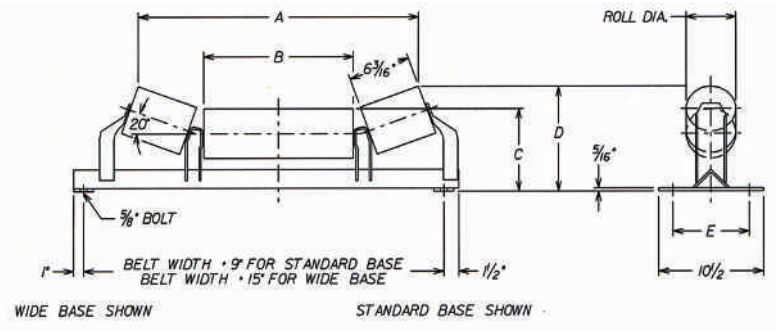
42" BELT AND ABOVE HAVE REINFORCED FRAME AND CENTER STAND



BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	66	72	20-3/4	8-3/4	9-1/16	15-1/8	6¼ - 9
30	76	82	25-9/16	10-3/4	9-3/8	16-13/16	6¼ - 9
36	93	100	30-3/8	12-3/4	9-3/8	18-1/4	6¼ - 9
42	110	112	33-1/4	14-3/4	9-7/16	19-9/16	6¼ - 9
48	123	126	40-1/16	16-3/4	9-3/4	21-1/2	7 - 9
54	138	141	44-7/8	18-3/4	9-3/4	22-1/4	7 - 9
60	153	156	49-11/16	20-3/4	9-3/4	24-5/16	7 - 9
66	167	170	54-1/2	22-3/4	10-1/8	26-1/16	7½ - 9
72	178	181	59-3/8	24-3/4	10-1/8	27-1/2	7½ - 9

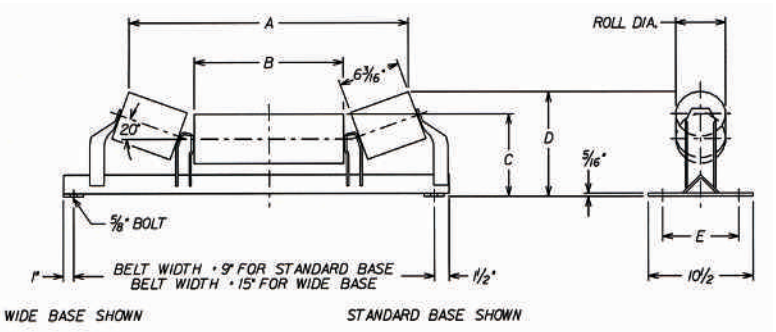
ACCESSORIES

20 DEG. PICKING EXTENDED CENTER ROLL D5-20TP-(BW)B OR D5-20TP-(BW)R 5" DIA ROLL



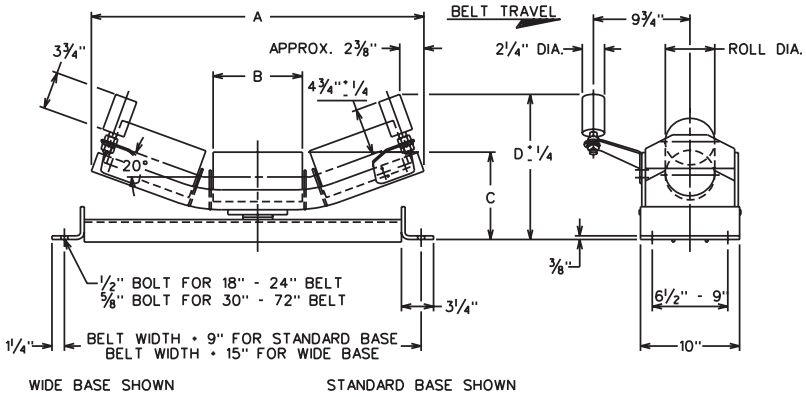
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	52	61	29	15	8-9/16	10-15/16	6¼ - 9
30	63	70	35	21	8-7/8	11-15/16	6¼ - 9
36	74	76	41	27	8-7/8	11-15/16	6¼ - 9
42	82	83	47	33	8-15/16	11-3/8	6¼ - 9
48	93	94	53	39	8-15/16	11-3/8	7 - 9
54	102	105	59	45	9-1/4	11-11/16	7 - 9
60	110	113	65	51	9-1/4	11-11/16	7 - 9
72	126	141	77	63	9-5/8	12-1/16	7 - 9

20 DEG. PICKING EXTENDED CENTER ROLL D6-20TP-(BW)B OR D6-20TP-(BW)R 6" DIA ROLL



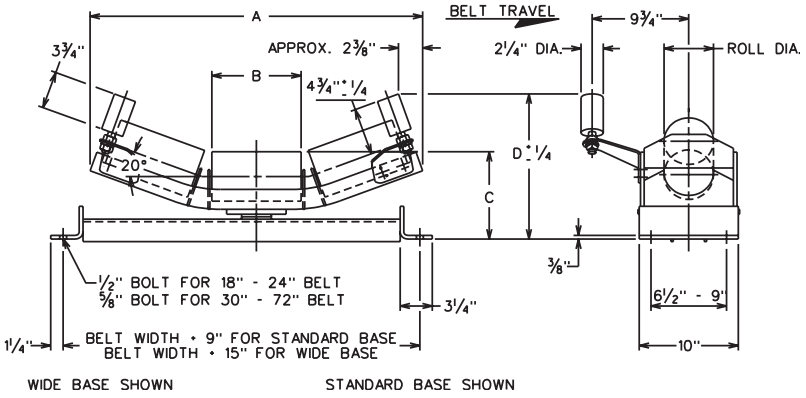
BELT WIDTH	STD WT	WIDE WT	A	B	C	D	E
24	52	61	28-11/16	15	9-1/16	11-3/8	6¼ - 9
30	63	70	34-11/16	21	9-3/8	11-3/4	6¼ - 9
36	74	76	40-11/16	27	9-3/8	11-3/4	6¼ - 9
42	82	83	46-11/16	33	9-7/16	11-13/16	6¼ - 9
48	93	94	52-11/16	39	9-7/16	11-13/16	7 - 9
54	102	105	58-11/16	45	9-3/4	12-1/8	7 - 9
60	110	113	64-11/16	51	9-3/4	12-1/8	7 - 9
72	126	141	76-11/16	63	10-1/8	12-1/2	7- 9

20 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D5-20TA-(BW)B OR D5-20TA-(BW)R 5" DIA ROLL



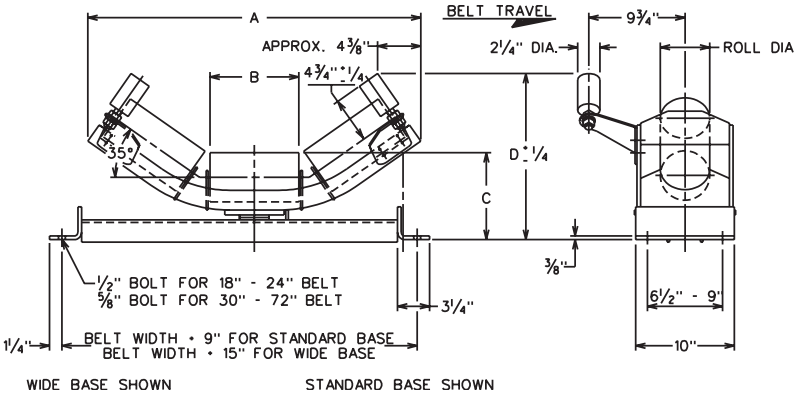
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	96	99	33-5/8	9	8-13/16	14-5/8
30	106	114	39-3/8	11	8-13/16	15-5/16
36	121	124	45-1/8	13	8-13/16	16
42	136	141	50-7/8	15	8-13/16	16-11/16
48	149	152	56-5/8	17	8-13/16	17-3/8
54	160	165	62-7/8	19	9-1/8	18-3/8
60	179	186	68-5/8	21	9-1/8	19-1/16
66	195	198	74-1/4	23	9-1/2	20-1/8
72	207	210	80	25	9-1/2	20-13/16

20 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D6-20TA-(BW)B OR D6-20TA-(BW)R 6" DIA ROLL



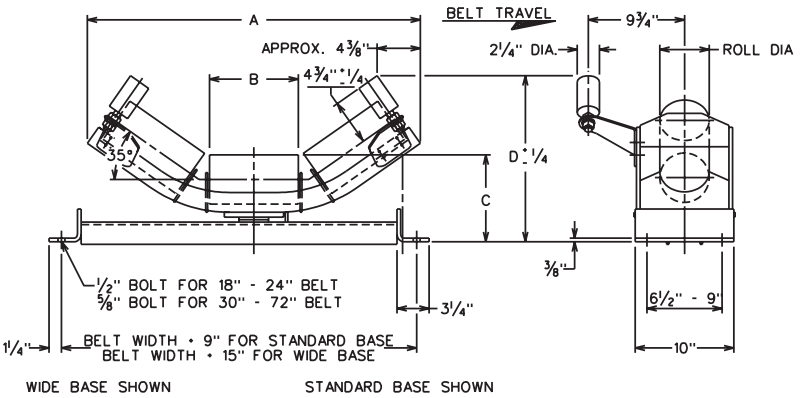
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	104	107	33-5/8	9	9-5/16	14-5/8
30	116	123	39-3/8	11	9-5/16	15-5/16
36	131	134	45-1/8	13	9-5/16	16
42	148	154	50-7/8	15	9-5/16	16-11/16
48	163	166	56-5/8	17	9-5/16	17-3/8
54	175	180	62-7/8	19	9-5/8	18-3/8
60	196	203	68-5/8	21	9-5/8	19-1/16
66	212	216	74-1/4	23	10	20-1/8
72	225	229	80	25	10	20-13/16

35 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D5-35TA-(BW)B OR D5-35TA-(BW)R 5" DIA ROLL



BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	98	101	33-3/4	9	8-13/16	16-3/4
30	108	115	39	11	8-13/16	17-7/8
36	122	125	44-5/16	13	8-13/16	19-1/16
42	137	143	49-9/16	15	8-13/16	20-3/16
48	150	154	55-1/16	17	8-13/16	21-5/16
54	161	166	60-9/16	19	9-1/8	22-3/4
60	181	188	66-1/16	21	9-1/8	23-15/16
66	196	200	71-5/16	23	9-1/2	25-7/16
72	208	212	76-5/8	25	9-1/2	26-5/8

35 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D6-35TA-(BW)B OR D6-35TA-(BW)R 6" DIA ROLL

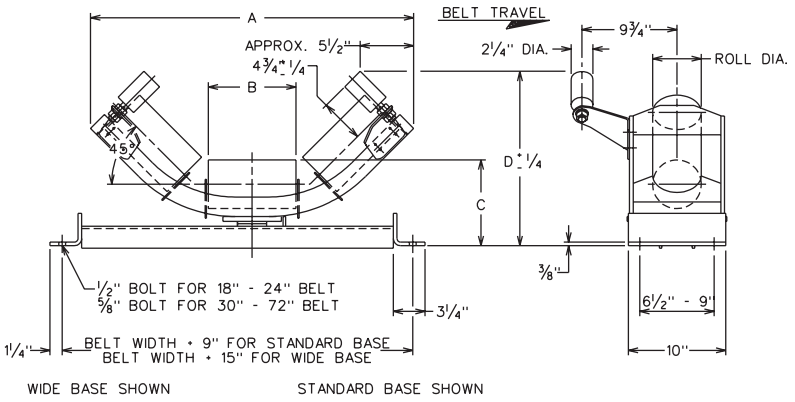


BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	105	108	33-3/4	9	9-5/16	16-3/4
30	117	124	39	11	9-5/16	17-7/8
36	132	135	44-5/16	13	9-5/16	19-1/16
42	150	155	49-9/16	15	9-5/16	20-3/16
48	164	168	60-9/16	17	9-5/16	21-5/16
54	177	181	55-1/16	19	9-5/8	22-3/4
60	197	205	66-1/16	21	9-5/8	23-15/16
66	214	217	71-5/16	23	10	25-7/16
72	227	231	76-5/8	25	10	26-5/8

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8" bolt. CEMA allows 1/2" bolt through 36" belt width.
Bolt slots on drop hangers allow up to 1/2" bolt. For Reverse Belt Conveyors, consult factory.

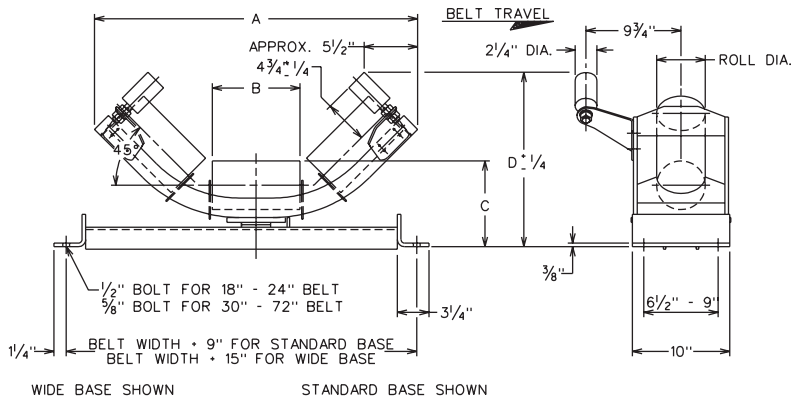
ACCESSORIES BALL OR TAPERED ROLLER BEARING

45 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D5-45TA-(BW)B OR D5-45TA-(BW)R 5" DIA ROLL



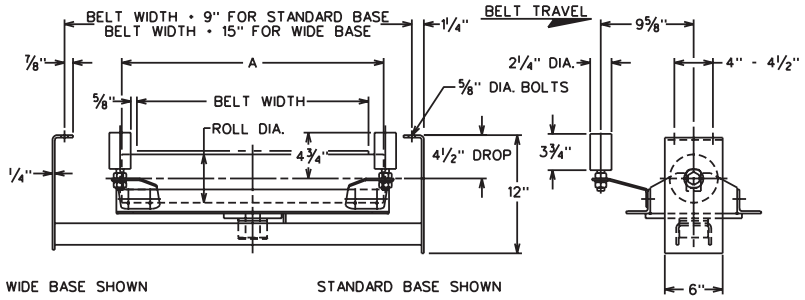
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	98	101	33-3/16	9	8-13/16	17-7/8
30	108	115	38	11	8-13/16	19-1/4
36	123	126	42-13/16	13	8-13/16	20-11/16
42	138	144	47-5/8	15	8-13/16	22-1/8
48	151	155	52-7/16	17	8-13/16	23-1/2
54	162	167	57-11/16	19	9-1/8	25-1/4
60	182	189	62-5/8	21	9-1/8	26-11/16
66	197	201	67-9/16	23	9-1/2	28-7/16
72	209	213	72-3/8	25	9-1/2	29-7/8

45 DEG. TROUGH SELF-ALIGNING WITH GUIDE ROLLS D6-45TA-(BW)B OR D6-45TA-(BW)R 6" DIA ROLL



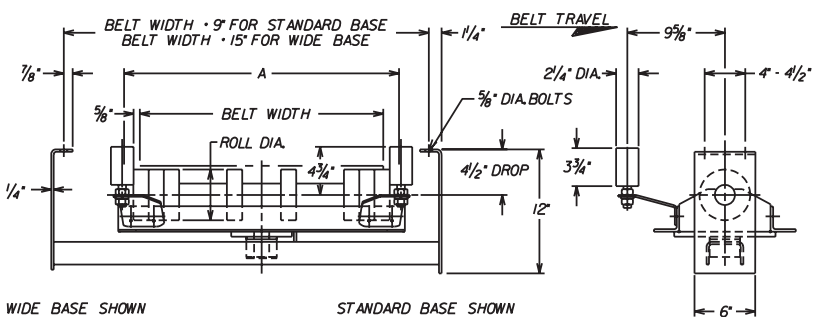
BELT WIDTH	STD WT	WIDE WT	A	B	C	D
24	98	101	33-3/16	9	8-13/16	17-7/8
30	108	115	38	11	8-13/16	19-1/4
36	123	126	42-13/16	13	8-13/16	20-11/16
42	138	144	47-5/8	15	8-13/16	22-1/8
48	151	155	52-7/16	17	8-13/16	23-1/2
54	162	167	57-11/16	19	9-1/8	25-1/4
60	182	189	62-5/8	21	9-1/8	26-11/16
66	197	201	67-9/16	23	9-1/2	28-7/16
72	209	213	72-3/8	25	9-1/2	29-7/8

RETURN SELF-ALIGNING WITH GUIDE ROLLS D5-RA-(BW)B, D5-RA-(BW)R, D6-RA-(BW)B OR D6-RA-(BW)R 5" & 6" DIA ROLL



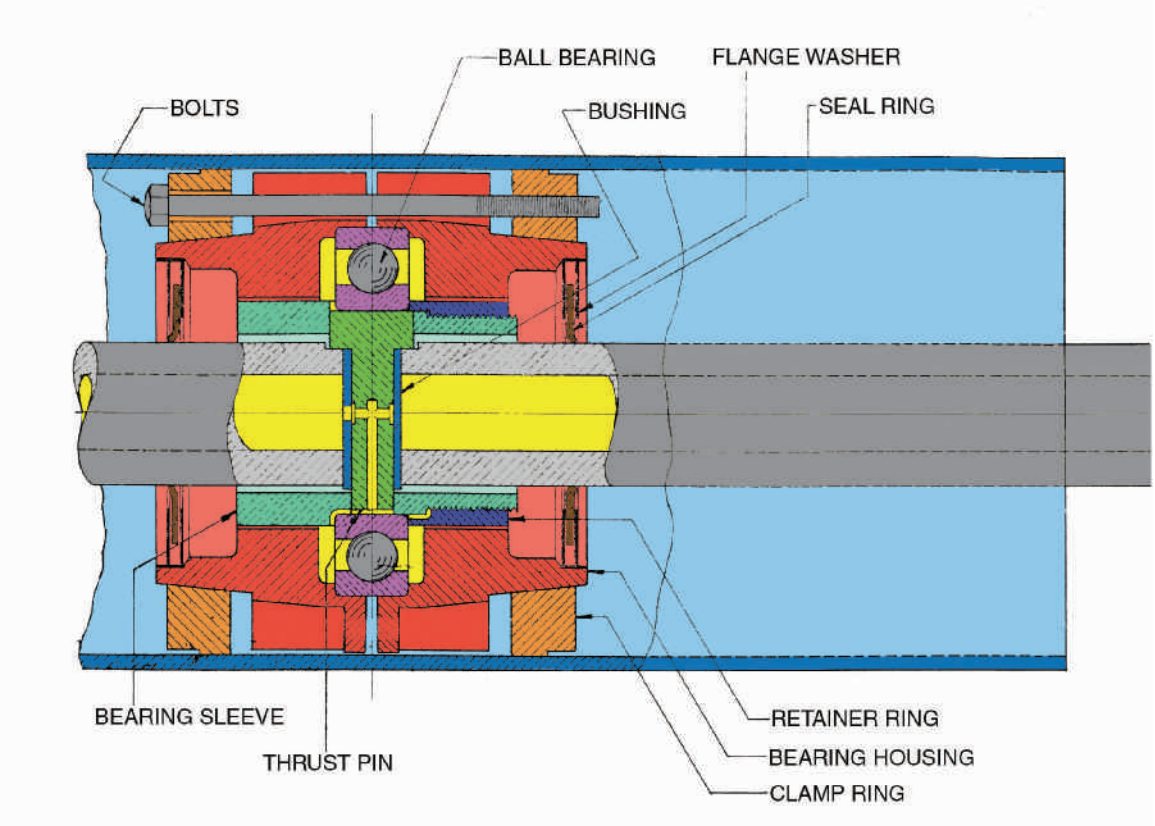
5 Inch Return Trainer with Guide Rolls				6 Inch Return Trainer with Guide Rolls			
BELT WIDTH	STD WT	WIDE WT	A	BELT WIDTH	STD WT	WIDE WT	A
24	109	112	27	24	115	118	27
30	120	124	33	30	129	132	33
36	133	136	39	36	142	145	39
42	144	147	45	42	155	158	45
48	159	162	51	48	171	174	51
54	171	174	57	54	184	188	57
60	183	187	63	60	198	201	63
66	196	199	69	66	212	215	69
72	208	211	75	72	225	228	75

DISC RETURN SELF-ALIGNING D5-RAD-(BW)B OR D6-RAD-(BW)R 5" & 6" DIA ROLL

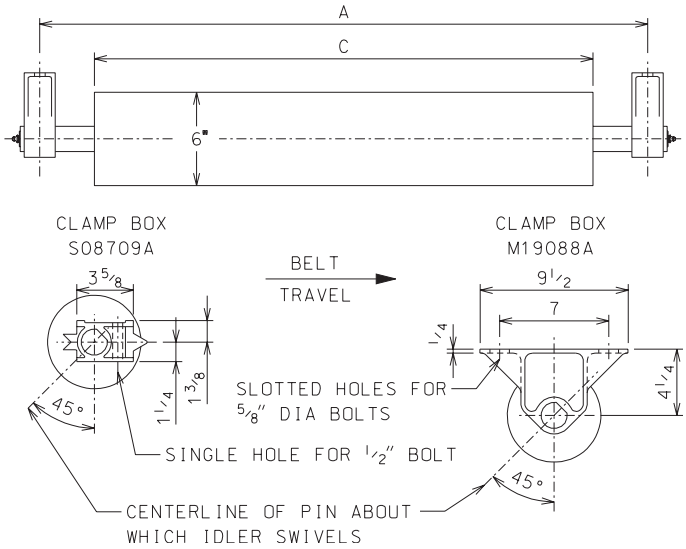


5 Inch Disc Return RUBBER			6 Inch Disc Return URETHANE		
BELT WIDTH	STD WT	A	BELT WIDTH	STD WT	A
24	89	27-1/8	24	92	27-1/8
30	97	33-1/8	30	101	33-1/8
36	104	39-1/8	36	110	39-1/8
42	115	45-1/8	42	120	45-1/8
48	121	51-1/8	48	127	51-1/8
54	137	57-1/8	54	143	57-1/8
60	144	63-1/8	60	151	63-1/8
72	161	75-1/8	72	169	75-1/8

CEMA D Wobbler Self-Aligning



WOBBLER RETURN SELF-ALIGNING C6-RAW-(BW)B



BELT WIDTH	A	C	1-3/8" WT	4-1/4" WT
18	27	20	59	63
24	33	26	67	71
30	39	32	75	79
36	45	38	83	87
42	51	44	91	95
48	57	50	99	103
54	63	56	107	111
60	69	62	115	119

Available in 6” diameter rolls only. The Wobbler is available with 1-3/8” and 4-1/4” drop brackets as shown above. Add S08709A or M19088A for required drop hangers. Optional 1/4” urethane cover also available for sticky material or adverse weather conditions, add U as suffix to part number.

Dimensions in inches. Weights in pounds. All dimensions approximate. Obtain certified drawings for exact dimensions.
Note: Bolt slots on troughing idlers allow up to 5/8” bolt. CEMA allows 1/2” bolt through 36” belt width.
Bolt slots on drop hangers allow up to 1/2” bolt. For Reverse Belt Conveyors, consult factory.

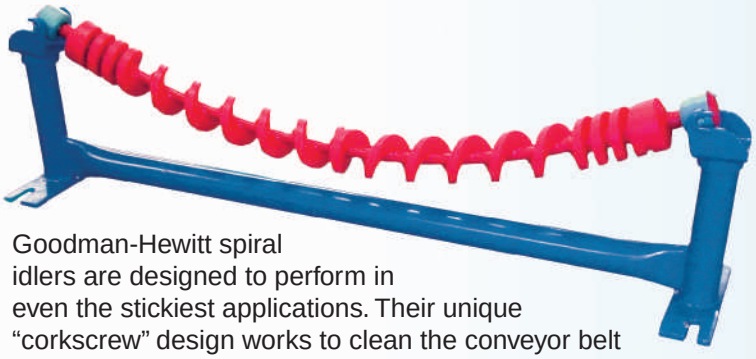
GOODMAN GH HEWITT

CONVEYORS & COMPONENTS

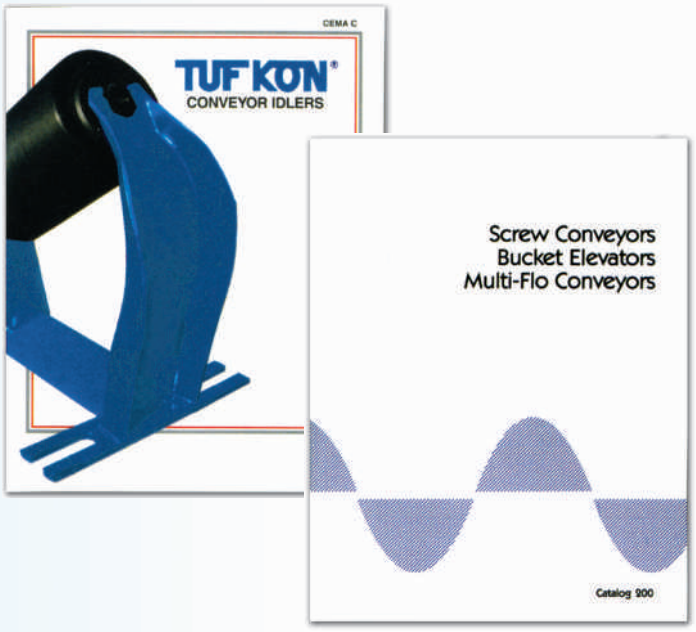
What You Want, When You Want It.℠

Additional Conveyor Components Include:

- Pulleys
- Impact Roller Beds
- Impact Beds
- Slide Seal Assemblies
- Scale Idlers



Goodman-Hewitt spiral idlers are designed to perform in even the stickiest applications. Their unique "corkscrew" design works to clean the conveyor belt and helps to control belt-training problems associated with installations handling sticky material. Spiral idlers are available in belts widths from 18" to 48".



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Hewitt-Robins
CONVEYOR COMPONENTS

Series 3000 Idlers

HEWITT-ROBINS 3000 SERIES

The new 3000 SERIES CEMA D idler from Hewitt-Robins represents the latest in quality product design improvements and manufacturing. This idler meets CEMA D dimensional standards and exceeds CEMA D load ratings.

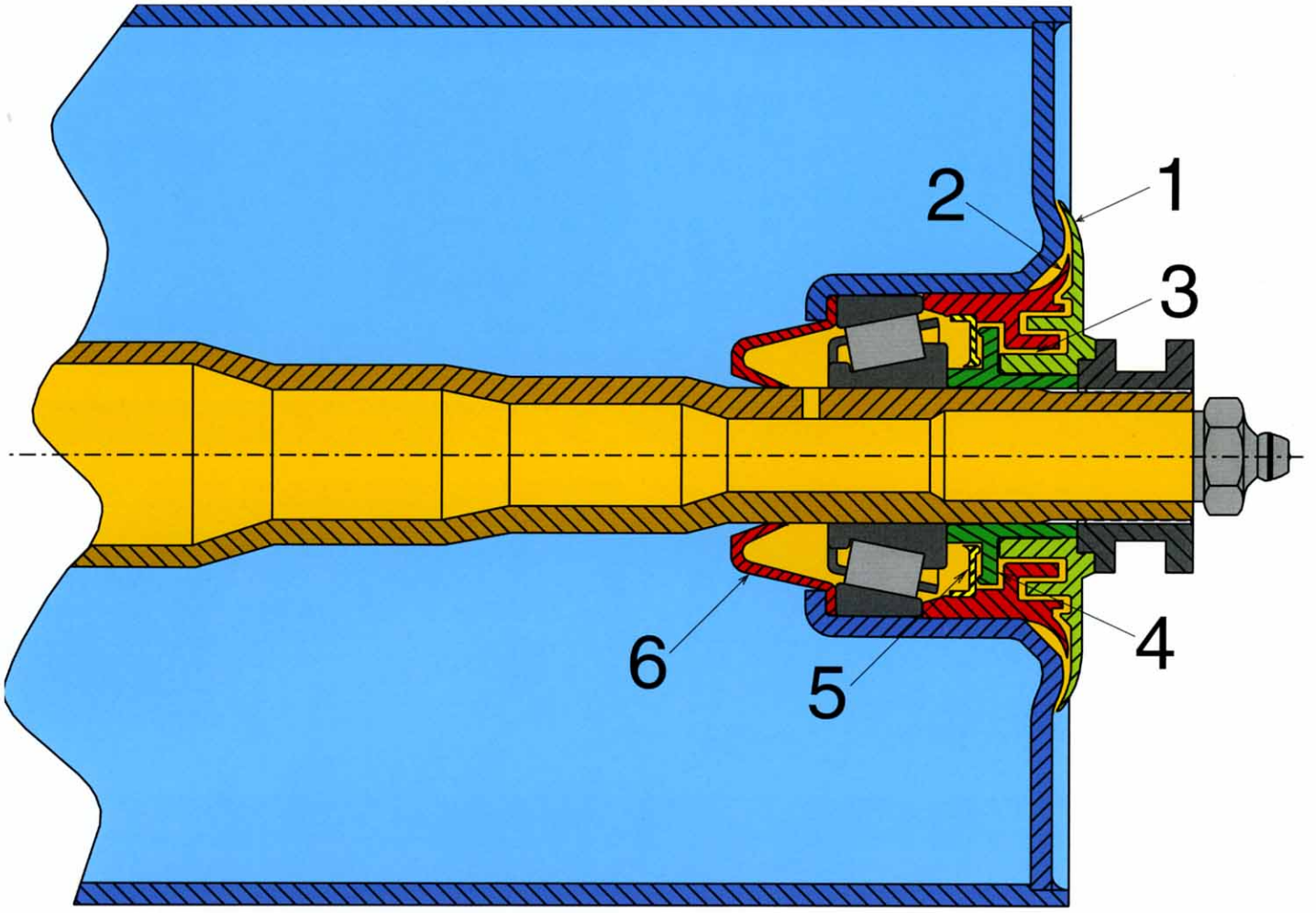
Improved Shaft Design- The new 3000 SERIES shaft, on all return rolls and all troughing rolls for 42" belt width and wider, is a 1 ¼" diameter tube swaged down to ¾" at each end. The swaging process reduces shaft deflection and assures alignment of the tapered roller bearings. The redesigned shaft is supplied with a new adjusting nut which threads completely onto the shaft.

Improved End Disc Design- The new 3000 SERIES end disc houses the new bearing and seal. The end disc weld, located inside the shell, is protected from wear due to belt misalignment.

Improved Bearing Design- The new 3000 SERIES bearing is a ¾", modified geometry, tapered roller bearing. This new bearing has higher radial and dynamic load ratings than the old style 1" tapered roller bearing.

Improved Seal Design- The new 3000 SERIES seal features a quadruple sealing system in combination with an outer shield. The large diameter outer shield and inner seal assembly is contoured to the end disc for close tolerance. This combination acts as a deflector to better exclude contaminants. Inside the outer shield is a grease-filled, multiple-path horizontal labyrinth seal. Internal to this seal is a grease-filled, dual path vertical labyrinth seal and a dual purpose, light contact lip seal to help exclude contaminants and to prevent complete purging during regreasing. This lip seal flexes against the vertical labyrinth member during regreasing to prevent purging all of the grease out of the bearing cavity and returns to light contact after the internal pressure is equalized during operation.

Six Levels of Bearing Protection



1. An **external shield** diverts contaminants away from the bearing cavity.

2. A **flinger** directs contaminants away from the bearing cavity by natural centrifugal force.

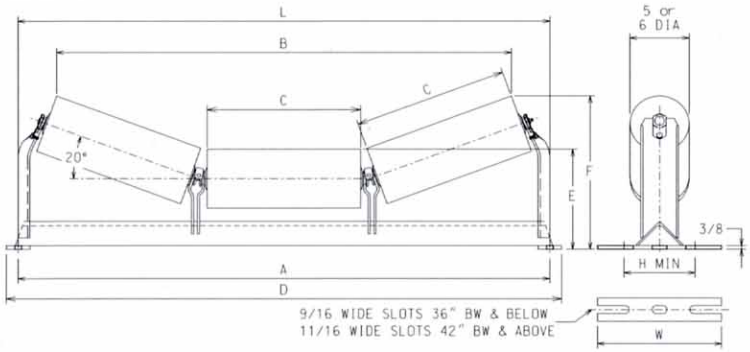
3. A grease-filled **horizontal labyrinth seal** retards lateral movement of contaminants.

4. A grease-filled **vertical labyrinth seal** provides additional protection from contaminants.

5. A **contact lip seal** keeps lubricant in the bearing and provides additional sealing protection.

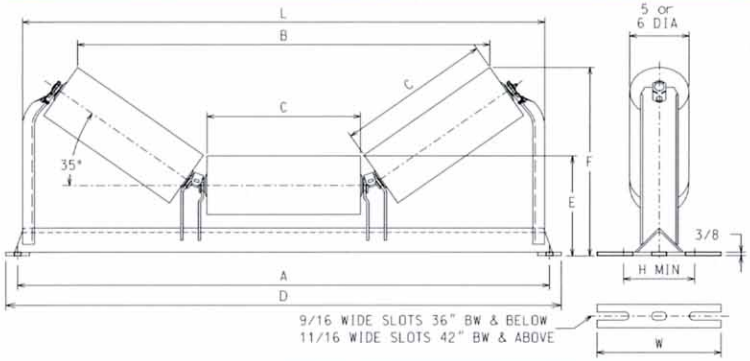
6. The **rear seal** provides a large grease reservoir for the bearing cavity.

20° TROUGHING IDLER — 5" DIA. 3502 — 6" DIA. 3602



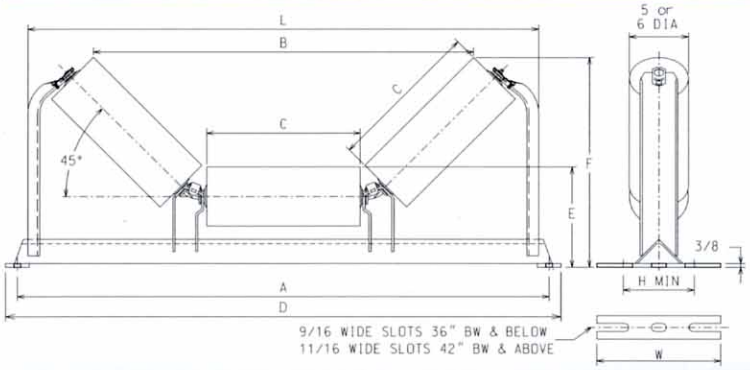
3502 and 3602													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5*	WT.6*
24	33	8 15/16	35	8 3/4	9 1/4	27 1/16	26 11/16	11 15/16	12 3/8	6	33 13/16	8 1/2	50	58
30	39	10 15/16	41	8 3/4	9 1/4	32 13/16	32 1/2	12 5/8	13 1/16	6	39 9/16	8 1/2	57	67
36	45	12 15/16	47	8 3/4	9 1/4	38 9/16	38 1/4	13 5/16	13 3/4	6	45 5/16	8 1/2	63	75
42	51	14 15/16	53 1/2	8 3/4	9 1/4	44 5/16	44	14	14 7/16	7	51 1/16	10	77	90
48	57	16 15/16	59 1/2	9 1/8	9 5/8	50 1/16	49 3/4	15 1/16	15 1/2	7	56 13/16	10	89	103
54	63	18 15/16	66	9 1/8	9 5/8	55 7/8	55 1/2	15 11/16	16 3/16	8	62 9/16	11 1/2	99	115
60	69	20 15/16	72	9 1/8	9 5/8	61 5/8	61 1/4	16 3/8	16 7/8	8	68 3/8	11 1/2	107	124
72	81	24 15/16	84	9 1/2	10	73 1/8	72 13/16	18 1/8	18 5/8	8	79 7/8	11 1/2	130	149

35° TROUGHING IDLER — 5" DIA. 3503 — 6" DIA. 3603



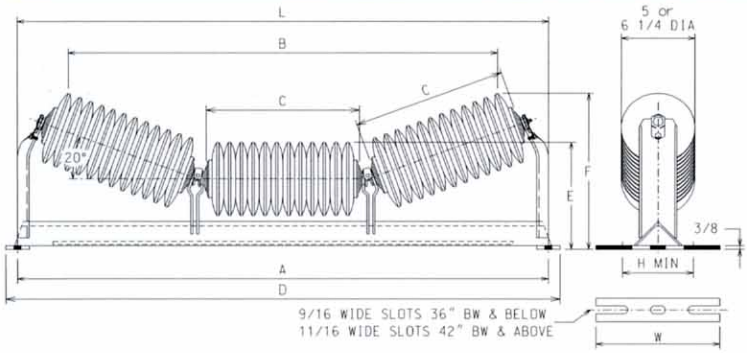
3503 and 3603													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5*	WT.6*
24	33	8 15/16	35	8 3/4	9 1/4	24 3/8	23 3/4	14	14 7/16	6	33 11/16	8 1/2	51	60
30	39	10 15/16	41	8 3/4	9 1/4	29 5/8	29 1/16	15 1/8	15 9/16	6	38 15/16	8 1/2	58	68
36	45	12 15/16	47	8 3/4	9 1/4	34 7/8	34 5/16	16 5/16	16 11/16	6	44 1/4	8 1/2	65	76
42	51	14 15/16	53 1/2	8 3/4	9 1/4	40 3/16	39 5/8	17 7/16	17 7/8	7	50 3/4	10	80	93
48	57	16 15/16	59 1/2	9 1/8	9 5/8	45 7/16	44 7/8	18 15/16	19 3/8	7	56 1/16	10	93	107
54	63	18 15/16	66	9 1/8	9 5/8	50 3/4	50 3/16	20 1/8	20 1/2	8	61 5/16	11 1/2	103	118
60	69	20 15/16	72	9 1/8	9 5/8	56	55 7/16	21 1/4	21 11/16	8	66 9/16	11 1/2	111	128
72	81	24 15/16	84	9 1/2	10	66 9/16	66	23 15/16	24 5/16	8	77 1/8	11 1/2	134	153

45° TROUGHING IDLER — 5" DIA. 3504 — 6" DIA. 3604



3504 and 3604													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5*	WT.6*
24	33	8 15/16	35	8 3/4	9 1/4	22 5/8	21 15/16	15 5/16	15 5/8	6	35 1/16	8 1/2	53	61
30	39	10 15/16	41	8 3/4	9 1/4	27 7/16	26 3/4	16 11/16	17 1/16	6	39 7/8	8 1/2	60	70
36	45	12 15/16	47	8 3/4	9 1/4	32 5/16	31 9/16	18 1/8	18 1/2	6	44 3/4	8 1/2	66	78
42	51	14 15/16	53 1/2	8 3/4	9 1/4	37 1/8	36 7/16	19 1/2	19 7/8	7	49 9/16	10	81	94
48	57	16 15/16	59 1/2	9 1/8	9 5/8	41 15/16	41 1/4	21 5/16	21 11/16	7	54 3/8	10	94	108
54	63	18 15/16	66	9 1/8	9 5/8	46 3/4	46 1/16	22 3/4	23 1/16	8	59 13/16	11 1/2	105	121
60	69	20 15/16	72	9 1/8	9 5/8	51 5/8	50 7/8	24 1/8	24 1/2	8	64 11/16	11 1/2	114	131
72	81	24 15/16	84	9 1/2	10	61 1/4	60 9/16	27 3/8	27 11/16	8	74 5/16	11 1/2	137	156

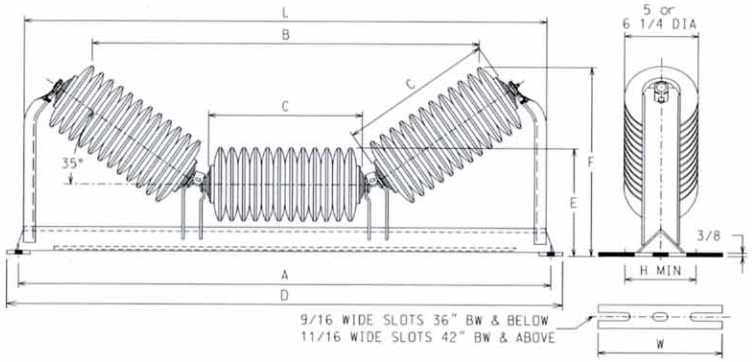
20° IMPACT IDLER — 5" DIA. 3552 — 6" DIA. 3652



3552 and 3652													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5*	WT.6*
24	33	9	35	8 3/4	9 3/8	25 1/4	24 13/16	11 15/16	12 1/2	6	33 13/16	8 1/2	58	68
30	39	11	41	8 3/4	9 3/8	31	30 9/16	12 5/8	13 3/16	6	39 9/16	8 1/2	68	81
36	45	13	47	8 3/4	9 3/8	36 3/4	36 5/16	13 5/16	13 7/8	6	45 5/16	8 1/2	78	94
42	51	15	53 1/2	8 3/4	9 3/8	42 1/2	42 1/16	14	14 9/16	7	51 1/16	10	94	112
48	57	17	59 1/2	9 1/8	9 3/4	48 1/4	47 13/16	15 1/16	15 5/8	7	56 13/16	10	111	132
54	63	19	66	9 1/8	9 3/4	54	53 5/8	15 3/4	16 5/16	8	62 9/16	11 1/2	124	148
60	69	21	72	9 1/8	9 3/4	59 13/16	59 3/8	16 7/16	17	8	68 3/8	11 1/2	135	162
72	81	25	84	9 1/2	10 1/8	71 5/16	70 7/8	18 3/16	18 3/4	8	79 7/8	11 1/2	167	200

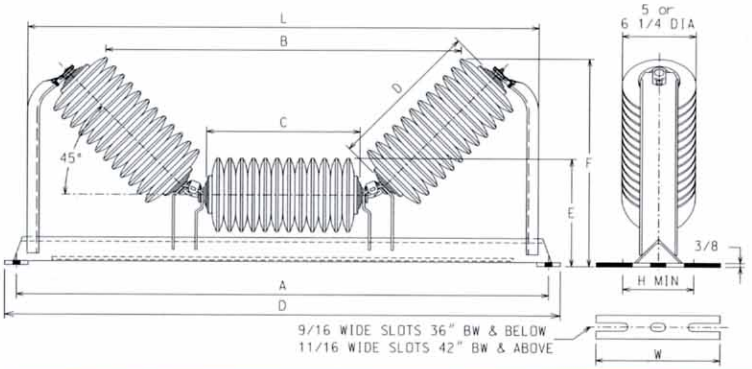
Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches. Catalog subject to change or correction without notice. Use certified prints for construction purposes.

35° IMPACT IDLER — 5" DIA. 3553 — 6" DIA. 3653



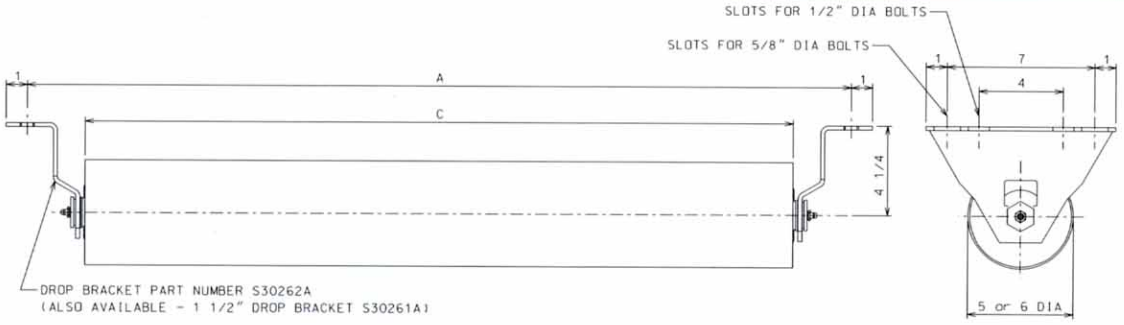
3553 and 3653													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5"	WT.6"
24	33	9	35	8 3/4	9 3/8	22 3/4	22 1/16	14	14 1/2	6	33 11/16	8 1/2	59	69
30	39	11	41	8 3/4	9 3/8	28 1/16	27 5/16	15 3/16	15 11/16	6	38 15/16	8 1/2	69	83
36	45	13	47	8 3/4	9 3/8	33 5/16	32 5/8	16 5/16	16 13/16	6	44 1/4	8 1/2	80	96
42	51	15	53 1/2	8 3/4	9 3/8	38 9/16	37 7/8	17 7/16	18	7	50 3/4	10	97	115
48	57	17	59 1/2	9 1/8	9 3/4	43 7/8	43 1/8	19	19 1/2	7	56 1/16	10	114	135
54	63	19	66	9 1/8	9 3/4	49 1/8	48 7/16	20 1/8	20 5/8	8	61 5/16	11 1/2	127	151
60	69	21	72	9 1/8	9 3/4	54 7/16	53 11/16	21 1/4	21 13/16	8	66 9/16	11 1/2	139	166
72	81	25	84	9 1/2	10 1/8	65	64 1/4	23 15/16	24 7/16	8	77 1/8	11 1/2	171	204

45° IMPACT IDLER — 5" DIA. 3554 — 6" DIA. 3654



3554 and 3654													
BW	A	C	D	E5	E6	B5	B6	F5	F6	H	L	W	WT.5"	WT.6"
24	33	9	35	8 3/4	9 3/8	21 1/4	20 3/8	15 5/16	15 3/4	6	35 1/16	8 1/2	60	71
30	39	11	41	8 3/4	9 3/8	26 1/16	25 3/16	16 3/4	17 3/16	6	39 7/8	8 1/2	71	84
36	45	13	47	8 3/4	9 3/8	30 15/16	30 1/16	18 1/8	18 9/16	6	44 3/4	8 1/2	81	98
42	51	15	53 1/2	8 3/4	9 3/8	35 3/4	34 7/8	19 9/16	20	7	49 9/16	10	98	116
48	57	17	59 1/2	9 1/8	9 3/4	40 9/16	39 11/16	21 5/16	21 13/16	7	54 3/8	10	115	136
54	63	19	66	9 1/8	9 3/4	45 3/8	44 1/2	22 3/4	23 3/16	8	59 13/16	11 1/2	130	154
60	69	21	72	9 1/8	9 3/4	50 1/4	49 3/8	24 3/16	24 5/8	8	64 11/16	11 1/2	142	169
72	81	25	84	9 1/2	10 1/8	59 7/8	59	27 3/8	27 13/16	8	74 5/16	11 1/2	174	207

RETURN IDLER — 5" DIA. 3510D — 6" DIA. 3610D



3510D and 3610D				
BW	A	C	WT.5"	WT.6"
24	33	27 1/2	29	36
30	39	33 1/2	34	42
36	45	39 1/2	39	49
42	51	45 1/2	44	55
48	57	51 1/2	50	62
54	63	57 1/2	55	68
60	69	63 1/2	60	75
72	81	75 1/2	70	88

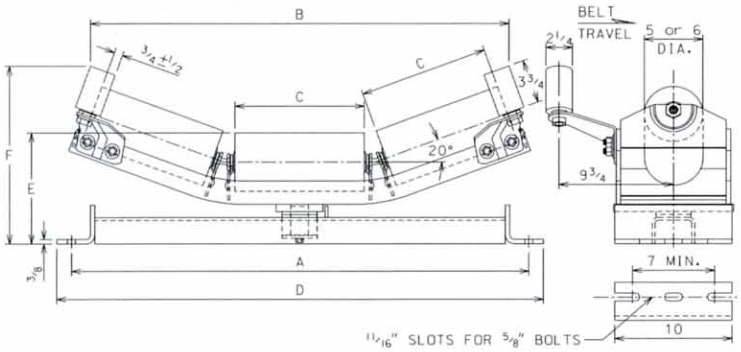
FLAT BELT IDLER — 5" DIA. 3570 — 6" DIA. 3670

3570 and 3670				
BW	A	C	WT.5"	WT.6"
24	33	27 1/2	29	36
30	39	33 1/2	34	42
36	45	39 1/2	39	49
42	51	45 1/2	44	55
48	57	51 1/2	50	62
54	63	57 1/2	55	68
60	69	63 1/2	60	75
72	81	75 1/2	70	88

Consult factory for load ratings.

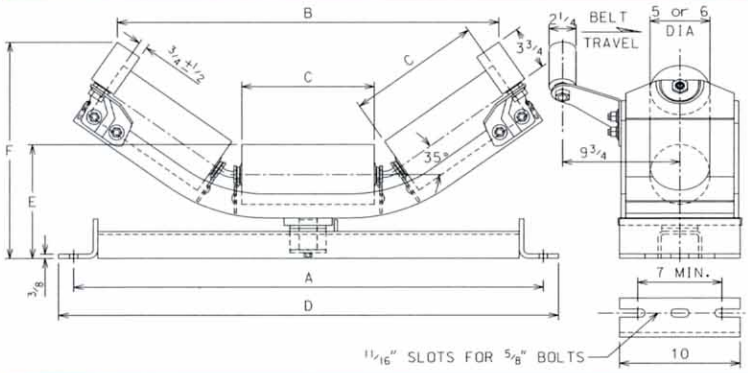
Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches. Catalog subject to change or correction without notice. Use certified prints for construction purposes.

20° TROUGHING TRAINING IDLER — 5" DIA. 3522P — ONE WAY — 6" DIA. 3622P



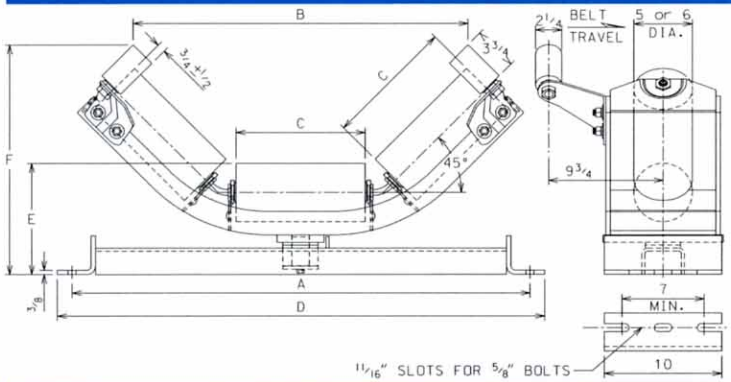
3522P and 3622P									
BW	A	C	D	E5	E6	B	F	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	29 3/4	14 7/16	94	103
30	39	10 15/16	41 1/2	9 1/2	10	35 1/2	15 7/16	104	114
36	45	12 15/16	47 1/2	9 1/2	10	41 1/4	16 1/8	115	126
42	51	14 15/16	53 1/2	9 1/2	10	47	16 13/16	126	138
48	57	16 15/16	59 1/2	9 7/8	10 3/8	52 3/4	18 1/8	134	149
54	63	18 15/16	65 1/2	9 7/8	10 3/8	58 5/16	18 13/16	154	169
60	69	20 15/16	71 1/2	9 7/8	10 3/8	64 1/16	19 1/2	165	182
72	81	24 15/16	83 1/2	10 1/4	10 3/4	75 9/16	21 1/4	190	209

35° TROUGHING TRAINING IDLER — 5" DIA. 3523P — ONE WAY — 6" DIA. 3623P



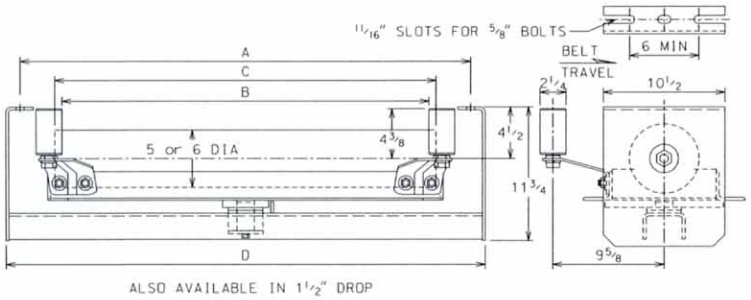
3523P and 3623P									
BW	A	C	D	E5	E6	B	F	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	26 1/8	16 3/4	95	104
30	39	10 15/16	41 1/2	9 1/2	10	31 5/16	18 5/16	105	115
36	45	12 15/16	47 1/2	9 1/2	10	36 5/8	19 7/16	116	127
42	51	14 15/16	53 1/2	9 1/2	10	41 7/8	20 5/8	127	139
48	57	16 15/16	59 1/2	9 7/8	10 3/8	47 1/8	22 1/8	135	150
54	63	18 15/16	65 1/2	9 7/8	10 3/8	52 1/8	23 7/16	155	170
60	69	20 15/16	71 1/2	9 7/8	10 3/8	57 7/16	24 9/16	166	183
72	81	24 15/16	83 1/2	10 1/4	10 3/4	68	27 1/4	191	210

45° TROUGHING TRAINING IDLER — 5" DIA. 3524P — ONE WAY — 6" DIA. 3624P



3524P and 3624P									
BW	A	C	D	E5	E6	B	F	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	23 3/16	17 1/2	96	105
30	39	10 15/16	41 1/2	9 1/2	10	27 3/4	19 5/16	106	116
36	45	12 15/16	47 1/2	9 1/2	10	32 9/16	20 11/16	117	128
42	51	14 15/16	53 1/2	9 1/2	10	37 3/8	22 1/8	128	140
48	57	16 15/16	59 1/2	9 7/8	10 3/8	42 1/16	24 1/2	136	151
54	63	18 15/16	65 1/2	9 7/8	10 3/8	46 7/8	25 15/16	156	171
60	69	20 15/16	71 1/2	9 7/8	10 3/8	51 11/16	27 5/16	167	184
72	81	24 15/16	83 1/2	10 1/4	10 3/4	61 5/16	30 1/2	192	211

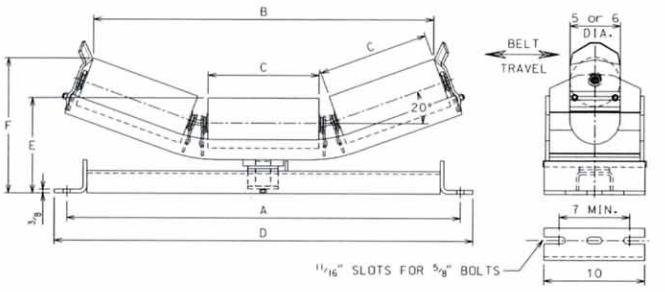
RETURN TRAINING IDLER — 5" DIA. 3530PD — ONE WAY — 6" DIA. 3630PD



3530PD and 3630PD						
BW	A	B	C	D	WT.5"	WT.6"
24	33	25 1/4	27 1/2	35 1/2	87	95
30	39	31 1/4	33 1/2	41 1/2	99	107
36	45	37 1/4	39 1/2	47 1/2	110	119
42	51	43 1/4	45 1/2	53 1/2	120	131
48	57	49 1/4	51 1/2	59 1/2	139	151
54	63	55 1/4	57 1/2	65 1/2	150	164
60	69	61 1/4	63 1/2	71 1/2	162	177
72	81	73 1/4	75 1/2	83 1/2	190	207

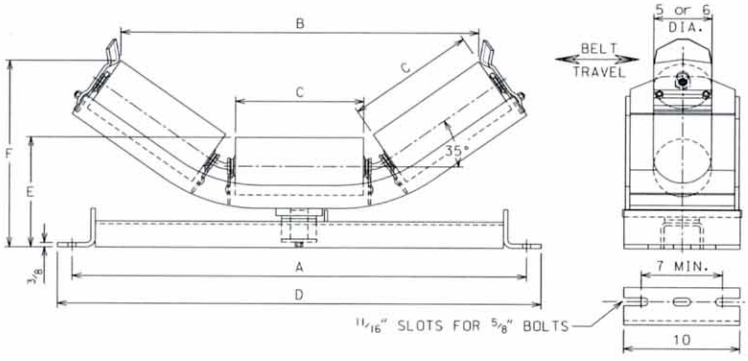
Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches.
Catalog subject to change or correction without notice. Use certified prints for construction purposes.

20° TROUGHING TRAINING IDLER — 5" DIA. 3522 — TWO WAY — 6" DIA. 3622



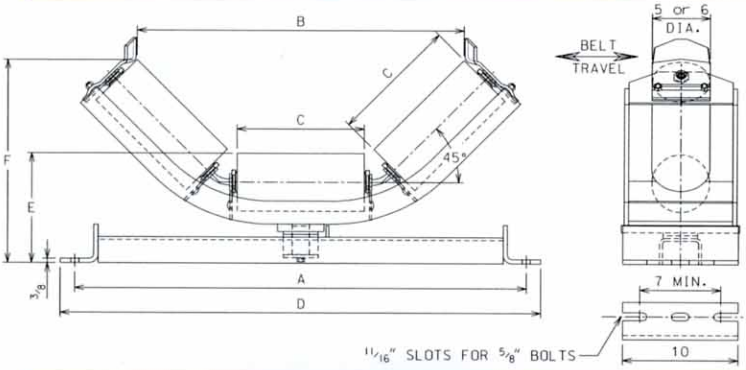
3522 and 3622											
BW	A	C	D	E5	E6	B5	B6	F5	F6	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	27 7/8	27 9/16	12 3/8	12 13/16	88	97
30	39	10 15/16	41 1/2	9 1/2	10	33 11/16	33 5/16	13 7/16	13 7/8	98	108
36	45	12 15/16	47 1/2	9 1/2	10	39 7/16	39 1/16	14 1/8	14 9/16	109	120
42	51	14 15/16	53 1/2	9 1/2	10	45 3/16	44 13/16	14 13/16	15 1/4	120	132
48	57	16 15/16	59 1/2	9 7/8	10 3/8	50 15/16	50 5/8	15 7/8	16 5/16	128	143
54	63	18 15/16	65 1/2	9 7/8	10 3/8	56 11/16	56 3/8	16 9/16	17	148	163
60	69	20 15/16	71 1/2	9 7/8	10 3/8	62 7/16	62 1/8	17 1/4	17 11/16	159	176
72	81	24 15/16	83 1/2	10 1/4	10 3/4	74	73 5/8	19	19 7/16	184	203

35° TROUGHING TRAINING IDLER — 5" DIA. 3523 — TWO WAY — 6" DIA. 3623



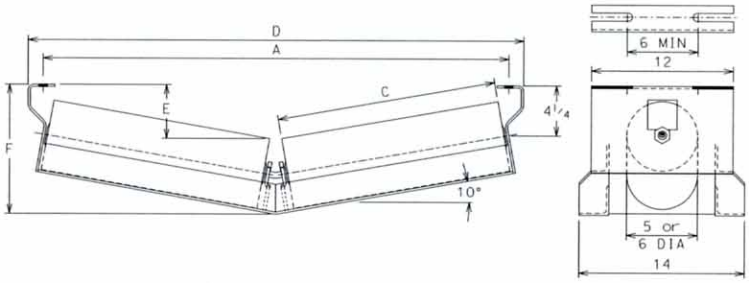
3523 and 3623											
BW	A	C	D	E5	E6	B5	B6	F5	F6	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	25 3/8	24 13/16	14 9/16	14 15/16	89	98
30	39	10 15/16	41 1/2	9 1/2	10	30 5/8	30 1/16	16 1/16	16 7/16	99	109
36	45	12 15/16	47 1/2	9 1/2	10	35 15/16	35 3/8	17 3/16	17 5/8	110	121
42	51	14 15/16	53 1/2	9 1/2	10	41 3/16	40 5/8	18 3/8	18 3/4	121	133
48	57	16 15/16	59 1/2	9 7/8	10 3/8	46 1/2	45 15/16	19 7/8	20 5/16	129	144
54	63	18 15/16	65 1/2	9 7/8	10 3/8	51 3/4	51 3/16	21	21 7/16	149	164
60	69	20 15/16	71 1/2	9 7/8	10 3/8	57 1/16	56 7/16	22 3/16	22 9/16	160	177
72	81	24 15/16	83 1/2	10 1/4	10 3/4	67 9/16	67	24 13/16	25 1/4	185	204

45° TROUGHING TRAINING IDLER — 5" DIA. 3524 — TWO WAY — 6" DIA. 3624



3524 and 3624											
BW	A	C	D	E5	E6	B5	B6	F5	F6	WT.5"	WT.6"
24	33	8 15/16	35 1/2	9 1/8	9 5/8	23 3/8	22 11/16	15 13/16	16 3/16	90	99
30	39	10 15/16	41 1/2	9 1/2	10	28 3/16	27 1/2	17 5/8	17 15/16	100	110
36	45	12 15/16	47 1/2	9 1/2	10	33 1/16	32 5/16	19	19 3/8	111	122
42	51	14 15/16	53 1/2	9 1/2	10	37 7/8	37 1/8	20 7/16	20 13/16	122	134
48	57	16 15/16	59 1/2	9 7/8	10 3/8	42 11/16	42	22 1/4	22 9/16	130	145
54	63	18 15/16	65 1/2	9 7/8	10 3/8	47 1/2	46 13/16	23 5/8	24	150	165
60	69	20 15/16	71 1/2	9 7/8	10 3/8	52 3/8	51 5/8	25 1/16	25 3/8	161	178
72	81	24 15/16	83 1/2	10 1/4	10 3/4	62	61 5/16	28 1/4	28 5/8	186	205

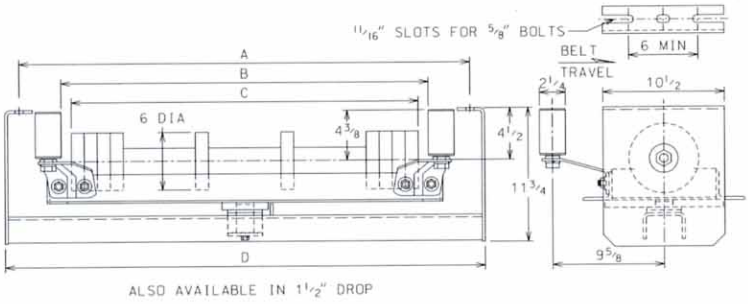
10° V-RETURN IDLER — 5" DIA. 3510V — 6" DIA. 3610V



3510V and 3610V								
BW	A	C	D	E5	E6	F	WT.5"	WT.6"
24	33	14 15/16	35 1/2	4 7/16	3 15/16	10 7/16	63	71
30	39	18 1/2	41 1/2	5 1/16	4 9/16	10 15/16	72	82
36	45	21 1/2	47 1/2	5 9/16	5 1/16	11 1/2	80	92
42	51	24 1/2	53 1/2	6 1/16	5 9/16	12	89	101
48	57	27 1/2	59 1/2	6 5/8	6 1/8	12 1/2	97	111
54	63	30 1/2	65 1/2	7 1/8	6 5/8	13 1/16	105	120
60	69	33 1/2	71 1/2	7 5/8	7 1/8	13 9/16	113	130
72	81	36 1/2	83 1/2	8 3/16	7 11/16	14 1/8	122	140

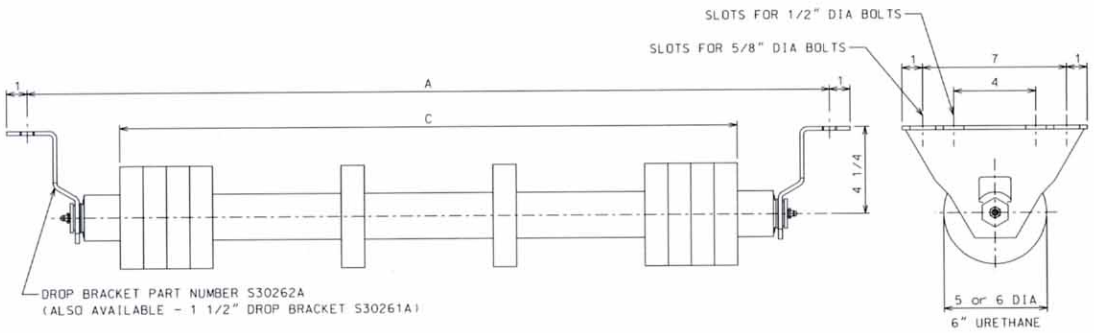
Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches. Catalog subject to change or correction without notice. Use certified prints for construction purposes.

RUBBER RETURN TRAINING IDLER — 5" DIA. 3530HGPD — 6" DIA. 3630HGPD



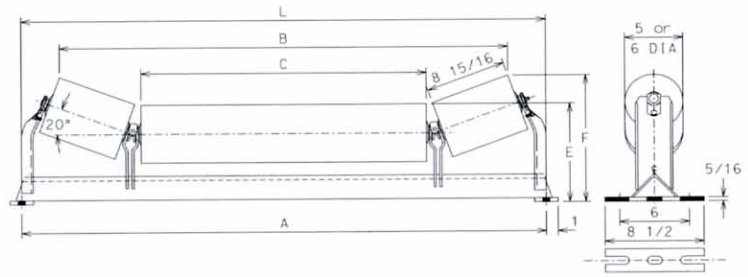
3530HGPD and 3630HGPD						
BW	A	B	C	D	WT.5"	WT.6"
24	33	25 1/4	24	35 1/2	86	92
30	39	31 1/4	30	41 1/2	97	102
36	45	37 1/4	36	47 1/2	106	111
42	51	43 1/4	42	53 1/2	114	120
48	57	49 1/4	48	59 1/2	131	137
54	63	55 1/4	54	65 1/2	148	156
60	69	61 1/4	60	71 1/2	159	166
72	81	73 1/4	72	83 1/2	186	193

RUBBER DISC RETURN IDLER — 5" DIA. 3560HGD — 6" DIA. 3660HGD



3560HGD, 3660HGD and U3660HGD				
BW	A	C	WT.5"	WT.6"
24	33	24	28	33
30	39	30	32	37
36	45	36	35	41
42	51	42	38	44
48	57	48	42	48
54	63	54	53	60
60	69	60	57	64
72	81	72	66	74

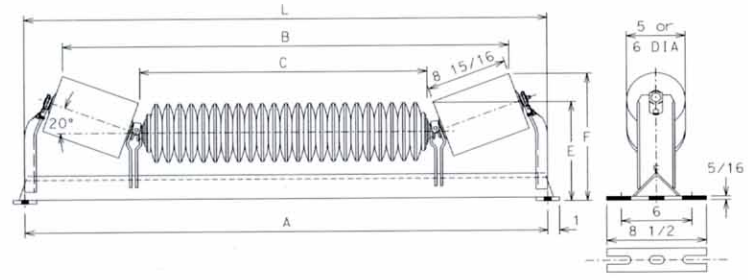
PICKING FEEDER IDLER — 5" DIA. 3582 — 6" DIA. 3682



Consult factory for load ratings.

3582 and 3682											
BW	A	C	E5	E6	B5	B6	F5	F6	L	WT.5"	WT.6"
30	39	14 15/16	8 3/4	9 1/4	33 1/16	32 11/16	11 11/16	12 1/8	39 13/16	57	68
36	45	20 15/16	8 3/4	9 1/4	39 1/16	38 11/16	11 11/16	12 1/8	45 13/16	65	76
42	51	26 15/16	8 3/4	9 1/4	45 1/16	44 11/16	11 11/16	12 1/8	51 13/16	73	85
48	57	32 15/16	8 3/4	9 1/4	51 1/16	50 11/16	11 11/16	12 1/8	57 13/16	80	94
54	63	38 15/16	8 3/4	9 1/4	57 1/16	56 11/16	11 11/16	12 1/8	63 13/16	88	103
60	69	44 15/16	8 3/4	9 1/4	63 1/16	62 11/16	11 11/16	12 1/8	69 13/16	110	127
72	81	56 15/16	8 3/4	9 1/4	75 1/16	74 11/16	11 11/16	12 1/8	81 13/16	129	148

PICKING FEEDER IMPACT IDLER — 5" DIA. 3592 — 6" DIA. 3692

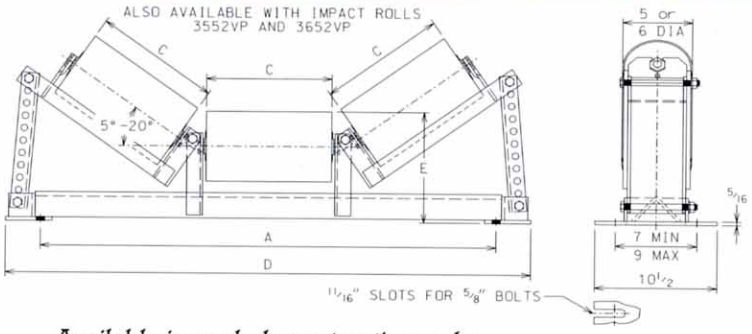


Consult factory for load ratings.

3592 and 3692											
BW	A	C	E5	E6	B5	B6	F5	F6	L	WT.5"	WT.6"
30	39	15	8 3/4	9 3/8	33 1/16	32 11/16	11 11/16	12 1/8	39 13/16	68	80
36	45	21	8 3/4	9 3/8	39 1/16	38 11/16	11 11/16	12 1/8	45 13/16	79	94
42	51	27	8 3/4	9 3/8	45 1/16	44 11/16	11 11/16	12 1/8	51 13/16	89	107
48	57	33	8 3/4	9 3/8	51 1/16	50 11/16	11 11/16	12 1/8	57 13/16	100	119
54	63	39	8 3/4	9 3/8	57 1/16	56 11/16	11 11/16	12 1/8	63 13/16	110	132
60	69	45	8 3/4	9 3/8	63 1/16	62 11/16	11 11/16	12 1/8	69 13/16	120	145
72	81	57	8 3/4	9 3/8	75 1/16	74 11/16	11 11/16	12 1/8	81 13/16	141	171

Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches.
Catalog subject to change or correction without notice. Use certified prints for construction purposes.

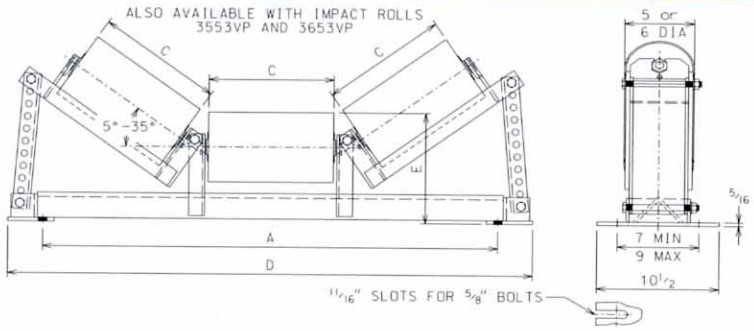
5-20° TRANSITION IDLER — 5" DIA. 3502VP — 6" DIA. 3602VP



Available in sealed construction only.

3502VP and 3602VP							
BW	A	C	D	E5	E6	WT.5"	WT.6"
24	33	8 15/16	39	8 1/2	9	80	89
30	39	10 15/16	45	8 1/2	9	90	100
36	45	12 15/16	51	8 1/2	9	98	110
42	51	14 15/16	57	8 1/2	9	107	120
48	57	16 15/16	63	8 7/8	9 3/8	127	141
54	63	18 15/16	69	8 7/8	9 3/8	137	153
60	69	20 15/16	75	8 7/8	9 3/8	147	164
72	81	24 15/16	87	9 1/4	9 3/4	172	192

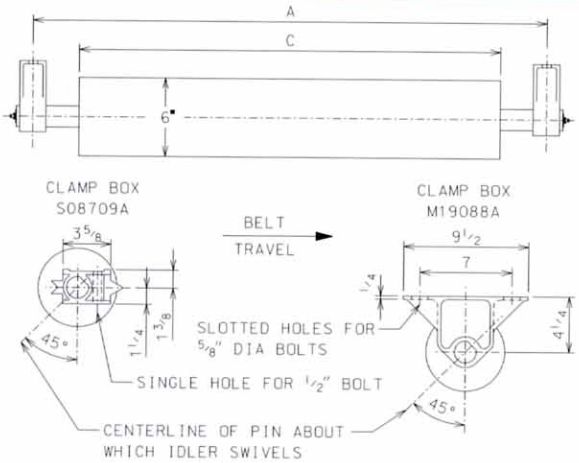
5-35° TRANSITION IDLER — 5" DIA. 3503VP — 6" DIA. 3603VP



Available in sealed construction only.

3503VP and 3603VP							
BW	A	C	D	E5	E6	WT.5"	WT.6"
24	33	8 15/16	39	8 1/2	9	83	91
30	39	10 15/16	45	8 1/2	9	94	104
36	45	12 15/16	51	8 1/2	9	102	114
42	51	14 15/16	57	8 1/2	9	112	125
48	57	16 15/16	63	8 7/8	9 3/8	133	147
54	63	18 15/16	69	8 7/8	9 3/8	143	159
60	69	20 15/16	75	8 7/8	9 3/8	153	170
72	81	24 15/16	87	9 1/4	9 3/4	180	200

WOBBLER RETURN TRAINING IDLER — 1 3/8" DROP 3630 — 4 1/4" DROP 3630D



3630 and 3630D				
BW	A	C	3630 WT.	3630D WT.
24	33	26	67	71
30	39	32	75	79
36	45	38	83	87
42	51	44	91	95
48	57	50	99	103
54	63	56	107	111
60	69	62	115	119

Not available in 5" DIA.

Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches. Catalog subject to change or correction without notice. Use certified prints for construction purposes.

NOTES

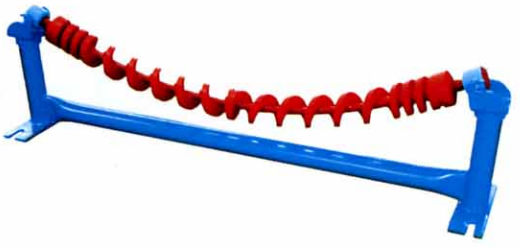
1000 SERIES
The 1000 SERIES idler from Hewitt-Robins exceeds CEMA B specifications. This idler is designed for light-duty applications and is available factory sealed in belt widths from 18" to 48".

2000 SERIES
The 2000 SERIES idler from Hewitt-Robins exceeds CEMA C specifications. This idler is designed for medium-duty applications and is available either factory sealed or regreaseable in belt widths from 18" to 60".

4000 SERIES
The 4000 SERIES idler from Hewitt-Robins exceeds CEMA E specifications and provides extra heavy-duty performance in the toughest of applications. SERIES 4000 idlers are available in belt widths from 36" to 120".

Impact Bed
By supporting the conveyor belt and cushioning it against the shock of heavy loads and impacts, the Hewitt-Robins impact/slider bed extends belt life and reduces downtime. Its modular design allows multiple units to be fitted to form the bed length desired (3 shown).

Wobbler (Style 3630 Return Trainer)
The wobbler from Hewitt-Robins is a special return roll designed to train your conveyor belt. Its unique design, a steel roll centered on a 60mm ball bearing, pivots when the conveyor belt moves off center and guides it back to allow for a more efficient operating conveyor. The wobbler, with optional 1/4" urethane cover as shown above, is available in belt widths from 18" to 60".



Spiral Catenary Idlers
Hewitt-Robins spiral idlers are designed to perform in even the stickiest applications. Their unique "corkscrew" design works to clean the conveyor belt and helps to control belt-training problems associated with installations handling sticky material. Spiral idlers are available in belt width from 18" to 48".

Your Conveyor Source
for More Than a Century

Shown above is an original idler Mr. Robins designed and supplied to Thomas Edison in 1896.

You can count on Hewitt-Robins

For Product Performance: Although primitive belt conveyors were in use as early as 1830, it wasn't until 1891 that Thomas Robins, founder of our company, developed the first practical conveyor system for moving heavy and abrasive materials utilizing steel, in-line idlers and rubber covered belting. The first Robins-designed conveyor was installed at Thomas Edison's iron ore mine in New Jersey. Thomas Robins' pride in producing the most reliable conveyor components available continues to this day to motivate Hewitt-Robins design and manufacturing engineers.

For Problem Solving Innovations: Continuous development and testing programs, both in the field and in the lab, continue to produce new solutions to old problems and carry on the traditions started by Thomas Robins.

For Quick Delivery From Stock: Most commonly used sizes and styles of Hewitt-Robins idlers are stocked in scores of distributor and warehouse locations throughout the United States and in other countries. In many instances, the replacement idlers and service parts you need to get back into production can be obtained in a matter of hours.

For Nationwide Sales and Service: Experienced Hewitt-Robins distributors and Area Managers will help you select the most economical style and size of idler to meet your conveying requirements. Because idlers represent a major portion of a conveyor's cost, proper selection based on economics as well as sound engineering principles can result in substantial savings in capital outlay. That's why we urge you to take advantage of Hewitt-Robins' experience during the initial stages of your conveyor design. No one knows more about idlers than Hewitt-Robins. Good reason to call us first.

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive, Pueblo West, CO 81007
Phone: (205) 487-1931 Fax: (205) 487-1935
E-mail: sales@hewitt-robins.com
Website: www.hewitt-robins.com

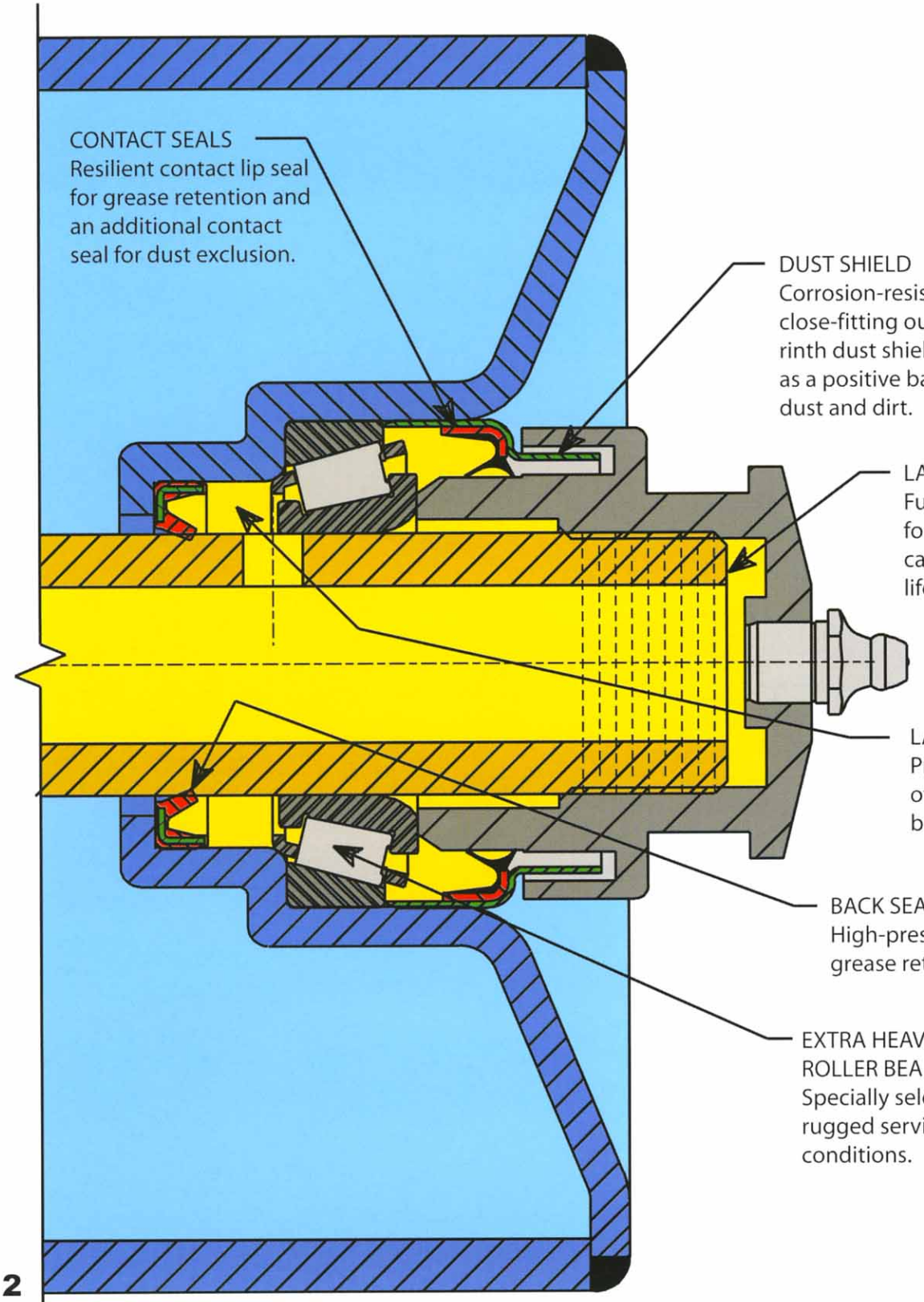
Call 1-800-388-7701 for the distributor nearest you.

Hewitt-Robins
CONVEYOR COMPONENTS

Series 4000 Idlers

SERIES 4000 ROLL DESIGN FEATURES

Hewitt-Robins idlers are designed to exceed CEMA E specifications. The SERIES 4000 design features include:



IDLER DESIGNATIONS

Hewitt-Robins idlers are identified by a four-digit code. For certain styles a prefix and/or a suffix letter is added. Each number or letter denotes specific information as follows:

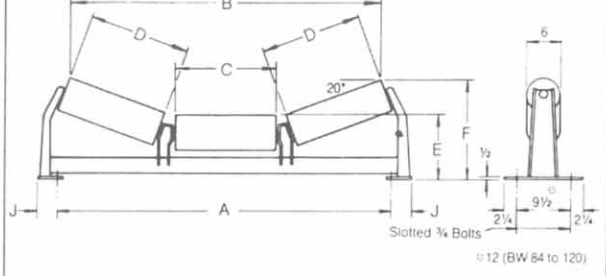
U	3	6	0	2	W
PREFIXES	**FIRST NUMBER SERIES**	**SECOND NUMBER ROLL DIAMETER**	**THIRD NUMBER TYPE**	**FOURTH NUMBER END ROLL INCLINE**	**SUFFIXES**
L INLINE WIRE ROPE M WIRE ROPE RETURN OL OFFSET WIRE ROPE P POLY SLEEVE U URETHANE COVERED OR URETHANE DISC ROLLS R RUBBER COVERED	CEMA B 1 - 1000 CEMA C 2 - 2000 CEMA D 3 - 3000 CEMA E 4 - 4000	4 - 4 INCHES 5 - 5 INCHES 6 - 6 INCHES 7 - 7 INCHES	0 - TROUGHING 1 - RETURN 2 - TROUGHING TRAINER 3 - RETURN TRAINER 4 - REVERSIBLE RETURN TRAINER 5 - IMPACT 6 - DISC RETURN 7 - FLAT BELT 8 - FEEDING & PICKING 9 - FEEDING & PICKING IMPACT	2 - 20 DEGREE* 3 - 35 DEGREE 4 - 45 DEGREE *On wire rope idlers a "2" means 27 degrees.	B - WIRE ROPE BOX FRAME D - DEEP DROP HANGERS G - GARLAND H - NON MASSED DISCS HG - MASSED END DISCS LS - LIVE SHAFT LSI - LIVE SHAFT IMPACT P - POSITIVE ACTION R - REGREASEABLE S - SEALED V - V-RETURN VP - VARIABLE PITCH TRANSITION W - WIDE STRINGER SPACING BW+15" 4 - .250" THICK ROLL SHELL X - RETRO-FIT FOR BC

Idler cross reference chart:

MANUFACTURER	CEMA B	CEMA C	CEMA D	CEMA E
HEWITT-ROBINS	1000	2000	3000	4000
TRANSALL	B	C	D	E
STEPHENS-ADAMSON	2174 & 2175	4195 & 4196	5195 & 5196	6326 & 6327
CONTINENTAL CONVEYOR	SUPER B	HC	H PLUS	SDX
REXNORD	B	C	D	E
FMC	B2000	C3000	D3000 & D7000	E4000
PRECISION	B	C	D	E
GOODMAN	B	C	D	E
SUPERIOR	50, 60 & 61	80 & 81	91	-

SERIES 4000
DIMENSIONS

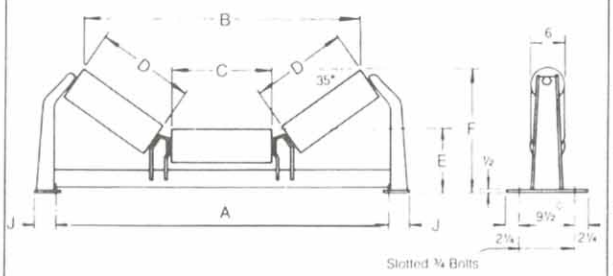
Roll diameter: 6 and 7 inches
Bearings: 1¼ dia. tapered roller



4602 Troughing / 20°

Also available with Urethane covered rolls.

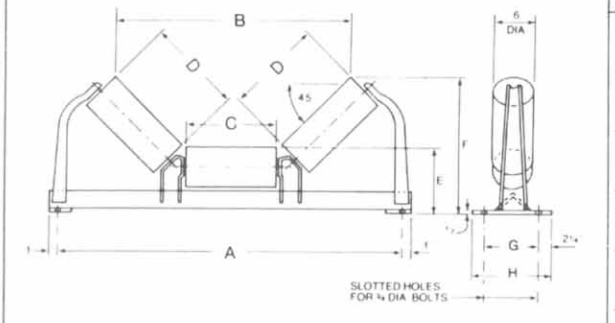
BELT WIDTH	A	B	C/D	E	F	J	WT.	4602-W A	4602-W J	4602-W WT.
36	45	41 9/16	13 3/4	11	15 7/8	4	141	51	1	137
42	51	47 5/16	15 3/4	11	16 9/16	3½	153	57	1	151
48	57	53 1/16	17 3/4	11	17 1/4	3½	167	63	1	165
54	63	58 13/16	19 3/4	11	17 15/16	3½	181	69	1	187
60	69	64 9/16	21 3/4	11	18 5/8	3½	204	75	1	202
66	75	70 5/16	23 3/4	11	19 5/16	3½	218	81	1	216
72	81	76 1/16	25 3/4	11½	20 1/2	3½	237	87	1	235
84	93	87 5/8	29 3/4	11½	21 13/16	3½	299	99	1	297
96	105	99 1/8	33 3/4	11½	23 1/4	3	332	111	1	332
108	117	110 11/16	37 3/4	12¼	25 15/16	3	349	123	1	348
120	129	122 3/16	41 3/4	12¼	26 3/4	3	380	135	1	381



4603 Troughing / 35°

Also available with Urethane covered rolls.

BELT WIDTH	A	B	C/D	E	F	J	WT.	4603-W A	4603-W J	4603-W WT.
36	45	37 13/16	13 3/4	11	19 1/8	4	156	51	1	149
42	51	43 1/8	15 3/4	11	20 1/4	4	171	57	1	164
48	57	48 3/8	17 3/4	11	21 7/16	3½	182	63	1	178
54	63	53 11/16	19 3/4	11	22 5/16	3½	196	69	1	202
60	69	58 15/16	21 3/4	11	23 11/16	3	217	75	1	217
66	75	64 1/4	23 3/4	11	24 7/8	2¼	228	81	1	234
72	81	69 1/2	25 3/4	11½	26 1/2	2¼	248	87	1	255
84	93	80 1/16	29 3/4	11¼	28 9/16	2	318	99	2	325
96	105	90 5/8	33 3/4	11¼	30 7/8	2	354	111	2	361
108	117	101 3/16	37 3/4	12	33 7/8	2	371	123	2	377
120	129	111 3/4	41 3/4	12	36 3/16	2	405	135	2	411



4604 Troughing / 45°

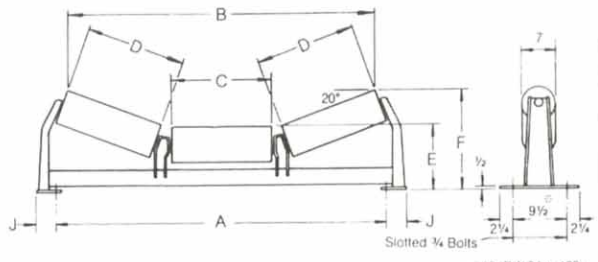
Also available with Urethane covered rolls.

BELT WIDTH	A	B	C/D	E	F	G	H	WT.	4604-W A	4604-W WT.
36	45	34½	13 3/4	11	21	9½	14	160	51	153
42	51	39 5/16	15 3/4	11	22 7/16	9½	14	174	57	167
48	57	44 1/8	17 3/4	11	23 7/8	9½	14	187	63	185
54	63	48 15/16	19 3/4	11	25 5/16	9½	14	198	69	200
60	69	53 3/4	21 3/4	11	26 11/16	9½	14	221	75	227
66	75	58 5/8	23 3/4	11¼	28 5/16	9½	14	241	81	247
72	81	63 7/16	25 3/4	11¼	29 3/4	9½	14	258	87	263
84	93	73 1/8	29 3/4	11 5/16	32 5/8	12	16½	326	99	324
96	105	83 11/16	33 3/4	11 5/16	35	12	16½	362	111	355

Also available with Urethane covered rolls.

Troughing / 20° 4702

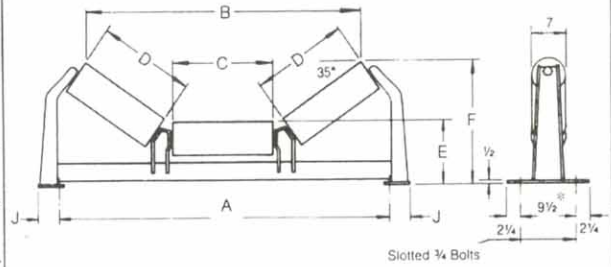
BELT WIDTH	A	B	C/D	E	F	J	WT.	4702-W A	4702-W J	4702-W WT.
36	45	41 3/16	13 3/4	11 1/2	16 5/16	4	152	51	1	148
42	51	46 15/16	15 3/4	11 1/2	17	3 1/2	166	57	1	165
48	57	52 3/4	17 3/4	11 1/2	17 3/4	3 1/2	181	63	1	180
54	63	58 1/2	19 3/4	11 1/2	18 3/8	3 1/2	197	69	1	203
60	69	64 1/4	21 3/4	11 1/2	19 1/16	3 1/2	221	75	1	219
66	75	70	23 3/4	11 1/2	19 3/4	3 1/2	237	81	1	235
72	81	75 3/4	25 3/4	12	20 15/16	3 1/2	257	87	1	255
84	93	87 1/4	29 3/4	12	22 5/16	3 1/2	321	99	1	319
96	105	98 13/16	33 3/4	12	23 11/16	3	357	111	1	357
108	117	110 5/16	37 3/4	12 3/4	25 13/16	3	375	123	1	376
120	129	121 13/16	41 3/4	12 3/4	27 3/16	3	410	135	1	411



Also available with Urethane covered rolls.

Troughing / 35° 4703

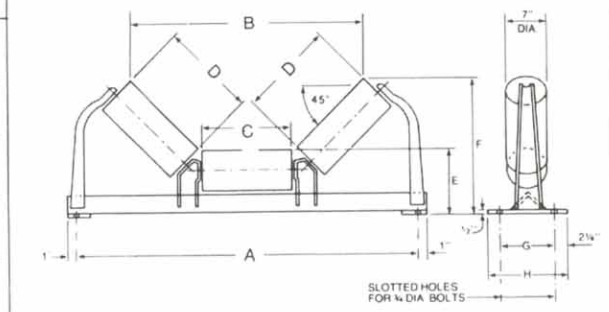
BELT WIDTH	A	B	C/D	E	F	J	WT.	4703-W A	4703-W J	4703-W WT.
36	45	37 1/4	13 3/4	11 1/2	19 9/16	4	168	51	1	161
42	51	42 1/2	15 3/4	11 1/2	20 11/16	4	183	57	1	174
48	57	47 13/16	17 3/4	11 1/2	21 13/16	3 1/2	196	63	1	192
54	63	53 1/8	19 3/4	11 1/2	23	3 1/2	212	69	1	218
60	69	58 3/8	21 3/4	11 1/2	24 1/8	3	234	75	1	234
66	75	63 11/16	23 3/4	11 1/2	25 1/4	2 1/4	248	81	1	253
72	81	68 15/16	25 3/4	12	26 15/16	2 1/4	268	87	1	275
84	93	79 1/2	29 3/4	11 3/4	28 15/16	2	341	99	2	348
96	105	90 1/16	33 3/4	11 3/4	31 1/4	2	379	111	2	386
108	117	100 5/8	37 3/4	12 1/2	34 5/16	2	399	123	2	405
120	129	111 3/16	41 3/4	12 1/2	36 5/8	2	435	135	2	441



Also available with Urethane covered rolls.

Troughing / 45° 4704

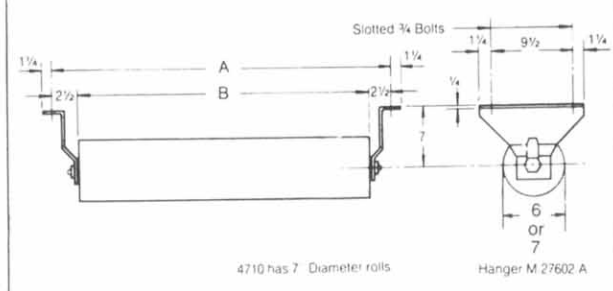
BELT WIDTH	A	B	C/D	E	F	G	H	WT.	4704-W A	4704-W WT.
36	45	33 13/16	13 3/4	11 1/2	21 5/16	9 1/2	14	171	51	164
42	51	38 5/8	15 3/4	11 1/2	22 3/4	9 1/2	14	187	57	180
48	57	43 7/16	17 3/4	11 1/2	24 3/16	9 1/2	14	201	63	199
54	63	48 1/4	19 3/4	11 1/2	25 5/8	9 1/2	14	215	69	217
60	69	53 1/8	21 3/4	11 1/2	27	9 1/2	14	238	75	244
66	75	57 15/16	23 3/4	11 3/4	28 11/16	9 1/2	14	260	81	266
72	81	62 3/4	25 3/4	11 3/4	30 1/8	9 1/2	14	277	87	282
84	93	72 7/16	29 3/4	11 13/16	33	12	16 1/2	348	99	355
96	105	83	33 3/4	11 13/16	35 3/8	12	16 1/2	388	111	396



Also available with Urethane covered rolls.

Return 4610, 4710

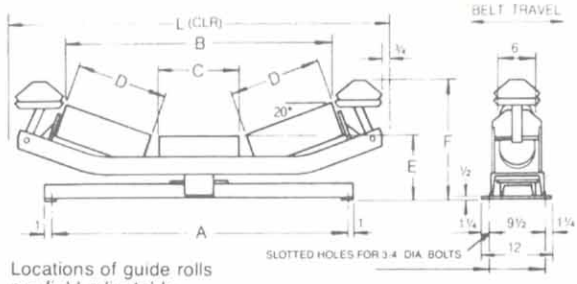
BELT WIDTH	A	B	4610 WT.	4710 WT.	A	B	4610-W WT.	4710-W WT.
36	45	40	78	87	51	46	86	96
42	51	46	86	96	57	52	95	107
48	57	52	95	107	63	58	103	117
54	63	58	103	117	69	64	113	128
60	69	64	113	128	75	70	121	138
66	75	70	121	138	81	76	131	148
72	81	76	131	148	87	82	139	158
84	93	88	149	169	99	94	158	180
96	105	100	167	190	111	106	176	201
108	117	112	185	210	123	118	194	221
120	129	124	203	231	135	130	212	242



All dimensions in inches. Certified prints are furnished for construction purposes.

SERIES 4000
DIMENSIONS

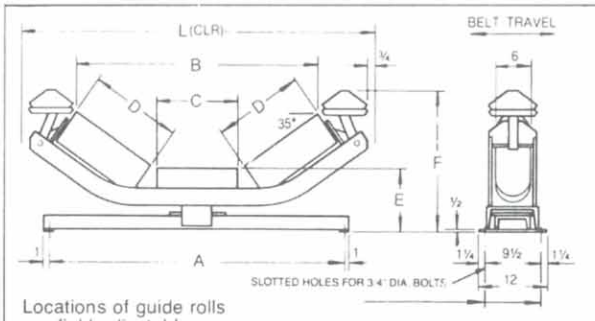
Roll diameter: 6 and 7 inches
Bearings: 1¼ dia. tapered roller



Locations of guide rolls are field adjustable

4622 Troughing Trainer / 20°

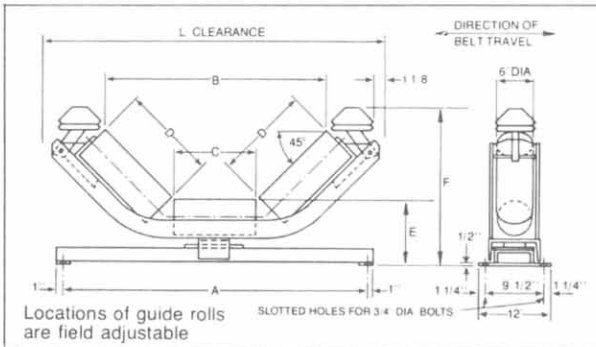
BELT WIDTH	A	B	C/D	E	F	L	WT.	4622-W A	4622-W WT.
36	45	35 13/16	11 3/4	11	20 1/4	57 9/16	254	51	260
42	51	41 9/16	13 3/4	11	20 15/16	63 5/16	275	57	281
48	57	47 5/16	15 3/4	11	21 5/8	69 1/16	296	63	302
54	63	53 1/16	17 3/4	11	22 5/16	74 13/16	316	69	322
60	69	58 13/16	19 3/4	11	23	80 9/16	337	75	343
66	75	64 9/16	21 3/4	11	23 1/16	86 5/16	357	81	363
72	81	70 5/16	23 3/4	11 1/2	24 7/8	92 1/16	408	87	416



Locations of guide rolls are field adjustable

4623 Troughing Trainer / 35°

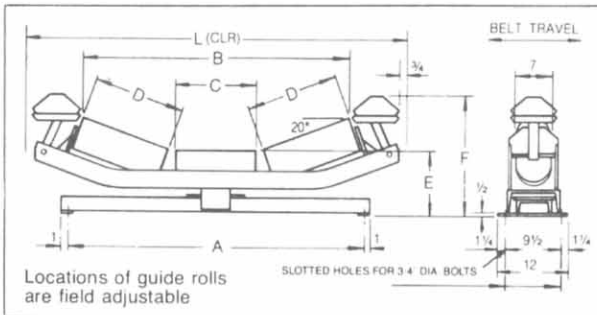
BELT WIDTH	A	B	C/D	E	F	L	WT.	4623-W A	4623-W WT.
36	45	32 1/2	11 3/4	11	23 5/8	53 13/16	254	51	260
42	51	37 13/16	13 3/4	11	24 3/4	59 1/16	275	57	281
48	57	43 1/8	15 3/4	11	25 7/8	64 5/16	296	63	302
54	63	48 3/8	17 3/4	11	27	69 9/16	316	69	322
60	69	53 5/8	19 3/4	11	28 1/8	74 13/16	337	75	343
66	75	58 15/16	21 3/4	11	29 1/4	80 1/16	357	81	363
72	81	64 3/16	23 3/4	11 1/2	30 7/8	85 5/16	408	87	416



Locations of guide rolls are field adjustable

4624 Troughing Trainer / 45°

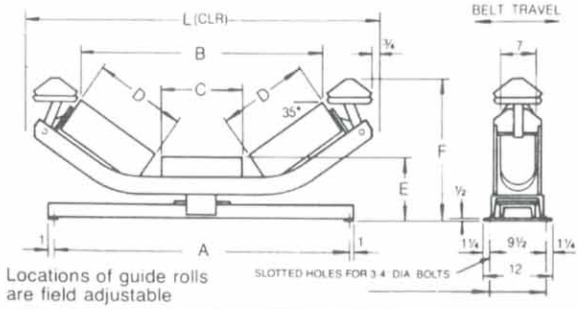
BELT WIDTH	A	B	C/D	E	F	L	WT.	4624-W A	4624-W WT.
36	45	29 11/16	11 3/4	11	25	50 5/8	260	51	266
42	51	34 1/2	13 3/4	11	26 3/8	55 1/2	281	57	287
48	57	39 5/16	15 3/4	11	27 3/4	60 1/4	302	63	308
54	63	44 1/8	17 3/4	11	29 3/16	65 1/8	322	69	328
60	69	48 15/16	19 3/4	11	30 5/8	69 15/16	343	75	346
66	75	53 3/4	21 3/4	11 1/2	32 1/2	74 3/4	363	81	371
72	81	58 9/16	23 3/4	11 1/2	34	79 9/16	416	87	393



Locations of guide rolls are field adjustable

4722 Troughing Trainer / 20°

BELT WIDTH	A	B	C/D	E	F	L	WT.	4722-W A	4722-W WT.
36	45	35 7/16	11 3/4	11 1/2	20 3/4	57 3/16	265	51	271
42	51	41 3/16	13 3/4	11 1/2	21 7/16	62 15/16	287	57	293
48	57	46 15/16	15 3/4	11 1/2	22 1/8	68 11/16	309	63	315
54	63	52 11/16	17 3/4	11 1/2	22 13/16	74 7/16	330	69	336
60	69	58 7/16	19 3/4	11 1/2	23 1/2	80 3/16	353	75	359
66	75	64 3/16	21 3/4	11 1/2	24 3/16	85 15/16	374	81	380
72	81	69 15/16	23 3/4	12	25 3/8	91 11/16	426	87	434



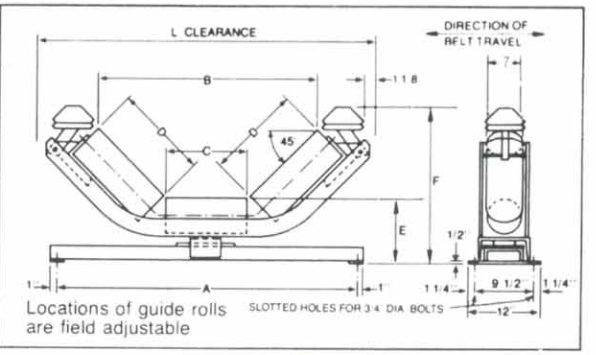
Locations of guide rolls are field adjustable

4723 Troughing Trainer / 35°

BELT WIDTH	A	B	C/D	E	F	L	WT.	4723-W A	4723-W WT.
36	45	32	11 3/4	11 1/2	24	53 3/16	265	51	271
42	51	37 1/4	13 3/4	11 1/2	25 1/8	58 7/16	287	57	293
48	57	42 1/2	15 3/4	11 1/2	26 1/4	63 11/16	309	63	315
54	63	47 13/16	17 3/4	11 1/2	27 3/8	68 15/16	330	69	336
60	69	53 1/16	19 3/4	11 1/2	28 1/2	74 3/16	353	75	359
66	75	58 3/8	21 3/4	11 1/2	29 5/8	79 7/16	374	81	380
72	81	63 5/8	23 3/4	12	31 1/4	84 11/16	426	87	434

Troughing Trainer / 45° 4724

BELT WIDTH	A	B	C/D	E	F	L	WT.	4724-W A	4724-W WT.
36	45	29	11¾	11½	25¼	49¹⁵⁄₁₆	271	51	277
42	51	33¹³⁄₁₆	13¾	11½	26¹¹⁄₁₆	54¾	293	57	299
48	57	38⅝	15¾	11½	28⅛	59⅝	315	63	321
54	63	43⅞	17¾	11½	29½	64⅜	336	69	342
60	69	48¼	19¾	11½	30¹⁵⁄₁₆	69⅜	358	75	362
66	75	53⅛	21¾	12	32¹³⁄₁₆	74	380	81	388
72	81	57⅞	23¾	12	34⅜	78¹³⁄₁₆	404	87	412

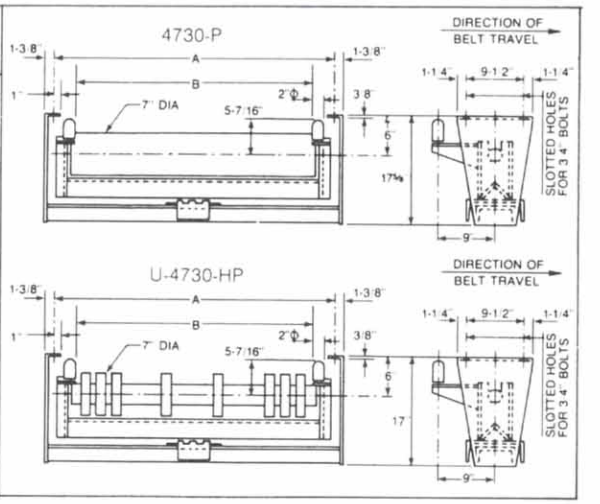


Locations of guide rolls are field adjustable

Also available with Urethane covered rolls.

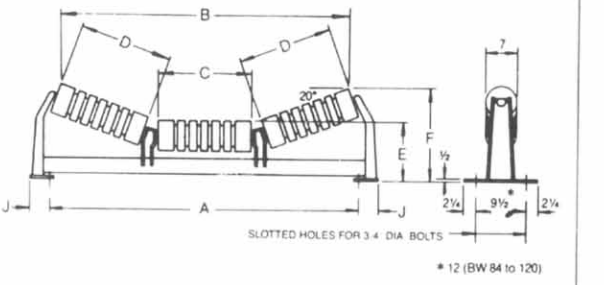
Return Trainer 4730-P

BELT WIDTH	B	4730-P A	4730-P WT.	4730-PW A	4730-PW WT.	U-4730-HP A	U-4730-HP No. Discs	U-4730-HP WT.	U-4730-HPW A	U-4730-HPW No. Discs	U-4730-HPW WT.
36	37	45	245	51	251	45	9	224	51	9	230
42	43	51	265	57	272	51	9	240	57	9	246
48	49	57	287	63	293	57	10	259	63	10	265
54	55	63	308	69	314	63	10	275	69	10	281
60	61	69	330	75	336	69	11	294	75	11	300
66	67	75	351	81	357	75	11	310	81	11	316
72	73	81	372	87	378	81	12	330	87	12	335



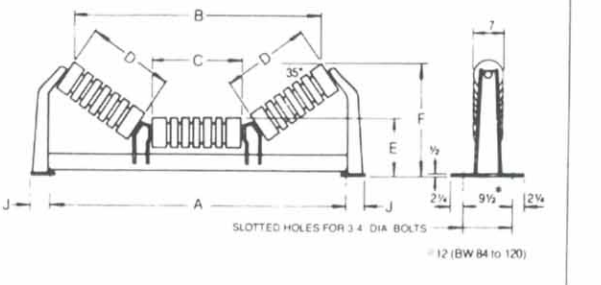
Impact / 20° 4752

BELT WIDTH	A	B	C/D	E	F	J	WT.	4752-W A	4752-W J	4752-W WT.
36	45	41³⁄₁₆	13¾	11½	16⁵⁄₁₆	4	180	51	1	176
42	51	46¹⁵⁄₁₆	15¾	11½	17	3½	198	57	1	196
48	57	52¾	17¾	11½	17¾	3½	221	63	1	215
54	63	58½	19¾	11½	18⅜	3½	237	69	1	242
60	69	64¼	21¾	11½	19⅛	3½	264	75	1	262
66	75	70	23¾	11½	19¾	3½	283	81	1	281
72	81	75¾	25¾	12	20¹⁵⁄₁₆	3½	316	87	1	317
84	93	87¼	29¾	12	22⅝	3½	392	99	1	390
96	105	98¹³⁄₁₆	33¾	12	23¹¹⁄₁₆	3	438	111	1	438
108	117	110⅝	37¾	12¾	25¹³⁄₁₆	3	479	123	1	478
120	129	121¹³⁄₁₆	41¾	12¾	27⅜	3	523	135	1	524



Impact / 35° 4753

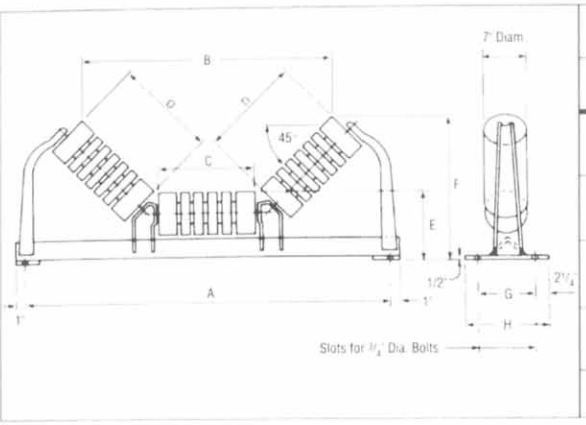
BELT WIDTH	A	B	C/D	E	F	J	WT.	4753-W A	4753-W J	4753-W WT.
36	45	37¼	13¾	11½	19⅝	4	195	51	1	188
42	51	42½	15¾	11½	20¹¹⁄₁₆	4	215	57	1	208
48	57	47¹³⁄₁₆	17¾	11½	21¹³⁄₁₆	3½	231	63	1	227
54	63	53⅛	19¾	11½	23	3½	251	69	1	256
60	69	58⅜	21¾	11½	24⅛	3	276	75	1	276
66	75	63¹⁄₁₆	23¾	11½	25¼	2¼	295	81	1	300
72	81	68¹⁵⁄₁₆	25¾	12	26¹⁵⁄₁₆	2¼	326	87	1	333
84	93	79½	29¾	11¾	28¹⁵⁄₁₆	2	411	99	2	421
96	105	90¹⁄₁₆	33¾	11¾	31¼	2	461	111	2	470
108	117	100⅝	37¾	12½	34⅝	2	503	123	2	512
120	129	111³⁄₁₆	41¾	12½	36⅝	2	550	135	2	559



All dimensions in inches. Certified prints are furnished for construction purposes.

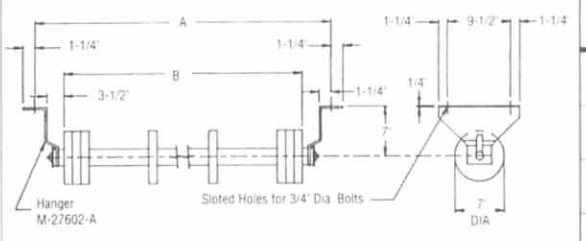
SERIES 4000
DIMENSIONS

Roll diameters: 6 and 7 inches
Bearings: $1^1/_4$" dia. tapered roller



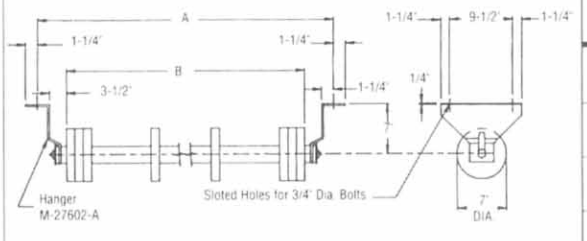
4754 Impact / 45°

BELT WIDTH	A	B	C/D	E	F	G	H	WT.	A	WT.
36	45	33 13/16	13 3/4	11 1/2	21 5/16	9 1/2	14	195	51	188
42	51	38 5/8	15 3/4	11 1/2	22 3/4	9 1/2	14	216	57	209
48	57	43 7/16	17 3/4	11 1/2	24 3/16	9 1/2	14	233	63	231
54	63	48 1/4	19 3/4	11 1/2	25 5/8	9 1/2	14	251	69	253
60	69	53 1/8	21 3/4	11 1/2	27	9 1/2	14	277	75	283
66	75	57 15/16	23 3/4	11 3/4	28 11/16	9 1/2	14	307	81	313
72	81	62 3/4	25 3/4	11 3/4	30 1/8	9 1/2	14	329	87	334
84	93	72 7/16	29 3/4	11 13/16	33	12	16 1/2	407	99	414
96	105	83	33 3/4	11 13/16	35 3/8	12	16 1/2	455	111	462



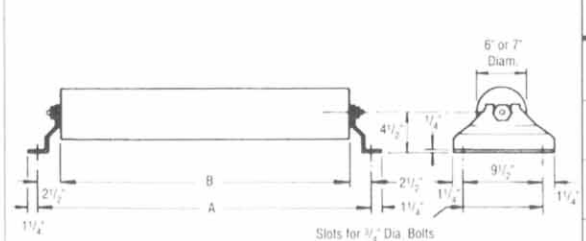
4760-HG Rubber Disc Return

BELT WIDTH	4760-HG A	4760-HG B	4760-HG NO. DISCS	4760-HG WT.	4760-HGW A	4760-HGW B	4760-HGW NO DISCS	4760-HGW WT.
36	45	35 5/8			51	35 5/8		
42	51	41 5/8	10	77	57	41 5/8	14	90
48	57	47 5/8	11	85	63	47 7/16	15	98
54	63	53 5/8	12	92	69	53 5/8	16	105
60	69	59 5/8	13	100	75	59 5/8	17	113
66	75	65	13	104	81	65 5/8	17	117
72	81	71 5/8	13	110	87	71 5/8	17	123
84	93	83 5/8	13	118	99	83 5/8	17	131
96	105	95 5/8	14	128	111	95 5/8	18	141
108	117	107 5/8	15	138	123	107 5/8	19	151
120	129	119 5/8	16	149	135	119 5/8	20	162



U-4760-HG TUFFGARD Disc Return

BELT WIDTH	U-4760-HG A	U-4760-HG B	U-4760-HG NO. DISCS	U-4760-HG WT.	U-4760-HGW A	U-4760-HGW B	U-4760-HGW NO DISCS	U-4760-HGW WT.
36	45	35 5/8	9	67	51	35 5/8	13	85
42	51	41 5/8	9	72	57	41 5/8	13	89
48	57	47 5/8	10	80	63	47 7/16	14	97
54	63	53 5/8	10	85	69	53 5/8	14	102
60	69	59 5/8	11	93	75	59 5/8	15	110
66	75	65 5/8	11	98	81	65 5/8	15	115
72	81	71 5/8	12	107	87	71 5/8	16	121
84	93	83 5/8	13	124	99	83 5/8	17	138
96	105	95 5/8	14	137	111	95 5/8	18	151
108	117	107 5/8	15	150	123	107 5/8	19	164
120	129	119 5/8	16	163	135	119 5/8	20	177



4760-4770 Flat Belt

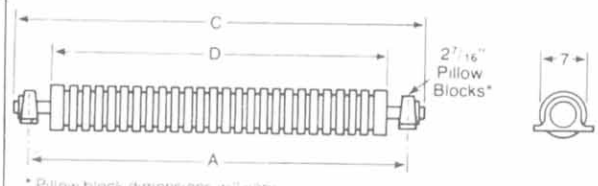
Also available with Urethane covered rolls.

BELT WIDTH	A	B	4670 WT.	4770 WT.	A	B	4670-W WT.	4770-W WT.
36	45	40	77	85	51	46	85	95
42	51	46	85	89	57	52	94	106
48	57	52	94	106	63	58	102	116
54	63	58	102	116	69	64	112	127
60	69	64	112	127	75	70	120	136
66	75	70	120	136	81	76	130	147
72	81	76	130	147	87	82	138	157
84	93	88	147	168	89	94	157	179
96	105	100	165	189	111	106	175	199
108	117	112	183	209	123	118	193	220
120	129	124	201	230	135	130	211	241

All dimensions are in inches. Certified prints are furnished for construction purposes.

Live Shaft Flat Belt Impact 4770 -LSI

BELT WIDTH	A	C	D	WT.	477-LSIW A	C	D	WT.
36	45	50	40 5/8	171	51	56	40 5/8	177
42	51	56	46 3/4	191	57	62	46 3/4	199
48	57	62	51	205	63	68	51	215
54	63	68	57 1/8	227	69	74	57 1/8	235
60	69	74	63 3/8	247	75	80	63 3/8	255
72	81	86	75 3/4	287	87	92	75 3/4	296

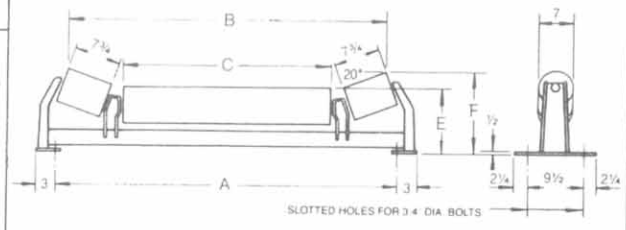


* Pillow block dimensions will vary according to manufacturer and are not supplied with idler.

Also available with Urethane covered rolls.

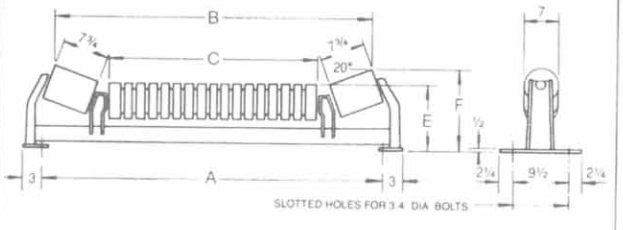
Feeder & Picking 4782

BELT WIDTH	A	B	C	E	F	WT.	4782-W A	WT.
36	45	39 15/16	23 3/4	11 1/2	14 5/16	151	51	148
42	51	45 15/16	29 3/4	11 1/2	14 5/16	164	57	161
48	57	51 15/16	35 3/4	11 1/2	14 5/16	179	63	176
54	63	57 15/16	41 3/4	11 1/2	14 5/16	193	69	199
60	69	63 15/16	47 3/4	11 1/2	14 5/16	217	75	214
66	75	69 15/16	53 3/4	11 1/2	14 5/16	232	81	229
72	81	75 15/16	59 3/4	12	14 13/16	261	87	257



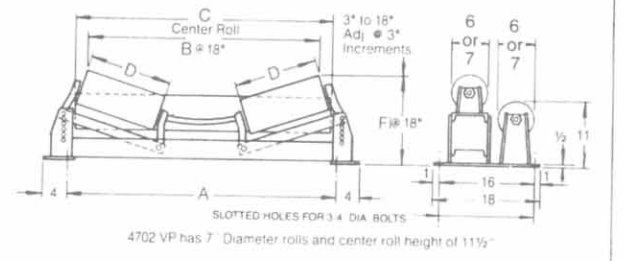
Feeder & Picking Impact 4792

BELT WIDTH	A	B	C	E	F	WT.	4792-W A	WT.
36	45	39 15/16	23 3/4	11 1/2	14 5/16	173	51	170
42	51	45 15/16	29 3/4	11 1/2	14 5/16	193	57	190
48	57	51 15/16	35 3/4	11 1/2	14 5/16	211	63	207
54	63	57 15/16	41 3/4	11 1/2	14 5/16	229	69	225
60	69	63 15/16	47 3/4	11 1/2	14 5/16	257	75	254
66	75	69 15/16	53 3/4	11 1/2	14 5/16	276	81	273
72	81	75 15/16	59 3/4	12	14 13/16	318	87	314



Variable Pitch Transition 4602-VP, 4702-VP

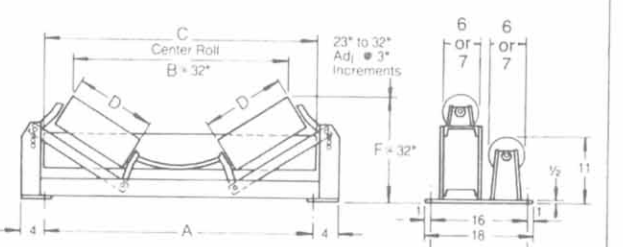
BELT WIDTH	4602-VP A	B	C	D	F	WT.	4702-VP F	WT.	4602-VPW A	WT.	4702-VPW A	F	WT
36	45	38 7/8	46	13 3/4	14 7/8	235	15 3/8	254	51	235	51	15 3/8	254
42	51	44 11/16	52	15 3/4	15 1/2	258	16	279	57	258	57	16	279
48	57	50 1/2	58	17 3/4	16 1/8	280	16 5/8	303	63	280	63	16 5/8	303
54	63	56 5/16	64	19 3/4	16 3/4	302	17 1/4	328	69	302	69	17 1/4	328
60	69	62 1/8	70	21 3/4	17 3/8	324	17 7/8	352	75	324	75	17 7/8	352
66	75	67 13/16	76	23 3/4	18	346	18 1/2	377	81	346	81	18 1/2	377
72	81	73 3/4	82	25 3/4	18 5/8	369	19 1/8	401	87	369	87	19 1/8	401



4702 VP has 7" Diameter rolls and center roll height of 11½"

Variable Pitch Transition 4603-VP, 4703-VP

BELT WIDTH	4603-VP A	B	C	D	F	WT.	4703-VP F	WT.	4603-VPW A	WT.	4703-VPW A	F	WT.
36	45	35 11/16	46	13 3/4	17 5/8	240	18 1/16	258	51	240	51	18 1/16	258
42	51	41 1/16	52	15 3/4	18 11/16	264	19 1/8	284	57	264	57	19 1/8	284
48	57	46 1/2	58	17 3/4	19 3/4	287	20 3/16	310	63	287	63	20 3/16	310
54	63	51 7/8	64	19 3/4	20 13/16	309	21 1/4	335	69	309	69	21 1/4	335
60	69	57 1/4	70	21 3/4	21 7/8	332	22 5/16	360	75	332	75	22 5/16	360
66	75	62 5/8	76	23 3/4	22 15/16	355	23 3/8	385	81	355	81	23 3/8	385
72	81	68 1/16	82	25 3/4	24	379	24 7/16	411	87	379	87	24 7/16	411



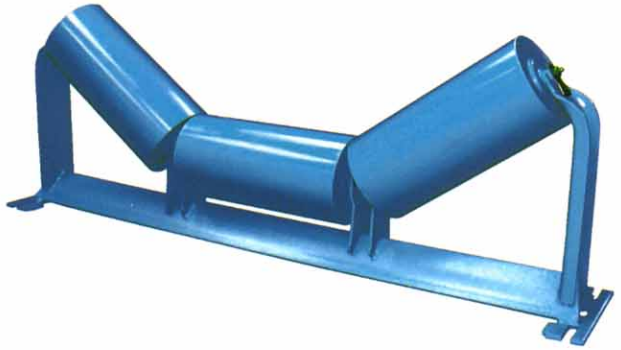
4703 VP has 7" Diameter rolls and center roll height of 11½"

NOTES

HEWITT-ROBINS ADDITIONAL PRODUCTS

1000 SERIES
The 1000 SERIES idler from Hewitt-Robins exceeds CEMA B specifications. The idler is designed for light-duty applications and is available factory sealed in belt widths from 18" to 48".

2000 SERIES
The 2000 SERIES idler from Hewitt-Robins exceeds CEMA C specifications. The idler is designed for medium-duty applications and is available either factory sealed or regreaseable in belt widths from 18" to 60".



3000 SERIES
The 3000 SERIES idler from Hewitt-Robins exceeds CEMA D specifications and is designed for heavy-duty applications. SERIES 3000 idlers are available in belt widths from 36" to 72".

Impact Bed
By supporting the conveyor belt and cushioning it against the shock of heavy loads and impacts, the Hewitt-Robins impact/slider bed extends belt life and reduces downtime. Its modular design allows multiple units to be fitted to form the bed length desired (3 shown).

Wobbler (Style 3630 Return Trainer)
The wobbler from Hewitt-Robins is a special return roll designed to train your conveyor belt. Its unique design, a steel roll centered on a 60mm ball bearing, pivots when the conveyor belt moves off center and guides it back to allow for a more efficient operating conveyor. The wobbler, with optional 1/4" urethane cover as shown above, is available in belt widths from 18" to 60".

Spiral Catenary Idlers
Hewitt-Robins spiral idlers are designed to perform in even the stickiest applications. Their unique "corkscrew" design works to clean the conveyor belt and helps to control belt-training problems associated with installations handling sticky material. Spiral idlers are available in belt width from 18" to 48".

Your Conveyor Source
for More Than a Century

Shown above is an original idler Mr. Robins designed and supplied to Thomas Edison in 1896.

You can count on Hewitt-Robins

For Product Performance: Although primitive belt conveyors were in use as early as 1830, it wasn't until 1891 that Thomas Robins, founder of our company, developed the first practical conveyor system for moving heavy and abrasive materials utilizing steel, in-line idlers and rubber covered belting. The first Robins-designed conveyor was installed at Thomas Edison's iron ore mine in New Jersey. Thomas Robins' pride in producing the most reliable conveyor components available continues to this day to motivate Hewitt-Robins design and manufacturing engineers.

For Problem Solving Innovations: Continuous development and testing programs, both in the field and in the lab, continue to produce new solutions to old problems and carry on the traditions started by Thomas Robins.

For Quick Delivery From Stock: Most commonly used sizes and styles of Hewitt-Robins idlers are stocked in scores of distributor and warehouse locations throughout the United States and in other countries. In many instances, the replacement idlers and service parts you need to get back into production can be obtained in a matter of hours.

For Nationwide Sales and Service: Experienced Hewitt-Robins distributors and Area Managers will help you select the most economical style and size of idler to meet your conveying requirements. Because idlers represent a major portion of a conveyor's cost, proper selection based on economics as well as sound engineering principles can result in substantial savings in capital outlay. That's why we urge you to take advantage of Hewitt-Robins' experience during the initial stages of your conveyor design. No one knows more about idlers than Hewitt-Robins. Good reason to call us first.

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive, Pueblo West, CO 81007
Phone: (205) 487-1931 Fax: (205) 487-1935
E-mail: sales@hewitt-robins.com
Website: www.hewitt-robins.com

Call 1-800-388-7701 for the distributor nearest you.

Bolts, nuts, and washers for mounting are not included. Weights shown in pounds and lengths shown in inches. Catalog subject to change or correction without notice. Use certified prints for constructions purposes.
Printed in the U.S.A. Series 4000 8/05

Hewit-Robins products pictured, described, or listed in this publication are illustrative only. Application and use of these products must be in accordance with applicable codes and regulations and must be arranged and/or provided with covers or other guards where necessary to assure safety of personnel.

CEMA C
CEMA D

GOODMAN CONVEYOR

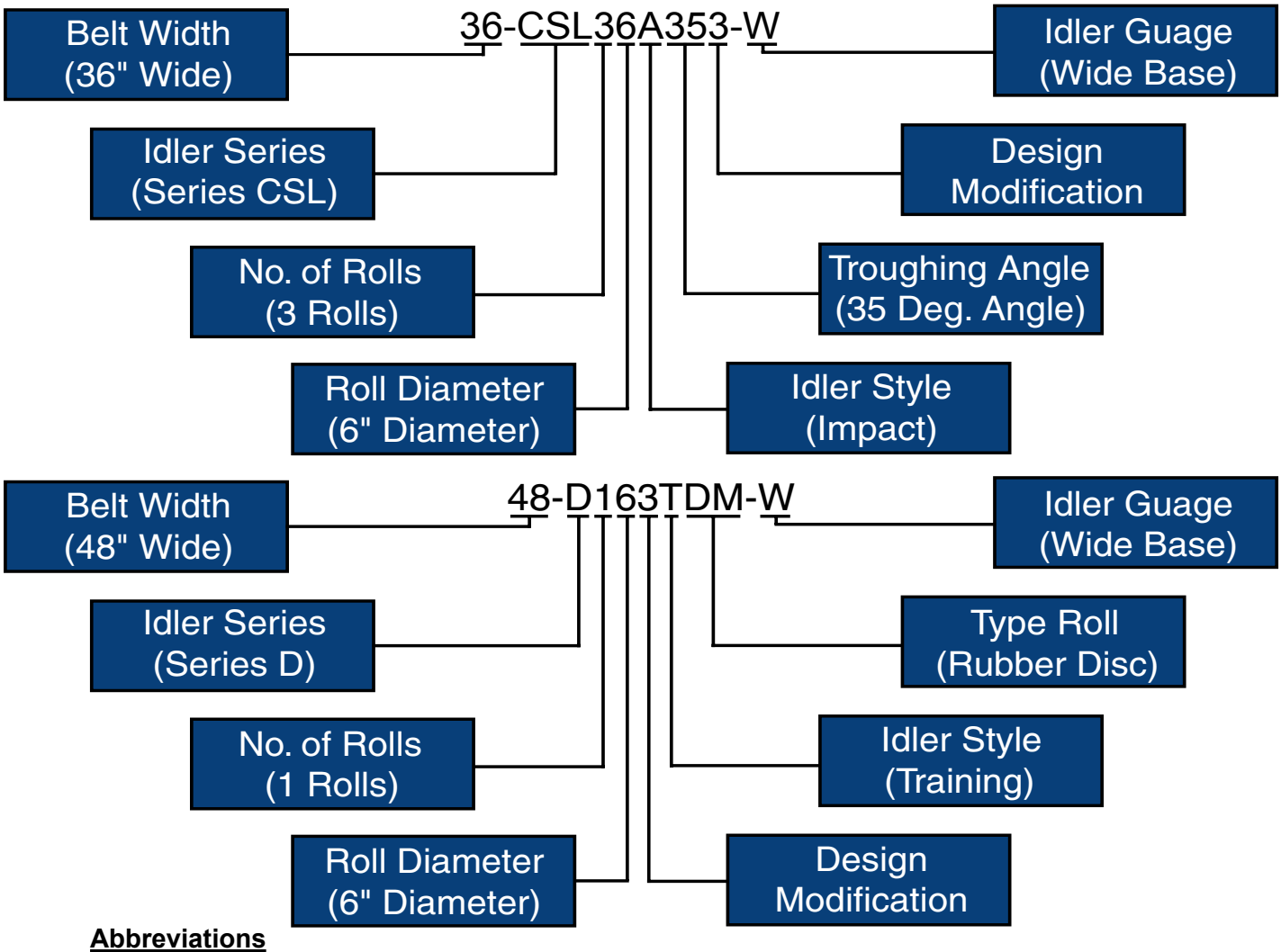
C and D Series

With Jeffrey Permaseal III™ seal design

Idler Specification Information

Goodman Series	CEMA Series	Roll Diameter	Type of Service
B	B	4 & 5 inch	Light Duty
CSL, CMF, CSLB	C	4, 5 & 6 inch	Medium Duty
D, DSL	D	5 & 6 inch	Medium to Heavy Duty
E, ESL	E	6 & 7 inch	Heavy Duty

Idler Identification Guide (Examples)



Abbreviations

Prefix (Series)
B, C, D and E-(see above)
SL-Sealed For Life
SLB-Sealed for Life Ball Bearing
X-Special Feature

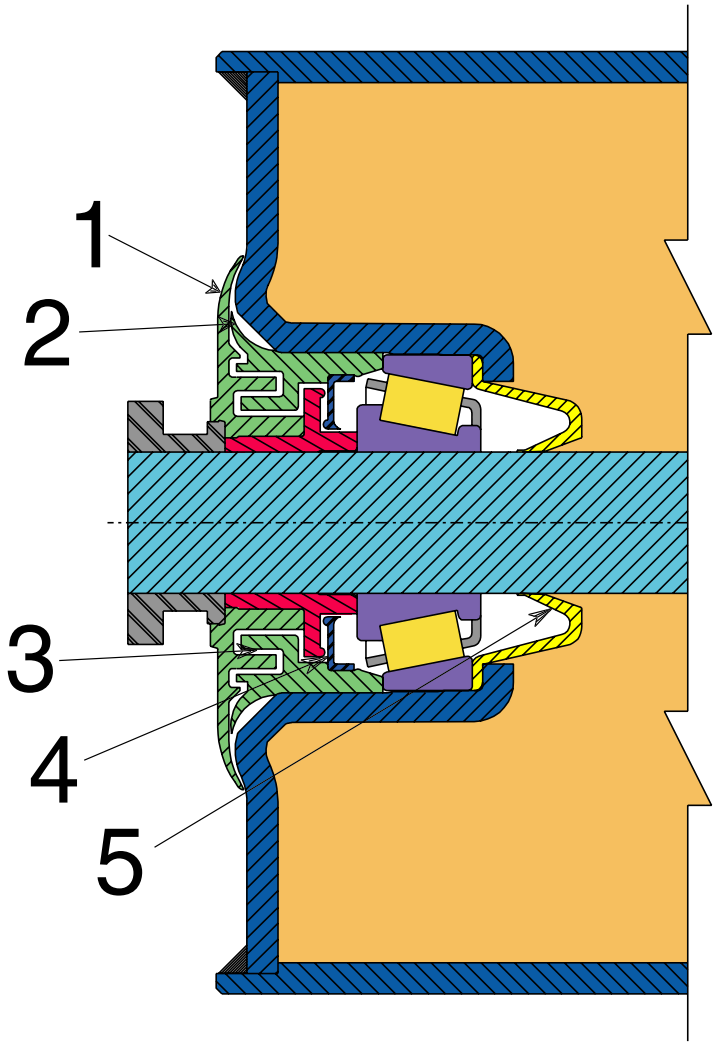
Internal
A-Impact
T-Training
SQ-Scale Quality
SS-Scale Service

Suffix
DM-Rubber Disc Massed End
E-Elastomer (Urethane)
L-Live Shaft
CDR-Catenary Quick Release
CC-Catenary Chain
CRK-Catenary Rod & Key
CEH-Catenary Eye Hook
W-Wide Base

Note: Standard Base is furnished unless Wide Base (W) is specified. 4" Dia. rolls are also available, but not shown in this catalog.

Jeffrey Permaseal III™ Roll Design Features

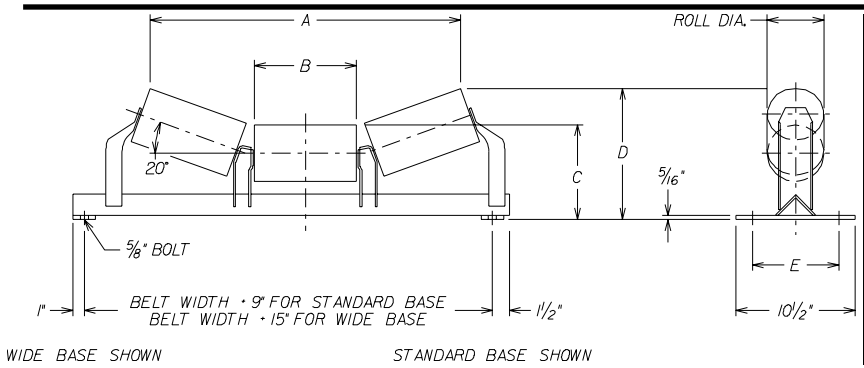
- 3/4” Tapered Roller Bearing
- 3/4” Solid Shaft
- Sealed For Life, Non-Purging Seal
- Counter Bored Roll Shell, Protected Weld



1. Exterior Shield
2. Flinger
3. Grease Filled, Multiple Path Labyrinth Seal
4. Contact Lip Seal
5. Rear Seal

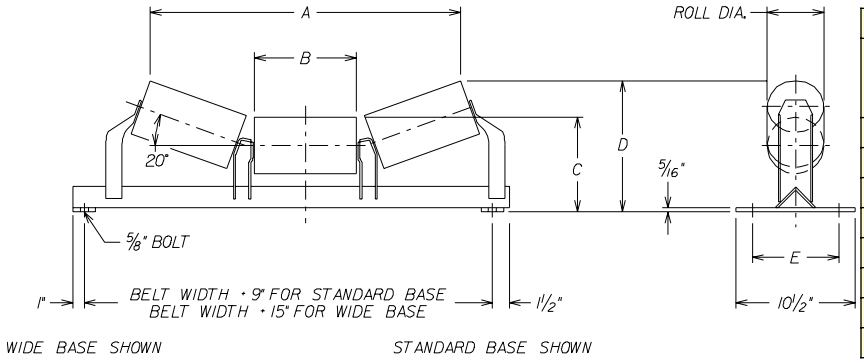
CEMA C

Roll Diameter 5” and 6”



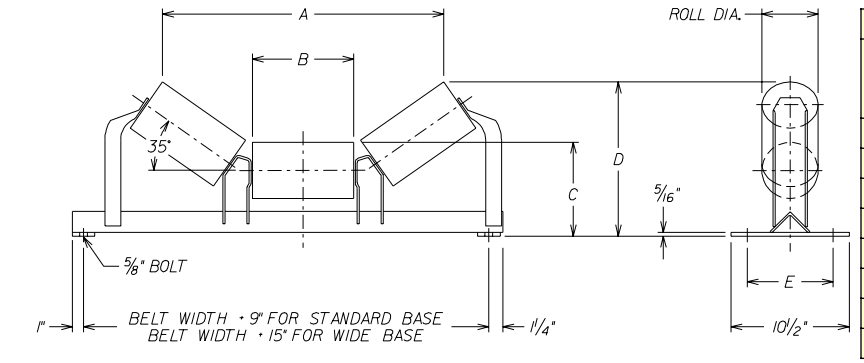
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35203 20 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	44	-	21 1/4	6 7/8	8 3/8	10 13/16	6 1/4 - 9
24	50	55	27 3/8	9	8 3/8	11 9/16	6 1/4 - 9
30	58	60	33 5/16	11 1/16	8 11/16	12 5/8	6 1/4 - 9
36	66	67	39 1/4	13 1/8	8 11/16	13 5/16	6 1/4 - 9
42	78	80	45 3/8	15 1/4	8 11/16	14 1/16	6 1/4 - 9
48	90	92	51 1/4	17 5/16	9 1/16	15 1/8	7 - 9
54	100	103	57 1/4	19 3/8	9 1/16	15 7/8	7 - 9
60	109	111	63 5/16	21 1/2	9 1/16	16 9/16	7 - 9



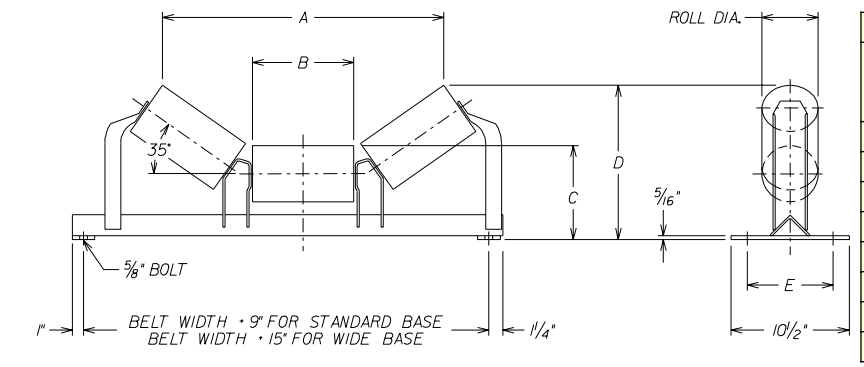
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36203 20 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	51	-	20 7/8	6 7/8	8 7/8	11 1/4	6 1/4 - 9
24	59	63	27	9	8 7/8	12	6 1/4 - 9
30	69	70	32 15/16	11 1/16	9 3/16	13 1/16	6 1/4 - 9
36	77	78	38 7/8	13 1/8	9 3/16	13 13/16	6 1/4 - 9
42	90	93	45	15 1/4	9 3/16	14 1/2	6 1/4 - 9
48	104	106	50 15/16	17 5/16	9 9/16	15 5/8	7 - 9
54	116	118	56 7/8	19 3/8	9 9/16	16 5/16	7 - 9
60	125	128	63	21 1/2	9 9/16	17 1/16	7 - 9



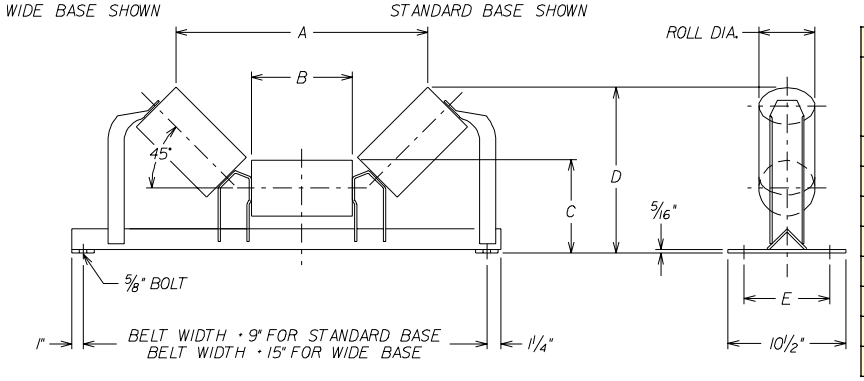
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35353 35 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	45	-	19 3/8	6 7/8	8 3/8	12 1/2	6 1/4 - 9
24	51	57	25	9	8 3/8	13 11/16	6 1/4 - 9
30	60	62	30 7/16	11 1/16	8 11/16	15 1/4	6 1/4 - 9
36	68	70	35 13/16	13 1/8	8 11/16	16 7/16	6 1/4 - 9
42	81	83	41 1/2	15 1/4	8 11/16	17 5/8	6 1/4 - 9
48	93	95	46 15/16	17 5/16	9 1/16	19 3/16	7 - 9
54	106	108	52 5/16	19 3/8	9 1/16	20 3/8	7 - 9
60	115	118	57 15/16	21 1/2	9 1/16	21 5/8	7 - 9



WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36353 35 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	52	-	18 3/4	6 7/8	8 7/8	12 7/8	6 1/4 - 9
24	59	65	24 3/8	9	8 7/8	14 1/8	6 1/4 - 9
30	71	73	29 13/16	11 1/16	9 3/16	15 5/8	6 1/4 - 9
36	79	81	35 1/4	13 1/8	9 3/16	16 11/16	6 1/4 - 9
42	93	95	40 7/8	15 1/4	9 3/16	18 1/16	6 1/4 - 9
48	107	109	46 5/16	17 5/16	9 9/16	19 5/8	7 - 9
54	121	124	51 3/4	19 3/8	9 9/16	20 13/16	7 - 9
60	132	134	57 3/8	21 1/2	9 9/16	22	7 - 9

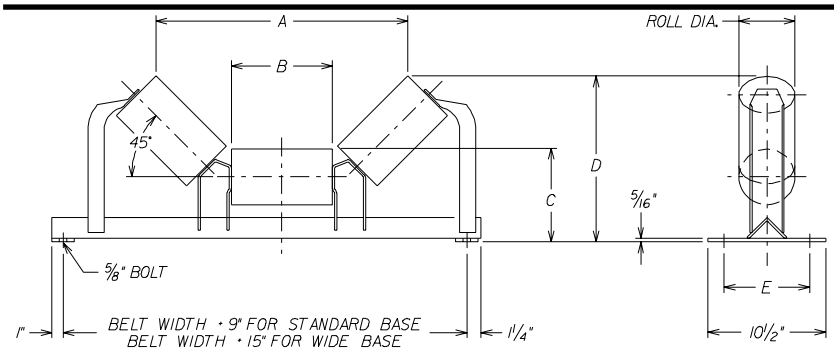


WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35453 45 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	49	-	17 11/16	6 7/8	8 3/8	13 7/16	6 1/4 - 9
24	56	61	22 13/16	9	8 3/8	14 15/16	6 1/4 - 9
30	67	68	27 3/4	11 1/16	8 11/16	16 3/4	6 1/4 - 9
36	75	76	32 3/4	13 1/8	8 11/16	18 3/16	6 1/4 - 9
42	88	90	37 7/8	15 1/4	8 11/16	19 11/16	6 1/4 - 9
48	101	104	42 7/8	17 5/16	9 1/16	21 9/16	7 - 9
54	110	113	47 13/16	19 3/8	9 1/16	23 1/16	7 - 9
60	120	123	53	21 1/2	9 1/16	24 1/2	7 - 9

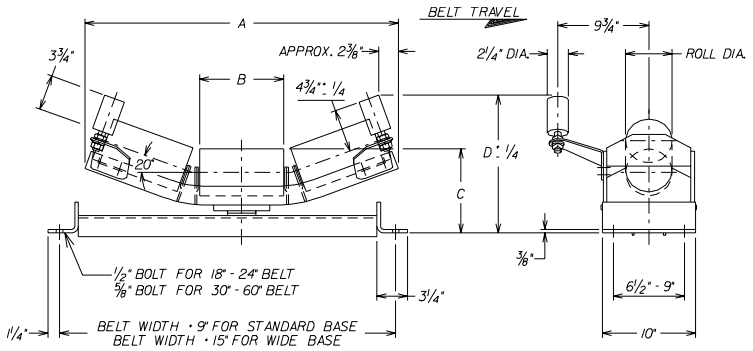
CEMA C

Roll Diameter 5” and 6”



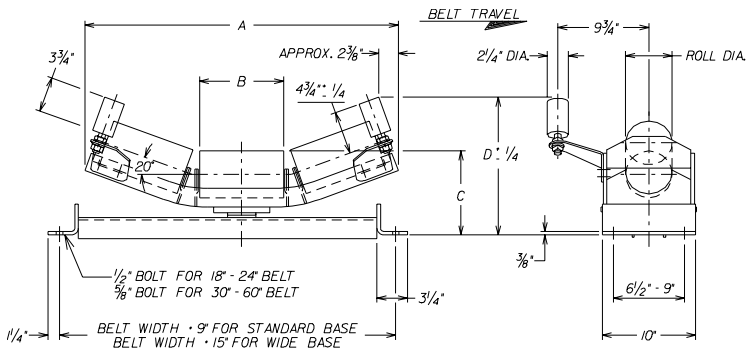
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36453 45 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	56	-	17 1/16	6 7/8	8 7/8	13 11/16	6 1/4 - 9
24	65	70	22 3/16	9	8 7/8	15 5/16	6 1/4 - 9
30	77	78	27 3/16	11 1/16	9 3/16	17 1/8	6 1/4 - 9
36	86	87	32 1/8	13 1/8	9 3/16	18 9/16	6 1/4 - 9
42	101	103	37 1/4	15 1/4	9 3/16	20 1/16	6 1/4 - 9
48	115	118	42 1/4	17 5/16	9 9/16	21 15/16	7 - 9
54	126	129	47 1/4	19 3/8	9 9/16	23 3/8	7 - 9
60	137	140	52 3/8	21 1/2	9 9/16	24 7/8	7 - 9



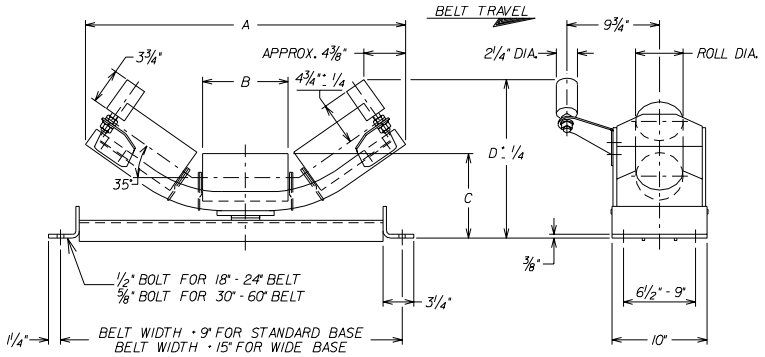
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35T203 20 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	84	87	27 7/8	6 7/8	9	13 15/16
24	94	103	33 5/8	9	9	14 5/8
30	109	112	39 3/8	11 1/16	9 3/8	15 3/4
36	123	126	45 1/8	13 1/8	9 3/8	16 7/16
42	133	139	50 7/8	15 1/4	9 3/8	17 3/16
48	146	150	56 5/8	17 5/16	9 3/4	18 1/4
54	163	166	62 7/8	19 3/8	9 3/4	19 1/8
60	175	178	68 5/8	21 1/2	9 3/4	19 7/8



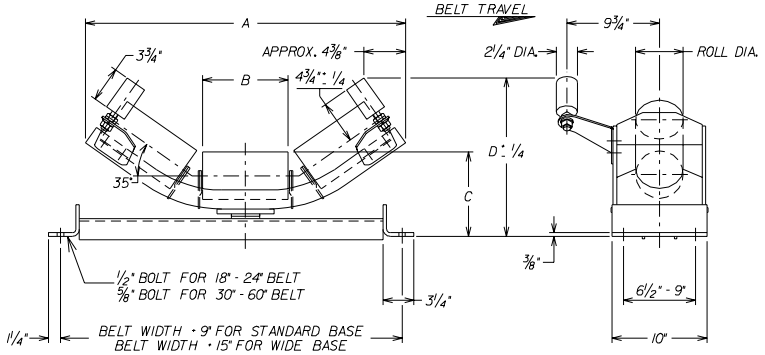
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36T203 20 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	91	94	27 7/8	6 7/8	9 1/2	13 15/16
24	102	111	33 5/8	9	9 1/2	14 5/8
30	119	122	39 3/8	11 1/16	9 7/8	15 3/4
36	134	137	45 1/8	13 1/8	9 7/8	16 7/16
42	146	151	50 7/8	15 1/4	9 7/8	17 3/16
48	160	164	56 5/8	17 5/16	10 1/4	18 1/4
54	179	182	62 7/8	19 3/8	10 1/4	19 1/8
60	191	194	68 5/8	21 1/2	10 1/4	19 7/8



WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35T353 35 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	86	88	28 7/16	6 7/8	9	15 5/8
24	95	104	33 3/4	9	9	16 13/16
30	110	113	39	11 1/16	9 3/8	18 3/8
36	124	127	44 5/16	13 1/8	9 3/8	19 9/16
42	135	140	49 9/16	15 1/4	9 3/8	20 3/4
48	147	152	55 1/16	17 5/16	9 3/4	22 3/8
54	165	168	60 9/16	19 3/8	9 3/4	23 5/8
60	176	180	66 1/16	21 1/2	9 3/4	24 7/8

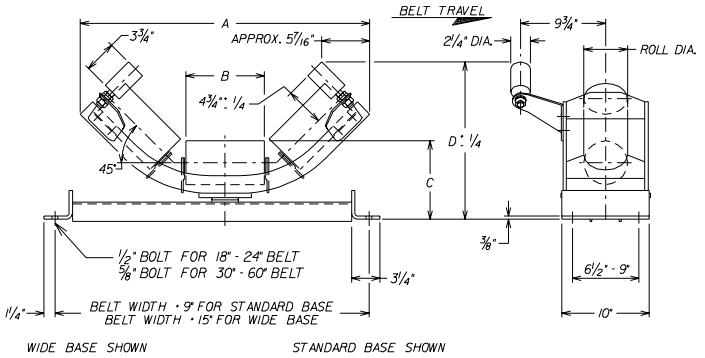


WIDE BASE SHOWN STANDARD BASE SHOWN

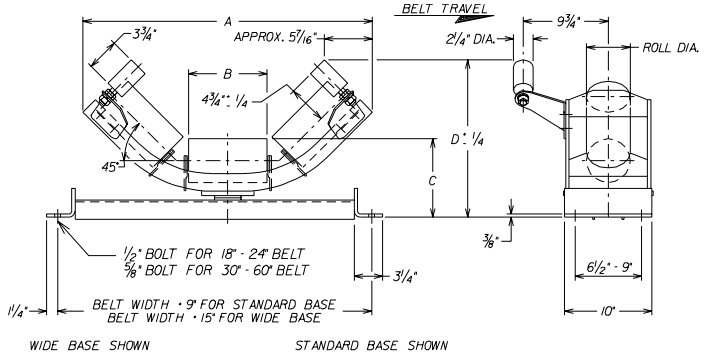
CSL36T353 35 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	93	95	28 7/16	6 7/8	9 1/2	15 5/8
24	104	112	33 3/4	9	9 1/2	16 13/16
30	120	123	39	11 1/16	9 7/8	18 3/8
36	135	138	44 5/16	13 1/8	9 7/8	19 9/16
42	147	153	49 9/16	15 1/4	9 7/8	20 3/4
48	161	166	55 1/16	17 5/16	10 1/4	22 3/8
54	180	184	60 9/16	19 3/8	10 1/4	23 5/8
60	193	196	66 1/16	21 1/2	10 1/4	24 7/8

CEMA C

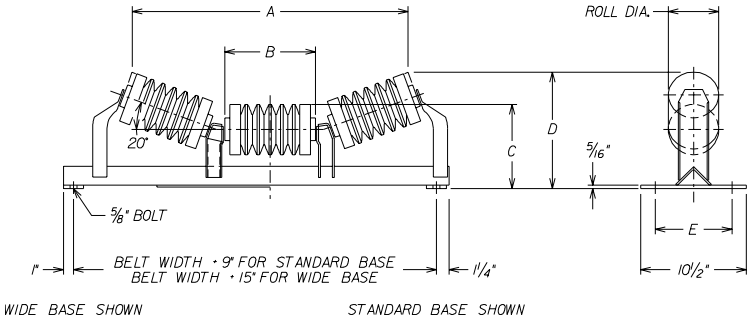
Roll Diameter 5” and 6”



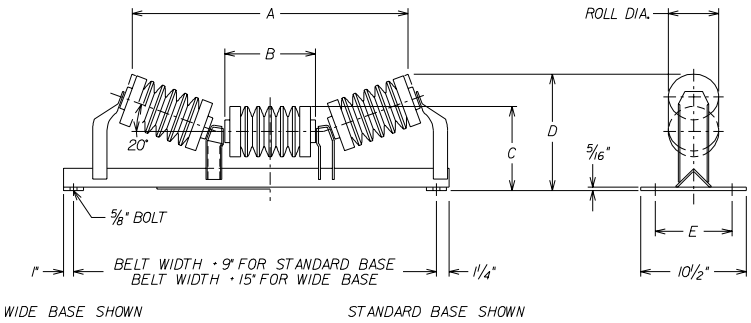
CSL35T453 45 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	86	89	27 1/2	6 7/8	9	16 9/16
24	96	104	33 3/16	9	9	18 1/16
30	110	113	38	11 1/16	9 3/8	19 7/8
36	125	128	42 13/16	13 1/8	9 3/8	21 5/16
42	135	141	47 5/8	15 1/4	9 3/8	22 13/16
48	148	153	52 7/16	17 5/16	9 3/4	24 11/16
54	166	169	57 11/16	19 3/8	9 3/4	26 1/4
60	177	181	62 5/8	21 1/2	9 3/4	27 3/4



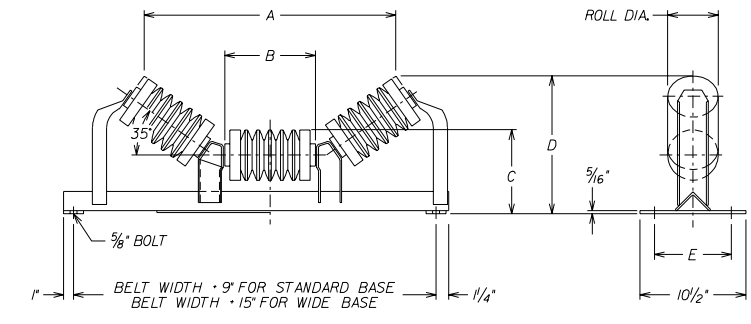
CSL36T453 45 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
18	93	96	27 1/2	6 7/8	9 1/2	16 9/16
24	104	113	33 3/16	9	9 1/2	18 1/16
30	121	124	38	11 1/16	9 7/8	19 7/8
36	136	139	42 13/16	13 1/8	9 7/8	21 5/16
42	148	153	47 5/8	15 1/4	9 7/8	22 13/16
48	162	167	52 7/16	17 5/16	10 1/4	24 11/16
54	181	185	57 11/16	19 3/8	10 1/4	26 1/4
60	194	197	62 5/8	21 1/2	10 1/4	27 3/4



CSL35A203 20 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	43	48	21 1/4	6 7/8	8 3/8	10 13/16	6 1/4 - 9
24	52	57	27 3/8	9	8 3/8	11 9/16	6 1/4 - 9
30	61	63	33 5/16	11 1/16	8 11/16	12 5/8	6 1/4 - 9
36	70	72	39 1/4	13 1/8	8 11/16	13 5/16	6 1/4 - 9
42	91	95	45 3/8	15 1/4	8 11/16	14 1/16	6 1/4 - 9
48	112	114	51 1/4	17 5/16	9 1/16	15 1/8	7 - 9
54	123	126	57 1/4	19 3/8	9 1/16	15 7/8	7 - 9
60	135	138	63 5/16	21 1/2	9 1/16	16 9/16	7 - 9



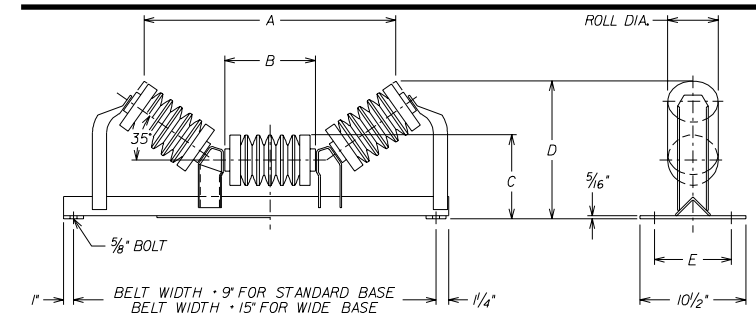
CSL36A203 20 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	47	52	20 7/8	6 7/8	8 7/8	11 1/4	6 1/4 - 9
24	58	63	27	9	8 7/8	12	6 1/4 - 9
30	68	70	32 15/16	11 1/16	9 3/16	13 1/16	6 1/4 - 9
36	79	81	38 7/8	13 1/8	9 3/16	13 13/16	6 1/4 - 9
42	102	106	45	15 1/4	9 3/16	14 1/2	6 1/4 - 9
48	124	126	50 15/16	17 5/16	9 9/16	15 5/8	7 - 9
54	136	139	56 7/8	19 3/8	9 9/16	16 5/16	7 - 9
60	150	153	63	21 1/2	9 9/16	17 1/16	7 - 9



CSL35A353 35 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	45	50	19 3/8	6 7/8	8 3/8	12 1/2	6 1/4 - 9
24	54	59	25	9	8 3/8	13 11/16	6 1/4 - 9
30	63	65	30 7/16	11 1/16	8 11/16	15 1/4	6 1/4 - 9
36	72	74	35 13/16	13 1/8	8 11/16	16 7/16	6 1/4 - 9
42	90	93	41 1/2	15 1/4	8 11/16	17 5/8	6 1/4 - 9
48	113	116	46 15/16	17 5/16	9 1/16	19 3/16	7 - 9
54	122	126	52 5/16	19 3/8	9 1/16	20 3/8	7 - 9
60	135	138	57 15/16	21 1/2	9 1/16	21 5/8	7 - 9

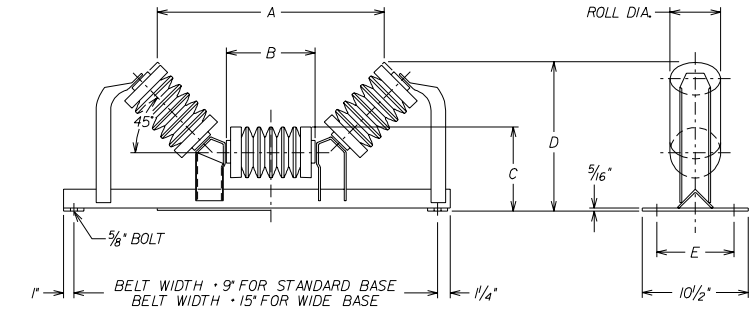
CEMA C

Roll Diameter 5” and 6”



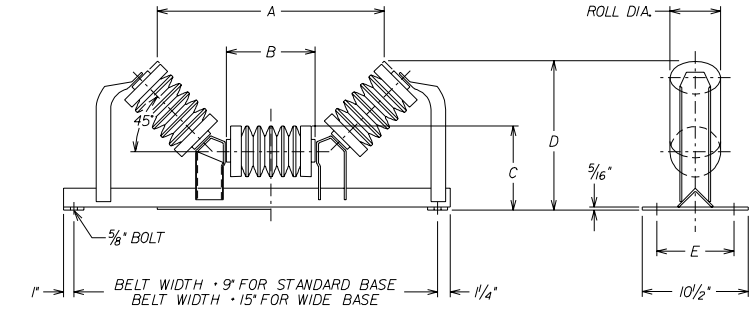
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36A353 35 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	49	50	18 3/4	6 7/8	8 7/8	12 7/8	6 1/4 - 9
24	59	65	24 3/8	9	8 7/8	14 1/8	6 1/4 - 9
30	70	72	29 13/16	11 1/16	9 3/16	15 5/8	6 1/4 - 9
36	81	83	35 1/4	13 1/8	9 3/16	16 11/16	6 1/4 - 9
42	112	120	40 7/8	15 1/4	9 3/16	18 1/16	6 1/4 - 9
48	136	140	46 5/16	17 5/16	9 9/16	19 5/8	7 - 9
54	148	151	51 3/4	19 3/8	9 9/16	20 13/16	7 - 9
60	164	166	57 3/8	21 1/2	9 9/16	22	7 - 9



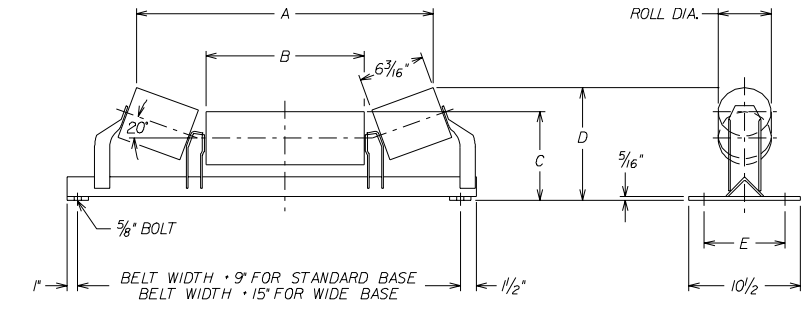
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL35A453 45 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	49	55	17 11/16	6 7/8	8 3/8	13 7/16	6 1/4 - 9
24	58	63	22 13/16	9	8 3/8	14 15/16	6 1/4 - 9
30	70	71	27 3/4	11 1/16	8 11/16	16 3/4	6 1/4 - 9
36	79	81	32 3/4	13 1/8	8 11/16	18 3/16	6 1/4 - 9
42	112	120	37 7/8	15 1/4	8 11/16	19 11/16	6 1/4 - 9
48	136	140	42 7/8	17 5/16	9 1/16	21 9/16	7 - 9
54	148	151	47 13/16	19 3/8	9 1/16	23 1/16	7 - 9
60	164	166	53	21 1/2	9 1/16	24 1/2	7 - 9



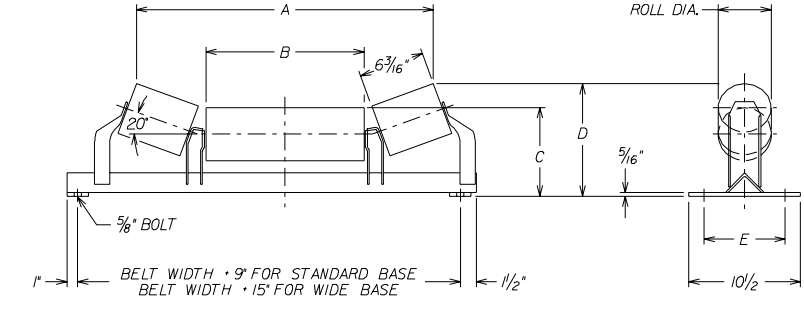
WIDE BASE SHOWN STANDARD BASE SHOWN

CSL36A453 45 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
18	53	58	17 1/16	6 7/8	8 7/8	13 11/16	6 1/4 - 9
24	64	69	22 3/16	9	8 7/8	15 5/16	6 1/4 - 9
30	77	77	27 3/16	11 1/16	9 3/16	17 1/8	6 1/4 - 9
36	88	90	32 1/8	13 1/8	9 3/16	18 9/16	6 1/4 - 9
42	112	120	37 1/4	15 1/4	9 3/16	20 1/16	6 1/4 - 9
48	136	140	42 1/2	17 5/16	9 9/16	21 15/16	7 - 9
54	148	151	47 1/4	19 3/8	9 9/16	23 3/8	7 - 9
60	164	166	52 3/8	21 1/2	9 9/16	24 7/8	7 - 9



WIDE BASE SHOWN STANDARD BASE SHOWN

CSL125203 20 DEG 5 INCH PICKING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	50	55	27 15/16	14 7/8	8 3/8	10 5/8	6 1/4 - 9
30	58	60	33 15/16	20 7/8	8 11/16	10 15/16	6 1/4 - 9
36	64	66	39 15/16	26 7/8	8 11/16	10 15/16	6 1/4 - 9
42	76	78	45 15/16	32 7/8	8 11/16	10 15/16	6 1/4 - 9
48	85	89	51 15/16	38 7/8	9 1/16	11 5/16	7 - 9
54	94	97	57 15/16	44 7/8	9 1/16	11 5/16	7 - 9
60	106	109	63 15/16	50 7/8	9 1/16	11 5/16	7 - 9

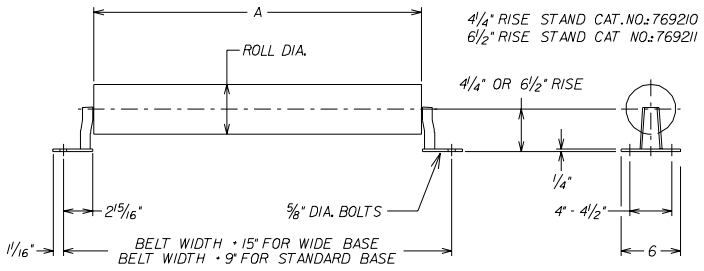


WIDE BASE SHOWN STANDARD BASE SHOWN

CSL126203 20 DEG 6 INCH PICKING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	58	63	27 5/8	14 7/8	8 7/8	11 1/8	6 1/4 - 9
30	69	70	33 5/8	20 7/8	9 3/16	11 7/16	6 1/4 - 9
36	75	77	39 5/8	26 7/8	9 3/16	11 7/16	6 1/4 - 9
42	88	90	45 5/8	32 7/8	9 3/16	11 7/16	6 1/4 - 9
48	98	103	51 5/8	38 7/8	9 9/16	11 13/16	7 - 9
54	109	112	57 5/8	44 7/8	9 9/16	11 13/16	7 - 9
60	113	116	63 5/8	50 7/8	9 9/16	11 13/16	7 - 9

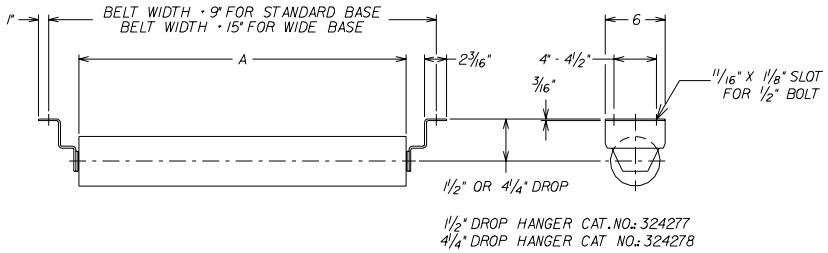
CEMA C

Roll Diameter 5” and 6”



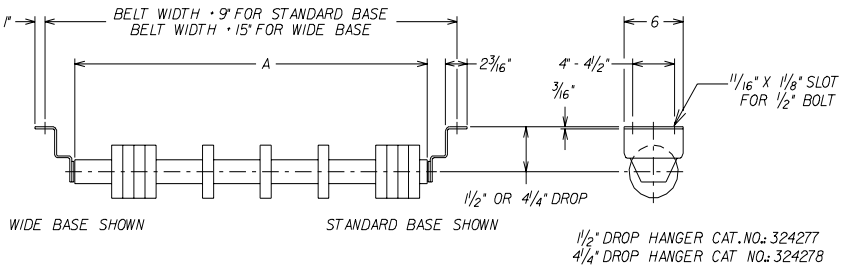
For 54” and 60” belt width use CEMA D roll.

CSL153 5 INCH FLAT CARRYING			CSL163 6 INCH FLAT CARRYING		
Belt Width	Std. Base Wt.	A	Belt Width	Std. Base Wt.	A
18	23	20 7/8	18	29	20 7/8
24	28	26 7/8	24	34	26 7/8
30	32	32 7/8	30	40	32 7/8
36	36	38 7/8	36	45	38 7/8
42	40	44 7/8	42	51	44 7/8
48	45	50 7/8	48	57	50 7/8

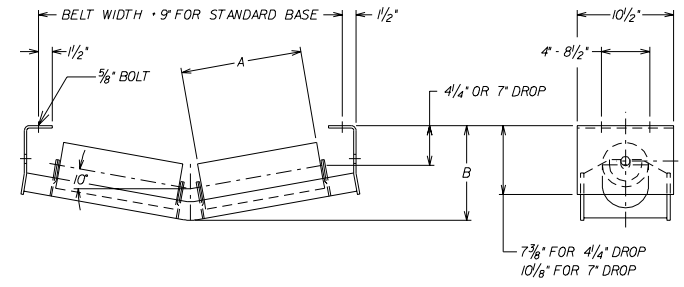


For 54” and 60” belt width use CEMA D roll.

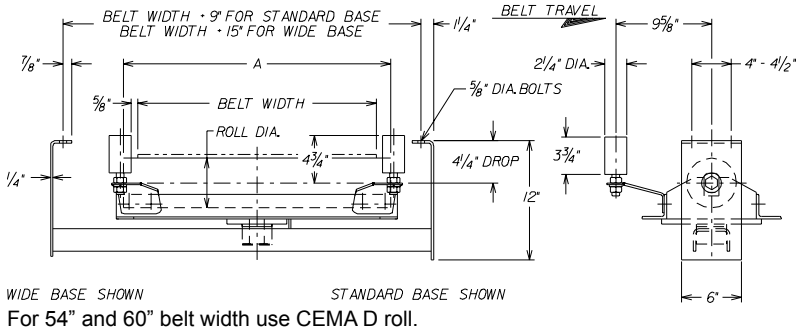
CSL153 5 INCH FLAT RETURN			CSL163 6 INCH FLAT RETURN		
Belt Width	Std. Base Wt.	A	Belt Width	Std. Base Wt.	A
18	23	20 7/8	18	29	20 7/8
24	28	26 7/8	24	34	26 7/8
30	32	32 7/8	30	40	32 7/8
36	36	38 7/8	36	45	38 7/8
42	40	44 7/8	42	51	44 7/8
48	45	50 7/8	48	57	50 7/8



CSL153DM 5 INCH RUBBER DISC RETURN (MASSED ENDS)					CSL163DM 6 INCH RUBBER DISC RETURN (MASSED ENDS)				
Belt Width	Std. Base		Wide Base		Belt Width	Std. Base		Wide Base	
	A	Wt.	A	Wt.		A	Wt.	A	Wt.
24	26 7/8	26	32 7/8	32	24	26 7/8	30	32 7/8	38
30	32 7/8	30	38 7/8	36	30	32 7/8	34	38 7/8	42
36	38 7/8	33	44 7/8	40	36	38 7/8	38	44 7/8	46
42	44 7/8	37	50 7/8	43	42	44 7/8	42	50 7/8	50
48	50 7/8	40	56 7/8	46	48	50 7/8	46	56 7/8	53
54	56 7/8	44	62 7/8	50	54	56 7/8	50	62 7/8	57
60	62 7/8	47	68 7/8	53	60	62 7/8	54	68 7/8	61
66	68 7/8	51	74 7/8	57	66	68 7/8	58	74 7/8	66
72	74 7/8	55	80 7/8	61	72	74 7/8	62	80 7/8	70



CSL25103 5 INCH V-RETURN					CSL26103 6 INCH V-RETURN				
Belt Width	Std. Base Wt.	A	4 1/4" Drop B	7" Drop B	Belt Width	Std. Base Wt.	A	4 1/4" Drop B	7" Drop B
24	63	13 1/8	10 1/4	13	24	69	13 1/8	10 1/4	13
30	71	17 5/16	10 3/4	13 1/2	30	79	17 5/16	10 3/4	13 1/2
36	76	19 3/8	11 5/16	14 1/16	36	84	19 3/8	11 5/16	14 1/16
42	83	22 7/8	11 13/16	14 9/16	42	93	22 7/8	11 13/16	14 9/16
48	87	25 5/8	12 5/16	15 1/16	48	100	25 5/8	12 5/16	15 1/16
54	101	29 1/4	12 7/8	15 5/8	54	115	29 1/4	12 7/8	15 5/8
60	107	32 1/4	13 3/8	16 1/8	60	123	32 1/4	13 3/8	16 1/8

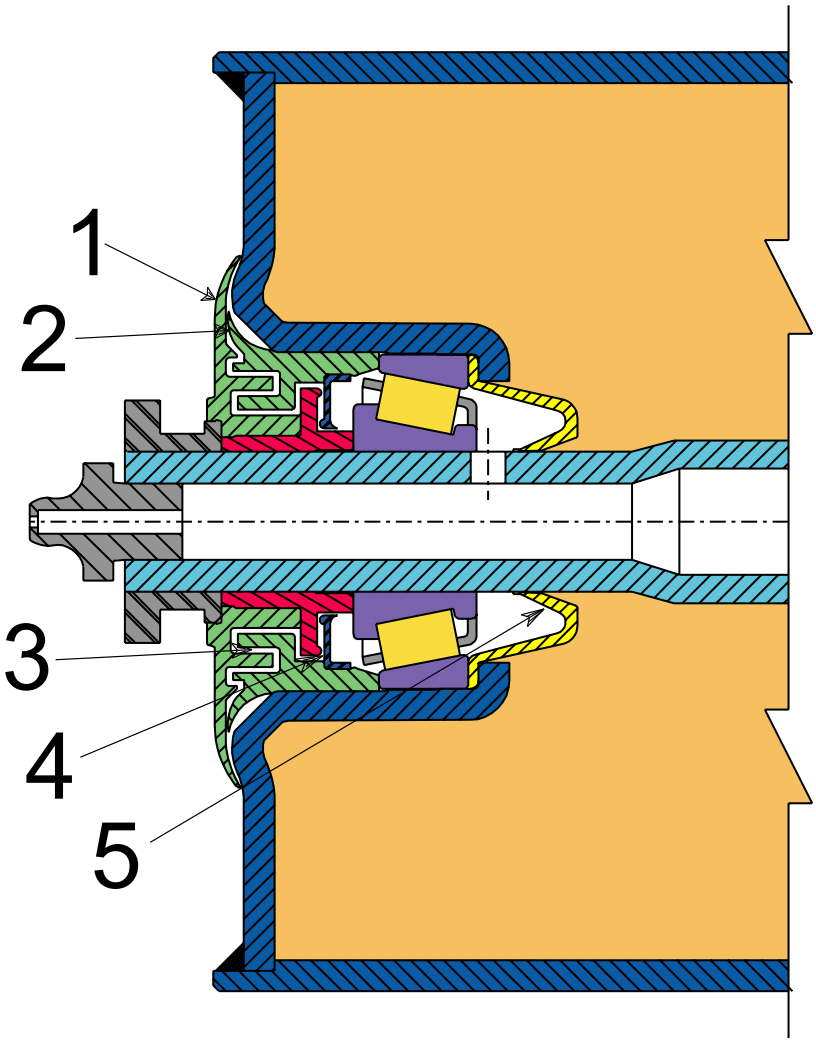


For 54” and 60” belt width use CEMA D roll.

CSL153T 5 INCH RETURN TRAINING				CSL163T 6 INCH RETURN TRAINING			
Belt Width	A	Std. Base Wt.	Wide Base Wt.	Belt Width	A	Std. Base Wt.	Wide Base Wt.
18	20 7/8	95	98	18	20 7/8	100	104
24	26 7/8	106	109	24	26 7/8	113	116
30	32 7/8	118	121	30	32 7/8	126	129
36	38 7/8	129	132	36	38 7/8	139	142
42	44 7/8	141	144	42	44 7/8	151	154
48	50 7/8	159	162	48	50 7/8	171	174

Jeffrey Permaseal III™ Roll Design Features

- 3/4” Tapered Roller Bearing
- 1 1/4” Shaft Reduced to 3/4” at Bearing
- Sealed or Regreaseable, Non-Purging Seal
- Counter Bored Roll Shell, Protected Weld

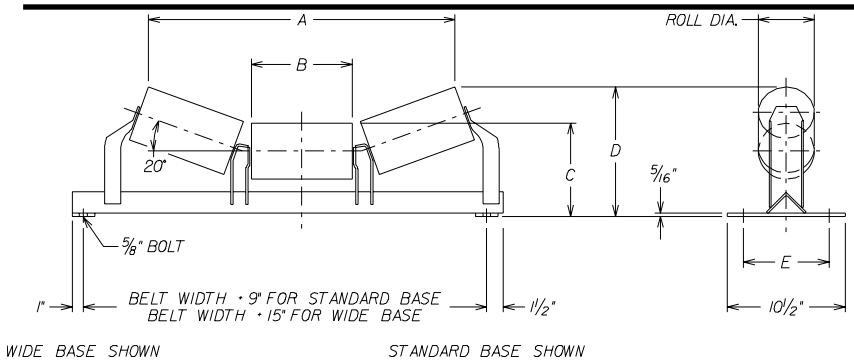


1. Exterior Shield
2. Flinger
3. Grease Filled, Multiple Path Labyrinth Seal
4. Contact Lip Seal
5. Rear Seal

Note : DSL rolls have shaft end plugs instead of grease fittings as shown. Rolls 13” or shorter have 3/4” shafts.

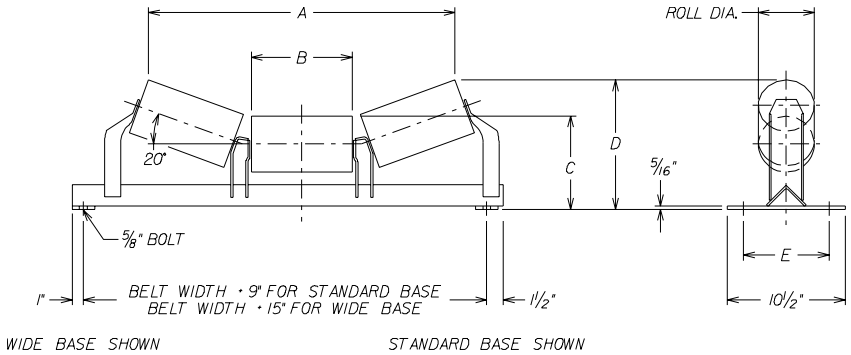
CEMA D

Roll Diameter 5” and 6”



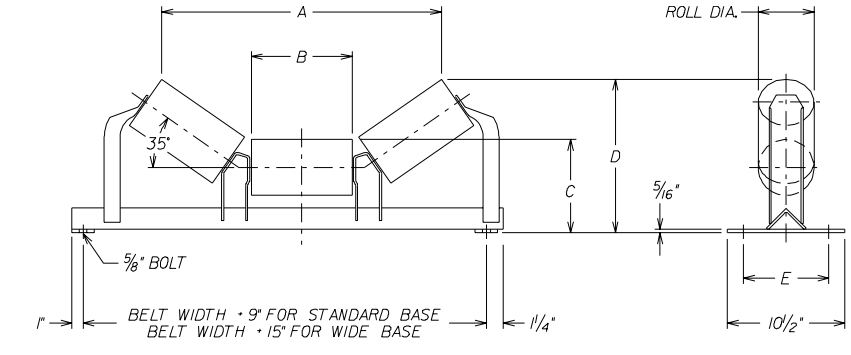
WIDE BASE SHOWN STANDARD BASE SHOWN

D35203 20 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	53	59	27 3/8	9	8 3/8	11 9/16	6 1/4 - 9
30	60	67	33 5/16	11 1/16	8 11/16	12 5/8	6 1/4 - 9
36	72	80	39 1/4	13 1/8	8 11/16	13 5/16	6 1/4 - 9
42	85	87	45 3/8	15 1/4	8 11/16	14 1/16	6 1/4 - 9
48	93	96	51 1/4	17 5/16	9 1/16	15 1/8	7 - 9
54	109	112	57 1/4	19 3/8	9 1/16	15 7/8	7 - 9
60	118	121	63 5/16	21 1/2	9 1/16	16 9/16	7 - 9
66	127	130	69 1/4	23 9/16	9 7/16	17 5/8	7 1/2 - 9
72	136	139	75 1/4	25 5/8	9 7/16	18 5/16	7 1/2 - 9



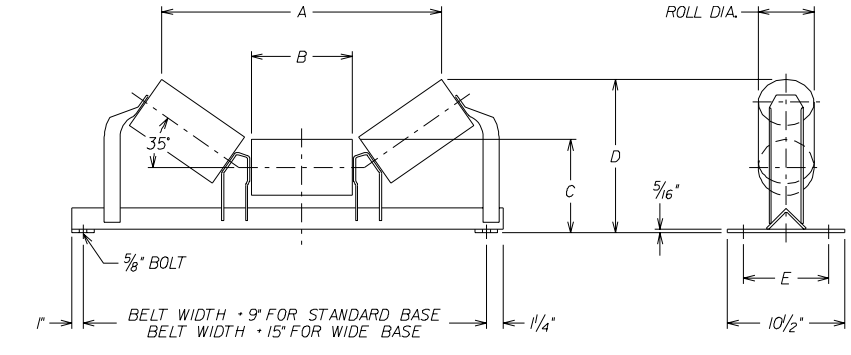
WIDE BASE SHOWN STANDARD BASE SHOWN

D36203 20 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	61	66	27	9	8 7/8	12	6 1/4 - 9
30	70	76	32 15/16	11 1/16	9 3/16	13 1/16	6 1/4 - 9
36	83	90	38 7/8	13 1/8	9 3/16	13 13/16	6 1/4 - 9
42	97	100	45	15 1/4	9 3/16	14 1/2	6 1/4 - 9
48	107	110	50 15/16	17 5/16	9 9/16	15 5/8	7 - 9
54	124	127	56 7/8	19 3/8	9 9/16	16 5/16	7 - 9
60	135	138	63	21 1/2	9 9/16	17 1/16	7 - 9
66	145	148	68 15/16	23 9/16	9 15/16	18 1/8	7 1/2 - 9
72	155	158	74 7/8	25 5/8	9 15/16	18 13/16	7 1/2 - 9



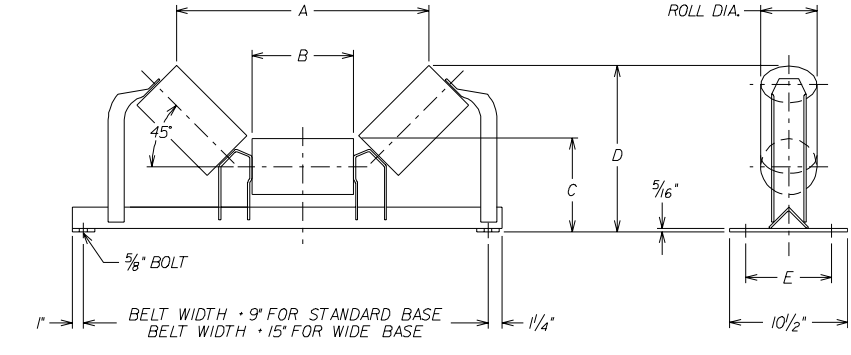
WIDE BASE SHOWN STANDARD BASE SHOWN

D35353 35 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	54	60	25	9	8 3/8	13 11/16	6 1/4 - 9
30	62	69	30 7/16	11 1/16	8 11/16	15 1/4	6 1/4 - 9
36	75	82	35 13/16	13 1/8	8 11/16	16 7/16	6 1/4 - 9
42	87	90	41 1/2	15 1/4	8 11/16	17 5/8	6 1/4 - 9
48	96	99	46 15/16	17 5/16	9 1/16	19 3/16	7 - 9
54	114	117	52 5/16	19 3/8	9 1/16	20 3/8	7 - 9
60	124	127	57 15/16	21 1/2	9 1/16	21 5/8	7 - 9
66	134	137	63 3/8	23 9/16	9 7/16	23 1/8	7 1/2 - 9
72	144	158	68 13/16	25 5/8	9 7/16	24 5/16	7 1/2 - 9



WIDE BASE SHOWN STANDARD BASE SHOWN

D36353 35 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	62	68	24 3/8	9	8 7/8	14 1/8	6 1/4 - 9
30	72	78	29 13/16	11 1/16	9 3/16	15 5/8	6 1/4 - 9
36	85	93	35 1/4	13 1/8	9 3/16	16 11/16	6 1/4 - 9
42	100	102	40 7/8	15 1/4	9 3/16	18 1/16	6 1/4 - 9
48	110	112	46 5/16	17 5/16	9 9/16	19 5/8	7 - 9
54	129	133	51 3/4	19 3/8	9 9/16	20 13/16	7 - 9
60	141	144	57 3/8	21 1/2	9 9/16	22	7 - 9
66	152	155	62 13/16	23 9/16	9 15/16	23 9/16	7 1/2 - 9
72	163	166	68 1/4	25 5/8	9 15/16	24 3/4	7 1/2 - 9



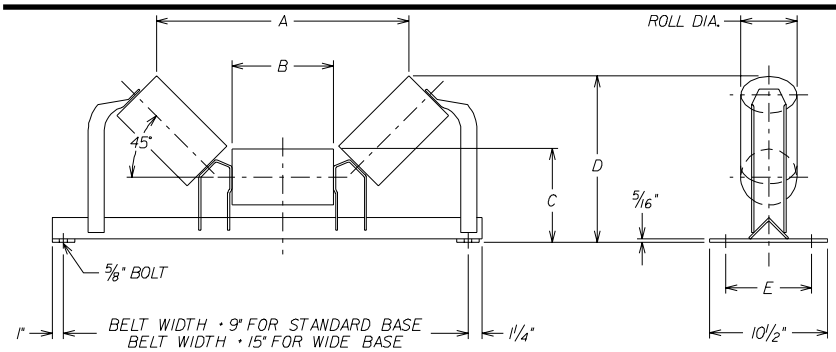
WIDE BASE SHOWN STANDARD BASE SHOWN

D35453 45 DEG 5 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	59	65	22 13/16	9	8 3/8	14 15/16	6 1/4 - 9
30	68	74	27 3/4	11 1/16	8 11/16	16 3/4	6 1/4 - 9
36	81	89	32 3/4	13 1/8	8 11/16	18 3/16	6 1/4 - 9
42	95	97	37 7/8	15 1/4	8 11/16	19 11/16	6 1/4 - 9
48	105	107	42 7/8	17 5/16	9 1/16	21 9/16	7 - 9
54	119	122	47 13/16	19 3/8	9 1/16	23 1/16	7 - 9
60	130	133	53	21 1/2	9 1/16	24 1/2	7 - 9
66	140	144	57 15/16	23 9/16	9 7/16	26 5/16	7 1/2 - 9
72	151	155	62 15/16	25 5/8	9 7/16	27 13/16	7 1/2 - 9

Note: Substitute DSL for D when ordering CEMA D sealed for life idlers.

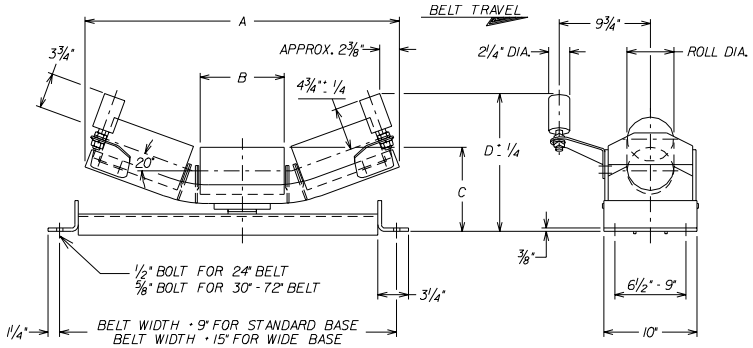
CEMA D

Roll Diameter 5” and 6”



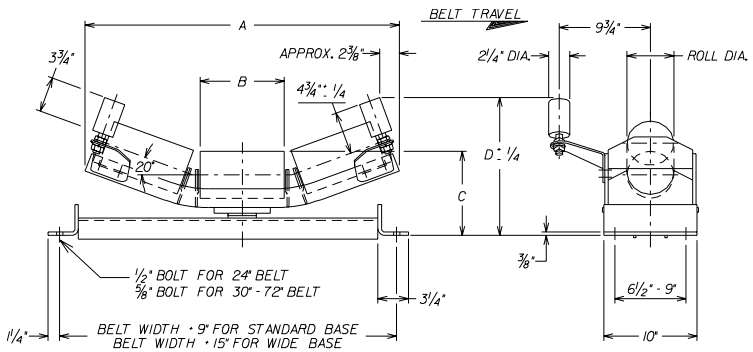
D36453 45 DEG 6 INCH TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	67	73	22 3/16	9	8 7/8	15 5/16	6 1/4 - 9
30	77	84	27 3/16	11 1/16	9 3/16	17 1/8	6 1/4 - 9
36	92	99	32 1/8	13 1/8	9 3/16	18 9/16	6 1/4 - 9
42	107	110	37 1/4	15 1/4	9 3/16	20 1/16	6 1/4 - 9
48	118	121	42 1/4	17 5/16	9 9/16	21 15/16	7 - 9
54	134	137	47 1/4	19 3/8	9 9/16	23 3/8	7 - 9
60	146	149	52 3/8	21 1/2	9 9/16	24 7/8	7 - 9
66	158	161	57 5/16	23 9/16	9 15/16	26 11/16	7 1/2 - 9
72	170	173	62 5/16	25 5/8	9 15/16	28 1/8	7 1/2 - 9

WIDE BASE SHOWN STANDARD BASE SHOWN



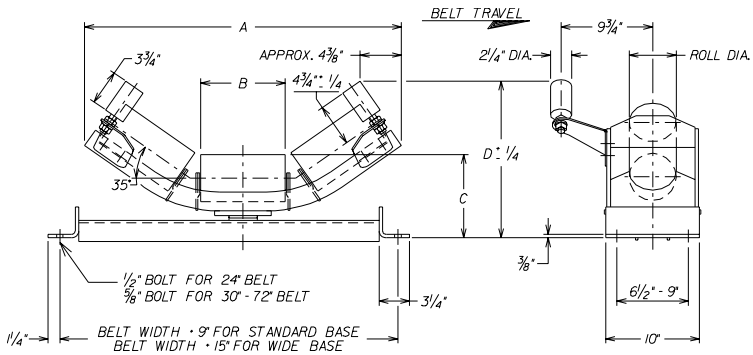
D35T203 20 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	96	99	33 5/8	9	9	14 5/8
30	106	114	39 3/8	11 1/16	9 3/8	15 3/4
36	121	124	45 1/8	13 1/8	9 3/8	16 7/16
42	136	141	50 7/8	15 1/4	9 3/8	17 3/16
48	149	152	56 5/8	17 5/16	9 3/4	18 1/4
54	160	165	62 7/8	19 3/8	9 3/4	19 1/8
60	179	186	68 5/8	21 1/2	9 3/4	19 7/8
66	195	198	74 1/4	23 9/16	10 1/8	20 15/16
72	207	210	80	25 5/8	10 1/8	21 5/8

WIDE BASE SHOWN STANDARD BASE SHOWN



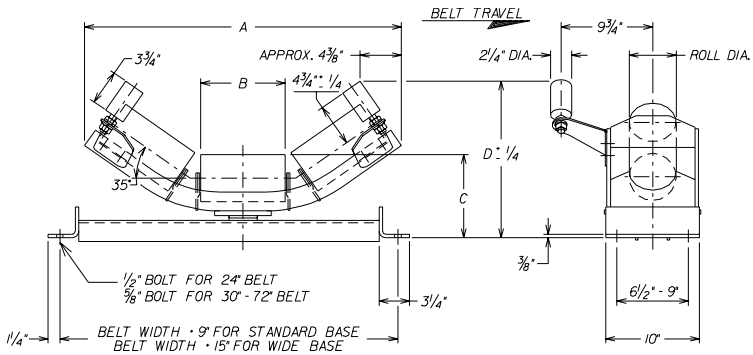
D36T203 20 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	104	107	33 5/8	9	9 1/2	14 5/8
30	116	123	39 3/8	11 1/16	9 7/8	15 3/4
36	131	134	45 1/8	13 1/8	9 7/8	16 7/16
42	148	154	50 7/8	15 1/4	9 7/8	17 3/16
48	163	166	56 5/8	17 5/16	10 1/4	18 1/4
54	175	180	62 7/8	19 3/8	10 1/4	19 1/8
60	196	203	68 5/8	21 1/2	10 1/4	19 7/8
66	212	216	74 1/4	23 9/16	10 5/8	20 15/16
72	225	229	80	25 5/8	10 5/8	21 5/8

WIDE BASE SHOWN STANDARD BASE SHOWN



D35T353 35 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	98	101	33 3/4	9	9	16 13/16
30	108	115	39	11 1/16	9 3/8	18 3/8
36	122	125	44 5/16	13 1/8	9 3/8	19 9/16
42	137	143	49 9/16	15 1/4	9 3/8	20 3/4
48	150	154	55 1/16	17 5/16	9 3/4	22 3/8
54	161	166	60 9/16	19 3/8	9 3/4	23 5/8
60	181	188	66 1/16	21 1/2	9 3/4	24 7/8
66	196	200	71 5/16	23 9/16	10 1/8	26 7/16
72	208	212	76 5/8	25 5/8	10 1/8	27 5/8

WIDE BASE SHOWN STANDARD BASE SHOWN



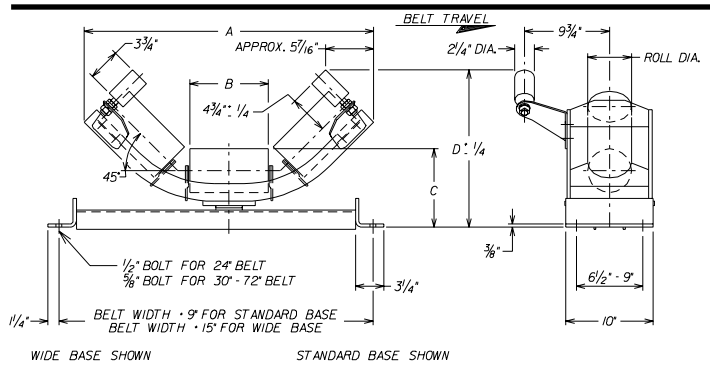
D36T353 35 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	105	108	33 3/4	9	9 1/2	16 13/16
30	117	124	39	11 1/16	9 7/8	18 3/8
36	132	135	44 5/16	13 1/8	9 7/8	19 9/16
42	150	155	49 9/16	15 1/4	9 7/8	20 3/4
48	164	168	55 1/16	17 5/16	10 1/4	22 3/8
54	177	181	60 9/16	19 3/8	10 1/4	23 5/8
60	197	205	66 1/16	21 1/2	10 1/4	24 7/8
66	214	217	71 5/16	23 9/16	10 5/8	26 7/16
72	227	231	76 5/8	25 5/8	10 5/8	27 5/8

WIDE BASE SHOWN STANDARD BASE SHOWN

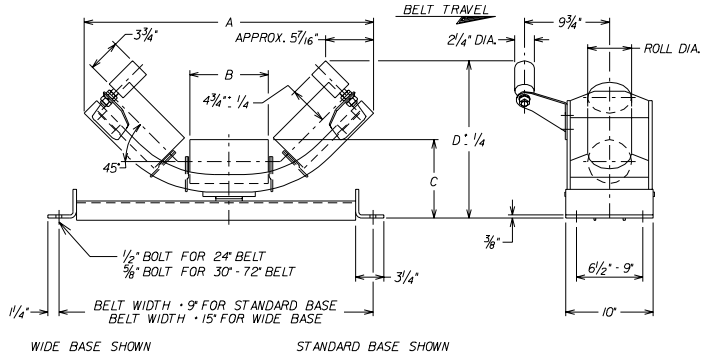
Note: Substitute DSL for D when ordering CEMA D sealed for life idlers.

CEMA D

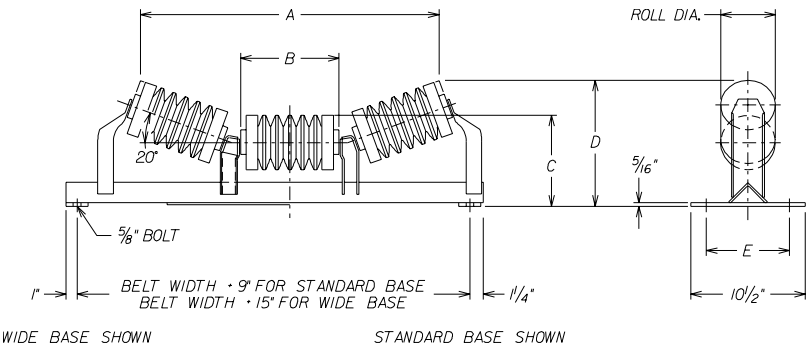
Roll Diameter 5” and 6”



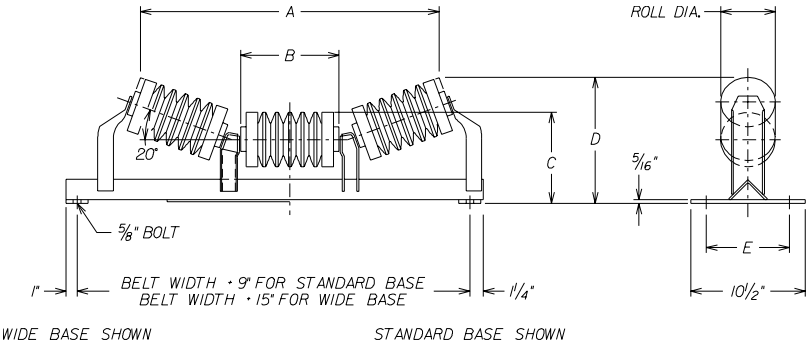
D35T453 45 DEG 5 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	98	101	33 3/16	9	9	18 1/16
30	108	115	38	11 1/16	9 3/8	19 7/8
36	123	126	42 13/16	13 1/8	9 3/8	21 5/16
42	138	144	47 5/8	15 1/4	9 3/8	22 13/16
48	151	155	52 7/16	17 5/16	9 3/4	24 11/16
54	162	167	57 11/16	19 3/8	9 3/4	26 1/4
60	182	189	62 5/8	21 1/2	9 3/4	27 3/4
66	197	201	67 5/8	23 9/16	10 1/8	29 9/16
72	209	213	72 3/8	25 5/8	10 1/8	31



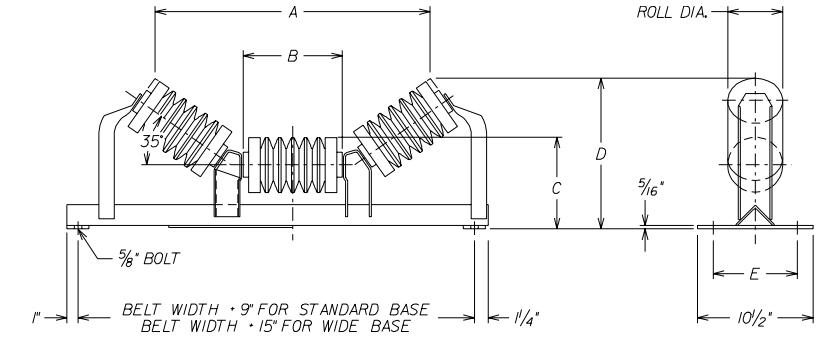
D36T453 45 DEG 6 INCH TROUGHING/TRAINING						
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D
24	106	109	33 3/16	9	9 1/2	18 1/16
30	118	125	38	11 1/16	9 7/8	19 7/8
36	133	136	42 13/16	13 1/8	9 7/8	21 5/16
42	151	156	47 5/8	15 1/4	9 7/8	22 13/16
48	165	169	52 7/16	17 5/16	10 1/4	24 11/16
54	178	182	57 11/16	19 3/8	10 1/4	26 1/4
60	196	206	62 5/8	21 1/2	10 1/4	27 3/4
66	215	218	67 5/8	23 9/16	10 5/8	29 9/16
72	228	232	72 3/8	25 5/8	10 5/8	31



D35A203 20 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	57	61	27 3/8	9	8 3/8	11 9/16	6 1/4 - 9
30	64	67	33 5/16	11 1/16	8 11/16	12 5/8	6 1/4 - 9
36	73	95	39 1/4	13 1/8	8 11/16	13 5/16	6 1/4 - 9
42	102	105	45 3/8	15 1/4	8 11/16	14 1/16	6 1/4 - 9
48	114	117	51 1/4	17 5/16	9 1/16	15 1/8	7 - 9
54	123	126	57 1/4	19 3/8	9 1/16	15 7/8	7 - 9
60	141	144	63 5/16	21 1/2	9 1/16	16 9/16	7 - 9
66	148	150	69 1/4	23 9/16	9 7/16	17 5/8	7 1/2 - 9
72	154	158	75 1/4	25 5/8	9 7/16	18 5/16	7 1/2 - 9



D36A203 20 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	60	66	27	9	8 7/8	12	6 1/4 - 9
30	68	74	32 15/16	11 1/16	8 7/8	13 1/16	6 1/4 - 9
36	84	91	38 7/8	13 1/8	8 7/8	13 13/16	6 1/4 - 9
42	100	102	45	15 1/4	9 3/16	14 1/2	6 1/4 - 9
48	112	114	50 15/16	17 5/16	9 3/16	15 5/8	7 - 9
54	128	131	56 7/8	19 3/8	9 3/16	16 5/16	7 - 9
60	141	144	63	21 1/2	9 9/16	17 1/16	7 - 9
66	154	157	68 15/16	23 9/16	9 15/16	18 1/8	7 1/2 - 9
72	163	166	74 7/8	25 5/8	9 15/16	18 13/16	7 1/2 - 9

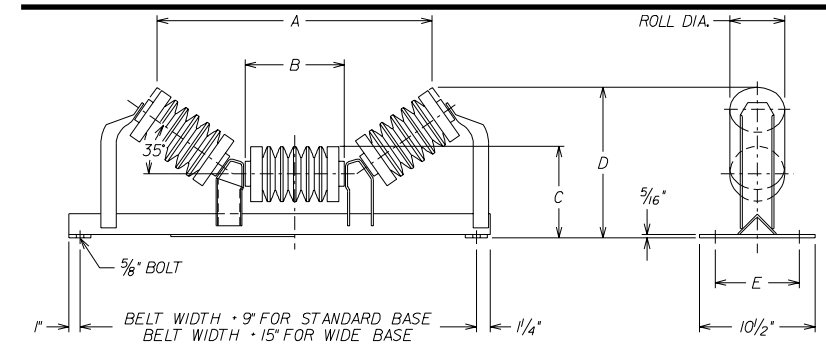


D35A353 35 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	58	62	25	9	8 3/8	13 11/16	6 1/4 - 9
30	66	69	30 7/16	11 1/16	8 11/16	15 1/4	6 1/4 - 9
36	75	97	35 13/16	13 1/8	8 11/16	16 7/16	6 1/4 - 9
42	105	108	41 1/2	15 1/4	8 11/16	17 5/8	6 1/4 - 9
48	117	120	46 15/16	17 5/16	9 1/16	19 3/16	7 - 9
54	129	132	52 5/16	19 3/8	9 1/16	20 3/8	7 - 9
60	147	150	57 15/16	21 1/2	9 1/16	21 5/8	7 - 9
66	155	157	63 3/8	23 9/16	9 7/16	23 1/8	7 1/2 - 9
72	162	165	68 13/16	25 5/8	9 7/16	24 5/16	7 1/2 - 9

Note: Substitute DSL for D when ordering CEMA D sealed for life idlers.

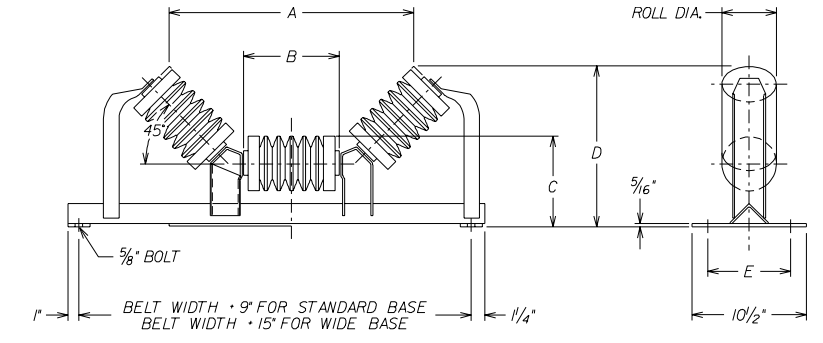
CEMA D

Roll Diameter 5” and 6”



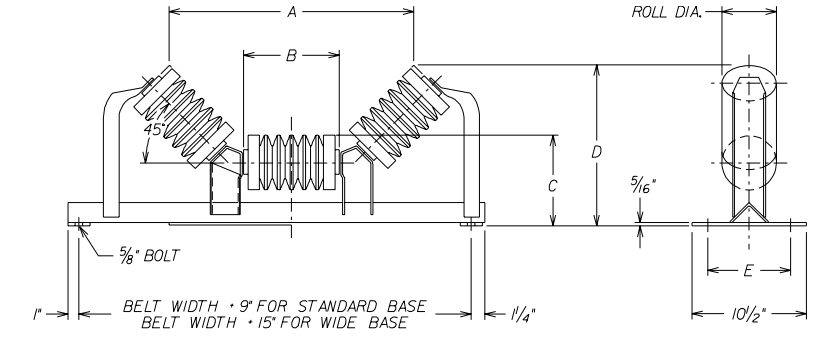
WIDE BASE SHOWN STANDARD BASE SHOWN

D36A353 35 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	61	67	24 3/8	9	8 7/8	14 1/8	6 1/4 - 9
30	70	76	29 13/16	11 1/16	9 3/16	15 5/8	6 1/4 - 9
36	86	94	35 1/4	13 1/8	9 3/16	16 11/16	6 1/4 - 9
42	102	105	40 7/8	15 1/4	9 3/16	18 1/16	6 1/4 - 9
48	115	117	46 5/16	17 5/16	9 9/16	19 5/8	7 - 9
54	133	137	51 3/4	19 3/8	9 9/16	20 13/16	7 - 9
60	147	150	57 3/8	21 1/2	9 9/16	22	7 - 9
66	161	164	62 13/16	23 9/16	9 15/16	23 9/16	7 1/2 - 9
72	171	174	68 1/4	25 5/8	9 15/16	24 3/4	7 1/2 - 9



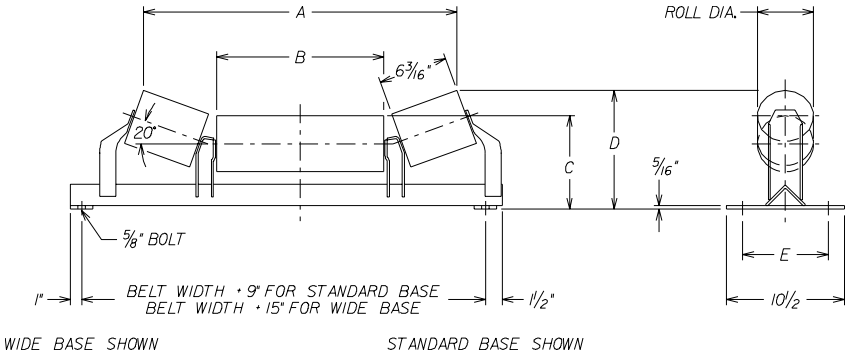
WIDE BASE SHOWN STANDARD BASE SHOWN

D35A453 45 DEG 5 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	59	63	22 13/16	9	8 3/8	14 15/16	6 1/4 - 9
30	68	71	27 3/4	11 1/16	8 11/16	16 3/4	6 1/4 - 9
36	77	99	32 3/4	13 1/8	8 11/16	18 3/16	6 1/4 - 9
42	108	111	37 7/8	15 1/4	8 11/16	19 11/16	6 1/4 - 9
48	120	123	42 7/8	17 5/16	9 1/16	21 9/16	7 - 9
54	135	138	47 13/16	19 3/8	9 1/16	23 1/16	7 - 9
60	153	156	53	21 1/2	9 1/16	24 1/2	7 - 9
66	162	164	57 15/16	23 9/16	9 7/16	26 5/16	7 1/2 - 9
72	170	172	62 15/16	25 5/8	9 7/16	27 13/16	7 1/2 - 9



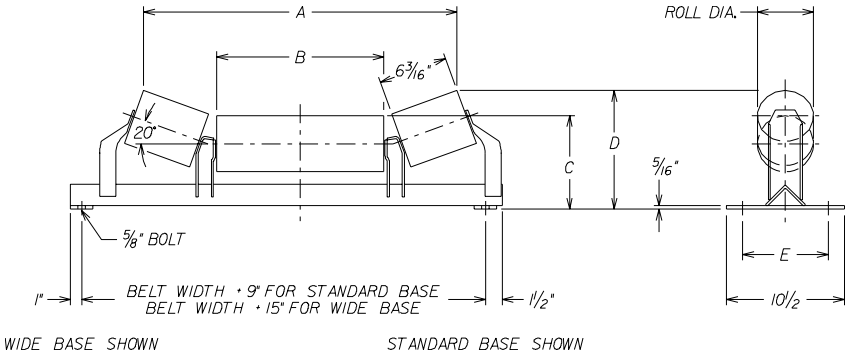
WIDE BASE SHOWN STANDARD BASE SHOWN

D36A453 45 DEG 6 INCH IMPACT / TROUGHING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	66	72	22 3/16	9	8 7/8	15 5/16	6 1/4 - 9
30	76	82	27 3/16	11 1/16	9 3/16	17 1/8	6 1/4 - 9
36	93	100	32 1/8	13 1/8	9 3/16	18 9/16	6 1/4 - 9
42	110	112	37 1/4	15 1/4	9 3/16	20 1/16	6 1/4 - 9
48	123	126	42 1/4	17 5/16	9 9/16	21 15/16	7 - 9
54	138	141	47 1/4	19 3/8	9 9/16	23 3/8	7 - 9
60	153	156	52 3/8	21 1/2	9 9/16	24 7/8	7 - 9
66	167	170	57 5/16	23 9/16	9 15/16	26 11/16	7 1/2 - 9
72	178	181	62 5/16	25 5/8	9 15/16	28 1/8	7 1/2 - 9



WIDE BASE SHOWN STANDARD BASE SHOWN

D125203 20 DEG 5 INCH PICKING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	52	61	27 15/16	14 7/8	8 11/16	10 15/16	6 1/4 - 9
30	63	70	33 15/16	20 7/8	8 3/4	11	6 1/4 - 9
36	74	76	39 15/16	26 7/8	9 1/16	11 5/16	6 1/4 - 9
42	82	83	45 15/16	32 7/8	9 1/16	11 5/16	6 1/4 - 9
48	93	94	51 15/16	38 7/8	9 7/16	11 11/16	7 - 9
54	102	105	57 15/16	44 7/8	9 7/16	11 11/16	7 - 9
60	110	113	63 15/16	50 7/8	9 7/16	11 11/16	7 - 9
66	118	132	69 15/16	56 7/8	9 7/16	11 11/16	7 1/2 - 9
72	126	141	75 15/16	62 7/8	9 7/16	11 11/16	7 1/2 - 9



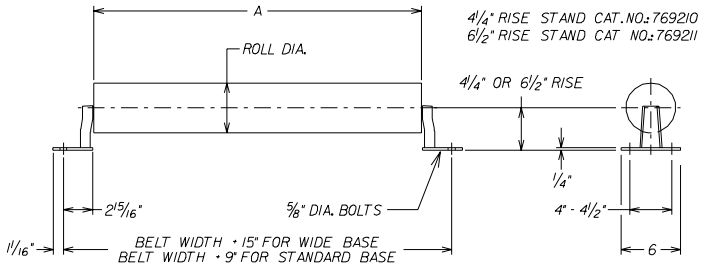
WIDE BASE SHOWN STANDARD BASE SHOWN

D126203 20 DEG 6 INCH PICKING							
Belt Width	Std. Base Wt.	Wide Base Wt.	A	B	C	D	E
24	60	69	27 5/8	14 7/8	9 3/16	11 7/16	6 1/4 - 9
30	73	80	33 5/8	20 7/8	9 1/4	11 1/2	6 1/4 - 9
36	85	86	39 5/8	26 7/8	9 9/16	11 13/16	6 1/4 - 9
42	94	96	45 5/8	32 7/8	9 9/16	11 13/16	6 1/4 - 9
48	107	108	51 5/8	38 7/8	9 15/16	12 3/16	7 - 9
54	117	120	57 5/8	44 7/8	9 15/16	12 3/16	7 - 9
60	127	130	63 5/8	50 7/8	9 15/16	12 3/16	7 - 9
66	136	150	69 5/8	56 7/8	9 15/16	12 3/16	7 1/2 - 9
72	145	160	75 5/8	62 7/8	9 15/16	12 3/16	7 1/2 - 9

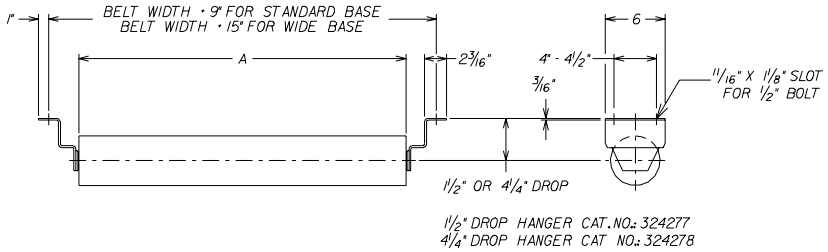
Note: Substitute DSL for D when ordering CEMA D sealed for life idlers.

CEMA D

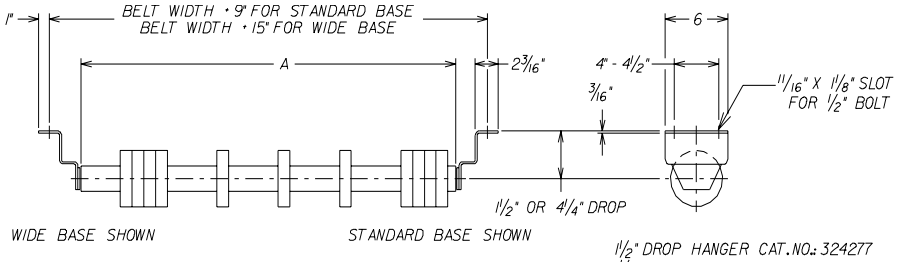
Roll Diameter 5” and 6”



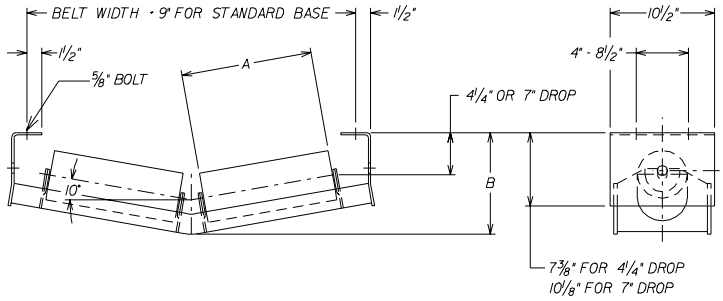
D153 5 INCH FLAT CARRYING			D163 6 INCH FLAT CARRYING		
Belt Width	Std. Base Wt.	A	Belt Width	Std. Base Wt.	A
24	30	26 7/8	24	36	26 7/8
30	34	32 7/8	30	43	32 7/8
36	39	38 7/8	36	49	38 7/8
42	44	44 7/8	42	55	44 7/8
48	49	50 7/8	48	61	50 7/8
54	54	56 7/8	54	67	56 7/8
60	59	62 7/8	60	73	62 7/8
66	63	68 7/8	66	79	68 7/8
72	68	74 7/8	72	85	74 7/8



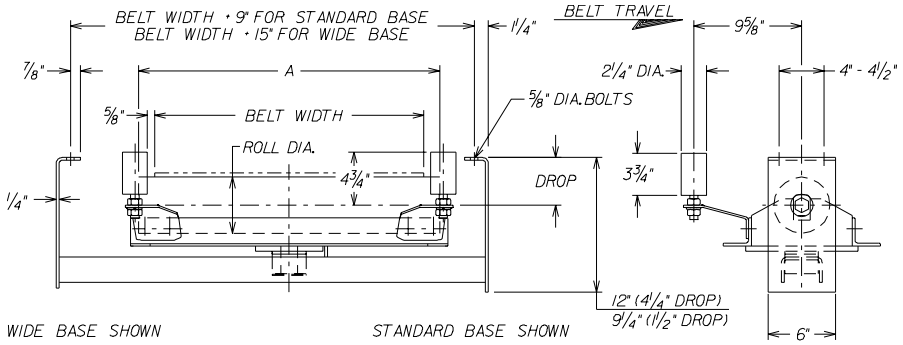
D153 5 INCH FLAT RETURN			D163 6 INCH FLAT RETURN		
Belt Width	Std. Base Wt.	A	Belt Width	Std. Base Wt.	A
24	29	26 7/8	24	35	26 7/8
30	34	32 7/8	30	42	32 7/8
36	39	38 7/8	36	48	38 7/8
42	44	44 7/8	42	54	44 7/8
48	49	50 7/8	48	61	50 7/8
54	54	56 7/8	54	67	56 7/8
60	59	62 7/8	60	73	62 7/8
66	63	68 7/8	66	79	68 7/8
72	68	74 7/8	72	85	74 7/8



CSL153DM 5 INCH RUBBER DISC RETURN (MASSED ENDS)					CSL163DM 6 INCH RUBBER DISC RETURN (MASSED ENDS)				
Belt Width	Std. Base		Wide Base		Belt Width	Std. Base		Wide Base	
	A	Wt.	A	Wt.		A	Wt.	A	Wt.
24	26 7/8	26	32 7/8	32	24	26 7/8	30	32 7/8	38
30	32 7/8	30	38 7/8	36	30	32 7/8	34	38 7/8	42
36	38 7/8	33	44 7/8	40	36	38 7/8	38	44 7/8	46
42	44 7/8	37	50 7/8	43	42	44 7/8	42	50 7/8	50
48	50 7/8	40	56 7/8	46	48	50 7/8	46	56 7/8	53
54	56 7/8	44	62 7/8	50	54	56 7/8	50	62 7/8	57
60	62 7/8	47	68 7/8	53	60	62 7/8	54	68 7/8	61
66	68 7/8	51	74 7/8	57	66	68 7/8	58	74 7/8	66
72	74 7/8	55	80 7/8	61	72	74 7/8	62	80 7/8	70



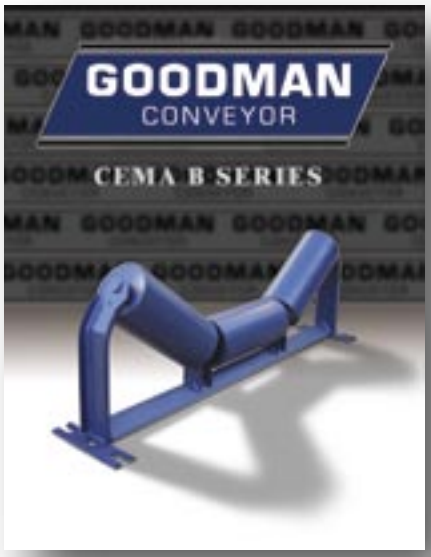
D-25103 5 INCH V-RETURN					D-26103 6 INCH V-RETURN				
Belt Width	Std. Base Wt.	A	4 1/4" Drop B	7" Drop B	Belt Width	Std. Base Wt.	A	4 1/4" Drop B	7" Drop B
36	82	19 3/8	11 5/16	14 1/16	36	92	19 3/8	11 5/16	14 1/16
42	90	22 7/8	11 13/16	14 9/16	42	102	22 7/8	11 13/16	14 9/16
48	97	25 5/8	12 5/16	15 1/16	48	109	25 5/8	12 5/16	15 1/16
54	110	29 1/4	12 7/8	15 5/8	54	125	29 1/4	12 7/8	15 5/8
60	118	32 1/4	13 3/8	16 1/8	60	134	32 1/4	13 3/8	16 1/8
66	126	35 1/4	13 15/16	16 11/16	66	143	35 1/4	13 15/16	16 11/16
72	133	38 1/8	14 7/16	17 3/16	72	150	38 1/8	14 7/16	17 3/16



D153T 5 INCH RETURN TRAINING				D163T 6 INCH RETURN TRAINING			
Belt Width	A	Std. Base Wt.	Wide Base Wt.	Belt Width	A	Std. Base Wt.	Wide Base Wt.
24	26 7/8	109	112	24	26 7/8	115	118
30	32 7/8	120	124	30	32 7/8	129	132
36	38 7/8	133	136	36	38 7/8	142	145
42	44 7/8	144	147	42	44 7/8	155	158
48	50 7/8	159	162	48	50 7/8	171	174
54	56 7/8	171	174	54	56 7/8	184	188
60	62 7/8	183	187	60	62 7/8	198	201
66	68 7/8	196	199	66	68 7/8	212	215
72	74 7/8	208	211	72	74 7/8	225	228

Note: Substitute DSL for D when ordering CEMA D sealed for life idlers.

Goodman Conveyor offers a complete line of Belt Conveyor Components, Screw Conveyors, Bucket Elevators, and Drag Conveyors



Additional Conveyor Components Include:

- *Pulleys*
- *Impact Roller Beds*
- *Overland Structure*
- *Impact Beds*
- *Slide Seal Assemblies*
- *Scale Idlers*

For more information see www.goodmanconveyor.com

GOODMAN CONVEYOR COMPANY

P.O. Box 866 / 645 Floyd Wright
Belton, South Carolina 29627
(864) 338-7793 / Fax (864) 338-8732
WEBSITE: www.goodmanconveyor.com
E-MAIL: good_people@GOODMANconveyor.com

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CEMA E

GOODMAN CONVEYOR

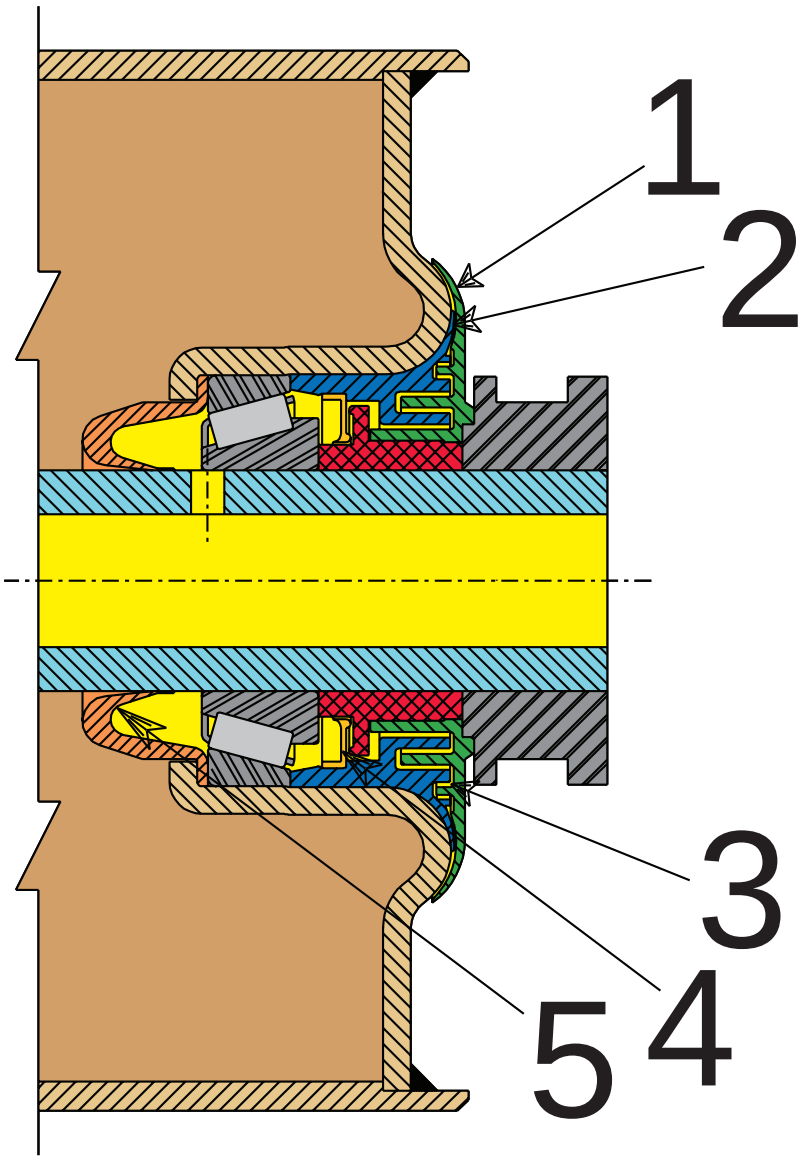
E Series

With Jeffrey Permaseal III™ seal design

Jeffrey Permaseal III™ Roll Design Features

-1 1/4” Tapered Roller Bearing
-Concentric Rolls
-Counter Bored Roll Shell, Protected Weld
-Jeffrey Permaseal Roll Design Features Include:

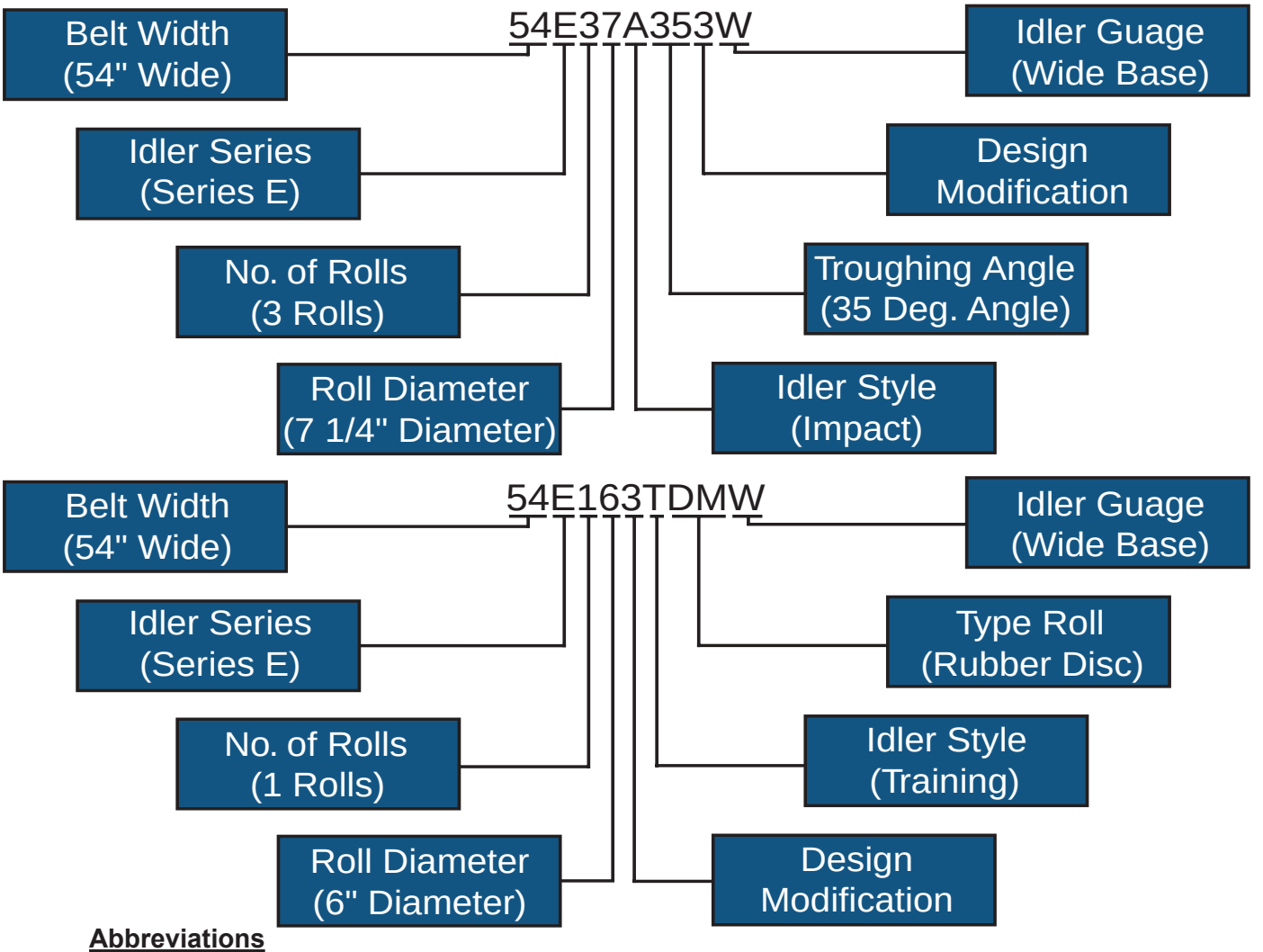
1. Exterior Shield
2. Flinger
3. Grease Filled, Multiple Path Labyrinth Seal
4. Contact Lip Seal
5. Rear Seal



Idler Specification Information

Goodman Series	CEMA Series	Roll Diameter	Type of Service
B	B	4 & 5 inch	Light Duty
C, CSL, CMF, CSLB	C	4, 5 & 6 inch	Medium Duty
D, DSL	D	5 & 6 inch	Medium to Heavy Duty
E, ESL	E	6 & 7 inch	Heavy Duty

Idler Identification Guide (Examples)



Abbreviations

Prefix (Series)
B, C, D and E-(see above)
SL-Sealed For Life
SLB-Sealed for Life Ball Bearing

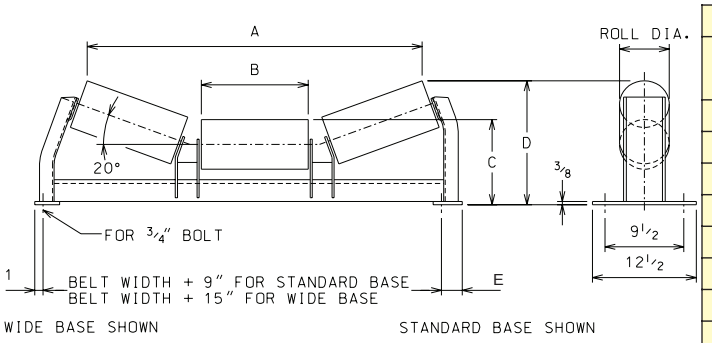
Internal
A-Impact
T-Training
SQ-Scale Quality
SS-Scale Service

Suffix
DM-Massed End Rubber Disc
L-Live Shaft
E-Elastomer (Urethane)
X-Special Feature
CC-Catenary Chain
CRK-Catenary Rod & Key
CEH-Catenary Eye Hook
CDR-Catenary Quick Release
W-Wide Base

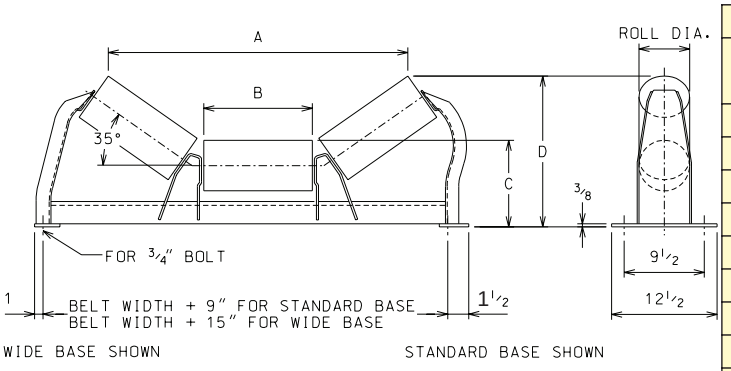
Note: Standard Base is furnished unless Wide Base (W) is specified.

CEMA E

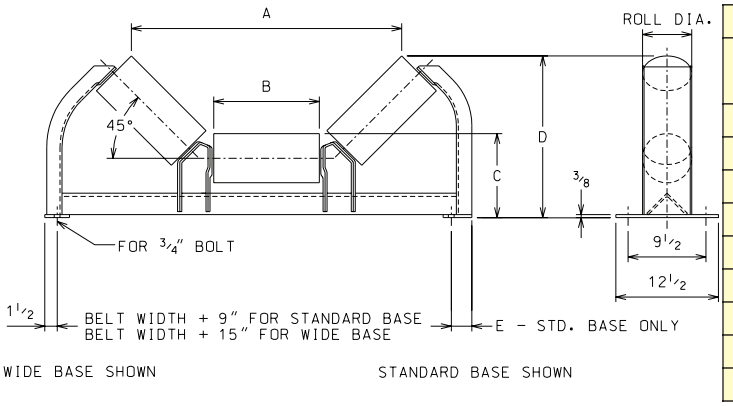
Roll Diameter 6” and 7”



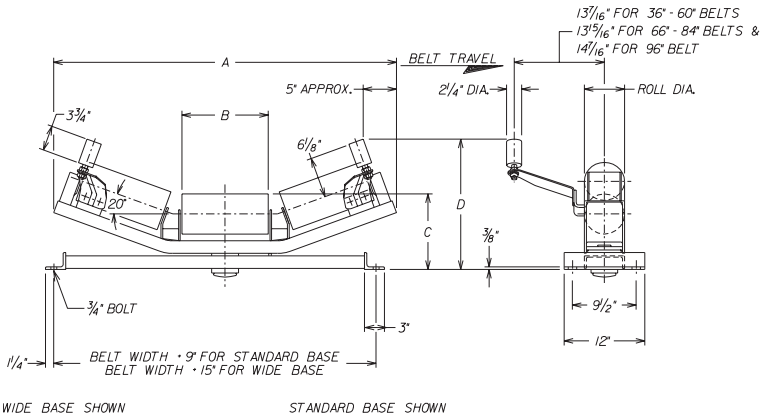
E36203 AND E37203 20 DEG TROUGHING										
Belt Width	B	E	6" DIA. ROLLS			7" DIA. ROLLS			6"	7"
			A	C	D	A	C	D	WT.	WT.
36	12 7/8	2 1/2	40 3/8	10 1/4	14 15/16	40	10 3/4	15 7/16	128	153
42	14 7/8	2	46 1/8	10 1/4	15 11/16	45 3/4	10 3/4	16 1/8	138	167
48	17 5/8	3	54	10 5/16	16 5/8	53 11/16	10 13/16	17 1/8	163	188
54	19 5/8	3	59 3/4	10 11/16	17 11/16	59 7/16	11 3/16	18 1/8	181	220
60	21 5/8	3	65 9/16	10 11/16	18 3/8	65 3/16	11 3/16	18 13/16	194	237
66	23 5/8	3	71 5/16	11 3/8	19 3/4	70 15/16	11 7/8	20 1/4	220	266
72	25 5/8	3	77 1/16	11 3/8	20 7/16	76 3/4	11 7/8	20 15/16	234	285
84	29 5/8	2 1/2	88 9/16	12 1/16	22 1/2	88 1/4	12 9/16	23	294	351
96	33 5/8	2 1/2	100 1/8	12 1/16	23 7/8	99 3/4	12 9/16	24 3/8	328	391



E36353 AND E37353 35 DEG TROUGHING									
Belt Width	B	6" DIA. ROLLS			7" DIA. ROLLS			6"	7"
		A	C	D	A	C	D	WT.	WT.
36	12 7/8	35 1/2	10 1/4	17 15/16	34 15/16	10 3/4	18 5/16	123	149
42	14 7/8	40 13/16	10 1/4	19 1/16	40 1/4	10 3/4	19 1/2	136	165
48	17 5/8	48 1/16	10 5/16	20 11/16	47 1/2	10 13/16	21 1/16	157	191
54	19 5/8	53 5/16	10 11/16	22 3/16	52 3/4	11 3/16	22 9/16	175	213
60	21 5/8	58 5/8	10 11/16	23 5/16	58 1/16	11 3/16	23 3/4	187	229
66	23 5/8	63 7/8	11 3/8	25 3/16	63 5/16	11 7/8	25 9/16	213	258
72	25 5/8	69 3/16	11 3/8	26 5/16	68 9/16	11 7/8	26 3/4	225	276
84	29 5/8	79 1/4	12 1/16	29 5/16	79 3/16	12 9/16	29 3/4	285	342
96	33 5/8	90 1/4	12 1/16	31 5/8	89 11/16	12 9/16	32	319	382



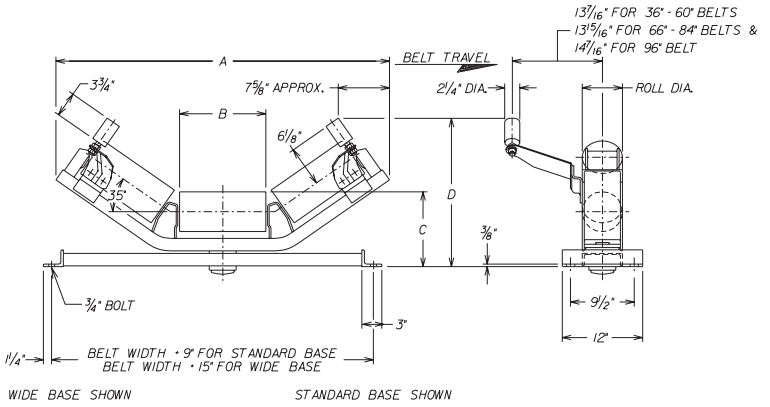
E36453 AND E37453 45 DEG TROUGHING										
Belt Width	B	E	6" DIA. ROLLS			7" DIA. ROLLS			6"	7"
			A	C	D	A	C	D	WT.	WT.
36	12 7/8	3	33 1/8	10 1/4	19 13/16	32 7/16	10 3/4	20 1/8	137	163
42	14 7/8	2 1/2	38	10 1/4	21 1/4	37 1/4	10 3/4	21 9/16	151	180
48	17 5/8	3	44 5/8	10 5/16	23 3/16	43 7/8	10 13/16	23 9/16	176	210
54	19 5/8	2 1/2	49 7/16	10 11/16	25	48 3/4	11 3/16	25 5/16	193	231
60	21 5/8	2	54 1/4	10 11/16	26 3/8	53 9/16	11 3/16	26 3/4	204	247
66	23 5/8	2	59 1/16	11 3/8	28 1/2	58 3/8	11 7/8	28 7/8	230	275
72	25 5/8	1 1/2	63 15/16	11 3/8	29 15/16	63 3/16	11 7/8	30 1/4	246	297
84	29 5/8	1 1/2	73 9/16	12 1/16	33 1/2	72 7/8	12 9/16	33 13/16	306	363
96	33 5/8	1 1/2	83 3/16	12 1/16	36 1/4	82 1/2	12 9/16	36 5/8	340	403



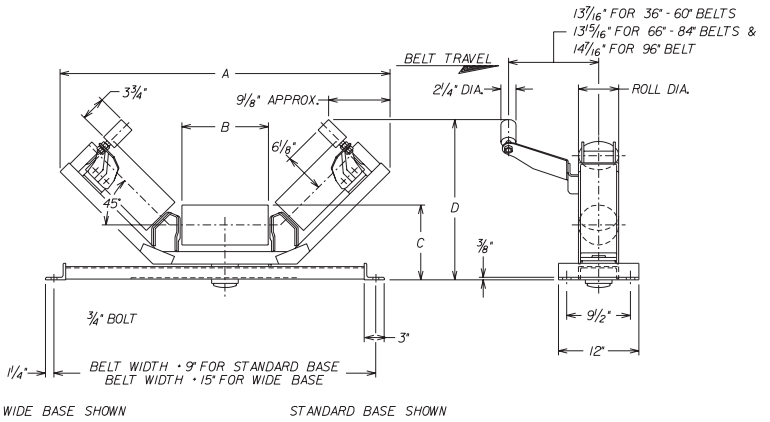
E36T203 AND E37T203 20 DEG TROUGH TRAINING							
Belt Width	A	B	D	6" DIA.	7" DIA.	6"	7"
				C	C	WT.	WT.
36	51 1/16	12 7/8	19 7/16	11 1/4	11 3/4	216	241
42	56 13/16	14 7/8	20 1/8	11 1/4	11 3/4	233	262
48	64 3/4	17 5/8	21 1/16	11 1/4	11 3/4	257	292
54	70 1/2	19 5/8	21 3/4	11 1/4	11 3/4	297	335
60	76 1/4	21 5/8	22 7/16	11 1/4	11 3/4	316	358
66	82 3/16	23 5/8	23 5/16	11 1/2	12	354	399
72	87 15/16	25 5/8	24 1/4	11 3/4	12 1/4	373	422
84	99 9/16	29 5/8	25 3/4	11 7/8	12 3/8	411	468
96	111 1/8	33 5/8	27 1/4	12	12 1/2	449	514

CEMA E

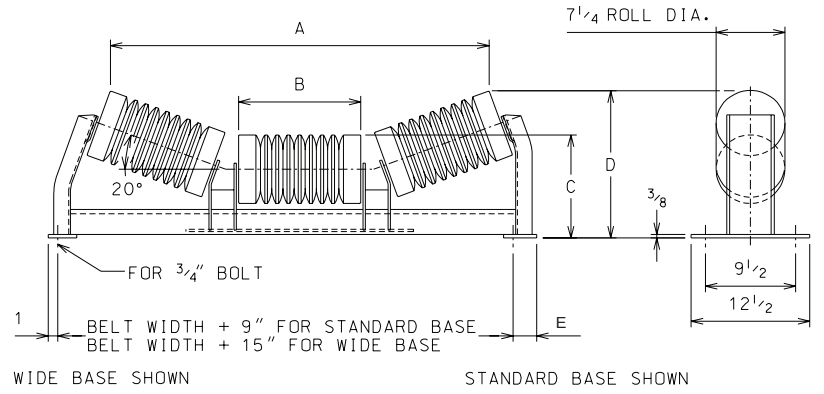
Roll Diameter 6” and 7”



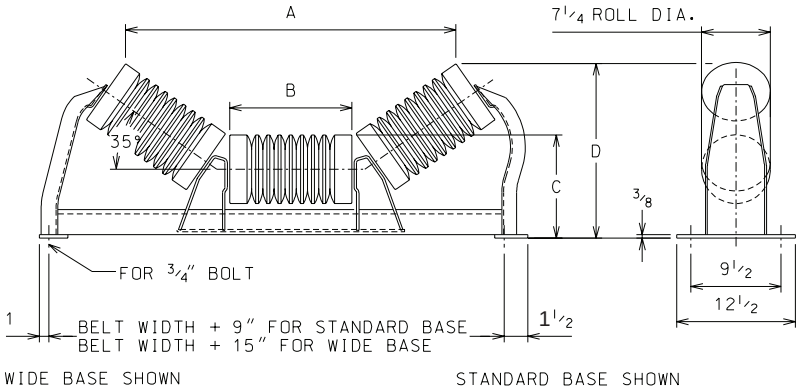
E36T353 AND E37T353 35 DEG TROUGH TRAINING							
Belt Width	A	B	D	6" DIA. C	7" DIA. C	6" WT.	7" WT.
36	49 3/4	12 7/8	22 5/16	11 1/4	11 3/4	219	244
42	55 1/16	14 7/8	23 1/2	11 1/4	11 3/4	237	266
48	62 5/16	17 5/8	25 1/16	11 1/4	11 3/4	261	296
54	67 9/16	19 5/8	26 3/16	11 1/4	11 3/4	301	339
60	72 13/16	21 5/8	27 3/8	11 1/4	11 3/4	320	362
66	78 1/8	23 5/8	28 3/4	11 1/2	12	358	403
72	83 3/8	25 5/8	30 1/8	11 3/4	12 1/4	377	426
84	94	29 5/8	32 9/16	11 7/8	12 3/8	415	472
96	104 1/2	33 5/8	35	12	12 1/2	453	518



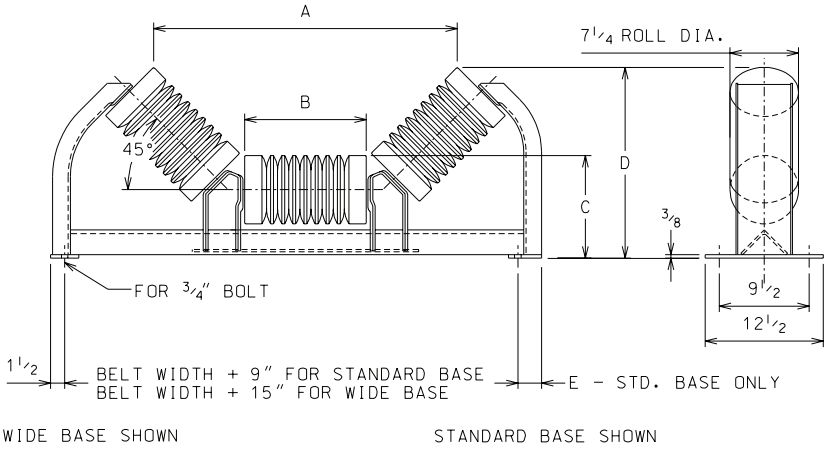
E36T453 AND E37T453 45 DEG TROUGH TRAINING							
Belt Width	A	B	D	6" DIA. C	7" DIA. C	6" WT.	7" WT.
36	49 3/16	12 7/8	24 1/16	11 1/4	11 3/4	222	247
42	54	14 7/8	25 1/2	11 1/4	11 3/4	240	269
48	60 5/8	17 5/8	27 7/16	11 1/4	11 3/4	264	299
54	65 1/2	19 5/8	28 7/8	11 1/4	11 3/4	304	342
60	70 5/16	21 5/8	30 1/4	11 1/4	11 3/4	322	365
66	75 1/2	23 5/8	31 15/16	11 1/2	12	360	406
72	80 5/16	25 5/8	33 5/8	11 3/4	12 1/4	380	429
84	90 1/8	29 5/8	36 9/16	11 7/8	12 3/8	418	475
96	100	33 5/8	39 1/2	12	12 1/2	456	521



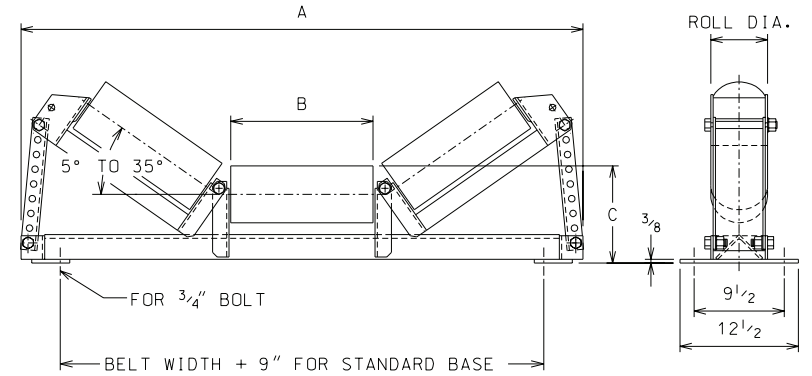
E37A203 20 DEG IMPACT						
Belt Width	A	B	C	D	E	WT.
36	39 15/16	12 7/8	10 7/8	15 9/16	2 1/2	171
42	45 11/16	14 7/8	10 7/8	16 3/16	2	189
48	52 5/8	17 5/8	10 7/8	17 1/8	3	224
54	59 3/8	19 5/8	11 1/4	18 3/16	3	251
60	65 1/8	21 5/8	11 1/4	18 7/8	3	276
66	70 7/8	23 5/8	11 15/16	20 1/4	3	306
72	76 5/8	25 5/8	11 15/16	20 15/16	3	339
84	88 3/16	29 5/8	12 5/8	23	2 1/2	420
96	99 11/16	33 5/8	12 5/8	24 3/8	2 1/2	468



E37A353 35 DEG IMPACT					
Belt Width	A	B	C	D	WT.
36	34 13/16	12 7/8	10 7/8	18 3/8	167
42	40 1/8	14 7/8	10 7/8	19 1/2	187
48	47 3/8	17 5/8	10 7/8	21 1/8	217
54	52 5/8	19 5/8	11 1/4	22 5/8	244
60	57 15/16	21 5/8	11 1/4	23 3/4	269
66	63 3/16	23 5/8	11 15/16	25 5/8	299
72	68 1/2	25 5/8	11 15/16	26 3/4	330
84	79	29 5/8	12 5/8	29 3/4	412
96	89 9/16	33 5/8	12 5/8	32	460

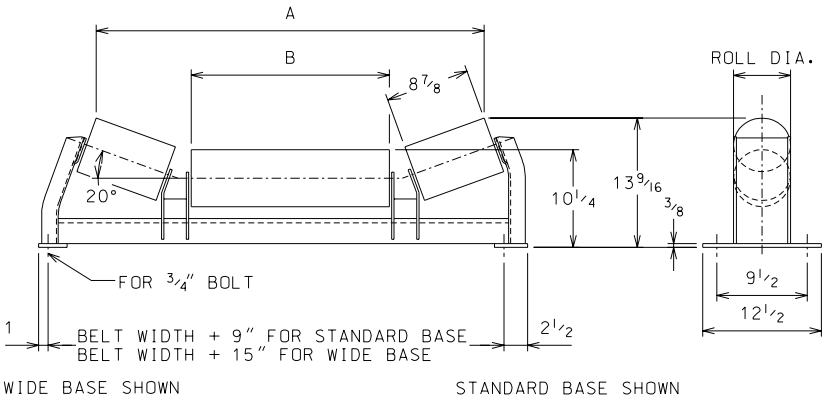


E37A453 45 DEG IMPACT						
Belt Width	A	B	C	D	E	WT.
36	32 1/4	12 7/8	10 7/8	20 3/16	3	181
42	37 1/8	14 7/8	10 7/8	21 5/8	2 1/2	202
48	43 3/4	17 5/8	10 7/8	23 9/16	3	236
54	48 9/16	19 5/8	11 1/4	25 3/8	2 1/2	262
60	53 3/8	21 5/8	11 1/4	26 3/4	2	286
66	58 1/4	23 5/8	11 15/16	28 7/8	2	317
72	63 1/16	25 5/8	11 15/16	30 5/16	1 1/2	349
84	72 11/16	29 5/8	12 5/8	33 13/16	1 1/2	430
96	82 3/8	33 5/8	12 5/8	36 5/8	1 1/2	481



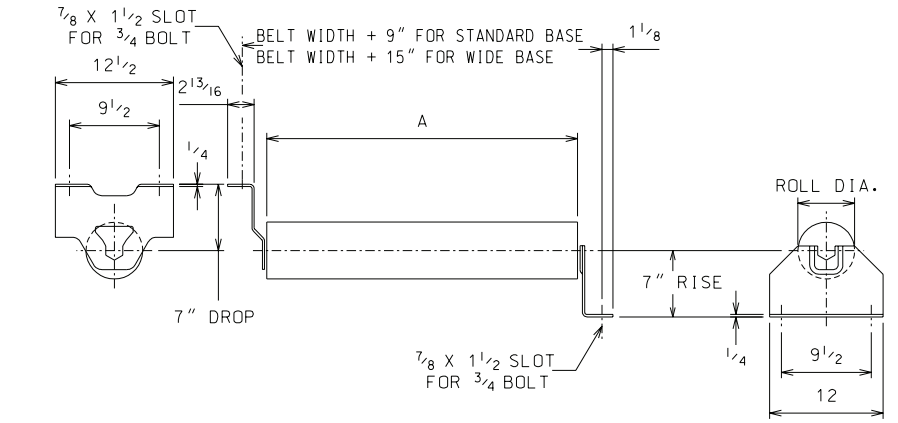
Available in sealed construction only.

E3635-35 & E3735-35 5-35 DEG TRANSITION						
Belt Width	A	B	6"	7"	6"	7"
			C	C	WT.	WT.
36	53 3/8	12 7/8	10 1/4	10 3/4	143	169
42	59 1/4	14 7/8	10 1/4	10 3/4	157	186
48	67 1/4	17 5/8	10 1/4	10 3/4	183	213
54	73 1/8	19 5/8	10 5/8	11 1/8	198	236
60	79 1/8	21 5/8	10 5/8	11 1/8	211	253
66	85	23 5/8	11 5/16	11 13/16	238	283
72	91	25 5/8	11 5/16	11 13/16	251	302
84	102 7/8	29 5/8	12	12 1/2	313	370
96	114 7/8	33 5/8	12	12 1/2	348	411



E126203 & E127203 20 DEG PICKING FEEDING IDLER					
Belt Width	B	6"	7"	6"	7"
		A	A	WT.	WT.
36	20 7/8	40 7/8	40 1/2	126	151
42	26 7/8	46 7/8	46 1/2	136	161
48	32 7/8	52 7/8	52 1/2	146	171
54	38 7/8	58 7/8	58 1/2	156	181
60	44 7/8	64 7/8	64 1/2	166	191
66	50 7/8	70 7/8	70 1/2	176	201
72	56 7/8	76 7/8	76 1/2	186	211
84	68 7/8	88 7/8	88 1/2	206	231
96	80 7/8	100 7/8	100 1/2	226	251

Consult factory for load ratings.

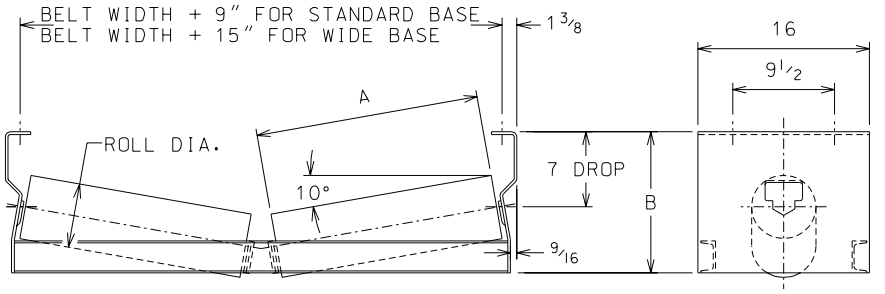


E163 & E173 FLAT CARRYING & RETURN			
Belt Width	A	6"	7"
		WT.	WT.
36	39 7/8	51	77
42	45 7/8	58	88
48	51 7/8	64	98
54	57 7/8	71	109
60	63 7/8	78	120
66	69 7/8	85	131
72	75 7/8	91	141
84	87 7/8	105	163
96	99 7/8	119	185

Standard 7” return hanger part number 73H3725-0700. Standard 7” carrying stand part number 73H11439-0700. Other brackets are available, please consult factory. Rolls and brackets are shipped separately.

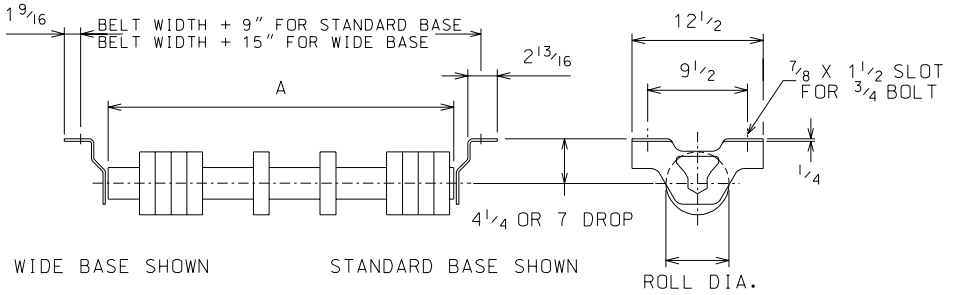
CEMA E

Roll Diameter 6” and 7”



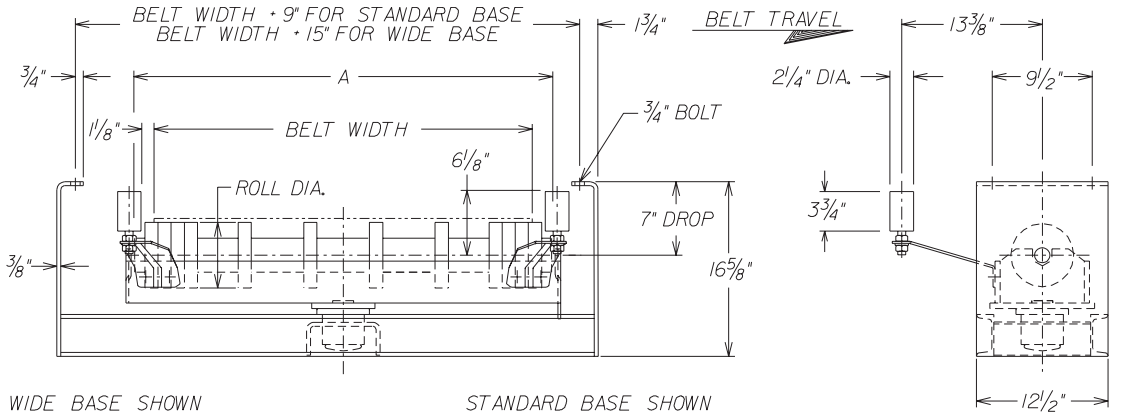
Standard belt width plus 9” shown, for belt width plus 15” use next (6”) larger belt width.

E2610 & E2710 V-RETURN IDLER				
Belt Width	A	B	6"	7"
			WT.	WT.
36	20 7/8	13 1/4	129	156
42	23 7/8	13 3/4	141	173
48	26 7/8	14 1/4	153	188
54	29 7/8	15 13/16	179	219
60	32 7/8	16 5/16	193	236
66	35 7/8	16 13/16	206	253
72	38 7/8	17 3/8	218	270
84	44 7/8	18 3/8	244	304
96	50 7/8	19 7/16	270	338

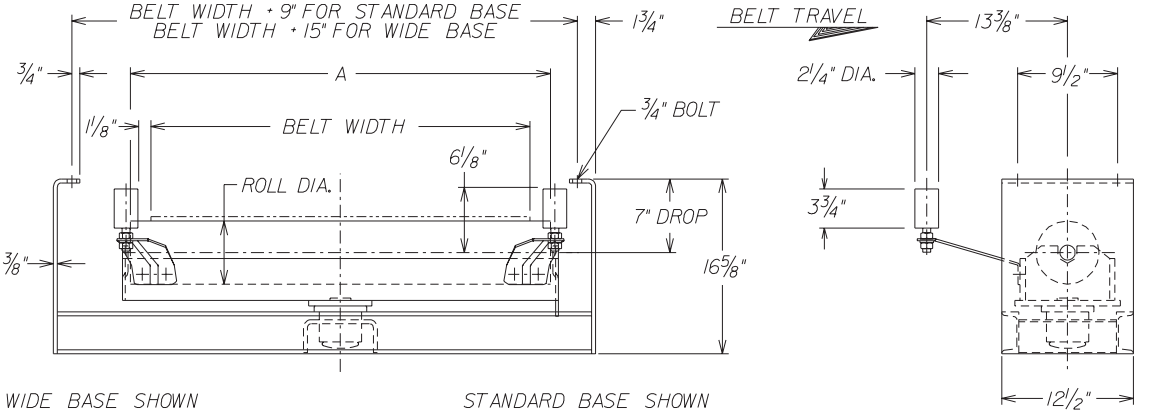


Standard 7” return hanger part number 73H3725-0700. Other drop brackets are available, please consult factory. Rolls and brackets are shipped separately.

E163DM & E173DM RUBBER DISC RETURN				
Belt Width	A		6"	7"
		WIDE	WT.	WT.
36	39 7/8	45 7/8	53	63
42	45 7/8	51 7/8	62	73
48	51 7/8	57 7/8	70	82
54	57 7/8	63 7/8	79	92
60	63 7/8	69 7/8	88	102
66	69 7/8	75 7/8	98	112
72	75 7/8	81 7/8	106	121
84	87 7/8	93 7/8	124	141
96	99 7/8	105 7/8	143	161

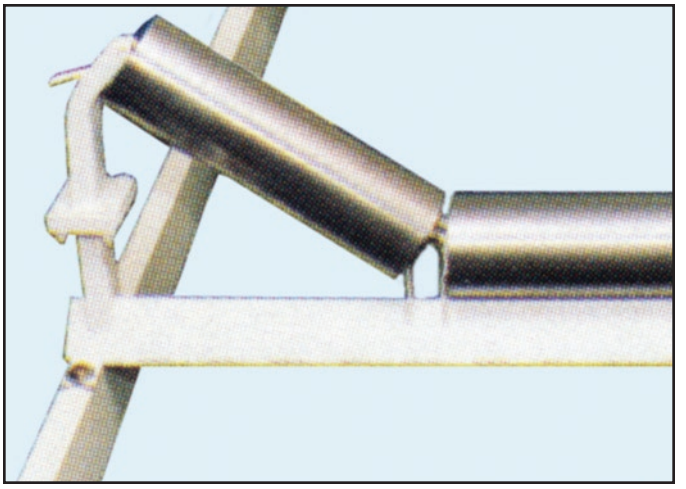


E163TDM & E173TDM DISC RETURN TRAINING			
Belt Width	A	6"	7"
		WT.	WT.
36	39 7/8	203	213
42	45 7/8	225	236
48	51 7/8	245	257
54	57 7/8	266	279
60	63 7/8	286	300
66	69 7/8	308	322
72	75 7/8	328	343
84	87 7/8	370	387
96	99 7/8	413	431

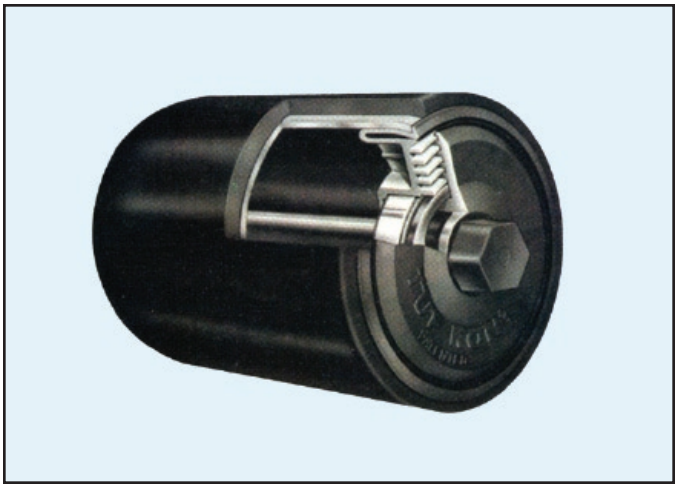


E163T & E173T 7" DROP RETURN TRAINING			
Belt Width	A	6"	7"
		WT.	WT.
36	39 7/8	206	232
42	45 7/8	226	256
48	51 7/8	244	279
54	57 7/8	263	301
60	63 7/8	282	324
66	69 7/8	301	347
72	75 7/8	320	370
84	87 7/8	358	416
96	99 7/8	396	462

Additional Products Available From Goodman Conveyor

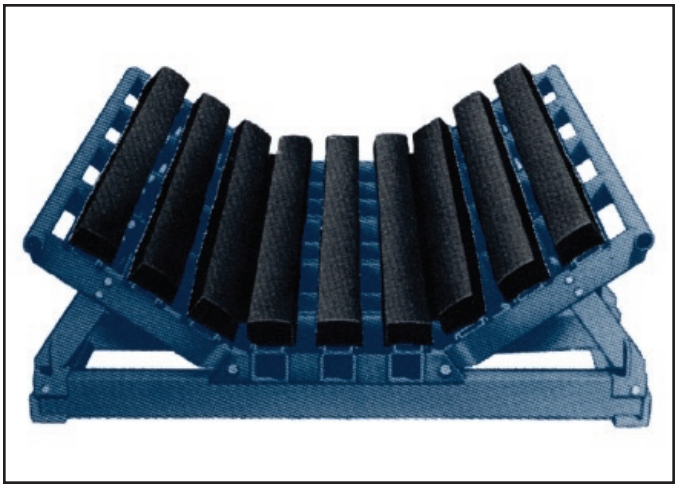


Scale Idlers

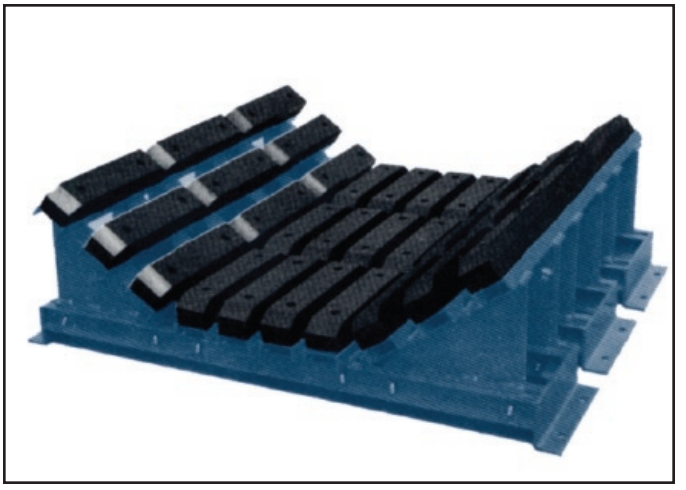


TufKon® Steel and Pro-Roll™

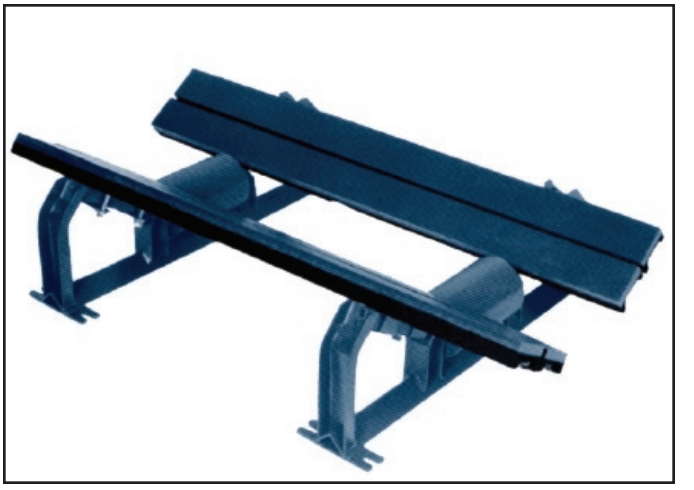
Channel Insert Idlers



Heavy-Duty Impact Bed



Modular Impact / Slider Beds



Slide Seal System

GOODMAN CONVEYOR COMPANY

P.O. Box 866 / 645 Floyd Wright Drive
Belton, South Carolina 29627
(864) 338-7793 / Fax (864) 338-8732
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E-MAIL: good_people@GOODMANconveyor.com

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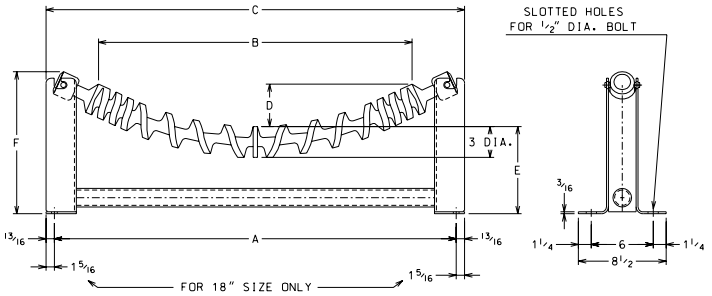
The Hewitt-Robins Spiral Solves Many Sticky Material Problems

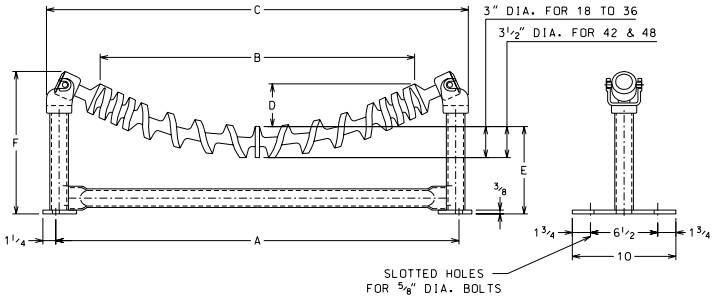
Hewitt-Robins
CONVEYOR COMPONENTS

- Self-cleaning, self-training spiral idlers solve many material build-up problems
- Resists abrasion, corrosion, and gouging
- Positive contact seals keep dirt and dust out, grease in
- Simple removal and replacement
- Smooth, catenary idler curve prolongs belt life
- Urethane spiral outwears neoprene and natural rubber
- Unique, double-spiral design produces a positive cleaning action that continually cleans both belt and idler surface



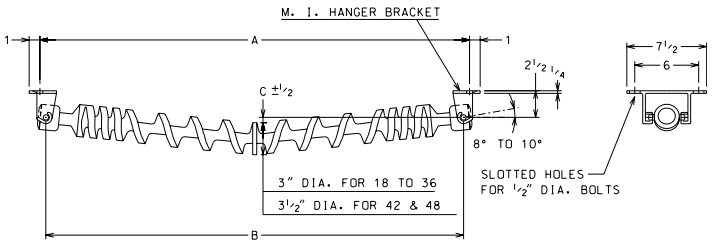
U-130 TROUGHING

Belt Width	A	B	C	D	E	F	WT.
18	27	19 1/2	29 5/8	2 1/8	7 3/8	11	23
24	33	24 1/2	34 1/2	3 1/2	7 1/2	12 3/8	26
30	39	30 3/8	40 1/2	4 1/8	8 1/2	13 7/8	29
36	45	36 1/4	46 1/2	4 5/8	8 1/2	14 3/8	32



U-130 TROUGHING (with heavy-duty Impact Stands)

Belt Width	A	B	C	D	E	F	WT.
18	27	19 1/2	28 13/16	2 1/8	7 13/16	11 1/8	28
24	33	24 1/2	34 13/16	3 1/2	7 1/2	12 7/16	31
30	39	30 3/8	40 13/16	4 1/8	8 1/2	13 15/16	34
36	45	36 1/4	46 13/16	4 5/8	8 1/2	14 7/16	37
42	51	41 3/4	53 1/2	4 13/16	8 3/4	14 5/8	60
48	57	47 3/4	59 1/2	5 3/8	9 1/8	15 7/16	64



U-131, 131 RETURN

Belt Width	A	B	C	D
18	27	27	1/8	12
24	33	33	1/4	13
30	39	39	7/16	14
36	45	45	9/16	15
42	51	49 7/8	7/16	18
48	57	55 7/8	9/16	19

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive, Pueblo West, CO 81007
Phone: (205) 487-1931 Fax: (205) 487-1935
E-mail: sales@hewitt-robins.com
Website: www.hewitt-robins.com
Call 1-800-388-7701 for the distributor nearest you.

Catalog subject to change or correction without notice. Use certified prints for construction purposes. Weights shown in pounds and lengths in inches. Rolls, stands and support hanger brackets must be ordered separately. Bolts, nuts and washers for mounting are not included.

Printed in the U.S.A. Spiral 4/06

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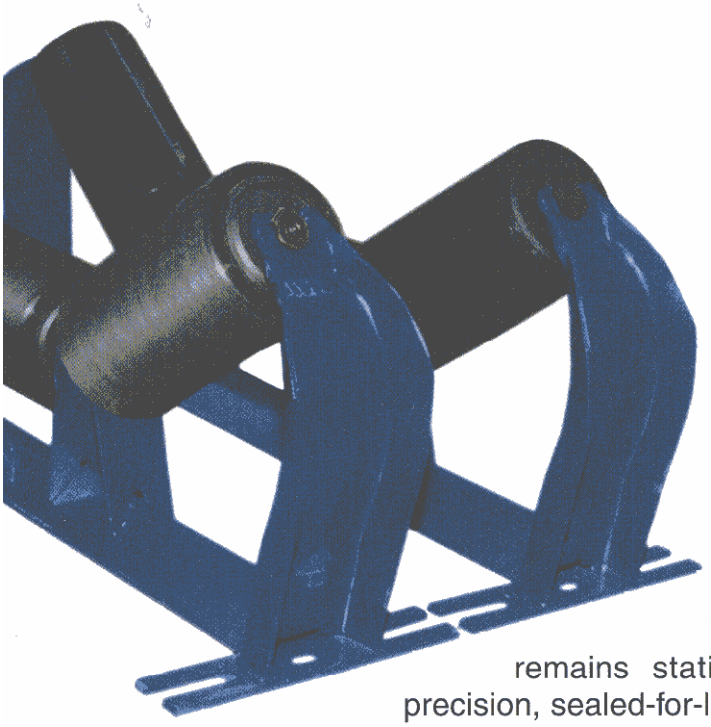
TUF KON®
CONVEYOR IDLERS

TUFKON® ...A History Of Achievement



The TufKon® roll for belt conveyor idlers was first introduced in 1982. The primary objective was to produce a maintenance free idler roll with low rolling resistance while offering extended service life under the most demanding operating conditions.

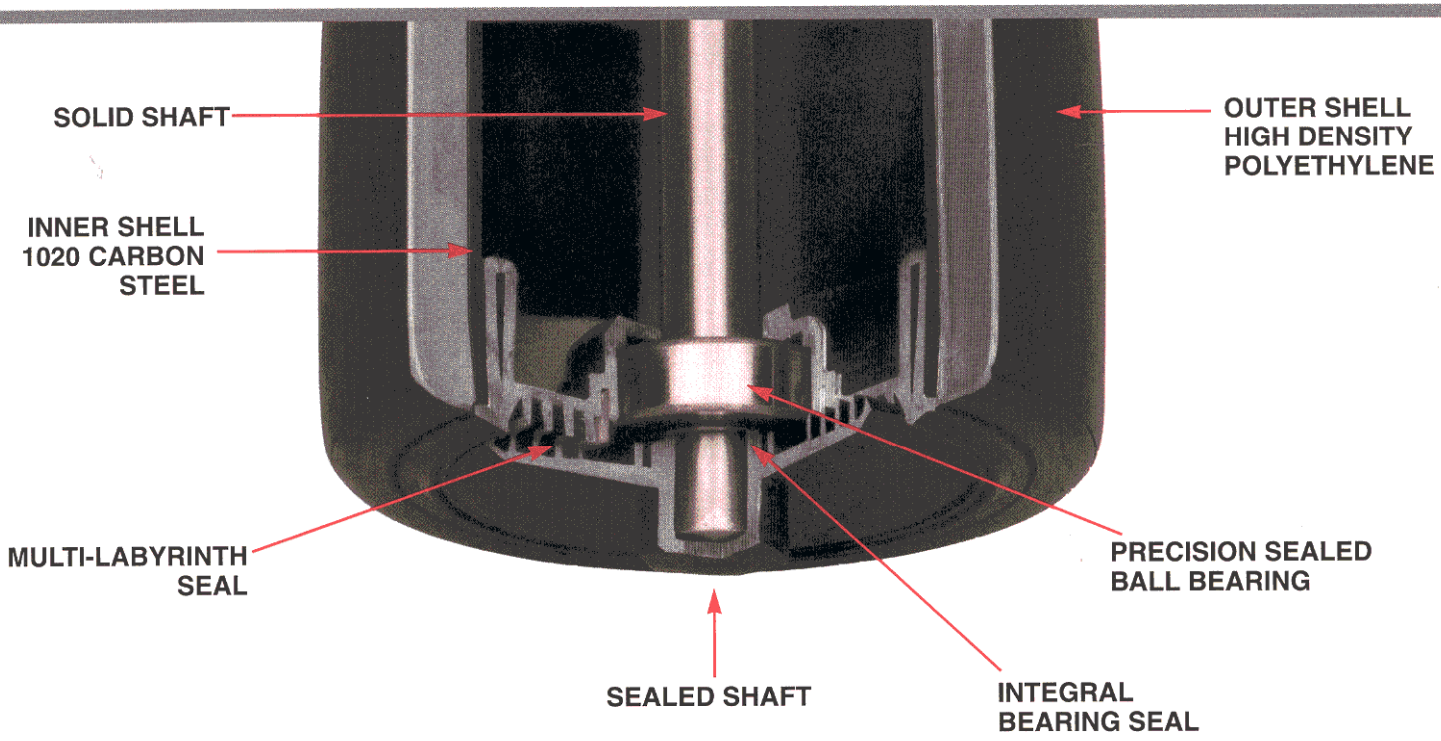
The TufKon® roll design evolved through several design generations resulting in today's proven product. The TufKon® roll is truly unique and is protected by numerous patents. It incorporates proprietary material specifications and manufacturing processes thus providing outstanding quality and performance.

TufKon® rolls have a unique roll head which remains stationary as the shell rotates around a precision, sealed-for-life ball bearing. In addition, the entire end of the roll is designed as a series of concentric labyrinths formed by the roll end housing and the stationary end cap. The end cap is also designed to completely enclose the shaft thus eliminating the need for seals directly in front of the bearing. With the end cap diameter close to the roll diameter, the opening for contaminants is now moved from around the shaft to the outside diameter of the end cap. This design feature creates a long path for contaminants prior to reaching the bearing. This patented sealing system is unique to both the TufKon® steel roll and the Pro-Roll™ polyethylene roll.

In addition, TufKon® design allows the bearing to be moved closer to the roll support. This shorter moment arm results in less stress on roll ends and reduced shaft slope at the bearing. The encapsulated shaft and bearing result in reduced roll and bearing noise.

Through the years, the TufKon® Idler has proven to be successful in a variety of applications in many industries. Experienced application specialists are available to work with you on any application. Contact your Goodman representative to see if TufKon® steel or Pro-Roll™ idlers provide a solution for your application needs.

TUFKON® PRO-ROLL™ (polyethylene)



PRO-ROLL™ ENGINEERING DATA	
CONSTRUCTION	Proprietary, non-welded
ROLL (Outer Shell)	High density polyethylene,* .500"/12.5mm wall
ROLL (Inner Shell)	
5" ROLL	Carbon steel, 101.6mm/4" O.D. x .125"/3.2mm wall HR-EWT, SAE 1020 ASTM-A513
6" ROLL	Carbon steel, 127.0mm/5" O.D. x .148"/3.8mm wall HR-EWT, SAE 1020 ASTM-A513
ROLL-END	Nylon 6 based, glass fiber reinforced, Thermo composite
BEARING	Series 6205 Ball Bearing, .984"/25.0mm I.D. x 2.047"/52.0mm O.D. x .591"/15.0mm W., sealed
SEAL	
Primary	Radial multi-labyrinth, non-contact
Secondary	Dual, lip seal, integral with bearing
BEARING MOMENT ARM	.827"/21.0mm
BEARING LUBRICANT	Shell Alvania AR
OPERATING TEMPERATURE	-40°C/-40°F to +82°C/+180°F

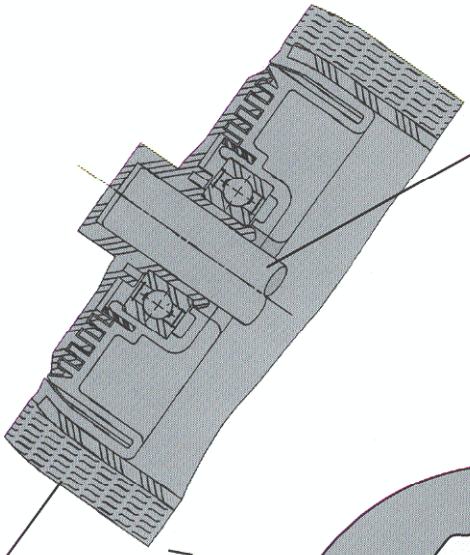
- The **TUFKON® PRO-ROLL™** is a combination of modern materials, state-of-the-art design engineering and proprietary manufacturing processes. The result is a patented, high quality but uniquely different conveyor roll.

- The **TUFKON® PRO-ROLL™** is designed specifically for conditions where abrasion, corrosion and material build-up affect maintenance costs.

*

POLYETHYLENE PROPERTIES	ASTM TEST	TYPICAL RESULTS
Density	D792	.0948g/cm³
ESCR	D1693	>5,000 HRS
Izod impact strength	D256(A)	8 ft.lbs./inch
Tensil yield strength	D638	>3,000 psi
Elongation @ break	D638(1)	>800%
Mod. of elasticity	D638	115,000 psi
Flexural modulus	D790	125,000 psi
Impact brittleness	D746	-180°F
Rockwell hardness	D785	40 on L scale
Shore hardness	D2240	83 on D scale

TUFKON® PRO-ROLL™ (polyethylene)



Solid Shaft
Offers maximum stiffness for bearing support and alignment.

Steel Retaining Clips
Rolls arrive in place and stay in place until you decide to change.

High Density, Polyethylene Shell
A modified compound to withstand the corrosive effects of a wide range of acids, citrics, alkalines, salts, organics and solvents.

Field tests under wet sand conditions have shown superior resistance to abrasion when compared to carbon steel.

The non-adhesive properties resist material build up, a condition which can adversely affect belt tracking and belt life.

Universal Footplate
Offers flexibility in new or existing installations with multiple bolt hole combinations.

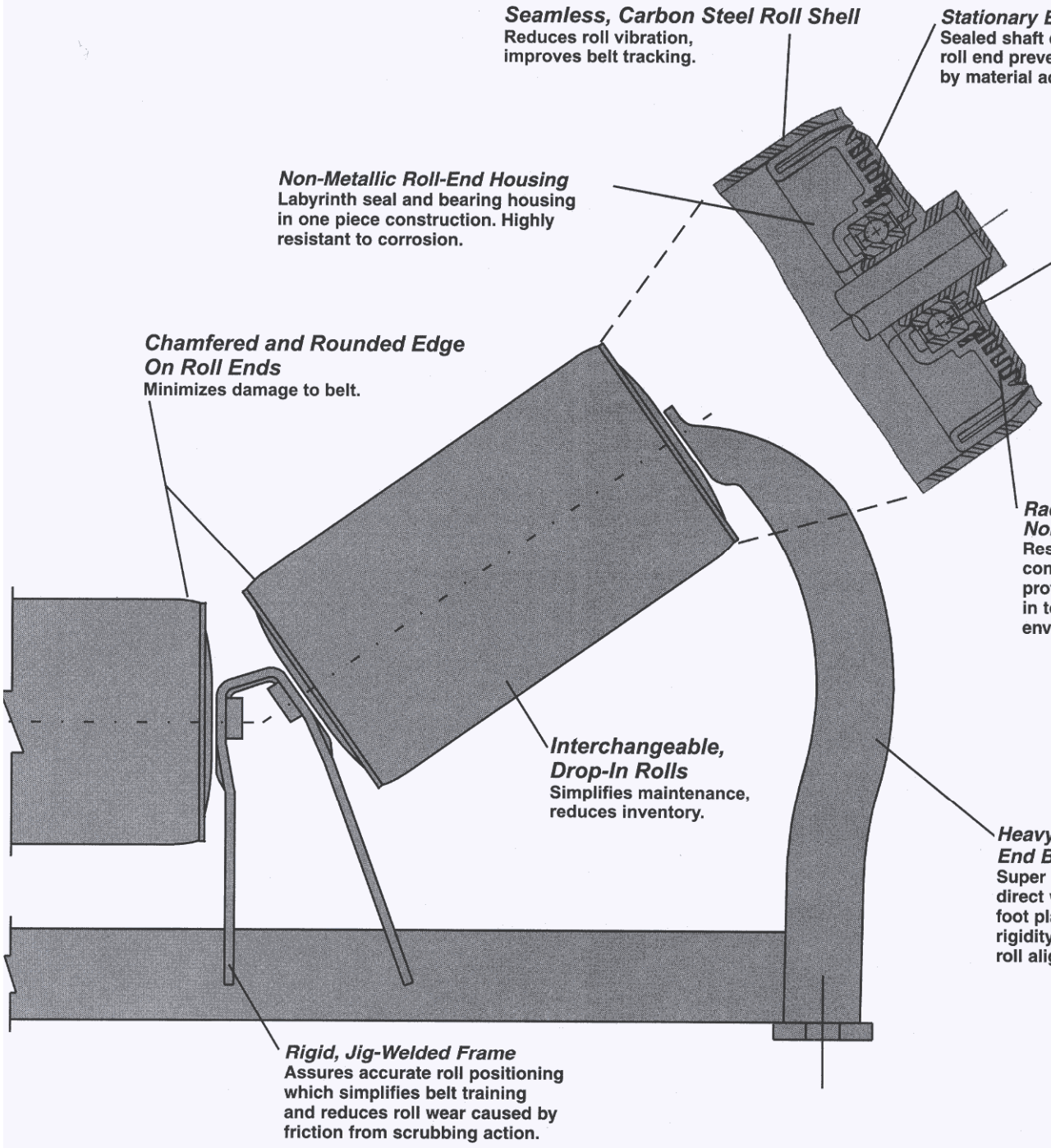
Ample Roll Clearance
Prevents spilled material from wedging between roll edge and end bracket.

Inverted Angle Base
Self-cleaning design minimizes material build up.

THE FEATURES OF TUFKON® CONVEYOR ROLLS, COMBINED WITH A RUGGED FRAME DESIGN, PROVIDE EXTENDED IDLER LIFE.

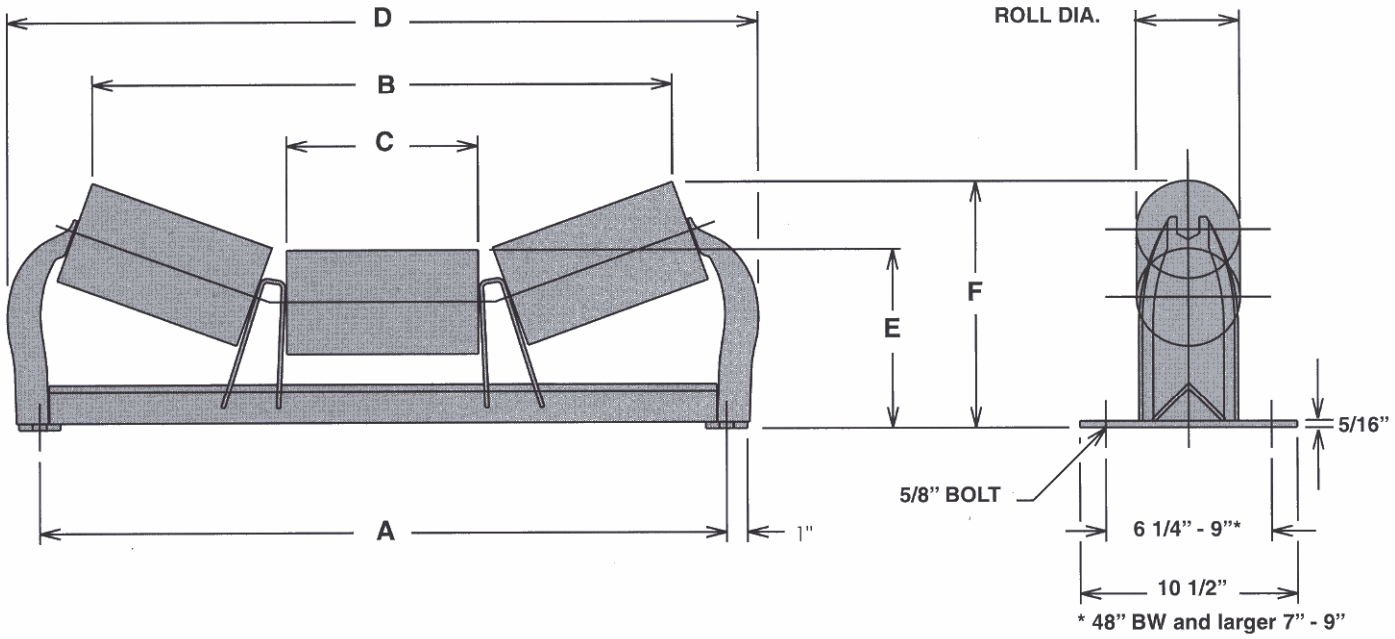
Catalog subject to change or correction without notice. Use certified prints for construction purposes.

TUFKON® STEEL ROLL



THE TUFKON® DESIGN IS PATENTED, TESTED AND PROVEN IN A VARIETY OF INDUSTRY APPLICATIONS INCLUDING: AGGREGATE… CEMENT…GRAIN…GYPSUM…COAL…WOODCHIPS…FERTILIZERS AND AG LIME.

TUFKON® TROUGHING IDLERS



PART NUMBER IDENTIFICATION

CLASSIFICATION
2 = CEMA B
3 = CEMA C
4 = C-PLUS

ROLL DIAMETER IN INCHES

DESIGN TYPE
TF = Closed Shaft End, Standard
HT = Open Shaft End, Optional
GC = Impact Idler

TROUGHING ANGLE
0 = Return or Flat Belt
2 = 20°
3 = 35°
4 = 45°
R = Replacement Roll

TF342 - 18SG

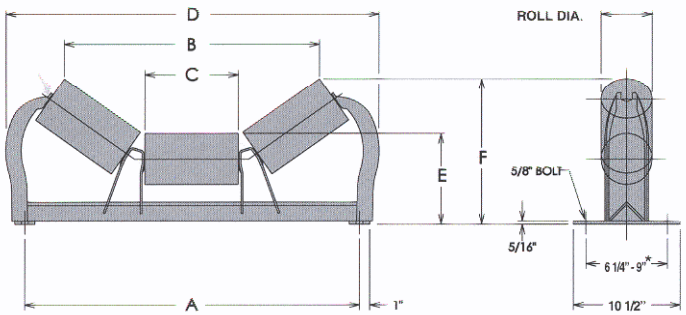
BELT WIDTH
In Inches

ROLL MATERIAL
S = Steel
R = Rubber / Disc
P = Polyethylene

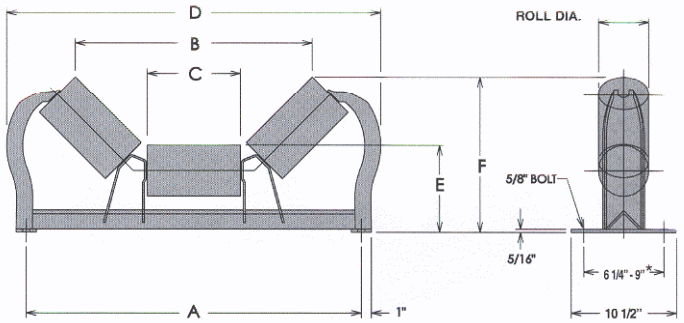
IDLER CONFIGURATION
G = Troughing Idler, In-line Rolls
T = Troughing Trainer, In-line Rolls
I = Troughing Impact
H = Troughing Idler; Off-set Rolls
S = Troughing Trainer; Off-set Rolls
M = Picking and Feeder Belt Idler
F = Flat Belt Idler
V = Flat Belt Trainer
R = Return Idler
W = Return Trainer
X = Special

		20°									
		PART NUMBER		DIMENSIONS						WEIGHT	
ROLL DIA.	BW	STEEL ROLL	*PRO-ROLL™*	A	B	C	D	E	F	STEEL ROLL	*PRO-ROLL™*
4"	18	TF342-18SG		27	22 7/16	7 1/8	29 15/16	8 1/8	10 3/4	44	
	24	TF342-24SG		33	28 1/4	9 5/16	35 7/8	8 1/8	11 7/16	49	
	30	TF342-30SG		39	34 1/16	11 1/4	41 3/4	8 1/2	12 1/2	54	
	36	TF342-36SG		45	39 13/16	13 1/4	47 9/16	8 1/2	13 9/16	61	
	42	TF342-42SG		51	45 9/16	15 1/4	53 5/16	8 1/2	13 7/8	69	
	48	TF342-48SG		57	51 5/16	17 1/4	59 5/16	8 7/8	14 15/16	87	
	54	TF342-54SG-1		63	57 1/16	19 1/4	65 1/16	8 7/8	15 5/8	95	
	60	TF342-60SG-1		69	62 7/8	21 1/4	70 13/16	8 7/8	16 1/4	103	
5"	18	TF352-18SG	TF352-18PG	27	22 1/16	7 1/8	29 15/16	8 5/8	11 3/16	48	49
	24	TF352-24SG	TF352-24PG	33	27 1/8	9 3/16	35 7/8	8 5/8	11 7/8	55	56
	30	TF352-30SG	TF352-30PG	39	33 11/16	11 1/4	41 3/4	9	12 15/16	61	62
	36	TF352-36SG	TF352-36PG	45	39 1/2	13 1/4	47 9/16	9	13 5/8	69	71
	42	TF352-42SG	TF352-42PG	51	45 1/4	15 1/4	53 5/16	9	14 5/16	78	80
	48	TF352-48SG	TF352-48PG	57	51	17 1/4	59 5/16	9 3/8	15 3/8	98	100
	54	TF352-54SG-1	TF352-54PG-1	63	56 3/4	19 1/4	65 1/16	9 3/8	16 1/16	106	109
	60	TF352-60SG-1	TF352-60PG-1	69	62 1/2	21 1/4	70 13/16	9 3/8	16 3/4	116	119
6"	18	TF362-18SG	TF362-18PG	27	21 3/4	7 1/8	29 15/16	9 1/8	11 11/16	51	54
	24	TF362-24SG	TF362-24PG	33	27 9/16	9 3/16	35 7/8	9 1/8	12 3/8	58	63
	30	TF362-30SG	TF362-30PG	39	33 3/8	11 1/4	41 3/4	9 1/2	13 7/16	65	70
	36	TF362-36SG	TF362-36PG	45	39 1/8	13 1/4	47 9/16	9 1/2	14 1/8	74	81
	42	TF362-42SG	TF362-42PG	51	44 7/8	15 1/4	53 5/16	9 1/2	14 13/16	84	91
	48	TF362-48SG	TF362-48PG	57	50 5/8	17 1/4	59 5/16	9 7/8	15 7/8	104	113
	54	TF362-54SG-1	TF362-54PG-1	63	56 3/8	19 1/4	65 1/16	9 7/8	16 9/16	114	123
	60	TF362-60SG-1	TF362-60PG-1	69	62 1/16	21 1/4	70 13/16	9 7/8	17 1/4	124	135

TUFKON® TROUGHING IDLERS



*48" BW and larger 7" - 9"



*48" BW and larger 7" - 9"

35°

ROLL DIA.	BW	PART NUMBER STEEL ROLL	PART NUMBER *PRO-ROLL™*	DIMENSIONS A	B	C	D	E	F	WEIGHT STEEL ROLL	WEIGHT *PRO-ROLL™*
4"	18	TF343-18SG		27	20 9/16	7 1/8	29 7/16	8 1/8	12 1/2	44	
	24	TF343-24SG		33	25 15/16	9 3/16	36 5/8	8 1/8	13 11/16	51	
	30	TF343-30SG		39	31 1/4	11 1/4	42 1/4	8 1/2	15 3/16	57	
	36	TF343-36SG		45	36 1/2	13 1/4	47 13/16	8 1/2	16 3/8	64	
	42	TF343-42SG		51	41 13/16	15 1/4	53 3/16	8 1/2	17 1/2	82	
	48	TF343-48SG		57	47 1/16	17 1/4	59 1/2	8 7/8	19	91	
	54	TF343-54SG-1		63	52 3/8	19 1/4	65	8 7/8	20 3/16	100	
	60	TF343-60SG-1		69	57 5/8	21 1/4	70 1/2	8 7/8	21 5/16	108	
5"	18	TF353-18SG	TF353-18PG	27	20	7 1/8	29 7/16	8 5/8	12 15/16	48	49
	24	TF353-24SG	TF353-24PG	33	25 3/8	9 3/16	36 5/8	8 5/8	14 1/16	57	58
	30	TF353-30SG	TF353-30PG	39	30 11/16	11 1/4	42 1/4	9	15 5/8	64	65
	36	TF353-36SG	TF353-36PG	45	35 15/16	13 1/4	47 13/16	9	16 3/4	72	74
	42	TF353-42SG	TF353-42PG	51	41 1/4	15 1/4	53 3/16	9	17 15/16	81	83
	48	TF353-48SG	TF353-48PG	57	46 1/2	17 1/4	59 1/2	9 3/8	19 7/16	102	104
	54	TF353-54SG-1	TF353-54PG-1	63	51 3/4	19 1/4	65	9 3/8	20 9/16	111	114
	60	TF353-60SG-1	TF353-60PG-1	69	57 1/16	21 1/4	70 1/2	9 3/8	21 3/4	121	124
6"	18	TF363-18SG	TF363-18PG	27	19 7/16	7 1/8	29 7/16	9 1/8	13 5/16	51	54
	24	TF363-24SG	TF363-24PG	33	24 3/4	9 3/16	36 5/8	9 1/8	14 1/2	60	65
	30	TF363-30SG	TF363-30PG	39	30 1/8	11 1/4	42 1/4	9 1/2	16	68	73
	36	TF363-36SG	TF363-36PG	45	35 3/8	13 1/4	47 13/16	9 1/2	17 3/16	77	84
	42	TF363-42SG	TF363-42PG	51	40 11/16	15 1/4	53 3/16	9 1/2	18 5/16	87	94
	48	TF363-48SG	TF363-48PG	57	45 15/16	17 1/4	59 1/2	9 7/8	19 13/16	108	117
	54	TF363-54SG-1	TF363-54PG-1	63	51 3/16	19 1/4	65	9 7/8	21	119	128
	60	TF363-60SG-1	TF363-60PG-1	69	56 1/2	21 1/4	70 1/2	9 7/8	22 1/8	129	140

45°

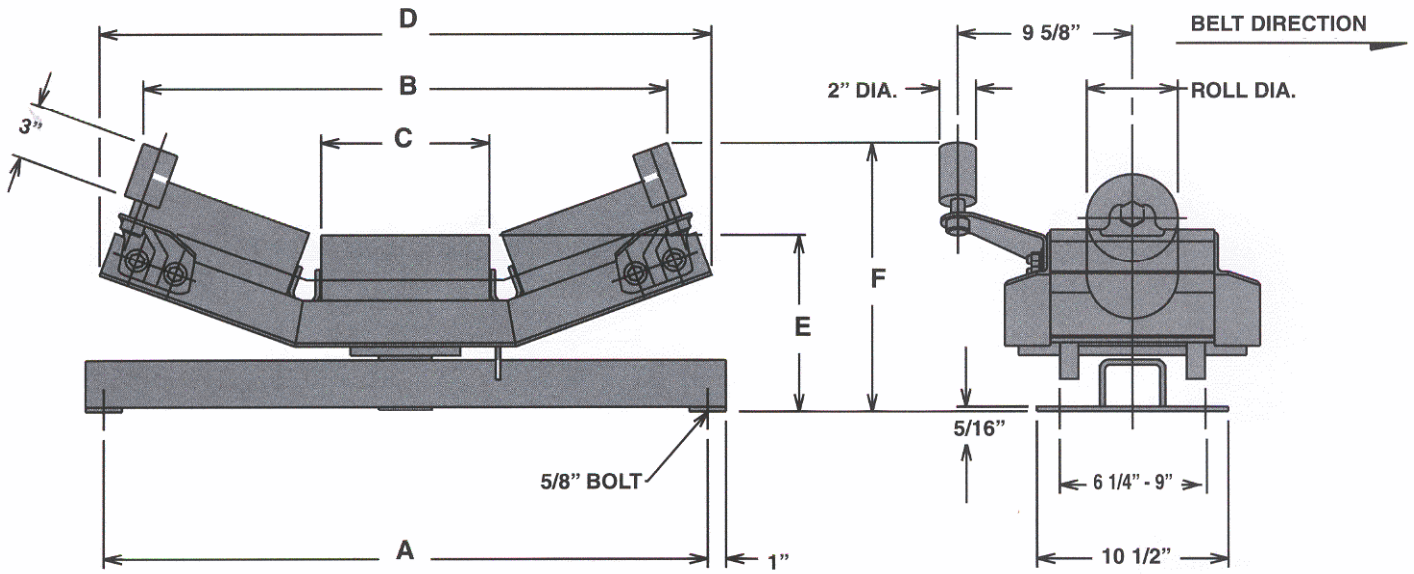
BW	PART NUMBER STEEL ROLL	PART NUMBER *PRO-ROLL™*	DIMENSIONS A	B	C	D	E	F	WEIGHT STEEL ROLL	WEIGHT *PRO-ROLL™*
18	TF344-18SG		27	19 9/16	7 1/8	27 1/2	8 1/8	13 9/16	47	
24	TF344-24SG		33	24 1/16	9 3/16	35	8 1/8	15	54	
30	TF344-30SG		39	28 15/16	11 1/4	41	8 1/2	16 13/16	62	
36	TF344-36SG		45	33 3/4	13 1/4	46 3/4	8 1/2	18 1/4	69	
42	TF344-42SG		51	38 9/16	15 1/4	52 1/2	8 1/2	19 5/8	79	
48	TF344-48SG		57	43 3/8	17 1/4	59 1/2	8 7/8	21 7/16	94	
54	TF344-54SG-1		63	48 1/4	19 1/4	64 3/4	8 7/8	22 13/16	102	
60	TF344-60SG-1		69	53 1/16	21 1/4	70	8 7/8	24 1/4	111	
18	TF354-18SG	TF354-18PG	27	18 1/2	7 1/8	27 1/2	8 5/8	13 15/16	51	52
24	TF354-24SG	TF354-24PG	33	23 5/16	9 3/16	35	8 5/8	15 3/8	60	61
30	TF354-30SG	TF354-30PG	39	28 3/16	11 1/4	41	9	17 3/16	69	70
36	TF354-36SG	TF354-36PG	45	33 1/16	13 1/4	46 3/4	9	18 9/16	77	79
42	TF354-42SG	TF354-42PG	51	37 7/8	15 1/4	52 1/2	9	20	88	90
48	TF354-48SG	TF354-48PG	57	42 11/16	17 1/4	59 1/2	9 3/8	21 13/16	105	107
54	TF354-54SG-1	TF354-54PG-1	63	47 1/2	19 1/4	64 3/4	9 3/8	23 5/16	113	116
60	TF354-60SG-1	TF354-60PG-1	69	52 5/8	21 1/4	70	9 3/8	24 5/8	124	127
18	TF364-18SG	TF364-18PG	27	17 3/4	7 1/8	27 1/2	9 1/8	14 1/4	54	57
24	TF364-24SG	TF364-24PG	33	22 5/8	9 3/16	35	9 1/8	15 11/16	63	68
30	TF364-30SG	TF364-30PG	39	27 1/2	11 1/4	41	9 1/2	17 1/2	73	78
36	TF364-36SG	TF364-36PG	45	32 5/16	13 1/4	46 3/4	9 1/2	18 15/16	82	89
42	TF364-42SG	TF364-42PG	51	37 3/16	15 1/4	52 1/2	9 1/2	20 3/8	94	101
48	TF364-48SG	TF364-48PG	57	42	17 1/4	59 1/2	9 7/8	22 1/8	111	120
54	TF364-54SG-1	TF364-54PG-1	63	46 13/16	19 1/4	64 3/4	9 7/8	23 9/16	121	130
60	TF364-60SG-1	TF364-60PG-1	69	51 5/8	21 1/4	70	9 7/8	25	132	143

CERTIFIED DIMENSIONS ON REQUEST.
SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.
DIMENSIONS IN INCHES. WEIGHTS IN POUNDS.

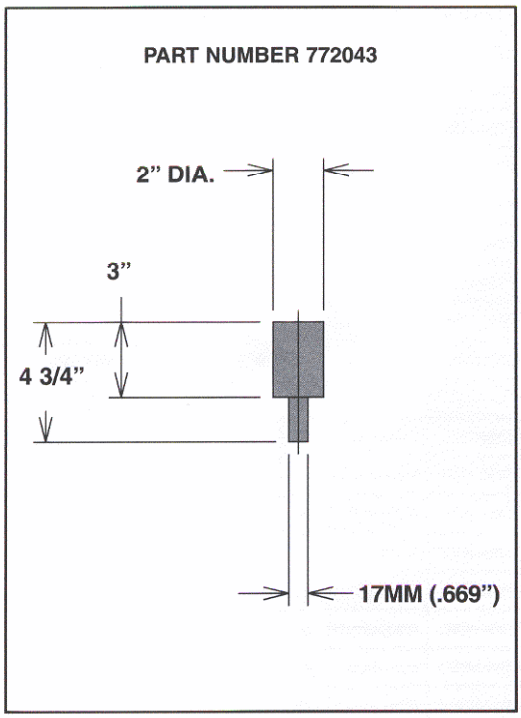
NOTES: **1.** Bolts, nuts, and washers for mounting are not included with idler.

2. 4" diameter ProRoll™ not available.

TUFKON® TROUGHING TRAINING IDLERS

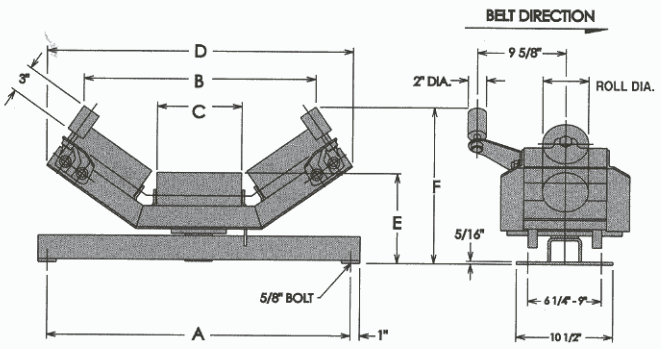


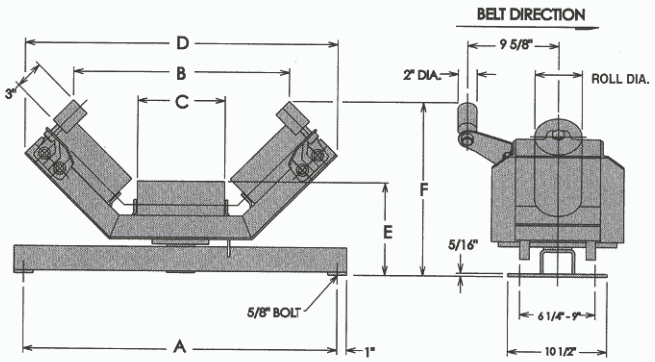
ACTUATING ROLL



		20°									
		PART NUMBER		DIMENSIONS						WEIGHT	
ROLL DIA.	BW	STEEL ROLL	*PRO-ROLL™*	A	B	C	D	E	F	STEEL ROLL	*PRO-ROLL™*
4"	18	TF342-18ST		27	23 1/16	7 1/8	27 11/16	9 1/4	14 1/16	82	
	24	TF342-24ST		33	28 15/16	9 3/16	33 7/16	9 1/4	14 3/4	90	
	30	TF342-30ST		39	34 13/16	11 1/4	39 9/16	9 1/4	15 1/2	111	
	36	TF342-36ST		45	40 9/16	13 1/4	44 15/16	9 1/4	16 3/16	123	
	42	TF342-42ST		51	46 5/16	15 1/4	50 3/4	9 1/4	16 7/8	132	
	48	TF342-48ST		57	52 1/16	17 1/4	56 1/2	9 5/8	17 15/16	149	
	54	TF342-54ST-1		63	57 7/8	19 1/4	62 1/4	9 5/8	18 5/8	166	
	60	TF342-60ST-1		69	63 5/8	21 1/4	68	9 5/8	19 1/4	179	
5"	18	TF352-18ST	TF352-18PT	27	23 1/16	7 1/8	27 11/16	9 3/4	14 1/16	86	87
	24	TF352-24ST	TF352-24PT	33	28 15/16	9 3/16	33 7/16	9 3/4	14 3/4	96	97
	30	TF352-30ST	TF352-30PT	39	34 13/16	11 1/4	39 9/16	9 3/4	15 1/2	118	119
	36	TF352-36ST	TF352-36PT	45	40 9/16	13 1/4	44 15/16	9 3/4	16 3/16	131	133
	42	TF352-42ST	TF352-42PT	51	46 5/16	15 1/4	50 3/4	9 3/4	16 7/8	141	143
	48	TF352-48ST	TF352-48PT	57	52 1/16	17 1/4	56 1/2	10 1/8	17 15/16	160	162
	54	TF352-54ST-1	TF352-54PT-1	63	57 7/8	19 1/4	62 1/4	10 1/8	18 5/8	177	180
	60	TF352-60ST-1	TF352-60PT-1	69	63 5/8	21 1/4	68	10 1/8	19 1/4	191	194
6"	18	TF362-18ST	TF362-18PT	27	23 1/16	7 1/8	27 11/16	10 1/4	14 1/16	89	92
	24	TF362-24ST	TF362-24PT	33	28 15/16	9 3/16	33 7/16	10 1/4	14 3/4	99	104
	30	TF362-30ST	TF362-30PT	39	34 13/16	11 1/4	39 9/16	10 1/4	15 1/2	122	127
	36	TF362-36ST	TF362-36PT	45	40 9/16	13 1/4	44 15/16	10 1/4	16 3/16	136	143
	42	TF362-42ST	TF362-42PT	51	46 5/16	15 1/4	50 3/4	10 1/4	16 7/8	147	154
	48	TF362-48ST	TF362-48PT	57	52 1/16	17 1/4	56 1/2	10 5/8	17 15/16	166	175
	54	TF362-54ST-1	TF362-54PT-1	63	57 7/8	19 1/4	62 1/4	10 5/8	18 5/8	185	194
	60	TF362-60ST-1	TF362-60PT-1	69	63 5/8	21 1/4	68	10 5/8	19 1/4	199	210

TUFKON® TROUGHING TRAINING IDLERS





		35°									
		PART NUMBER		DIMENSIONS						WEIGHT	
ROLL DIA.	BW	STEEL ROLL	*PRO-ROLL™*	A	B	C	D	E	F	STEEL ROLL	*PRO-ROLL™*
4"	18	TF343-18ST		27	19 1/16	7 1/8	28 5/16	9 1/4	15 11/16	84	
	24	TF343-24ST		33	24 7/16	9 3/16	33 9/16	9 1/4	16 1/8	97	
	30	TF343-30ST		39	29 13/16	11 1/4	38 7/8	9 1/4	18	114	
	36	TF343-36ST		45	35 1/16	13 1/4	44 1/8	9 1/4	19 9/16	124	
	42	TF343-42ST		51	40 3/8	15 1/4	49 7/16	9 1/4	20 5/16	136	
	48	TF343-48ST		57	45 5/8	17 1/4	54 11/16	9 5/8	21 7/8	160	
	54	TF343-54ST-1		63	50 15/16	19 1/4	59 15/16	9 5/8	23	167	
	60	TF343-60ST-1		69	56 3/16	21 1/4	65 1/4	9 5/8	24 1/8	179	
5"	18	TF353-18ST	TF353-18PT	27	19 1/16	7 1/8	28 5/16	9 3/4	15 11/16	88	89
	24	TF353-24ST	TF353-24PT	33	24 7/16	9 3/16	33 9/16	9 3/4	16 7/8	103	104
	30	TF353-30ST	TF353-30PT	39	29 13/16	11 1/4	38 7/8	9 3/4	18	121	122
	36	TF353-36ST	TF353-36PT	45	35 1/16	13 1/4	44 1/8	9 3/4	19 9/16	132	134
	42	TF353-42ST	TF353-42PT	51	40 3/8	15 1/4	49 7/16	9 3/4	20 5/16	145	147
	48	TF353-48ST	TF353-48PT	57	45 5/8	17 1/4	54 11/16	10 1/8	21 7/8	171	173
	54	TF353-54ST-1	TF353-54PT	63	50 15/16	19 1/4	59 15/16	10 1/8	23	178	181
	60	TF353-60ST-1	TF353-60PT	69	56 3/16	21 1/4	65 1/4	10 1/8	24 1/8	192	195
6"	18	TF363-18ST	TF363-18PT	27	19 1/16	7 1/8	28 5/16	10 1/4	15 11/16	91	94
	24	TF363-24ST	TF363-24PT	33	24 7/16	9 3/16	33 9/16	10 1/4	16 7/8	106	111
	30	TF363-30ST	TF363-30PT	39	29 13/16	11 1/4	38 7/8	10 1/4	18	125	130
	36	TF363-36ST	TF363-36PT	45	35 1/16	13 1/4	44 1/8	10 1/4	19 9/16	137	144
	42	TF363-42ST	TF363-42PT	51	40 3/8	15 1/4	49 7/16	10 1/4	20 5/16	151	158
	48	TF363-48ST	TF363-48PT	57	45 5/8	17 1/4	54 11/16	10 5/8	21 7/8	177	186
	54	TF363-54ST-1	TF363-54PT-1	63	50 15/16	19 1/4	59 15/16	10 5/8	23	186	195
	60	TF363-60 PT-1	TF363-60PT-1	69	56 3/16	21 1/4	65 1/4	10 5/8	24 1/8	200	211

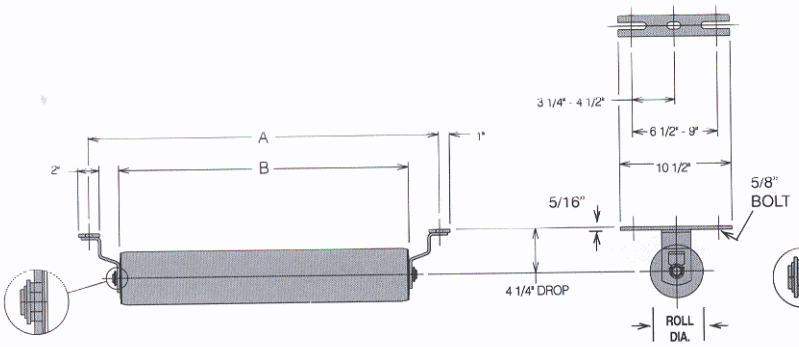
	45°									
	PART NUMBER		DIMENSIONS						WEIGHT	
BW	STEEL ROLL	*PRO-ROLL™*	A	B	C	D	E	F	STEEL ROLL	*PRO-ROLL™*
18	TF344-18ST		27	16	7 1/8	28 5/16	9 1/4	16 7/16	88	
24	TF344-24ST		33	20 7/8	9 3/16	33 9/16	9 1/4	17 1/8	98	
30	TF344-30ST		39	25 13/16	11 1/4	38	9 1/4	19 5/16	111	
36	TF344-36ST		45	30 5/8	13 1/4	42 13/16	9 1/4	20 3/4	126	
42	TF344-42ST		51	35 7/16	15 1/4	47 5/8	9 1/4	22 3/16	138	
48	TF344-48ST		57	40 5/16	17 1/4	52 1/2	9 5/8	23 15/16	158	
54	TF344-54ST-1		63	45 1/8	19 1/4	57 5/16	9 5/8	25 3/8	170	
60	TF344-60ST-1		69	49 15/16	21 1/4	62 1/8	9 5/8	26 3/4	181	
18	TF354-18ST	TF354-18PT	27	16	7 1/8	28 5/16	9 3/4	16 7/16	92	93
24	TF354-24ST	TF354-24PT	33	20 7/8	9 3/16	33 9/16	9 3/4	17 1/8	104	105
30	TF354-30ST	TF354-30PT	39	25 13/16	11 1/4	38	9 3/4	19 5/16	118	119
36	TF354-36ST	TF354-36PT	45	30 5/8	13 1/4	42 13/16	9 3/4	20 3/4	134	136
42	TF354-42ST	TF354-42PT	51	35 7/16	15 1/4	47 5/8	9 3/4	22 3/16	147	149
48	TF354-48ST	TF354-48PT	57	40 5/16	17 1/4	52 1/2	10 1/8	23 15/16	169	171
54	TF354-54ST-1	TF354-54PT-1	63	45 1/8	19 1/4	57 5/16	10 1/8	25 3/8	181	184
60	TF354-60ST-1	TF354-60PT-1	69	49 15/16	21 1/4	62 1/8	10 1/8	26 3/4	194	197
18	TF364-18ST	TF364-18PT	27	16	7 1/8	28 5/16	10 1/4	16 7/16	95	98
24	TF364-24ST	TF364-24PT	33	20 7/8	9 3/16	33 9/16	10 1/4	17 1/8	107	112
30	TF364-30 ST	TF364-30PT	39	25 13/16	11 1/4	38	10 1/4	19 5/16	122	127
36	TF364-36ST	TF364-36PT	45	30 5/8	13 1/4	42 13/16	10 1/4	20 3/4	139	146
42	TF364-42ST	TF364-42PT	51	35 7/16	15 1/4	47 5/8	10 1/4	22 3/16	153	160
48	TF364-48 ST	TF364-48PT	57	40 5/16	17 1/4	52 1/2	10 5/8	23 15/16	175	184
54	TF364-54ST-1	TF364-54PT-1	63	45 1/8	19 1/4	57 5/16	10 5/8	25 3/8	189	198
60	TF364-60ST-1	TF364-60PT-1	69	49 15/16	21 1/4	62 1/8	10 5/8	26 3/4	202	213

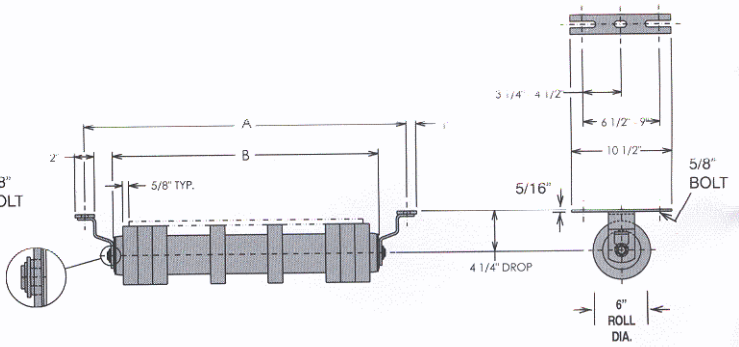
CERTIFIED DIMENSIONS ON REQUEST.
SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.
DIMENSIONS IN INCHES. WEIGHTS IN POUNDS.

NOTES: 1. Bolts, nuts, and washers for mounting are not included with idler.

2. 4" diameter ProRoll™ not available.

TUFKON® RETURN IDLERS





RETURN IDLERS

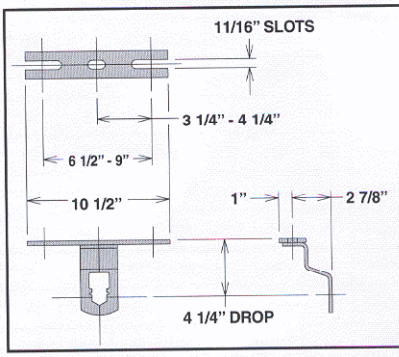
ROLL DIA.	BW	PART NUMBER STEEL ROLL	PART NUMBER *PRO-ROLL™*	DIMENSIONS A	DIMENSIONS B	WEIGHT STEEL ROLL	WEIGHT *PRO-ROLL™*
4"	18	TF340-18SR-1		27	21¼	17	
	24	TF340-24SR-1		33	27¼	20	
	30	TF340-30SR-1		39	33¼	24	
	36	TF340-36SR-1		45	39¼	27	
	42	TF340-42SR-1		51	45¼	31	
	48	TF340-48SR-1		57	51¼	34	
	54	TF340-54SR-1		63	57¼	43	
	60	TF340-60SR-1		69	63¼	47	
5"	18	TF350-18SR-1	TF350-18PR-1	27	21¼	21	22
	24	TF350-24SR-1	TF350-24PR-1	33	27¼	26	27
	30	TF350-30SR-1	TF350-30PR-1	39	33¼	30	32
	36	TF350-36SR-1	TF350-36PR-1	45	39¼	35	37
	42	TF350-42SR-1	TF350-42PR-1	51	45¼	40	42
	48	TF350-48SR-1	TF350-48PR-1	57	51¼	44	47
	54	TF350-54SR-1	TF350-54PR-1	63	57¼	53	57
	60	TF350-60SR-1	TF350-60PR-1	69	63¼	61	62
6"	18	TF360-18SR-1	TF360-18PR-1	27	21¼	24	27
	24	TF360-24SR-1	TF360-24PR-1	33	27¼	29	33
	30	TF360-30SR-1	TF360-30PR-1	39	33¼	34	40
	36	TF360-36SR-1	TF360-36PR-1	45	39¼	40	46
	42	TF360-42SR-1	TF360-42PR-1	51	45¼	45	53
	48	TF360-48SR-1	TF360-48PR-1	57	51¼	51	59
	54	TF360-54SR-1	TF360-54PR-1	63	57¼	61	70
	60	TF360-60SR-1	TF360-60PR-1	69	63¼	67	77

CERTIFIED DIMENSIONS ON REQUEST.
SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.
DIMENSIONS IN INCHES. WEIGHTS IN POUNDS.

RUBBER DISC RETURN

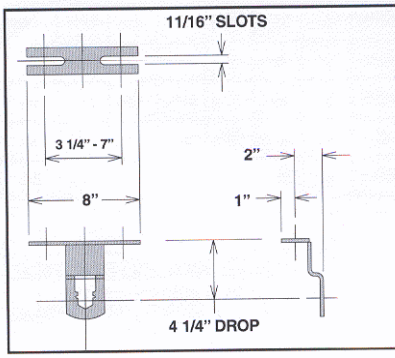
BW	PART NUMBER RUBBER DISC RETURN	DIMENSIONS A	DIMENSIONS B	DIMENSIONS NO. DISCS	WEIGHT RUBBER DISC
18	TF360-18RR-1	27	21¼	7	25
24	TF360-24RR-1	33	27¼	8	30
30	TF360-30RR-1	39	33¼	10	36
36	TF360-36RR-1	45	39¼	11	41
42	TF360-42RR-1	51	45¼	12	45
48	TF360-48RR-1	57	51¼	13	50
54	TF360-54RR-1	63	57¼	14	60
60	TF360-60RR-1	69	63¼	14	64

RETURN HANGERS



PART NUMBER
72A3602

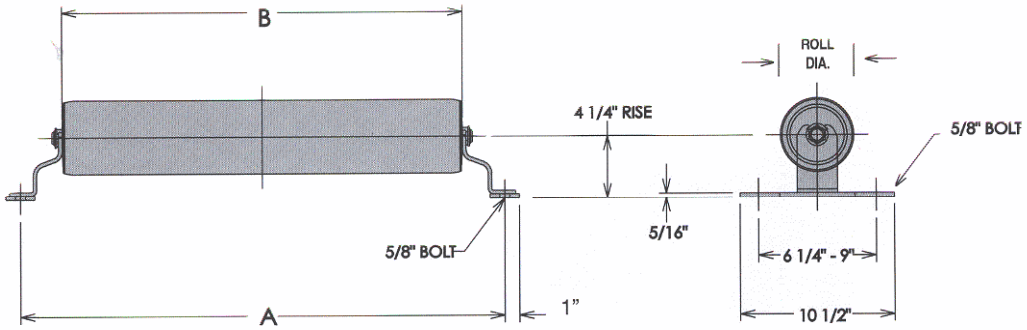
THIS HANGER IS ***NEW*** TUFKON® STANDARD FOR USE WITH TF ROLLS HAVING FLAT/FLAT DIMENSION OF BW+3 1/4"



PART NUMBER
500540

THIS HANGER IS ***OLD*** TUFKON® STANDARD FOR USE WITH TF ROLLS HAVING FLAT/FLAT DIMENSION OF BW+5"

TUFKON® FLAT BELT CARRYING IDLERS



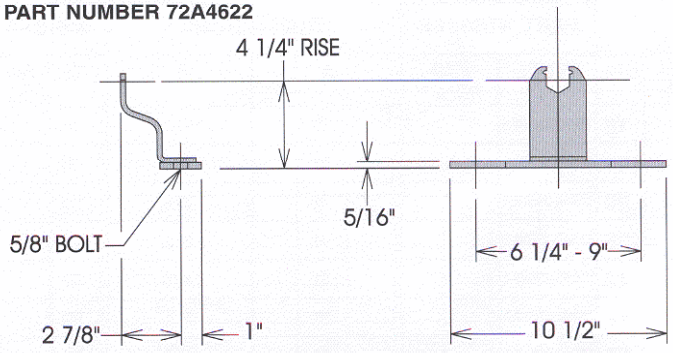
		FLAT BELT CARRYING IDLER					
		PART NUMBER		DIMENSIONS		WEIGHT	
ROLL DIA.	BW	STEEL ROLL	*PRO-ROLL™*	A	B	STEEL ROLL	*PRO-ROLL™*
4"	18	TF340-18SF-1		27	21 1/4	17	
	24	TF340-24SF-1		33	27 1/4	20	
	30	TF340-30SF-1		39	33 1/4	24	
	36	TF340-36SF-1		45	39 1/4	27	
	42	TF340-42SF-1		51	45 1/4	31	
	48	TF340-48SF-1		57	51 1/4	34	
	54	TF340-54SF-1		63	57 1/4	43	
	60	TF340-60SF-1		69	63 1/4	47	
5"	18	TF350-18SF-1	TF350-18PF-1	27	21 1/4	21	22
	24	TF350-24SF-1	TF350-24PF-1	33	27 1/4	26	27
	30	TF350-30SF-1	TF350-30PF-1	39	33 1/4	30	32
	36	TF350-36SF-1	TF350-36PF-1	45	39 1/4	35	37
	42	TF350-42SF-1	TF350-42PF-1	51	45 1/4	40	42
	48	TF350-48SF-1	TF350-48PF-1	57	51 1/4	44	47
	54	TF350-54SF-1	TF350-54PF-1	63	57 1/4	53	57
	60	TF350-60SF-1	TF350-60PF-1	69	63 1/4	61	62
6"	18	TF360-18SF-1	TF360-18PF-1	27	21 1/4	24	27
	24	TF360-24SF-1	TF360-24PF-1	33	27 1/4	29	33
	30	TF360-30SF-1	TF360-30PF-1	39	33 1/4	34	40
	36	TF360-36SF-1	TF360-36PF-1	45	39 1/4	40	46
	42	TF360-42SF-1	TF360-42PF-1	51	45 1/4	45	53
	48	TF360-48SF-1	TF360-48PF-1	57	51 1/4	51	59
	54	TF360-54SF-1	TF360-54PF-1	63	57 1/4	61	70
	60	TF360-60SF-1	TF360-60PF-1	69	63 1/4	67	77

NOTES: **1.** Bolts, nuts, and washers for mounting are not included with idler.

2. 4" diameter ProRoll™ not available.

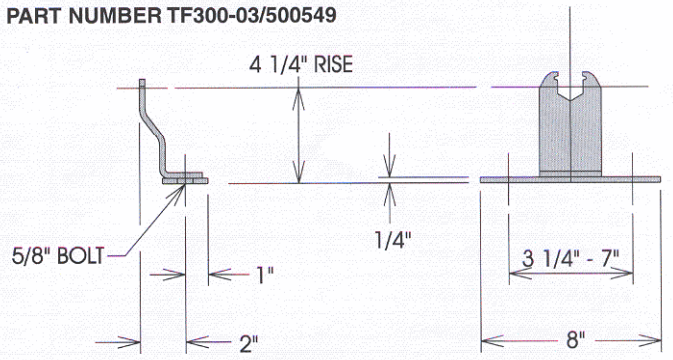
RISE BRACKETS

PART NUMBER 72A4622



THIS RISE BRACKET IS *NEW* TUFKON® STANDARD FOR USE WITH TF ROLLS HAVING FLAT/FLAT DIMENSION OF BW+3 1/4"

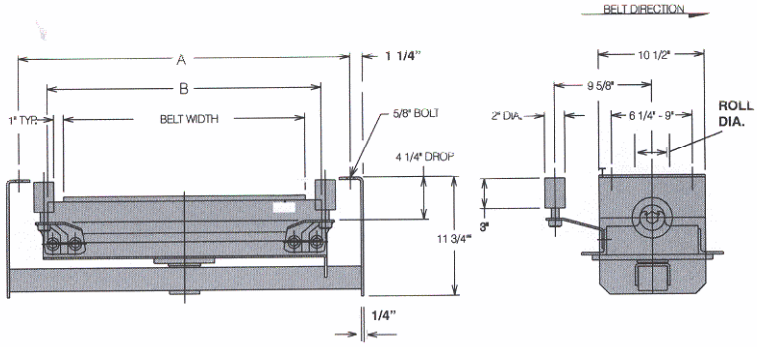
PART NUMBER TF300-03/500549

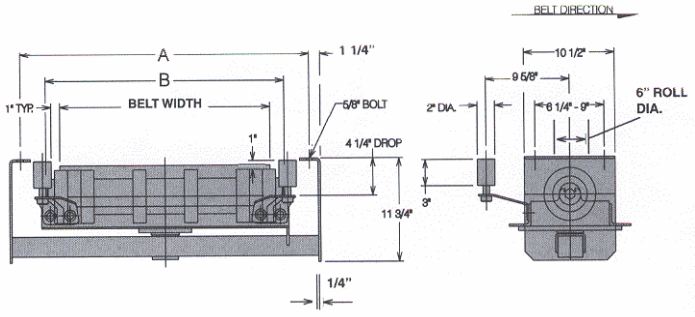


THIS RISE BRACKET IS *OLD* TUFKON® STANDARD FOR USE WITH TF ROLLS HAVING FLAT/FLAT DIMENSION OF BW+5"

CONTACT FACTORY FOR OTHER DROP AND RISE HEIGHTS.

TUFKON® RETURN TRAINING IDLER





		RETURN TRAINER					
		PART NUMBER		DIMENSIONS		WEIGHT	
ROLL DIA.	BW	STEEL	*PRO-ROLL™*	A	B	STEEL	*PRO-ROLL™*
4"	18	TF340-18SW-1		27	21¼	89	
	24	TF340-24SW-1		33	27¼	96	
	30	TF340-30SW-1		39	33¼	115	
	36	TF340-36SW-1		45	39¼	124	
	42	TF340-42SW-1		51	45¼	134	
	48	TF340-48SW-1		57	51¼	143	
	54	TF340-54SW-1		63	57¼	158	
	60	TF340-60SW-1		69	63¼	169	
5"	18	TF350-18SW-1	TF350-18PW-1	27	21¼	93	94
	24	TF350-24SW-1	TF350-24PW-1	33	27¼	101	103
	30	TF350-30SW-1	TF350-30PW-1	39	33¼	121	123
	36	TF350-36SW-1	TF350-36PW-1	45	39¼	132	134
	42	TF350-42SW-1	TF350-42PW-1	51	45¼	142	145
	48	TF350-48SW-1	TF350-48PW-1	57	51¼	153	155
	54	TF350-54SW-1	TF350-54PW-1	63	57¼	168	172
	60	TF350-60SW-1	TF350-60PW-1	69	63¼	181	184
6"	18	TF360-18SW-1	TF360-18PW-1	27	21¼	95	99
	24	TF360-24SW-1	TF360-24PW-1	33	27¼	105	109
	30	TF360-30SW-1	TF360-30PW-1	39	33¼	125	131
	36	TF360-36SW-1	TF360-36PW-1	45	39¼	137	143
	42	TF360-42SW-1	TF360-42PW-1	51	45¼	148	156
	48	TF360-48SW-1	TF360-48PW-1	57	51¼	160	168
	54	TF360-54SW-1	TF360-54PW-1	63	57¼	176	185
	60	TF360-60SW-1	TF360-60PW-1	69	63¼	189	199

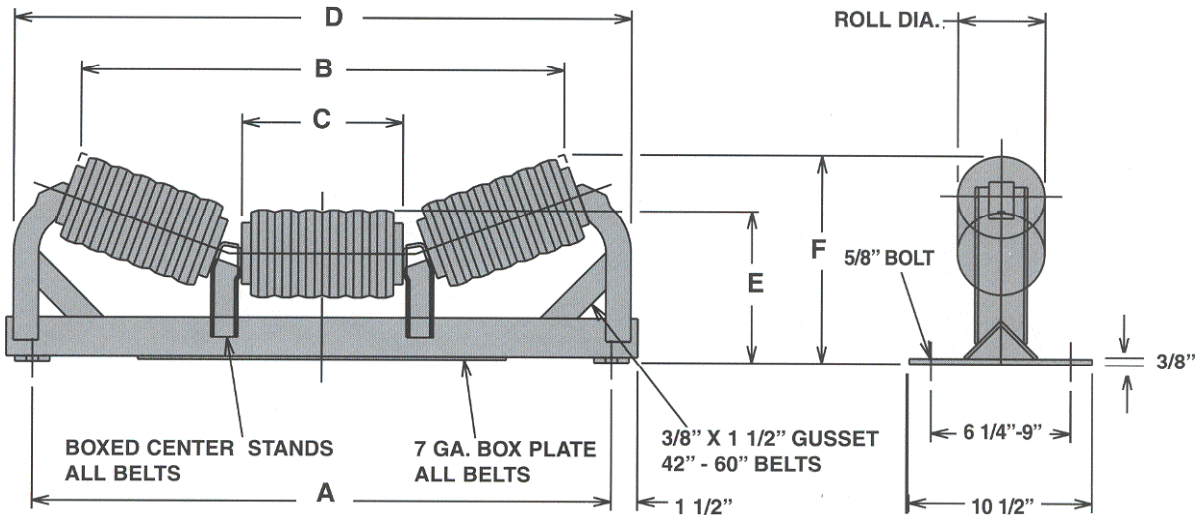
	RUBBER DISC RETURN TRAINER				
	PART NUMBER	DIMENSIONS			WEIGHT
BW		A	B	NO. DISCS	
18	TF360-18RW-1	27	21¼	7	94
24	TF360-24RW-1	33	27¼	8	102
30	TF360-30RW-1	39	33¼	10	122
36	TF360-36RW-1	45	39¼	11	132
42	TF360-42RW-1	51	45¼	12	142
48	TF360-48RW-1	57	51¼	13	152
54	TF360-54RW-1	63	57¼	14	162
60	TF360-60RW-1	69	63¼	14	172

CERTIFIED DIMENSIONS ON REQUEST.
SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.
DIMENSIONS IN INCHES. WEIGHTS IN POUNDS.

NOTES: 1. Bolts, nuts, and washers for mounting are not included with idler.

2. 4" diameter ProRoll™ not available.

TUFKON® IMPACT IDLERS



		20°							
		PART NUMBER	DIMENSIONS						WEIGHT
ROLL DIA.	BW	GC SERIES	A	B	C	D	E	F	IMPACT ROLL
5"	24	GC352-24RI	33	27 3/8	9 1/8	35	8 3/4	12	70
	30	GC352-30RI	39	33 1/4	11 3/16	41	9 1/8	13 1/16	77
	36	GC352-36RI	45	39 1/4	13 1/4	46 15/16	9 1/8	13 3/4	94
	42	GC352-42RI	51	45 5/16	15 3/8	53	9 1/8	14 1/2	103
	48	GC352-48RI	57	51 1/4	17 7/16	58 15/16	9 1/2	15 9/16	116
	54	GC352-54RI	63	57 1/4	19 1/2	64 7/8	9 1/2	16 1/4	131
	60	GC352-60RI	69	63 5/16	21 5/8	71	9 1/2	17	143
6"	24	GC362-24RI	33	27	9 1/8	35	9 1/4	12 7/16	75
	30	GC362-30RI	39	32 15/16	11 3/16	41	9 5/8	13 1/2	83
	36	GC362-36RI	45	38 7/8	13 1/4	46 15/16	9 5/8	14 1/4	102
	42	GC362-42RI	51	45	15 3/8	53	9 5/8	14 15/16	112
	48	GC362-48RI	57	50 15/16	17 7/16	58 15/16	10	16	126
	54	GC362-54RI	63	56 7/8	19 1/2	64 7/8	10	16 3/4	142
	60	GC362-60RI	69	63	21 5/8	71	10	17 1/2	155

	35°						
	PART NUMBER	DIMENSIONS					WEIGHT
BW	GC SERIES	A	B	C	D	E	F	IMPACT ROLL
24	GC353-24RI	33	24 15/16	9 1/8	34 15/16	8 3/4	13 15/16	70
30	GC353-30RI	39	30 3/8	11 3/16	40 3/8	9 1/8	15 1/2	78
36	GC353-36RI	45	35 13/16	13 1/4	45 13/16	9 1/8	16 11/16	95
42	GC353-42RI	51	41 7/16	15 3/8	51 7/16	9 1/8	17 15/16	105
48	GC353-48RI	57	46 7/8	17 7/16	56 7/8	9 1/2	19 1/2	119
54	GC353-54RI	63	52 5/16	19 1/2	62 5/16	9 1/2	20 5/8	135
60	GC353-60RI	69	57 15/16	21 5/8	67 15/16	9 1/2	21 7/8	147
24	GC363-24RI	33	24 3/8	9 1/8	34 15/16	9 1/4	14 3/8	75
30	GC363-30RI	39	29 13/16	11 3/16	40 3/8	9 5/8	15 15/16	84
36	GC363-36RI	45	35 1/4	13 1/4	45 13/16	9 5/8	17 1/16	103
42	GC363-42RI	51	40 7/8	15 3/8	51 7/16	9 5/8	18 5/16	113
48	GC363-48RI	57	46 5/16	17 7/16	56 7/8	10	19 7/8	129
54	GC363-54RI	63	51 3/4	19 1/2	62 5/16	10	21 1/16	146
60	GC363-60RI	69	57 3/8	21 5/8	67 15/16	10	22 1/4	160

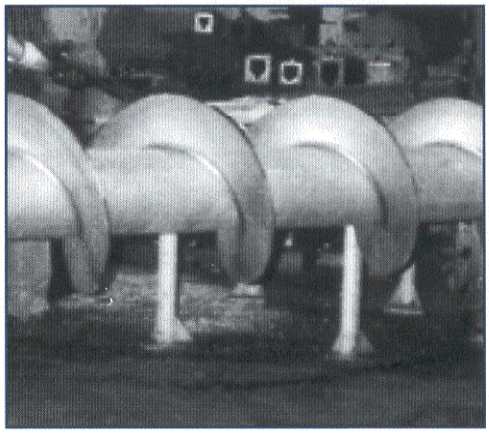
CERTIFIED DIMENSIONS ON REQUEST.
SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.
DIMENSIONS IN INCHES. WEIGHTS IN POUNDS.

NOTES: **1.** Bolts, nuts, and washers for mounting are not included with idler.

2. 4" diameter ProRoll™ not available.

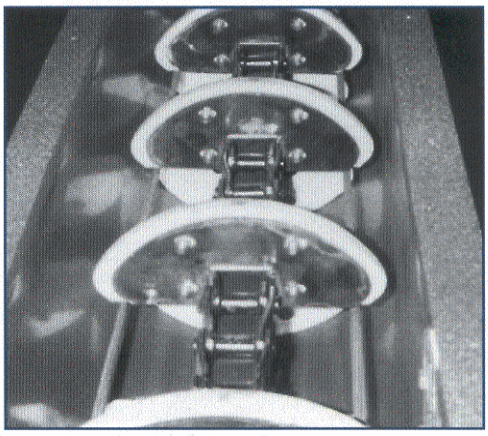
At Goodman Conveyor Company (formerly The Jeffery Manufacturing Company) we use the full range of our experience and problem-solving capabilities to produce the highest quality products and the most innovative solutions for your bulk materials handling needs.

IDLERS
Patented non-purgeable PermaSeal II®



SCREW CONVEYORS
Customized solutions for your specific needs.

BUCKET ELEVATORS
Reliability preformance and experience.



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TGCC 5M/1/99

Let Hewitt-Robins Solve Your Loading Area Problems with the SpringRider

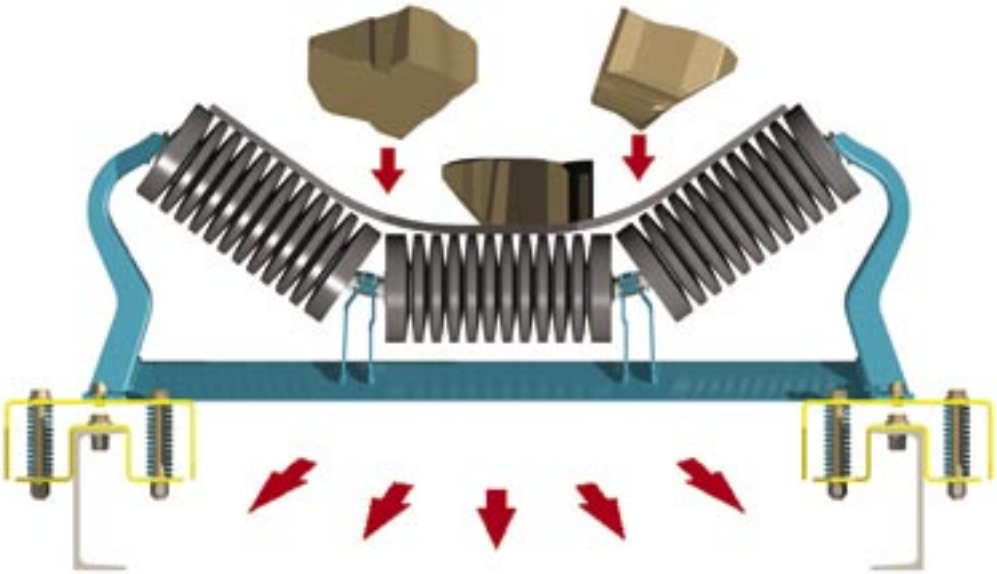
Also available with two idler design.

SpringRider *The Ultimate Impact Protection*

Protect Your Conveyor Belt and Components with the SpringRider

The SpringRider™ is a patented, spring-loaded system designed to protect your conveyor belt and idlers in loading areas handling heavy or abrasive materials. The SpringRider is designed to work where many other impact systems fail. By absorbing the impact in loading areas, downtime and additional equipment costs associated with conveyor damage occurring at loading points are reduced.

The SpringRider utilizes springs to absorb the impact of heavy loads incurred at transfer points. With SpringRider technology, you get the benefit of vertical and lateral impact protection. As a result, equipment repair or replacement and associated downtime are reduced.



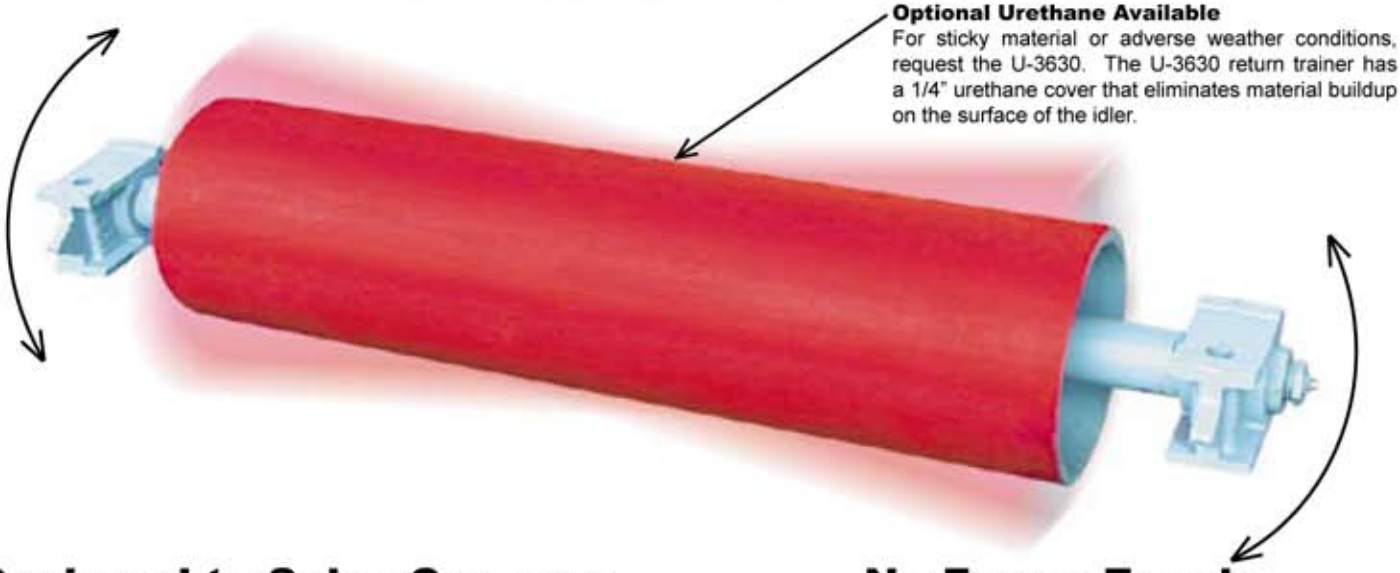
Mounts on Existing Frames

Since the SpringRider can be mounted on standard conveyor frames, installation is easy. Whether your requirement is for a new conveyor system or for an existing conveyor, the SpringRider is a proven product designed to reduce your overall costs in loading areas.

The SpringRider is available in 36" through 72" belt widths.

Hewitt-Robins products pictured, described, or listed in this publication are illustrative only. Application and use of these products must be in accordance with applicable codes and regulations and must be arranged and/or provided with covers or other guards where necessary to assure safety of personnel.

Let Hewitt-Robins Solve Your Belt Training Problems with the Wobbler

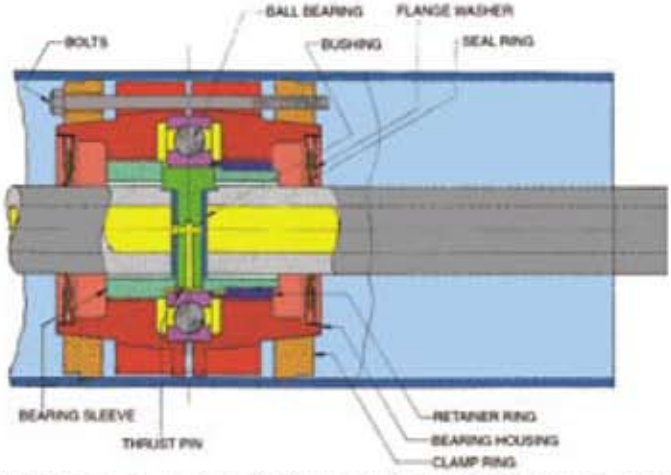


Designed to Solve Common Belt Training Problems

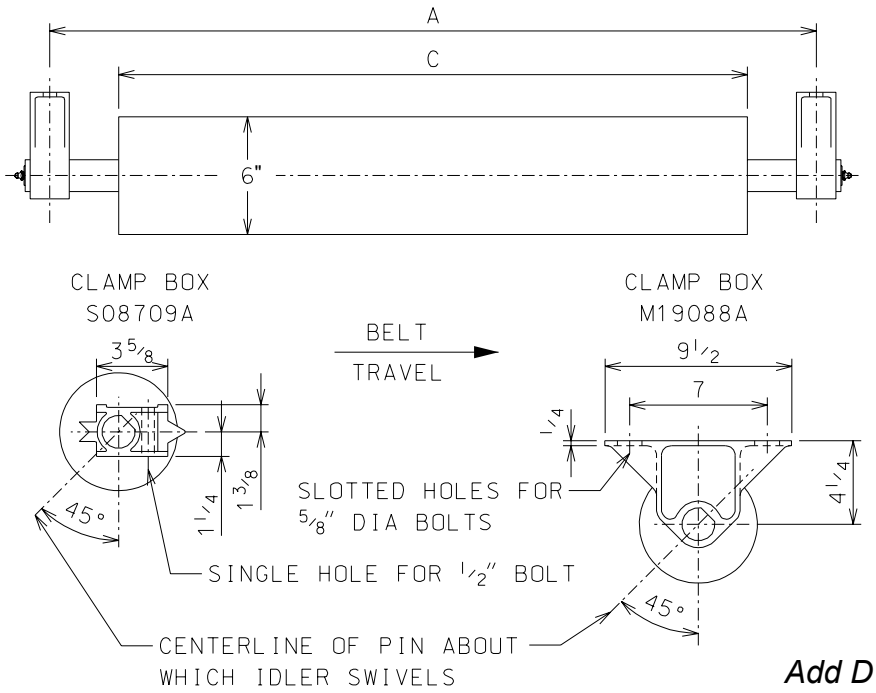
The Wobbler from Hewitt-Robins is a special return training idler designed to train your conveyor belt. Its unique design, a steel roll centered on a 60mm ball bearing, pivots when the conveyor belt moves off center and guides it back to allow for a more efficient operating conveyor. The Wobbler is available in belt widths from 18" to 60".

No Frame Equals Less Material Buildup

The Wobbler also solves another common problem. Most trainers have complex frames which accumulate so much material that the roll jams causing possible de-training and damage to the belt. The 3630 return training idler is held in place by two simple brackets with no framework to collect material. Lubrication can be accomplished from either side.



The Wobbler is a return training idler made up of a tubular roll mounted on an anti-friction bearing in the center of the tube. The idler is pivoted on an inclined, fixed swivel pin. If the weight of the belt falls more on one side than the other, the heavy side rocks downward and forward, skewing the roller and guiding the belt to its central position.



3630 and 3630D				
BW	A	C	3630 WT.	3630D WT.
18	27	20	59	63
24	33	26	67	71
30	39	32	75	79
36	45	38	83	87
42	51	44	91	95
48	57	50	99	103
54	63	56	107	111
60	69	62	115	119

Add D to part number for 4 1/4" drop bracket.
Available in 6" diameter rolls only.

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THINK

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Website: www.hewitt-robins.com

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Hewitt-Robins
CONVEYOR COMPONENTS

Pulleys

Welded Steel Drum Pulleys

Hewitt-Robins drum pulleys are designed utilizing a single-piece rolled plate rim, continuously welded end discs and extra strength intermediate discs, as required. End disc accuracy is assured by utilizing computer controlled processes. Pulleys are tested for T.I.R. requirements and supplied with hubs bored as specified by the customer. As a standard, drum pulleys are crowned* to assist with proper belt alignment. Straight face designs are available, but must be specified.

*Hewitt-Robins pulleys are crowned 1/16" to 1/8" on the diameter per foot of total face width.

Highlights:

- Crown face standard—straight face available upon request.
- Hubs welded inside and outside of end disc to ensure strength and increased life.
- Heavy duty pulleys meet all CEMA/ANSI specifications.
- Mine duty pulleys constructed for severe applications.
- XT EQUIVALENT hubs and bushings are standard. QD hubs are available.

Options:

- Hot vulcanized lagging
- Shafts
- Mounted bearings
- Take-ups
- Keyless locking assemblies
- Machined faces for close T.I.R. tolerances

Hewitt-Robins provides vulcanized rubber lagging as an option. Lagged pulleys are most often used on the head shaft pulley where friction is desired between the belting and pulley or to prevent slippage and prolong wear life when excessive foreign materials are present. Lagging can be furnished in various thicknesses and types.

As an option, Hewitt-Robins can supply slide lagging pulleys. This type pulley can reduce downtime and save money if pulley lagging needs to be replaced immediately or if the pulley is in a restricted space. Slide lagging can be applied on-site and typically allows a pulley to return to service much quicker than utilizing conventional pulley lagging methods.

Ceremic, urethane, and a variety of other lagging types are available. Contact your Hewitt-Robins representative for complete details.

Caution: CEMA duty and mine duty pulleys are not designed for applications using steel cable belts.

Heavy Duty CEMA Class Drum Pulleys with Tapered XT Bushings Included

Dia	XT Hub	Max Bore	12" Face	14" Face	16" Face	18" Face	20" Face	22" Face	24" Face	26" Face	30" Face	32" Face	36" Face
			Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.
10"	25	2 7/16	45	49	53	56	60	63	67	77	85	88	96
	35	3 7/16	57	60	64	67	71	75	79	88	95	99	106
	40	3 15/16	67	70	74	79	82	88	89	97	105	103	116
12"	25	2 7/16	55	60	64	68	72	78	82	94	103	107	116
	35	3 7/16	67	71	75	80	85	89	93	104	116	121	130
	40	3 15/16	78	82	86	91	95	99	103	114	126	131	140
14"	25	2 7/16	62	67	72	78	83	88	92	108	118	123	139
	35	3 7/16	73	78	84	89	94	99	104	119	139	144	154
	40	3 15/16	85	90	95	100	105	109	119	130	171	179	192
	45	4 7/16	118	124	132	138	145	152	158	173	187	194	207
16"	25	2 7/16	72	79	85	90	96	101	107	128	139	145	156
	35	3 7/16	85	90	96	102	107	113	119	138	150	155	180
	40	3 15/16	95	101	106	112	118	123	139	148	160	165	189
	45	4 7/16	134	141	149	156	164	171	180	198	213	221	237
18"	25	2 7/16	97	105	114	122	131	139	146	173	191	200	216
	35	3 7/16	108	117	125	134	143	151	159	185	202	210	227
	40	3 15/16	119	128	136	145	145	161	170	195	212	220	238
	45	4 7/16	137	145	153	162	170	179	188	211	228	237	254
	60	5 7/16	181	190	199	207	215	224	233	255	272	281	298
20"	25	2 7/16	111	120	130	139	148	158	167	198	217	226	248
	35	3 7/16	122	132	141	151	160	169	179	209	226	238	257
	40	3 15/16	133	143	152	161	170	180	190	219	239	248	287
	45	4 7/16	150	160	169	171	188	197	207	236	254	259	283
	60	5 7/16	200	209	218	227	238	247	256	284	303	312	330
24"	25	2 7/16	141	153	164	175	186	197	209	251	273	285	304
	35	3 7/16	153	164	175	187	195	209	220	262	285	296	319
	40	3 15/16	164	174	186	197	206	219	231	272	295	306	328
	45	4 7/16	181	192	203	214	225	237	246	289	311	322	345
	60	5 7/16	240	251	262	273	285	296	307	347	369	380	403
	60	6	316	330	344	358	371	286	400	440	466	481	510
30"	35	3 7/16	251	266	286	303	320	338	355	420	455	472	507
	40	3 15/16	261	278	296	313	330	348	365	430	465	482	517
	45	4 7/16	277	295	312	329	340	385	383	446	480	496	532
	60	5 7/16	308	326	344	361	379	397	414	476	511	528	583
	60	6	343	360	377	395	412	429	447	509	544	561	596
36"	40	3 15/16	396	421	446	470	496	620	546	656	706	731	781
	45	4 7/16	412	437	462	487	512	537	562	671	720	746	796
	60	5 7/16	401	468	493	518	543	566	593	701	750	775	835
	60	6	395	461	526	551	576	601	625	732	782	807	857
	70	7	420	490	560	630	655	680	705	809	859	883	933
42"	45	4 7/16	464	541	618	696	724	754	782	928	966	1015	1073
	60	5 7/16	483	564	645	725	755	783	813	957	1015	1043	1102
	70	6 15/16	505	589	674	758	786	816	845	988	1047	1075	1133
	70	7	558	649	742	834	834	893	922	1082	1011	1149	1207
48"	45	4 7/16	569	664	759	854	866	920	953	1171	1237	1270	1337
	60	5 7/16	589	687	785	883	916	950	982	1189	1265	1298	1385
	60	6	611	712	814	916	949	982	1015	1230	1296	1329	1395
	70	7	662	772	882	992	1025	1059	1091	1344	1389	1403	1469
54"	60	5 7/16	705	823	940	1058	1094	1132	1169	1440	1515	1552	1627
	60	6	726	847	988	1059	1127	1164	1202	1472	1546	1583	1658
	70	7	778	906	1037	1116	1204	1241	1276	1545	1620	1656	1731
60"	60	5 7/16	832	971	1110	1248	1289	1330	1372	1705	1787	1829	1808
	60	6	853	995	1136	1280	1252	1383	1405	1736	1819	1859	2194
	70	7	905	1056	1207	1358	1398	1439	1481	1809	1892	1933	2266

For mine duty drums consult factory. All weights are approximate. Consult factory for certified specifications.

Heavy Duty CEMA Class Drum Pulleys with Tapered XT Bushings Included

Dia	XT Hub	Max Bore	38" Face	40" Face	42" Face	44" Face	46" Face	51" Face	54" Face	57" Face	60" Face	63" Face	66" Face
			Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.
10"	25	2 7/16	99	103	107	110	119	129	147	155	162	170	181
	35	3 7/16	110	114	117	121	130	139	168	176	183	189	193
	40	3 15/16	120	123	128	132	139	148	173	184	191	199	207
12"	25	2 7/16	120	125	130	134	146	156	192	201	210	219	234
	35	3 7/16	135	139	143	148	159	169	214	223	232	239	254
	40	3 15/16	144	149	153	157	167	179	222	231	240	249	282
14"	25	2 7/16	144	186	192	199	215	233	243	252	262	272	293
	35	3 7/16	159	205	211	218	234	251	251	271	282	292	210
	40	3 15/16	199	214	220	227	243	259	269	279	290	300	318
	45	4 7/16	213	220	227	234	248	285	274	285	302	312	329
16"	25	2 7/16	162	210	218	225	253	271	284	295	306	317	342
	35	3 7/16	165	240	247	255	274	294	305	316	328	340	363
	40	3 15/16	195	249	256	263	284	302	314	325	337	348	371
	45	4 7/16	244	262	289	277	296	315	326	338	349	361	383
18"	25	2 7/16	225	234	242	251	285	305	326	340	352	365	395
	35	3 7/16	237	260	269	277	316	340	352	365	377	391	419
	40	3 15/16	246	270	278	288	326	348	361	373	387	399	427
	45	4 7/16	282	285	294	302	325	347	428	445	460	475	506
	60	5 7/16	306	327	337	345	366	388	469	485	501	516	546
20"	25	2 7/16	255	264	273	284	322	357	391	405	419	434	468
	35	3 7/16	266	275	285	295	334	358	402	416	430	445	479
	40	3 15/16	276	286	295	305	344	365	411	424	439	453	488
	45	4 7/16	293	302	311	320	438	466	485	502	519	537	573
	60	5 7/16	341	350	359	359	464	494	512	529	547	564	600
24"	25	2 7/16	315	319	330	342	383	411	461	477	494	511	558
	35	3 7/16	330	342	353	364	405	434	480	497	514	530	577
	40	3 15/16	341	352	363	374	415	433	469	506	523	540	587
	45	4 7/16	356	450	464	473	520	555	576	597	618	640	669
	60	5 7/16	414	506	520	535	575	610	631	653	673	695	743
	60	6	524	538	552	566	606	641	748	773	824	849	906
30"	35	3 7/16	524	542	559	576	766	818	850	880	912	944	1032
	40	3 15/16	534	552	569	587	777	828	860	890	922	954	1042
	45	4 7/16	550	567	584	602	789	842	872	904	935	965	1055
	60	5 7/16	580	598	615	632	817	869	901	932	963	995	1081
	60	6	613	630	648	665	848	901	931	983	995	1025	1111
36"	40	3 15/16	806	830	856	880	991	1054	1091	1128	1166	1204	1326
	45	4 7/16	820	846	870	896	1005	1067	1104	1141	1170	1216	1338
	60	5 7/16	850	875	900	925	1032	1094	1132	1170	1207	1244	1385
	60	6	882	907	932	957	1064	1128	1163	1201	1238	1275	1394
	70	7	958	983	1008	1033	1136	1199	1238	1274	1311	1348	1465
42"	45	4 7/16	1103	1131	1161	1089	1335	1408	1451	1491	1538	1582	1742
	60	5 7/16	1131	1160	1189	1218	1362	1435	1478	1522	1566	1609	1768
	70	6 15/16	1162	1191	1220	1250	1392	1465	1509	1552	1595	1639	1796
	70	7	1236	1265	1293	1323	1463	1535	1891	1949	2008	2067	2257
48"	45	4 7/16	1369	1403	1436	1468	1944	2055	2121	2188	2255	2322	2570
	60	5 7/16	1397	1413	1464	1496	1972	2083	2149	2216	2283	2350	2596
	60	6	1429	1462	1494	1528	2001	2112	2180	2246	2313	2380	2627
	70	7	1501	1535	1568	1601	2071	2182	2249	2315	2383	2449	2892
54"	60	5 7/16	1664	1953	2003	2053	2336	2481	2536	2811	2856	2761	3068
	60	6	1695	1985	2035	2089	2385	2491	2565	2641	2715	2791	3097
	70	7	1769	2058	2108	2158	2435	2560	2263	2710	2785	2880	3162
60"	60	5 7/16	1862	2170	2226	2281	2595	2735	2817	2901	2984	2066	3409
	60	6	2492	2304	2360	2415	2759	2893	2980	3064	3147	3230	3602
	70	7	2323	2378	2433	2489	2828	2967	3050	3133	3216	3300	3667

For mine duty drums consult factory. All weights are approximate. Consult factory for certified specifications.

Heavy Duty CEMA Class Wing Pulleys with Tapered XT Bushings Included

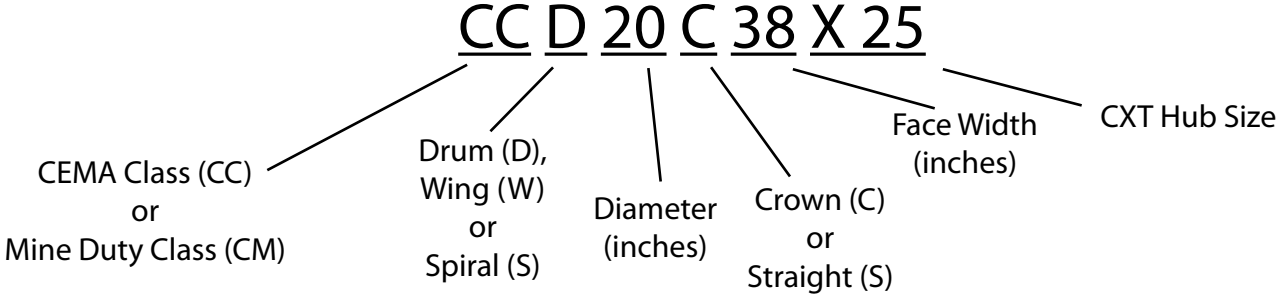
Dia	XT Hub	Max Bore	12" Face	14" Face	16" Face	18" Face	20" Face	22" Face	24" Face	26" Face	30" Face	32" Face	36" Face
			Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.
8"	25	2 7/16	32	36	40	44	48	52	56	60	68	72	81
10"	30	2 15/16	40	45	50	55	60	66	71	77	88	93	104
	35	3 7/16	49	54	59	65	70	75	81	86	97	102	112
	40	3 15/16	62	63	68	73	80	84	89	95	105	111	121
12"	30	2 15/16	50	57	64	71	80	87	94	101	116	123	138
	35	3 7/16	59	68	73	80	87	94	101	108	122	130	144
	40	3 15/16	72	75	82	89	96	103	110	117	132	149	154
14"	30	2 15/16	61	70	79	88	97	106	115	124	143	152	170
	35	3 7/16	69	79	87	96	104	111	121	130	149	157	175
	40	3 15/16	83	87	96	104	113	121	131	140	157	166	185
	45	4 7/16	104	106	111	120	129	137	146	154	171	181	197
16"	30	2 15/16	69	80	90	99	109	119	131	141	161	171	193
	35	3 7/16	78	87	97	107	116	126	137	147	167	177	198
	40	3 15/16	91	96	105	115	125	135	146	155	175	186	206
	45	4 7/16	113	106	121	131	141	150	160	169	190	199	219
18"	30	2 15/16	87	100	112	125	138	151	164	177	204	217	245
	35	3 7/16	94	106	118	131	143	153	168	182	207	220	247
	40	3 15/16	107	113	125	138	151	166	174	189	214	227	253
	45	4 7/16	130	135	141	152	164	176	189	201	223	239	263
	60	5 7/16	158	163	168	181	194	206	219	232	258	270	297
20"	30	2 15/16	110	125	142	158	174	192	206	224	258	275	309
	35	3 7/16	116	132	148	163	180	196	212	228	261	277	311
	40	3 15/16	131	139	155	170	187	203	219	236	268	285	317
	45	4 7/16	152	161	169	185	200	215	232	248	279	296	327
	60	5 7/16	181	189	197	212	228	245	261	277	310	327	360
24"	30	2 15/16	168	194	219	246	272	289	325	353	406	434	488
	35	3 7/16	170	195	220	248	271	297	332	359	409	426	479
	40	3 15/16	185	199	223	249	274	299	324	351	420	530	480
	45	4 7/16	232	245	259	283	307	332	356	380	430	455	505
	60	5 7/16	254	266	278	303	326	351	375	400	449	473	523
	60	6	274	285	325	338	362	367	410	435	485	509	559
30"	35	3 7/16	213	244	275	307	339	371	403	436	501	533	599
	40	3 15/16	231	248	279	311	343	374	405	439	508	663	601
	45	4 7/16	289	308	324	353	384	414	445	478	538	569	631
	60	5 7/16	317	333	348	379	408	449	469	500	561	592	654
	60	6	376	391	407	422	453	483	513	543	606	636	699

For mine duty wings consult factory. All weights are approximate. Consult factory for certified specifications.

Heavy Duty CEMA Class Wing Pulleys with Tapered XT Bushings Included

Dia	XT Hub	Max Bore	38" Face	40" Face	42" Face	44" Face	46" Face	51" Face	54" Face	57" Face	60" Face	63" Face	66" Face
			Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.	Lbs.
8"	25	2 7/16	85	92	97	100	117	116	123	130	136	143	150
10"	30	2 15/16	109	115	121	125	147	145	153	163	170	179	187
	35	3 7/16	117	123	130	136	142	157	167	176	186	194	204
	40	3 15/16	127	113	140	147	154	170	180	190	200	210	200
12"	30	2 15/16	146	153	161	168	176	191	205	217	227	274	287
	35	3 7/16	151	158	166	172	189	206	320	338	355	373	393
	40	3 15/16	161	168	177	183	197	216	321	339	356	374	394
14"	30	2 15/16	180	189	196	207	216	239	380	401	422	443	465
	35	3 7/16	185	195	203	211	220	243	373	393	414	435	455
	40	3 15/16	194	203	213	220	230	252	375	395	416	436	456
	45	4 7/16	206	214	225	232	241	262	373	393	413	432	452
16"	30	2 15/16	203	214	225	235	245	271	434	459	482	507	531
	35	3 7/16	208	218	229	239	249	275	427	450	473	497	521
	40	3 15/16	217	227	239	248	258	284	428	452	475	499	521
	45	4 7/16	230	239	251	259	269	294	427	449	472	494	516
18"	30	2 15/16	258	271	285	298	312	346	488	516	543	570	547
	35	3 7/16	259	272	286	299	312	345	480	507	532	559	540
	40	3 15/16	266	279	293	306	318	352	482	509	534	561	544
	45	4 7/16	276	289	303	314	326	358	480	505	531	555	545
	60	5 7/16	310	323	340	349	362	395	504	529	554	579	579
20"	30	2 15/16	326	344	361	377	395	438	543	573	603	633	664
	35	3 7/16	327	345	362	377	395	437	533	563	592	621	651
	40	3 15/16	335	351	368	388	401	443	536	565	594	623	652
	45	4 7/16	344	360	378	393	408	439	533	561	590	617	645
	60	5 7/16	377	394	413	427	444	486	560	588	616	644	672
24"	30	2 15/16	539	565	593	620	648	717	757	796	844	885	927
	35	3 7/16	529	556	584	608	634	701	741	787	828	868	909
	40	3 15/16	529	556	584	608	634	700	740	787	827	867	906
	45	4 7/16	530	566	584	606	631	695	746	796	826	899	907
	60	5 7/16	548	573	602	623	648	730	771	812	854	896	936
	60	6	583	609	639	659	708	779	823	868	913	959	1007
30"	35	3 7/16	662	695	730	760	793	876	926	964	1035	1065	1136
	40	3 15/16	662	669	730	760	793	875	924	963	1034	1084	1135
	45	4 7/16	664	695	730	767	789	868	932	982	1033	1083	1134
	60	5 7/16	685	717	752	779	810	912	963	1015	1068	1120	1174
	60	6	729	761	799	824	884	974	1029	1064	1141	1196	1259

Part Number Identification



For mine duty wings consult factory. All weights are approximate. Consult factory for certified specifications.

Welded Steel Wing Pulleys

Hewitt-Robins wing pulleys are designed for applications where moisture, sticky product or falling material cause excessive pulley face buildup. This buildup can lead to belt training problems and accelerated wear on your conveyor. Standard wing pulleys are crowned to assist with proper belt alignment. Pulley end discs are machine forged or CNC cut and double-checked for accuracy during the manufacturing process. Wing pulleys promote a cleaning action that makes this design desirable for many applications.

Lagged wing pulleys are available.

Highlights:

- Crown face standard—straight face available upon request.
- CEMA duty pulleys meet all CEMA/ ANSI requirements.
- Mine duty pulleys constructed for severe applications.
- XT EQUIVALENT hubs and bushings are standard. QD hubs are available.

Options:

- Lagged wing pulleys
- Spiral wing pulleys
- Shafts
- Mounted bearings

Important Information for Proper Pulley Selection and Application

Pulley Type (Drum or Wing) _____ STD Duty or Mine Duty _____

Pulley Diameter (inches) _____ Face Width (inches) _____

Crown Face or Straight Face: _____

Bushing Type (XT standard, QD available) _____

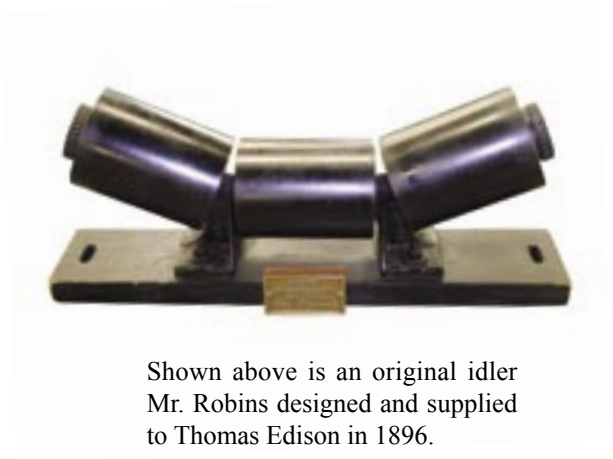
Bushing Bore (inches) _____

Plain or Lagged: _____

If Lagged, Type of Lagging: Plain _____ Herringbone _____ Diamond _____

If shaft is required, please furnish drawing or complete dimensional information.

Bearings Required: _____ Type: _____



Shown above is an original idler Mr. Robins designed and supplied to Thomas Edison in 1896.

Your Conveyor Source
for More Than a Century

You can count on Hewitt-Robins

For Product Performance: Although primitive belt conveyors were in use as early as 1830, it wasn't until 1891 that Thomas Robins, founder of our company, developed the first practical conveyor system for moving heavy and abrasive materials utilizing steel, in-line idlers and rubber covered belting. The first Robins-designed conveyor was installed at Thomas Edison's iron ore mine in New Jersey. Thomas Robins' pride in producing the most reliable conveyor components available continues to this day to motivate Hewitt-Robins design and manufacturing engineers.

For Problem Solving Innovations: Continuous development and testing programs, both in the field and in the lab, continue to produce new solutions to old problems and carry on the traditions started by Thomas Robins.

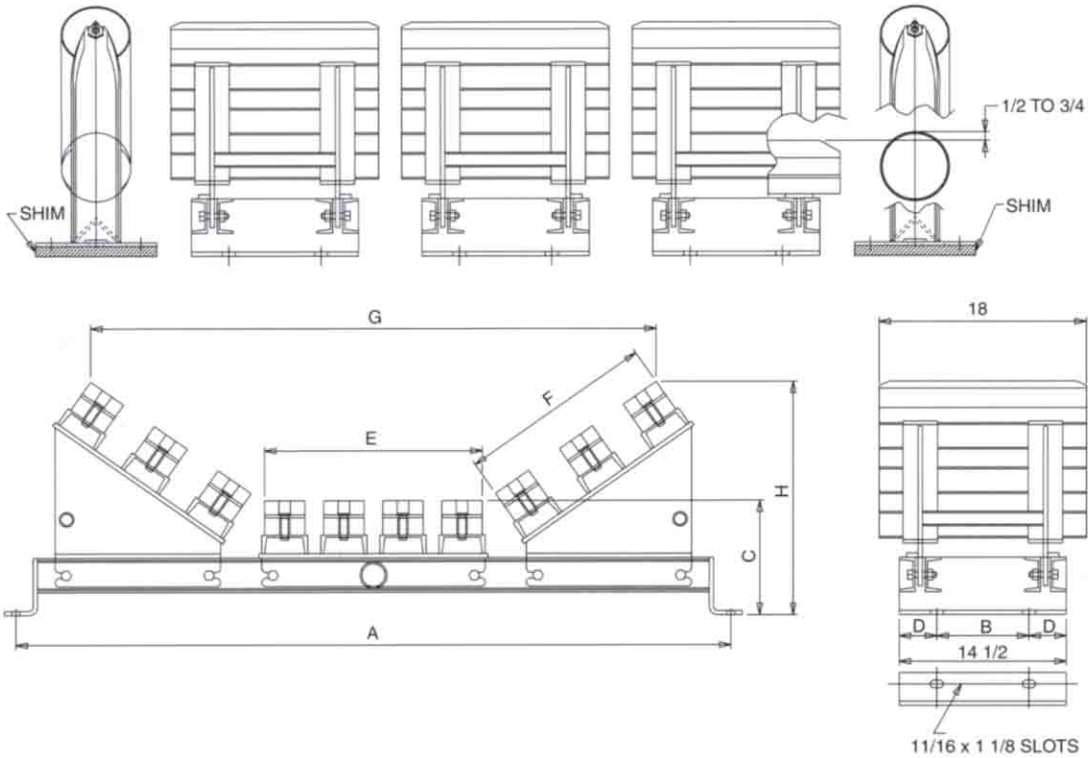
For Quick Delivery From Stock: Most commonly used sizes and styles of Hewitt-Robins idlers are stocked in scores of distributor and warehouse locations throughout the United States and in other countries. In many instances, the replacement idlers and service parts you need to get back into production can be obtained in a matter of hours.

For Nationwide Sales and Service: Experienced Hewitt-Robins distributors and Area Managers will help you select the most economical style and size of idler to meet your conveying requirements. Because idlers represent a major portion of a conveyor's cost, proper selection based on economics as well as sound engineering principles can result in substantial savings in capital outlay. That's why we urge you to take advantage of Hewitt-Robins' experience during the initial stages of your conveyor design. No one knows more about idlers than Hewitt-Robins. Good reason to call us first.

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive, Pueblo West, CO 81007
Phone: (205) 487-1931 Fax: (205) 487-1935
E-mail: sales@hewitt-robins.com
Website: www.hewitt-robins.com

Call 1-800-388-7701 for the distributor nearest you.

Impact Bed



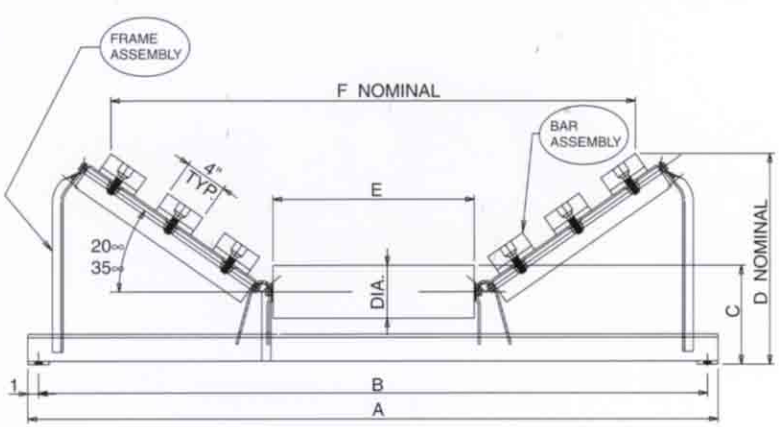
BW	20° IMPACT BED	35° IMPACT BED	45° IMPACT BED	DIMENSIONS						20°		35°		45°	
	PART NUMBER	PART NUMBER	PART NUMBER	A	B	C	D	E	F	G	H	G	H	G	H
24	60A5574-24	60A5570-24	60A5591-24	33	6	9 1/4	4 1/4	8 7/8	9	26 3/4	12 3/4	24 5/16	14 9/16	20 7/8	16 9/16
30	60A5574-30	60A5570-30	60A5591-30	39	7	9 5/8	3 3/4	10 7/8	9	30 3/8	13 1/8	27 15/16	14 7/8	24 1/2	16 15/16
36	60A5574-36	60A5570-36	60A5591-36	45	7	9 5/8	3 3/4	12 7/8	11	36 1/8	13 13/16	33 3/16	16 5/8	29 5/16	18 3/8
42	60A5574-42	60A5570-42	60A5591-42	51	7	9 5/8	3 3/4	14 7/8	13	41 15/16	14 1/2	38 1/2	17 3/4	34 3/16	19 13/16
48	60A5574-48	60A5570-48	60A5591-48	57	8	10	3 1/4	16 7/8	15	47 11/16	15 1/2	43 3/4	19 1/4	39 3/16	21 9/16
54	60A5574-54	60A5570-54	60A5591-54	63	8	10	3 1/4	18 7/8	17	53 7/16	16 3/16	49 1/16	20 7/16	43 13/16	23
60	60A5574-60	60A5570-60	60A5591-60	69	8	10	3 1/4	20 7/8	19	59 1/8	16 7/8	54 5/16	21 9/16	48 11/16	24 3/8
66	60A5574-66	60A5570-66	60A5591-66	75	8	10 3/8	3 1/4	22 7/8	21	64 7/8	17 15/16	59 9/16	23 1/16	53 1/2	26 3/16
72	60A5574-72	60A5570-72	60A5591-72	81	8	10 3/8	3 1/4	24 7/8	23	70 11/16	18 5/8	64 7/8	24 1/4	58 3/8	27 5/8

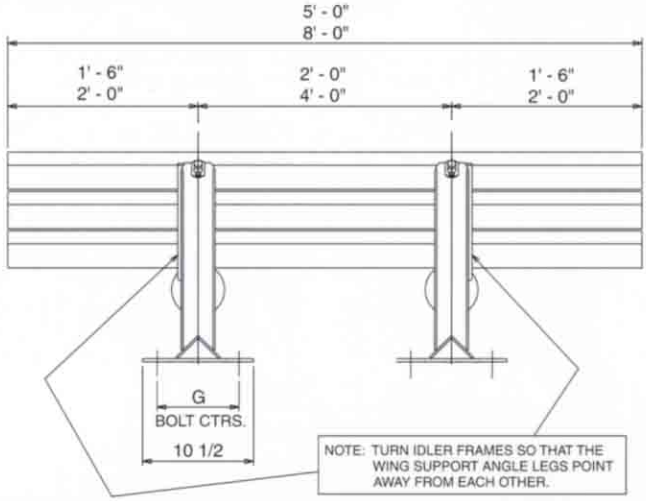
The Hewitt-Robins Impact Bed extends belt life and reduces downtime by supporting the conveyor belt and cushioning it against the shock of heavy loads and impact. Its modular design allows multiple units to be closely fitted to form the bed length needed. As shown in the picture below, the Hewitt-Robins Impact Bed is also offered with an impact center roll. Consult factory for part numbers.

Impact Bed (3 Shown)

Impact Bed with Impact Center Roll (1 Shown)

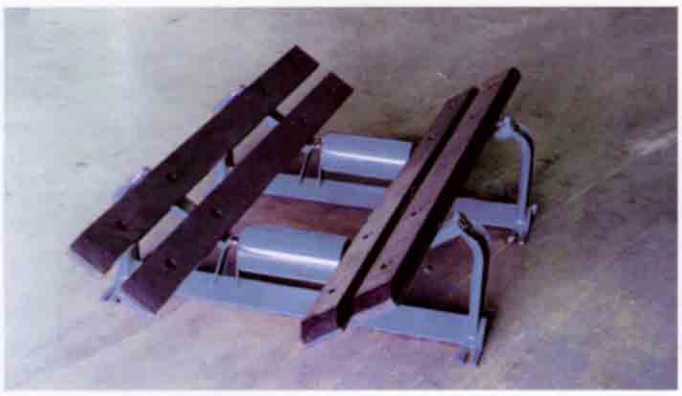
Slide Seal™



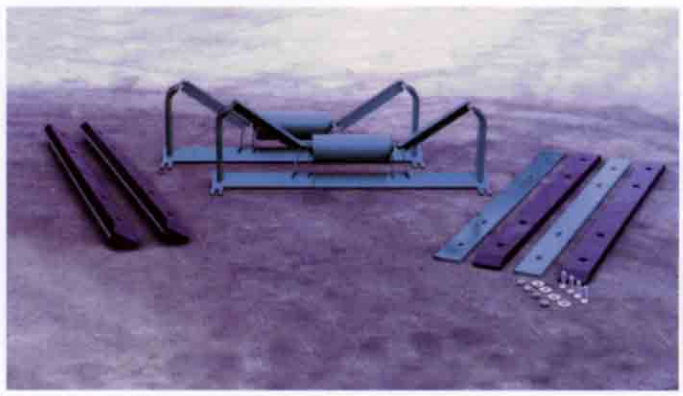


		FRAME ASSEMBLY			BAR ASSEMBLY							5" DIA.			6" DIA.		
BW	DEG.	QTY.	5" DIA.	6" DIA.	QTY.	5 FT SECTION	8 FT SECTION	A	B	E	G	C	D	F	C	D	F
18	20°	2	60AK11153-18	60AK11163-18	2	60AK11118-60	60AK11118-96	29	27	7 1/8	6 1/4	8 5/8	10 11/16	18 3/4	9 1/8	11 3/16	18 3/8
18	35°	2	60AK11119-18	60AK11164-18	2	60AK11118-60	60AK11118-96						12	16 15/16		12 7/16	16 3/8
24	20°	2	60AK11153-24	60AK11163-24	4	60AK11118-60	60AK11118-96	35	33	9	6 1/4	8 5/8	11 3/4	26 1/2	9 1/8	12 3/16	26 1/8
24	35°	2	60AK11119-24	60AK11164-24	4	60AK11118-60	60AK11118-96						13 3/4	23 15/16		14 1/8	23 3/8
30	20°	2	60AK11153-30	60AK11163-30	4	60AK11118-60	60AK11118-96	41	39	11	6 1/4	9	12 5/8	31 3/16	9 1/2	13 1/16	30 7/8
30	35°	2	60AK11119-30	60AK11164-30	4	60AK11118-60	60AK11118-96						14 15/16	28 5/16		15 5/16	27 3/4
36	20°	2	60AK11153-36	60AK11163-36	6	60AK11118-60	60AK11118-96	47	45	13	6 1/4	9	13 5/16	36 15/16	9 1/2	13 3/4	36 5/8
36	35°	2	60AK11119-36	60AK11164-36	6	60AK11118-60	60AK11118-96						16 1/8	33 9/16		16 1/2	33
42	20°	2	60AK11153-42	60AK11163-42	6	60AK11118-60	60AK11118-96	53	51	15	6 1/4	9	14	42 11/16	9 1/2	14 7/16	42 3/8
42	35°	2	60AK11119-42	60AK11164-42	6	60AK11118-60	60AK11118-96						17 1/4	38 7/8		17 5/8	38 5/16
48	20°	2	60AK11153-48	60AK11163-48	6	60AK11118-60	60AK11118-96	59	57	17	7	9 3/8	15 1/16	48 1/2	9 7/8	15 1/2	48 1/8
48	35°	2	60AK11119-48	60AK11164-48	6	60AK11118-60	60AK11118-96						18 3/4	44 1/8		19 3/16	43 9/16
54	20°	2	60AK11153-54	60AK11163-54	6	60AK11118-60	60AK11118-96	65	63	19	7	9 3/8	15 11/16	54 1/4	9 7/8	16 3/16	53 7/8
54	35°	2	60AK11119-54	60AK11164-54	6	60AK11118-60	60AK11118-96						19 15/16	49 7/16		20 5/16	48 13/16
60	20°	2	60AK11153-60	60AK11163-60	8	60AK11118-60	60AK11118-96	71	69	21	7	9 3/8	16 3/8	60	9 7/8	16 7/8	59 5/8
60	35°	2	60AK11119-60	60AK11164-60	8	60AK11118-60	60AK11118-96						21 1/16	54 11/16		21 7/16	54 1/8

The Hewitt-Robins Slide Seal™ is designed to fit into your loading area when there is minimal impact. It is a simple and cost effective way to provide continuous support of your conveyor belt against the skirting material, resulting in a positive seal. By utilizing two standard troughing idler frames with center rolls and UHMW/steel support bars with support mounting brackets, this unit will provide a positive seal in your loading area with reduced belt drag.



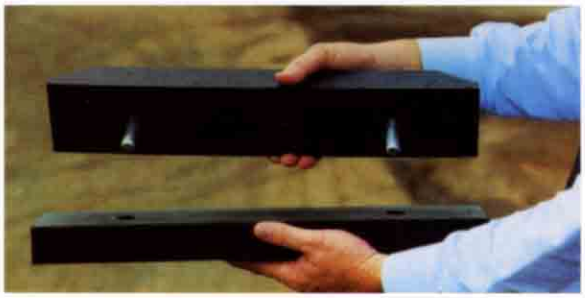
Slide Seal™ Assembly



Slide Seal™ Assembly Components

Impact Bed Replacement Parts

IMPACT BED REPLACEMENT BARS			
BW	PART NUMBER	SIZE OF BARS	WEIGHT lbs.
ALL	60KU9905-18	UHMW 3 1/2" X 1 1/2" X 18"	3
	60KU9906-18	RUBBER 3 1/2" X 1 1/2" X 18"	4



UHMW & Rubber

Slide Seal™ Replacement Parts

WING SUPPORT INSERT					
5" DIA., 20 OR 35 DEGREE			6" DIA., 20 OR 35 DEGREE		
BW	PART NUMBER	WEIGHT	BW	PART NUMBER	WEIGHT
18	60DK11117-0702	3	18	60DK11179-0702	3
24	60DK11117-0900	4	24	60DK11179-0900	4
30	60DK11117-1100	5	30	60DK11179-1100	5
36	60DK11117-1300	5	36	60DK11179-1300	5
42	60DK11117-1500	6	42	60DK11179-1500	6
48	60DK11117-1700	7	48	60DK11179-1700	7
54	60DK11117-1900	8	54	60DK11179-1900	8
60	60DK11117-2100	9	60	60DK11179-2100	9

Wing Support Insert

UHMW REPLACEMENT BARS ONLY			
LENGTH	PART NUMBER	SIZE OF BARS	WEIGHT lbs.
5'	60KK11114-60	UHMW 4" X 1 1/2" X 60"	12
8'	60KK11114-96	UHMW 4" X 1 1/2" X 96"	20

SLIDE SEAL BAR ASSEMBLY		
LENGTH	PART NUMBER	WEIGHT lbs.
5'	60AK11118-60	47
8'	60AK11118-96	75

Slide Seal™ Bar Assembly

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive, Pueblo West, CO 81007
Phone: (205) 487-1931 Fax: (205) 487-1935
E-mail: sales@hewitt-robins.com
Website: www.hewitt-robins.com

Call 1-800-388-7701 for the distributor nearest you.

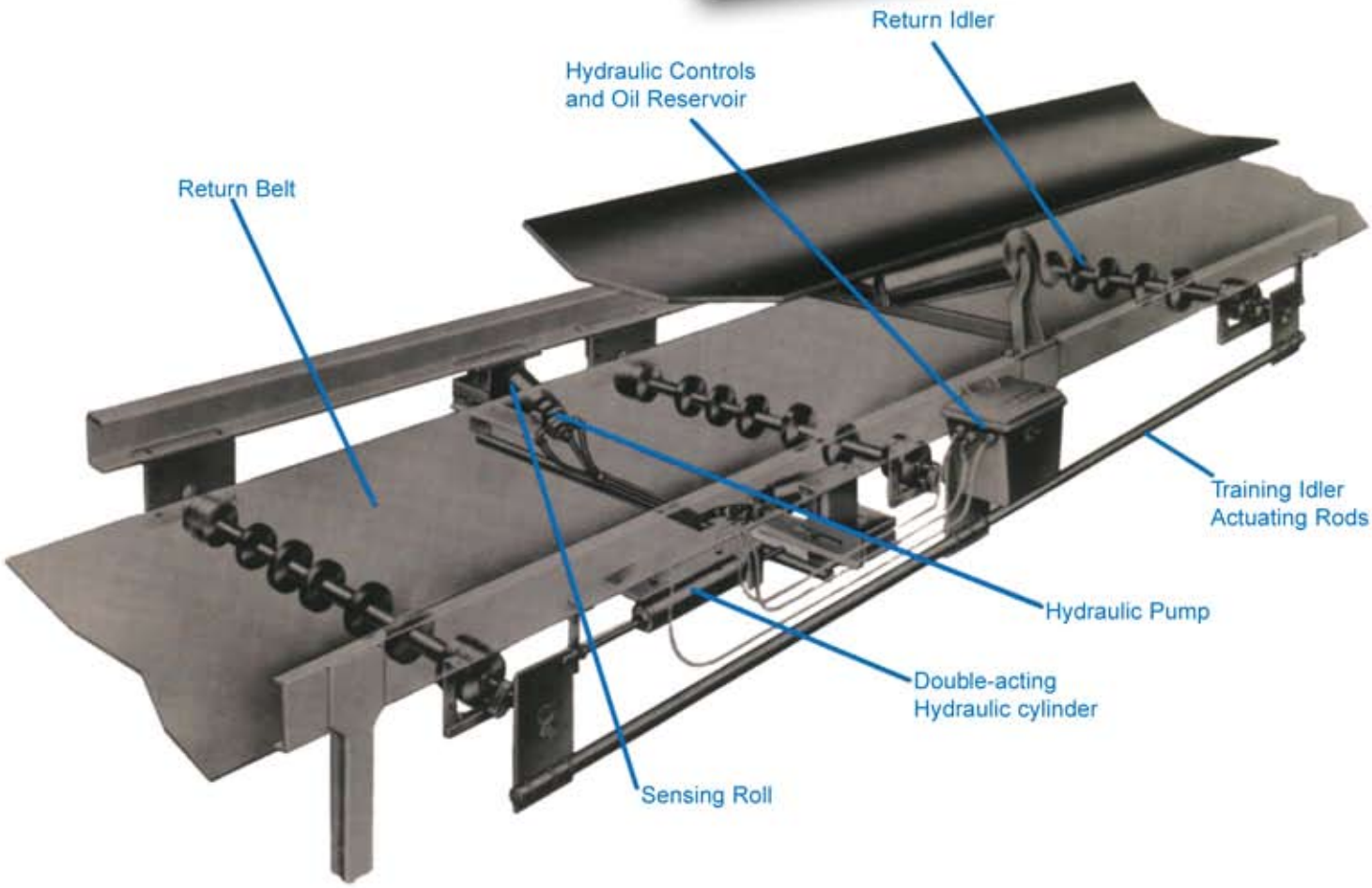
Impact Bed/Slide Seal™ 01/04

Hewitt-Robins

hydra-POWER®

HYDRAULIC CONVEYOR BELT TRAINING UNIT

HYDRA-POWER belt trainer is a field tested and proven self-contained unit for training the return strand of any difficult-to-train conveyor belt. The unit consists of a package of modular components which may be installed on any standard or nonstandard conveyor where positive belt training is required to prolong conveyor belt life.



(See other side for more information.)

hydra-POWER®

Hewitt-Robins

SPECIAL FEATURES

Universal application—Standard HYDRA-POWER units are installed on channel, truss or wire rope conveyor frames at any appropriate location. They may be used with one-way or reversible belts, whether horizontal, inclined or declined (up to 18 degrees).

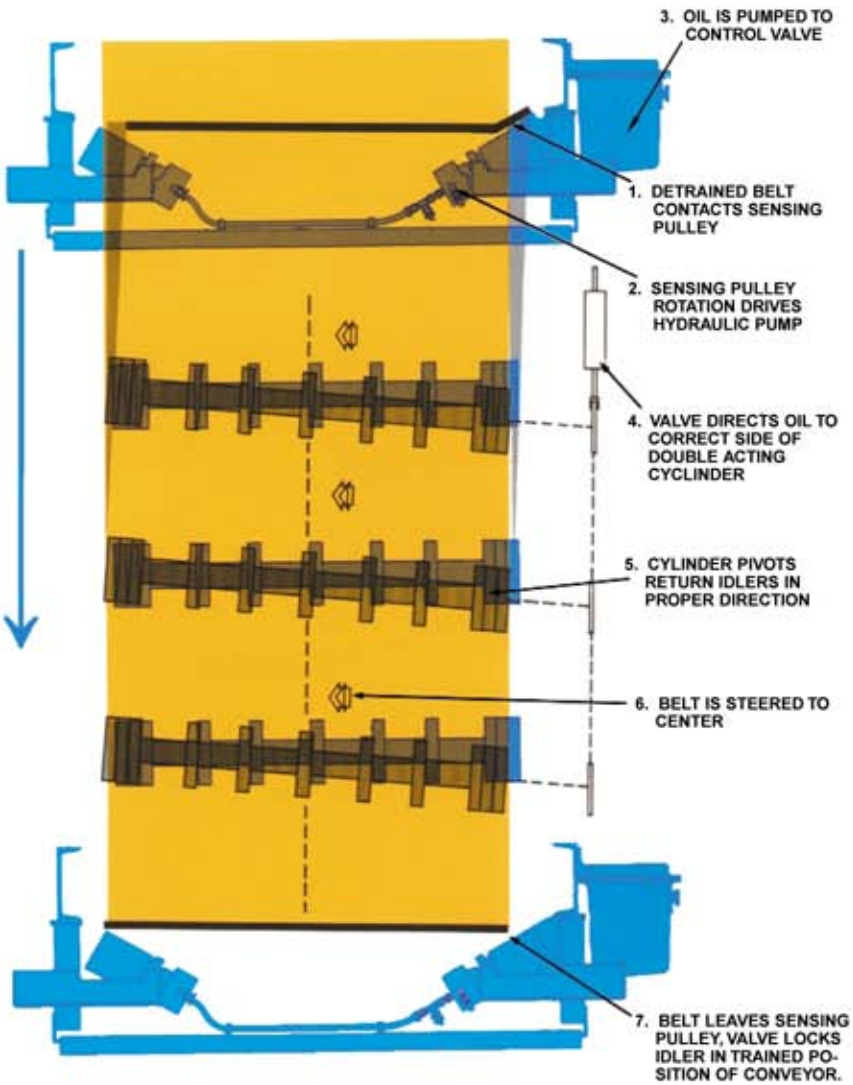
Easy to install—HYDRA-POWER units are constructed in modules consisting of sensing rolls and hydraulic pumps, hydraulic reservoir and control valve assembly and hydraulic cylinder and idler connecting hardware. All necessary mounting brackets are included for mounting on most channel conveyor frames. Brackets can be fabricated easily for truss and wire rope conveyors. Each module can be handled and installed by one man.

Self-powered—All the power necessary to activate and operate the HYDRA-POWER units is generated by the conveyor belt. No outside power of any type is required.

Positive action—Training action is positive and constant and is unaffected by such common operating problems such as idler roll build-up, idler roll wear or frayed belt edges. It works where other training devices fail.

Reliability—Low hydraulic pressure (125 PSI), quality components and heavy construction insure minimum maintenance and maximum reliability under the most rugged operating conditions.

HOW IT WORKS



SPECIFICATIONS

Conveyor widths—up to 120 inches

Belt Speeds—400 to 1000 FPM

Ambient Temperatures—Minus 20° to 120°.

For more information on the HYDRA-POWER belt trainer, contact your Hewitt-Robins representative, or call Hewitt-Robins today at (719) 547-2425.

Hewitt-Robins
CONVEYOR COMPONENTS
129 Enterprise Drive • Pueblo West, CO 81007
719/547-2425 • FAX: 719/547-2396
sales@hewitt-robins.com • www.hewitt-robins.com

(See other side for more information.)

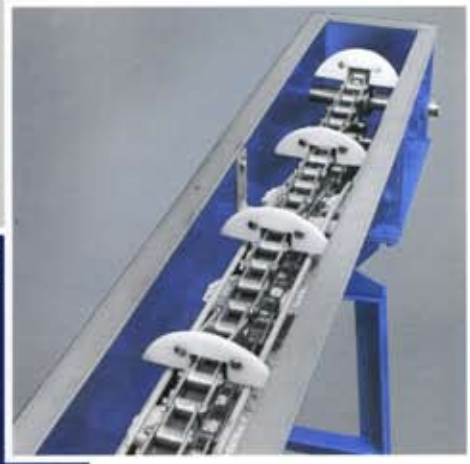
Printed in U.S.A.
HYDRA-POWER 11/07

GOODMAN
CONVEYOR

Screw Conveyors
Bucket Elevators
Multi-Flo Conveyors

Catalog 200

Goodman Conveyor, Belton, S.C.



Goodman Bucket Elevators

Goodman Multi-Flo Conveyors

Goodman Screw Conveyors

Goodman Conveyor designs and manufactures a complete line of screw conveyor products in diameters of 4" to 60", in a variety of stainless, mild and abrasion resistant steels. Also available are centrifugal and continuous discharge bucket elevators designed to meet particular application requirements. They are offered with both belt and chain mounted buckets and constructed with a variety of materials including galvanized, carbon and stainless steel or aluminum. Included in our line of products is a Multi-Flo flight type drag conveyor.

At Goodman, we know bulk material handling. And, just as important, we have the product application knowledge and experience to custom engineer to your specific requirements.

Our commitment is manufacturing products that will give you years of service. We don't just inspect for quality. We make sure it's built into every piece of equipment we design.

Call your nearest Goodman distributor today to learn more about these or any of our other fine products.

GOODMAN CONVEYOR

Table Of Contents

Screw Conveyor

Certified dimensions on request.
specifications subject to change without notice.

Bucket Elevators

Multi-Flo

Safety Precautions

Your Goodman Conveyor screw conveyor has been designed to comply with CEMA safety standards. These safety standards can be obtained through the American Society of Mechanical Engineers as ANSIB20.1b-1989. These standards should be consulted before installation and operation of the screw conveyor.

Screw conveyor safety begins with a plan that considers every possible danger and potential hazard.

Operating and maintenance personnel should be thoroughly trained in safe operating procedures, recognition of possible hazards, and maintenance of a safe area around the screw conveyor.

The following safety guidelines should be followed. These are guidelines only and compliance with safety standards—local, state, and federal, including OSHA—is the responsibility of the user of the screw conveyor equipment.

1. Maintain a safety program for all operating personnel.
2. Screw conveyors should not be operated unless the conveyor housing completely encloses the conveyor's moving elements and power transmission guards are in place. **If the conveyor cover or housing is to be opened, the motor must be locked out electrically in such a way that it can not be restarted.** Overflow cover sections or doors should not be opened while the conveyor is operating.
3. All operating personnel should be advised of the location of all emergency controls and safety devices. Clear access should be made to these controls and devices.
4. Good lighting, housekeeping, and maintenance contribute to a safe working area around the screw conveyor.
5. Frequent inspections should be made of all conveyor equipment, and all safety devices should be in position and in proper working order.
6. Conduct a pre-startup safety check of the conveyor equipment to determine that the machinery and area are safe for operation and that guards and warning devices are in place.
7. There should be absolutely no reckless actions or horseplay in the vicinity of screw conveyors. Most accidents are caused by lack of proper safety training, carelessness, horseplay, and lack of awareness of possible hazards.
8. If, because of its application, the conveyor must have open housing, then the entire conveyor must be separated from personnel areas by a fence, and warning signs posted.
9. Open feed hoppers or spouts for shovel, front end loaders or other manual or mechanical loading must incorporate a grating. If the characteristics of the material being handled are such that a grating can not be used, then the exposed portion of the conveyor must be guarded by a fence, and warning signs posted.
10. Do not walk or stand on conveyor cover, grating, or power transmission guards.

This is an example of the warning sign attached to Goodman Conveyor screw conveyor housings.

Electrical Equipment

Emergency stop switches, safety shutoff switches, zero speed switches, overflow and overload devices, and other electrical controls are all necessary considerations for a safe conveyor installation (controls and switches are usually furnished by conveyor user).

Hazardous Materials

Goodman Conveyor screw conveyors are not designed for use in handling hazardous materials (explosive, toxic, noxious, flammable, etc.) or for operating in hazardous conditions or locations.

Introduction

In compiling this engineering manual, Goodman Conveyor has endeavored to provide the most comprehensive, up-to-date, and easy-to-use collection of data available for the design and selection of screw conveyor equipment.

The basic design criteria required for the selection of a screw conveyor system are:

1. The type and condition of the material to be handled, including the maximum particle size and, if available, the specific bulk density of the material to be conveyed.

2. The quantity to be transported, in pounds or tons per hour.

3. The distance the material is to be conveyed.

4. The method by which material will be loaded into the screw.

Note: The importance of knowing the method of loading can not be overemphasized, as this will dictate the classification of the unit as either a screw **conveyor** or a screw **feeder.**

With this engineering manual, the selection of a screw conveyor system for a specific application involves six individual steps. These steps are presented in a logical order in separate sections. Each of the individual sections provides a portion of the total information necessary to select a properly sized, adequately powered conveyor system that will yield optimum performance at the intended conveying function.

The six steps are:

1. Classification of the unit as a screw **conveyor** or a screw **feeder.**

2. Noting the characteristics of the material to be conveyed.

3. Selection of screw diameter and calculation of required speed.

4. Calculation of required horsepower.

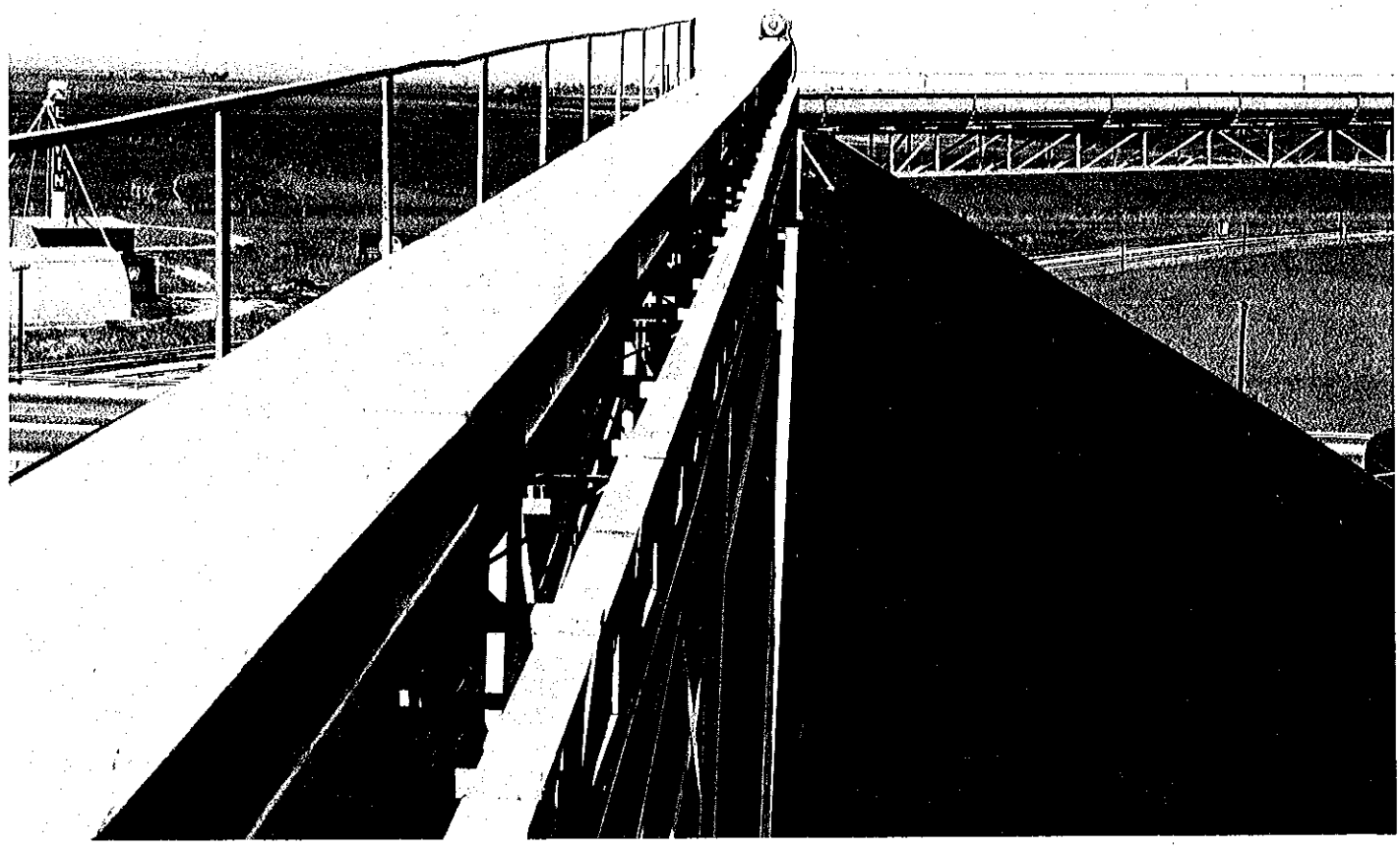
5. Calculation of torque that will be transmitted by drive and checking of torque capacities of components.

6. Selection of components.

As you will note in using this manual, the usual practice of presenting a step-by-step example of conveyor selection at the outset has been eliminated. Instead, an example of the execution of each step is given, where necessary, at the end of the individual sections. For accuracy, the necessary calculations in this manual are presented in equation form only.

Engineering data regarding the design and selection of screw feeders is dealt with in a separate section following the screw conveyor data.

Special or unusual applications not covered in the following data and procedures should be referred to Goodman Conveyor, Engineering Department.



Classification of Unit Type

Determining the correct classification for the unit type based upon the basic design criteria furnished by the customer is the **most critical** step in making the proper selection of a unit that will perform the required function.

There are two classifications:

1. A screw **conveyor** is used to move a **regulated** volume of material from one point to another (inlet to discharge). The flow of material into the inlet **must always** be at a regulated, uniform rate. Therefore the inlet is never flooded, and selection of screw diameter and calculation of required speed are based upon 15%, 30%, or 45% trough loading, and required horsepower is calculated using the screw **conveyor** formula.

Note: 45% trough loading is considered maximum for screw **conveyors.**

2. A screw **feeder** is used to regulate the volume of material that is withdrawn from a storage hopper and delivered to a screw conveyor (or similar equipment). The flow of the material into the inlet is **not** regulated. Therefore the inlet is said to be flooded, and selection of screw diameter and calculation of required speed are based upon 95% trough loading, and required horsepower is calculated by using the **feeder** formula. In other words, if the flow of material going into the inlet is **not** regulated and the inlet is flooded, the selection of screw diameter, calculation of required speed, and calculation of required horsepower **can not** be made from the screw **conveyor** section (Pages 21 thru 26). The unit is a screw **feeder** and selection, etc., must be made from the **feeder** section (Pages 29 thru 32).

General Information Regarding Screw Conveyors

1. The rate of discharge of material from a screw **conveyor** is **not** determined by the diameter of the screw, the pitch of the flights, the size of the pipe on which the flights are mounted, or the speed of the unit. These variables will only affect the percent of trough loading because the rate of discharge will be the same as the flow into the inlet, and the trough will **never be full.**

2. Any application for a screw **conveyor** that specifies a variable discharge rate, a variable speed drive, variable pitch flighting, half pitch flighting, tapered flighting, tubular trough shroud, choke plate, or flared inlet section should be questioned to verify the method of feed, as all these factors are normally for **feeders.**

General Information Regarding Screw Feeders

1. The rate of discharge of material from a screw **feeder** is determined by a combination of the screw diameter, the pitch of the flights, the size of the pipe on which the flights are mounted, and the speed of the unit. A change in any of these variables **will** change the rate of discharge because the trough is completely full of material except for the volume that is displaced by the mass of the screw (95% loading). Therefore every revolution of the screw extracts the volume of material that has filled in around the pipe between two flights.

Conveyor Loading and Discharge

General information regarding the proper loading and discharge of the conveyor system.

Determination of the weights and materials of construction of the conveyor system components.

Information Required:

1. Recommended Component Series (from the Materials Table).

2. Diameter of the conveyor screw.

3. Any unusual or significant material characteristics which might influence the materials of construction or require special mechanical arrangement.

Loading

Since a conveyor system is designed to operate at a predetermined capacity level, it is extremely important to exercise caution in the method and control of input loads. Overloading the conveyor can cause accelerated wear of components and probably overload the drive equipment. Overloading can also cause components to break due to increased torque.

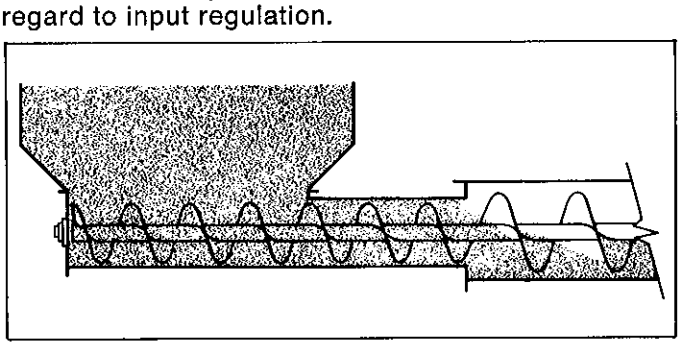
There are two basic methods of conveyor loading:

1. By means of a mechanical feeding device (such as screw feeders or processing machinery that is inherently self-limiting with regard to material output).

2. Directly from static storage.

Loading From Regulated Output Devices

In arrangements where the material is to move to the conveyor from devices which have a regulated material output, the conveyor itself can be designed to handle the anticipated material volume without further regard to input regulation.

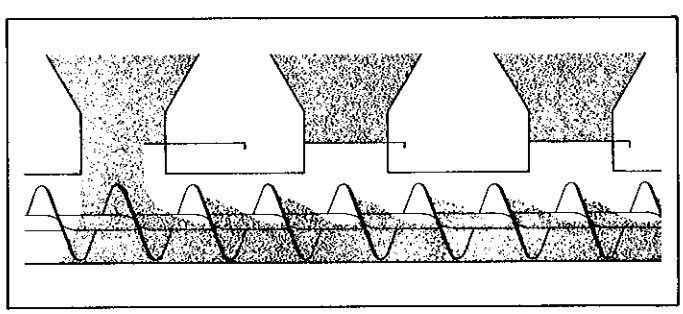


Loading via screw feeder.

In situations where the material is released intermittently, the problem of surge loads exists. Although the total volume over an extended period may fall within the design limits of the conveyor, the existence of intermittent surge loads does cause the conveyor to operate beyond its design capacity for brief periods. Therefore, when surge loads are anticipated, it is recommended that loading be accomplished by means of a regulating screw feeder. Otherwise, the conveyor system must be designed for the maximum momentary loads.

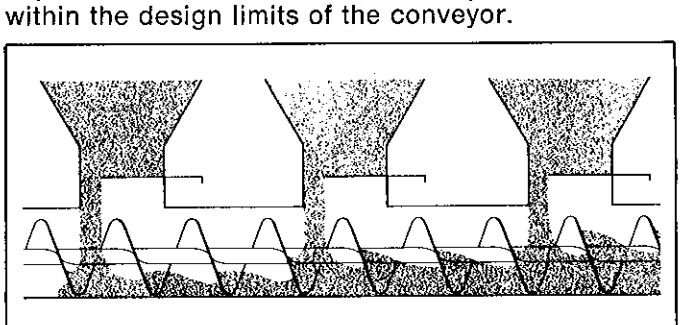
Loading From Static Storage

When the screw conveyor is loaded directly from static storage without benefit of flow regulation, the danger of overloading is sharply increased. The use of a load indicating ammeter attached to the motor control is a simple and useful method of accomplishing maximum design loading, especially when manually controlled inlets are used.



Loading From Multiple Inlets

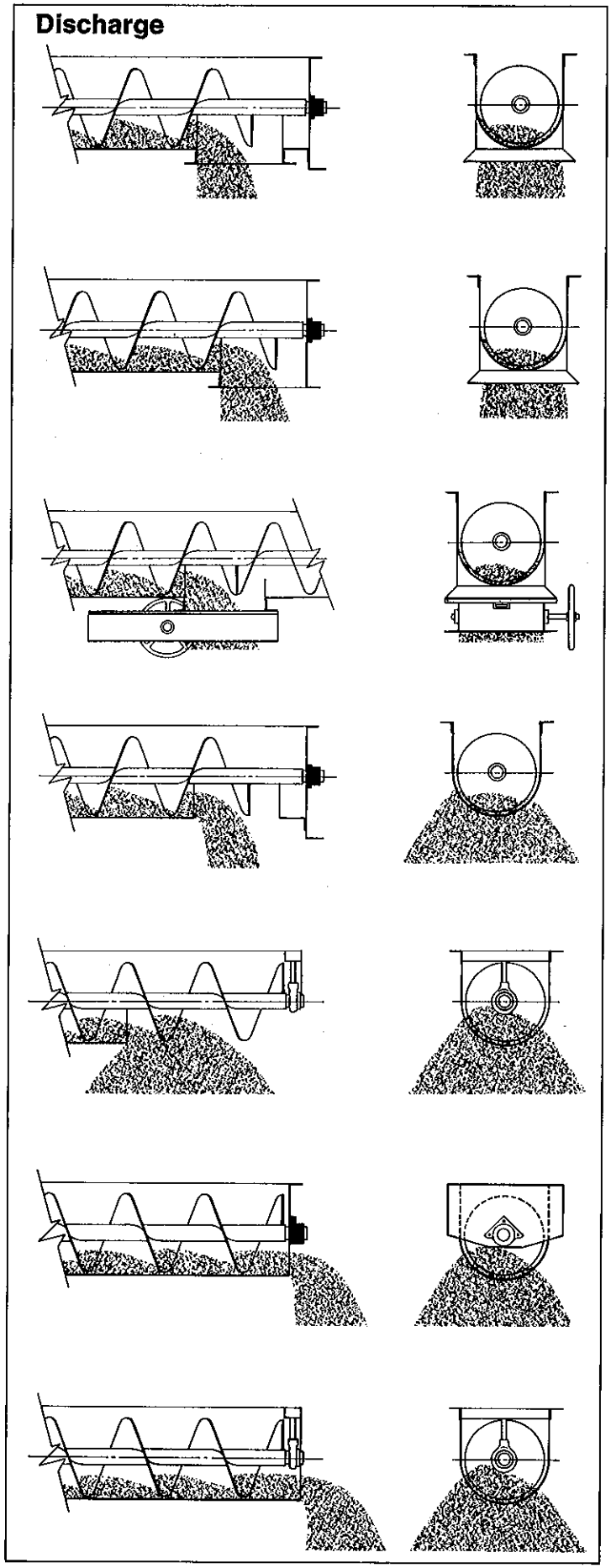
When two or more inlets may be opened simultaneously, the degree of individual inlet openings must be adjusted to maintain the aggregate rate of loading within the design limits of the conveyor.



Automatic Loading Control

Automatic devices are available to modulate inlet or feed devices so that the material is fed to the conveyor at a rate that will remain within established design limits of the conveyor under all conditions.

Conveyor Loading and Discharge



Standard Discharge Spout

The standard spout provides a means of direct attachment to interconnecting spouts, processing machinery, other conveyors or storage facilities. Available with cut-off gates which may be operated by hand, rack and pinion, or air.

Flush End Discharge

Similar to the standard spout, except it is located at the extreme end of the conveyor trough or housing. The end of the spout is comprised of a housing end with discharge flange.

Mechanically Operated Gates

Available for installations where material flow cut-off is necessary, mechanically operated gates may be controlled manually or by remote control devices.

Plain Opening

Material drops directly through an opening in the trough or housing bottom. Useful for intermediate discharge in installations where it is not necessary to stop the discharge at these points until full, such as storage.

Open Bottom Discharge

Especially useful for distributing material in storage. The bottom of the trough is omitted for any required length. As the material builds up it forms a natural trough over which incoming material may pass to the unfilled area.

Trough End Discharge

Material moves directly through the open conveyor end. The screw is supported by a partial end plate and bearing attached to the end flange. This discharge method should not be used when conveyor loading exceeds 30%.

Open End Discharge

Forty-five percent loaded conveyors may be discharged in this manner. The conveyor screw is supported by means of a standard hanger bearing.

Factors Influencing Materials of Construction of Screw Conveyor Components due to Special Material Characteristics

Material characteristics are very important in determining design of screw conveyors. These characteristics and terms are indicated in the Material Classification Code Chart. It can be seen that different materials having the same classification code number may be handled with screw conveyors having the same specifications. Also, should it be desired to handle a material not given in the Material Table, in some cases it is possible to make at least a preliminary selection of material code number by comparing the material with similar listed materials.

It should be borne in mind that because of the peculiar action of a conveyor screw in moving bulk materials, the condition of the material in transit may be quite different from the condition at rest.

Materials, first of all, are classified according to particle size. It is important to have a screen analysis made of the material, if at all possible. For example if a material is said to consist of ½ inch and under, it may have all particles about the same size; Or it may have only 10% of ½" particle size, with 90% fines grading to micron sizes. Accurate information regarding particle size is important to mechanical design as well as equipment selection such as seals or gaskets.

Lumpy materials must be checked against the Lump Size Table. Very often larger screw conveyors must be used solely to accommodate the lumps than otherwise would be required from a standpoint of normal capacity. See Maximum Lump Size Table on Page 24.

Irregular, stringy, and interlocking materials that mat or cling together require special consideration. Stringy materials, particularly if long enough, may wrap around the pipe shaft of the conveyor screw or around the intermediate hanger bearings, thus effectively clogging the conveyor. Materials that mat may also be those that pack under pressure. If the material does pack under pressure, it may jam the conveyor screw and seriously damage the conveyor. All materials with these characteristics must be carefully studied in detail with respect to their actions in a screw conveyor.

Materials are also classified as to their flowability. This, unfortunately, is a relative term and not easily measured. However, so far as the operation of screw conveyors is concerned, flowability is related to two factors, one the angle of slide and the other the internal friction of the material. The angle of slide may be determined by tilting a plate carrying a quantity of the material. The angle of internal friction may be evaluated from shear cell test data. Changes in moisture content, temperature, particle size distribution and chemically corrosive action of the material all affect the flowability.

Experience with screw conveyors shows that the more free flowing the material is, the less horsepower will be required to transport it. The converse also is true. Because flowability isn't easily reduced to numerical terms, in some instances actual experience has been the guide in codifying the flowability of materials in the Material Characteristics Table.

Judging a material just from its angle of repose is misleading. Some materials which have a very high angle of repose when stored in a bin may have a very low angle of repose in the "as conveyed" condition in a screw conveyor. An example of this is wheat bran. Its particles vary widely in shape and size yet it appears to have a relatively low angle of "repose" or rather angle of slide, while moving through a screw conveyor.

It is known that some materials which are uniform in particle shape and size are quite free flowing when dry. Screened dry sand is free flowing. The addition of moisture, however, changes the flowability character. Likewise, dry granulated sugar is free flowing, but this material is hygroscopic and will pick up moisture from the air. If this happens, its flowability is changed considerably. The flowability of most materials is affected by changes in their moisture content, with consequent changes in their ability to be conveyed.

The abrasiveness of materials is also a relative quantity and isn't easily defined with accuracy. Some materials are more abrasive than others. It will be found that non-abrasive or very mildly abrasive materials may be handled with screw conveyors with standard gauge screws and troughs as specified in the Component Group 1 for Normal Service. Very abrasive materials require heavier than standard components. See Component Groups on pages 36 and 37. Most abrasive materials in the following Material Table are handled at lower cross-sectional loads than are the non abrasive materials. This is done to attain the maximum economical life of the conveyor and its parts.

The selection of components for handling abrasive materials should also be considered in view of the amount of service to which the conveyor will be subject. Continuous, 24 hour per day operation will cause more wear than if the conveyor were operating but a few hours per day.

All of the foregoing bulk material characteristics are described in more detail in CEMA Standard No. 550 entitled *Classification and Definitions of Bulk Materials.* Chapter II of that publication fully explains size classification and coding, flowability coding and abrasive coding. In addition there are certain other miscellaneous bulk material characteristics that are defined in Chapter I as hazards affecting conveyability. The effect of some of these hazards as they affect screw conveyor design follows.

K. Some bulk substances are sensitive to small changes in temperature or pressure. For example, materials containing vegetable oils or fats can become spoiled by the heat of friction in a hanger bearing.

L. Dusty materials, especially those that are very dusty should be carefully considered. Previous experience with similar materials is the best guide. Flange gaskets and special trough end seals may be needed.

M. Some materials such as dry Portland cement will aerate and develop fluid characteristics as a result of transport in a screw conveyor. The "as conveyed" apparent density is much lower than the normal apparent density. Many dusty and aerated materials can bypass an intermediate discharge spout. As the material becomes more fluidlike, the flowability increases markedly, and in some cases the aerated material will flood and run like water with the result that the cross-sectional load increases and control of the rate of flow is lost. Consult Goodman Conveyor Engineering regarding materials which may aerate greatly.

N. Dusts associated with certain bulk materials are flammable or even explosive when mixed with air in the proper concentration. It therefore may be necessary to contain dust laden material at all times within the conveyor enclosure. Grain dust is an example. The very nature of a screw conveyor — being an enclosed conveying device — may be used for handling materials with flammable or explosive dusts, although more sophisticated than standard enclosures may be required.

P&Q. Contaminable and degradable materials must be recognized because their salability or use may be affected by improper conveying or ill-considered conveyor specifications. Suitable non-lubricated bearings should be used. Low conveyor speeds normally will prevent excessive degradation.

R. Materials in this category are similar to those described under L and N, except that exposure of the dust or fumes may be hazardous to personnel. Tight enclosures and spouting connections — usually gasketed — are required. Elaboration of the enclosures depends upon the severity of the hazard.

S&T. Corrosion protection requiring the use of special metals is a common problem. Here again "corrosion" is a relative term which isn't easily defined numerically. The choices of materials of construction, such as the types of stainless steel or other special metals are very important.

U. Certain bulk materials are hygroscopic. They absorb water from the moisture in the ambient atmosphere. The water they pick up changes their flowability, of course, and this has been taken into account for the usual behavior of such materials as listed in the Materials Table.

V&X. Bulk materials which interlock and mat usually will require screws of heavier than standard construction and flight edges that can cut their way through the material. Intermediate hanger bearings may have to be eliminated. A similar condition exists for materials which pack under pressure.

W. Oils or chemicals that may be contained in bulk materials require special consideration. Some of these constituents may make the materials sticky and cause adherence to the working parts of the conveyor. Ribbon type conveyor screws sometimes help.

Y. Light and fluffy materials require consideration similar to those which are dusty or which tend to aerate as they are conveyed. See paragraphs L and M.

Z. Elevated temperatures are encountered in many phases of material processing. Screw conveyors should be fabricated of heavier than standard construction and design to withstand the inevitable expansion and contraction that takes place. Intermediate hanger bearings must be protected against heat or omitted. End bearings and drive equipment may be separated from the trough end to reduce their exposure to heat.

Information regarding materials which may be effectively conveyed by screw conveyor is listed in the following Materials Table. For materials not listed, contact Goodman Conveyor, Engineering Department.

Data for some materials not listed may be compiled by referring to the data given for materials which are known to be similar in weight, particle size and other physical characteristics.

The following is a brief description of the information presented in the Materials Table:

Maximum Particle Size
Because particle size affects bulk density and frequently internal friction, it directly affects conveyor size, speed, and horsepower requirements. Also, material flowability is affected to a large extent by particle size and distribution. Also see page 24.

Density Average Weight per Cubic Foot (PCF)
This information is presented for converting required capacity in pounds or tons per hour to volume in cubic feet per hour.

Note: It is important to remember that the weights listed in the chart are based on averages for slightly aerated, gravity-fed products as they would be received by a screw conveyor in most typical applications. Whenever possible, actual bulk density of the material should be used.

Percentage of Conveyor Loading
The recommended percentage of conveyor loading, which ultimately affects the selection of conveyor size, is based on the maximum depth at which the material will flow through the conveyor without causing undue wear. For example, very abrasive materials should be conveyed at a shallow depth in the conveyor to reduce the area of material contact with components.

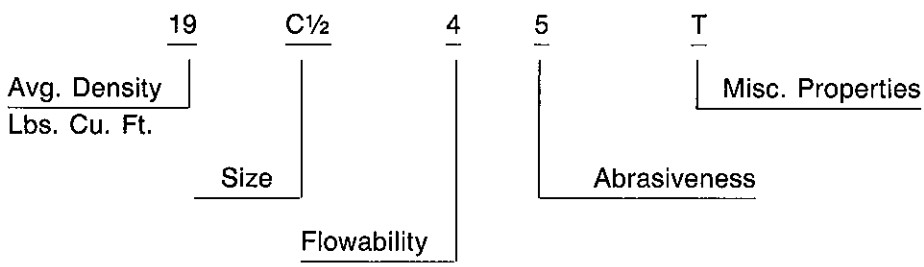
Horsepower Factor
The horsepower factor, representing the relative mobility of the material, is necessary for horsepower calculation.

Recommended Component Series
This information is presented to assist in the selection of the proper materials of construction, component weights and other specifications best suited for the material to be conveyed. The numeric code refers to general component series, and the alphabetical code gives bearing and shaft type recommendations. See Component Series Tables (Pages 36 and 37).

Material Classification Code Chart

Major Class	Material Characteristics Included		Code Designation
Density	Bulk Density, Loose		Actual Lbs/cu. ft.
Size	Very Fine	No. 200 Sieve (.0029″) And Under	A_{200}
		No. 100 Sieve (.0059″) And Under	A_{100}
		No. 40 Sieve (.016″) And Under	A_{40}
	Fine	No. 6 Sieve (.132″) And Under	B_6
	Granular	½″ And Under	C½
		3″ And Under	D_3
		7″ And Under	D_7
		16″ And Under	D_{16}
	*Lumpy	Over 16″ To Be Specified	
		X = Actual Maximum Size	D_x
	Irregular	Stringy, Fibrous, Cylindrical, Slabs, Etc.	E
Flowability	Very Free Flowing — Flow Function > 10		1
	Free Flowing — Flow Function > 4 But < 10		2
	Average Flowability — Flow Function > 2 But < 4		3
	Sluggish — Flow Function < 2		4
Abrasiveness	Mildly Abrasive — Index 1-17		5
	Moderately Abrasive — Index 18-67		6
	Extremely Abrasive — Index 68-416		7
Miscellaneous Properties Or Hazards	Builds Up and Hardens		F
	Generates Static Electricity		G
	Decomposes — Deteriorates in Storage		H
	Flammability		J
	Becomes Plastic or Tends to Soften		K
	Very Dusty		L
	Aerates and Becomes Fluid		M
	Explosiveness		N
	Stickiness-Adhesion		O
	Contaminable, Affecting Use		P
	Degradable, Affecting Use		Q
	Gives Off Harmful or Toxic Gas or Fumes		R
	Highly Corrosive		S
	Mildly Corrosive		T
	Hygroscopic		U
	Interlocks, Mats or Agglomerates		V
	Oils Present		W
	Packs Under Pressure		X
	Very Light and Fluffy — May Be Windswept		Y
	Elevated Temperature		Z

HOW TO READ THE MATERIAL CODE FROM MATERIAL CHARACTERISTICS TABLE. MATERIAL: CHIPS, PULPWOOD



Material Characteristics

MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Acetylenogen (See Calcium Carbide)								
Adipic Acid	45	45 A_{100} 35	30A	0.8	2B	Yes	100	
Alfalfa Meal	14-22	18$B_6$45WY	30A	0.6	2D			3
Alfalfa Pellets	41-43	42C½25	45	0.5	2D	Yes	150	
Alfalfa Seeds	10-15	13$B_6$15N	30B	0.4	1A-8-C	Yes	175	
Almonds, Broken	27-30	29C½35Q	30B	0.9	2D			3
Almonds, Whole Shelled	28-30	29C½35Q	30B	0.9	2D			
Alum. Fine	45-50	48$B_6$35U	30A	0.6	1A-B-C			1, 3
Alum. Lumpy	50-60	55B_6-25	30A	1.4	2A-B			1, 3
Alumina	55-65	58$B_6$27MY	15	1.8	3D			3, 4
Alumina, Fines	35	35A_{100}27MY	15	1.6	3D			
Alumina, Seed or Briquette	65	65$D_3$37	15	2.0	3D			
Aluminate Gel (Aluminate Hydroxide)	45	45$B_6$35	30B	1.7	2D			
Aluminum Chips, Dry	7-15	11E45V	30A	1.2	2D			3
Aluminum Chips, Oily	7-15	11E45V	30A	0.8	2D			3
Aluminum Hydrate	13-20	17C½35	30A	1.4	1A-B-C			
Aluminum Ore (see Bauxite)								
Aluminum Oxide	60-120	90A_{100}17M	15	1.8	3D			3
Aluminum Silicate	49	49C½35S	45	0.8	3A-B			
Aluminum Sulfate	45-58	52C½25	30A	1.0	1A-B-C			
Amianthus (See Asbestos-Shredded)								
Ammonium Chloride, Crystalline	45-52	49A_{100}45FRS	30A	0.7	3A-B			
Ammonium Nitrate	45-62	54A_{40}35NTU	30A	1.3	3D			
Ammonium Sulfate	45-58	52C½35FOTU	30A	1.0	1A-B-C			
Andalvsite (Aluminum Silicate)	49	49C½35	45	0.8	3A-B			
Antimony Powder		A_{100}35	30B	1.6	2D			
Apple Pomace, Dry	15	15C½45Y	30B	1.0	2D			
Arsenate of Lead (See Lead Arsenate)								
Arsenic Oxide (Arsenolite)	100-120	110A_{100}35R						
Arsenic Pulverized	30	30A_{100}25R	45	0.8	2D			
Asbestos-Rock (Ore)	81	81$D_3$37R	15	1.2	3D			
Asbestos-Shredded	20-40	30E46XY	30B	1.0	2D			
Ash, Black Ground	105	105$B_6$35	30A	2.0	1A-B-C			
Ashes, Coal Dry-½	35-45	40C½46TY	30B	3.0	3D			
Ashes, Coal Dry-3	35-40	38$D_3$46T	15	2.5	3D			1
Ashes, Coal Wet-½	45-50	48C½46T	30B	3.0	3D			
Ashes, Coal Wet-3	45-50	48$D_3$46T	15	4.0	3D			
Asphalt, Crushed-½	45	45C½45	30A	2.0	1A-B-C			1, 3
Bagasse, Dry	7-10	9E45R/XY	30A	1.5	2A-B-C			
Bakelite, Fine	30-45	38$B_6$25	30A	1.4	1A-B-C			3
Baking Powder	40-55	48A_{100}35	30A	0.6	1B			3
Baking Soda (Sodium Bicarbonate)	40-55	48A_{100}25	30A	1.0	1B			
Barite (Barium Sulfate) +½-3	120-180	150$D_3$36	15	2.6	3D			
Barite, Powder	120-180	150A_{100}35X	30B	2.0	2D			
Barium Carbonate	72	72A_{100}45R	30B	1.6	2D			
Bark, Wood, Refuse	10-20	15E45TYY	30B	2.0	3D			
Barley, Fine Ground	24-38	31$B_6$35	45	0.4	1A-B-C	Yes	125	
Barley, Malted	31	31C½35	30A	0.4	1A-B-C	Yes	125	
Barley, Meal	28	28C½35	30A	0.4	1A-B-C	Yes	125	
Barley, Whole	36-48	42$B_6$25N	45	0.5	1A-B-C	Yes	150	
Baryte (See Barite)								
Basalt	80-105	93$B_6$27	15	1.8	3D			
Bauxite, Dry, Ground	68	68$B_6$25	45	1.8	1A-B-C			3
Bauxite, Crushed-3"	75-80	80$D_3$36	15	2.5	3D			1, 3
Beans, Castor	36	36C½15W	45	0.5	1A-B-C	Yes	175	1, 3
Beans, Castor, Meal	35-40	38$B_6$35W	30A	0.8	1A-B-C			
Beans, Navy, Dry	48	48C½15	45	0.5	1A-B-C	Yes	175	1, 3

Material Characteristics

MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Beans, Navy, Steeped	60	60C½25	45	0.8	1A-B-C			
Beans, Soy (See Soybeans)								
Beet Pulp, Dry	11-16							
Beet Pulp, Wet	25-45							
Bentonite, Crude	34-40	$37D_3$45X	30B	1.2	2D			1
Bentonite, -100 Mesh	50-60	$55A_{100}$25MXY	30B	0.7	2D			1
Benzene Hexachloride	56	$56A_{100}$45R	30A	0.6	1A-B-C			
Bicarbonate of Soda (Baking Powder)	40-45	$45A_{200}$25Y	30A	0.6	1B			
Blood, Dried	35-45	$40D_3$45U	30B	2.0	2D			
Blood, Ground, Dried	30	$30A_{100}$35U	30A	1.0	1A-B			
Bluestone (See Copper Sulfate)								
Bone Ash (Tricalcium Phosphate)	40-50	$45A_{100}$45	30A	1.6	1A-B			
Bone Black	20-25	$23A_{100}$25Y	30B	1.5	1A-B			3
Bone Char	27-40	$34B_6$35	30B	1.6	1A-B			
Bones, Crushed	35-50	$43D_3$45	30B	2.0	2D			1, 3
Bones, Ground	50	$50B_6$45	30B	1.7	2D			1, 3
Bones, Whole	35-50	43E45V	30A	3.0	D2			
Bonemeal	50-60	$55B_6$35	30B	1.7	2D			1
Borate of Lime	60	$60A_{100}$35	30A	0.6	1A-B-C			
Borax, Fine	45-55	$50B_6$25T	30B	0.7	3D			1
Borax, Screening-½	55-60	58C½35	30B	1.5	2D			1
Borax, 1½-2 Lump	55-60	$58D_3$35	30B	1.8	2D			1
Borax, 2-3 Lump	60-70	$65D_3$35	30B	2.0	2D			
Boric Acid, Fine	55	$55B_6$25T	30A	0.8	3D			
Boron	75	$75A_{100}$37	15	1.0	2D			
Bran, Rice-Rye-Wheat	16-20	$18B_6$35NY	30A	0.5	1A-B-C			1
Braunite (Manganese Oxide)	120	$120A_{100}$36	30B	2.0	2D			
Bread Crumbs	20-25	$23B_6$35PQ	30A	0.6	1A-B-C			
Brewer's Grain, Spent, Dry	14-30	22C½45	30A	0.5	1A-B-C			1
Brewer's Grain, Spent, Wet	55-60	58C½45T	30A	0.8 to 4.0	2A-B			1
Brick, Ground-⅛	100-120	$110B_6$37	15	2.2	3D			
Bronze Chips	30-50	$40B_6$45	15	2.0	2D			
Buckwheat	37-42	$40B_6$25N	45	0.4	1A-B-C	Yes	150	2
Calcine, Flour	75-85	$80A_{100}$35	30A	0.7	1A-B-C			
Calcium Carbide	70-90	$80D_3$25N	30B	2.0	2D			3
Calcium Carbonate (See Limestone)								
Calcium Fluoride (See Fluorspar)								
Calcium Hydrate (See Lime Hydrated)								
Calcium Hydroxide (See Lime Hydrated)								
Calcium Lactate	26-29	$28D_3$45QTR	30A	0.6	2A-B			
Calcium Magnesium Carbonate	90-100		30B	2.0	2D			
Calcium Oxide (See Lime, Unslaked)								
Calcium Phosphate	40-50	$45A_{100}$45	30A	1.6	1A-B-C			
Calcium Sulfate (See Gypsum)								
Carbon, Activated, Dry	8-20	$14A_{200}$	30B	1.2	2D			1, 3
Carbon Black, Fine	4-6	$5A_{200}$	30A	0.4	1A-B-C			
Carbon Black, Pelleted	20-40							3
Carborundum	100	$100D_3$27	15	3.0	2D			
Casein	36	$36B_6$35	30B	1.6	3D			
Cashew Nuts	32-37	35C½45	30A	0.7	2D			
Cast Iron, Chips	130-200	165C½45	30B	4.0	2D			
Caustic Soda	88	$88B_6$35RSU	30B	1.8	2D			
Caustic Soda, Flakes	47	47C½45RSUX	30A	1.5	3D			
Celite (Diatomaceous Earth)	11-17	$14A_{40}$36Y	15	1.6	2D			
Cement, Clinker	75-95	$85D_3$36	15	1.8	3D			1, 3
Cement, Mortar	133	$133B_6$35Q	30A	3.0	3D			
Cement, Portland	94	$94A_{100}$26M	30B	1.4	2D			1, 3, 5

Material Characteristics

MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Cement, Aerated (Portland)	60-75	$68A_{100}16M$	30B	1.4	2D			1, 3, 5
Cerrusite (See Lead Carbonate)								
Chalk, Crushed	75-95	$85D_{3}25$	30B	1.9	2D			1, 3
Chalk, Pulverized	67-75	$71A_{100}25MXY$	30B	1.4	2D			1, 3
Charcoal, Ground	18-28	$23A_{100}45$	30B	1.2	2D			
Charcoal, Lumps	18-28	$23D_{3}45Q$	30B	1.4	2D			3
Chips, Pulpwood	12-25	19C½45T	30A	1.0	2B			
Chocolate, Cake Pressed	40-45	$45D_{3}25$	30A	1.5	2B			
Chrome Ore	125-140	$133D_{3}36$	15	2.5	3D			
Cinders, Blast Furnace	57	$57D_{3}36T$	15	1.9	3D			
Cinders, Coal	40	$40D_{3}36T$	15	1.8	3D			1, 3
Clay, Ceramic, Dry	60-80	$70A_{100}35P$	30A	1.5	1A-B-C			
Clay, Calcined	80-100	$90B_{6}36$	30B	2.4	3D			
Clay, Brick, Dry, Fines	100-120	110C½36	30B	2.0	3D			2
Clay, Dry, Lumpy	60-75	$68D_{3}35$	30A	1.8	2D			
Clinker, Cement (See Cement, Clinker)								3
Clover, Seed	45-48	$47B_{6}25N$	45	0.4	1A-B-C	Yes	150	
Coal, Anthracite (River & Culm)	55-61	$60B_{6}35TY$	30A	1.0	2A-B			
Coal, Anthracite - ½′	49-61	55C½25	30A	1.0	2A-B			1
Coal, Bituminous Mined	40-60	$50D_{3}35LNXY$	30A	0.9	1A-B			1, 3
Coal, Bituminous, Mined, Sized	45-50	$48D_{3}35QV$	30A	1.0	1A-B			1, 3
Coal, Bituminous, Mined, Slack	43-50	47C½45T	30A	0.9	2A-B			1, 3
Coal, Lignite	37-45	$41D_{3}35T$	30A	1.0	2D			1, 3
Cocoa, Beans	30-45	38C½25Q	30A	0.5	1A-B	Yes	150	
Cocoa Nibs	35	35C½25	30A	0.5	1A-B	Yes	150	
Cocoa, Powdered	30-35	$33A_{100}45XY$	30A	0.9	1A-B			
Cocoanut, Shredded	20-22	21E45	30A	1.5	2B			
Coffee, Chaff	20	$20B_{6}25MY$	30A	1.0	1A-B			
Coffee, Green Bean	25-32	29C½25PQ	30A	0.5	1A-B	Yes	150	1, 3
Coffee, Ground Dry	25	$25A_{40}35P$	30A	0.6	1A-B			
Coffee Ground Net	35-45	$40A_{40}45X$	30A	0.6	1A-B			
Coffee Roasted Bean	20-30	25C½PQ	45	0.4	1B	Yes	150	1, 3
Coffee, Soluble	19	$19A_{40}35PUY$	15	0.8	1B			
Coke, Breeze	25-35	30C½37	15	1.2	3D			2
Coke, Loose	23-35	$30D_{7}37$	15	1.2	3D			2
Coke, Calcined	35-45	$40D_{7}37$	15	1.3	3D			2
Compost	30-50	$40D_{7}45TV$	30A	1.0	3A-B			
Concrete, Pre Mix Dry	85-120	103C½36V	30B	3.0	3D			
Copper Ore	120-150	135Cx36	15	4.0	3D			
Copper Ore, Crushed	100-150	$125D_{3}36$	15	4.0	3D			
Copper Sulphate (Bluestone)	60-70	65C½35	30A	1.0	2A-B-C			
Copperas (See Ferrous Sulfate)								
Copra Cake Ground	40-45	$43B_{6}45HW$	30A	.7	1A-B-C			1, 3
Copra, Cake Lumpy	25-30	$28D_{3}35HW$	30A	0.8	2A-B-C			1, 3
Copra, Lumpy	22	22E35HW	30A	1.0	2A-B-C			1, 3
Copra, Meal	40-45	$42B_{6}35HW$	30A	0.7	2D			1, 3
Cork, Ground Fine	5-15	$10B_{6}35JNY$	30A	0.5	1A-B-C			
Cork, Granulated	12-15	14C½35JY	30A	0.5	1A-B-C			3
Corn, Cracked	40-50	$45B_{6}25P$	30A	0.7	1A-B-C	Yes	150	3
Corn Cobs, Ground	17	17C½25Y	30A	0.6	1A-B-C			
Corn Cobs, Whole	12-15	14E35	30A		2A-B			
Corn Ear	56	56E35	30A		2A-B			
Corn Germ	21	$21B_{6}35PY$	30A	0.4	1A-B-C			2
Corn/Grits	40-45	$43B_{6}35P$	30A	0.5	1A-B-C	Yes	125	1
Cornmeal	32-40	$36B_{6}35P$	30A	0.5	1A-B	Yes	125	1
Corn Oil, Cake	25	$25D_{7}45HW$	30A	0.6	1A-B			
Corn Seed	45	45C½25PQ	45	0.4	1A-B-C	Yes	150	

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MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Corn Shelled	45	45C½25	45	0.4	1A-B-C	Yes	150	2
Corn Sugar	30-35	$33B_6$35PU	30A	1.0	1B			1
Cottonseed, Cake, Crushed	40-45	43C½45HW	30A	1.0	1A-B			
Cottonseed, Cake, Lumpy	40-45	$43D_7$45HW	30A	1.0	2A-B			1
Cottonseed, Dry, Delinted	22-40	31C½25X	30A	0.6	1A-B	Yes	150	2
Cottonseed, Dry, Undelinted	18-25	22C½45XY	30A	0.9	1A-B			2
Cottonseed, Flakes	20-25	23C½35HWY	30A	0.8	1A-B			
Cottonseed, Hulls	12	$12B_6$35Y	30A	0.9	1A-B	Yes	125	3
Cottonseed, Meal, Expeller	25-30	$28B_6$45HW	30A	0.5	3A-B			
Cottonseed, Meal, Extracted	35-40	$37B_6$45HW	30A	0.5	1A-B	Yes	100	1
Cottonseed, Meats, Dry	40	$40B_6$35HW	30A	0.6	1A-B			1
Cottonseed, Meats, Rolled	35-40	38C½45HW	30A	0.6	1A-B			
Cracklings, Crushed	40-50	$45D_3$45HW	30A	1.3	2A-B-C			
Cryolite, Dust	75-90	$83A_{100}$36L	30B	2.0	2D			
Cryolite, Lumpy	90-110	$100D_{16}$36	30B	2.0	2D			
Cullet, Fine	80-120	100C½37	15	2.0	3D			2
Cullet, Lump	80-120	$100D_{16}$37	15	2.5	3D			2
Cupric Sulphate (See Copper Sulfate)								
Diatomaceous Earth	11-17	$14A_{40}$36Y	30B	1.6	3D			
Dicalcium Phosphate	40-50	$45A_{40}$35	30A	1.6	1A-B-C			
Disodium Phosphate	25-31	$28A_{40}$35	30B	0.5	3D			
Dolomite (Calcium Magnesium Carbonate),								
Crushed	80-100	90C½26T	30B	2.0	2D			1, 3
Dolomite (Cal. Mag. Carbonate)	90-100	95Dx36	30B	2.0	2D			
Earth, Loam, Dry Loose	76	76C½36	30B	1.2	2D			
Ebonite, Crushed	63-70	$67CY_2$35	30A	0.8	1A-B-C			3
Egg Powder	16	$16A_{40}$35MPY	30A	1.0	1B			
Epsom Salt (Mag. Sulfate)	40-50	$45A_{40}$35U	30A	0.8	1A-B-C			
Ethanedioic Acid (See Oxalic Acid)								
Feldspar, Ground	65-80	$73A_{100}$37	30B	2.0	2D			1, 3
Feldspar, Powder	100	$100A_{200}$36	30B	2.0	2D			3
Feldspar Lumps	90-100	$95D_7$37	30B	2.0	2D			
Feldspar, Screenings	75-80	78C½37	30B	2.0	2D			
Ferrous Sulfide - ½	120-135	128C½26	30B	2.0	1A-B-C			
Ferrous Sulfide - 100M	105-120	$113A_{100}$36	30B	2.0	1A-B-C			
Ferrous Sulfate	50-75	63C½35U	30B	1.0	2D			
Fish Meal	35-40	38C½45HP	30A	1.0	1A-B-C			
Fish Scrap	40-50	$45D_7$45H	30A	1.5	2A-B-C			
Flaxseed	43-45	$44B_6$35X	45	0.4	1A-B-C			4
Flaxseed Cake (Linseed cake)	48-50	$49D_7$45W	30A	0.7	2A-B			1
Flaxseed Meal (Linseed meal)	25-45	$35B_6$45W	30A	0.4	1A-B			1
Flour, Wheat	33-40	$37A_{40}$45LP	30A	0.6	1B	Yes	100	
Flue Dust, Basic Oxygen Furnace	45-60	$53A_{40}$36LM	15	3.5	3D			
Flue Dust, Blast Furnace	110-125	$118A_{40}$36	15	3.5	3D			
Flue Dust, Boiler H. Dry	30-45	$38A_{40}$36LM	15	2.0	3D			
Fluorspar, Fine	80-100	$90B_6$36	30B	2.0	2D			1, 3
Fluorspar, Lumps	90-110	$100D_7$36	30B	2.0	2D			1, 3
Flyash, Dry	30-45	$38A_{40}$36M	15	3.5	3D			
Foundry Sand, Dry (See Sand)								
Fuller's Earth, Dry Raw	30-40	$35A_{40}$25	30B	2.0	2D			2
Fuller's Earth, Oily, Spent	60-65	63C½45OW	15	2.0	3D			2
Fuller's Earth Calcined	40	$40A_{100}$25	15	2.0	3D			
Galena (See Lead Sulfide)								
Gelatin, Granulated	32	$32B_6$35PU	30A	0.8	1B			
Gilsonite	37	37C½35	30B	1.5	3D			
Glass, Batch	80-100	90C½37	15	2.5	3D			2
Glue, Ground	40	$40B_6$45U	30B	1.7	2D			

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Glue, Pearl	40	40C½35U	45	0.5	1A-B-C			
Glue, Veg. Powdered	40	$40A_{40}$45U	30A	0.6	1A-B-C			
Gluten, Meal	40	$40B_{6}$35P	30A	0.6	1B			
Grains, Distillery, Spent Dry	30	$30D_{3}$35	30A	0.5	2D	Yes	125	1
Grains, Distillery, Spent Wet	40-60	50C½45V	30A	0.8	3A-B			
Graphite Flake	40	$40B_{6}$25LP	30A	0.5	1A-B-C			
Graphite, Flour	28	$28A_{100}$35LMP	45	0.5	1A-B-C			
Graphite Ore	65-75	70Dx35L	30A	1.0	2D			
Granite, Fine	80-90	85C½27	15	2.5	3D			3
Grape Pomace	15-20	$18D_{3}$45U	30B	1.4	2D			
Grass Seed	10-32	$11B_{6}$25PY	30A	0.4	1A-B-C			
Guano Dry	70	70C½35	30	2.0	3A-B			
Gypsum, Calcined	55-60	$58B_{6}$35U	30B	1.6	2D			1, 3
Gypsum, Calcined, Powdered	60-80	$70A_{100}$35U	30B	2.0	2D			1, 3
Gypsum, Raw - 1	70-80	$75D_{3}$25	30B	2.0	2D			3
Hay, Chopped	8-12	10C½35JY	30A	1.6	2A-B			
Hexanedioic Acid	45	$45A_{100}$35	30A	0.8	2B			
Hominy	35-50	43C½25D	30A	0.4	1A-B-C	Yes	150	
Hops, Spent, Dry	35	$35D_{3}$35	30A	1.0	2A-B-C	Yes	125	1
Hops, Spent, Wet	50-55	$53D_{3}$45V	30A	1.5	2A-B			1
Ice, Crushed	35-45	$40D_{3}$35Q	30A	0.4	2A-B			1, 3
Ice, Flaked	40-45	43C½35Q	30A	0.6	1B			
Ice Cubes	33-35	$34D_{3}$35Q	30A	0.4	1B			
Ice, Shell	33-35	$34D_{3}$45Q	30A	0.4	1B			
Ilmenite Ore	140-160	$150D_{3}$37	15	2.0	3D			1, 3
Iron Ore Concentrate	120-180	$150A_{40}$37	15	2.2	3D			
Iron Oxide, Pigment	25	$25A_{100}$36LMP	30B	1.0	1A-B-C			
Iron Oxide, Millscale	75	75C½36	30B	1.6	2D			
Iron Pyrites (See Ferrous Sulfide)								
Iron Sulphate (See Ferrous Sulphate)								
Iron Sulfide (See Ferrous Sulfide)								
Iron Vitriol (See Ferrous Sulphate)								
Kafir (Corn)	40-45	43C½25	30A	0.5	3D	Yes	150	
Kaolin Clay	63	$63D_{3}$25	30A	2.0	2D			1
Kaolin Clay - Tale	42-56	$49A_{40}$35LMP	30B	2.0	2D			1, 3
Kryalith (See Cryolite)								
Lactose	32	$32A_{40}$35PU	30A	0.6	1B			
Lamp Black (See Carbon Black)								
Lead Arsenate	72	$72A_{40}$35R	30A	1.4	1A-B-C			
Lead Arsenite	72	$72A_{40}$35R	30A	1.4	1A-B-C			
Lead Carbonate	240-260	$250A_{40}$35R	30B	1.0	2D			
Lead Ore - ⅛	200-270	$235B_{6}$36	15	1.4	3D			
Lead Ore - ½	180-230	205C½36	15	1.4	3D			
Lead Oxide (Red Lead)	30-150	$90A_{100}$35P	30B	1.2	2D			
Lead Oxide (Red Lead)	30-180	$105A_{200}$35LP	30B	1.2	2D			
Lead Sulfide	240-260	$250A_{100}$35R	30B	1.0	2D			
Lignite (See Coal Lignite)								
Limanite, Ore, Brown	120	120C½47	15	1.7	3D			
Lime, Ground, Unflaked	60-65	$63B_{6}$35U	30A	0.6	1A-B-C			1, 3, 5
Lime Hydrated	40	$40B_{6}$35LM	30A	0.8	2D			3
Lime, Hydrated, Pulverized	32-40	$36A_{40}$35LM	30A	0.6	1A-B			
Lime, Pebble	53-56	55C½25HU	30A	2.0	2A-B			1, 3
Limestone, Agricultural	68	$68B_{6}$35	30B	2.0	2D			1, 3
Limestone, Crushed	85-90	88Dx36	30B	2.0	2D			1, 3
Limestone Dust	55-95	$75A_{40}$46MY	30B	2.0	2D			1, 3
Lindane (See Benzene Hexachloride)								
Linseed (See Flaxseed)								

Material Characteristics

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Litharge (See Lead Oxide)								
Lithopone	45-50	$48A_{325}35MR$	30A	1.0	1A-B			
Maize (See Milo)								
Malt, Dry, Ground	20-30	$25B_{6}35NP$	30A	0.5	1A-B-C	Yes	125	1
Malt, Dry, Whole	20-30	25C½35N	30A	0.5	1A-B-C	Yes	125	1
Malt, Meal	36-40	$38B_{6}25P$	30A	0.4	1A-B-C	Yes	150	1
Malt, Sprouts	13-15	14C½35P	30A	0.4	1A-B-C	Yes	125	
Magnesium Chloride (Magnesite)	33	33C½45	30A	1.0	1A-B			
Manganese Dioxide	70-85	$78A_{100}35NRT$	30A	1.5	2A-B			
Manganese Ore	125-140	133Dx37	15	2.0	3D			
Manganese Oxide	120	$120A_{100}36$	30B	2.0	2D			
Manganese Sulfate	70	70C½37	15	2.4	3D			
Marble Crushed	80-95	$88B_{6}37$	15	2.0	3D			3
Marl, (Clay)	80	80Dx36	30B	1.6	2D			
Meat, Ground	50-55	53E45HQTX	30B	1.5	2A-B			
Meat, Scrap (w/bone)	40	40E46H	30B	1.5	2D			
Mica, Flakes	17-22	$20B_{6}16MY$	30B	1.0	2D			
Mica, Ground	13-15	$14B_{6}36$	30B	0.9	2D			
Mica, Pulverized	13-15	$14A_{100}36M$	30B	1.0	2D			
Milk, Dried, Flake	5-6	$6B_{6}35PUY$	30A	0.4	1B			
Milk, Malted	27-30	$29A_{40}45PX$	30A	0.9	1B			1
Milk, Powdered	20-45	$33B_{6}25PM$	30A	0.5	1B			
Milk Sugar	32	$32A_{100}35PX$	30A	0.6	1B			
Mill Scale (Steel)	120-125	123E46T		3.0	3D			
Milo, Ground	32-36	$34B_{6}25$	30A	0.5	1A-B-C	Yes	150	
Milo, Maize, (Kafir)	40-45	$43B_{6}15N$	30A	0.4	1A-B-C	Yes	175	
Molybdenite Powder	107	$107B_{6}26$	30B	1.5	2D			1.3
Monosodium Phosphate	50	$50B_{6}36$	30B	0.6/2.0	2D			
Mortar, Wet	150	150E46T	30B	3.0	3D			
Mustard Seed	45	$45B_{6}15N$	45	0.4	1A-B-C	Yes	175	
Naphthalene Flakes	45	$45B_{6}35$	30B	0.7	1A-B-C			
Niacin (Nicotinic Acid)	35	$35A_{40}35P$	30B	0.8	2D			
Oat Hulls	8-12	$10B_{6}35NY$	30A	0.5	1A-B-C	Yes	125	
Oats	26	26C½25MN	45	0.4	1A-B-C	Yes	150	2
Oats, Crimped	19-26	23C½35	45	0.5	1A-B-C	Yes	125	
Oats, Crushed	22	$22B_{6}45NY$	30A	0.6	1A-B-C	Yes	100	
Oats, Flour	35	$35A_{100}35$	30A	0.5	1A-B-C			
Oats, Rolled	19-24	22C½35NY	30A	0.6	1A-B-C	Yes	125	1
Oleo Margarine	59	59E45HKPWZ	30A	0.4	2A-B			
Orange, Peel, Dry	15	15E45	15	1.5	2A-B	Yes	100	
Oxalic Acid	60	$60B_{6}35QS$	30A	1.0	1A-B			2
Oyster Shells, Ground	50-60	55C½36T	30B	2.0	3D			
Oyster Shells, Whole	80	$80D_{3}36TV$	30B	2.5	3D			
Paper Pulp (4% or less)	62	62E45	30A	2.0	2A-B			
Paper Pulp (6% to 15%)	60-62	61E45	30A	2.0	2A-B			
Paraffin Cake - ½	45	45C½45K	30A	0.6	1A-B			
Peanuts, Clean, In Shell	15-20	$18D_{3}35Q$	30A	0.6	2A-B			
Peanut Meal	30	$30B_{6}35P$	30A	0.6	1B			
Peanuts, Raw, Unshelled	15-20	$18D_{3}36Q$	30A	0.7	3D	Yes	125	
Peanuts, Shelled	35-45	40C½35Q	30A	0.4	1B	Yes	125	
Peas, Dried	45-50	48C½15NQ	45	0.5	1A-B-C	Yes	175	
Perlite - Expanded	8-12	10C½36	30B	0.6	2D			
Phosphate Acid Fertilizer	60	$60B_{6}25T$	30A	1.4/2.5	2A-B			
Phosphate Disodium (See Sod. Phosphate)								
Phosphate Rock, Broken	75-85	80Dx36	30B	2.5	2D			1, 3

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MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Phosphate Rock, Pulverized	60	$60B_6$36	30	1.7	2D			1, 3
Phosphate Sand	90-100	$95B_6$37	15	2.5	3D			
Plaster of Paris (See Gypsum)								
Plumbago (See Graphite)								
Polystyrene Beads	40	$40B_6$35PQ	30A	0.4	1B			
Polyvinyl, Chloride Powder	20-30	$25A_{100}$45KT	30A	1.0	2B			
Polyvinyl, Chloride Pellets	20-30	25E45KT	30A	0.6	1B			
Polyethylene, Resin Pellets	30-35	33C½45Q	30A	0.4	1A-B			
Potash (Muriate of Potash)	70	$70B_6$37	15	2.0	3D			1, 3
Potash (Muriate Mine Run)	75	75Dx37	15	2.2	3D			
Potassium Carbonate	51	$51B_6$36	30B	1.0	2D			
Potassium Chloride, Pellets	120-130	125C½25TU	30B	1.6	3D			
Potassium Nitrate - ½	76	76C½16NT	30B	1.2	3D			
Potassium Nitrate - ⅛	80	$80B_6$26NT	30A	1.2	3D			
Potassium Sulfate	42-48	$45B_6$46X	30B	1.0	2D			
Potato Flour	48	$48A_{200}$35MNP	30A	0.5	1A-B			
Pumice - ⅛	42-48	$45B_6$46	15	1.6	3D			3
Pyrite, Pellets	120-130	125C½26	30B	2.0	3D			
Quartz - 100 Mesh	70-80	$75A_{100}$27	15	1.7	3D			
Quartz - ½	80-90	85C½27	15	2.0	3D			
Rice, Bran	20	$20B_6$35NY	30A	0.4	1A-B-C	Yes	125	2
Rice, Grits	42-45	$44B_6$35P	30A	0.4	1A-B-C	Yes	125	1
Rice, Polished	30	30C½15P	30A	0.4	1A-B-C	Yes	175	
Rice, Hulled	45-49	47C½25P	45	0.4	1A-B-C	Yes	150	2
Rice, Hulls	20-21	$21B_6$35NY	45	0.4	1A-B-C	Yes	125	
Rice, Rough	32-36	34C½35N	30A	0.6	1A-B-C	Yes	125	
Rosin - ½	65-68	67C½45Q	30A	1.5	1A-B-C			
Rubber, Reclaimed Ground	23-50	37C½45	30A	0.8	1A-B-C			
Rubber, Pelleted	50-55	$53D_3$45	30A	1.5	2A-B-C			
Rye	42-48	$45B_6$15N	45	0.4	1A-B-C	Yes	175	2
Rye Bran	15-20	$18B_6$35Y	45	0.4	1A-B-C	Yes	125	
Rye Feed	33	$33B_6$35N	30A	0.5	1A-B-C	Yes	125	
Rye Meal	45-40	$38B_6$35	30A	0.5	1A-B-C	Yes	125	
Rye, Middlings	42	$42B_6$35	30A	0.5	1A-B-C	Yes	125	
Rye, Shorts	32-33	33C½35	30A	0.5	2A-B	Yes	125	
Safflower, Cake	50	$50D_3$26	30A	0.6	2D			
Safflower, Meal	50	$50B_6$35	30A	0.6	1A-B-C			
Safflower, Seed	45	$45B_6$15N	45	0.4	1A-B-C	Yes	175	
Saffron (See Safflower)								
Sal Ammoniac (See Ammonium Chloride)								
Salt Cake, Dry Coarse	85	$85B_6$36TU	30B	2.1	3D			1, 3
Salt Cake, Dry Pulverized	65-85	$75B_6$36TU	30B	1.7	3D			3
Salicylic Acid	29	$29B_6$37U	30A	0.6	3D			
Salt, Dry Coarse	45-60	53C½36TU	30B	1.0	3D			
Salt, Dry Fine	70-80	$75B_6$36TU	30B	1.7	3D			
Saltpeter (See Potassium Nitrate)								
Sand Dry Bank (Damp)	110-130	$120B_6$47	15	2.8	3D			2, 4
Sand Dry Bank (Dry)	90-110	$100B_6$37	15	1.7	3D			2, 4
Sand Dry Silica	90-100	$95B_6$27	15	2.0	3D			
Sand Foundry (Shake Out)	90-100	$95D_3$37Z	15	2.6	3D			2, 4
Sand (Resin Coated) Silica	104	$104B_6$27	15	2.0	3D			
Sand (Resin Coated) Ziron	115	$115A_{100}$27	15	2.3	3D			
Sawdust, Dry	10-13	$12B_6$45UX	30A	0.7	1A-B-C	Yes	100	
Sea-Coal	65	$65B_6$36	30B	1.0	2D			
Sesame Seed	27-41	$34B_6$26	30B	0.6	2D	Yes	150	
Shale, Crushed	85-90	88C½36	30B	2.0	2D			1, 3

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Shellac, Powdered or Granulated	31	$31B_6$35P	30A	0.6	1B			
Silcon Dioxide (See Quartz)								
Silica, Flour	80	$80A_{40}$46	30B	1.5	2D			
Silica, Gel	45	$45D_3$37HKQU	15	2.0	3D			
Slag Blast Furnace	130-180	$155D_3$37Y	15	2.4	3D			3
Slag, Furnace Granular, Dry	60-65	63C½37	15	2.2	3D			
Slate, Crushed - ½	80-90	85C½36	30B	2.0	2D			3
Slate, Ground - ⅛	82-85	$84B_6$36	30B	1.6	2D			
Sludge, Sewage, Dried	40-50	45E47TW	30B	0.8	3D			
Soap, Beads or Granules	15-35	$25B_6$35Q	30A	0.6	2D			
Soap, Chips	15-25	20C½35Q	30A	0.6	1A-B-C			
Soap Detergent	15-50	$33B_6$35FQ	30A	0.8	1A-B-C			
Soap, Flakes	5-15	$10B_6$35QXY	30A	0.6	1A-B-C			
Soap, Powder	20-25	$23B_6$25X	30A	0.9	1A-B-C			
Soapstone, Talc, Fine	40-50	$45A_{200}$45XY	30B	2.0	1A-B-C			
Soda Ash, Heavy	55-65	$60B_6$36	30B	1.0	2D			1
Soda Ash, Light	20-35	$28A_{40}$36Y	30B	0.8	2D			1, 3
Sodium Aluminate, Ground	72	$72B_6$36	30B	1.0	2D			
Sodium Aluminate Fluoride (See Crytolite)								
Sodium Aluminum Sulphate	75	$75A_{100}$36	30B	1.0	2D			
Sodium Bentonite (See Bentonite)								
Sodium Biacarbonate (See Baking Soda)								
Sodium Chloride (See Salt)								
Sodium Carbonate (See Soda Ash)								
Sodium Hydrate (See Caustic Soda)								
Sodium Hydroxide (See Caustic Soda)								
Sodium Borate (See Borax)								
Sodium Nitrate	70-80	$75D_3$25NS	30A	1.2	2A-B			
Sodium Phosphate	50-60	55A35	30B	0.9/2.0	1A-B			1, 3
Sodium Sulfate (See Salt Cake)								
Sodium Sulfite	96	$96B_6$46X	30B	1.5	2D			
Sorghum, Seed (See Kafir or Milo)								
Soybean Cake	40-43	$42D_3$35W	30A	1.0	2A-1B-1C	Yes	125	1
Soybean, Cracked	30-40	35C½ 36NW	30B	0.5	2D	Yes	125	1
Soybean, Flake, Raw	18-25	22C½35Y	30A	0.8	1A-B-C			1
Soybean, Flour	27-30	$29A_{40}$35MN	30A	0.8	1A-B-C			2
Soybean, Meal Cold	40	$40B_6$35	30A	0.5	1A-B-C	Yes	125	1
Soybean Meal Hot	40	$40B_6$35T	30A	0.5	1A-B-C			1
Soybean, Whole	45-50	48C½26NW	15	1.0	3D	Yes	150	2
Starch	25-50	$38A_{40}$15M	45	1.0	1A-B-C			
Steel Turnings, Crushed	100-150	$125D_3$46WY	15	3.0	3D			
Sugar Beet, Pulp Dry	12-15	14C½26	30B	0.9	2D			3
Sugar Beet, Pulp Wet	25-45	35C½35X	30B	1.2	1A-B-C			3
Sugar, Refined, Granulated Dry	50-55	$53B_6$35PU	30A	1.2	1B			
Sugar, Refined, Granulated Wet	55-65	60C½35X	30A	2.0	1B			
Sugar Powdered	50-60	$55A_{100}$35PX	30A	0.8	1B			
Sugar Raw	55-65	$60B_6$35PX	30A	2.0	1B			1
Sulphur Crushed - ½	50-60	55C½35N	30A	0.8	1A-B			
Sulphur Lumpy - 3"	80-85	$83D_3$35N	30A	0.8	2A-B			
Sulphur, Powdered	50-60	$55A_{40}$35MN	30A	0.8	1A-B			
Sunflower Seed	19-38	29C½15	30	0.5	1A-B-C			
Talcum - ½	80-90	85C½36	30B	0.9	2D			
Talcum Powder	50-60	$55A_{200}$36M	30B	0.8	2D			
Tanbark Ground	55	$55B_6$45	30A	0.7	1A-B-C			
Timothy Seed	36	$36B_6$35NY	30A	0.6	1A-B-C			
Titanium Dioxide (See Ilmenite Ore)								
Tobacco, Scraps	15-25	$20D_3$45Y	30A	0.8	2A-B			

Material Characteristics

MATERIAL	Weight Lbs. per Cu. Ft.	Material Code	% Trough Loading	Mat'l Factor FM	Comp. Series	Multi-Flo Application	Multi-Flo Max Speed FPM	Bucket Elev Series
Tobacco Snuff	30	$30B_6$45MQ	30B	0.9	1A-B-C			
Tricalcium Phosphate	40-50	$45A_{40}$45	30A	1.6	1A-B			
Triple Super Phosphate	50-55	$53B_6$36RS	30B	2.0	3D			
Trisodium Phosphate	60	60C½36	30B	1.7	2D			
Trisodium Phosphate Granular	60	$60B_6$36	30B	1.7	2D			1, 3
Trisodium Phosphate Pulverized	50	$50A_{40}$36	30B	1.6	2D			
Tung Nut Meats, Crushed	28	$28D_3$25W	30A	0.8	2A-B			
Tung Nuts	25-30	$28D_3$15	30A	0.7	2A-B	Yes	175	
Urea Prills, Coated	43-46	$45B_6$25	45	1.2	1A-B-C			
Vermiculite, Expanded	16	16C½35Y	30B	0.5	1A-B			
Vermiculite, Ore	80	$80D_3$36	30B	1.0	2D			
Vetch	48	$48B_6$16N	30B	0.4	1A-B-C			
Walnut Shells, Crushed	35-45	$40B_6$36	15	1.0	2D			
Wheat	45-48	47C½25N	45	0.4	1A-B-C	Yes	150	2
Wheat, Cracked	40-45	$43B_6$25N	30A	0.4	1A-B-C	Yes	150	1
Wheat, Germ	18-28	$23B_6$25	30A	0.4	1A-B-C	Yes	150	1
White Lead, Dry	75-100	$88A_{40}$36MR	30B	1.0	2D			
Wood Chips, Screened	10-30	$20D_3$45VY	30A	0.6	2A-B	Yes	100	2
Wood Flour	16-36	$26B_6$35N	30A	0.4	1A-B			
Wood Shavings	8-16	12E45VY	30B	1.5	2A-B	Yes	100	
Zinc Concentrate Residue	75-80	$78B_6$37	15	1.0	3D			
Zinc Oxide, Heavy	30-35	$33A_{100}$45X	30A	1.0	1A-B			
Zinc Oxide, Light	10-15	$13A_{100}$45XY	30A	1.0	1A-B			

[1]Weight, pounds per bushel = lbs. per cu. ft. x 1.244

[2]Bucket Elevator Series Designation

1 = Series CDC (Centrifugal wiith chain)
2 = Series CDB (Centrifugal with belt)
3 = Series CEC (Continuous with chain)
4 = Series CEB (Continuous with belt)
5 = Series CM (Cement Mill with chain)
6 = Series SC (Super Capacity - Continuous with chain)
Note: Can be used with same materials as No. 3 (CEC) if dictated by capacity.

This column lists most commonly used bucket elevator series for particular materials. However previous field experience and intimate knowledge of the actual material being conveyed may dictate a different series selection. Contact Goodman Conveyor Company on applications for other materials.

[3]Multi-Flo Conveyor Application/Speed

These columns list data relative to materials most commonly conveyed in a multi-flo conveyor. Contact Goodman Conveyor Company on applications for other materials.

Screw Conveyors — Capacity

Determination of conveyor size and speed necessary to achieve required capacity of the material to be conveyed.

Information Required:

1. Required capacity in cubic feet per hour. (Average bulk densities are listed in the Materials Table if the specific bulk density is not available).
2. Recommended percentage of conveyor loading (from the preceding Materials Table).
3. Maximum lump size (this is important due to radial clearances in the screw conveyor).

Determination of Conveyor Size

Refer to Capacity Table, Page 23. Under the capacity column opposite the recommended percentage of conveyor loading, find the capacity at maximum RPM that equals or just exceeds the capacity required per hour. The screw diameter will be found in the appropriate column on the same line, as will the maximum particle size that can be conveyed with that screw diameter.

Determine minimum screw diameter based on lump size limitations as outlined on page 24.

If indicated by lump size limitation, select a larger diameter screw and adjust conveyor speed.

Calculation of Capacity for Conveyors with Special Pitch or Modified Flights

The preceding data is based on standard pitch, standard flight screws. Special screw types are selected in the same manner, but the selection capacity used for size determination must be modified from the capacity actually required through multiplication by one or more of the accompanying applicable factors.

$$SC = C \times CF$$

EQUATION SYMBOLS

SC = Selection Capacity (Cu. Ft. Per Hour)
Also Referred to as Equivalent Capacity

C = Required Capacity in Cubic Feet Per Hour

CF = Capacity Factor ($CF_1 \times CF_2 \times CF_3 \times CF_4$)

Special Screw Pitch Capacity Factors (CF_1)

Pitch	Description	Capacity Factor
Standard	Pitch = Diameter	1.00
Short	Pitch = ⅔ Diameter	1.50
Half	Pitch = ½ Diameter	2.00
Long	Pitch = 1½ Diameters	0.67

Special Screw Flight Capacity Factors (CF_2)

Type	Conveyor Loading		
	15%	30%	45%
Cut flight	1.95	1.57	1.43
Cut-and-folded flight	N.R.x	3.75	2.54

x Not recommended

Ribbon Screw Capacity Factors (CF_3)

Screw Dia.	Ribbon Width	Conveyor Loading		
		15%	30%	45%
6	1	1.03	1.32	1.85
9	1½	1.06	1.40	1.76
12	2	1.06	1.41	1.75
	2½	1.00	1.20	1.55
14	2½	1.02	1.32	1.67
16	2½	1.09	1.47	1.85
18	3	1.06	1.41	1.74
20	3	1.12	1.52	1.90
24	3	1.42	1.77	2.20

Factors for Screws with Paddles* (CF_4)

	Paddles per Pitch			
	1	2	3	4
Factor	1.08	1.16	1.24	1.32

*Standard paddles at 45° reverse pitch.

Screw Conveyors — Capacity

Calculation of Conveyor Speed

Conveyor speed may be calculated by the following equation.

$$N = \frac{C}{\text{CFH AT 1 RPM}}$$

EQUATION SYMBOLS

N = Conveyor Speed (RPM), but not greater than the maximum recommended speed listed in capacity table pg. 23.

C = Required Capacity in Cubic Feet Per Hour

Note: When hard surfaced intermediate bearings are required, (refer to material characteristics tables listing intermediate bearing selection). Maximum screw speed is determined by the following equation.

$$N = \frac{120}{\text{Shaft dia. in Inches}}$$

Note: If the screw to be used consists of equally spaced multiple flights, an individual flight pitch should be used for speed determination. For example, if the screw is double flight, standard pitch, calculate the speed as for a single standard pitch screw.

EXAMPLE FOR CAPACITY CALCULATION:

A horizontal screw conveyor 30 Ft. Lg. is required to transport 30 tons per hour (60,000 lbs/hr.) of Portland cement. Material characteristics tables list cement, Portland and cement, aerated (Portland). Because the action of a screw conveyor will aerate the cement, use the aerated data and code. $68A_{100}16M$ is material code. Weight of material = 60 to 75 lbs./cu. ft. Component series is 2D which requires hard iron intermediate hanger bearing which could limit conveyor speed. Material code also list a trough loading of 30%B.

The required volume of material to be conveyed:

$$C = \frac{60{,}000 \text{ lbs./hr.}}{60 \text{ lbs./cu. ft.}} = 1000 \text{ cu. ft./hr.}$$

Since conveyor is simply a transport device with no volume control or moving requirement the screw can be standard (full pitch) $CF_1 = 1.0$. No special flights or paddles are required so CF_2, CF_3 and CF_4 all = 1.0 and CF = 1.0. Thus selection (equivalent) capacity is

$$SC = 1000 \times 1.0 = 1000 \text{ cu. ft./hr.}$$

This is the capacity value to be used in the capacity table page 23. From this table, in appropriate column under 30%B loading, it is found that a 14″ diameter conveyor at maximum recommended speed of 50 RPM will convey 1031 cu. ft. per hour and 20.62 cu. ft. per revolution.

Actual conveyor speed can be calculated

$$N = \frac{1000 \text{ cu. ft./hr.}}{20.62 \text{ cu. ft./hr. at 1 RPM}} = 48.5 \text{ RPM}$$

Use 49 RPM

Because the cement is a fine powder (100 sieve) there is no "lump size" to consider or to make an allowance for. However, since hard iron bearings are required, check maximum dia shaft that can be used at 49 RPM:

$$\text{Max. shaft dia.} = \frac{120}{49 \text{ RPM}} = 2.45 \text{ dia.}$$

Nearest standard size is $2\frac{7}{16}$″ coupling shaft. This selection should not be finalized until horsepower and torque are calculated. Torque limitations could result in a larger diameter shaft which would require a slower speed (RPM) and thus a larger screw diameter to handle the same equivalent capacity.

Screw Conveyors — Capacity Table

Trough Loading	Screw Dia.	Pipe Size (Nom. Dia.) Used for Capacity Tables	Maximum RPM	Capacity in Cu. Ft. Per Hr.*	
				At Maximum RPM	At 1 RPM
45%	6	2	165	368	2.23
	9	2½	155	1240	8.00
	12	3	145	2813	19.40
	14	3½	140	4330	30.93
	16	3½	130	6126	47.12
	18	4	120	8052	67.10
	20	4	110	10253	93.21
	24	4	100	16368	163.68
	30	4	90	29150	323.89
30%A	6	2	120	180	1.50
	9	2½	100	536	5.36
	12	3	90	1164	12.93
	14	3½	85	1753	20.62
	16	3½	80	2514	31.42
	18	4	75	3355	44.73
	20	4	70	4350	62.14
	24	4	65	7093	109.12
	30	4	60	12955	215.92
30%B	6	2	60	90	1.50
	9	2½	55	295	5.36
	12	3	50	647	12.93
	14	3½	50	1031	20.62
	16	3½	45	1414	31.42
	18	4	45	2013	44.73
	20	4	40	2486	62.14
	24	4	40	4365	109.12
	30	4	35	7557	215.92
15%	6	2	60	45	.75
	9	2½	55	147	2.68
	12	3	50	323	6.46
	14	3½	50	516	10.31
	16	3½	45	707	15.70
	18	4	45	1006	22.36
	20	4	40	1242	31.06
	24	4	40	2182	54.56
	30	4	35	3779	107.96

*Capacities shown are for full pitch screws. Consult factory for inclined conveyors.
Dimensions in inches.
See page 24 for Lump Size Limitations

LUMP SIZE LIMITATIONS

The size of a screw conveyor not only depends on the capacity required, but also on the size and proportion of lumps in the material to be handled. The size of a lump is the maximum dimension it has. If a lump has one dimension much longer than its transverse cross-section, the long dimension or length would determine the lump size.

The character of the lump also is involved. Some materials have hard lumps that won't break up in transit through a screw conveyor. In that case provision must be made to handle these lumps. Other materials may have lumps that are fairly hard, but degradable in transit through the screw conveyor, thus really reducing the lump size to be handled. Still other materials have lumps that are easily broken in a screw conveyor and lumps of these materials impose no limitations.

Three classes of lump sizes apply as follows:

Class 1. A mixture of lumps and fines in which not more than 10% are lumps ranging from maximum size to one half of the maximum; and 90% are lumps smaller than one half of the maximum size.

Class 2. A mixture of lumps and fines in which not more than 25% are lumps ranging from the maximum size to one half of the maximum; and 75% are lumps smaller than one half of the maximum size.

Class 3. A mixture of lumps only in which 95% or more are lumps ranging from maximum size to one half of the maximum size; and 5% or less are lumps less than one tenth of the maximum size.

Table below shows the recommended maximum lump size for each customary screw diameter and the three lump classes. The ratio, *R*, is included to show the average factor used for the normal screw diameters, which then may be used as a guide for special screw sizes and constructions. For example:

$$R = \frac{\text{radial clearance (in.)}}{\text{lump size (in.)}}$$

This ratio applies to such unusual cases as screws 16 in. in diameter mounted on 2-in. solid shafts; or 12-in. diameter screws mounted on 6-in. diameter pipes (the large pipe serving to reduce deflection of the screw).

Example: To illustrate the choice of screw conveyor size from maximum lump size table, consider crushed ice with Material Characteristics Code $D_3$35Q, weighing 35-45 lbs/ft³. Referring to material classification chart page 11, D_3 means that lump size is 3″ and under (3″ to ½″). If size distribution was: 10% of 3″; 45% of 1½″ and 45% of 1″ and under, selection from table would fall under Class I (3″ x 1.75 R = 5¼″ radial clearance) which requires a 14″ dia. screw. However, if from actual specification of crushed ice it is known that product has a maximum lump size of 1½″ with 25% being 1½″. Selection from table would fall under Class II (1½″ x 2.52 = 3¾″ radial clearance) which requires only 9″ dia. screw.

MAXIMUM LUMP SIZE TABLE

Screw dia (in.)	*Pipe OD (in.)*	**Radial Clearance (in.)*	*Class 1 10% lumps Ratio R = 1.75 Max lump (in.)*	*Class 2 25% lumps Ratio R = 2.5 Max lump (in.)*	*Class 3 95% lumps Ratio R = 4.5 Max lump (in.)*
6	2⅜	2⁵⁄₁₆	1¼	¾	½
9	2⅜	3¹³⁄₁₆	2¼	1½	¾
9	2⅞	3⁹⁄₁₆	2¼	1½	¾
12	2⅞	5¹⁄₁₆	2¾	2	1
12	3½	4¾	2¾	2	1
12	4	4½	2¾	2	1
14	3½	5¾	3¼	2½	1¼
14	4	5½	3¼	2½	1¼
16	4	6½	3¾	2¾	1½
16	4½	6¼	3¾	2¾	1½
18	4	7½	4¼	3	1¾
18	4½	7¼	4¼	3	1¾
20	4	8½	4¾	3½	2
20	4½	8¼	4¾	3½	2
24	4½	10¼	6	3¾	2½
30	4½	13¼	7½	5	3

*Radial clearance is distance between bottom of the trough and the bottom of screw pipe.

Screw Conveyors — Horsepower Calculation

HORIZONTAL SCREW CONVEYORS

The horsepower required to operate a horizontal screw conveyor is based on proper installation, uniform and regular feed rate to the conveyor and other design criteria.

The following factors determine the horsepower requirement of a screw conveyor operating under the foregoing conditions.

- C = Capacity in cubic feet per hour. (Required capacity)
- e = Drive efficiency. See Table.
- F_b = Hanger bearing factor. See Table.
- F_d = Conveyor diameter factor. See Table.
- F_f = Flight factor. See Table * Use 1.0 for standard flights
- F_m = Material factor. See Material Characteristics Table.
- F_o = Overload factor. See graph.
- F_p = Paddle factor. See Table.
- L = Total length of conveyor, feet.
- N = Operating speed, RPM (revolutions per minute).
- W = Weight of the material AS CONVEYED, lbs. per cubic foot.

The horsepower requirement is the total of the horsepower to overcome conveyor friction (HP_f) and the horsepower to transport the material at the specified rate (HP_m) multiplied by the overload factor F_o and divided by the total drive efficiency e, or:

$$HP_f = \frac{LN\ F_d F_b}{1{,}000{,}000} = \text{(Horsepower to run an empty conveyor)}$$

$$HP_m = \frac{CLW\ F_f\ F_m\ F_p}{1{,}000{,}000} = \text{(Horsepower to move the material)}$$

$$\text{Total HP} = \frac{(HP_f + HP_m)\ F_o}{e} \quad \text{(If } HP_f + HP_m \text{ is greater than 5.2 use 1.0 for } F_o\text{)}$$

***Note:** Conveyors which have deviation in pitch only do not require special consideration, use $F_f = 1.0$ same as standard flights.

Hanger Bearing Factor, F_b

Bearing Type	Bearing Factor, F_b
Ball	1.0
Babbitt Bronze, Plain *Bronze, Graphite *Bronze, Oil-Impregnated *Canvas Base Phenolic *Wood, Oil Impregnated	1.7
*Nylon •UHMW	2.0
*Hard Iron *Hard Surfaced	4.4

*Nonlubricated, or bearings not additionally lubricated.
•Ultra-High Molecular Weight Polymer.
Dimensions in inches.

Diameter Factor, F_d

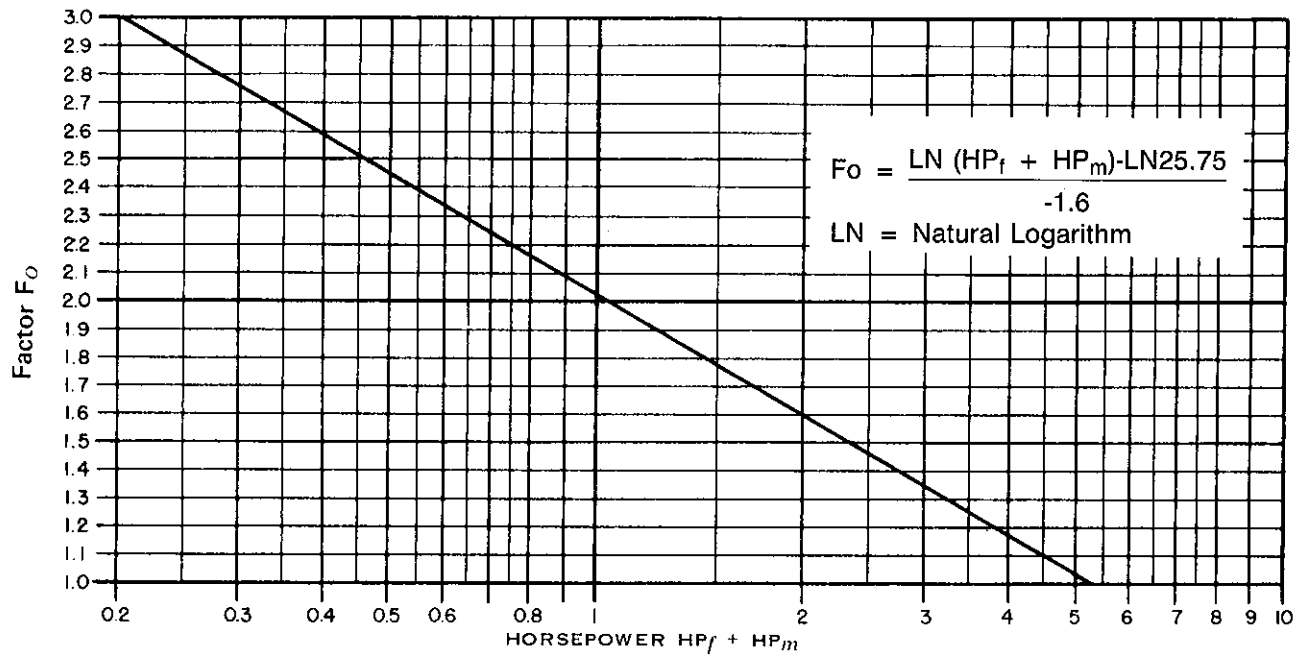
Diameter	Factor, F_d
6	18
9	31
12	55
14	78
16	106
18	135
20	165
24	235
30	360

Modified Flight Factor, F_f

Flight Type	Conveyor Loading			
	15%	30%	45%	95%
Cut Flight	1.10	1.15	1.20	1.3
Cut-and-Folded Flight	NR*	1.5	1.7	2.2
Ribbon Flight	1.05	1.14	1.20	—

*Not Recommended

F_O — OVERLOAD FACTOR



FOR VALUES OF $HP_f + HP_m$ GREATER THAN 5.2, F_O IS 1.0

TRACE THE VALUE OF ($HP_f + HP_m$) VERTICALLY TO THE DIAGONAL LINE, THEN ACROSS TO THE LEFT WHERE THE F_O VALUE IS LISTED.

Paddle Factor, Fp

	*Paddles per Pitch			
	1	2	3	4
Factor, Fp	1.29	1.58	1.87	2.16

*Standard paddles at 45° reverse pitch.

Drive Efficiency Factor, e

Screw Drive or Shaft Mount with V-Belt	V-Belt to Helical Reducer with Coupling	Motoreducer with Chain Drive	Motoreducer with Coupling	Worm Gear
.88	.87	.87	.95	Consult Mfg.

EXAMPLE FOR HORSEPOWER CALCULATION

Use same example problem from pg. 22 showing screw conveyor capacity. Known data from problem

- C = Capacity, 1000 CFH
- e = Drive efficiency, .88 (assume the drive a conventional screw drive with V-Belt)
- Fb = Hanger bearing factor, 4.4
- Fd = Conveyor diameter factor for 14 dia., 78
- Ff = Flight factor, 1.0
- Fm = Material factor, 1.4
- Fp = Paddle factor, 1.0
- L = Total length of conveyor, 30 ft.
- N = Operating speed, 49 RPM
- W = Weight of material as conveyed, 60 PCF

Frictional Horsepower required to drive the conveyor empty is:

$$HPf = \frac{30 \times 49 \times 78 \times 4.4}{1{,}000{,}000} = .50$$

Material Horsepower required to move the material is:

$$HPm = \frac{1000 \times 30 \times 60 \times 1.0 \times 1.4 \times 1.0}{1{,}000{,}000} = 2.52$$

$$HPf + HPm = .50 + 2.52 = 3.02$$

Since this sum is less than 5.2, overload factor Fo must be used from table.

$$\text{Total HP} = \frac{(.50 + 2.52) \times 1.34}{.88} = 4.6$$

Select a standard 5 horsepower motor with minimum Class II screw drive. Continue problem selection on pg. 27 for torsional ratings of screw conveyor parts.

Torsional Ratings of Conveyor Screw Parts

Although any given unit may be adequate for material conveying capacity, the horsepower required to operate the system may exceed the torque capacity of standard components. The torque capacity of a screw conveyor is limited by the allowable stress value of the individual components being used. The table below combines the various torsional ratings of component parts so that it is easy to compare the torsional ratings of all the stressed parts of standard conveyor screws.

The lowest torsional rating figure for any given size of shaft will be the one that governs how much torque (horsepower) may be safely transmitted. For example, using standard two bolt GCC shafts, the limiting torsional strength of each part is indicated by the figure in parentheses.

Torque, briefly defined as turning effort applied to the conveyor shaft, may be easily calculated by using the following formula.

$$\frac{63{,}025 \times \text{Motor Horsepower}}{\text{N (RPM of Screw)}} = \text{Torque (In. Lbs.)}$$

EXAMPLE: Continuing with problem from pages 22 and 26 the following selections have been made:

Motor HP = 5
N (RPM) = 49
Screw Dia. = 14
Shaft Dia. = $2\frac{7}{16}$ Hardened.

$$\text{Torque} = \frac{63025 \times 5}{49} = 6431 \text{ In. Lbs.}$$

By referring to the Torque Rating Table it is noted that the calculated torque of 6431 in lbs is less than the maximum allowable torque of (9273) in. lbs under two bolts in shear. So selections made previously are adequate.

If required torque is greater than values listed in table other solutions include external collar or bolt pads welded to pipe for increasing bolt bearing area.

Torsional overloading is generally encountered when calculated screw speeds are relatively slow and/or calculated horsepower is large. Torque can be decreased by increasing conveyor speed. However, use caution in considering a speed increase.

A. Do not exceed maximum recommended speed for material being conveyed as indicated by capacity table.
B. Do not exceed speed limitation when using hard surfaced bearings.
C. Do not exceed speed limitation if unit is classed as a screw feeder.

SHAFT DIA. ④	PIPE DIA. ①	BOLT DIA.	TORQUE RATINGS IN INCH-POUNDS									
			BOLTS						PIPE ⑤		SHAFTS	
			BEARING		SHEAR						③	②
					STANDARD SAE GRADE 2		HIGH TORQUE SAE GRADE 5					
			2 BOLT	3 BOLT	2 BOLT	3 BOLT	2 BOLT	3 BOLT	SCH 40	SCH 80	GCC STANDARD (C1045)	CEMA STANDARD (C1018)
1	1¼	⅜	1915	2873	1369	2054	2945	4417	3143	3903	(1032)	822
1½	2	½	4970	7454	(3652)	5478	7852	11778	7512	9794	3852	3069
2	2½	⅝	7815	11723	(7609)	11413	16358	24538	14258	17937	9542	7603
$2\frac{7}{16}$	3	⅝	11606	17409	(9273)	13909	19937	29905	23103	29819	18858	15026
3	3½	¾	(15435)	23152	16434	24652	35334	53001	32078	42076	35580	28351
3	4	¾	24975	37463	(16434)	24652	35334	53001	43074	57236	35580	28351
$3\frac{7}{16}$	4	⅞	(21721)	32582	25631	38447	55107	82661	43074	57236	53296	42467
$3\frac{15}{16}$	5	1	45759	68639	(38347)	57521	82446	123670	73044	99582	80286	63973
$4\frac{7}{16}$	6	1¼	89917	134876	(67526)	101289	140181	217771	113843	163796	110706	88212
$4\frac{15}{16}$	6	1¼	(72302)	108453	73135	112702	161539	242309	113843	163796	158818	126548

Footnotes:
① Nominal Pipe Size
② Includes Coupling & Drive Shafts.
③ Hardened shafts should be selected for wear characteristics. Use GCC standard C-1045 for torque values.
④ Shaft dia. 1" thru $3\frac{7}{16}$" are standard CEMA sizes. Larger sizes shown for special screws exceeding CEMA standards.
⑤ CEMA standard is sch. 40 pipe. Sch. 80 shown for special screw applications.

Conveyor Screw Deflection

The normal accepted industry application standard is that deflection of a screw not exceed .25 inches (¼"). Standard screw sizes of standard length are seldom a problem. However if longer than standard length sections of screws are to be used without intermediate hanger bearings, selection should be checked to insure deflection is within accepted limits. Excessive deflection of the screw could allow screw to contact trough causing premature wear and increase in horsepower/torque.

The deflection at mid span of a given screw may be calculated from the following formula.

$$DEF = \frac{5WL^3}{384\ E\ I}$$

Where:
- DEF = Deflection at mid span, inches
- W = Total weight of screw, pounds (see pages 72 thru 75 for standard sizes and lengths)
- L = Screw length, inches
- E = Modulus of elasticity
  Use 29,000,000 for low carbon steel pipe (A53)
  Use 28,000,000 for stainless steel pipe
- I = Moment of inertia for pipe or shaft, inches^4. Table below list values for commonly used pipe sizes.

Example: Determine the deflection of a 14S516 conveyor screw section mounted on a 3" Sch. 40 pipe with overall length of 14'0".

$$W = \frac{277\#}{11.75'} \times 14' = 330\#$$ (Use standard length weight and interpolate)

$L = 168"$

$I = 3.017\ in^4$ (from table)

$$DEF = \frac{5 \times 330 \times 168^3}{384 \times 29{,}000{,}000 \times 3.017} = .233 \text{ inches}$$

Very often the problem of excessive deflection can be solved by using a conveyor screw section with a larger diameter pipe or a thicker wall pipe (Sch. 80). Usually the larger diameter pipe is more effective than thicker wall pipe in reducing deflection and is usually more cost effective.

Applications where the calculated deflection of screw exceeds .25 inches and correction is not apparent, can be referred to our engineering department for recommendations.

CONVEYOR SCREW PIPES

NOM. PIPE SIZE	NOM. OD	SCH 40				SCH 80			
		NOM. ID	WT. #/FT.	S IN^3	I IN^4	NOM. ID	WT. #/FT.	S IN^3	I IN^4
1¼	1.660	1.380	2.27	.2342	.1947	1.278	3.0	.2883	.2418
2	2.375	2.067	3.65	.5596	.666	1.939	5.02	.7164	.8769
2½	2.875	2.469	5.79	1.062	1.53	2.323	7.66	1.3359	1.924
3	3.5	3.068	7.58	1.721	3.017	2.9	10.25	2.2195	3.894
3½	4.0	3.548	9.11	2.39	4.788	3.364	12.51	3.1347	6.28
4	4.5	4.026	10.79	3.209	7.233	3.826	14.98	4.266	9.61
5	5.563	5.047	14.62	5.441	15.16	4.813	20.78	7.421	20.67
6	6.625	6.065	18.97	8.481	28.14	5.761	28.57	12.2	40.49
8	8.625	8.071	24.70	16.78	72.49	7.625	43.39	24.88	105.7

S IN.^{3} = Section modulus and is shown for reference only.

Screw Feeders — Types and Selection

Screw feeders have a wide range of applications for the feeding of bulk materials at a precise volumetric rate, usually from a storage or surge tank.

Due to the many variables of different materials, two general feeder types are described. With flight variations of each, the majority of bulk materials may be successfully conveyed.

Selection of recommended feeder types has been related to the Materials Table, Pages 12-20. Specific consideration for feeder selection relates to the normal percentage of loading recommended for the material and its maximum particle size.

Feeder Types

Type A — Feeders consist of a uniform, standard pitch flight with an elongated inlet limited in maximum length. This type feeder is used for materials of nominal particle size in accordance with those listed in the Feeder Selection Chart, Page 30. These feeders remove the material from the extreme rear of the inlet opening.

Type B — Similar to Type A except the screw flight pitch is reduced to ⅔ standard pitch. The maximum length of the inlet for this type feeder may be longer than that of Type A, but the inlet length is also limited in this standard series. Type B feeders are recommended for materials which fluidize easily. For some materials, the flighting must be tapered to allow efficient withdrawal of the material.

Material Withdrawal

Standard Goodman Conveyor screw feeders previously described have uniform screw diameters at the inlet. In operation, standard feeders withdraw the material from the rear of the inlet opening until all the material is removed from the rear. If uniform material removal over the full length of the inlet is required, the screw length exposed under the inlet must be tapered. Standard tapers reduce the screw diameter uniformly from full to ⅔ diameter at the inlet end.

Tapered screws are also used to feed materials having large particles.

Feeder Length

It is frequently necessary to convey the material a greater distance than the maximum length of a standard feeder (Type 1). Both basic feeder types (A and B) are available for direct connection to a standard conveyor extension. Feeders with such extensions are designated Type 2.

Feeder Selection (Single Screw Feeder)

1. Refer to materials table and determine material code class and density.
2. Refer to the feeder selection chart on page 30 and find the feeder type based on the normal percentage of trough loading recommended for the material to be fed.
3. Refer to the feeder capacity tables page 31. In the appropriate table for the feeder type selected, find the capacity which equals or exceeds the required feeder capacity. The feeder screw diameter will be found in the appropriate column on the same line.
4. Once the size has been established, divide the required feeder capacity (in cubic feet per hour) by the feeder capacity at one RPM to obtain the required feeder speed in RPM.

$$N = \frac{C}{Cf}$$

where N = Speed of feeder, RPM
C = Required capacity of feeder, cu. ft. per hour
Cf = Capacity at one RPM, cu. ft. per hour

Feeder Extension

If it is necessary to convey the material beyond the maximum Type 1 feeder length, a Type 2 feeder may be used. Refer to feeder capacity tables page 31 to determine the correct extension conveyor size appropriate for the recommended percentage of conveyor loading of the material.

Multiple Screw Feeders

This type of feeder is usually installed in flat bottom bins for discharging materials which have a tendency to pack or bridge under pressure. The multiple screw feeder usually feeds the material to a collecting conveyor and are commonly used for handling wood by-products. Because of the many factors involved in designing multiple feeders, such as material characteristics, height of bin or weight stored vertically above the screws, we recommend that you contact us for design information.

Feeder Selection Chart

Recommended Loading %*	Maximum Particle Size	Feeder Type A	Feeder Type B	Feeder Type A(t)	Feeder Type B(t)
15%	+ ½"	■		■	
	− ½"		■		■
30% A	+ ¼"	■		■	
	− ¼"		■		■
30% B	+ ¼"	■		■	
	− ¼"		■		■
45%	+ ⅛"	■		■	
	− ⅛"		■		■

*From the Materials Table.
(t)—Tapered feeder screw.
Dimensions in inches.

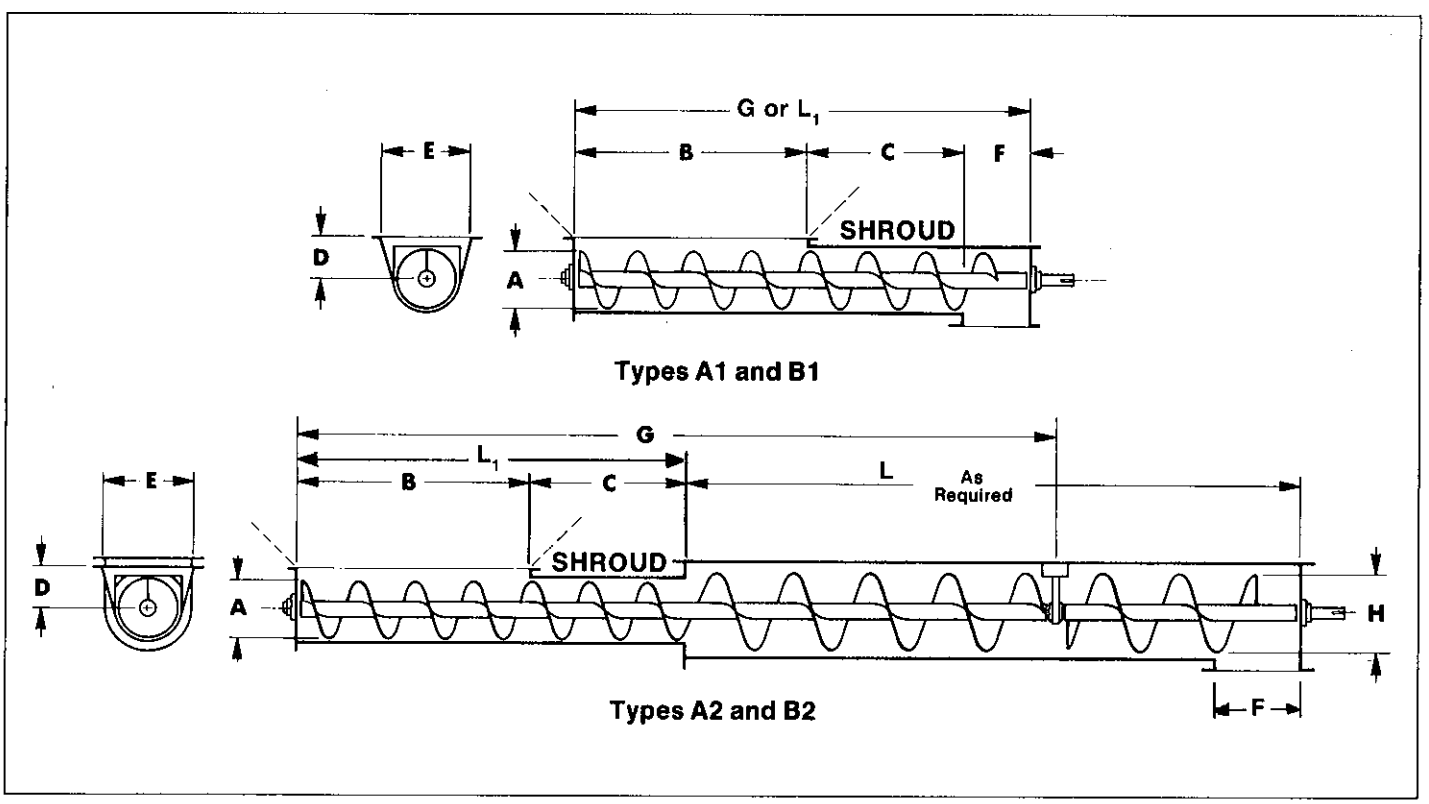
■ RECOMMENDED

Note: If the Materials Table lists a Notation 2 (Fluidizes Easily) for the material to be fed, use only Types B or B(t) and double Dimension C to protect against flooding of material.

Lf = Equivalent Length of Feeder

Feeder Type	Flight Type Under Inlet	Material Code Class	Lf Value, Feet For Dimensions See Page 31
Type A	Standard Pitch Uniform Dia.	A15, A16, A17, A25, A26, A27,	$Lf = L_1 + \frac{B}{6} + \frac{C}{12}$
Type B	Short Pitch (⅔) Uniform Dia.	A35, A36, A37	B & C from Pg.
Type A(t)	Standard Pitch Tapered Dia. *	B15, B16, B17 B25, B26, B27	$Lf = L_1 + \frac{B}{12} + \frac{C}{12}$
Type B(t)	Short Pitch (⅔) Tapered Dia.*	B35, B36, B37	

(t) = Tapered Feeder Screw
* Variable pitch uniform diameter may be used in place of tapered diameter with constant pitch.



Screw Feeders — Capacity

TYPE A FEEDERS

Screw Dia.	△ Max. Speed RPM	Flight Pitch	Max. Lump Size	*Capacity Cubic Feet per Hour		Dimension						Type A2 Feeder with Extension Conveyor. H Dia. Trough Loading %		
				Cf at one RPM	at max. RPM	B △ Max	C Min	D	E	F	G △ Max	15	30	45
6	70	6	¾	4.72	330	36	12	7	14	7	96	12	9	9
9	65	9	1½	16.96	1102	42	18	9	18	10	120	18	14	12
12	60	12	2	40.96	2458	48	24	10	22	13	144	24	18	16
14	55	14	2½	65.29	3591	54	28	11	24	15	144	30	20	18
16	50	16	2¾	99.48	4974	56	32	11½	28	17	144		24	20
18	45	18	3	141.65	6374	58	36	12⅛	31	19	144		30	24
20	40	20	3½	196.77	7871	60	40	13½	34	21	144			30
24	30	24	3¾	345.55	10367	64	48	16½	40	25	144			

TYPE B FEEDERS

Screw Dia.	△ Max. Speed RPM	Flight Pitch	Max. Lump Size	*Capacity Cubic Feet per Hour		Dimension						Type B2 Feeder with Extension Conveyor. H Dia. Trough Loading %		
				Cf at one RPM	at max. RPM	B △ Max	C** Min	D	E	F	G △ Max	15	30	45
6	70	4	½	3.15	221	54	9	7	14	7	96	12	9	9
9	65	6	¾	11.31	735	64	12	9	18	10	120	14	12	10/12
12	60	8	1	27.31	1639	72	16	10	22	13	144	20	16	14
14	55	9⅜	1¼	43.72	2405	80	20	11	24	15	144	24	18	16
16	50	10⅝	1½	66.06	3303	82	24	11½	28	17	144	30	20	18
18	45	12	1¾	94.43	4249	86	28	12⅛	31	19	144		24	20
20	40	13⅜	2	131.59	5264	90	32	13½	34	21	144		30	24
24	30	16	2½	230.37	6911	96	36	16½	40	25	144			30

△ Not absolute. Contact factory for applications exceeding values listed.
*Based on 95% of theoretical capacity with standard pipe.
**If materials table list notation 2 (fluidizes easily) double dimension C to protect against flooding of material.

Screw Feeders Horsepower Calculation

The calculation of the required horsepower to operate screw feeders is very similar to that for standard screw conveyors as shown on pages 25 and 26. The calculation involves the addition of two horsepowers, one for empty feeder friction and the other for material friction. If type 2 (feeder with extension conveyor) is used, separate empty and material friction calculations are made for these and added to total.

Horsepower for single screw feeder:

$$HP = \frac{(HPa + HPb)\ Fo}{e}$$

Horsepower for single screw feeder with extension conveyor:

$$HP = \frac{(HPa + HPb + HPf + HPm)\ Fo}{e}$$

Where: Empty Feeder Friction

$$HPa = \frac{L_1\ N\ Fd\ Fb}{1{,}000{,}000}$$

Feeder Material Friction

$$HPb = \frac{C\ W\ Lf\ Fm}{1{,}000{,}000}$$

Empty Extension Conveyor Friction

$$HPf = \frac{L\ N\ Fd\ Fb}{1{,}000{,}000}$$

Extension Conveyor Material Friction

$$HPm = \frac{C\ L\ W\ Ff\ Fm\ Fp}{1{,}000{,}000}$$

Nomenclature is defined.

- C = Capacity in cubic feet per hour (Required Capacity)
- e = Drive efficiency. See table page 26.
- Fb = Hanger bearing factor. See table page 25. Hanger bearings are not recommended for Type 1 Feeders.
- Fd = Conveyor diameter factor. See page 25.
- Ff = Flight Factor. See table page 25. Use 1.0 for standard flights.
- Fm = Material factor. See Materials Table.
- Fo = Overload factor. See table page 26.
- Fp = Paddle factor. See table page 26. Note: Not recommended for feeder applications.
- L = Length of extension conveyor, feet
- L_1 = Length of feeder, feet. See drawing page 30.
- Lf = Equivalent length of feeder, feet. See table page 30.
- N = Operating speed of feeder, RPM (rev. per min.)
- W = Weight of the material as conveyed, lbs. per cubic feet

Example of Single Screw Feeder

Select a single screw feeder without extension conveyor for the following:

Material to be handled: Salt cake, dry coarse (sodium sulfate) ½" particle size
Capacity: 26 tons per hour
Length of Feeder, L_1: 10 feet (120 inches)
Inlet opening: 40 inches long

Uniform material withdrawal is required from along the whole inlet opening.

1. From materials table page 18, this materials code is $85B_6 36TU$. Component group designation of 3D and a material factor (Fm) of 2.1. Normal through percent loading is 30B and weight of material is 85 lbs. per cu. ft.
2. Component group series D is for hard iron bearing factor, Fb = 4.4. However since single screw feeder without extension conveyor is required, no hanger bearing is required so factor Fb is not used.
3. Material particle size is ½ in. so refer to feeder selection chart page 30. Selection shows Feeder Type A or A(t) and since uniform rate of withdrawal along inlet is required, select Type A(t) which is standard pitch with tapered diameter.
4. Required capacity is:

   $$\frac{26\ TPH \times 2000\ lbs/ton}{85\ PCF} = 612\ cu.\ ft.\ per\ hour$$

5. Refer to Type A Feeder capacity table per page 31, a 9 inch diameter single screw feeder will handle 1102 cu. ft. per hour at a maximum of 65 RPM and Cf = 16.96 at one RPM.

   Using formula for speed

   $$N = \frac{C}{Cf} = \frac{612}{16.96} = 36.08\ RPM$$ Use 36 RPM

   Also 9 inch diameter list maximum lump size of 1½ inches which is satisfactory since actual material is only ½ inch.
6. Calculate equivalent length (Lf) of the feeder using table on page 30 and dimensions from capacity table page 31.

   $$LF = L_1 + \frac{B}{12} + \frac{C}{12} = 10 + \frac{40}{12} + \frac{18}{12} = 14.83\ ft$$

7. Conveyor diameter factor Fd = 31 from page 25.
8. Calculate empty feeder friction HPa.

   $$HPa = \frac{L_1\ N\ Fd}{1{,}000{,}000} = \frac{10 \times 36 \times 31}{1{,}000{,}000} = .011\ HPa$$

9. Calculate feeder material friction HPb.

   $$HPb = \frac{C\ W\ Lf\ Fm}{1{,}000{,}000} = \frac{612 \times 85 \times 14.83 \times 2.1}{1{,}000{,}000} =$$

   1.62 HPb
10. Calculate total HP based on using a drive with efficiency (e) of .88 and overload factor (Fo) of 1.73.

    $$HP = \frac{(HPa + HPb)\ Fo}{1{,}000{,}000} = \frac{(.011 + 1.62) \times 1.73}{1{,}000{,}000} =$$

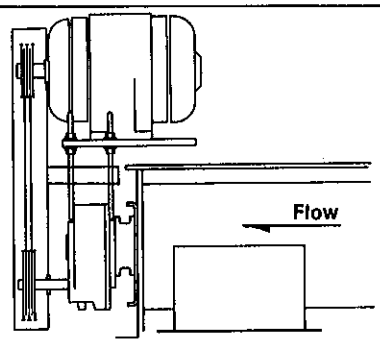
    3.21 HP

    Use 5 HP electric motor with speed reduction to 36 RPM.
11. Select screw feeder components based on torque of 5 HP at 36 RPM

    $$Torque\ (in.\ lbs) = \frac{63025 \times 5}{36} = 8753\ in.\ lbs.$$

    Refer to page 27 for torsional rating of conveyor screw parts for selection.

Drive Arrangements

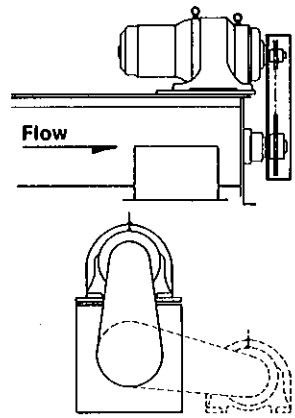


Screw Conveyor Type Drive

The most commonly employed drive for screw conveyors is the Screw Conveyor Type Drive. Standard screw conveyor type drives consist of a helical shaft mount reducer, an adapter with seal, an integral drive shaft which will accommodate thrust in either direction and conforms to CEMA standards, and an adjustable motor mount which attaches directly to the reducer housing. Manufacturers of this type of drive equipment may also offer trough ends which conform to CEMA standards.

Power transmission from motor to reducer is by means of a V-belt drive. No conveyor drive end bearing is required when this arrangement is used. An enclosed V-belt guard which attaches to the motor mount is highly recommended for this type of drive arrangement.

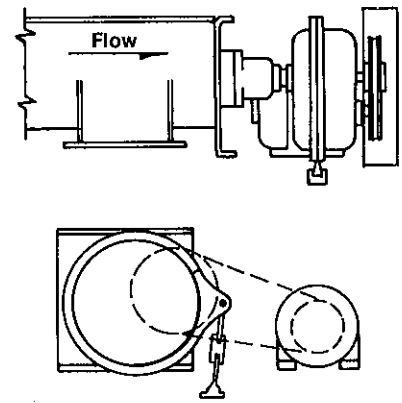
The Screw Conveyor Type Drive is unique in that it is the only type drive available that is intended solely for use with the screw conveyor product line.



Concentric Reducer/Roller Chain Combination

This type drive consists of a concentric reducer with an integral or foot mounted motor and may be mounted directly to the conveyor cover with an adapter base or mounted in other positions, depending on available space and accessibility.

The reducer output shaft is connected to the conveyor drive shaft through roller chain and sprockets. Suitable conveyor drive end bearings are required for the overhung sprocket loads. An oil-tight chain guard should be included with this type of drive arrangement.



Shaft Mounted Reducer

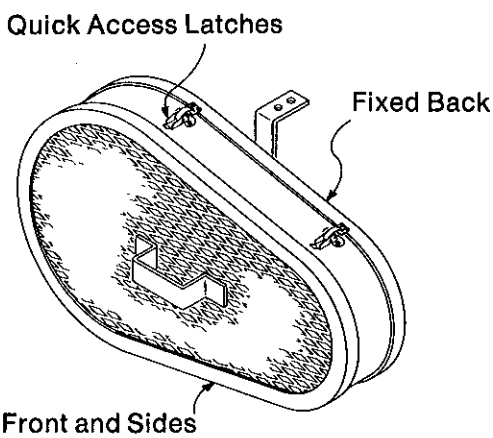
This simple drive combination consists of a standard shaft mounted speed reducer mounted directly on the extended drive shaft.

The motor is connected to the speed reducer input shaft by a V-belt drive and may be mounted above, below or to the side of the speed reducer.

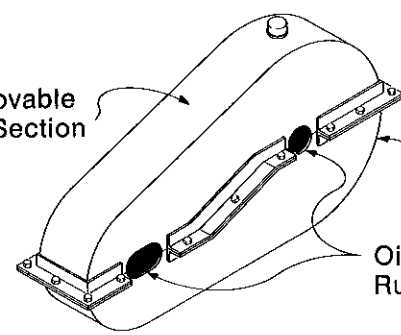
An adjustable tie-rod or torque arm prevents rotation of the speed reducer and also affords a simple means of putting the proper tension in the V-belt. A wide range of conveyor screw speeds can be obtained through the use of standard speed reducer ratios supplemented by available standard V-belt drive ratios. An enclosed V-belt guard is highly recommended for this type of drive arrangement.

Stock and Custom Fabricated Guards

V-Belt Guard



Oil-Tight Chain Guard



Note:
All guards conform to federal agency regulations.
Other V-Belt and chain guard designs are available.
Consult Goodman Conveyor for particular drive guard requirements.

Component Selection

Conveyor Screws

The recommended screws listed in the Component Series Table, Page 36, are standard Goodman Conveyor helicoid and sectional screws. The use of helicoid or sectional screws is largely a matter of individual preference.

Whenever possible, it is advisable to use standard screws in standard lengths. When a special short length must be used to make up the total required length, it is preferably located at the discharge end.

Screws which move material in a single direction should not be turned end-for-end unless the direction of screw rotation is reversed. Likewise, the direction of rotation should not be reversed unless the conveyor is turned end-for-end. Requirements for reversible screws should be referred to Goodman Conveyor, Engineering Department.

At the final discharge, flighting should be omitted so that material will not carry past the discharge point.

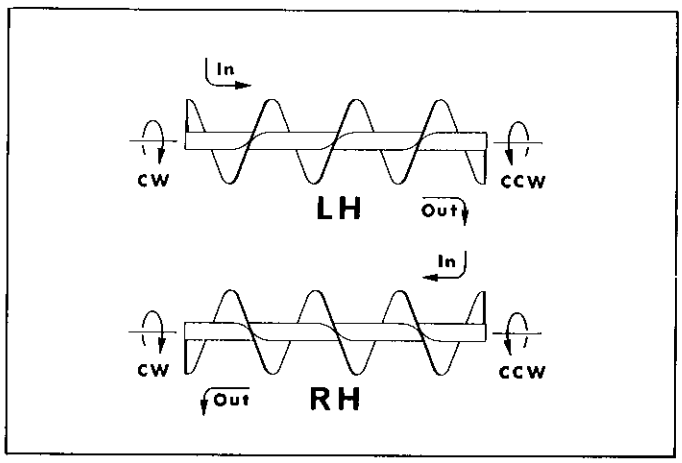
To minimize interruption of material flow past hanger bearing points, flight ends should be positioned to each other at 180 degrees.

A right-hand screw pulls the material toward the end which is being rotated clockwise. The direction of flow is reversed when the direction of rotation is reversed.

A left-hand screw pushes the material away from the end which is being rotated clockwise. Again, the direction of material flow is reversed when the direction of rotation is reversed.

To determine the hand of a screw, observe the slope of the near side of the flighting. If the slope is downward to the right, the screw is right-hand. If the slope is downward to the left, the screw is left-hand.

The hand of a screw in conjunction with the direction the screw is rotated determines the direction of material flow. The diagram below illustrates flow direction for right-hand and left-hand screws when rotated clockwise or counterclockwise.



Troughs and Tubular Housings

Goodman Conveyor troughs are available in 10 ft. lengths for 6″ and 9″ diameter and in 12 ft. lengths for 12″ through 24″ diameter. Generally, troughs are supported by a flange foot located at each joint. However, saddles may be used between trough joints if supporting structure so dictates. Regardless of the type used, the distance between support must **not** exceed 1½ standard lengths.

Inlets and Discharges

The proper methods of conveyor loading and discharge are covered on Pages 5 and 6.

Bearings

Hanger Bearings—The purpose of hanger bearings is to provide intermediate support when multiple screw sections are used. Hanger bearings are designed primarily for radial loads. Adequate clearance should be allowed between the bearings and the screw pipe ends to prevent damage by the thrust load which is transmitted through the pipe.

The hanger bearing recommendations listed in the Component Series Table are generally adequate for the material to be handled. Often, however, unusual characteristics of the material or the conditions under which the conveyor must operate make it desirable to use special bearing materials. A list of available special bearing materials is provided in this section. For special recommendations regarding the use of special bearing materials, consult Goodman Conveyor, Engineering Department.

Selection of bearing material for an intermediate hanger is based on experience together with a consideration of the characteristics of the material to be conveyed. Normally, the bearing selection will be made from one of the following four bearing types:

A. Babbitted or Bronze Bearings
Lubricated babbitted bearings are very frequently used, but have a maximum operating temperature of 130°F; lubricated bronze bearings may be operated at temperatures up to 225°F. This temperature figure for bronze bearings may be exceeded by the use of special high temperature alloys and/or by using appropriate high temperature lubricants. CARE MUST BE EXERCISED IN THE USE OF BABBITTED OR BRONZE BEARINGS WHEN THE CONVEYED MATERIAL MUST NOT BE CONTAMINATED BY THE PRODUCTS OR BEARING WEAR OR THE LUBRICANTS USED.

B. Self Lubricated Bearings
Self lubricated bearings are available in seveal types.

1. Oil impregnated hard maple wood has a maximum operating temperature of 160°F.
2. Oil impregnated sintered bronze has a maximum operating temperature of 200°F.
3. Plastic and reinforced fibre compounds are available in a wide variety of compositions and constructions, and can be obtained from many sources. They require no grease or oil lubrication and usually are run dry. They are best suited for use in conveyors handling a material wetted with water. Maximum operating temperatures vary with the composition and construction of the bearing. When appropriately used, the wear rate is usually low. (Consult bearing manufacturer for recommendations.)
4. Graphited bronze bearings have a maximum operating temperature of 500°F.
5. Commercial carbon bearings may be used for operating temperatures up to 700°F.

C. Ball Bearings
Ball bearings are preferably used when handling granular or pelletized materials not containing any fine powder. Maximum operating temperature is 225°F with petroleum base lubricants, or 270°F with high temperature synthetic lubricants. When appropriately used and sealed against loss of lubricant, ball bearings usually involve no contamination of the material conveyed.

D. Hard Iron Bearings
Hard white iron or chilled iron bearings are used with hardened coupling shafts, for handling abrasive materials. Depending on circumstances, manganese steel, stellite or hardened nickel iron may be used in place of hard iron bearings. Hard iron bearings are not normally lubricated. The maximum operating temperature is 500°F.

Conveyors screw speeds must be considered when using hard iron bearings on hardened coupling shafts in order to minimize wear and to reduce the squealing noise of dry metal on metal. The following formula gives maximum recommended operating speed:

$$N = \frac{120}{\text{Shaft diameter in inches}}$$

where

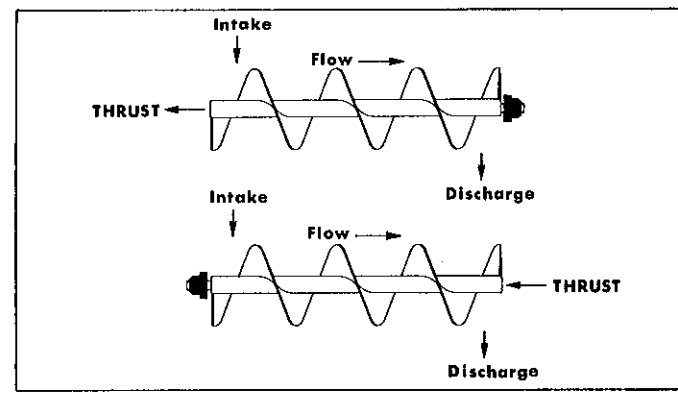
N = Maximum operating RPM of screw

End Bearings—Several end bearing types are available, and their selection depends on two basic factors: radial load and thrust load. The relative values of these loads determine end bearing types.

Radial load is negligible at the conveyor tail shaft. However, drive ends (unless integrated with the conveyor end plate) are subject to radial loading due to overhung drive loads, such as chain sprockets or shaft-mounted speed reducers.

Thrust is the reaction, through the screw or screws, resulting from movement of the material. Therefore, the end bearing must prevent axial movement of the screw which would allow contact with hanger bearings or ends. Thrust bearings should be located at the discharge end of the conveyor. This places the screw in tension, preventing deflection in the screws when the system is heavily loaded.

The following diagrams illustrate discharge and inlet end positions of the thrust bearing.



Component Selection

The following table lists relative thrust and radial load capacities in comparison to ball bearing Type CEB-A. The comparisons drawn are for standard bearing types and are based on equal operating conditions—90 RPM and average service life of 5,000 hours at maximum load.

Bearing Type	Relative Capacities	
	Thrust	Radial
SBF-B	1.0	1.0
SBF-R	1.3	2.5
SBM	3.7	2.5
SBH	6.0	10.4

The above data should serve only as a guide to relative bearing load capacities. Specific applications should be referred to Goodman Conveyor, Engineering Department.

Shafts

The primary consideration in determining the type and size of coupling and drive shafts is whether the shafts selected are adequate to transmit the horsepower required, including any overload. Normally, cold-rolled shafts are adequate. However, high-tensile shafts may be required due to torque limitations. Also, stainless steel shafts may be necessary when corrosive or contaminable materials are to be handled. Conveyors equipped with nonlubricated iron hanger bearings require hardened coupling shafts, and hard-surfaced hanger bearings require hard-surfaced shafts. Specific shaft size determination is covered in Torque Capacities, Page 27.

Shaft Seals

Several trough end seal types are available to prevent contamination of conveyed material or escape of material from the system.

Component Series

The recommended Component Series for the material to be conveyed is in the Materials Table, pages 12-20. The alphabetical code relates to the general component series, and the numerical code refers to bearings and coupling shafts. Bearing and coupling shaft recommendations and recommended materials of construction are listed in the table that follows. The Component Series Table below lists the screw numbers for both helicoid and sectional screws and gives the trough and cover thicknesses.

Bearing and Coupling Shaft Series

Series	Coupling Shaft	Bearing Material
A	Standard	Ball
B	Standard	Babbitt, Bronze, *Graphite bronze, *Canvas base phenolic, *Oil Impregnated bronze, *Oil ilmpregnated wood
C	Standard	*Plastic, *Nylon, *Teflon
D	Hardened or Hard Surfaced	*Chilled Hard Iron *Hardened Alloy Sleeve

*Nonlubricated bearings, or bearings not additionally lubricated.

Other bearing materials available: bronze (graphite), bronze (oil-impregnated) and Nylon2.

Component Series Table

Screw Dia.	Shaft Dia.	Cover Thickness	Series 1			Series 2			Series 3		
			Screw Number		Tube or Trough Thickness	Screw Number		Tube or Trough Thickness	Screw Number*		Tube or Trough Thickness
			Helicoid	Sectional		Helicoid	Sectional		Helicoid	Sectional	
6	1½	16 Ga.	6H304	6S309	16 Ga.	6H308	6S309	14 Ga.	6H312	6S316	10 Ga.
9	1½ 2	16	9H306 9H406		14	9H312 9H412		10	9H312 9H414	9S316 9S416	3/16
12	2 2 7/16 3	14	12H408 12H508 12H614		12	12H412 12H512 12H614	12S412 12S512 12S612	3/16	12H412 12H512 12H614	12S524 12S624	¼
14	2 7/16 3	14	14H508 14H614		12	14H614	14S512 14S612	3/16	14H614	14S624	¼
16	3	14	16H610	16S612	12	16H614	16S616	3/16	16H614	16S624	¼
18	3 3 7/16	14	18H610	18S612	12		18S616	3/16		18S624 18S724	¼
20	3 3 7/16	14		20S612 20S712	10		20S616 20S716	3/16		20S624 20S724	¼
24	3 7/16	12		24S712	10		24S716	3/16		24S724	¼

Component Group Selection Guide

Material Classification Code				Component Group Designation				
				Series of Intermediate Hanger Bearing +				
Material Size Classification		Abrasiveness Number	Corrosiveness Letter	Group Number Designation	Babbitted or Bronze	Self Lubricating	Ball Bearing △	Hard Iron	Plastic Nylon Teflon
A_{200} A_{100} A_{40}	B_6	5	Non-Corr.	1	B	B	A	—	C
			T	2	B	B	—	—	C
	$C_{½}$		S	3	B	B	—	—	—
D_3 D_7 D_{16} D_X	or E	5	Non-Corr.	2	B	B	A	—	C
			T	2	B	B	—	—	C
			S	3	B	B	—	—	—
A_{200} A_{100} A_{40}	B_6	6	Non-Corr.	2	—	—	—	D	—
			T	3	—	—	—	D	—
	$C_{½}$		S	3*	—	—	—	D	—
D_3 D_7 D_{16} D_X	or E	6	Non-Corr.	2	—	—	—	D	—
			T	3	—	—	—	D	—
			S	3*	—	—	—	D	—
A_{200} A_{100} A_{40}	B_6	7	Non-Corr.	3	—	—	—	D	—
			T	3	—	—	—	D	—
	$C_{½}$		S	3*	—	—	—	D	—
D_3 D_7 D_{16} D_X	or E	7	Non-Corr.	3	—	—	—	D	—
			T	3	—	—	—	D	—
			S	3*	—	—	—	D	—

* For very corrosive conditions (codes 6S or 7S) lighter gauge special anti-corrosion materials may be used.
△ Ball bearings are not usually recommended for conveyors handling materials partly or wholly finely ground. (Code A)
\+ Any abrasive material which is flammable, corrosive, or which may contain explosive dust, consult manufacturer for bearing recommendations.

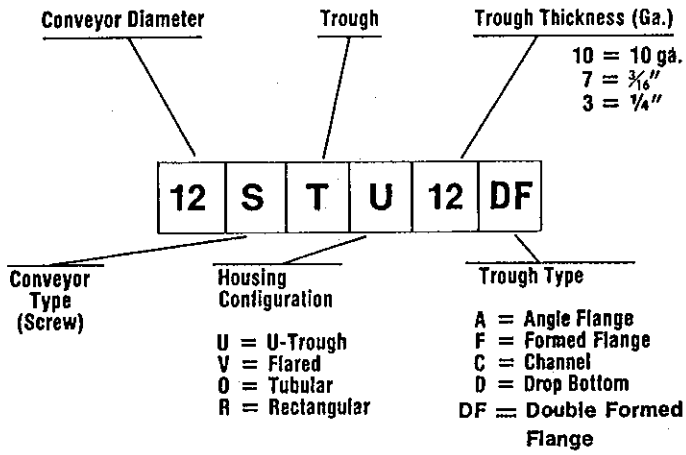
COMPONENT SECTION

DIMENSIONS IN THIS CATALOG ARE NOT CERTIFIED AND ARE SUBJECT TO CHANGE WITHOUT NOTICE. CERTIFIED DIMENSIONS ARE AVAILABLE UPON REQUEST.

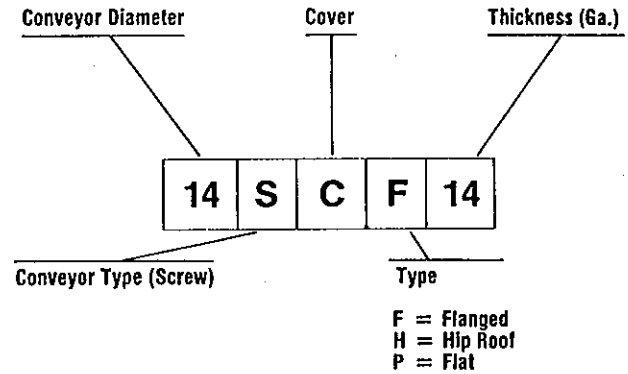
Descriptive Part Numbering System for Components

For Screw Descriptive Part Numbers, see Page 71.

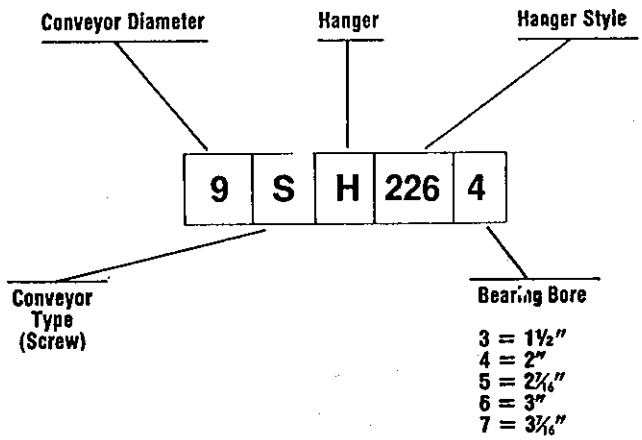
Conveyor Housings



Covers

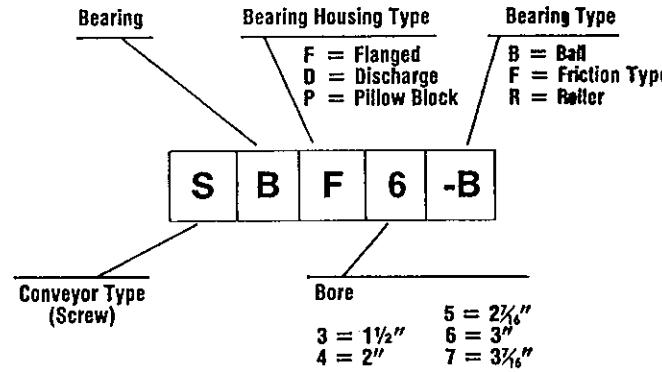


Hangers

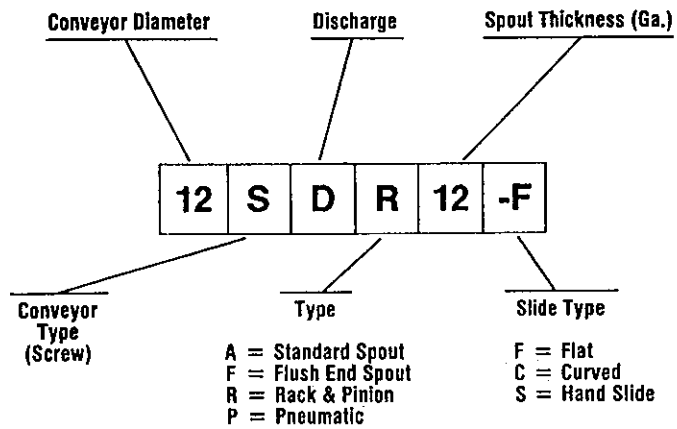


Specify bearing type when ordering.

End Bearings

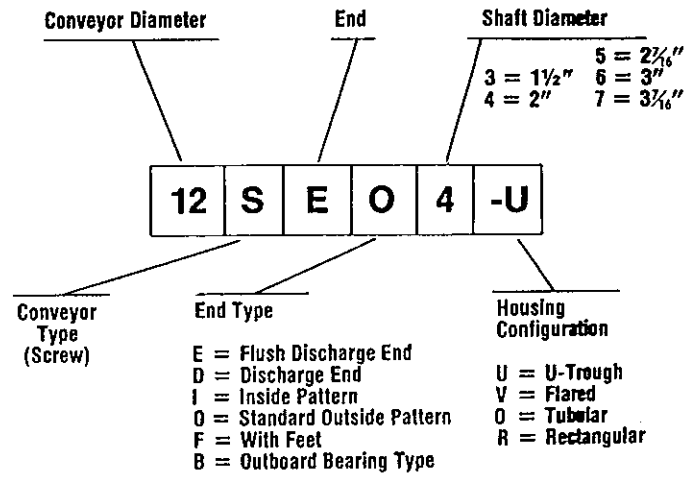


Discharges



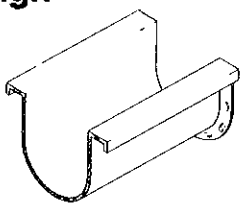
Special totally enclosed discharge slide gates are available.

Housing Ends

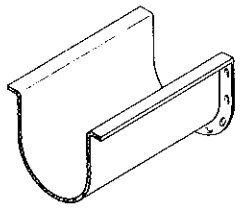


Troughs

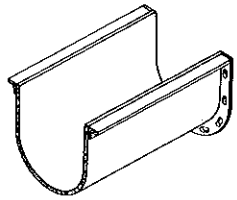
U-Trough



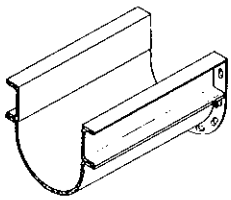
Double Formed Flange
The top flange of the double formed flange trough is formed from the same sheet as the trough, and its unique design adds considerable strength and rigidity to the trough. The double formed flange provides an effective dust-tight seal when used in conjunction with flanged-type covers and appropriate gasket material.



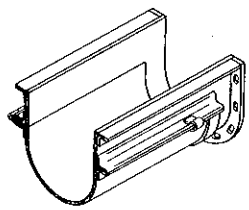
Formed Flange
The top flange is formed from the same sheet as the trough, resulting in a lightweight yet rigid housing section. End flanges are jig-welded for perfect alignment with other sections.



Angle Flange
The top flange is fabricated with heavy-duty structural steel angles welded to the top trough edge. End flanges are jig-welded to insure proper alignment with other trough sections.

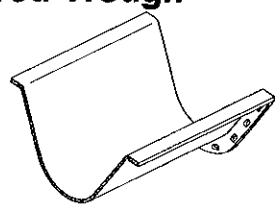


Channel
The channel U-trough is well suited for applications requiring long distances between trough supports. Upper trough sides are fabricated with structural steel channels to which the lower contoured section may be bolted or spring clamped. Useful for abrasive applications where frequent replacement of the lower formed section is anticipated.



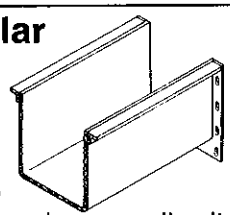
Drop Bottom
Intended for applications where quick, convenient access to the conveyor interior is required, the drop bottom trough consists of rigid upper side sections to which a lower contoured section is attached. One side of the lower formed section is hinged while the other is attached by use of spring clamps or other type of quick-opening device.

Flared Trough

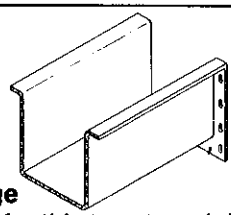


Formed Flange
Intended primarily for sticky or slightly viscous materials, the flared trough is most often employed with ribbon screws. Top flanges are formed from the same sheet as the trough. End flanges are jig-welded for perfect alignment with other sections.

Rectangular Trough

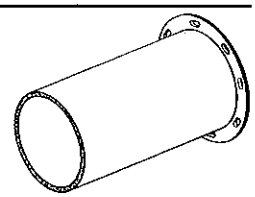


Angle Flange
Rectangular troughs are well suited for highly abrasive applications. The material is allowed to form on the trough bottom, thus preventing abrasion directly against the trough wall. Top flanges are fabricated of structural steel angle, welded flush with the top trough edge.



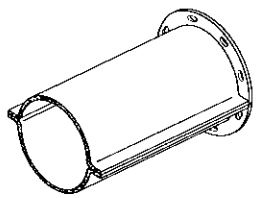
Formed Flange
The top flange for this type trough is formed from the same sheet as the trough, providing a rigid yet lighter trough.

Tubular Housings



Standard
Tubular troughs are inherently dust and weathertight, rigid and may be readily loaded to a full cross section. The standard tubular trough is rolled from a single sheet and continuously welded at the seam.

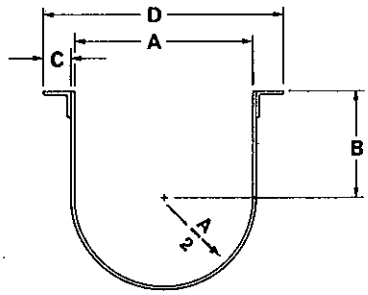
Formed Flange
This type is similar to the angle flange except the flanges are formed from the same sheet as the contoured half sections, resulting in a rigid, lightweight tubular section. The halves are bolted together to form the complete housing.



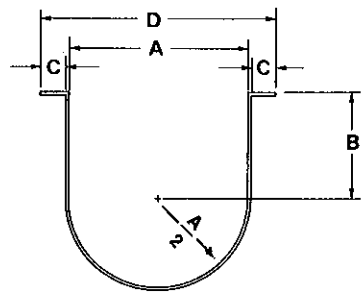
All Goodman conveyor troughs are available in stainless steel. All troughs may also be furnished hot-dipped galvanized. For specific alloy materials available, consult Goodman Conveyor, Engineering Department.

Conveyor Troughs

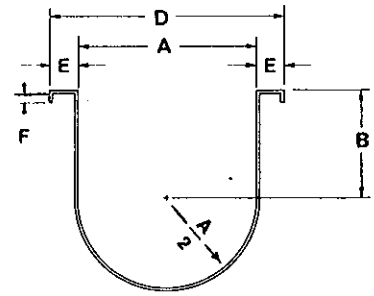
U-Trough



Angle Flange



Formed Flange



Double Formed Flange

Screw Dia.	Trough Thickness	Angle Flange Part Number	Angle Flange Catalog Number	*Wt. Std. Length	Formed Flange Part Number	Formed Flange Catalog Number	*Wt. Std. Length	A	B	C	D
6	16 Ga.	6STU16-A	803263	67	6STU16-F	803313	55	7	4-1/2	1-1/4	9-5/8
	14	6STU14-A	803264	78	6STU14-F	803314	67				9-11/16
	10	6STU10-A	803266	123	6STU12-F	803315	91				9-3/4
9	14	9STU14-A	803268	127	9STU14-F	803318	99	10	6-1/8	1-1/2	13-3/16
	12	9STU12-A	803269	156	9STU12-F	803319	132				13-3/16
	10	9STU10-A	803270	176	9STU10-F	803320	164				13-1/4
	3/16	9STU7-A	803271	230	9STU7-F	803321	214				13-3/8
12	12	12STU12-A	803273	256	12STU12-F	803323	215	13	7-3/4	2	17-3/16
	10	12STU10-A	803274	305	12STU10-F	803324	266				17-1/4
	3/16	12STU7-A	803275	371	12STU7-F	803325	342				17-3/8
	1/4	12STU3-A	803276	462	12STU3-F	803326	443				17-1/2
14	12	14STU12-A	803277	276	14STU12-F	803327	234	15	9-1/4	2	19-3/16
	10	14STU10-A	803278	330	14STU10-F	803328	292				19-1/4
	3/16	14STU7-A	803279	407	14STU7-F	803329	378				19-3/8
	1/4	14STU3-A	803280	515	14STU3-F	803330	496				19-1/2
16	12	16STU12-A	803281	320	16STU12-F	803331	277	17	10-5/8	2	21-3/16
	10	16STU10-A	803282	373	16STU10-F	903332	334				21-1/4
	3/16	16STU7-A	803283	458	16STU7-F	803333	428				21-3/8
	1/4	16STU3-A	803284	580	16STU3-F	803334	559				21-1/2
18	12	18STU12-A	803285	373	18STU12-F	803335	334	19	12-1/8	2-1/2	24-3/16
	10	18STU10-A	803286	443	18STU10-F	803336	408				24-1/4
	3/16	18STU7-A	803287	558	18STU7-F	803337	534				24-3/8
	1/4	18STU3-A	803288	684	18STU3-F	803338	672				24-1/2
20	10	20STU10-A	803289	503	20STU10-F	803339	463	21	13-1/2	2-1/2	26-1/4
	3/16	20STU7-A	803290	622	20STU7-F	803340	587				26-3/8
	1/4	20STU3-A	803291	763	20STU3-F	803341	751				26-1/2
24	10	24STU10-A	803292	550	24STU10-F	803342	553	25	16-1/2	2-1/2	30-1/4
	3/16	24STU7-A	803293	702	24STU7-F	803343	702				30-3/8
	1/4	24STU3-A	803294	899	24STU3-F	803344	899				30-1/2

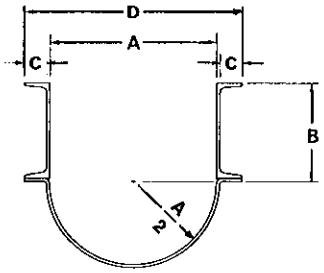
Screw Diameter	Trough Thickness	Double Formed Flange Part Number	Double Formed Flange Catalog Number	*Wt. Std. Length	A	B	D	E	F
6	16	6STU16-DF	803492	55	7	4-1/2	9-3/4	1-3/8	1/2
	14	6STU14-DF	803493	67					5/8
	12	6STU12-DF	803494	92	7	4-1/2	9-7/8	1-7/16	5/8
	10	6STU10-DF	803495	117					
9	14	9STU14-DF	803496	99	10	6-1/8	13-3/8	1-11/16	5/8
	12	9STU12-DF	803497	132					
	10	9STU10-DF	803498	164					
12	12	12STU12-DF	803499	215	13	7-3/4	17-1/2	2-1/4	5/8
	10	12STU10-DF	803500	266					
14	12	14STU12-DF	803501	234	15	9-1/4	19-1/2	2-1/4	5/8
	10	14STU10-DF	803502	292					
16	12	16STU12-DF	803503	277	17	10-5/8	21-1/2	2-1/4	5/8
	10	16STU10-DF	803504	334					
18	10	18STU10-DF	803505	408	19	12-1/8	24-1/4	2-5/8	5/8
20	10	20STU10-DF	803506	463	21	13-1/2	26-1/4	2-5/8	5/8
24	10	24STU10-DF	803507	553	25	16-1/2	30-1/4	2-5/8	5/8

***Standard Lengths: 6" Dia. and 9" Dia. - 10'-0"**
12" Dia. thru 24" Dia. - 12'-0"

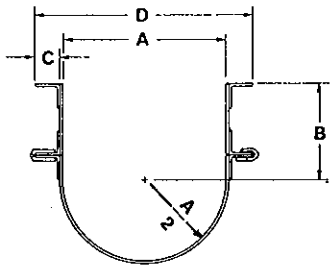
NOTE:
Troughs 16 ga. thru 10 ga. normally furnished with double formed flange. Troughs 3/16" plate and 1/4" plate normally furnished with formed flange. Angle flange troughs are made to order.

Conveyor Troughs

U-Trough



Formed Channel



Drop Bottom

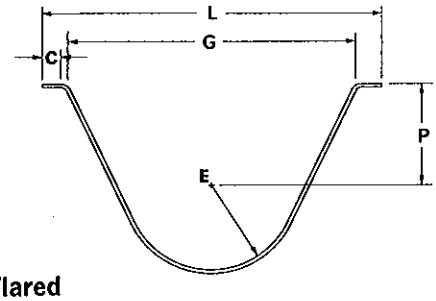
Screw Dia.	Trough Thickness	Formed Channel Part Number	Formed Channel Catalog Number	Formed Channel Wt. Std. Length	Drop Bottom Part Number	Drop Bottom Catalog Number	Drop Bottom Wt. Std. Length	A	B	C	D
6	14	6STU14-C	803360	74	6STU16-D	803410	106	7	4-1/2	1-1/4	9-5/8
					6STU14-D	803411	117				9-11/16
	12	6STU12-C	803361	102	6STU12-D	803412	140				9-3/4
9	12	9STU12-C	803364	141	9STU12-D	803416	203	10	6-1/8	1-1/2	13-3/16
	10	9STU10-C	803365	174	9STU10-D	803417	223				13-1/4
	3/16	9STU7-C	803366	235	9STU7-D	803418	277				13-3/8
12	12	12STU12-C	803373	220	12STU12-D	803425	332	13	7-3/4	2	17-3/16
	10	12STU10-C	803374	280	12STU10-D	803426	382				17-1/4
	3/16	12STU7-C	803375	379	12STU7-D	803427	448				17-3/8
	1/4	12STU3-C	803376	495	12STU3-D	803428	539				17-1/2
14	12	14STU12-C	803377	250	14STU12-D	803429	353	15	9-1/4	2	19-3/16
	10	14STU10-C	803378	317	14STU10-D	803430	407				19-1/4
	3/16	14STU7-C	803379	418	14STU7-D	803431	484				19-3/8
	1/4	14STU3-C	803380	568	14STU3-D	803432	593				19-1/2
16					16STU12-D	803433	397	17	10-5/8	2	21-3/16
	10	16STU10-C	803381	352	16STU10-D	803434	450				21-1/4
	3/16	16STU7-C	803382	465	16STU7-D	803435	535				21-3/8
	1/4	16STU3-C	803383	623	16STU3-D	803436	656				21-1/2
18					18STU12-D	803437	472	19	12-1/8	2-1/2	24-3/16
	10	18STU10-C	803384	410	18STU10-D	803438	541				24-1/4
	3/16	18STU7-C	803385	539	18STU7-D	803439	656				24-3/8
	1/4	18STU3-C	803386	732	18STU3-D	803440	782				24-1/2
20	10	20STU10-C	803387	446	20STU10-D	803441	601	21	13-1/2	2-1/2	26-1/4
	3/16	20STU7-C	803388	587	20STU7-D	803442	720				26-3/8
	1/4	20STU3-C	803389	796	20STU3-D	803443	862				26-1/2
24	3/16	24STU7-C	803390	680	24STU7-D	803445	800	25	16-1/2	2-1/2	30-3/8
	1/4	24STU3-C	803391	924	24STU3-D	803446	997				30-1/2

***Standard Lengths: 6" & 9" dia. — 10'-0"**
12" thru 24" dia. — 12'-0"

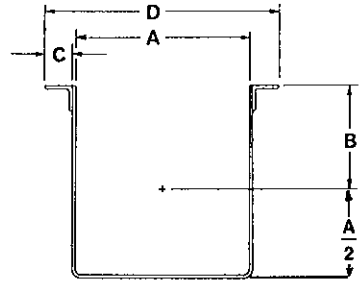
All sizes made to order

Conveyor Troughs

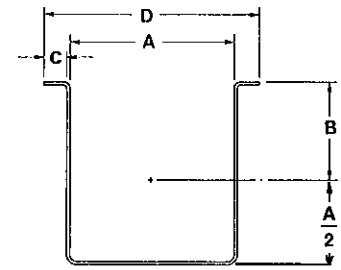
Flared Trough / Rectangular Trough



Angle Flange ▼



Formed Flange ▼



Flared

Screw Dia.	Trough Thickness	Part Number	Catalog Number	Wt. * Std. Length	C	E	G	L	P
6	14 Ga. 12	6STV14 6STV12	803460 803461	79 108	1-1/4	3-1/2	14	16-9/16 16-5/8	7
9	12 10	9STV12 9STV10	803462 803463	148 189	1-1/2	5	18	21-1/8 21-3/16	9
12	10 3/16 1/4	12STV10 12STV7 12STV3	803465 803466 803483	270 363 482	2	6-1/2	22	26-3/16 26-1/4 26-5/16	10
14	10 3/16 1/4	14STV10 14STV7 14STV3	803468 803469 803484	300 403 534	2	7-1/2	24	28-3/16 28-1/4 28-5/16	11
16	10 3/16 1/4	16STV10 16STV7 16STV3	803470 803471 803472	331 444 588	2	8-1/2	28	32-3/16 32-1/4 32-5/16	11-1/2
18	10 3/16 1/4	18STV10 18STV7 18STV3	803473 803474 803475	370 496 655	2-1/2	9-1/2	31	36-3/16 36-1/4 36-5/16	12-1/8
20	10 3/16 1/4	20STV10 20STV7 20STV3	803476 803477 803478	406 544 718	2-1/2	10-1/2	34	39-3/16 39-1/4 39-5/16	13-1/2
24	10 3/16 1/4	24STV10 24STV7 24STV3	803479 803480 803481	477 640 846	2-1/2	12-1/2	40	45-3/16 45-1/4 45-5/16	16-1/2

*Std. Lengths: 6" and 9" dia. — 10'-0"
12" thru 24" dia. — 12'-0"
All sizes made to order

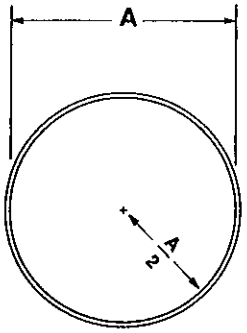
Rectangular

Screw Dia.	Trough Thickness	Angle Flange Part Number	Angle Flange Catalog Number	Angle Flange *Wt. Std. Length	Formed Flange Part Number	Formed Flange Catalog Number	Formed Flange *Wt. Std. Length	A	B	C	D
6	16 Ga. 14	6STR16-A 6STR14-A	803510 803511	89 103	6STR16-F 6STR14-F	803560 803561	51 66	7	4-1/2	1-1/4	9-5/8 9-11/16
9	14 12	9STR14-A 9STR12-A	803512 803513	130 161	9STR14-F 9STR12-F	803562 803563	98 134	10	6-1/8	1-1/2	13-3/16 13-3/16
12	12 10 3/16	12STR12-A 12STR10-A 12STR7-A	803514 803515 803516	262 312 387	12STR12-F 12STR10-F 12STR7-F	803564 803565 803566	204 270 343	13	7-3/4	2	17-3/16 17-1/4 17-3/8
14	12 10 3/16	14STR12-A 14STR10-A 14STR7-A	803517 803518 803519	288 346 434	14STR12-F 14STR10-F 14STR7-F	803567 803568 803569	230 294 406	15	9-1/4	2	19-3/16 19-1/4 19-3/8
16	12 10 3/16	16STR12-A 16STR10-A 16STR7-A	803520 803521 803522	314 379 493	16STR12-F 16STR10-F 16STR7-F	803570 803571 803572	257 328 450	17	10-5/8	2	21-3/16 21-1/4 21-3/8
18	12 10 3/16	18STR12-A 18STR10-A 18STR7-A	803523 803524 803525	373 448 578	18STR12-F 18STR10-F 18STR7-F	803573 803574 803575	298 378 518	19	12-1/8	2-1/2	24-3/16 24-1/4 24-3/8
20	12 10 3/16	20STR12-A 20STR10-A 20STR7-A	803526 803527 803528	415 502 653	20STR12-F 20STR10-F 20STR7-F	803576 803577 803578	340 432 594	21	13-1/2	2-1/2	26-3/16 26-1/4 26-3/8
24	12 10 3/16	24STR12-A 24STR10-A 24STR7-A	803529 803530 803531	521 636 838	24STR12-F 24STR10-F 24STR7-F	803579 803580 803581	449 570 784	25	16-1/2	2-1/2	30-3/16 30-1/4 30-3/8

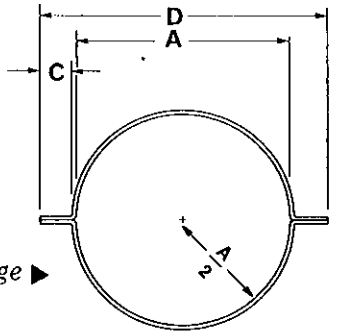
*Std. lengths: 6" and 9" dia. — 10'-0"
12" thru 24" dia. — 12'-0"
All sizes made to order

Conveyor Troughs

Tubular Troughs



◀ *Standard*



Formed Flange ▶

Screw Dia.	Trough Thickness	Standard Housing			Formed Flange			A Inside	C	D
		Part Number	Catalog Numbers	Wt.* Std. Len.	Part Number	Catalog Numbers	Wt.* Std. Len.			
6	16	6STO16	803610	50	6STO16-F	803710	60	7	1-1/4	9-5/8
	14	6STO14	803611	62	6STO14-F	803711	75			9-11/16
	12	6STO12	803612	85	6STO12-F	803712	103			9-11/16
	10	6STO10	803613	110	6STO10-F	803713	133			9-3/4
					6STO7-F	803714	168			9-7/8
9	14	9STO14	803615	89	9STO14-F	803715	104	10	1-1/2	13-3/16
	12	9STO12	803616	122	9STO12-F	803716	143			13-3/16
	10	9STO10	803617	155	9STO10-F	803717	182			13-1/4
	3/16	9STO7	803618	208	9STO7-F	803718	245			13-3/8
					9STO3-F	803719	324			13-1/2
12	12	12STO12	803625	196	12STO12-F	803725	232	13	2	17-3/16
	10	12STO10	803626	250	12STO10-F	803726	296			17-1/4
	3/16	12STO7	803627	330	12STO7-F	803727	394			17-3/8
	1/4	12STO3	803628	434	12STO3-F	803728	518			17-1/2
14	12	14STO12	803629	224	14STO12-F	803729	260	15	2	19-3/16
	10	14STO10	803630	283	14STO10-F	803730	330			19-1/4
	3/16	14STO7	803631	379	14STO7-F	803731	443			19-3/8
	1/4	14STO3	803632	499	14STO3-F	803732	523			19-1/2
16	12	16STO12	803633	254	16STO12-F	803733	290	17	2	21-3/16
	10	16STO10	803634	321	16STO10-F	803734	368			21-1/4
	3/16	16STO7	803635	430	16STO7-F	803735	493			21-3/8
	1/4	16STO3	803636	566	16STO3-F	803736	650			21-1/2
18	12	18STO12	803637	290	18STO12-F	803737	336	19	2-1/2	24-3/16
	10	18STO10	803638	365	18STO10-F	803738	424			24-1/4
	3/16	18STO7	803639	486	18STO7-F	803739	566			24-3/8
	1/4	18STO3	803640	640	18STO3-F	803740	746			24-1/2
20	10	20STO10	803641	402	20STO10-F	803741	458	21	2-1/2	26-1/4
	3/16	20STO7	803642	535	20STO7-F	803742	612			26-3/8
	1/4	20STO3	803643	703	20STO3-F	803743	806			26-1/2
24	10	24STO10	803644	479	24STO10-F	803744	535	25	2-1/2	30-1/4
	3/16	24STO7	803645	637	24STO7-F	803745	714			30-3/8
	1/4	24STO3	803646	839	24STO3-F	803746	942			30-1/2

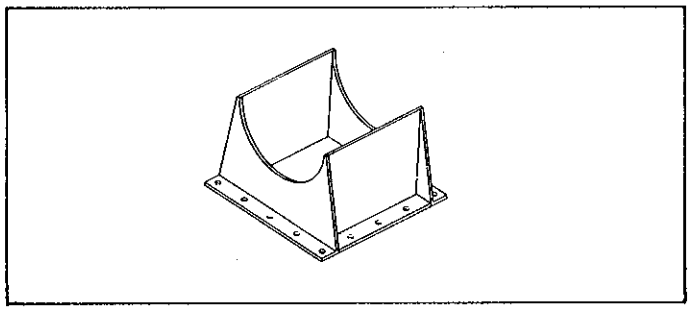
***Standard Lengths: 6" and 9" dia. — 10'-0"**

12" thru 24" dia. — 12'-0"

All sizes made to order

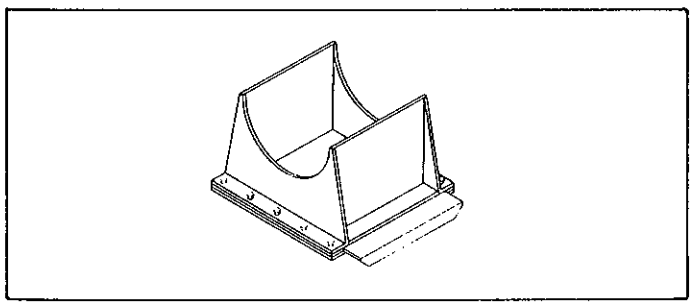
Discharges

Standard Discharge Spout



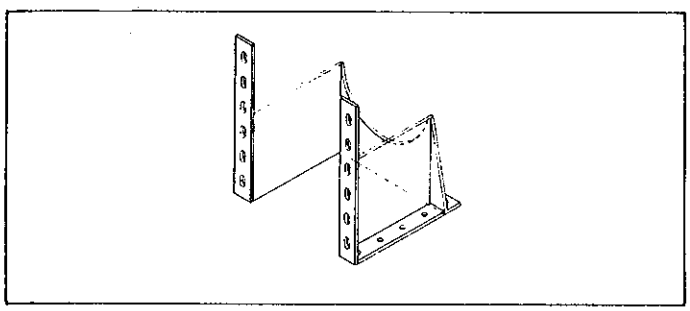
Standard spouts are fabricated in various gauges proportionate to the thickness of the trough. They are generally furnished welded to the trough but may also be furnished loose for attachment in the field. Bottom flanges of the spout are drilled with the standard discharge bolt pattern for interchangeability and convenient assembly.

Standard Spout with Hand Slide



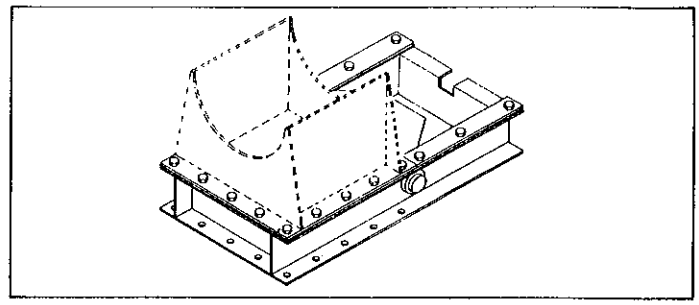
This spout may also be furnished with a hand slide gate. The slide gate assembly is bolted directly to the discharge flanges. The slide may be positioned for opening from either side or for opening parallel to the conveyor.

Flush End Discharge Spout



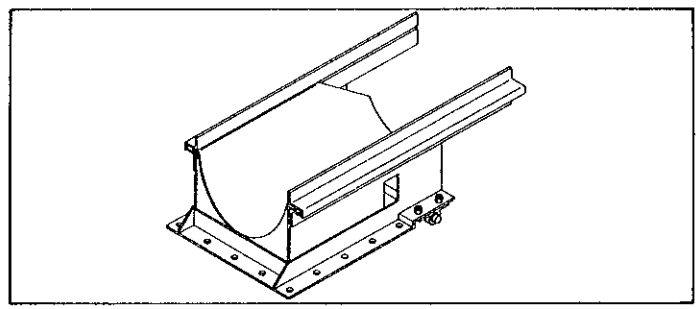
This spout is designed for use at the final discharge point. The end of the spout is comprised of a trough end with the bottom flange drilled with the standard discharge flange bolt pattern. Because it is located at the extreme end of the trough, there is no carry-over of material past the final discharge point. The flush end arrangement eliminates the unnecessary extension of trough and interior components beyond the actual discharge point.

Rack and Pinion Gate with Flat Slide



The rack and pinion discharge gate with flat slide is designed for use with standard spouts. It bolts directly to the spout flanges. The flat slide is actuated by one or more pinions, which mesh with racks bolted to the slide bottom. The gate may be operated by a hand, chain or rope wheel. This unit is also available with a pneumatic or hydraulic cylinder.
Note: Standard spout is **not** included and must be specified separately.

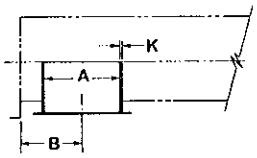
Rack and Pinion Gate with Curved Slide

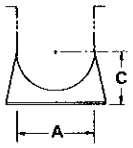


The rack and pinion gate with curved slide is similar to the flat-slide unit except the slide is contoured to match the conveyor trough. The curved slide eliminates the pocket formed in the flat slide discharge assembly. This unit is also available with a hand, chain or rope wheel. It may also be furnished with a pneumatic or hydraulic cylinder.

Discharges

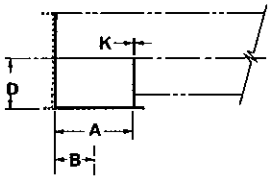
Discharge Spouts

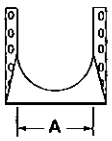




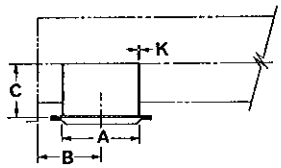
◀ *Standard Discharge Spouts*

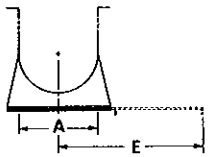
Flush End Discharge ▼





Standard Spout With Hand Slide ▶





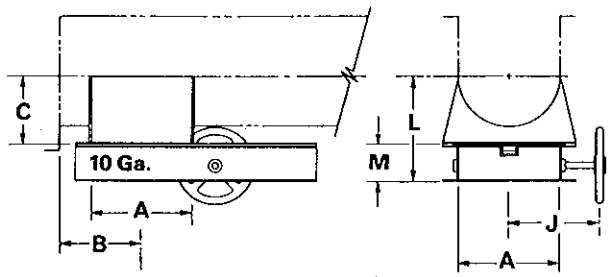
Screw Dia.	A	B Dimension		C	D	E	K
		*Flush End Spout	Standard Spout				
6	7	3-1/2	6	5	5-5/8	14-3/8	14 GA. 12
9	10	5	8	7-1/8	7-7/8	19-1/16	14 10
12	13	6-1/2	10-1/2	8-7/8	9-5/8	24-7/8	12 3/16
14	15	7-1/2	11-1/2	10-1/8	10-7/8	27-3/4	12 3/16
16	17	8-1/2	13-1/2	11-1/8	12	30-11/16	12 3/16
18	19	9-1/2	14-1/2	12-3/8	13-3/8	33-5/8	12 3/16
20	21	10-1/2	15-1/2	13-3/8	15	36-5/8	12 3/16
24	25	12-1/2	17-1/2	15-3/8	18-1/8	42-5/8	12 3/16

Screw Dia.	Trough Thickness	Discharge Thickness	* Flush End Spout			Spout Less Slide			Spout With Slide		
			Part No.	Catalog No.	Wt.	Part No.	Catalog No.	Wt.	Part No.	Catalog No.	Wt.
6	16-14-12	14	6SDF16	803802	3	6SDA14	803832	4	6SDA14-S	803862	11
	10-3/16	12	6SDF12	803803	5	6SDA12	803833	6	6SDA12-S	803863	13
9	16-14-12-10	14	9SDF14	803804	6	9SDA14	803834	8	9SDA14-S	803864	18
	3/16-1/4	10	9SDF10	803805	10	9SDA10	803835	13	9SDA10-S	803865	22
12	12-10	12	12SDF12	803808	13	12SDA12	803838	17	12SDA12-S	803868	36
	3/16-1/4	3/16	12SDF 7	803809	22	12SDA7	803839	29	12SDA7-S	803869	48
14	12-10	12	14SDF12	803810	17	14SDA12	803840	22	14SDA12-S	803870	46
	3/16-1/4	3/16	14SDF 7	803811	29	14SDA7	803841	38	14SDA7-S	803871	62
16	12-10	12	16SDF12	803812	16	16SDA12	803842	21	16SDA12-S	803872	49
	3/16-1/4	3/16	16SDF 7	803813	30	16SDA7	803843	40	16SDA7-S	803873	68
18	12-10	12	18SDF12	803814	23	18SDA12	803844	32	18SDA12-S	803874	69
	3/16-1/4	3/16	18SDF 7	803815	45	18SDA7	803845	60	18SDA7-S	803875	97
20	10	12	20SDF12	803816	30	20SDA12	803846	40	20SDA12-S	803876	91
	3/16-1/4	3/16	20SDF 7	803817	50	20SDA7	803847	67	20SDA7-S	803877	118
24	10	12	24SDF12	803818	39	24SDA12	803848	52	24SDA12-S	803878	116
	3/16-1/4	3/16	24SDF 7	803819	65	24SDA7	803849	87	24SDA7-S	803879	151

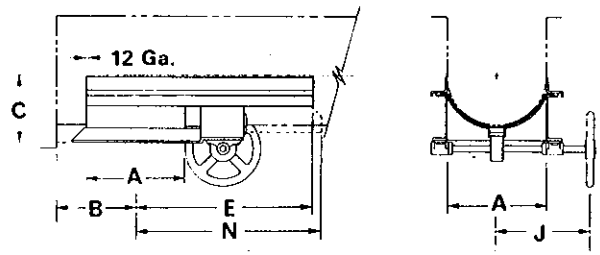
*Flush End Discharges Should Be Same Gauge As Trough For Uniform Fit.

Discharges

Rack & Pinion Gates



With Flat Slide



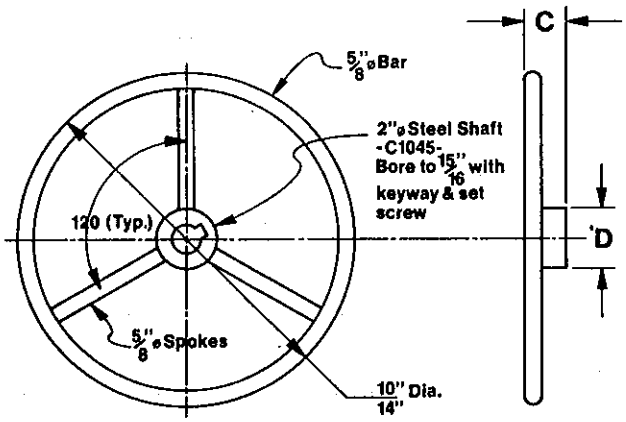
With Curved Slide

Screw Dia.	A	B	C	E	J		L	M	N
					Curved	Flat			
6	7	6	5	16-1/2	9-1/4	8-1/2	9-11/16	4-11/16	17-1/2
9	10	8	7-1/2	20	11-1/2	10	11-13/16	4-11/16	22
12	13	10-1/2	8-7/8	23-1/2	12-1/2	12-1/2	13-9/16	4-11/16	27-1/2
14	15	11-1/2	10-1/8	24-1/2	13-3/4	13-1/2	14-13/16	4-11/16	30
16	17	13-1/2	11-1/8	26-1/2	14-1/2	14-1/2	15-13/16	4-11/16	32-1/2
18	19	14-1/2	12-3/8	26-1/2	16	16	17-1/16	4-11/16	38-1/2
20	21	15-1/2	13-3/8	33-1/2	17-1/2	17	18-1/16	4-11/16	40-1/2
24	25	17-1/2	15-3/8	39-1/2	23-1/2	19	20-1/16	4-11/16	46-1/2

Screw Dia.	Gate Thick.	*With Flat Slide			*With Curved Slide		
		Part No.	Catalog No.	Weight	Part No.	Catalog No.	Weight
6	10 Ga.	6SDR10-F	803890	31	6SDR12-C	803920	24
9	10 Ga.	9SDR10-F	803892	47	9SDR12-C	803922	41
12	10 Ga.	12SDR10-F	803896	93	12SDR12-C	803926	71
14	10 Ga.	14SDR10-F	803898	115	14SDR12-C	803928	82
16	10 Ga.	16SDR10-F	803900	117	16SDR12-C	803930	90
18	10 Ga.	18SDR10-F	803902	155	18SDR12-C	803932	129
20	10 Ga.	20SDR10-F	803904	180	20SDR12-C	803934	144
24	10 Ga.	24SDR10-F	803906	223	24SDR12-C	803936	187

***Specify with hand wheel or chain wheel, plus length of chain required if chain wheel is used.**

Rack & Pinion Discharge Components



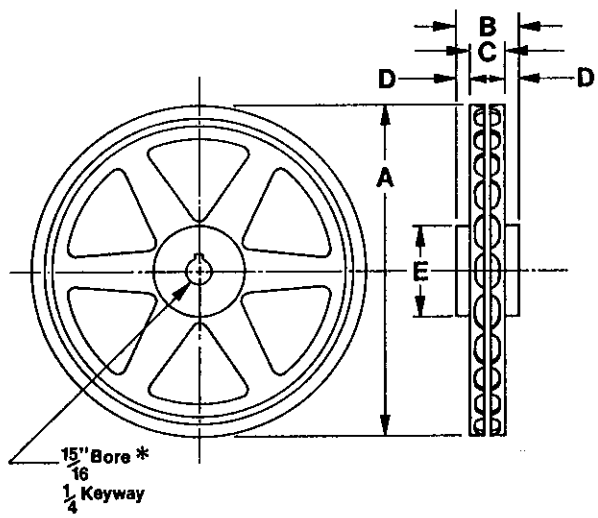
Hand Wheel

Hand wheel is normally furnished with each rack and pinion gate unless otherwise specified. The handwheel is used when the slide gate is manually accessible.

Wheel Diameter	Catalog Number	Wt.	C	D
10	803943	9	1-1/2	2
14	803944	16	1-1/2	2

* Other bores available.

Note:
10" wheel furnished on 6" thru 14" conveyors
14" wheel furnished on 16" conveyor and larger

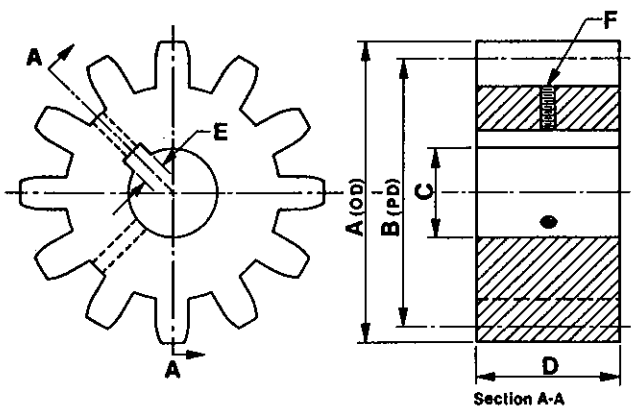


Chain Wheel & Operating Chain

Chain wheel and operating chain are used to open and close the slide gate when remote operation is desired. It is designed to be used with number 3/16" pocket chain.

	Catalog Number	Wt.	A	B	C	D	E
Chain Wheel	804490	11	10	2	1-3/8	5/16	2
Operating ▲Chain	804505	.5	Order in feet				

*Other Bores Available ▲Chain ordered separately



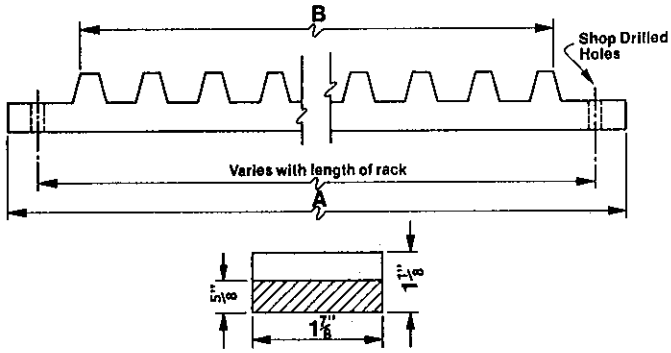
Pinion Gear

The pinion is a ¾" circular pitch cast tooth gear made from close-grain semi-steel. They are accurately bored to provide concentricity.

No. Teeth	Catalog Number	Wt.	A O.D.	B P.D.	*C	D	E	F
12	804483	2-3/4	3.344	2.866	15/16	1-13/16	1/4	5/16

*Other Bores available

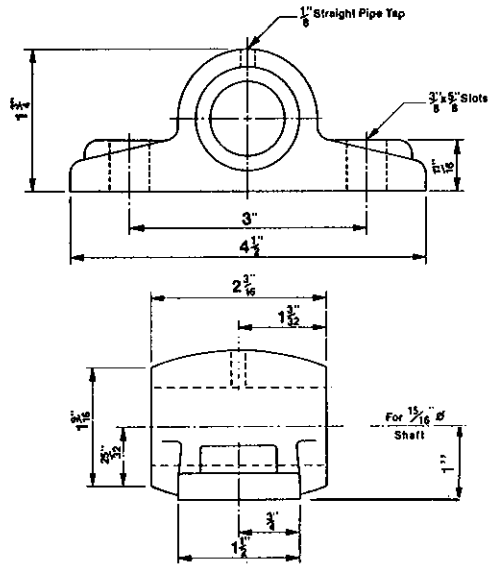
Rack & Pinion Discharge Components



Rack Gear

A ¾" circular pitch cast tooth rack gear is used on the flat and curved slide rack and pinion gates.

Catalog Number	No. Teeth	A	B
804485	15	13-7/8	11
804486	17	16	12-1/4
804487	24	20-1/2	17-5/8
804488	34	28-1/2	24-7/8

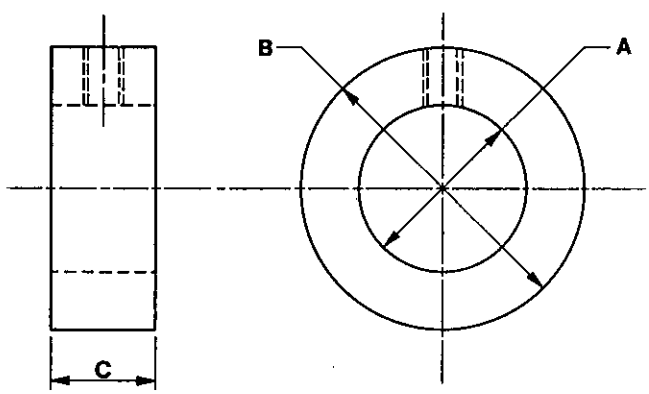


Journal Bearing

A journal bearing is used to support the pinion shaft on most rack and pinion discharge gates.

Catalog Number	
Finished	Casting Only
804484	822099

* Other bores available on Larger Gates.



Solid Steel Set Collar

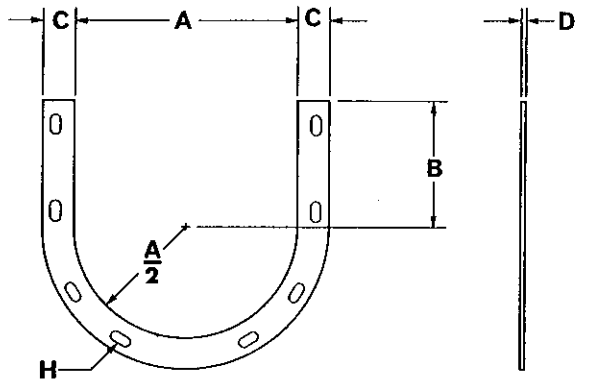
The solid steel set collar is used to hold the shaft in the proper position on the rack and pinion gate.

Catalog No.	A	B	C
804444	15/16	1-5/8	9/16

Flat Slide 4 Required
Curved Slide 2 Required

End Flanges

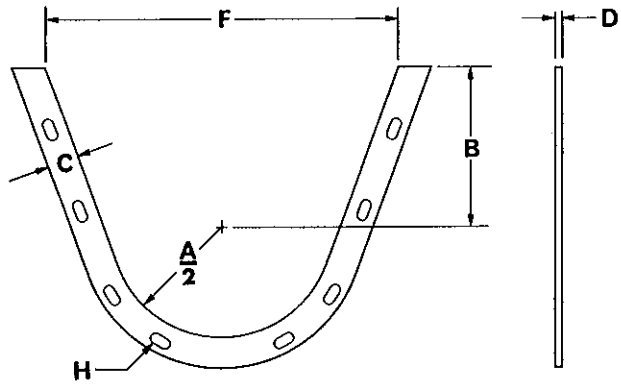
U-Trough



Screw Dia.	Part Number	Catalog Number	A Trough Thickness Thru * 10 Ga.	A Trough Thickness 3/16 - 1/4	B	C	D	H Bolts	Weight
6	6SFU	804211	7-1/4	7-3/8	4-1/2	1-3/8	1/4	3/8	1.5
9	9SFU	804212	10-1/4	10-1/2	6-1/8	1-11/16	1/4	3/8	2.4
12	12SFU	804214	13-1/4	13-1/2	7-3/4	2	1/4	1/2	5.5
14	14SFU	804215	15-1/4	15-1/2	9-1/4	2	1/4	1/2	6.5
16	16SFU	804216	17-1/4	17-1/2	10-5/8	2	1/4	5/8	7.4
18	18SFU	804217	19-1/4	19-1/2	12-1/8	2-1/2	1/4	5/8	10.4
20	20SFU	804218	21-1/4	21-1/2	13-1/2	2-1/2	1/4	5/8	11.5
24	24SFU	804219	25-1/4	25-1/2	16-1/2	2-1/2	1/4	5/8	13.5

* Catalog number for standard gauge only.

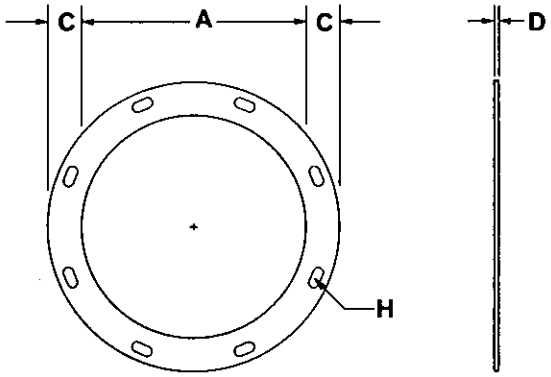
Flared Trough



Screw Dia.	Part Number	Catalog Number	B	C	D	F Trough Thickness Thru * 10 Ga.	F Trough Thickness 3/16 - 1/4	A/2 Thru 10 Ga.	A/2 3/16 - 1/4	H Bolts	Weight
6	6SFV	804230	7	1-3/8	1/4	14-1/4	14-1/2	3-5/8	3-11/16	3/8	1.9
9	9SFV	804231	9	1-11/16	1/4	18-1/4	18-1/2	5-1/8	5-1/4	3/8	3.0
12	12SFV	804232	10	2	1/4	22-1/4	22-1/2	6-5/8	6-3/4	1/2	6.4
14	14SFV	804233	11	2	1/4	24-1/4	24-1/2	7-5/8	7-3/4	1/2	7.3
16	16SFV	804234	11-1/2	2	1/4	28-1/4	28-1/2	8-5/8	8-3/4	5/8	7.9
18	18SFV	804235	12-1/8	2-1/2	1/4	31-1/4	31-1/2	9-5/8	9-3/4	5/8	10.8
20	20SFV	804236	13-1/2	2-1/2	1/4	34-1/4	34-1/2	10-5/8	10-3/4	5/8	11.4
24	24SFV	804237	16-1/2	2-1/2	1/4	40-1/4	40-1/2	12-5/8	12-3/4	5/8	13.0

* Catalog number for standard gauge only.

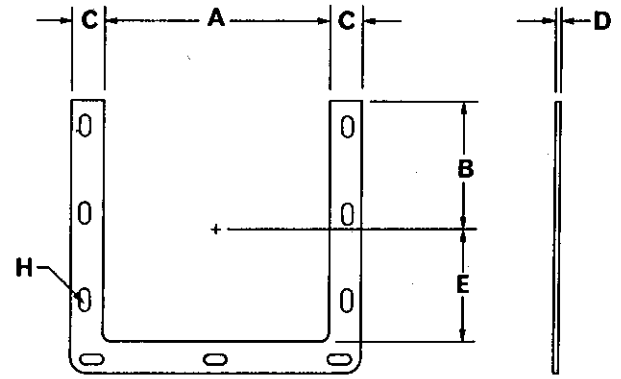
Tubular Housing



Screw Dia.	Part Number	Catalog Number	A Trough Thickness Thru * 10 Ga.	A Trough Thickness 3/16 - 1/4	C	D	H Bolts	Weight
6	6SFO	804250	7-1/4	7-3/8	1-1/4	1/4	3/8	1.8
9	9SFO	804251	10-1/4	10-1/2	1-1/2	1/4	3/8	3.0
12	12SFO	804253	13-1/4	13-1/2	2	1/4	1/2	6.9
14	14SFO	804254	15-1/4	15-1/2	2	1/4	1/2	7.8
16	16SFO	804255	17-1/4	17-1/2	2	1/4	5/8	8.7
18	18SFO	804256	19-1/4	19-1/2	2-1/2	1/4	5/8	12.3
20	20SFO	804257	21-1/4	21-1/2	2-1/2	1/4	5/8	13.4
24	24SFO	804258	25-1/4	25-1/2	2-1/2	1/4	5/8	15.6

* Catalog number for standard gauge only.

Rectangular Trough

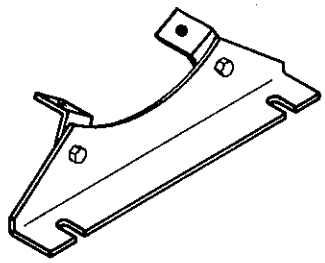


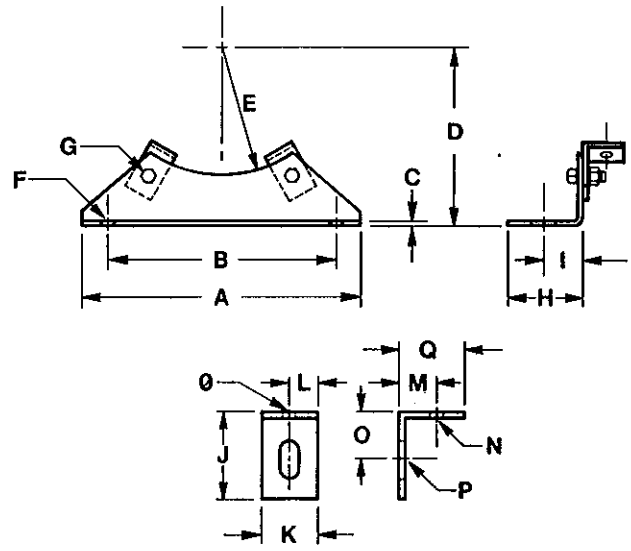
Screw Dia.	Part Number	Catalog Number	A Trough Thickness Thru * 10 Ga.	A Trough Thickness 3/16 - 1/4	B	C	D	E Trough Thickness Thru 10 Ga.	E Trough Thickness 3/16 - 1/4	H Bolts	Weight
6	6SFR	804271	7-1/4	7-3/8	4-1/2	1-1/4	1/4	3-5/8	3-11/16	3/8	1.7
9	9SFR	804272	10-1/4	10-1/2	6-1/8	1-1/2	1/4	5-1/8	5-1/4	3/8	2.9
12	12SFR	804273	13-1/4	13-1/2	7-3/4	2	1/4	6-5/8	6-3/4	1/2	6.6
14	14SFR	804274	15-1/4	15-1/2	9-1/4	2	1/4	7-5/8	7-3/4	1/2	7.6
16	16SFR	804275	17-1/4	17-1/2	10-5/8	2	1/4	8-5/8	8-3/4	5/8	8.5
18	18SFR	804276	19-1/4	19-1/2	12-1/8	2-1/2	1/4	9-5/8	9-3/4	5/8	12.1
20	20SFR	805277	21-1/4	21-1/2	13-1/2	2-1/2	1/4	10-5/8	10-3/4	5/8	13.3
24	24SFR	804278	25-1/4	25-1/2	16-1/2	2-1/2	1/4	12-5/8	12-3/4	5/8	15.8

* Catalog number for standard gauge only.

See pages 108 and 109 for bolt patterns and dimensions.

Saddles



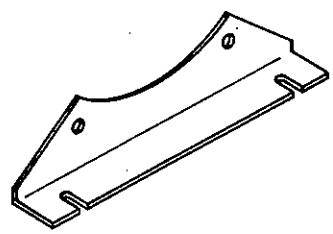


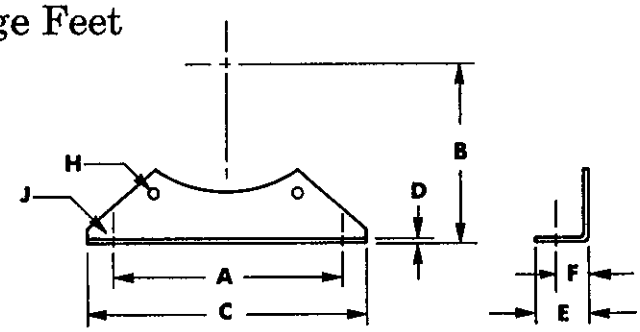
DETAIL "A"

Screw Dia.	Part No.	Catalog * No.	A	B	C	D	E	F*	G*	H	I	J	K	L	M	N	O	P	Q	DETAIL "A"
6	6SSL	803951	10	8-1/8	3/16	5-5/8	3-13/16	3/8	3/8	1-3/4	1	1-1/2	1-1/4	5/8	13/16	9/32	7/8	7/16 x 9/16	1-1/2	1-1/2 x 1-1/2 x 3/16 ∠S
9	9SSL	803952	12	9-3/8	3/16	7-7/8	5-5/16	1/2	3/8	2-5/8	1-1/2	2	1-1/2	3/4	1	3/8	1-1/8	7/16 x 7/8	1-1/2	2 x 1-1/2 x 3/16 ∠S
12	12SSL	803954	15	12-1/4	3/16	9-5/8	6-7/8	5/8	1/2	2-3/4	1-5/8	2	1-1/2	3/4	1	3/8	1-5/16	9/16 x 7/8	1-1/2	2 x 1-1/2 x 3/16 ∠S
14	14SSL	803955	16-1/2	13-1/2	1/4	10-7/8	7-7/8	5/8	1/2	2-7/8	1-5/8	2	1-1/2	3/4	1	3/8	1-5/16	9/16 x 7/8	1-1/2	2 x 1-1/2 x 3/16 ∠S
16	16SSL	803956	18	14-7/8	1/4	12	8-7/8	5/8	5/8	3-1/4	2	2-1/2	1-1/2	3/4	1-1/4	7/16	1-5/16	11/16 x 1-1/16	2	2-1/2 x 2 x 3/16 ∠S
18	18SSL	803957	19-1/8	16	1/4	13-3/8	9-7/8	5/8	5/8	3-1/4	2	2-1/2	1-1/2	3/4	1-1/4	7/16	1-5/16	11/16 x 1-1/16	2	2-1/2 x 2 x 3/16 ∠S
20	20SSL	803958	22-3/4	19-1/4	5/16	15	10-7/8	3/4	5/8	3-3/4	2-1/4	2-1/2	1-1/2	3/4	1-1/4	7/16	1-9/16	11/16 x 1-1/16	2	2-1/2 x 2 x 3/16 ∠S
24	24SSL	803959	24	20	5/16	18-1/8	12-7/8	3/4	5/8	4-1/8	2-1/2	2-1/2	1-1/2	3/4	1-1/4	7/16	1-9/16	11/16 x 1-1/16	2	2-1/2 x 2 x 3/16 ∠S

*Saddle includes support foot, [2] clips and bolts shown.

Flange Feet





Screw Dia.	Part Number	Catalog Number	A	B	C	D	E	F	H Bolts	J Bolts	Weight
6	6SFF	803970	8-1/8	5-5/8	10	3/16	1-3/4	1	3/8	3/8	2.0
9	9SFF	803971	9-3/8	7-7/8	12	3/16	2-5/8	1-1/2	3/8	1/2	3.0
12	12SFF	803973	12-1/4	9-5/8	15	3/16	2-3/4	1-5/8	1/2	5/8	6.0
14	14SFF	803974	13-1/2	10-7/8	16-1/2	1/4	2-7/8	1-5/8	1/2	5/8	7.0
16	16SFF	803975	14-7/8	12	18	1/4	3-1/4	2	5/8	5/8	7.5
18	18SFF	803976	16	13-3/8	19-1/8	1/4	3-1/4	2	5/8	5/8	9.5
20	20SFF	803977	19-1/4	15	22-3/4	5/16	3-3/4	2-1/4	5/8	3/4	12.5
24	24SFF	803978	20	18-1/8	24	5/16	4-1/8	2-1/2	5/8	3/4	14.5

Trough Ends

All Goodman Conveyor trough ends are manufactured to close tolerances from quality, heavy-gauge steel. Assembly bolt holes are jig-drilled for perfect alignment with trough end flanges. **Slotted bearing and seal bolt holes will accept any standard Goodman Conveyor flanged bearing and seal with the exception of the Type H thrust unit.**

Ball bearings, roller bearings or friction type bearings (babbitt or bronze) may be furnished. Ends may also be furnished without bearings.

All trough ends are available in stainless steel. For other alloys available, consult Goodman Conveyor, Engineering Department.

Standard ends are furnished in six basic types, most of which are available for U-, flared, tubular, and rectangular troughs. Discharge ends are available for all troughs. All trough ends are designed for outside assembly.

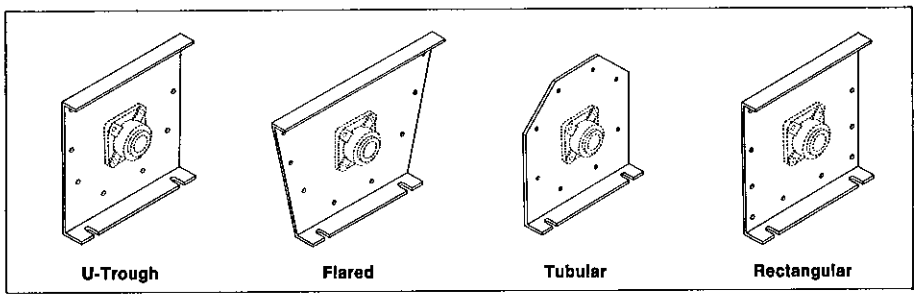
Standard trough ends with feet are the most commonly used. Support is provided by means of an integral bottom flange foot. This end type provides for convenient assembly and disassembly. In applications requiring it, trough ends may also be furnished without feet.

Outboard bearing ends may be used either for double bearing arrangements or for mounting one bearing and a seal. An adjustable pedestal supports the pillow block bearing.

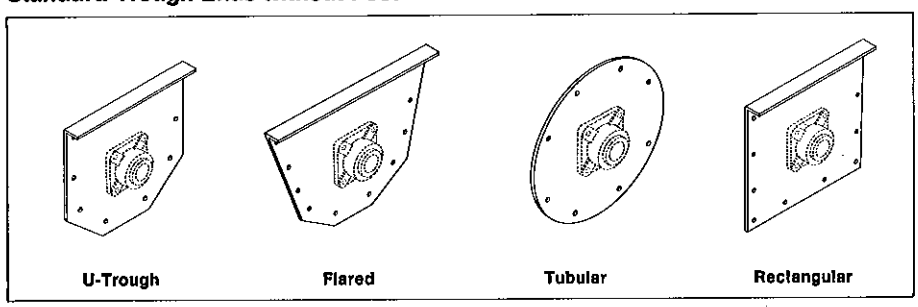
Flush discharge ends are designed for use with Jeffrey flush-end discharges. Bottom flange is drilled with standard discharge flange pattern.

Discharge ends are designed to allow discharge directly from the trough end.

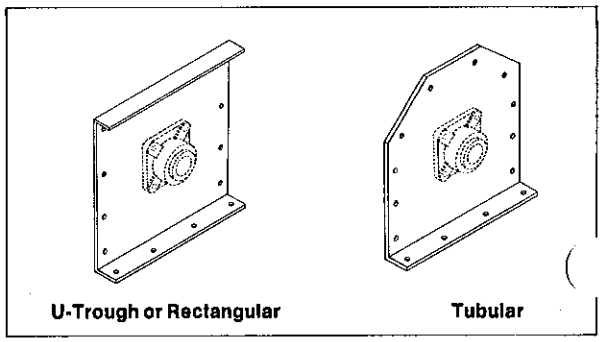
Standard Trough Ends with Feet



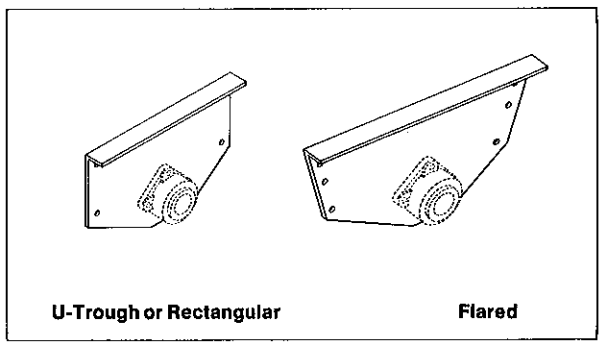
Standard Trough Ends without Feet



Flush Discharge Ends

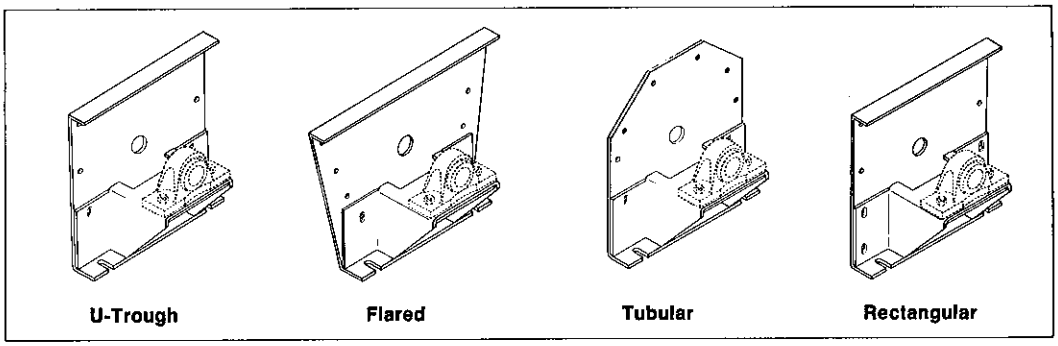


Discharge Ends



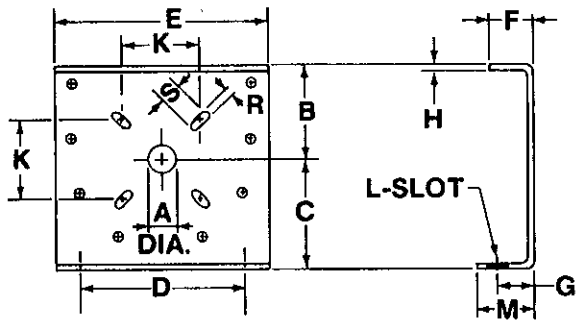
Bearings and bearing bolts not included.

Outboard Bearing Ends

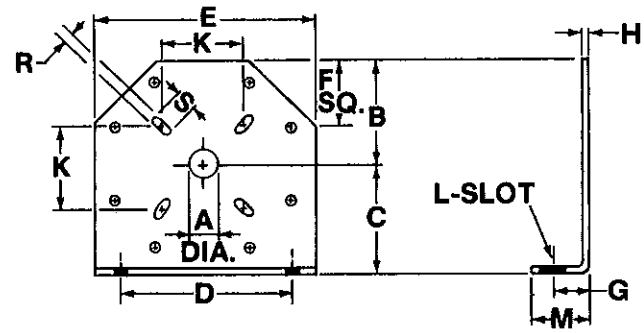


Trough Ends

Ends with Feet



U-Trough



Tubular

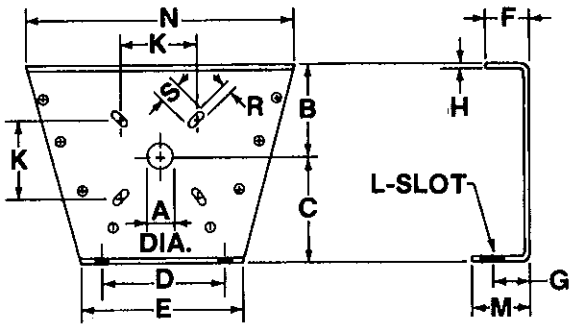
Screw Dia.	Part Number* U-Trough	Part Number* Tubular	A	B U	B Tub.	C	D	E	F U	F Tub.	G	H	K	L - Slot	M	R x S
6	6SEF3-U	6SEF3-0	1¾	4½	4⅞	5⅝	8⅛	9¾	1½	2 27/32	1	3/16	4	7/16x1	1¾	9/16x3¾
9	9SEF3-U	9SEF-3-0	1¾	6⅛	6¾	7⅞	9⅜	13½	1⅝	3 15/16	1½	¼	4	9/16x1	2⅝	9/16x3¾
9	9SEF-4-U	9SEF4-0	2¼	6⅛	6¾	7⅞	9⅜	13½	1⅝	3 15/16	1½	¼	4¾	9/16x1	2⅝	11/16x1¼
12	12SEF4-U	12SEF4-0	2¼	7¾	8⅝	9⅝	12¼	17¼	2	5 1/16	1⅝	¼	4¾	11/16x1⅛	2¾	11/16x1¼
12	12SEF5-U	12SEF5-0	2⅝	7¾	8⅝	9⅝	12¼	17¼	2	5 1/16	1⅝	¼	5¼	11/16x1⅛	2¾	11/16x1¼
12	12SEF6-U	12SEF6-0	3¼	7¾	8⅝	9⅝	12¼	17¼	2	5 1/16	1⅝	¼	6	11/16x1⅛	2¾	13/16 dia.
14	14SEF5-U	14SEF5-0	2⅝	9¼	9⅝	10⅞	13½	19¼	2	5⅝	1⅝	5/16	5¼	11/16x1⅛	2⅞	11/16 dia.
14	14SEF6-U	14SEF6-0	3¼	9¼	9⅝	10⅞	13½	19¼	2	5⅝	1⅝	5/16	6	11/16x1⅛	2⅞	13/16 dia.
16	16SEF6-U	16SEF6-0	3¼	10⅝	10⅝	12	14⅞	21¼	2½	6 7/32	2	5/16	6	11/16x1⅛	3¼	13/16 dia.
18	18SEF6-U	18SEF6-0	3¼	12⅛	12⅛	13⅜	16	24¼	2½	7 3/32	2	⅜	6	11/16x1⅛	3¼	13/16 dia.
18	18SEF7-U	18SEF7-0	3⅝	12⅛	12⅛	13⅜	16	24¼	2½	7 3/32	2	⅜	6⅞	11/16x1⅛	3¼	13/16x1
20	20SEF6-U	20SEF6-0	3¼	13½	13⅛	15	19¼	26¼	2½	7 11/16	2¼	⅜	6	13/16x1⅛	3¾	13/16 dia.
20	20SEF6-U	20SEF6-0	3⅝	13½	13⅛	15	19¼	26¼	2½	7 11/16	2¼	⅜	6⅞	13/16x1⅛	3¾	13/16x1
24	24SEF7-U	24SEF7-0	3⅝	16½	15⅛	18⅛	20	30¼	2½	8 27/32	2½	⅜	6⅞	13/16x1⅛	4⅛	13/16x1

*Bearings and bearing bolts not included.
For bearing selection, see pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

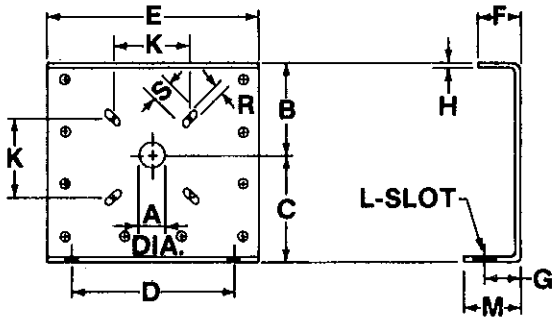
Screw Dia.	Shaft Dia.	Part Number U-Trough	Catalog Numbers Plate Only	Part Tubular	Number Plate Only	Weight U-Trough	Weight Tub.
6	1½	6SEF3-U	802321	6SEF3-0	802351	12	11
9	1½	9SEF3-U	802322	9SEF3-0	802352	18	15
	2	9SEF4-U	802323	9SEF4-0	802353	21	18
12	2	12SEF4-U	802326	12SEF4-0	802356	36	29
	2 7/16	12SEF5-U	802327	12SEF5-0	802357	38	31
	3	12SEF6-U	802328	12SEF6-0	802358	50	43
14	2 7/16	14SEF5-U	802329	14SEF5-0	802359	45	39
	3	14SEF6-U	802330	14SEF6-0	802360	57	51
16	3	16SEF6-U	802331	16SEF6-0	802361	75	65
18	3	18SEF6-U	802332	18SEF6-0	802362	89	78
	3 7/16	18SEF7-U	802333	18SEF7-0	802363	99	89
20	3	20SEF6-U	802334	20SEF6-0	802364	126	115
	3 7/16	20SEF7-U	802335	20SEF7-0	802365	132	127
24	3 7/16	24SEF7-U	802336	24SEF7-0,	802366	169	157

Trough Ends

Ends with Feet



Flared



Rectangular

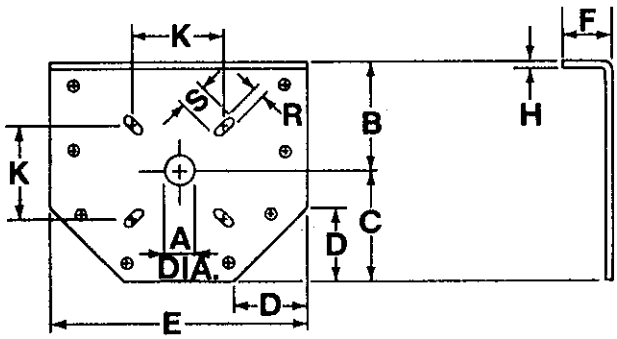
Screw Dia.	Part Number*		A	B		C	D		E		F		G	H	K	L-Slot	M	N	R x S
	Flared	Rectangular		Fl.	Rect.		Fl.	Rect.	F.	Rect.	F.	Rect.							
6	6SEF3-V	6SEF3-R	1¾	7	4½	5⅞	8⅛	8⅛	9¾	9¾	1½	1½	1	3/16	4	7/16x1	1¾	16⅝	9/16x¾
9	9SEF3-V	9SEF3-R	1¾	9	6⅛	7⅞	9⅜	9⅜	13½	13½	1⅝	1⅝	1½	¼	4	9/16x1	2⅝	21¼	9/16x¾
9	9SEF4-V	9SEF4-R	2¼	9	6⅛	7⅞	9⅜	9⅜	13½	13½	1⅝	1⅝	1½	¼	4¾	9/16x1	2⅝	21¼	1/16x1¼
12	12SEF4-V	12SEF4-R	2¼	10	7¾	9⅝	12¼	12¼	17¼	17¼	2	2	1⅝	¼	4¾	1/16x1⅛	2¾	26⅜	1/16x1¼
12	12SEF5-V	12SEF5-R	2⅝	10	7¾	9⅝	12¼	12¼	17¼	17¼	2	2	1⅝	¼	5¼	1/16x1⅛	2¾	26⅜	1/16x1¼
12	12SEF6-V	12SEF6-R	3¼	10	7¾	9⅝	12¼	12¼	17¼	17¼	2	2	1⅝	¼	6	1/16x1⅛	2¾	26⅜	13/16 dia.
14	14SEF5-V	14SEF5-R	2⅝	11	9¼	10⅞	13½	13½	19¼	19¼	2	2	1⅝	5/16	5¼	1/16x1⅛	2⅞	28⅜	1/16x1¼
14	14SEF6-V	14SEF6-R	3¼	11	9¼	10⅞	13½	13½	19¼	19¼	2	2	1⅝	5/16	6	1/16x1⅛	2⅞	28⅜	13/16 dia.
16	16SEF6-V	16SEF6-R	3¼	11½	10⅝	12	14⅞	14⅞	21¼	21¼	2½	2½	2	5/16	6	1/16x1⅛	3¼	32½	13/16 dia.
18	18SEF6-V	18SEF6-R	3¼	12⅛	12⅛	13⅜	16	16	24¼	24¼	2½	2½	2	⅜	6	1/16x1⅛	3¼	36½	13/16 dia.
18	18SEF7-V	18SEF7-R	3⅝	12⅛	12⅛	13⅜	16	16	24¼	24¼	2½	2½	2	⅜	6⅞	1/16x1⅛	3¼	36½	13/16x1
20	20SEF6-V	20SEF6-R	3¼	13½	13½	15	19¼	19¼	26¼	26¼	2½	2½	2¼	⅜	6	13/16x1⅛	3¾	39½	13/16 dia.
20	20SEF7-V	20SEF7-R	3⅝	13½	13½	15	19¼	19¼	26¼	26¼	2½	2½	2¼	⅜	6⅞	13/16x1⅛	3¾	39½	13/16x1
24	24SEF7-V	24SEF7-R	3⅝	16½	16½	18⅛	20	20	30¼	30¼	2½	2½	2½	⅜	6⅞	13/16x1⅛	4⅛	45½	13/16x1

*Bearings and bearing bolts not included.
For bearing selection, see pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

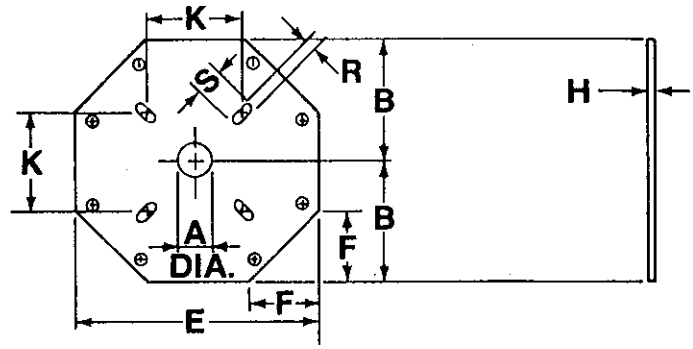
Screw Dia.	Shaft Dia.	Part Number Flared	Catalog Numbers Plate Only	Part Number Rectangular	Catalog Numbers Plate Only	Weight	
						Fl.	Rec.
6	1½	6SEF3-V	802381	6SEF3-R	802410	15	13
9	1½	9SEF3-V	802382	9SEF3-R	802411	22	19
	2	9SEF4-V	802383	9SEF4-R	802412	27	24
12	2	12SEF4-V	802386	12SEF4-R	802415	43	39
	2 7/16	12SEF5-V	802387	12SEF5-R	802416	44	40
	3	12SEF6-V	802388	12SEF6-R	802417	56	58
14	2 7/16	14SEF5-V	802389	14SEF5-R	802418	52	48
	3	14SEF6-V	802390	14SEF6-R	802419	64	66
16	3	16SEF6-V	802391	16SEF6-R	802420	85	85
18	3	18SEF6-V	802392	18SEF6-R	802421	98	94
	3 7/16	18SEF7-V	802393	18SEF7-R	802422	104	101
20	3	20SEF6-V	802394	20SEF6-R	802423	133	134
	3 7/16	20SEF7-V	802395	20SEF7-R	802424	139	140
24	3 7/16	24SEF7-V	802396	24SEF7-R	802425	173	179

Trough Ends

Ends without Feet



U-Trough



Tubular

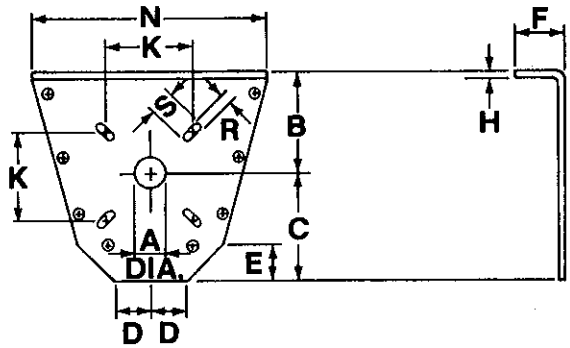
Screw Dia.	Part Number*		A	B		C	D	E	F		H	K	R x S
	U-Trough	Tubular		U	Tub.				U	Tub.			
6	6SE03-U	6SEO3-O	1¾	4½	4⅞	4⅞	2 27/32	9¾	1½	2 27/32	3/16	4	9/16x¾
9	9SEO3-U	9SEO3-O	1¾	6⅛	6¾	6¾	3 15/16	13½	1⅝	3 15/16	¼	4	9/16x¾
9	9SEO4-U	9SEO4-O	2¼	6⅛	6¾	6¾	3 15/16	13½	1⅝	3 15/16	¼	4¾	11/16x1¼
12	12SEO4-U	12SEO4-O	2¼	7¾	8⅝	8⅝	5 1/16	17¼	2	5 1/16	¼	4¾	11/16x1¼
12	12SEO5-U	12SEO5-O	2⅝	7¾	8⅝	8⅝	5 1/16	17¼	2	5 1/16	¼	5¼	11/16x1¼
12	12SEO6-U	12SEO6-O	3¼	7¾	8⅝	8⅝	5 1/16	17¼	2	5 1/16	¼	6	13/16dia.
14	14SEO5-U	14SEO5-O	2⅝	9¼	9⅝	9⅝	5⅝	19¼	2	5⅝	5/16	5¼	11/16x1¼
14	14SEO6-U	14SEO6-O	3¼	9¼	9⅝	9⅝	5⅝	19¼	2	5⅝	5/16	6	13/16 dia.
16	16SEO6-U	16SEO6-O	3¼	10⅝	10⅝	10⅝	6 7/32	21¼	2½	6 7/32	5/16	6	13/16 dia.
18	18SEO6-U	18SEO6-O	3¼	12⅛	12⅛	12⅛	7 3/32	24¼	2½	7 3/32	⅜	6	13/16 dia.
18	18SEO7-U	18SEO7-O	3⅝	12⅛	12⅛	12⅛	7 3/32	24¼	2½	7 3/32	⅜	6⅞	13/16 x 1
20	20SEO6-U	20SEO6-O	3¼	13½	13⅛	13⅛	7 11/16	26¼	2½	7 11/16	⅜	6	13/16 dia.
20	20SEO7-U	20SEO7-O	3⅝	13½	13⅛	13⅛	7 11/16	26¼	2½	7 11/16	⅜	6⅞	13/16 x 1
24	24SEO7-U	24SEO7-O	3⅝	16½	15⅛	15⅛	8 27/32	30¼	2½	8 27/32	⅜	6⅞	13/16 x 1

*Bearings and bearing bolts not included.
For bearing selection, see Pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

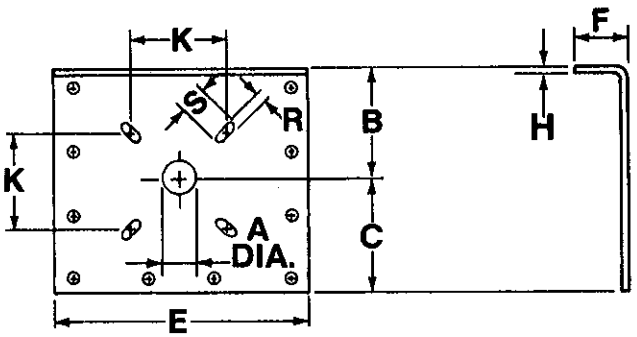
Screw Dia.	Shaft Dia.	Part Number U-Trough	Catalog Numbers Plate Only	Part Number Tubular	Catalog Numbers Plate Only	Weight	
						U-Trough	Tub. Trough
6	1½	6SEO3-U	802201	6SEO3-O	802231	10	9
9	1½	9SEO3-U	802202	9SEO3-O	802232	15	12
	2	9SEO4-U	802203	9SEO4-O	802233	18	15
12	2	12SEO4-U	802206	12SEO4-O	802236	29	22
	2 7/16	12SEO5-U	802207	12SEO5-O	802237	31	24
	3	12SEO6-U	802208	12SEO6-O	802238	43	36
14	2 7/16	14SEO5-U	802209	14SEO5-O	802239	36	30
	3	14SEO6-U	802210	14SEO6-O	802240	48	42
16	3	16SEO6-U	802211	16SEO6-O	802241	62	52
18	3	18SEO6-U	802212	18SEO6-O	802242	74	63
	3 7/16	18SEO7-U	802213	18SEO7-O	802243	84	74
20	3	20SEO6-U	802214	20SEO6-O	802244	96	85
	3 7/16	20SEO7-U	802215	20SEO7-O	802245	102	97
24	3 7/16	24SEO7-U	802216	24SEO7-O	802246	128	116

Trough Ends

Ends without Feet



Flared



Rectangular

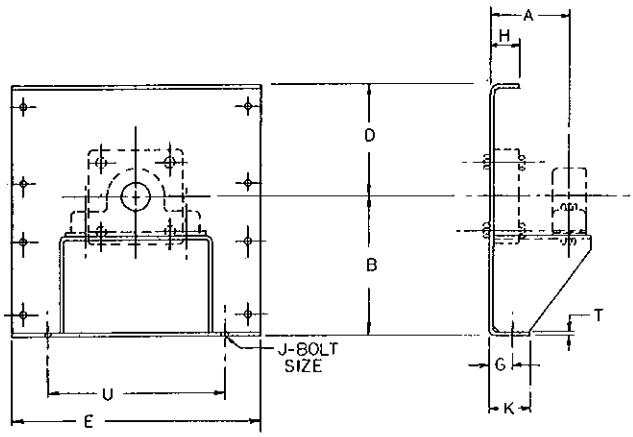
Screw Dia.	Part Number* Flared	Part Number* Rectangular	A	B Fl.	B Rect.	C Fl.	C Rect.	D	E Fl.	E Rect.	F	H	K	N	R x S
6	6SEO3-V	6SEO3-R	1¾	7	4½	5 1/16	4⅞	2⅛	2 3/16	9¾	1½	3/16	4	16⅝	9/16 x ¾
9	9SEO3-V	9SEO3-R	1¾	9	6⅛	6 15/16	6¾	2⅞	3⅛	13½	1⅝	¼	4	21¼	9/16x¾
9	9SEO4-V	9SEO4-R	2¼	9	6⅛	6 15/16	6¾	2⅞	3⅛	13½	1⅝	¼	4¾	21¼	1/16 x 1¼
12	12SEO4-V	12SEO4-R	2¼	10	7¾	8¾	8⅝	3⅝	3¾	17¼	2	¼	4¾	26⅜	1/16 x 1¼
12	12SEO5-V	12SEO5-R	2⅝	10	7¾	8¾	8⅝	3⅝	3¾	17¼	2	¼	5¼	26⅜	1/16 x 1¼
12	12SEO6-V	12SEO6-R	3¼	10	7¾	8¾	8⅝	3⅝	3¾	17¼	2	¼	6	26⅜	13/16 dia.
14	14SEO5-V	14SEO5-R	2⅝	11	9¼	9¾	9⅝	4 1/16	4 7/16	19¼	2	5/16	5¼	28⅜	1/16 x 1¼
14	14SEO6-V	14SEO6-R	3¼	11	9¼	9¾	9⅝	4 1/16	4 7/16	19¼	2	5/16	6	28⅜	13/16 dia.
16	16SEO6-V	16SEO6R	3¼	11½	10⅝	10¾	10⅝	4 7/16	4 11/16	21¼	2½	5/16	6	32½	13/16 dia.
18	18SEO6-V	18SEO6-R	3¼	12⅛	12⅛	12¼	12⅛	5⅛	5¼	24¼	2½	⅜	6	36½	13/16 dia.
18	18SEO7-V	18SEO7-R	3⅝	12⅛	12⅛	12¼	12⅛	5⅛	5¼	24¼	2½	⅜	6⅞	36½	13/16 x 1
20	20SEO6-V	20SEO6-R	3¼	13½	13½	13¼	13⅛	5½	5¾	26¼	2½	⅜	6	39½	13/16 dia.
20	20SEO7-V	20SEO7-R	3⅝	13½	13½	13¼	13⅛	5½	5¾	26¼	2½	⅜	6⅞	39½	13/16 x 1
24	24SEO7-V	24SEO7-R	3⅝	16½	16½	15¼	15⅛	6 5/16	6 9/16	30¼	2½	⅜	6⅞	45½	13/16 x 1

*Bearings and bearing bolts not included.
For bearing selection, see Pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

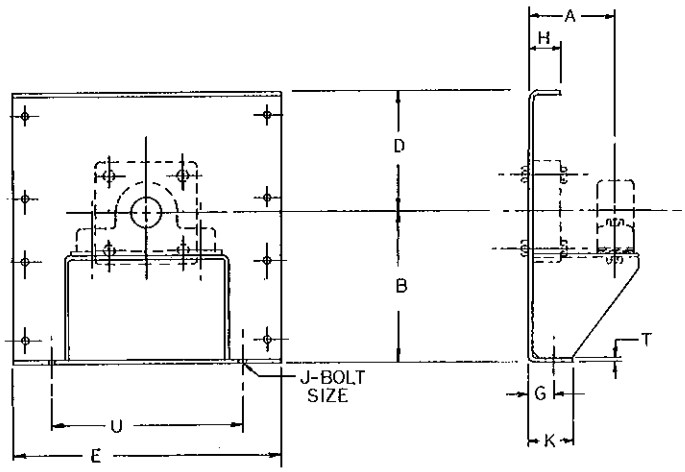
Screw Dia.	Shaft Dia.	Part Number Flared	Catalog Numbers Plate Only	Part Number Rect.	Catalog Numbers Plate Only	Weight Flared	Weight Rect.
6	1½	6SEO3-V	802261	6SEO3-R	802291	13	11
9	1½	9SEO3-V	802262	9SEO3-R	802292	19	16
	2	9SEO4-V	802263	9SEO4-R	802293	24	21
12	2	12SEO4-V	802266	12SEO4-R	802296	36	32
	2 7/16	12SEO5-V	802267	12SEO5-R	802297	37	33
	3	12SEO6-V	802268	12SEO6-R	802298	49	51
14	2 7/16	14SEO5-V	802269	14SEO5-R	802299	43	39
	3	14SEO6-V	802270	14SEO6-R	802300	55	57
16	3	16SEO6-V	802271	16SEO6-R	802301	72	72
18	3	18SEO6-V	802272	18SEO6-R	802302	83	79
	3 7/16	18SEO7-V	802273	18SEO7-R	802303	89	86
20	3	20SEO6-V	802274	20SEO6-R	802304	103	104
	3 7/16	20SEO7-V	802275	20SEO7-R	802305	109	110
24	3 7/16	24SEO7-V	802276	24SEO7-R	802306	132	138

Trough Ends

Outboard Bearing Ends



U-Trough
(Shown with Seal Housing)



Rectangular
(Shown with Seal Housing)

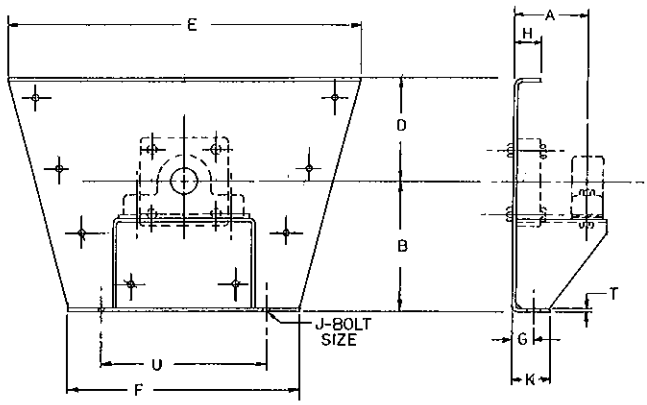
Screw Dia.	Shaft Dia.	Dimension A & Wt. of Brg.						B	D	E	G	H	J Bolts	K	T	U
		Babb. or Br. Brushed		Ball		Type E Roller										
		A	Wt.	A	Wt.	A	Wt.									
6	1-1/2	5	5	5	5-1/4	5	9-1/2	5-5/8	4-1/2	9-3/4	1	1-1/2	3/8	1-3/4	3/16	8-1/8
9	1-1/2	5	5	5	5-1/4	5	9-1/2	7-7/8	6-1/8	13-1/2	1-1/2	1-5/8	1/2	2-5/8	1/4	9-3/8
	2	5-1/2	9-1/4	5-1/2	9-1/2	5-1/2	12	7-7/8	6-1/8	13-1/2	1-1/2	1-5/8	1/2	2-5/8	1/4	9-3/8
12	2	5-1/2	9-1/4	5-1/2	9-1/2	5-1/2	12	9-5/8	7-3/4	17-1/4	1-5/8	2	5/8	2-3/4	1/4	12-1/4
	2-7/16	6-1/2	17	6-1/2	12	6-1/2	19	9-5/8	7-3/4	17-1/4	1-5/8	2	5/8	2-3/4	1/4	12-1/4
	3	7	27	7	19	7	28	9-5/8	7-3/4	17-1/4	1-5/8	2	5/8	2-3/4	5/16	12-1/4
14	2-7/16	6-1/2	17	6-1/2	12	6-1/2	19	10-7/8	9-1/4	19-1/4	1-5/8	2	5/8	2-7/8	1/4	13-1/2
	3	7	27	7	19	7	28	10-7/8	9-1/4	19-1/4	1-5/8	2	5/8	2-7/8	5/16	13-1/2
16	3	7	27	7	19	7	28	12	10-5/8	21-1/4	2	2-1/2	5/8	3-1/4	5/16	14-7/8
18	3	7	27	7	19	7	28	13-3/8	12-1/8	24-1/4	2	2-1/2	5/8	3-1/4	5/16	16
	3-7/16	7-3/4	27	7-3/4	24	7-3/4	32	13-3/8	12-1/8	24-1/4	2	2-1/2	5/8	3-1/4	3/8	16
20	3	7	27	7	19	7	28	15	13-1/2	26-1/4	2-1/4	2-1/2	3/4	3-3/4	5/16	19-1/4
	3-7/16	7-3/4	43	7-3/4	31-1/2	7-3/4	45	15	13-1/2	26-1/4	2-1/4	2-1/2	3/4	3-3/4	3/8	19-1/4
24	3-7/16	7-3/4	43	7-3/4	31-1/2	7-3/4	45	18-1/8	16-1/2	30-1/4	2-1/2	2-1/2	3/4	4-1/8	3/8	20

Screw Dia.	Shaft Dia.	Part Number	Catalog Numbers Plate & Pedestal Assy. Only			Part Number	Catalog Numbers Plate & Pedestal Assy. Only			Weight
		U-Trough	*For Ball Bearing	*For Roller Bearing	*For Bronze Bab. Brg.	Rectangular	*For Ball Bearing	*For Roller Bearing	*For Bronze Bab. Brg.	Both Plates
6	1-1/2	6SEB3-U	802700	802700	802764	6SEB3-R	802741	802741	802778	20
9	1-1/2	9SEB3-U	802701	802701	802765	9SEB3-R	802742	802742	802779	28
	2	9SEB4-U	802702	802702	802766	9SEB4-R	802743	802743	802780	33
12	2	12SEB4-U	802703	802703	802767	12SEB4-R	802744	802744	802781	59
	2-7/16	12SEB5-U	802704	802705	802768	12SEB5-R	802745	802746	802782	60
	3	12SEB6-U	802706	802707	802769	12SEB6-R	802747	802748	802783	73
14	2-7/16	14SEB5-U	802739	802740	802770	14SEB5-R	802749	802750	802784	71
	3	14SEB6-U	802738	802727	802771	14SEB6-R	802751	802752	802785	89
16	3	16SEB6-U	802728	802729	802772	16SEB6-R	802753	802754	802786	125
18	3	18SEB6-U	802730	802731	802773	18SEB6-R	802755	802756	802787	134
	3-7/16	18SEB7-U	802732	802732	802774	18SEB7-R	802757	802757	802788	141
20	3	20SEB6-U	802733	802734	802775	20SEB6-R	802760	802761	802789	197
	3-7/16	20SEB7-U	802735	802735	802776	20SEB7-R	802762	802762	802790	203
24	3-7/16	24SEB7-U	802736	802736	802777	24SEB7-R	802763	802763	802791	256

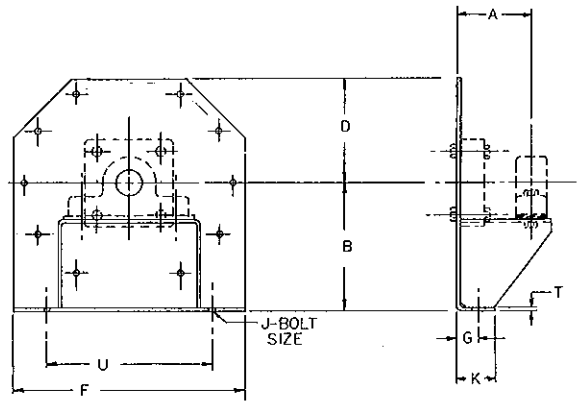
♟ Specify Babbitt or Bronze.
* Bearings, Bearing Bolts and Seals not included.

Trough Ends

Outboard Bearing Ends



Flared
(Shown with Seal Housing)



Tubular
(Shown with Seal Housing)

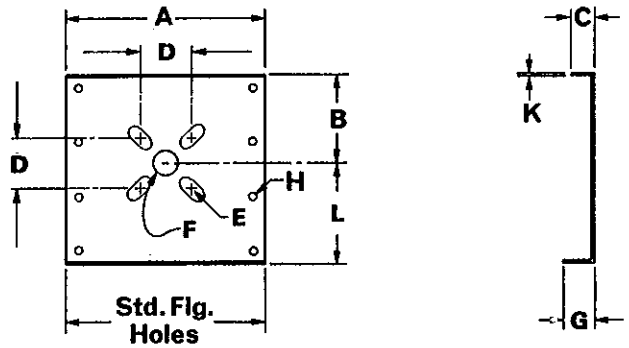
Screw Dia.	Shaft Dia.	Dimension "A" & Wt. of Brg.						B	D	E	F	G	H	J Bolts	K	T	U
		Babb. or Br. Bushed		Ball		Roller											
		A	Wt.	A	Wt.	A	Wt.										
6	1-1/2	5	5	5	5-1/4	5	9-1/2	5-5/8	7	16-5/8	9-3/4	1	1-1/2	3/8	1-3/4	3/16	8-1/8
9	1-1/2	5	5	5	5-1/4	5	9-1/2	7-7/8	9	21-1/4	13-1/2	1-1/2	1-5/8	1/2	2-5/8	1/4	9-3/8
	2	5-1/2	9-1/4	5-1/2	9-1/2	5-1/2	12	7-7/8	9			1-1/2	1-5/8	1/2	2-5/8	1/4	9-3/8
12	2	5-1/2	9-1/4	5-1/2	9-1/2	5-1/2	12	9-5/8	10	26-1/4	17-1/4	1-5/8	2	5/8	2-3/4	1/4	12-1/4
	2-7/16	6-1/2	17	6-1/2	12	6-1/2	19	9-5/8	10			1-5/8	2	5/8	2-3/4	1/4	12-1/4
	3	7	27	7	19	7	28	9-5/8	10			1-5/8	2	5/8	2-3/4	5/16	12-1/4
14	2-7/16	6-1/2	17	6-1/2	12	6-1/2	19	10-7/8	11	28-1/4	19-1/4	1-5/8	2	5/8	2-7/8	1/4	13-1/2
	3	7	27	7	19	7	28	10-7/8	11			1-5/8	2	5/8	2-7/8	5/16	13-1/2
16	3	7	27	7	19	7	28	12	11-1/2	32-1/4	21-1/4	2	2-1/2	5/8	3-1/4	5/16	14-7/8
18	3	7	27	7	19	7	28	13-3/8	12-1/8	36-1/4	24-1/4	2	2-1/2	5/8	3-1/4	5/16	16
20	3	7	27	7	19	7	28	15	13-1/2	39-1/4	26-1/4	2-1/4	2-1/2	3/4	3-3/4	5/16	19-1/4
	3-7/16	7-3/4	43	7-3/4	31-1/2	7-3/4	45	15	13-1/2			2-1/4	2-1/2	3/4	3-3/4	3/8	19-1/4
24	3-7/16	7-3/4	43	7-3/4	31-1/2	7-3/4	45	18-1/8	16-1/2	45-1/4	30-1/4	2-1/2	2-1/2	3/4	4-1/8	3/8	20

Screw Dia.	Shaft Dia.	Part Number Flared	Catalog Numbers Plate & Pedestal Assy. Only			Part Number Tubular	Catalog Numbers Plate & Pedestal Assy. Only			Weights	
			*For Ball	*For Roller	*For ▲ Bab/Brz.		*For Ball	*For Roller	*For ▲ Bab/Brz.	Flared	Tub.
6	1-1/2	6SEB3-V	803660	803660	803681	6SEB3-O	803695	803695	803820	22	18
9	1-1/2	9SEB3-V	803661	803661	803682	9SEB3-O	803696	803696	803821	31	24
	2	9SEB4-V	803662	803662	803683	9SEB4-O	803697	803697	803822	36	27
12	2	12SEB4-V	803663	803663	803684	12SEB4-O	803698	803698	803823	63	49
	2-7/16	12SEB5-V	803664	803665	803685	12SEB5-O	803699	803700	803824	64	51
	3	12SEB6-V	803666	803667	803686	12SEB6-O	803701	803702	803825	76	63
14	2-7/16	14SEB5-V	803668	803669	803687	14SEB5-O	803703	803704	803826	75	62
	3	14SEB6-V	803670	803671	803688	14SEB6-O	803705	803706	803827	87	74
16	3	16SEB6-V	803672	803673	803689	16SEB6-O	803707	803708	803828	125	150
18	3	18SEB6-V	803674	803675	803690	18SEB6-O	803720	803721	803851	138	118
	3-7/16	18SEB7-V	803676	803676	803691	18SEB7-O	803722	803722	803852	144	149
20	3	20SEB6-V	803677	803678	803692	20SEB6-O	803723	803724	803853	196	178
	3-7/16	20SEB7-V	803679	803679	803693	20SEB7-O	803771	803771	803854	202	190
24	3-7/16	24SEB7-V	803680	803680	803694	24SEB7-O	803772	803772	803855	250	234

▲Specify Babbitt or Bronze.
*** Bearings and Bearing Bolts not included.**

Trough Ends

Flush Discharge Ends



U-Trough or Rectangular

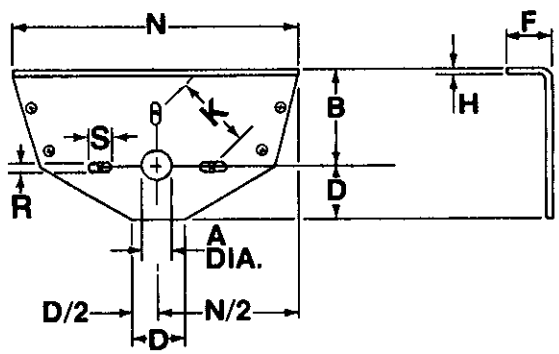
Screw Dia.	Shaft Dia.	Part Number* U-Trough	Part Number* Rectangular	A	B	C	D Ball	D Roller	E-Bolts Ball	E-Bolts Roller	F Dia.	G	H Bolts	K	L
6	1½	6SEE3-U	6SEE3-R	10	4½	1½	4	4⅛	½	½	1¾	1½	⅜	13/16	5⅝
9	1½ 2	9SEE3-U 9SEE4-U	9SEE3-R 9SEE4-R	13	6⅛	1⅝	4 5⅛	4⅛ 4⅜	½ ⅝	½ ½	1¾ 2¼	1½	⅜	¼ ¼	7⅞
12	2 2 7/16 3	12SEE4-U 12SEE5-U 12SEE6-U	12SEE4-R 12SEE5-R 12SEE6-R	17¼	7¾	2	5⅛ 5⅝ 6	4⅜ 5⅜ 6	⅝ ⅝ ¾	½ ⅝ ¾	2¼ 2⅝ 3¼	2	½	¼ ¼ ¼	9⅝
14	2 7/16 3	14SEE5-U 14SEE6-U	14SEE5-R 14SEE6-R	19¼	9¼	2	5⅝ 6	5⅜ 6	⅝ ¾	⅝ ¾	2⅝ 3¼	2	½	5/16 5/16	10⅞
16	3	16SEE6-U	16SEE6-R	21¼	10⅝	2½	6	6	¾	¾	3¼	2	⅝	5/16	12
18	3 3 7/16	18SEE6-U 18SEE7-U	18SEE6-R 18SEE7-R	24¼	12⅛	2½	6 6¾	6 7	¾ ¾	¾ ¾	3¼ 3⅝	2½	5⅝	⅜ ⅜	13⅜
20	3 3 7/16	20SEE6-U 20SEE7-U	20SEE6-R 20SEE7R	26¼	13½	2½	6 6¾	6 7	¾ ¾	¾ ¾	3¼ 3⅝	2½	⅝	⅜ ⅜	15
24	3 7/16	24SEE7-U	24SEE7-R	30¼	16½	2½	6¾	7	¾	¾	3⅝	2½	⅝	⅜	18⅛

*Bearings and bearing bolts not included.
For bearing selection, see Pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

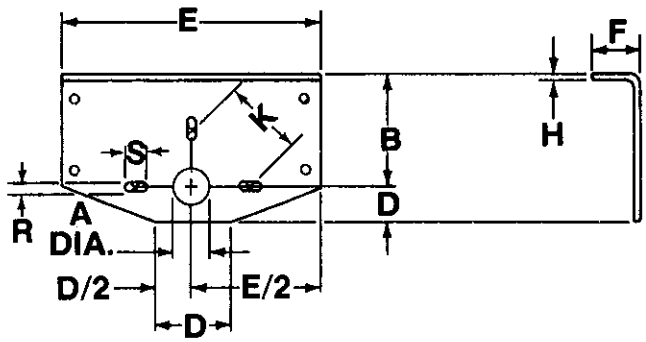
Screw Dia.	Shaft Dia.	Part Number U-Trough	Catalog Numbers Plate Only	Part Number Rect.	Catalog Numbers Plate Only	Part Number Tubular	Catalog Numbers Plate Only	Weight U-Trough	Weight Rect.	Weight Tubular
6	1½	6SEE3-U	802561	6SEE3-R	802621	6SEE3-O	802591	12	13	12
9	1½ 2	9SEE3-U 9SEE4-U	802562 802563	9SEE3-R 9SEE4-R	802622 802623	9SEE3-O 9SEE4-O	802592 802593	18 21	19 24	18 21
12	2 2 7/16 3	12SEE4-U 12SEE5-U 12SEE6-U	802566 802567 802568	12SEE4-R 12SEE5-R 12SEE6-R	802626 802627 802628	12SEE4-O 12SEE5-O 12SEE6-O	802596 802597 802598	36 38 50	39 40 58	36 38 50
14	2 7/16 3	14SEE5-U 14SEE6-U	802569 802570	14SEE5-R 14SEE6-R	802629 802630	14SEE5-O 14SEE6-O	802599 802600	45 57	48 66	45 57
16	3	16SEE6-U	802571	16SEE6-R	802631	16SEE6-O	802601	75	85	75
18	3 3 7/16	18SEE6-U 18SEE7-U	802572 802573	18SEE6-R 18SEE7-R	802632 802633	18SEE6-O 18SEE7-O	802602 802603	89 99	94 101	89 99
20	3 3 7/16	20SEE6-U 20SEE7-U	802574 802575	20SEE6-R 20SEE7-R	802634 802635	20SEE6-O 20SEE7-O	802604 802605	126 132	134 140	126 132
24	3 7/16	24SEE7-U	802576	24SEE7-R	802636	24SEE7-O	802606	169	179	169

Trough Ends

Discharge Ends



Flared



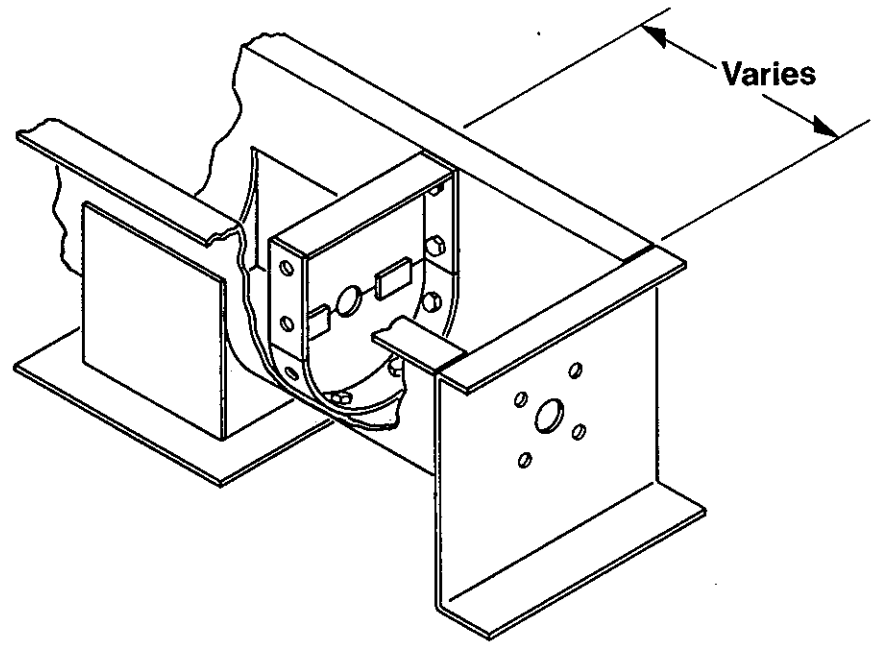
U-Trough or Rectangular

Screw Dia.	Part Number* U and Rect.	Part Number* Flared	A	B U/Rect.	B Flared	D	E	F	H	K	N	R x S
6	6SED3-U	6SED3-V	1¾	4½	7	2	9¾	1½	3/16	4	16⅝	9/16 x ¾
9	9SED3-U	9SED3-V	1¾	6⅛	9	2	13½	1⅝	¼	4	21¼	9/16 x ¾
9	9SED4-U	9SED4-V	2¼	6⅛	9	2½	13½	1⅝	¼	4¾	21¼	11/16 x 1¼
12	12SED4-U	12SED4-V	2¼	7¾	10	2½	17¼	2	¼	4¾	26⅜	11/16 x 1¼
12	12SED5-U	12SED5-V	2⅝	7¾	10	2¾	17¼	2	¼	5¼	26⅜	11/16 x 1¼
12	12SED6-U	12SED6-V	3¼	7¾	10	3⅜	17¼	2	¼	6	26⅜	13/16 dia.
14	14SED5-U	14SED5-V	2⅝	9¼	11	2¾	19¼	2	5/16	5¼	28⅜	11/16 x 1¼
14	14SED6-U	14SED6-V	3¼	9¼	11	3⅜	19¼	2	5/16	6	28⅜	13/16 dia.
16	16SED6-U	16SED6-V	3¼	10⅝	11½	3⅜	21¼	2½	5/16	6	32½	13/16 dia.
18	18SED6-U	18SED6-V	3¼	12⅛	12⅛	3⅜	24¼	2½	⅜	6	36½	13/16 dia.
18	18SED7-U	18SED7-V	3⅝	12⅛	12⅛	3⅞	24¼	2½	⅜	6⅞	36½	13/16 x 1
20	20SED6-U	20SED6-V	3¼	13½	13½	3⅜	26¼	2½	⅜	6	39½	13/16 dia.
20	20SED7-U	20SED7-V	3⅝	13½	13½	3⅞	26¼	2½	⅜	6⅞	39½	13/16 x 1
24	24SED7-U	24SED7-V	3⅝	16½	16½	3⅞	30¼	2½	⅜	6⅞	45¼	13/16 x 1

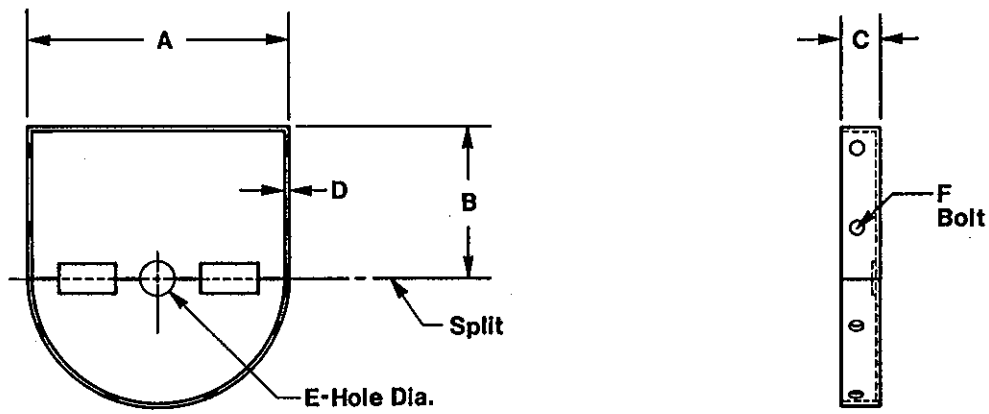
*Bearings and bearing bolts not included.
For bearing selection, see Pages 62 and 63.
For seal selection, see Pages 67 and 68.
Dimensions in inches.
Weight in pounds.

Screw Dia.	Shaft Dia.	Part Number U-Trough	Catalog Numbers Plate Only	Part Number Rect.	Catalog Numbers Plate Only	Part Number Flared	Catalog Numbers Plate Only	Weight U-Trough	Weight Rect.	Weight Flar.
6	1½	6SED3-U	802651	6SED3-R	802711	6SED3-V	802681	8	8	11
9	1½	9SED3-U	802652	9SED3-R	802712	9SED3-V	802682	11	11	15
	2	9SED4-U	802653	9SED4-R	802713	9SED4-V	802683	14	14	20
12	2	12SED4-U	802656	12SED4-R	802716	12SED4-V	802686	21	21	28
	2 7/16	12SED5-U	802657	12SED5-R	802717	12SED5-V	802687	23	23	29
	3	12SED6-U	802658	12SED6-R	802718	12SED6-V	802688	34	34	41
14	2 7/16	14SED5-U	802659	14SED5-R	802719	14SED5-V	802689	26	26	33
	3	14SED6-U	802660	14SED6-R	802720	14SED6-V	802690	38	38	45
16	3	16SED6-U	802661	16SED6-R	802721	16SED6-V	802691	47	47	56
18	3	18SED6-U	802662	18SED6-R	802722	18SED6-V	802692	54	54	63
	3 7/16	18SED7-U	802663	18SED7-R	802723	18SED7-V	802693	65	65	69
20	3	20SED6-U	802664	20SED6-R	802724	20SED6-V	802694	77	77	75
	3 7/16	20SED7-U	802665	20SED7-R	802725	20SED7-V	802695	89	89	81
24	3 7/16	24SED7-U	802666	24SED7-R	802726	24SED7-V	802696	109	109	96

Bulkheads



Bulkheads are generally required when conveying high-temperature materials. Void areas should be packed with a non-combustible material to dissipate heat from bearing and seal area. Consult Goodman Conveyor for specific bulkhead requirements.

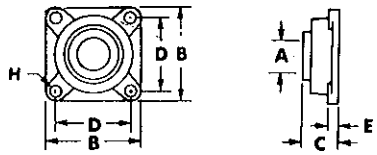


Screw Diameter	Catalog Number	A	B	C	D	E	F Bolt
6	803540	6-15/16	4-1/2	2	10GA.	*	3/8
9	803541	9-15/16	6-1/8	2	3/16	*	3/8
12	803542	12-15/16	7-3/4	2	3/16	*	1/2
14	803543	14-15/16	9-1/4	2	3/16	*	1/2
16	803544	16-15/16	10-5/8	2	3/16	*	5/8
18	803545	18-15/16	12-1/8	2	3/16	*	5/8
20	803546	20-15/16	13-1/2	2-1/2	1/4	*	5/8
24	803547	24-15/16	16-1/2	2-1/2	1/4	*	5/8

* Dependent upon outside diameter of pipe.

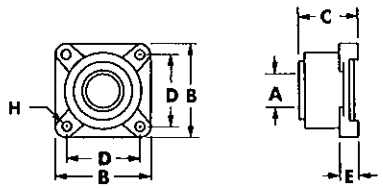
Trough End Bearings

BALL BEARING, FLANGED



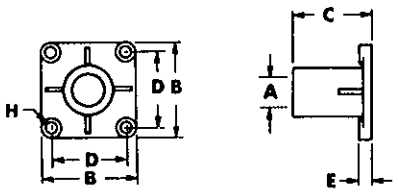
A Bore	Part Number	Catalog Number	B	C	D	E	H Bolts	Weight
1-1/2	SBF3-B	802801	5-1/8	2	4	9/16	1/2	4.8
2	SBF4-B	802802	6-1/2	2-3/8	5-1/8	11/16	5/8	9.6
2-7/16	SBF5-B	802803	7	2-1/2	5-5/8	11/16	5/8	11
3	SBF6-B	802804	7-3/4	3-3/8	6	7/8	3/4	23
3-7/16	SBF7-B	802805	8-1/2	3-7/8	6-3/4	1	3/4	29

ROLLER BEARING, FLANGED



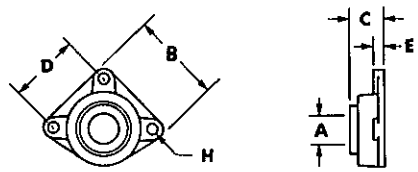
A Bore	Part Number	Catalog Number	B	C	D	E	H Bolts	Weight
1-1/2	SBF3-R	802816	5-3/8	3-1/2	4-1/8	1-1/4	1/2	10
2	SBF4-R	802817	5-5/8	3-5/8	4-3/8	1-1/4	1/2	12
2-7/16	SBF5-R	802818	6-7/8	4-1/4	5-3/8	1-1/2	5/8	21
3	SBF6-R	802819	7-3/4	4-3/4	6	1-5/8	3/4	28
3-7/16	SBF7-R	802820	9-1/4	5-1/4	7	1-7/8	3/4	46

BABBITTED OR BRONZE, FLANGED



A Bore	Part Number	Catalog Numbers		B	C	D	E	H Bolts	Weight
		Babbitt	Bronze						
1-1/2	SBF3-F	802832	802837	5-1/8	3	4	1-3/16	1/2	9
2	SBF4-F	802833	802838	6-1/2	4	5-1/8	1-3/16	5/8	14.5
2-7/16	SBF5-F	802834	802839	6-7/8	5	5-5/8	1-3/16	5/8	16.5
3	SBF6-F	802835	802840	7-3/4	6	6	1-3/16	3/4	23
3-7/16	SBF7-F	802836	802841	8-5/8	7	6-3/4	1-1/4	3/4	38

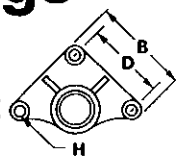
BALL BEARING, DISCHARGE-TYPE

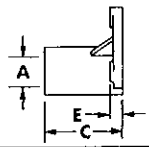


A Bore	Part Number	Catalog Number	B	C	D	E	H Bolts	Weight
1-1/2	SBD3-B	802846	5-1/8	2	4	9/16	1/2	3.8
2	SBD4-B	802847	6-1/2	2-3/8	5-1/8	11/16	5/8	7.7
2-7/16	SBD5-B	802848	7	2-1/2	5-5/8	11/16	5/8	8.8
3	SBD6-B	802849	7-3/4	3-3/8	6	7/8	3/4	18
3-7/16	SBD7-B	802850	8-1/2	3-7/8	6-3/4	1	3/4	23

Trough End Bearings

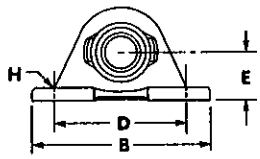
BABBITTED OR BRONZE, DISCHARGE-TYPE

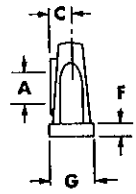




A Bore	Part Number	Catalog Numbers		B	C	D	E	H Bolts	Weight
		Babbitt	Bronze						
1-1/2	SBD3-F	802861	802866	5-1/8	3	4	1-3/16	1/2	7.5
2	SBD4-F	802862	802867	6-1/2	4	5-1/8	1-3/16	5/8	11
2-7/16	SBD5-F	802863	802868	6-7/8	5	5-5/8	1-3/16	5/8	15
3	SBD6-F	802864	802869	7-3/4	6	6	1-3/16	3/4	20
3-7/16	SBD7-F	802865	802870	8-5/8	7	6-3/4	1-1/4	3/4	32

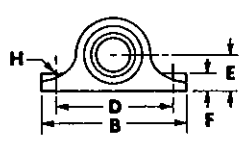
BALL BEARING PILLOW BLOCK

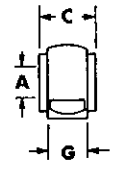




A Bore	Part Number	Catalog Number	B	C	D	E	F	G	H Bolts	Weight
1-1/2	SBP3-B	802876	7-3/4	1-5/16	5-7/8	2-1/8	1-5/16	2-1/8	1/2	5.6
2	SBP4-B	802877	8-7/8	1-1/2	6-7/8	2-1/2	1-9/16	2-3/8	5/8	8
2-7/16	SBP5-B	802878	10-3/4	1-3/16	8	3	1-7/8	2-7/8	3/4	13.5
3	SBP6-B	802879	12	1-7/8	9	3-1/2	2-3/16	3-1/4	7/8	18.4
3-7/16	SBP7-B	802880	14	2-1/16	11	4	2-1/2	3-7/16	7/8	28.4

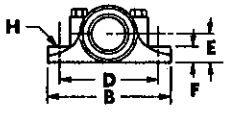
ROLLER BEARING PILLOW BLOCK

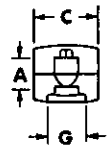




A Bore	Part Number	Catalog Number	B	C	D	E	F	G	H Bolts	Weight
1-1/2	SBP3-R	802890	7-7/8	3-3/8	6-1/4	2-1/8	1-1/4	2-3/8	1/2	9.5
2	SBP4-R	802891	8-7/8	3-1/2	7	2-1/4	1-3/8	2-1/2	5/8	11
2-7/16	SBP5-R	802892	10-1/2	4	8-1/2	2-3/4	1-5/8	2-7/8	5/8	19
3	SBP6-R	802893	12	4-1/2	9-1/2	3-1/8	1-7/8	3-1/8	3/4	26
3-7/16	SBP7-R	802894	14	5	11	3-3/4	2-1/4	3-5/8	7/8	44

BABBITTED SPLIT JOURNAL BEARING





A Bore	Part Number	Catalog Number	B	C	D	E	F	G	H Bolts	Weight
1-1/2	SBP3-F	802882	6-1/4	2-7/8	4-7/8	1-3/8	3/4	2	1/2	4.6
2	SBP4-F	802883	7-1/2	3-7/8	6	1-3/4	15/16	2-1/2	5/8	8.6
2-7/16	SBP5-F	802884	9-1/4	4-7/8	7-1/8	2-1/8	1-1/8	3	5/8	16
3	SBP6-F	802885	10-3/4	5-7/8	8-1/2	2-1/2	1-5/16	3-1/2	3/4	24
3-7/16	SBP7-F	802886	12	6-7/8	9-1/4	2-7/8	1-1/2	4	7/8	40

BRONZE AVAILABLE UPON REQUEST

Thrust Bearings

AN OPERATING screw conveyor creates an inherent thrust load opposite the direction of material flow. This thrust load—if not transmitted to the appropriate stationary components—can result in severe damage to hanger bearings. Therefore, one end bearing should always be of a design that will prohibit thrust-induced axial movement of the conveyor screw.

To prevent possible deflection of the screw, the thrust bearing unit, whenever possible, should be located so that the screw is held in tension rather than in compression. When located at the discharge end, the thrust bearing holds the screw in tension.

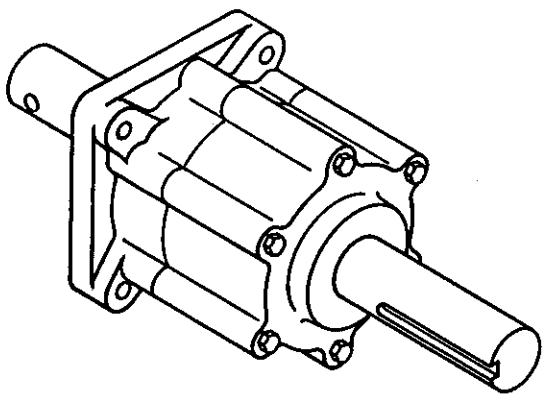
At the intake end, the bearing maintains the screw in compression.

Several types of thrust bearings are available for varying degrees of thrust:

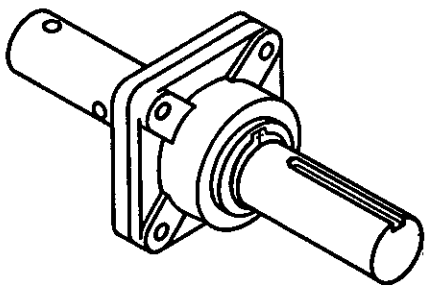
Type H heavy-duty roller bearing thrust units are designed for the heaviest thrust loads. Although this unit is capable of transmitting thrust in either direction, it is recommended that it be located at the discharge end so that the screw will be held in tension. The heavy-duty roller bearings are mounted on precision machined steel shafts with shoulders and contained in a machined gray iron housing thus providing the highest thrust and radial load capacities. Lip-type mechanical shaft seals are provided at both ends of the housing. The unit is available only with integral shafts, either drive or end.

Type M end thrust bearings, designed for medium thrust and radial loads, are efficient, economical and the most widely used of all end thrust types. Although thrust loading capacity is bi-directional, the unit should always be used at the discharge end to keep the screw in tension. Dual roller bearings are housed in precision-machined gray iron housings. The shaft is retained to the bearing inner race by means of exterior spring steel snap-rings. The bearing housing includes lip-type seals for protection of bearings. The Type M thrust bearing is available with either a plate seal, to prevent material loss, or a packing seal housing.

TYPE H

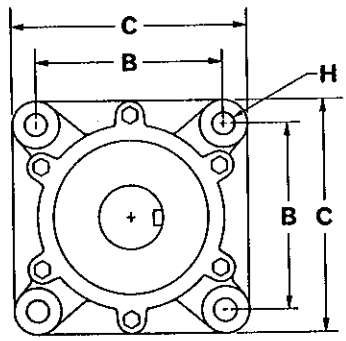


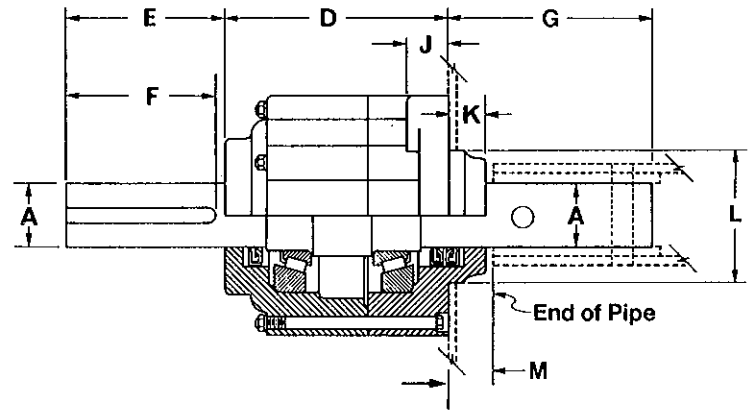
TYPE M



Thrust Bearings

Type H

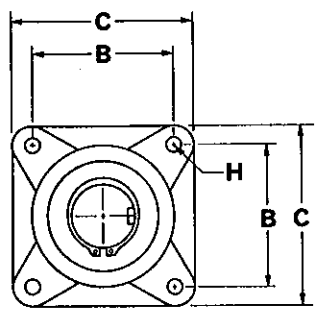


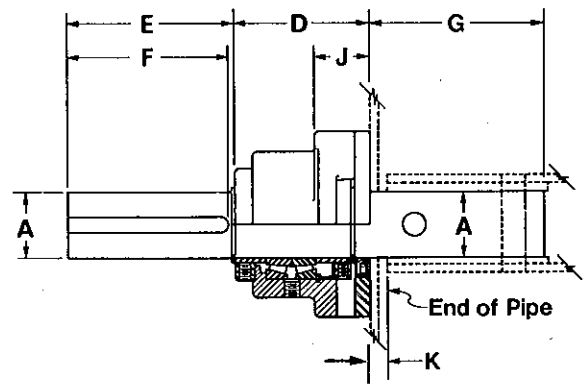


A Shaft Dia.	Part No. With Drive Shaft	Catalog No. With Drive Shaft *	Part No. With End Shaft	Catalog No. With End Shaft *	B	C	D	E	F	G	H BOLTS	J	K	L	M	Weight With Drive Shaft	Weight With End Shaft
1-1/2	SBH3-D	802921	SBH3-E	802935	4-1/2	6	4-3/4	4	3-3/4	5-15/16	1/2	7/8	3/4	3-1/4	1-1/4	33	31
2	SBH4-D	802923	SBH4-E	802936	5-3/4	7-1/4	6-3/4	4-1/2	4-1/4	6	3/4	1	1-1/8	4-3/4	1-1/4	64	60
2-7/16	SHB5-D	802924	SBH5-E	802937	6-1/4	8	6-1/4	5-1/2	5-1/4	6-5/8	7/8	1-1/8	1-1/4	5-1/2	1-3/4	85	75
3	SBH6-D	802926	SBH6-E	802938	8	10	8-1/4	6	5-3/4	6-13/16	1	1-1/4	1-3/8	6	1-13/16	155	145
3-7/16	SBH7-D	802927	SBH7-E	802939	8	10	8-1/4	7	6-3/4	9-1/8	1	1-1/4	1-3/8	6	2-3/8	180	160

* 2 Bolt Shaft, Bolts Not Included

Type M





A Shaft Dia.	Part No. W/Drive Shaft	Catalog No.* Plate Seal	Catalog No.* SSH Seal	Part No. W/End Shaft	Catalog No.* Plate Seal	Catalog No.* SSH Seal	B	C	D	E	F	G	H Bolts	J	K	Weight W/Drive Shaft	Weight W/End Shaft
1-1/2	SBM3-D	802950	802957	SBM3-E	802965	802972	4-1/8	5-3/8	4	3-1/4	3	5-15/16	1/2	1-3/4	1-3/16	19	16
2	SBM4-D	802951	802958	SBM4-E	802966	802973	4-3/8	5-5/8	4-1/8	4-1/4	4	6	1/2	1-3/4	1-1/4	28	24
2-7/16	SBM5-D	802952	802959	SBM5-E	802967	802974	5-3/8	6-7/8	4-11/16	5-1/4	5	6-1/8	5/8	2	1-3/4	46	40
3	SBM6-D	802953	802960	SBM6-E	802968	802975	6	7-3/4	5-3/16	6-1/4	6	6-13/16	3/4	2-1/8	1-13/16	69	58
3-7/16	SBM7-D	802954	802961	SBM7-E	802969	802976	7	9-1/4	5-7/8	7-1/4	7	9-1/8	3/4	2-1/2	2-3/8	109	93

NOTE: Dimensions D and J based on plate seal.
*Type "M" Thrust Bearings available with plate seal or seal housing.
When ordering replacement shafts specify type of seal.

Seals

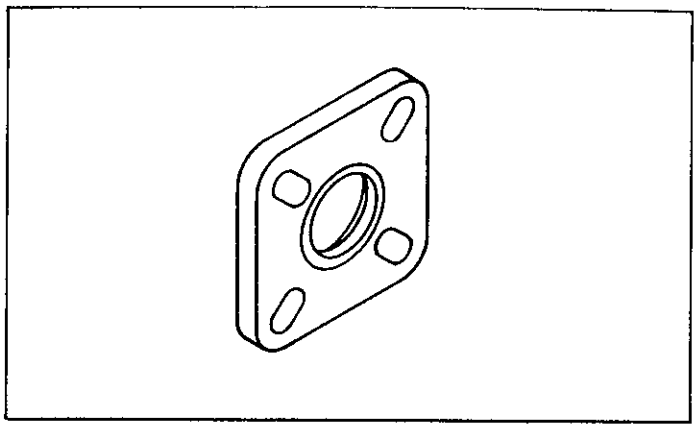
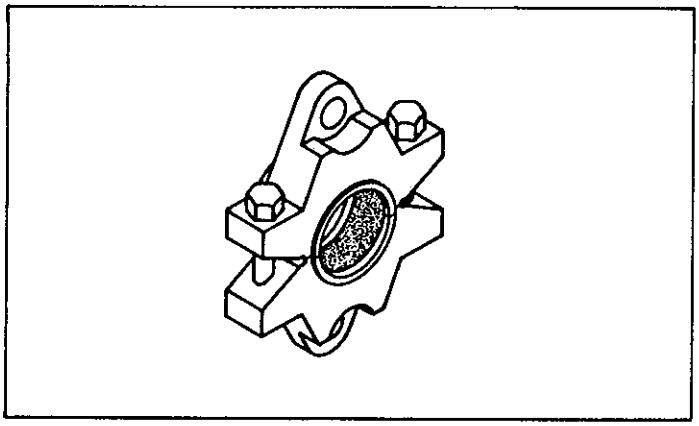


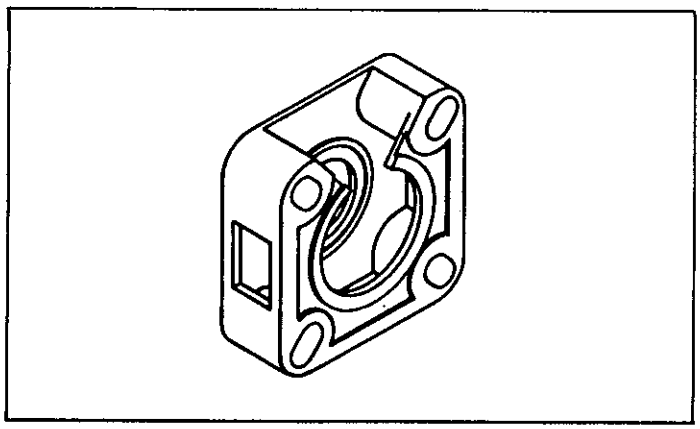
Plate Seal

The plate seal is an economical, effective sealing device designed for exterior mounting between the end bearing and the trough end. Standard units include lip-type seals, but other types of commercial seal cartridges may also be used. The plate seal and the end bearing are attached by means of common bolts. The plate may also be attached independently when outboard bearing ends are used.



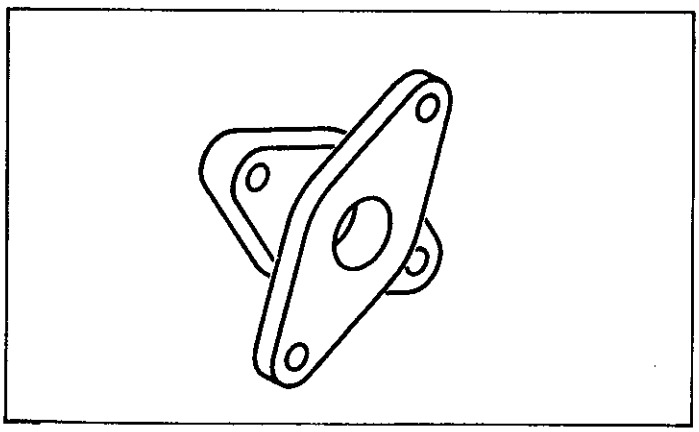
Split Gland Seal

This unit is designed for interior or exterior mounting. It provides an effective seal by compression of the packing, which is contained in a split housing to facilitate assembly and replacement of the packing material. Packing pressure can be adjusted by means of two exposed nuts, which are accessible from outside the unit, if used in conjunction with outboard bearing ends.
NOTE: SPECIAL END PLATE DRILLING IS REQUIRED TO ACCOMMODATE THIS SEAL.



Packing Seal Housing

This universal type seal is designed for use with waste packing or cartridge-type lip or felt seals. An opening at the top of the housing facilitates waste repacking. The packing material is partially exposed for oiling. The packing seal housing is mounted outside between the end bearing and the trough end. It may also be mounted independently for use with the outboard bearing end.

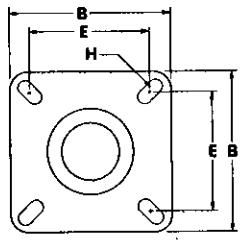


Packing Gland Seal

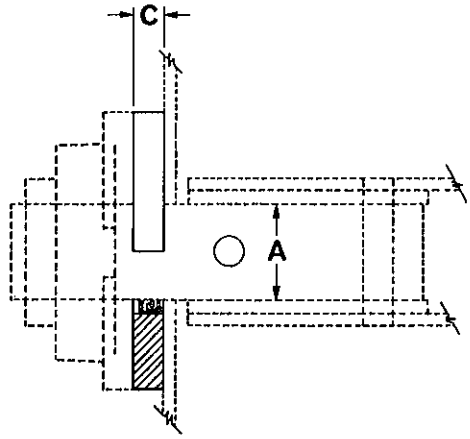
Of all the standard seals shown, this seal provides maximum retention of material inside the screw conveyor. The gland body, which contains two rings of packing, is mounted on the end plate. The collar of the gland is then inserted into the machined pocket of the gland body. As the bolts are tightened, the packing is compressed against the shaft. As the packing wears, bolts can be adjusted to insure continuous sealing of the end or drive shaft. Normally used only in conjunction with outboard bearing type trough ends.

Seals

Plate Seal



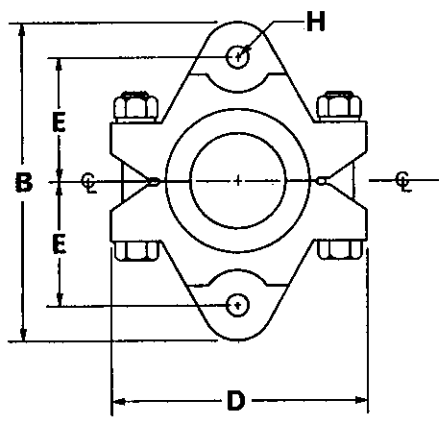
Lip seals are Neoprene.

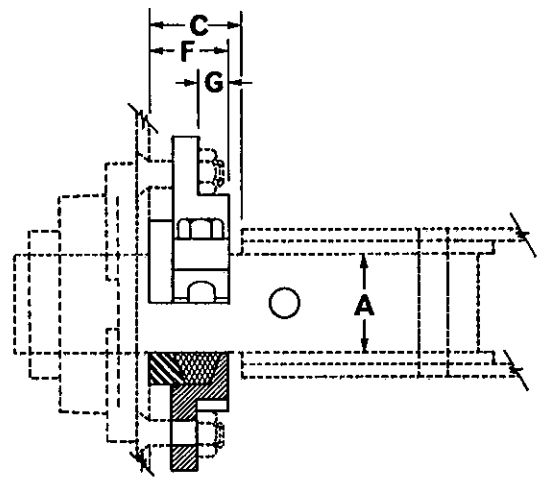


A Shaft Dia.	Part Number	Catalog Number	B	C	E		H Bolts		Weight
					Ball	Roller	Ball	Roller	
1½	SSP3	803100	5⅜	½	4	4⅛	½	½	2
2	SSP4-B	803101	6½	½	5⅛	—	⅝	—	3
	SSP4-R	803116	6½	½	—	4⅜	—	½	3
2 7/16	SSP5	803102	7	½	5⅝	5⅜	⅝	⅝	4
3	SSP6	803103	7¾	½	6	6	¾	¾	5
3 7/16	SSP7	803104	9¼	⅝	6¾	7	¾	¾	8

B = Ball Bearing
R = Roller Bearing

Split Gland Seal



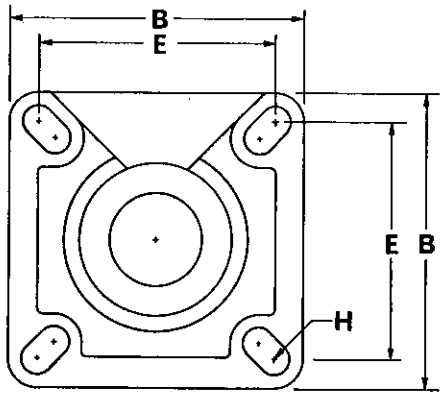


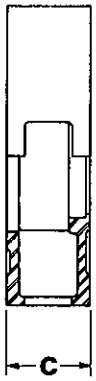
A Shaft Dia.	Part Number	Catalog Number	B	C	D	E	F	G	H Bolts	Weight
1-1/2	SSS3	803130	5-5/8	2	4-1/2	2-3/16	1-7/16	1/2	1/2	5
2	SSS4	803131	6-1/2	2	5-3/8	2-5/8	1-1/2	5/8	1/2	10
2-7/16	SSS5	803132	7-5/8	2	6-1/8	3-1/16	1-5/8	5/8	5/8	15
3	SSS6	803133	8-5/8	2	6-3/4	3-9/16	1-5/8	5/8	5/8	22
3-7/16	SSS7	803134	10-1/4	3	8-3/4	4-1/8	2-1/8	7/8	3/4	30

Note: Split at center line before assembling to end plate.

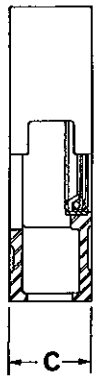
Seals

Packing Seal Housing

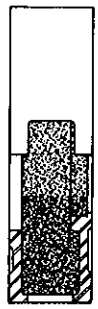




Housing only



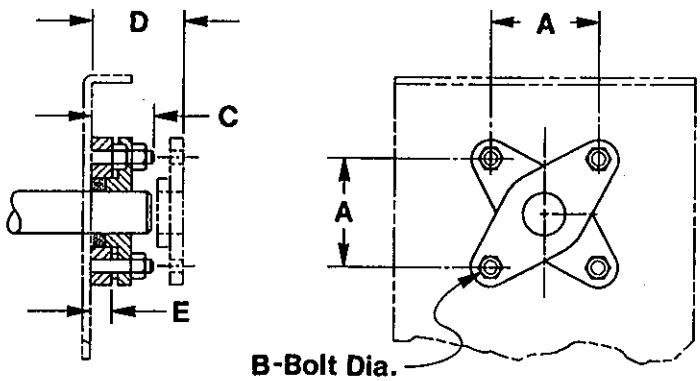
With Lip Seal



With Waste Packing

A Shaft Dia.	Part Number	Catalog Number			B	C	E		H	Weight
		Housing	Lip Seal	Packing			Minimum	Maximum	Bolts	
1-1/2	SSH3	803145	803152	803167	5-3/8	1-3/4	4	4-1/8	1/2	6
2	SSH4	803146	803153	803168	6-1/2	1-3/4	4-3/8	5-1/8	5/8	8
2-7/16	SSH5	803147	803154	803169	7	1-3/4	5-3/8	5-5/8	5/8	9
3	SSH6	803148	803155	803170	7-3/4	1-3/4	6	6	3/4	13
3-7/16	SSH7	803149	803156	803171	9-1/4	2-1/4	6-3/4	7	3/4	17

Packing Gland Seal



Shaft Dia.	Catalog Number	Weight in Lbs.	Steel Packing Gland Seal				
			A	B	C	D▲	E
1-1/2	803181	5	4	1/2	2-1/4	3-15/16	1-1/8
2	803182	7	5-1/8	5/8	2-1/2	3-15/16	1-1/8
2-7/16	803183	9	5-5/8	5/8	2-3/4	3-15/16	1-1/8
3	803184	11	6	3/4	2-15/16	3-15/16	1-1/8
3-7/16	803185	13	6-3/4	3/4	2-15/16	3-15/16	1-1/8

SSG-W or SSG- B Pack Gland Seals are available upon request.

▲Space required to remove packing gland from body.

Screws

Helicoid

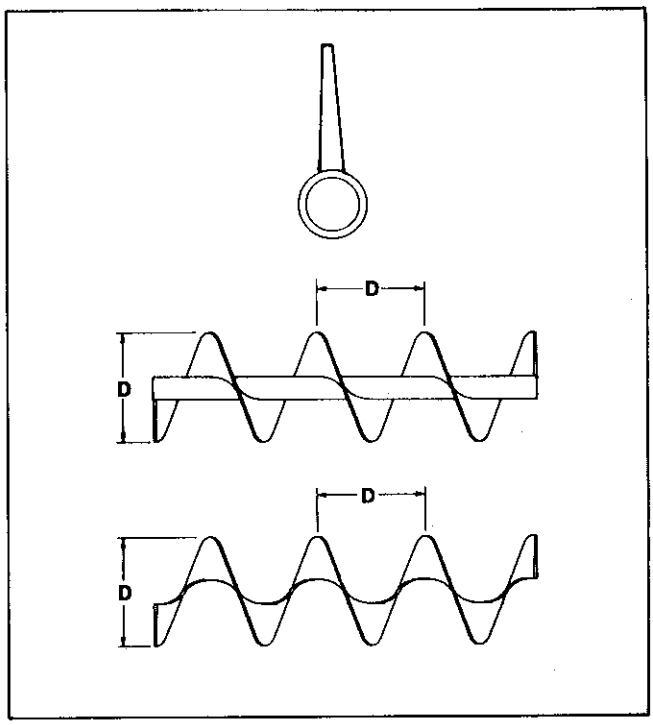
Goodman Conveyor helicoid screws are cold-rolled from strip steels on precision rolling mills. The rolling operation compresses the outer flight edge, on periphery, to approximately 50% of the inside root and produces a smooth, **work-hardened surface with increased wear resistance.**

To produce the completed screw section, the continuous, one-piece helix is mounted on the conveyor pipe with heavy-duty end lugs and regularly spaced intermediate welds. For severe applications, the flighting may be continuously welded to the pipe on one or both sides.

Pipe ends are bushed with close-tolerance internal collars which are pressure-inserted and plug-welded for maximum efficiency and service life. The collars are accurately reamed for the proper coupling shaft diameter. Coupling bolt holes are jig-drilled for perfect alignment.

Helicoid screws are not normally available in any material type or size other than standard. Sizes range from 6″ through 18″ diameter.

Standard helicoid screws are interchangeable with standard sectional flight screws (see Comparison Table, Page 71).



Sectional

Goodman Conveyor sectional flight screws consist of individual flight segments which are cold-formed from separate flat-plate blanks and then butt-welded to form the helix.

Sectional flights, unlike helicoid flighting, have uniform thickness at the outer edge and inside root. Sectional screws are available in a wider range of sizes, materials, weights and thicknesses.

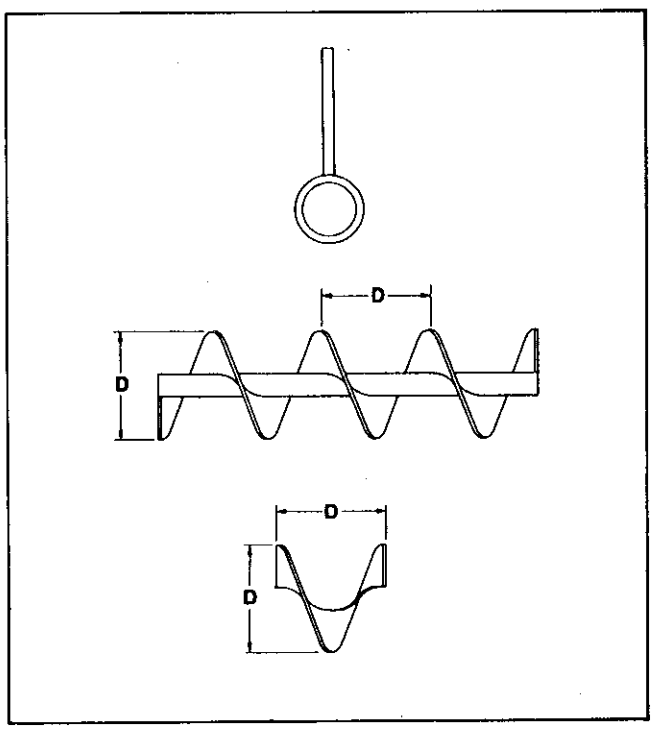
The flights are anchored securely to the pipe by carefully spaced welds. For severe conveying applications, the flights may be continuously welded to the screw pipe on one or both sides for the full length of the screw.

All Goodman Conveyor sectional screws are available in stainless steel. They may also be furnished in abrasion-resistant steel or may be hard-surfaced for longer service life.

As with helicoid, pipe ends are bushed with standard internal collars. The collars are pressure-fitted and plug-welded and reamed for the appropriate coupling diameter.

Coupling bolt holes are also jig-drilled for perfect alignment of power-transmitting components.

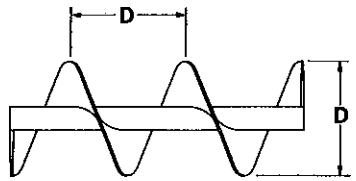
Sectional flight screws are fully interchangeable with standard helicoid screws (see Comparison Table, Page 71). For description of basic flight types, including the most common flight modifications and pitch deviations, refer to Page 70.



Screws

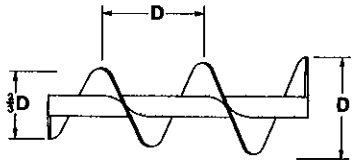
Basic Conveyor Flight and Pitch Types

Standard Pitch, Single Flight



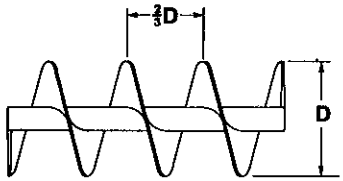
Screws with pitch equal to screw diameter are considered standard. They are suitable for a wide range of materials in most conventional applications.

Tapered, Standard Pitch, Single Flight



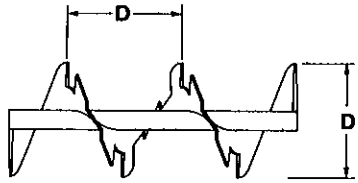
Screw flights increase from ⅔ to full diameter. Used only in screw feeders to provide uniform withdrawal of lumpy materials. Generally equivalent to variable pitch and more economical.

Short Pitch, Single Flight



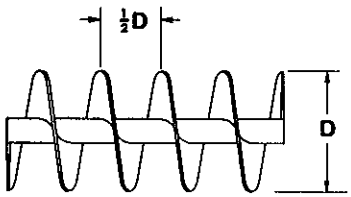
Flight pitch is reduced to ⅔ diameter. Recommended for inclined applications. Used in screw feeders. Shorter pitch retards flushing of materials which fluidize.

Single Cut-Flight, Standard Pitch



Screws are notched at regular intervals at outer edge. Affords mixing action and agitation of material in transit. Useful for moving materials which tend to pack. Not used in feeder applications.

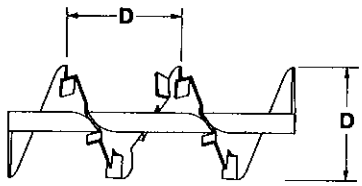
Half Pitch, Single Flight



Similar to short pitch, except pitch is reduced to ½ standard pitch. Useful for inclined applications, screw feeders, or for handling extremely fluid materials.

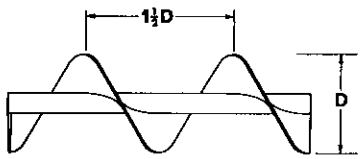
Do not confuse with Double Flight, Standard Pitch.

Cut-and-Folded Flight, Standard Pitch



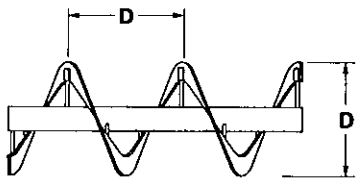
Folded flight segments lift and spill the material. Partially retarded flow provides thorough mixing action. Excellent for heating, cooling or aerating light substances. Not used in feeder applications.

Long Pitch, Single Flight



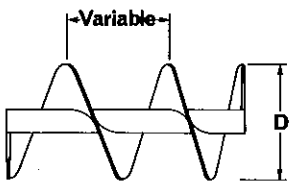
Pitch is equal to 1½ diameters. Useful for agitating fluid materials or for rapid movement of very free-flowing materials. Not used in feeder applications.

Single Flight Ribbon



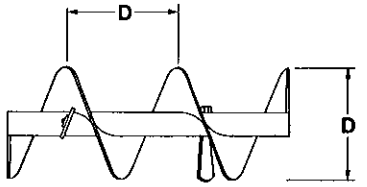
Excellent for conveying sticky or viscous materials. Open space between flighting and pipe eliminates collection and build-up of the material. Not used in feeder applications.

Variable Pitch, Single Flight



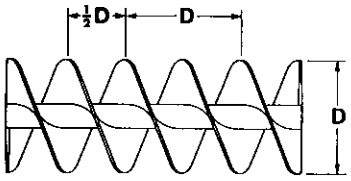
Flights have increasing pitch and are used only in screw feeders to provide uniform withdrawal of fine, free-flowing materials over the full length of the inlet opening.

Standard Pitch With Paddles



Adjustable paddles positioned between screw flights oppose flow to provide gentle but thorough mixing action. Not used in feeder applications.

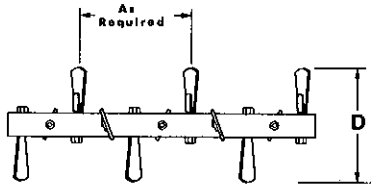
Double Flight, Standard Pitch



Double flight, standard pitch screws provide smooth, regular material flow and uniform movement of certain types of materials.

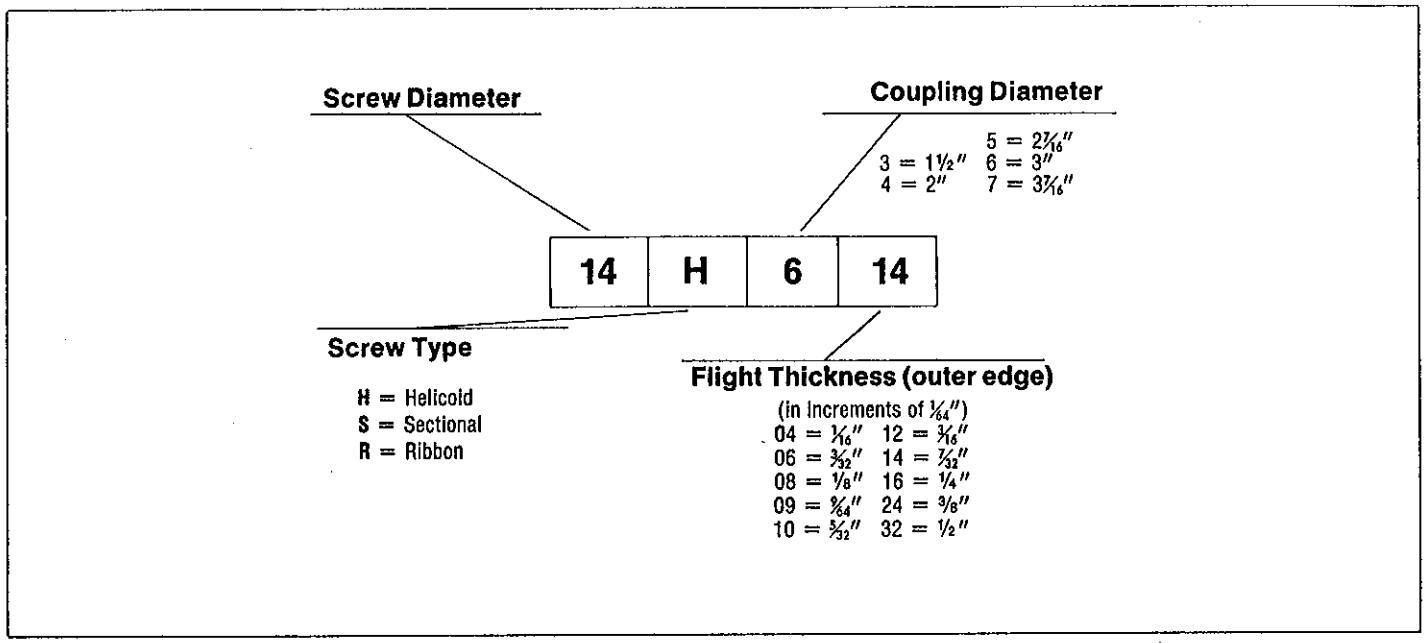
Do not confuse with Half Pitch, Single Flight.

Paddle



Adjustable paddles provide complete mixing action, and controlled material flow. Not used in feeder applications. No information available on capacity capabilities.

Descriptive Part Numbers for Standard Screws



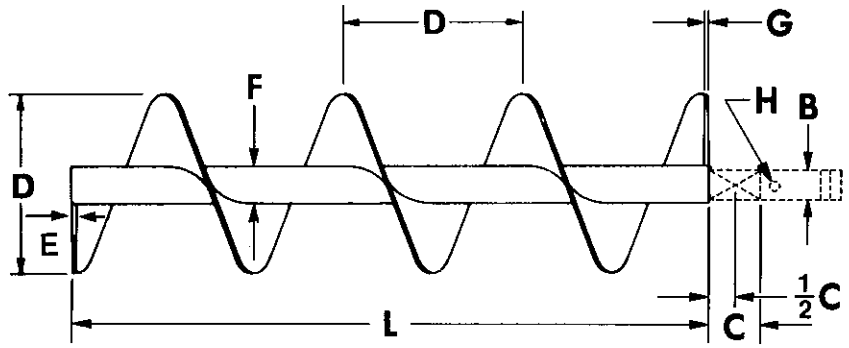
Comparison Table—Helicoid and Sectional Screws

Screw Dia.	Coupling Size	Pipe Size		HELICOID			SECTIONAL	
					Flight Thickness			
		Nominal	O.D.	Size Designation	Root	Tip	Size Designation	Flight Thickness
6	1 1/2	2	2 3/8	6H304 6H308 6H312	1/8 1/4 3/8	1/16 1/8 3/16	6S309 6S312	10 ga. 3/16
9	1 1/2	2	2 3/8	9H306 9H312	3/16 3/8	3/32 3/16	9S312 9S316	3/16 1/4
	2	2 1/2	2 7/8	9H406 9H412 9H414	3/16 3/8 7/16	3/32 3/16 7/32	9S412 9S412 9S416	3/16 3/16 1/4
12	2	2 1/2	2 7/8	12H408 12H412	1/4 3/8	1/8 3/16	12S412 12S412	3/16 3/16
	2 7/16	3	3 1/2	12H508 12H512	1/4 3/8	1/8 3/16	12S512 12S512	3/16 3/16
	3	3 1/2	4	12H614	7/16	7/32	12S616	1/4
14	2 7/16	3	3 1/2	14H508	1/4	1/8	14S512	3/16
	3	3 1/2	4	14H614	7/16	7/32	14S616	1/4
16	3	3 1/2 4	4 4 1/2	16H610 16H614	5/16 7/16	5/32 7/32	16S612 ▲ 16S616	3/16 1/4
18	3	3 1/2	4	18H610	5/16	5/32	18S612	3/16

Dimensions in inches.
▲ 3 1/2" nominal pipe size.

Conveyor Screws

HELICOID



Right Hand Shown

Dimensions

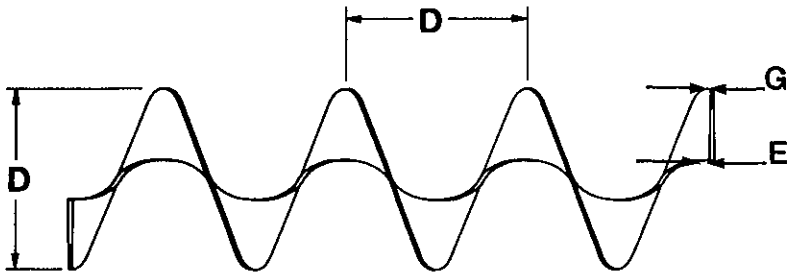
D Screw Dia. & Pitch	B Cplg. Dia.	Conv. Size Desig-nation	Mounted Conveyor — Standard Sections				Flight Thickness		Pipe Size		C Bearing Length	H Coupling Bolts
			Catalog Numbers		L Std. Length	Avg. Wt. Each	E Root	G Tip	■ Inside	F Outside		
			Right Hand	Left Hand								
6	1-1/2	6H304 6H308 6H312	800004 800006 800008	800005 800007 800009	9'-10"	52 62 72	1/8 1/4 3/8	1/16 1/8 3/16	2	2-3/8	2	1/2x3
9	1-1/2	9H306 9H312	800010 800012	800011 800013	9'-10"	70 101	3/16 3/8	3/32 3/16	2	2-3/8	2	1/2x3
	2	9H406 9H412 9H414	800014 800016 800018	800015 800017 800019	9'-10"	91 121 131	3/16 3/8 7/16	3/32 3/16 7/32	2-1/2	2-7/8	2	5/8x3-5/8
12	2	12H408 12H412	800024 800026	800025 800027	11'-10"	140 180	1/4 3/8	1/8 3/16	2-1/2	2-7/8	2	5/8x3-5/8
	2-7/16	12H508 12H512	800028 800030	800029 800031	11'- 9"	168 198	1/4 3/8	1/8 3/16	3	3-1/2	3	5/8x4-3/8
	3	12H614	800032	800033	11'- 9"	220	7/16	7/32	3-1/2	4	3	3/4x5
14	2-7/16	14H508	800034	800035	11'- 9"	170	1/4	1/8	3	3-1/2	3	5/8x4-3/8
	3	14H614	800036	800037	11'- 9"	254	7/16	7/32	3-1/2	4	3	3/4x5
16	3◆	16H610 16H614	800038 800040	800039 800041	11'- 9"	228 285	5/16 7/16	5/32 7/32	3-1/2 4	4 4-1/2	3	3/4x5 3/4x5-1/2
18	3	18H610	800042	800043	11'- 9"	240	5/16	5/32	3-1/2	4	3	3/4x5

■ Schedule 40 Pipe
◆ Can be furnished with 3-7/16" dia. coupling
R/H Flighting will be furnished unless otherwise specified.

Conveyor Screws

REPLACEMENT FLIGHTING

HELICOID CONVEYOR FLIGHTING



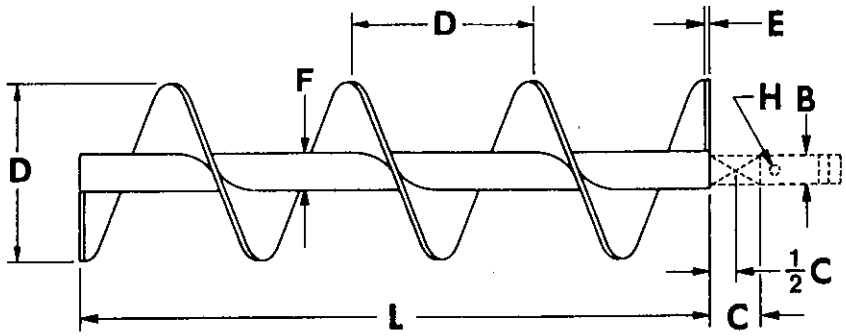
Right Hand Shown

Dimensions

Screw Dia. & Pitch "D"	Cplg. Dia.	Part Number	Standard Selection				Pipe O.D. ■	Flight Thickness	
			Catalog Number		Length	Wt. Each.		E Root	G Tip
			R/H	L/H					
6	1-1/2	6H304 6H308 6H312	800104 800106 800108	800105 800107 800109	9'-10"	14 27 34	2-3/8	1/8 1/4 3/8	1/16 1/8 3/16
9	1-1/2	9H306 9H312	800110 800112	800111 800113	9'-10"	33 60	2-3/8	3/16 3/8	3/32 3/16
	2	9H406 9H412 9H414	800114 800116 800118	800115 800117 800119	9'-10"	33 68 71	2-7/8	3/16 3/8 7/16	3/32 3/16 7/32
12	2	12H408 12H412	800124 800126	800125 800127	11'-10"	75 108	2-7/8	1/4 3/8	1/8 3/16
	2-7/16	12H508 12H512	800128 800130	800129 800131	11'-9"	78 110	3-1/2	1/4 3/8	1/8 3/16
	3	12H614	800132	800133	11'-9"	113	4	7/16	7/32
14	2-7/16	14H508	800134	800135	11'-9'	80	3-1/2	1/4	1/8
	3	14H614	800136	800137	11'-9"	140	4	7/16	7/32
16	3	16H610 16H614	800138 800140	800139 800141	11'-9"	120 160	4 4-1/2	5/16 7/16	5/32 7/32
18	3	18H610	800142	800143	11'-9"	149	4	5/16	5/32

Conveyor Screws

SECTIONAL



Right Hand Shown

Dimensions

D Screw Dia. & Pitch	B Cplg. Dia.	Conveyor Size Designation	Mounted Conveyor — Standard Sections				E Flight Thickness	Pipe Size		C Bearing Length	H Coupling Bolts
			Catalog Numbers		L Std. Length	Avg. Wt. Each		■ Inside	F Outside		
			Right Hand	Left Hand							
6	1-1/2	6S309	800500	800501	9'-10"	63	10 Ga.	2	2-3/8	2	1/2x3
		6S312	800502	800503		70	3/16				
		6S316	800504	800505		80	1/4				
9	1-1/2	9S312	800508	800509	9'-10"	89	3/16	2	2-3/8	2	1/2x3
		9S316	800510	800511		106	1/4				
	2	9S412	800514	800515	9'-10"	109	3/16	2-1/2	2-7/8	2	5/8x3-5/8
		9S416	800516	800517		124	1/4				
		9S424	800518	800519		155	3/8				
12	2	12S412	800532	800533	11'-10"	153	3/16	2-1/2	2-7/8	2	5/8x3-5/8
		12S416	800534	800535		178	1/4				
	2-7/16	12S512	800538	800539	11'-9"	173	3/16	3	3-1/2	2	5/8x4-3/8
		12S516	800540	800541		197	1/4				
		12S524	800542	800543		249	3/8				
	3	12S612	800544	800545	11'-9"	189	3/16	3-1/2	4	3	3/4x5
		12S616	800546	800547		212	1/4				
		12S624	800548	800549		260	3/8				

■ Schedule 40 Pipe
All Sectional Conveyor Screw made to order.
All Sectional Conveyor Screw available in stainless steel.
Sectional Flight Conveyor regularly furnished butt welded.
R.H. Flighting will be furnished unless otherwise specified.

Conveyor Screws

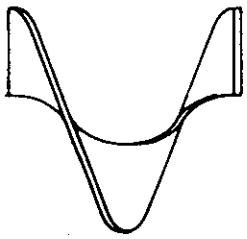
SECTIONAL

Continued from previous page

D Screw Dia. & Pitch	B Cplg. Dia.	Conveyor Size Designation	Mounted Conveyor — Standard Sections				E Flight Thickness	Pipe Size		C Bearing Length	H Coupling Bolts
			Catalog Numbers		L Std. Length	Avg. Wt. Each		■ Inside	F Outside		
			Right Hand	Left Hand							
14	2-7/16	14S512	800552	800553	11'-9"	191	3/16	3	3-1/2	3	5/8x4-3/8
		14S516	800554	800555		222	1/4				
	3	14S612	800556	800557	11'-9"	207	3/16	3-1/2	4	3	3/4x5
		14S616	800558	800559		236	1/4				
		14S624	800560	800561		295	3/8				
16	3	16S612	800564	800565	11'-9"	220	3/16	3-1/2	4	3	3/4x5
		16S616	800566	800567		254	1/4				
		16S624	800568	800569		321	3/8				
		16S632	800570	800571		402	1/2				
18	3	18S612	800572	800573	11'-9"	239	3/16	3-1/2	4	3	3/4x5
		18S616	800574	800575		279	1/4				
		18S624	800576	800577		359	3/8				
		18S632	800578	800579		450	1/2				
	3-7/16	18S724	800630	800631	11'-8"	376	3/8	4	4-1/2	4	7/8x5-1/2
		18S732	800632	800633		456	1/2				
20	3	20S612	800580	800581	11'-9"	258	3/16	3-1/2	4	3	3/4x5
		20S616	800582	800583		306	1/4				
		20S624	800584	800585		401	3/8				
		20S632	800586	800587		496	1/2				
	3-7/16	20S712	800588	800589	11'-8"	274	3/16	4	4-1/2	4	7/8x5-1/2
		20S716	800590	800591		320	1/4				
		20S724	800592	800593		412	3/8				
		20S732	800594	800595		503	1/2				
24	3-7/16	24S712	800596	800597	11'-8"	309	3/16	4	4-1/2	4	7/8x5-1/2
		24S716	800598	800599		367	1/4				
		24S724	800600	800601		482	3/8				
		24S732	800602	800603		597	1/2				

■ Schedule 40 Pipe
All Sectional Conveyor Screw made to order.
All Sectional Conveyor Screw available in stainless steel.
Sectional Flight Conveyor regularly furnished butt welded.
R.H. Flighting will be furnished unless otherwise specified.

Conveyor Screws



REPLACEMENT FLIGHTING

SECTIONAL CONVEYOR FLIGHTS

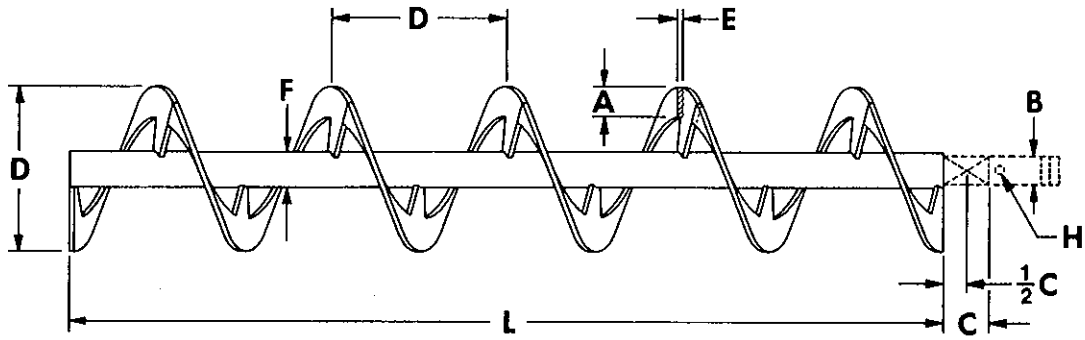
RIGHT HAND SHOWN

Screw Dia. & Pitch	Cplg. Dia.	Part Number	Catalog Numbers R/H	Catalog Numbers L/H	Flight Thick.	Weight Per Flight	Flt'g. ■I.D.
6	1-1/2	6S309	800650	800651	10 GA.	1.2	2-3/8
		6S312	800652	800653	3/16	1.6	
		6S316	800654	800655	1/4	2.1	
9	1-1/2	9S312	800658	800659	3/16	4.0	2-3/8
		9S316	800660	800661	1/4	5.4	
	2	9S412	800664	800665	3/16	3.9	2-7/8
		9S416	800666	800667	1/4	5.1	
		9S424	800668	800669	3/8	7.7	
12	2	12S412	800682	800683	3/16	7.3	2-7/8
		12S416	800684	800685	1/4	9.7	
	2-7/16	12S512	800688	800689	3/16	6.9	3-1/2
		12S516	800690	800691	1/4	9.2	
		12S524	800692	800693	3/8	13.8	
	3	12S612	800694	800695	3/16	6.7	4
		12S616	800696	800697	1/4	8.9	
		12S624	800698	800699	3/8	13.4	
14	2-7/16	14S512	800702	800703	3/16	14.4	3-1/2
		14S516	800704	800705	1/4	19.2	
	3	14S612	800706	800707	3/16	9.6	4
		14S616	800708	800709	1/4	12.8	
		14S624	800710	800711	3/8	19.2	
16	3	16S612	800714	800715	3/16	12.8	4
		16S616	800716	800717	1/4	17.1	
		16S624	800718	800719	3/8	25.5	
		16S632	800720	800721	1/2	34.0	
18	3	18S612	800722	800723	3/16	16.8	4
		18S616	800724	800725	1/4	22.4	
		18S624	800726	800727	3/8	33.6	
		18S632	800728	800729	1/2	44.8	
	3-7/16	18S724	800890	800891	3/8	32.5	4-1/2
		18S732	800892	800893	1/2	43.4	
20	3	20S612	800730	800731	3/16	21.1	4
		20S616	800732	800733	1/4	28.1	
		20S624	800734	800735	3/8	42.2	
		20S632	800736	800737	1/2	56.3	
	3-7/16	20S712	800738	800739	3/16	20.3	4-1/2
		20S716	800740	800741	1/4	27.0	
		20S724	800742	800743	3/8	40.6	
		20S732	800744	800745	1/2	54.1	
24	3-7/16	24S712	800746	800747	3/16	31.0	4-1/2
		24S716	800748	800749	1/4	41.3	
		24S724	800750	800751	3/8	62.1	
		24S732	800752	800753	1/2	82.7	

Notes: All Sectional Flighting Available in Stainless Steel. All flights tested for snap fit.

Conveyor Screws

SECTIONAL RIBBON



Right Hand Shown

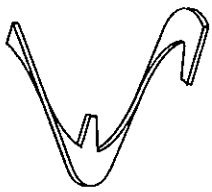
Dimensions

D Screw Dia. & Pitch	B Cplg. Dia.	Part Number	Mounted Conv. - Std. Sections				Flight		Pipe Size		C Bearing Width	H Coupling Bolts
			Catalog Numbers		L Std. Length	Avg. Wt. Each	A Width	E Thick.	Inside ■	F Outside		
			Right H.	Left H.								
6	1-1/2	6SR312	800826	800827	9'-10"	65	1	3/16	2	2-3/8	2	1/2 x 3
9	1-1/2	9SR316	800828	800829	9'-10"	100	1-1/2	1/4	2	2-3/8	2	1/2 x 3
12	2	12SR416	800830	800831	11'-10"	180	2	1/4	2-1/2	2-7/8	2	5/8 x 3-5/8
		12SR424	800832	800833		216	2-1/2	3/8				
	2-7/16	12SR524	800834	800835	11'- 9"	240	2-1/2	3/8	3	3-1/2	3	5/8 x 4-3/8
14	2-7/16	14SR524	800836	800837	11'- 9"	264	2-1/2	3/8	3	3-1/2	3	5/8 x 4-3/8
	3	14SR624	800838	800839	11'- 9"	288	2-1/2	3/8	3-1/2	4	3	3/4 x 5
16	3	16SR616	800840	800841	11'- 9"	276	2-1/2	1/4	3-1/2	4	3	3/4 x 5
		16SR624	800842	800843	11'- 9"	324	2-1/2	3/8				
18	3	18SR624	800844	800845	11'- 9"	384	3	3/8	4	4-1/2	3	3/4 x 5
20	3-7/16	20SR724	800846	800847	11'- 8"	408	3	3/8	4	4-1/2	4	7/8 x 5-1/2
24	3-7/16	24SR724	800848	800849	11'- 8"	424	3	3/8	4	4-1/2	4	7/8 x 5-1/2

■ Schedule 40 Pipe

Conveyor Screws

REPLACEMENT FLIGHTING



Right Hand Shown

SECTIONAL RIBBON

D Screw Dia. & Pitch	Part Number	Catalog Numbers		Flight		Length	Avg. Wt.
		Right Hand	Left Hand	Thick.	Width		
6	6SR312	800775	800776	3/16	1	6	1.51
9	9SR316	800777	800778	1/4	1-1/2	9	4.89
12	12SR416	800779	800780	1/4	2	12	9.42
	12SR424	800781	800782	3/8	2-1/2	12	12.5
	12SR524	800783	800784	3/8	2-1/2	12	12.9
14	14SR524	800785	800786	3/8	2-1/2	14	17.4
	14SR624	800787	800788	3/8	2-1/2	14	18.0
16	16SR616	800789	800790	1/4	2-1/2	16	19.1
	16SR624	800791	800792	3/8	2-1/2	16	24.6
18	18SR624	800793	800794	3/8	3	18	32.8
20	20SR724	800795	800796	3/8	3	20	40.3
24	24SR724	800797	800798	3/8	3	24	51.1

*** Weight - On Sectional Ribbon LBS/FLGT.**

Screws

Abrasion-Resistant

In conveying applications where abrasion is a problem, Goodman Conveyor's hard-surfaced, abrasion-resistant screws afford an effective practical and economical solution. Goodman Conveyor's hard-surfaced screws have been utilized successfully in numerous applications and can often increase normal service life over mild steel screws as much as 500%. In certain applications, an even greater degree of wear life may be obtained. To produce hard-surfaced screws, Goodman Conveyor uses two different alloys which are applied to the carrying face of the fighting.

No. 1 Hard Face

No. 1 is generally used on medium weight helicoid screws and is intended for medium duty abrasive requirements. The material is a sweat-on paste composed of chromium boride crystals. Abrasion, corrosion and impact resistances are good, and there is no noticeable build-up of the hard face area. No. 1 also produces excellent weldability characteristics and could be applied to the entire screw including the pipe.

No. 2 Hard Face

No. 2 is used on sectional screws only and is intended for highly abrasive requirements. It is used only on the sides or edges of the screw flight and should not be used to coat the entire screw. Abrasion, corrosion and impact resistances are good, and excellent weldability characteristics are obtained.

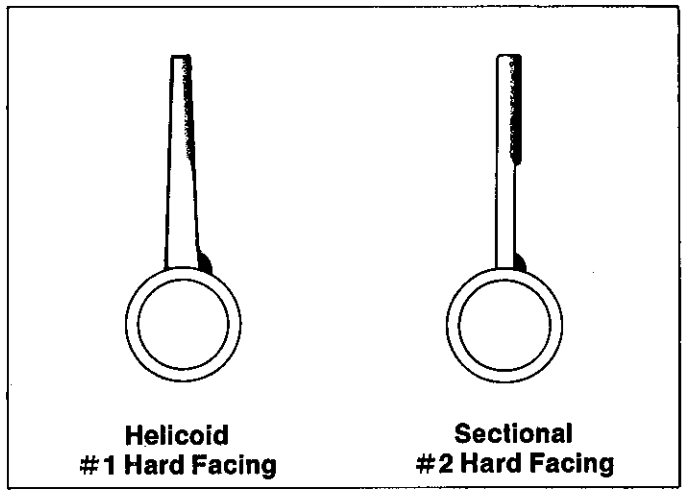
Note:

1. **All** screws requiring hard surfacing must be continuously welded on the carrying side (minimum).

2. Minimum flight tip thickness for No. 1 hard face is 3/16".

3. Minimum flight thickness for No. 2 hard face is 1/4".

4. If No. 2 hard face is required on the edge of the screw flight, minimum flight thickness is 3/8".



Helicoid #1 Hard Facing | **Sectional #2 Hard Facing**

Helicoid screws may use No. 1 hard face only; sectional screws can use No. 1 and No. 2 hard face. While sectional screws may be formed of abrasion-resistant steels on special order, hard-surfacing enables most standard or stock screws to be utilized for severely abrasive conditions. Hard-surfaced standard screws can provide equal service at less cost and with wider choice of screw sizes and types.

Maximum performance and service life from hard-surfaced screws may be obtained only from precise application procedures. Goodman Conveyor's abrasion-resistant screws are manufactured by personnel with extensive experience and skill iln the company's hard-surfacing technique.

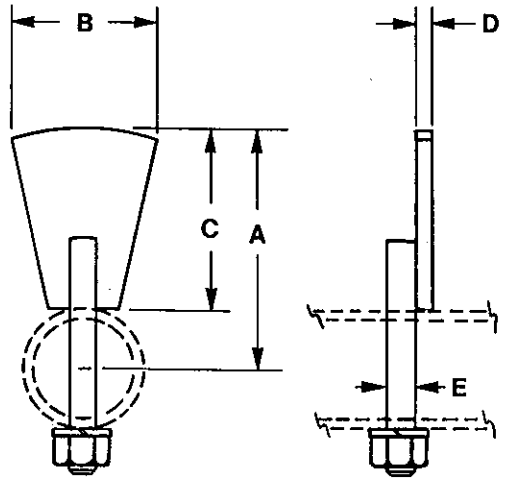
Width of Application Chart

Screw Diameter	Standard Width of Application
6	1
9	1½
12	2
14	2
16	2½
18	2½
20	3
24	3

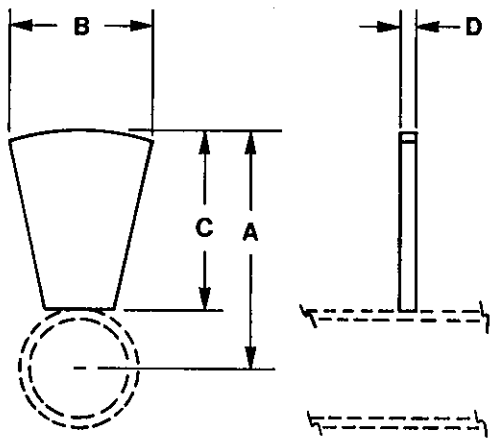
Dimensions in inches.

Conveyor Screws

PADDLES



Adjustable



Welded

Dimensions

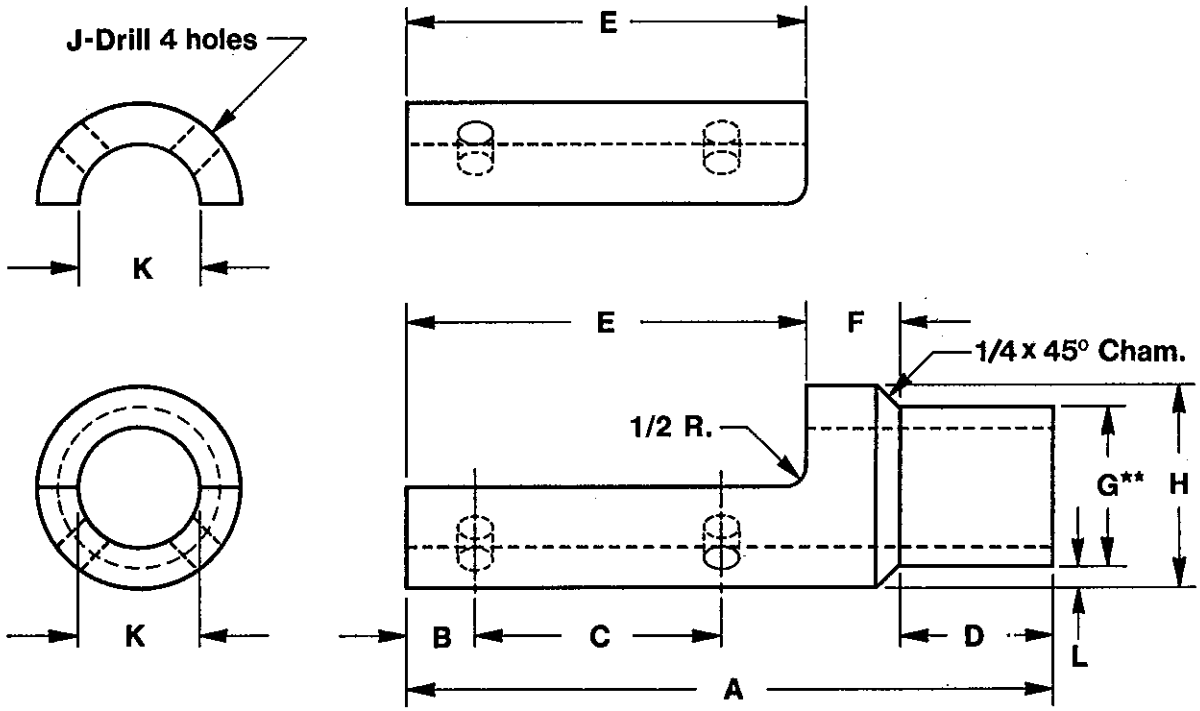
Screw Dia.	Part Number	Catalog Numbers		Pipe Size		A	B	C	D	E	Weight Each	
		Adjust-able	Welded	■ Inside	Outside						Adjust-able	Welded
6	6SP1	800901	800917	2	2-3/8	3	2-1/16	1-13/16	1/4	1/2	.50	.35
9	9SP1	800902 800903	800918 800919	2 2-1/2	2-3/8 2-7/8	4-1/2	2-3/4	3-5/16 3-1/16	1/4	5/8	.50 .75	.40 .36
12	12SP1	800904 800905 800906	800920 800921 800922	2-1/2 3 3-1/2	2-7/8 3-1/2 4	6	3-11/16	4-9/16 4-1/4 4	3/8	5/8 5/8 3/4	1.75 1.50 1.75	1.35 1.05 1.00
14	14SP1	800907 800908	800923 800924	3 3-1/2	3-1/2 4	7	4-1/4	5-1/4 5	3/8	5/8 3/4	2.25 2.50	1.85 1.75
16	16SP1	800909 800910	800925 800926	3-1/2 4	4 4-1/2	8	4-15/16	6 5-3/4	3/8	3/4 7/8	3.25 3.50	2.50 2.45
18	18SP1	800911 800912	800927 800928	3-1/2 4	4 4-1/2	9	5-3/8	7 6-3/4	3/8	3/4 7/8	4.00 4.25	3.25 3.20
20	20SP1	800913 800914	800928 800929	3-1/2 4	4 4-1/2	10	6-1/8	8 7-3/4	3/8	3/4 7/8	4.75 5.00	4.00 3.95
24	24SP1	800915	800930	4	4-1/2	12	7-3/8	9-3/4	1/2	7/8	6.75	5.60

■ Schedule 40 Pipe
Available In S.S.

Quick-Release Couplings

The new Goodman Conveyor design for a detachable coupling end is the quick release. It is used to facilitate the removal and replacement of individual screw conveyor sections without disturbing the alignment of the other components.

The quick release coupling is manufactured from seamless steel tubing and is welded into the end of the pipe and positioned in such a manner that the flighting does not interfere with the removal of the cap.



Shaft Dia. K	Catalog Numbers*		A	B	C	D	E	F	G		H	J	L	
	Sch. 40	Sch. 80							40	80			40	80
1½	800755	800765	9¼	⅞	3	3¼	5	1	2.067	1.939	2⅜	17/32	.154	.218
2	800756	800766	9¼	⅞	3	3¼	5	1	2.469	2.323	2⅞	21/32	.203	.276
2 7/16	800757	800767	9½	15/16	3	3¼	5¼	1	3.068	2.900	3½	21/32	.216	.300
3	800758	800768	9½	1	3	3¼	5¼	1	3.548	3.364	4	25/32	.226	.318
3 7/16	800759	800769	11½	1½	4	3¾	6¾	1	4.026	3.826	4½	29/32	.237	.337

**Catalog Numbers shown are for Schedule 40 & Schedule 80

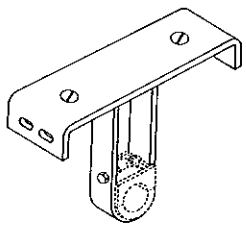
**Schedule 40 is Standard. Schedule 80 and other weights are made to order.

STANDARD GCC QUICK-RELEASE COUPLINGS MAY BE USED WITH EITHER RIGHT HAND OR LEFT HAND FLIGHTING

Hangers

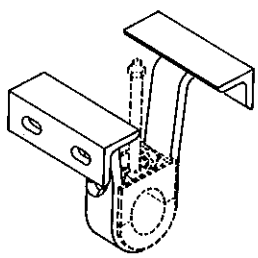
Hanger bearings provide intermediate radial support between separate screw sections. Standard hanger assemblies (except No. 99A) can accommodate various bearing materials. Hangers illustrated are for U-type trough. Hanger styles may be fabricated to accommodate all trough styles. Consult Goodman Conveyor for special hanger requirements.

No. 216



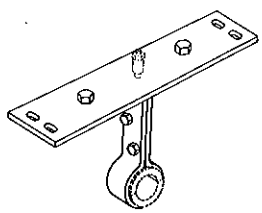
No. 216 hangers are recommended for heavy-duty, abrasive applications, especially where dust-tight operation is required. No. 216 hangers may be furnished with hard-iron, hard-surfaced or oil-impregnated wood bearings. When hard-iron or hard-surfaced bearings are used, hard-iron or hard-surfaced shafts are required. The hanger is mounted inside, flush with top flanges.

No. 216-D



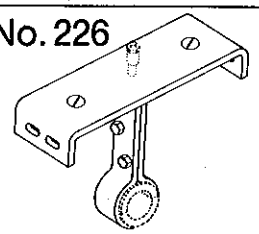
No. 216-D hanger is available for 6″ through 24″ screws. It incorporates rigid trough mounting for maximum screw support. The unique hanger design allows less obstruction to material flow. This hanger is available with hard-iron, oil-impregnated wood, or babbitt bearing inserts, which may be replaced without hanger removal or disassembly. No. 216-D is also readily interchangeable with other CEMA hangers.

No. 220



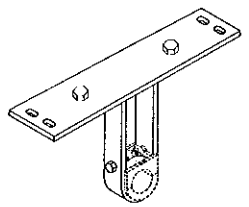
No. 220 hangers are recommended for high-capacity conveyors where dust-tight operation is not required. The slender frame and compact bearing housing allow a higher percentage of conveyor loading with minimum flow obstruction. Available in all friction-type bearing materials. (See table, Page 72).

No. 226



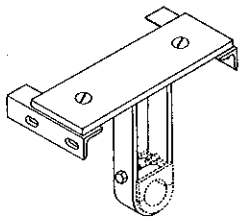
No. 226 incorporates all the advantages of No. 220 but is designed for inside flush-mounting to allow dust-tight operation. Available in all friction-type bearing materials. (See table, Page 72).

No. 230

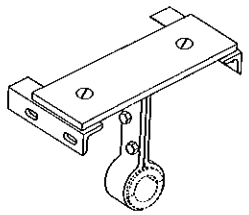


No. 230 hangers are designed for heavy-duty applications where dust-tight operation is not required. May be furnished with either hard-iron (with hard-iron or hard-surfaced shafts) or oil-impregnated wood bearings. Bearing and bearing assembly frame are readily interchangeable with No. 216 top frames.

No. 316

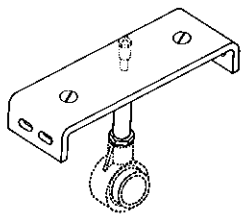


No. 326



No. 316, as well as the No. 326, is well suited for high temperature operation and incorporates the basic features of the 220 and 226. These hangers are designed for interior trough mounting, with self-adjusting assembly to compensate for unequal thermal expansion between components. Available only with hard-iron or hard-surfaced bearings. Hardened or hard-surfaced shafts are required. Recommended when thermal expansion exceeds .093 inches.

No. 99-A



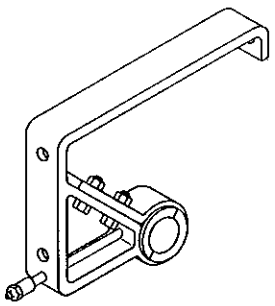
Ball Bearing

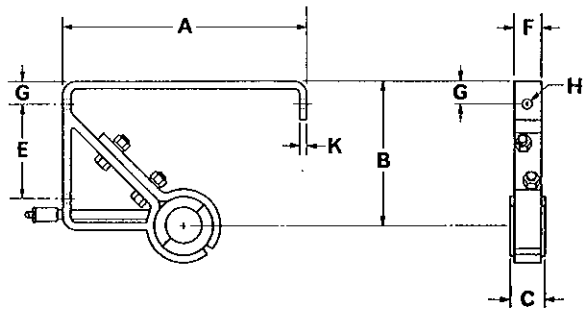
No. 99-A, available for 6″ through 24″ screws, is designed for inside flush mounting. It may also be furnished with modified top frame for outside mounting. The hanger top frame is fabricated from flat steel bar drilled and tapped for lubrication fitting. Adapter unit is threaded at one end for assembly to the bearing housing. Bolt holes in the frame are elongated to allow adjustment. No. 99-A is designed for maximum support, and its slim design minimizes obstruction of material flow.

All hangers are grooved for grease pipes where required.

Hangers

No. 30

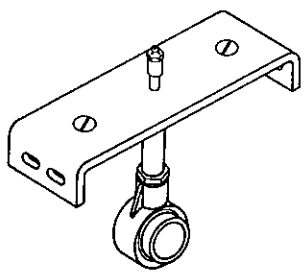


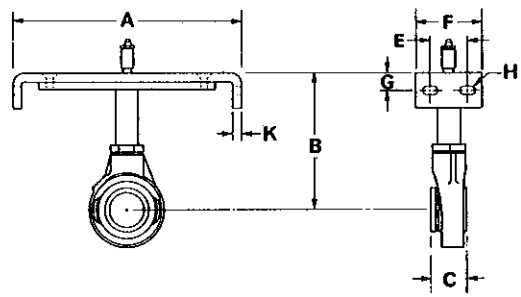


Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	F	G	H Bolts	K	Wt.▲
6	6SH303	801581	1-1/2	7	4-1/2	2	3	1-1/2	3/4	3/8	1/4	4
9	9SH303 9SH304	801582 801583	1-1/2 2	10	6-1/8	2 2	3-1/2	1-1/2 1-1/2	1	1/2	3/8	5 6
12	12SH304 12SH305 12SH306	801586 801587 801588	2 2-7/16 3	13	7-3/4	2 3 3	5-1/4	1-1/2 2-1/4 2-1/4	1-1/4	1/2	3/8	8 13 18
14	14SH305 14SH306	801589 801590	2-7/16 3	15	9-1/4	3 3	6-3/4	2-1/4 2-1/4	1-1/4	5/8	3/8	17 19
16	16SH306	801591	3	17	10-5/8	3	8	2-1/4	1-1/4	5/8	1/2	21
18	18SH306 18SH307	801592 801593	3 3-7/16	19	12-1/8	3 4	9-1/8	2-1/4 3	1-3/8	5/8	1/2	22 32
20	20SH306 20SH307	801594 801595	3 3-7/16	21	13-1/2	3 4	10-3/8	2-1/4 3	1-3/8	5/8	1/2	25 36
24	24SH307	801596	3-7/16	25	16-1/2	4	12	3	2	3/4	5/8	36

See Page 91 for bearing selection.
▲Weights are for frames only.

No. 99-A



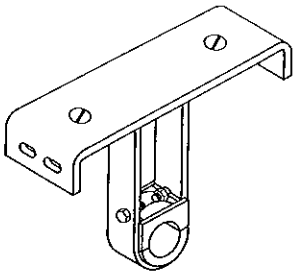


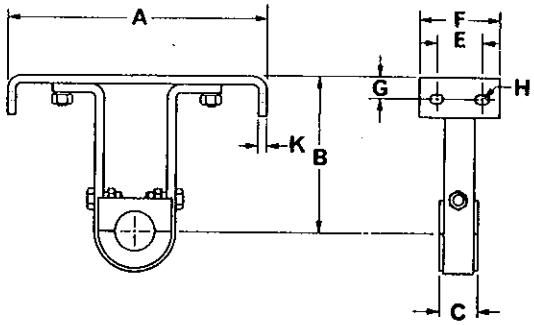
Screw Dia.	Part No. ■	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	D	F	G	H Bolts	K	Wt.
6	6SH99A3	801551	1-1/2	7	4-1/2	2	2-1/2	9-3/4	4	3/4	3/8	1/4	6
9	9SH99A3 9SH99A4	801552 801553	1-1/2 2	10	6-1/8	2 2	2-1/2	13-1/2	4	1	3/8	1/4	7 8
12	12SH99A4 12SH99A5 12SH99A6	801556 801557 801558	2 2-7/16 3	13	7-3/4	2 3 3	2-1/2	17-1/2	4	1-1/4	1/2	3/8	13 19 24
14	14SH99A5 14SH99A6	801559 801560	2-7/16 3	15	9-1/4	3 3	2-1/2	19-1/2	4	1-3/8	1/2	1/2	20 25
16	16SH99A6	801561	3	17	10-5/8	3	2-1/2	21-1/2	4	1-3/8	5/8	1/2	31
18	18SH99A6 18SH99A7	801562 801563	3 3-7/16	19	12-1/8	3 4	3-1/2	24-1/2	5	1-5/8	5/8	1/2	33-1/2 47
20	20SH99A6 20SH99A7	801564 801565	3 3-7/16	21	13-1/2	3 4	3-1/2	26-1/2	5	1-5/8	5/8	1/2 3/4	39 52

See Page 91 for bearing selection
Same as CEMA NO. 270 Ball Brng. Hanger

Hangers

No. 216

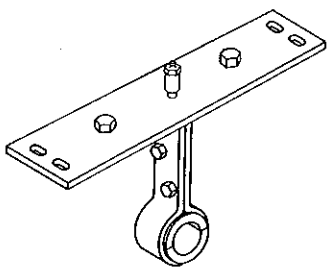


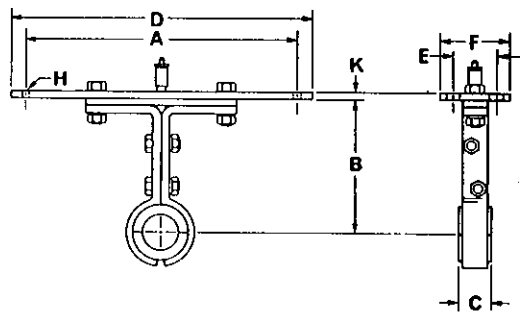


Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	F	G	H Bolts	K	Wt. ▲
6	6SH2163	801461	1-1/2	7	4-1/2	2	2-1/2	4	3/4	3/8	1/4	5
9	9SH2163	801462	1-1/2	10	6-1/8	2	2-1/2	4	1	3/8	1/4	7
	9SH2164	801463	2			2						9
12	12SH2164	801466	2	13	7-3/4	2	2-1/2	4	1-1/4	1/2	3/8	14
	12SH2165	801467	2-7/16			3						18
	12SH2166	801468	3			3						21
14	14SH2165	801469	2-7/16	15	9-1/4	3	2-1/2	4	1-3/8	1/2	1/2	23
	14SH2166	801470	3			3						25
16	16SH2166	801471	3	17	10-5/8	3	2-1/2	4	1-3/8	1/2	1/2	28
18	18SH2166	801472	3	19	12-1/8	3	3-1/2	5	1-5/8	5/8	1/2	34
	18SH2167	801473	3-7/16			4					1/2	44
20	20SH2166	801474	3	21	13-1/2	3	3-1/2	5	1-5/8	5/8	1/2	36
	20SH2167	801475	3-7/16			4					3/4	47
24	24SH2167	801476	3-7/16	25	16-1/2	4	3-1/2	5	1-3/4	5/8	3/4	53

See page 91 for bearing selection.
▲ Weights are for frames only.

No. 220



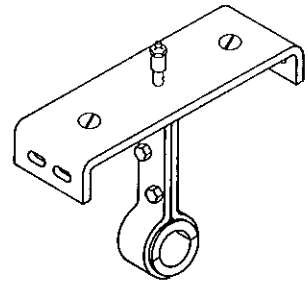


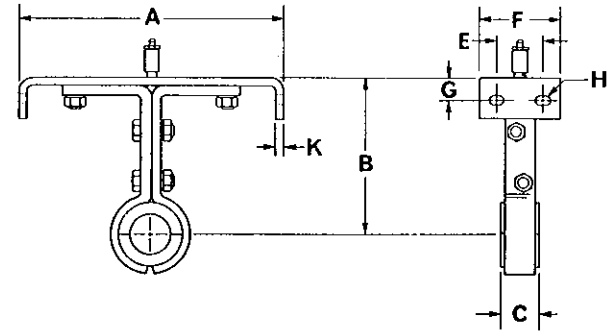
Screw Dia.	Part Number	Catalog No. Frame Only		Shaft Dia.	A	B	C	D	E	F	H Bolts	K	▲ Wt.
		No Groove	*Grooved										
6	6SH2203	801432	801448	1-1/2	8-3/4	4-1/2	2	9-3/4	2-1/2	4	3/8	1/4	7
9	9SH2203	801433	801449	1-1/2	12-1/4	6-1/8	2	13-1/2	2-1/2	4	3/8	1/4	10
	9SH2204	801434	801450	2									12
12	12SH2204	801437	801453	2	15-3/4	7-3/4	2	17-1/2	2-1/2	4	1/2	3/8	20
	12SH2205	801438	801454	2-7/16			3						25
	12SH2206	801439	801455	3			3						26
14	14SH2205	801440	801456	2-7/16	17-3/4	9-1/4	3	19-1/2	2-1/2	4	1/2	1/2	28
	14SH2206	801441	801457	3									30
16	16SH2206	801442	801458	3	19-3/4	10-5/8	3	21-1/2	2-1/2	4	1/2	1/2	33
18	18SH2206	801443	801459	3	22-1/4	12-1/8	3	24-1/2	3-1/2	5	5/8	1/2	45
	18SH2207	801444	801477	3-7/16			4						53
20	20SH2206	801445	801478	3	24-1/4	13-1/2	3	26-1/2	3-1/2	5	5/8	3/4	52
	20SH2207	801446	801479	3-7/16			4						66
24	24SH2207	801447	801460	3-7/16	28-1/4	16-1/2	4	30-1/2	3-1/2	5	5/8	3/4	81

See page 91 for bearing selection.
*Grooved frames required for lubricated bearings.
▲ Weights are for frames only.

Hangers

No. 226

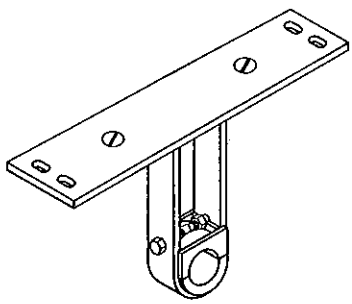


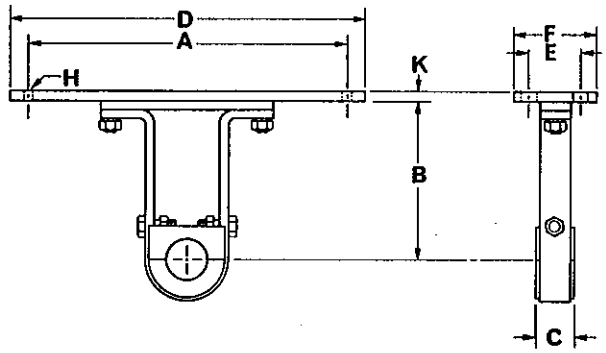


Screw Dia.	Part Number	Catalog No. Frame Only		Shaft Dia.	A	B	C	E	F	G	H Bolts	K	▲ Wt.
		No Groove	Grooved										
6	6SH2263	801402	801417	1-1/2	7	4-1/2	2	2-1/2	4	3/4	3/8	1/4	7
9	9SH2263	801403	801418	1-1/2	10	6-1/8	2	2-1/2	4	1	3/8	1/4	9
	9SH2264	801404	801419	2			2						11
12	12SH2264	801407	801422	2	13	7-3/4	2	2-1/2	4	1-1/4	1/2	3/8	15
	12SH2265	801408	801423	2-7/16			3						23
	12SH2266	801409	801424	3			3						24
14	14SH2265	801410	801425	2-7/16	15	9-1/4	3	2-1/2	4	1-3/8	1/2	1/2	24
	14SH2266	801411	801426	3			3						26
16	16SH2266	801412	801427	3	17	10-5/8	3	2-1/2	4	1-3/8	1/2	1/2	29
18	18SH2266	801413	801428	3	19	12-1/8	3	3-1/2	5	1-5/8	5/8	1/2	39
	18SH2267	801489	801508	3-7/16			4						52
20	20SH2266	801490	801429	3	21	13-1/2	3	3-1/2	5	1-5/8	5/8	1/2	42
	20SH2267	801414	801509	3-7/16			4					3/4	55
24	24SH2267	801415	801430	3-7/16	25	16-1/2	4	3-1/2	5	1-3/4	5/8	3/4	65

*Grooved frames required for lubricated bearings.
See page 91 for bearing selection.
▲Weights are for frames only.

No. 230



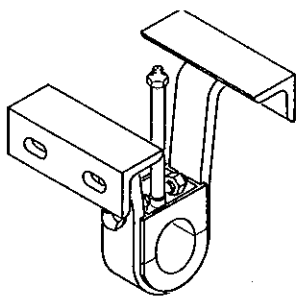


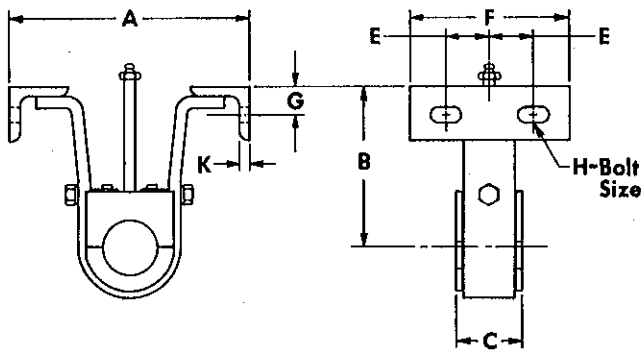
Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	D	E	F	H Bolts	K	Wt. ▲
6	6SH2303	801491	1-1/2	8-3/4	4-1/2	2	9-3/4	2-1/2	4	3/8	1/4	7
9	9SH2303	801492	1-1/2	12-1/4	6-1/8	2	13-1/2	2-1/2	4	3/8	1/4	10
	9SH2304	801493	2			2						12
12	12SH2304	801496	2	15-3/4	7-3/4	2	17-1/2	2-1/2	4	1/2	3/8	20
	12SH2305	801497	2-7/16			3						25
	12SH2306	801498	3			3						26
14	14SH2305	801499	2-7/16	17-3/4	9-1/4	3	19-1/2	2-1/2	4	1/2	1/2	28
	14SH2306	801500	3			3						30
16	16SH2306	801501	3	19-3/4	10-5/8	3	21-1/2	2-1/2	4	1/2	1/2	33
18	18SH2306	801502	3	22-1/4	12-1/8	3	24-1/2	3-1/2	5	5/8	1/2	45
	18SH2307	801503	3-7/16			4						53
20	20SH2306	801504	3	24-1/4	13-1/2	3	26-1/2	3-1/2	5	5/8	1/2	52
	20SH2307	801505	3-7/16			4					3/4	66
24	24SH2307	801506	3-7/16	28-1/4	16-1/2	4	30-1/2	3-1/2	5	5/8	3/4	81

See page 91 for bearing selection.
▲ Weights are for frames only.

Hangers

No. 216-D





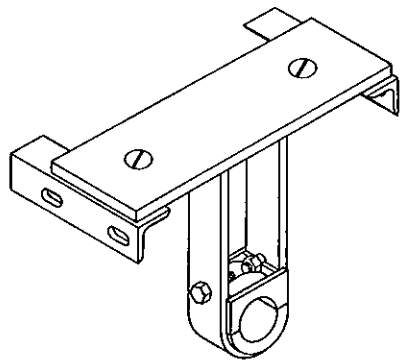
Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	F	G	H Bolts	K	Wt.▲
6	6SH216D3	805063	1-1/2	7	4-1/2	2	1-1/4	4-1/2	3/4	3/8	1/4	3.0
9	9SH216D3 9SH216D4	805064 805065	1-1/2 2	10	6-1/8	2	1-1/4	4-1/2	1	3/8	1/4	5.0 6.5
12	12SH216D4 12SH216D5 12SH216D6	805068 805069 805070	2 2-7/16 3	13	7-3/4	2 3 3	1-1/4	5	1-1/4	1/2	3/8	8.5 13.8 15.0
14	14SH216D5 14SH216D6	805072 805073	2-7/16 3	15	9-1/4	3 3	1-1/4	5	1-3/8	1/2	3/8	15.5 17.0
16	16SH216D6	805075	3	17	10-5/8	3	1-1/4	5	1-3/8	1/2	1/2	18.5
18	18SH216D6 18SH216D7	805077 805078	3 3-7/16	19	12-1/8	3 4	1-3/4	6	1-5/8	5/8	1/2	25.0 30.0
20	20SH216D6 20SH216D7	805079 805080	3 3-7/16	21	13-1/2	3 4	1-3/4	6	1-5/8	5/8	1/2	26.3 34.5
24	24SH216D7	805081	3-7/16	25	16-1/2	4	1-3/4	6	1-5/8	5/8	1/2	39.0

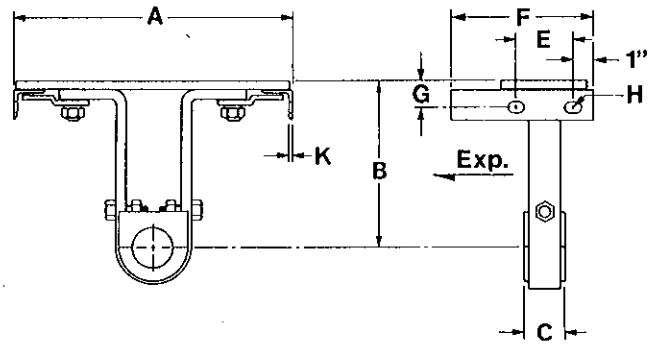
This hanger supersedes No. 216-C Hanger.
See page 91 for bearing selection.
Grease pipe optional, depending on bearing selection.
***Hardened steel couplings should be used with hard iron bearings.**
▲Weights are for frames only.

Hangers

No. 316

Expansion-Type





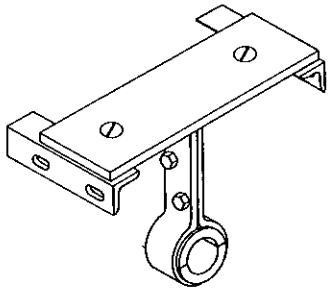
Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	F	G	H Bolts	K	Wt.
6	6SH3163	805085	1-1/2	7	4-1/2	2	2-1/2	6	3/4	3/8	1/8	7
9	9SH3163	805086	1-1/2	10	6-1/8	2	2-1/2	6	1	3/8	3/16	9
	9SH3164	805087	2			2						10
12	12SH3164	805088	2	13	7-3/4	2	2-1/2	6-1/2	1-1/4	1/2	3/16	14
	12SH3165	805089	2-7/16			3						19
	12SH3166	805090	3			3						25
14	14SH3165	805091	2-7/16	15	9-1/4	3	2-1/2	6-1/2	1-3/8	1/2	3/16	23
	14SH3166	805092	3			3						31
16	16SH3166	805093	3	17	10-5/8	3	2-1/2	8	1-3/8	1/2	1/4	36
18	18SH3166	805094	3	19	12-1/8	3	3-1/2	8	1-5/8	5/8	1/4	36
	18SH3167	805095	3-7/16			4						48
20	20SH3166	805096	3	21	13-1/2	3	3-1/2	8	1-5/8	5/8	1/4	38
	20SH3167	805097	3-7/16			4						51
24	24SH3167	805098	3-7/16	25	16-1/2	4	3-1/2	8	1-3/4	5/8	3/8	58

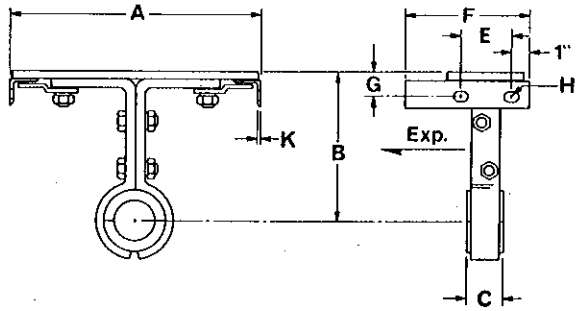
See page 91 for Bearing Selection.

Hangers

Expansion-Type

No. 326

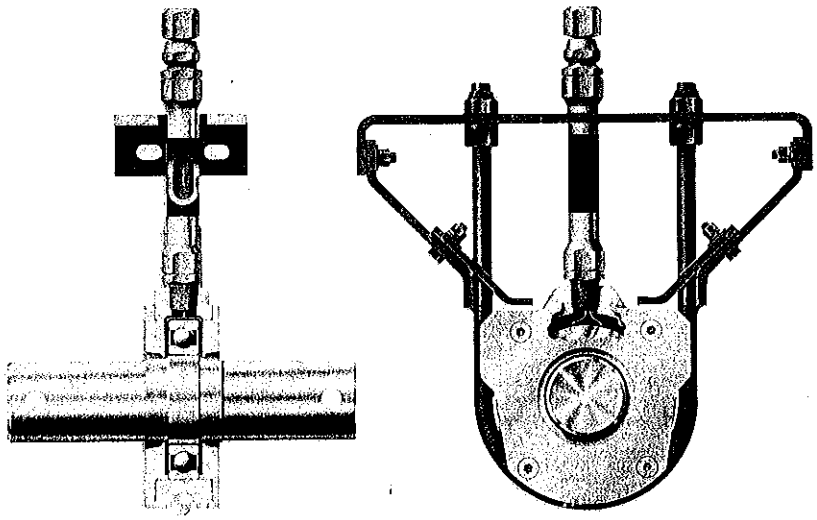


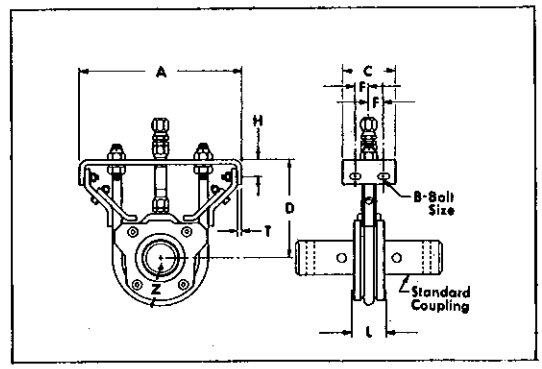


Screw Dia.	Part Number	Catalog No. Frame Only	Shaft Dia.	A	B	C	E	F	G	H Bolts	K	Wt.
6	6SH3263	801521	1-1/2	7	4-1/2	2	2-1/2	6	3/4	3/8	1/8	7
9	9SH3263	801522	1-1/2	10	6-1/8	2	2-1/2	6	1	3/8	3/16	9
	9SH3264	801523	2			2						10
12	12SH3264	801526	2	13	7-3/4	2	2-1/2	6-1/2	1-1/4	1/2	3/16	14
	12SH3265	801527	2-7/16			3						19
	12SH3266	801528	3			3						25
14	14SH3265	801529	2-7/16	15	9-1/4	3	2-1/2	6-1/2	1-3/8	1/2	3/16	23
	14SH3266	801530	3			3						31
16	16SH3266	801531	3	17	10-5/8	3	2-1/2	8	1-3/8	1/2	1/4	36
18	18SH3266	801532	3	19	12-1/8	3	3-1/2	8	1-5/8	5/8	1/4	36
	18SH3267	801533	3-7/16			4						48
20	20SH3266	801534	3	21	13-1/2	3	3-1/2	8	1-5/8	5/8	1/4	38
	20SH3267	801535	3-7/16			4						51
24	24SH3267	801536	3-7/16	25	16-1/2	4	3-1/2	8	1-3/4	5/8	3/8	58

See page 91 for Bearing Selection.

Screw Conveyor Hanger with Air-Swept Bearing No. 426





▲ Space required on coupling for hanger.
Air supply should be clean and dry.

Air-swept hangers are recommended when handling dusty and abrasive materials which contribute to shut-downs and hanger bearing failures.

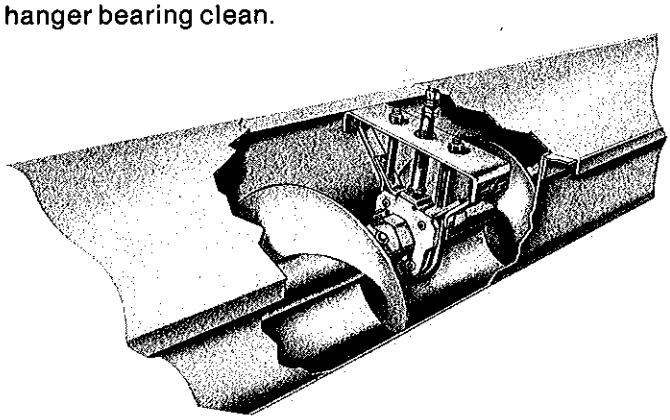
Goodman Conveyor engineers have solved this bearing problem by the simple process of applying compressed air through a hardened ductile iron housing in which a sealed-for-life ball bearing is mounted.

The air, at approximately 1¼ PSI, enters the housing at the top, passes over and around the bearing, and is dissipated around the coupling shaft on both sides of the housing. Thus the bearing is protected from dust and the material in the trough at all times. Only 3 to 7 cu. ft. of air per minute is required to keep each hanger bearing clean.

To prevent dust from settling inside the bearing housing, a timing relay can continue the flow of air over the bearing for 90 seconds after the conveyor has been stopped. Also, an electrical interlock system can shut down the conveyor immediately should the airflow be interrupted.

Air-swept hangers are available for 9″ thru 24″ conveyors. They should not be used when handling hot materials (over 250°F.) or wet sticky materials, or when handling nonabrasive materials when an inexpensive hanger will do the job satisfactorily.

In service, air-swept hangers deliver relatively trouble-free operation. They help solve noise nuisance problems, and they help reduce power requirement because of the low coefficient of friction. Maximum trough loading should not exceed 15%.



The illustration shows an air-swept hanger. Goodman Conveyor ordinarily furnishes the hanger only. A complete list of the control and distribution items can be furnished to enable the user to purchase and install the items using local sources.

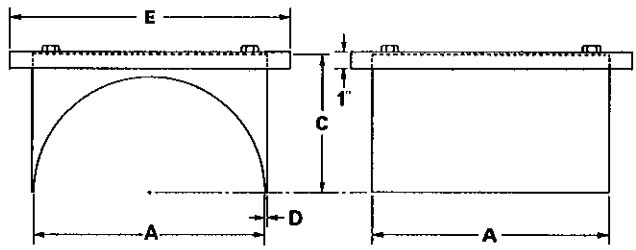
Screw Dia.	Part Number	Catalog Number	Shaft Dia.	Weight Each	A	B	C	D	F	H	L▲	T	Z
9	9SH4263 9SH4264	801376 801377	1½ 2	15 20	10	⅜ ⅜	4½	6⅛	1¼	1	2	¼	2 15/16
12	12SH4264 12SH4265 12SH4266	801380 801381 801382	2 2 7/16 3	30 52 68	13	½	5	7¾	1¼	1¼	2 3 3	¼	2 15/16 3 19/32 4 3/16
14	14SH4265 14SH4266	801383 801384	2 7/16 3	60 74	15	½	5	9¼	1¼	1⅜	3	⅜	3 19/32 4 3/16
16	16SH4266	801385	3	77	17	½	5	10⅝	1¼	1⅜	3	⅜	4 3/16
18	18SH4266	801387	3	91	19	⅝	6	12⅛	1¾	1⅝	3	½	4 3/16
20	20SH4266 20SH4267	801389 801390	3 3 7/16	105 140	21	⅝	6	13½	1¾	1⅝	3 4	½	4 3/16 4 31/32
24	24SH4267	801391	3 7/16	155	25	⅝	6	16½	1¾	1⅝	4	½	4 31/32

Dimensions in inches.
Weight in pounds

Hanger Pocket For Tubular Trough

Tubular Trough Hanger Pocket

Hanger bearing support for conveyors with tubular trough is accomplished by means of a hanger pocket mounted on top of the trough at hanger bearing points. The hanger bolts to the straight side of the pocket. Any standard hanger designed for inside mounting may be used. The pocket is sealed by a bolted access cover with water-proof, turned-down edges. It may be gasketed for dust-tight operation. Standard pockets are of the same gauge as the trough to which they are fitted.

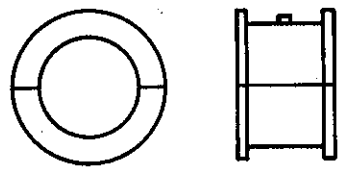
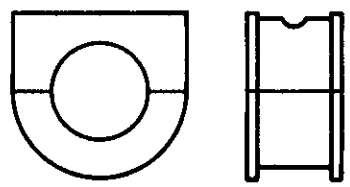
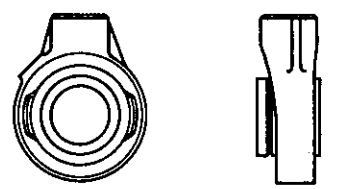


Screw Dia.	Part Number	Catalog Number	A	C	D	E	Wt.
6	6SHP14	805116	7	5	14	9-3/4	5
	6SHP10	805117			10		7
							9
9	9SHP14	805118	10	7-1/8	14	13-1/8	8
	9SHP12	805119			12		10
	9SHP10	805120			10		13
	9SHP7	805121			3/16"		18
12	12SHP12	805122	13	8-7/8	12	17-1/4	15
	12SHP10	805123			10		20
	12SHP7	805124			3/16"		27
	12SHP3	805125			1/4"		36
14	14SHP12	805126	15	10-1/8	12	19-1/4	19
	14SHP10	805127			10		24
	14SHP7	805128			3/16"		33
	14SHP3	805129			1/4"		44
16	16SHP12	805130	17	11-1/8	12	21-1/4	23
	16SHP10	805131			10		30
	16SHP7	805132			3/16"		41
	16SHP3	805133			1/4"		55
18	18SHP12	805143	19	12-3/8	12	24-1/4	30
	18SHP10	805134			10		37
	18SHP7	805135			3/16"		58
	18SHP3	805136			1/4"		68
20	20SHP10	805137	21	13-3/8	10	26-1/4	46
	20SHP7	805138			3/16"		63
	20SHP3	805139			1/4"		84
24	24SHP10	805140	25	15-3/8	10	30-1/4	61
	24SHP7	805141			3/16"		83
	24SHP3	805142			1/4"		111

Hanger Bearings

HANGER - BEARING SELECTION

SEE PAGE 92 FOR HANGER BEARING CATALOG NUMBERS

	Bore	Part No.	Bearing Material & Characteristics*	Hanger No.
	1-1/2	SBX3	Babbitt - 1 & 3 Hard Iron - 1& 4 Wood - 2 & 4 Bronze, Plain - 1 & 3 Bronze, Graphite - 1 & 4 ▲UHMW - 2 & 4 Nylatron - 1 & 4	
	2	SBX4		220
	2-7/16	SBX5		226
	3	SBX6		326
	3-7/16	SBX7		30
	1-1/2	SBA3	Bronze, Plain - 1 & 3 Babbitt - 1 & 3 Hard Iron - 1 & 4 Wood - 2 & 4	
	2	SBA4		216
	2-7/16	SBA5		216-D
	3	SBA6		230
	3-7/16	SBA7		316
	1-1/2	SBB3	Ball Bearing	99A
	2	SBB4		
	2-7/16	SBB5		
	3	SBB6		
	3-7/16	SBB7		

*** Bearing Characteristics**
1 - Metallic
2 - Non-Metallic
3 - Lubricated
4 - Non-Lubricated

▲ Ultra-High Molecular Weight Polymer

Hanger Bearings

HANGER BEARING CATALOG NUMBERS

Bore	Part Number	— Hanger Bearing Catalog Numbers —									
		Hard Iron		Babbitt		Wood		Bronze, Plain			
		Upper	Lower	Upper	Lower	Upper	Lower	Upper	Lower	Upper	Lower
1-1/2	SBX3	801802	801803	801822	801823	801842	801843	801902	801903		
2	SBX4	801804	801805	801824	801825	801844	801845	801904	801905		
2-7/16	SBX5	801806	801807	801826	801827	801846	801847	801906	801907		
3	SBX6	801808	801809	801828	801829	801848	801849	801908	801909		
3-7/16	SBX7	801810	801811	801830	801831	801850	801851	801910	808911		
1-1/2	SBA3	801982	801983	802022	802023	802002	802003	801970	801971		
2	SBA4	801984	801985	802024	802025	802004	802005	801972	801973		
2-7/16	SBA5	801986	801987	802026	802027	802006	802007	802112	802113		
3	SBA6	801988	801989	802028	802029	802008	802009	802114	802115		
3-7/16	SBA7	801990	801991	802030	802031	802010	802011	802116	802117		

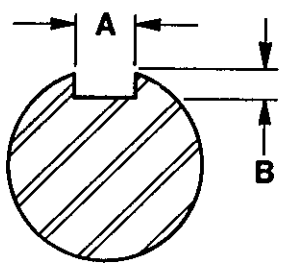
Bore	Part Number	— Hanger Bearing Catalog Numbers —					
		Nylatron		UHMW▲		Bronze, Graphite	
		Upper	Lower	Upper	Lower	Upper	Lower
1-1/2	SBX3	801862	801863	801954	801955	801922	801923
2	SBX4	801864	801865	801956	801957	801924	801925
2-7/16	SBX5	801866	801867	801958	801959	801926	801927
3	SBX6	801868	801869	801960	801961	801928	801929
3-7/16	SBX7	N/A	N/A	N/A	N/A	801930	801931

Bore	Part Number	Cat. No. Ball
1-1/2	SBB3	802040
2	SBB4	802041
2-7/16	SBB5	802042
3	SBB6	802043
3-7/16	SBB7	802044

▲ Ultra-High Molecular Weight Polymer

N/A Not Available

DRIVE SHAFT KEYWAYS



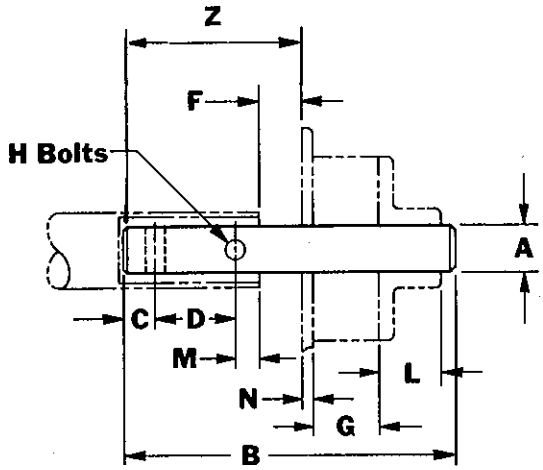
Shaft Dia.	A	B
1-1/2	3/8	3/16
2	1/2	1/4
2-7/16	5/8	5/16
3	3/4	3/8
3-7/16	7/8	7/16

Shafts

End shafts are designed to provide support at the final screw section. Two types are available: standard, for use with conventional trough ends; and hanger-end shafts which support the single end screw section with a standard hanger bearing.

Goodman Conveyor end shafts are machined from cold-drawn C-1045 carbon steel. All coupling bolt holes are jig-drilled for proper alignment, and exacting dimensional tolerances are maintained for proper bearing clearance. End shafts are also available in stainless steel.

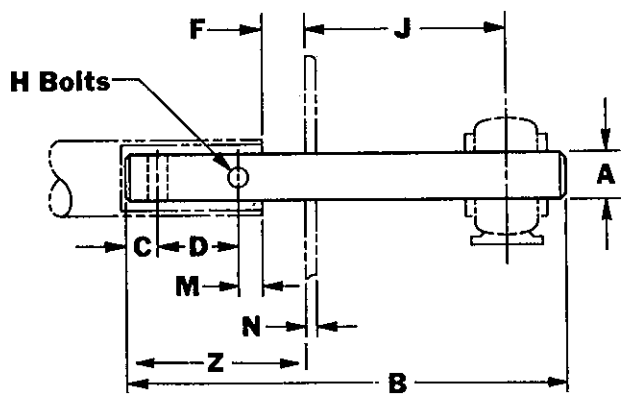
Standard End Shaft



A Shaft Dia.	"B" Dimension Babb. Brg. With Seal	Babb. Brg. Cat. No.	Babb. Brg Without Seal	Babb. Brg Cat. No.	Ball Brg. With Seal	Ball Brg. Cat. No.	Ball Brg. Without Seal	Ball Brg. Cat. No.	C	D	F	G	H Bolts	L Babb. Brg.	L Ball Brg.	M	N	Z
1-1/2	11	801050	9-1/4	801060	10	801070	8-1/4	801080	7/8	3	1	1-3/4	1/2	3	2	7/8	3/16	5-3/4
2	12	801051	10-1/4	801061	10-3/8	801071	8-5/8	801081	7/8	3	1	1-3/4	5/8	4	2-3/8	7/8	1/4	5-3/4
2-7/16	13-5/8	801052	11-7/8	801062	11-3/8	801072	9-5/8	801082	15/16	3	1-1/2	1-3/4	5/8	5	2-7/16	15/16	1/4	6-3/8
3	14-7/8	801053	13-1/8	801063	12-3/8	801073	10-5/8	801083	1	3	1-1/2	1-3/4	3/4	6	3-7/16	1	5/16	6-1/2
3-7/16	18-5/8	801054	16-3/8	801064	15-5/8	801074	13-3/8	801084	1-1/4	4	2	2-1/4	7/8	7	3-7/8	1-1/2	3/8	8-3/4

See page 97 for Coupling Bolt Selection.

Outboard Bearing Type



A Shaft Dia.	"B" Dimension Ball Brg. With Seal	Ball Brg. Catalog Number	Babbitt Brg. With Seal	Babbitt Brg. Catalog Number	C	D	F	H Bolts	J	M	N	Z
1-1/2	12-7/8	801188	12-7/8	801194	7/8	3	1	1/2	5	7/8	3/16	5-3/4
2	13-1/4	801189	13-1/4	801195	7/8	3	1	5/8	5-1/2	7/8	1/4	5-3/4
2-7/16	15-3/8	801190	15-3/8	801196	15/16	3	1-1/2	5/8	6-1/2	15/16	1/4	6-3/8
3	16-1/4	801191	17	801197	1	3	1-1/2	3/4	7	1	5/16	6-1/2
3-7/16	19-1/4	801192	20-1/4	801198	1-1/4	4	2	7/8	7-3/4	1-1/2	3/8	8-3/4

See page 97 for Coupling Bolt Selection.

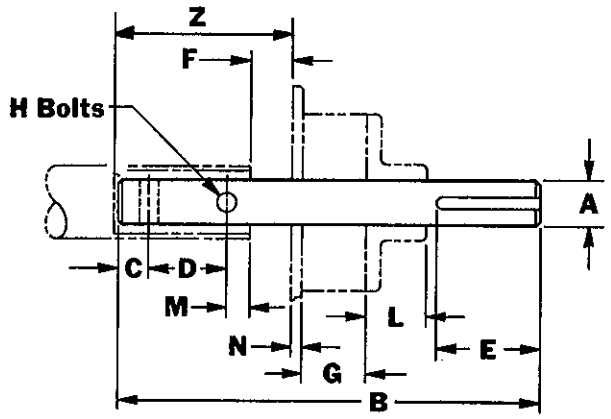
See page 66 for seals.

Drive Shafts

Screw drive shafts are machined from cold-drawn C-1045 carbon steel. Exacting dimensional tolerances are maintained for proper bearing clearance. All coupling bolt holes are jig-drilled for proper alignment and key-seats are precision milled to insure proper assembly.

Goodman Conveyor drive shafts are also available in stainless steel.

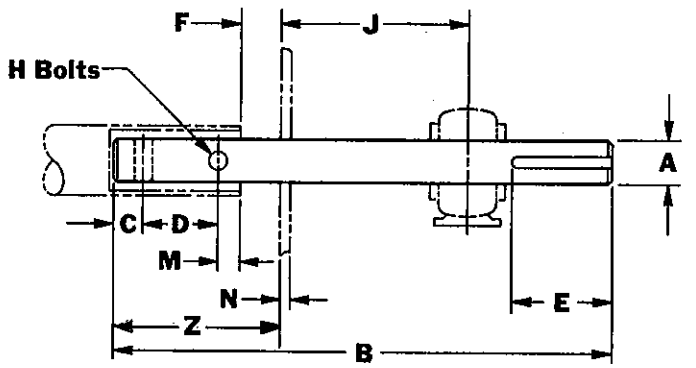
Standard Drive Shaft



A	"B" Dimension								C	D	*E	F	G	H	L		M	N	Z
	Babb. Brg.		Babb. Brg		Ball Brg.		Ball Brg.												
Shaft Dia.	With Seal	Cat. No.	With-out Seal	Cat. No.	With Seal	Cat. No.	With-out Seal	Cat. No.						Bolts	Babb Brg.	Babb. Brg.			
1-1/2	14-1/4	801010	12-1/2	801020	13-1/4	801030	11-1/2	801040	7/8	3	3-1/4	1	1-3/4	1/2	3	2	7/8	3/16	5-3/4
2	16-1/2	801011	14-3/4	801021	14-7/8	801031	13-1/8	801041	7/8	3	4-1/4	1	1-3/4	5/8	4	2-3/8	7/8	1/4	5-3/4
2-7/16	19-1/8	801012	17-3/8	801022	16-7/8	801032	15-1/8	801042	15/16	3	5-3/16	1-1/2	1-3/4	5/8	5	2-7/16	15/16	1/4	6-3/8
3	20-7/8	801013	19-1/8	801023	18-3/8	801033	16-5/8	801043	1	3	6-1/4	1-1/2	1-3/4	3/4	6	3-7/16	1	5/16	6-1/2
3-7/16	25-7/8	801014	23-5/8	801024	22-7/8	801034	20-5/8	801044	1-1/4	4	7-1/4	2	2-1/4	7/8	7	3-7/8	1-1/2	3/8	8-3/4

*See page 92.
See page 97 for Coupling Bolt Selection.

Outboard Bearing Type



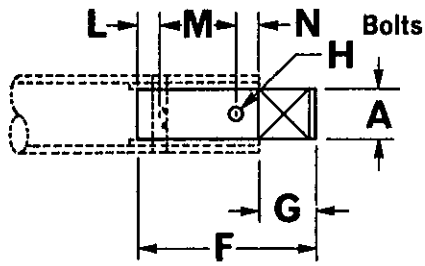
A	"B" Dimension				C	D	*E	F	H	J	M	N	Z
	Ball Brg.		Babbitt Brg.										
Shaft Dia.	With Seal	Catalog Number	With Seal	Catalog Number					Bolts				
1-1/2	16-1/4	801145	16-1/4	801175	7/8	3	3-1/4	1	1/2	5	7/8	3/16	5-3/4
2	17-1/2	801146	17-1/2	801176	7/8	3	4-1/4	1	5/8	5-1/2	7/8	1/4	5-3/4
2-7/16	20-1/2	801147	20-3/4	801177	15/16	3	5	1-1/2	5/8	6-1/2	15/16	1/4	6-3/8
3	22-1/2	801148	23-1/4	801178	1	3	6-1/4	1-1/2	3/4	7	1	5/16	6-1/2
3-7/16	26	801149	27-1/2	801179	1-1/4	4	7-1/4	2	7/8	7-3/4	1-1/2	3/8	8-3/4

*See page 92.
See page 66 for seals.
See page 97 for Coupling Bolt Selection.

Hanger End Shaft

Hanger end shafts are designed to support the single end screw section with a standard hanger bearing.

Goodman Conveyor hanger end shafts are machined from cold-drawn C-1045 carbon steel. All coupling bolt holes are jig-drilled for proper alignment, and exacting dimensional tolerances are maintained for proper bearing clearance. Hanger end shafts are available in stainless steel. **Hanger end shafts are also available with induction hardened bearing area for use with hard iron bearings.**



A Shaft Dia.	Catalog Numbers		F	G	H Bolts	L	M	N	Avg. Weight
	Standard	Hardened*							
1-1/2	801130	801140	6-7/8	2-1/8	1/2	7/8	3	7/8	3.5
2	801131	801141	6-7/8	2-1/8	5/8	7/8	3	7/8	6.2
2-7/16	801132	801142	8-1/8	3-1/4	5/8	15/16	3	15/16	10.8
3	801133	801143	8-1/4	3-1/4	3/4	1	3	1	16.5
3-7/16	801134	801144	11-1/8	4-3/8	7/8	1-1/4	4	1-1/2	30.0

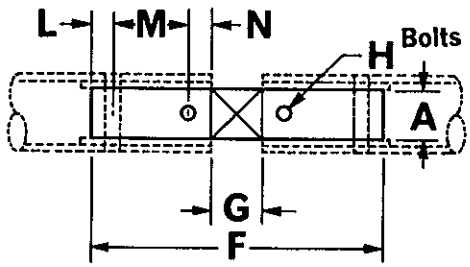
***Bearing area only hardened**

See page 97 for Coupling-Bolt Selection

Coupling Shafts

Coupling shafts are designed to transmit rotation between individual conveyor screw sections and to provide intermediate radial support through hanger bearings. Two basic types are available: standard shafts, for use with hanger bearings; and close-coupling shafts, designed for applications where the omission of hanger bearings is desirable. To prevent deflection, caution should be exercised in the use of close-coupling shafts. When close-coupling shafts are specified, it is normally considered good design practice to also specify that screw ends are to be prepared to form a continuous helix.

Goodman Conveyor coupling shafts are machined from cold-drawn C-1045 carbon steel. Coupling bolt holes are jig-drilled for proper alignment, and exacting dimensional tolerances are maintained for proper bearing clearance. Coupling shafts are available in stainless steel. **Coupling shafts are also available with induction hardened bearing area for use with hard iron bearings.**

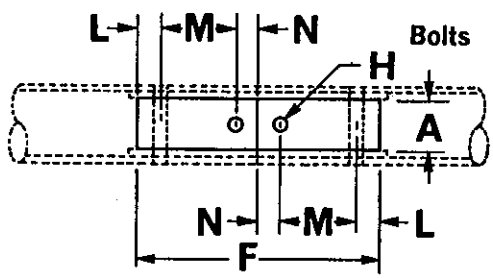


A Shaft Dia.	Catalog Numbers		F	G	H Bolts	L	M	N	Weight
	Std. Cat. No.	*Hardened Cat. No.							
1-1/2	801090	801100	11-1/2	2	1/2	7/8	3	7/8	5.8
2	801091	801101	11-1/2	2	5/8	7/8	3	7/8	10.3
2-7/16	801092	801102	12-3/4	3	5/8	15/16	3	15/16	15.6
3	801093	801103	13	3	3/4	1	3	1	26.0
3-7/16	801094	801104	17-1/2	4	7/8	1-1/4	4	1-1/2	47.0

*Bearing area only hardened

See page 97 for Coupling-Bolt selection

Close Coupling

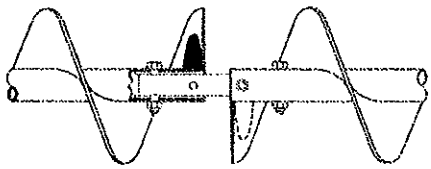


A Shaft Dia.	Catalog Number	F	H Bolts	L	M	N	Weight
1-1/2	801110	9-1/2	1/2	7/8	3	7/8	4.8
2	801111	9-1/2	5/8	7/8	3	7/8	8.5
2-7/16	801112	9-3/4	5/8	15/16	3	15/16	12.9
3	801113	10	3/4	1	3	1	20.0
3-7/16	801114	13-1/2	7/8	1-1/4	4	1-1/2	37.0

See page 97 for Coupling-Bolt Selection.

End Lugs, Internal Collars, Coupling Bolts

END LUGS

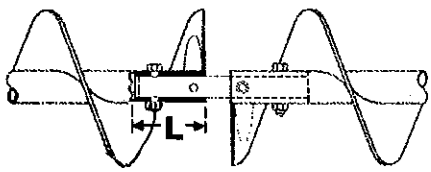


End lugs are manufactured of heavy-gauge steel. They are designed to provide maximum support with the least obstruction of material flow. They are welded securely to both flight and pipe. Manufactured for both right or left hand conveyors for intake or discharge ends of the conveyor.

Screw Dia.	Part No. Intake End*	Catalog Numbers Intake End R/H	Catalog Numbers Intake End L/H	Part No. Discharge End*	Catalog Numbers Discharge End R/H	Catalog Numbers Discharge End L/H	Weight Each Lbs.
6	6SEL-I	800940	800934	6SEL-D	800950	800947	.06
9	9SEL-I	800941	800935	9SEL-D	800951	800948	.15
12	12SEL-I	800943	800936	12SEL-D	800953	800949	.43
14	14SEL-I	800944	800937	14SEL-D	800954	800957	.43
16	16SEL-I	800944	800937	16SEL-D	800954	800957	.68
18	18SEL-I	800946	800938	18SEL-D	800956	800958	.68
20	20SEL-I	800946	800938	20SEL-D	800956	800958	.68
24	24SEL-I	800946	800938	24SEL-D	800956	800958	.68

*Specify hand of Conveyor

INTERNAL COLLARS

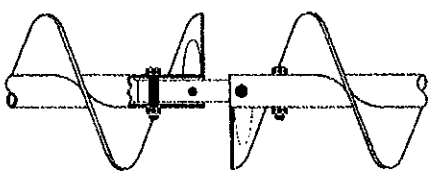


Goodman Conveyor internal collars are manufactured from special seamless tubing. Close-tolerance collars are pressure-inserted in the pipe end by means of a special fixture and plug-welded for maximum efficiency and service life. Coupling bolt holes are jig-drilled for perfect alignment. Replacement collars are furnished undrilled and should be drilled to match in the field.

Coupling Dia.	Nominal Pipe Size ■	Part Number	Catalog Number	L	Weight Each Lbs.
1-1/2	2	SIC 3	800961	4-3/4	2.2
2	2-1/2	SIC 4	800962	4-3/4	2.4
2-7/16	3	SIC 5	800963	5	4.1
3	3-1/2	SIC 6	800964	5	4.3
3	4	SIC 6A	800965	5	8.3
3-7/16	4	SIC 7	800966	6-3/4	7.3

■Schedule 40 Pipe

COUPLING BOLTS

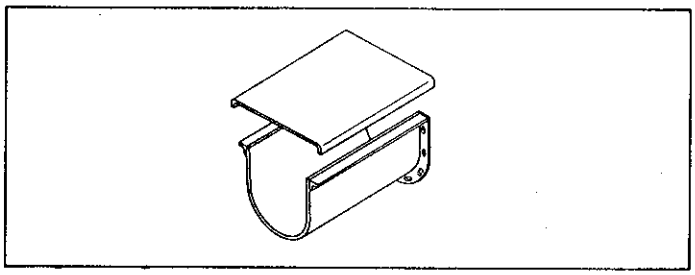


Coupling bolts are manufactured from special-analysis steels. Bolts have short thread length designed especially for use with conveyor screws. Each bolt is furnished with special type lock nut. Bolts are manufactured to close tolerances for perfect fit in coupling bolt holes. They are designed for maximum torque capacities and service life.

Coupling Dia.	Outside Pipe Dia.	Nominal Pipe Size ■	Bolt Size	Part No. Standard	Catalog No. Standard	Part No. High Torque	Catalog No. High Torque	Weight Each Lbs.
1-1/2	2-3/8	2	1/2x3	SCB 3	800971	SCB 3-T	800991	.25
2	2-7/8	2-1/2	5/8x3-5/8	SCB 4	800972	SCB 4-T	800992	.50
2-7/16	3-1/2	3	5/8x4-3/8	SCB 5	800973	SCB 5-T	800993	.56
3	4	3-1/2	3/4x5	SCB 6	800974	SCB6-T	800994	.75
3	4-1/2	4	3/4x5-1/2	SCB 6A	800975	SCB6A-T	800995	.88
3-7/16	4-1/2	4	7/8x5-1/2	SCB 7	800976	SCB7-T	800996	1.25

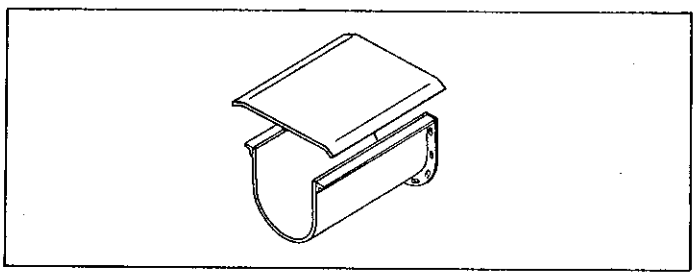
■Schedule 40 Pipe

Covers



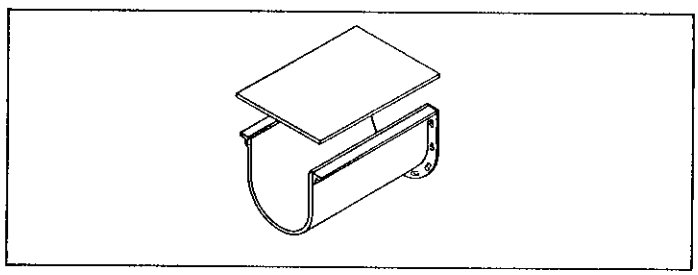
Flanged Covers

Flanged covers provide a limited degree of protection from weather and dust and may be gasketed for more complete protection. They are secured by means of bolts, screw clamps, or toggle clamps. **Spring clamps cannot be used with this cover.**



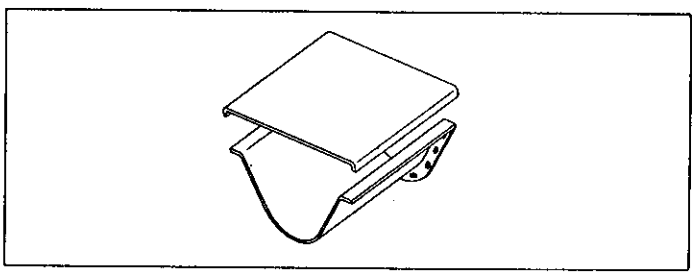
Semi-Flanged Covers

Semi-flanged covers are intended for indoor or general purpose use. Cover edges are slightly flanged to provide more rigidity. A butt-strap is provided at one end which overlaps the succeeding cover section to cover the joint between sections. Covers may be fastened to the trough flange with spring clamps, screw clamps, toggle clamps, or bolts.



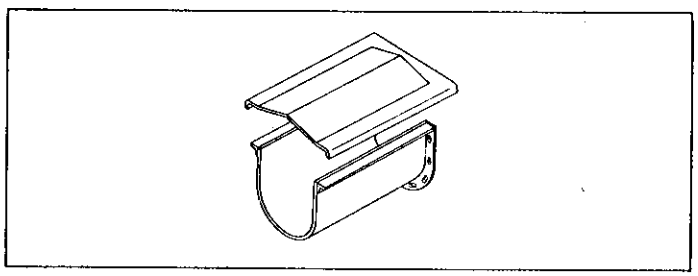
Flat Covers

Flat covers fit flush with the top flanges of the trough. They may be bolted, spring clamped or attached with screw or toggle clamps. Flat covers are intended primarily for indoor applications; they may also be gasketed for moderate dustproof operation.



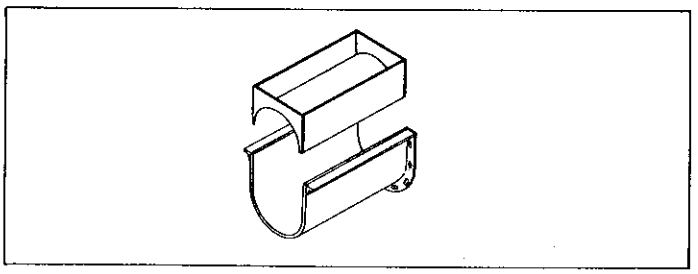
Flared Trough Covers

Standard covers for flared trough are similar to standard flanged covers except that they are fabricated specifically for flared trough. They may be bolted or fastened with screw or toggle clamps. Spring clamps cannot be used with this cover.



Hip Roof Covers

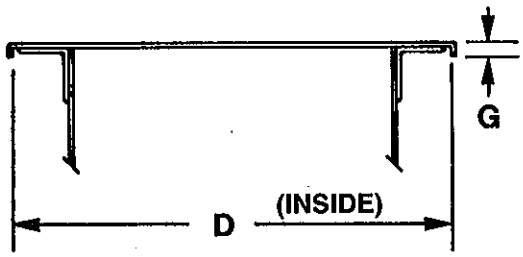
Ridged or hip roof covers are designed for outdoor applications. The center peak of the cover sheds rain or snow. Both sides of the cover are flanged to provide additional weatherproofing. These covers also may be gasketed for complete dustproof or weathertight operation. Covers may be bolted or attached by means of screw or toggle clamps. Spring clamps cannot be used with this cover.



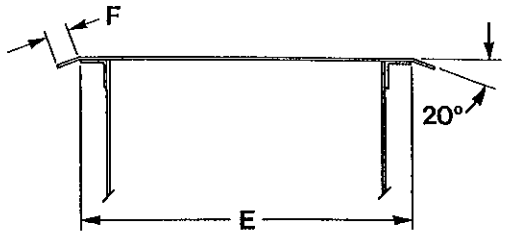
Shroud

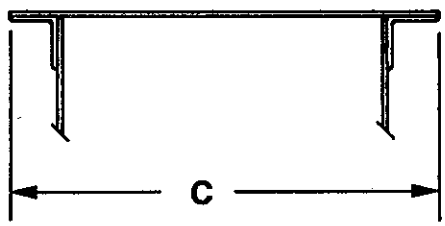
The shroud is designed for use with standard U-trough when a tubular cross section is required. Standard covers frequently are used with the shroud to prevent accumulation of foreign matter or moisture in the pockets formed by the contour of the shroud and the sides of the trough. The shroud is normally used only in feeder applications.

Covers



Standard Flanged



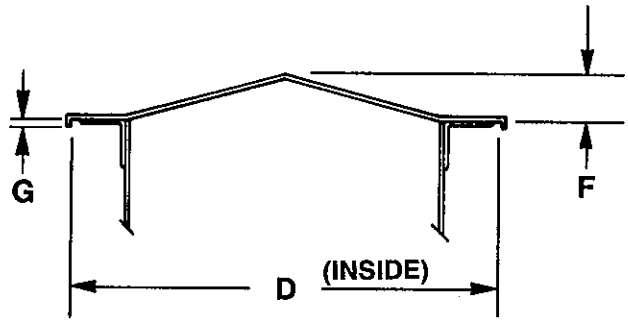


Flat

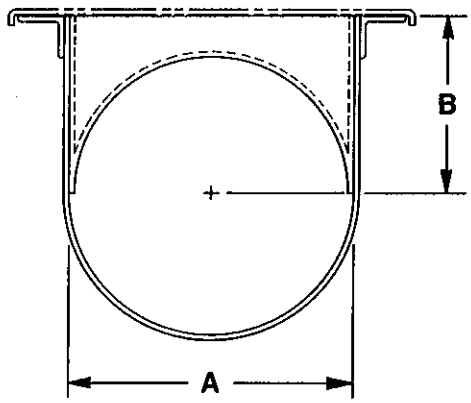
Screw Dia.	Cover Thick.	Flanged Part Number	Flanged Catalog Number	Wt. Std. Len.	Semi-Flanged Part Number	Semi-Flanged Catalog Number	Wt. Std. Len.	Flat* Part Number	Flat* Catalog Number	Wt. Std. Len.	C	D	E	F	G
6	16	6SCF16	804001	24	6SCSF16	804049	24	6SCP16	804031	20	9-3/4	9-7/8	9-3/4	1/2	1/2
9	16	9SCF16	804002	32	9SCSF16	804029	32	9SCP16	804032	30					1/2
	10	9SCF10	804003	72	9SCSF10	804048	72	9SCP10	804033	62	13-3/8	13-1/2	13-3/8	1/2	5/8
12	14	12SCF14	804006	60	12SCSF14	804051	60	12SCP14	804036	54					1/2
	10	12SCF10	804007	109	12SCSF10	804028	109	12SCP10	804037	96	17-1/2	17-5/8	17-1/2	1/2	5/8
14	14	14SCF14	804008	67	14SCSF14	804052	67	14SCP14	804038	60					1/2
	10	14SCF10	804009	120	14SCSF10	804027	120	14SCP10	804039	108	19-1/2	19-5/8	19-1/2	1/2	5/8
16	14	16SCF14	804010	73	16SCSF14	804053	73	16SCP14	804040	66					1/2
	10	16SCF10	804011	132	16SCSF10	804026	132	16SCP10	804041	119	21-1/2	21-5/8	21-1/2	1/2	5/8
18	14	18SCF14	804012	85	18SCSF14	804025	85	18SCP14	804042	76					1/2
	10	18SCF10	804013	149	18SCSF10	804024	149	18SCP10	804043	136	24-1/2	24-5/8	24-1/2	1/2	5/8
20	14	20SCF14	804014	90	20SCSF14	804023	90	20SCP14	804044	84					1/2
	10	20SCF10	804015	161	20SCSF10	804022	161	20SCP10	804045	148	26-1/2	26-5/8	26-1/2	1/2	5/8
24	12	24SCF12	804016	142	24SCSF12	804021	142	24SCP12	804046	132					5/8
	10	24SCF10	804017	182	24SCSF10	804020	182	24SCP10	804047	170	30-1/2	30-5/8	30-1/2	1/2	5/8

STANDARD LENGTHS:
6" Dia. & 9" Dia. = 10'-0"
12" Dia. thru 24" Dia. = 12'-0"
***FLAT COVERS ARE MADE TO ORDER**

Covers



Hip Roof



Shroud

NOTE: Standard shroud length is 2 x screw diameter.

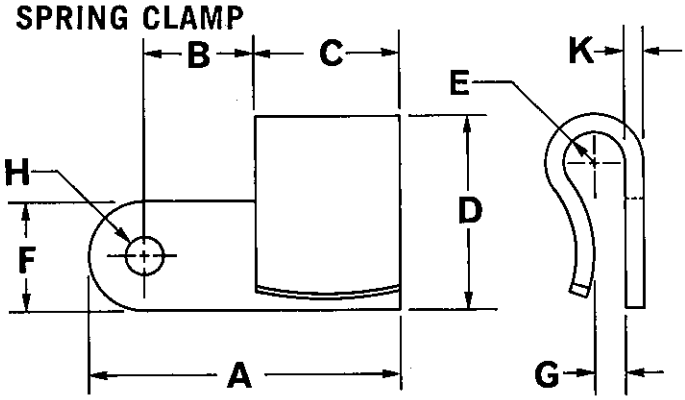
Screw Dia.	Cover Thickness	Hip Roof Part Number	Hip Roof Catalog Number	Hip Roof *Wt. Std. Length	Shroud Part Number	Shroud Catalog Number	Shroud Wt. Per Foot	A	B	D	F	G
6	16	6SCH16	804091	26	6SCO16	804121	4.6	7	4-1/2	10-1/8	1-1/2	1/2
9	16	9SCH16	804092	34	9SCO16	804122	6.3	10	6-1/8	13-3/4	1-3/4	1/2
	10	9SCH10	804093	77	9SCO10	804123	14.4					5/8
12	14	12SCH14	804096	65	12SCO14	804126	10.5	13	7-3/4	17-3/4	2	1/2
	10	12SCH10	804097	116	12SCO10	804127	19.0					5/8
14	14	14SCH14	804098	72	14SCO14	804128	12.0	15	9-1/4	19-3/4	2-1/2	1/2
	10	14SCH10	804099	130	14SCO10	804129	21.6					5/8
16	14	16SCH14	804100	78	16SCO14	804130	14.3	17	10-5/8	21-3/4	3	1/2
	10	16SCH10	804101	142	16SCO10	804131	25.7					5/8
18	14	18SCH14	804102	92	18SCO14	804132	17.9	19	12-1/8	24-3/4	3	1/2
	10	18SCH10	804103	160	18SCO10	804133	30.7					5/8
20	14	20SCH14	804104	100	20SCO14	804134	18.2	21	13-1/2	26-3/4	3	1/2
	10	20SCH10	804105	172	20SCO10	804135	30.2					5/8
24	12	24SCH12	804106	152	24SCO12	804136	28.6	25	16-1/2	30-3/4	3	5/8
	10	24SCH10	804107	196	24SCO10	804137	36.8					5/8

Hip-Roof & Shroud Covers are made to order.

***Hip Roof Cover Standard Lengths:**
6" Dia. & 9" Dia. = 10'-0"
12" Dia. thru 24" Dia. = 12'-0"

Cover Fasteners

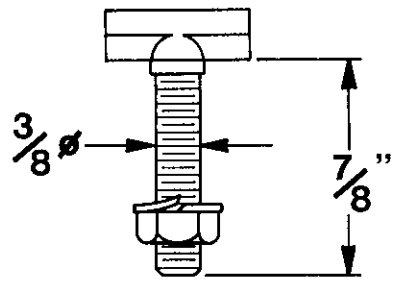
SPRING CLAMP



Goodman Conveyor steel spring clamps are manufactured from heavy-duty steel with precision dies. Clamps are of the pivot type and are attached to the conveyor trough top flange by means of rivets. Designed for attaching flat covers, the spring clamps are adjustable and may be used with covers having rubber or other types of gaskets. Manufactured in right and left hand types.

Cover Ga.	Part Number	Catalog No. L/H	Catalog No. R/H	No. Required Per 10' Section	A	B	C	D	E	F	G	H	K
16 to 12	SFC-1	804191	804190	14	3	1	1-1/4	1-7/8	5/16	15/16	1/4	9/32	1/8

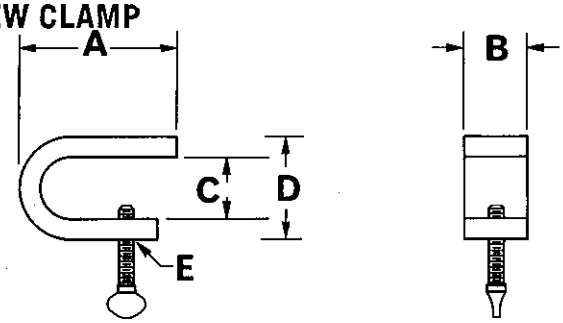
T-HEAD BOLT



Steel T-head bolts are used for fastening the cover to the trough flanges. T-head bolts have an advantage over standard hex-head bolts in that they need not be completely disassembled for cover removal, thereby reducing the possibility of misplacing bolts and nuts. One size only.

Cover Gauge	Catalog Number	No. Req'd Per 10' Sect.
All Sizes	806419	14

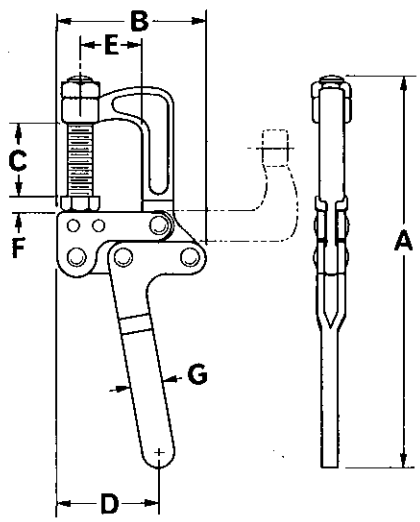
SCREW CLAMP



Steel screw clamps may be used with flanges or flat covers for all conveyor sizes through 24". Screw clamps provide a simple, yet completely secure, means of attaching covers.

Conveyor	Part Number	Catalog Number	Clamp Size	No. Required Per 10' Section	A	B	C	D	E
6-24	SFS-1	804196	1	14	2-3/8	1	1-1/4	1-7/8	1/4

TOGGLE CLAMP



Toggle clamps are designed for attaching covers to conveyors where quick accessibility is required. The toggle clamp is attached by welding the front or top of the base to the conveyor. The hold-down bar moves a full 90° to clear the working area. Adjustable spindle allows adjustment for all conveyor sizes. Plastic coated handle moves 50°. The clamp provides a holding pressure of 800 lbs., yet weighs less than a pound.

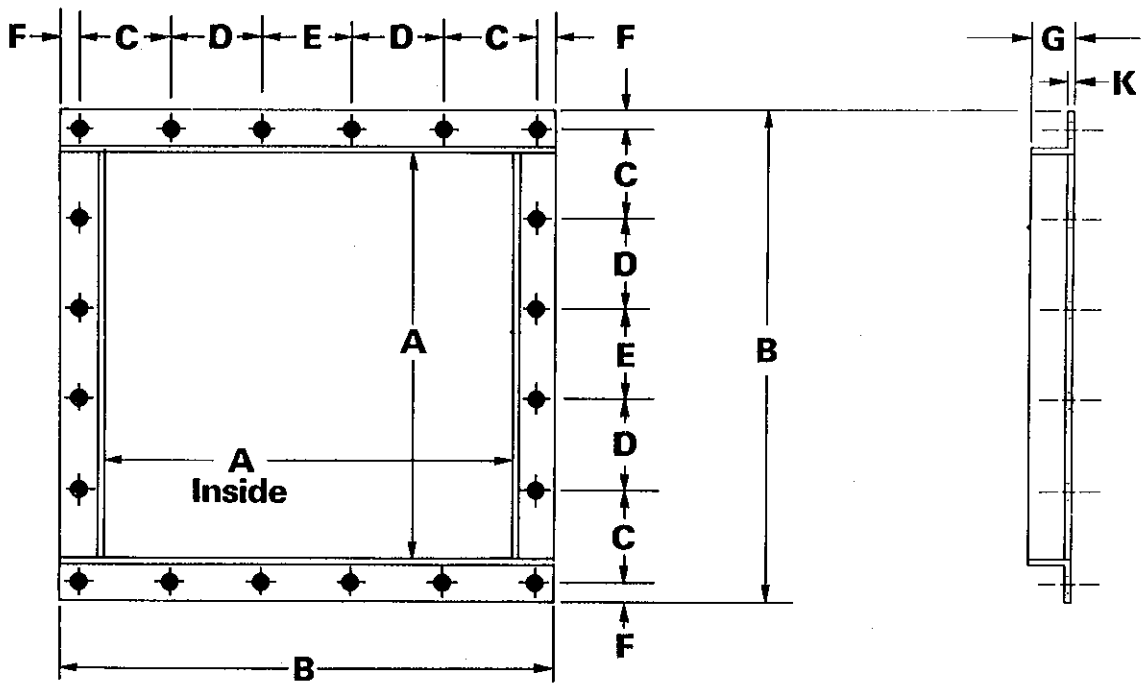
Conveyor	Part Number	Catalog Number	No. Required Per 10' Section	A	B	C	D	E	F	G
6-24	SFT-1	804477	6 to 8	7-13/16	2-15/16	1-25/32	2	1-1/4	5/16	5/8

Inlet

Standard Flanged Conveyor Inlet

The Standard Flanged Conveyor Inlet is designed to be welded to a flat or flanged conveyor cover. The inlet size and bolt drilling arrangement is the same as the standard discharge spout.

Standard Flanged Inlet

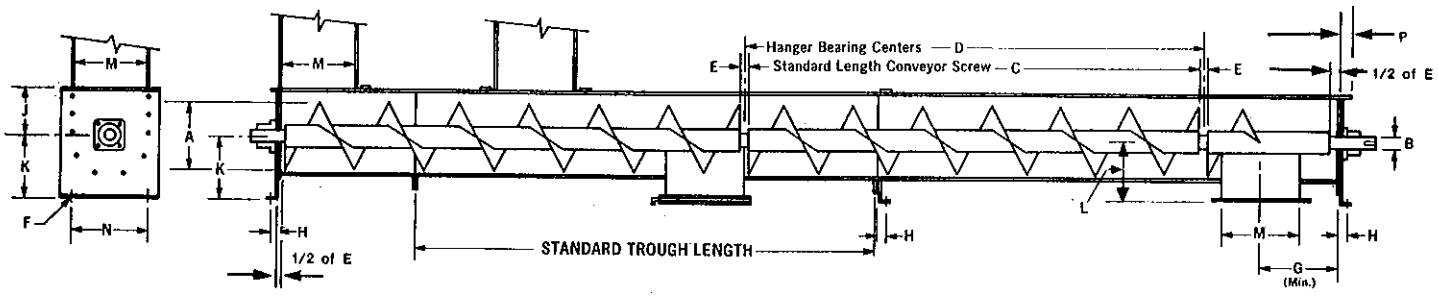


Screw Dia.	Bolts No.	Bolts Dia.	Part Number	Catalog Number	A	B	C	D	E	F	G	K	Wt.
6	12	3/8	6SIA7	804140	7	10	2-13/16		3	11/16	1-1/2	3/16	5.0
9	12	3/8	9SIA7	804141	10	13	4		4	1/2	1-1/2	3/16	6.8
12	12	3/8	12SIA7	804142	13	17	5-1/8		5-1/4	3/4	2	3/16	12.1
14	20	3/8	14SIA7	804143	15	19	3-1/2	3-1/2	3-1/2	3/4	2	3/16	13.7
16	20	3/8	16SIA7	804144	17	21	3-3/4	4	4	3/4	2	3/16	15.3
18	20	1/2	18SIA7	804145	19	24	4-7/16	4-3/8	4-3/8	1	2-1/2	3/16	29.0
20	20	1/2	20SIA7	804146	21	26	4-7/8	4-3/4	4-3/4	1	2-1/2	3/16	31.8
24	20	1/2	24SIA7	804147	25	30	5-5/8	5-5/8	5-1/2	1	2-1/2	3/16	37.2

SUPPLEMENTAL DESIGN & INSTALLATION DATA

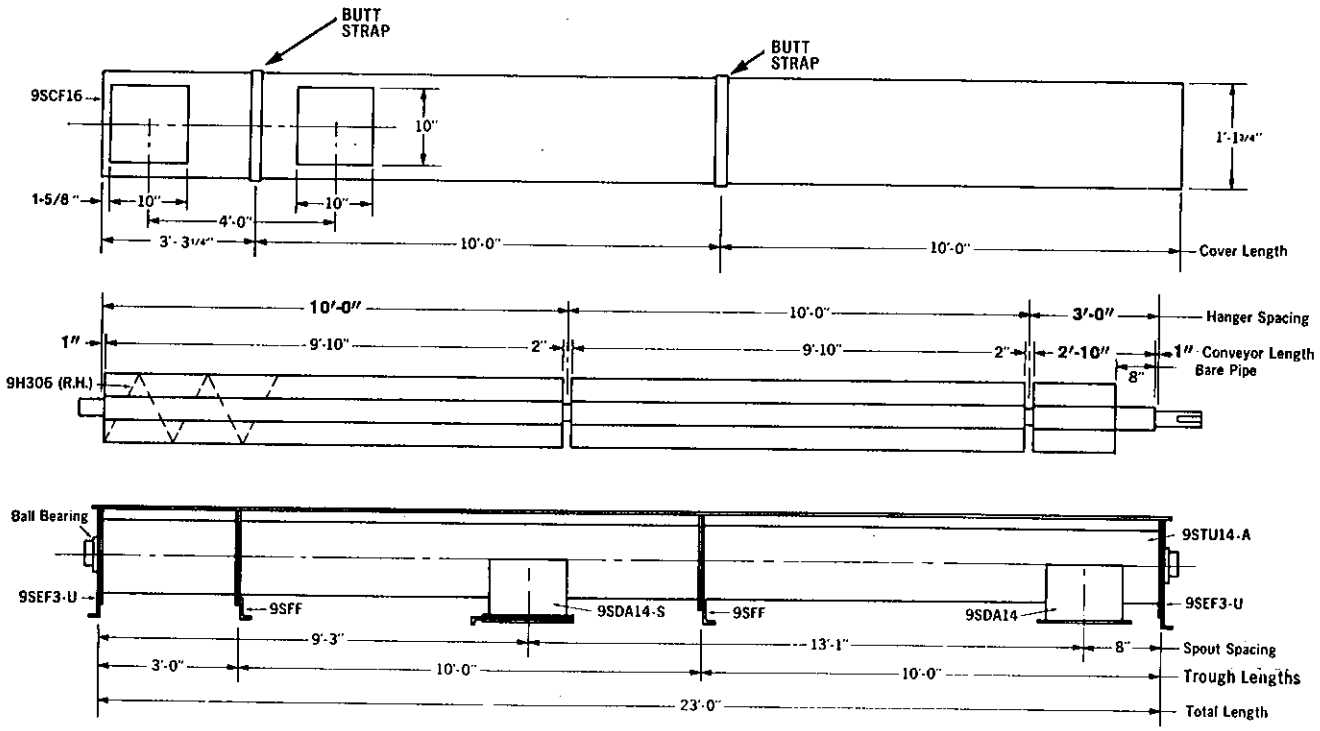
Layout

Trough



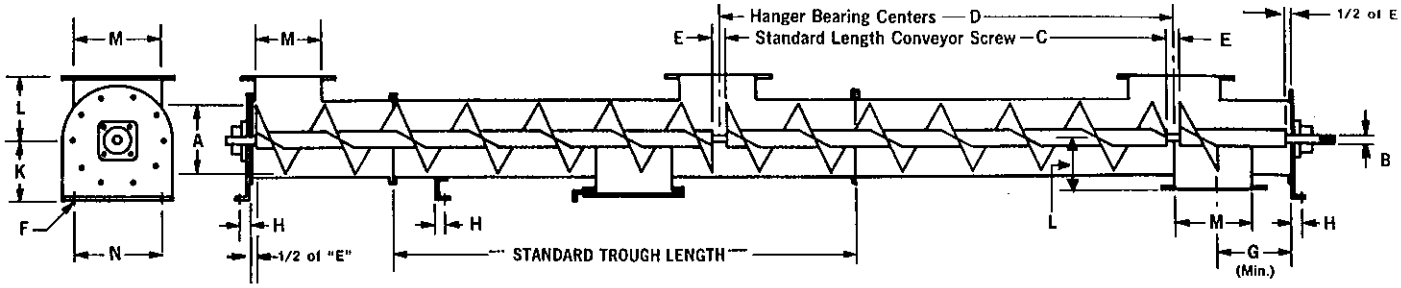
A Screw Dia.	B Coupling Dia.	C Length	D Length	E	F	G [Min.]	H	J	K	L	M	N	P
6	1-1/2	9'-10"	10'-0"	2	3/8	6	1	4-1/2	5-5/8	5	7	8-1/8	1-1/2
9	1-1/2 2	9'-10"	10'-0"	2	1/2	8	1-1/2	6-1/8	7-7/8	7-1/8	10	9-3/8	1-5/8
12	2 2-7/16 3	11'-10" 11'- 9" 11'- 9"	12'-0"	2 3 3	5/8	10-1/2	1-5/8	7-3/4	9-5/8	8-7/8	13	12-1/4	2
14	2-7/16 3	11'- 9"	12'-0"	3	5/8	11-1/2	1-5/8	9-1/4	10-7/8	10-1/8	15	13-1/2	2
16	3	11'- 9"	12'-0"	3	5/8	13-1/2	2	10-5/8	12	11-1/8	17	14-7/8	2-1/2
18	3 3-7/16	11'- 9" 11'- 8"	12'-0"	3 4	5/8	14-1/2	2	12-1/8	13-3/8	12-3/8	19	16	2-1/2
20	3 3-7/16	11'- 9" 11'- 8"	12'-0"	3 4	3/4	15-1/2	2-1/4	13-1/2	15	13-3/8	21	19-1/4	2-1/2
24	3-7/16	11'- 8"	12'-0"	4	3/4	17-1/2	2-1/2	16-1/2	18-1/8	15-3/8	25	20	2-1/2

TYPICAL METHOD OF DETAILING A 9" CONVEYOR



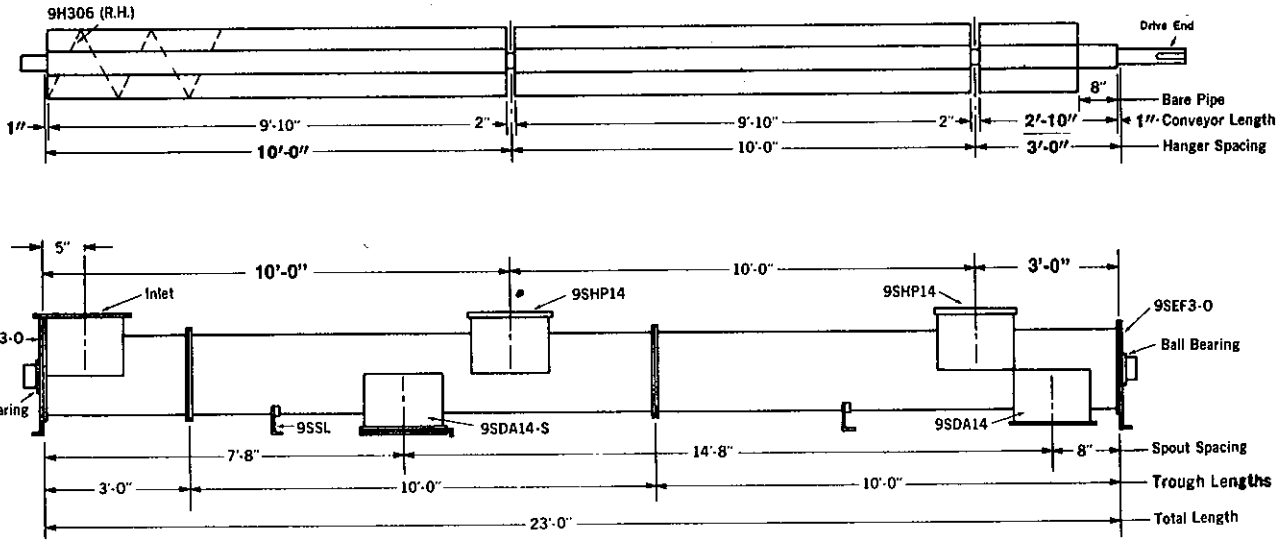
Layout

Tubular Trough



A Screw Dia.	B Coupling Dia.	C Length	D Length	E	F	G (Min.)	H	K	L	M	N
6	1-1/2	9'-10"	10'-0"	2	3/8	6	1	5-5/8	5	7	8-1/8
9	1-1/2 2	9'-10"	10'-0"	2	1/2	8	1-1/2	7-7/8	7-1/8	10	9-3/8
12	2 2-7/16 3	11'-10" 11'- 9" 11'- 9"	12'-0"	2 3 3	5/8	10-1/2	1-5/8	9-5/8	8-7/8	13	12-1/4
14	2-7/16 3	11'- 9"	12'-0"	3	5/8	11-1/2	1-5/8	10-7/8	10-1/8	15	13-1/2
16	3	11'- 9"	12'-0"	3	5/8	13-1/2	2	12	11-1/8	17	14-7/8
18	3 3-7/16	11'- 9" 11'- 8"	12'-0"	3 4	5/8	14-1/2	2	13-3/8	12-3/8	19	16
20	3 3-7/16	11'- 9" 11'- 8"	12'-0"	3 4	3/4	15-1/2	2-1/4	15	13-3/8	21	19-1/4
24	3-7/16	11'- 8"	12'-0"	4	3/4	17-1/2	2-1/2	18-1/8	15-3/8	25	20

TYPICAL METHOD OF DETAILING A 9" CONVEYOR



Bolt Requirements

BOLTS RELATED TO CONVEYOR DIAMETER

Components Assembled	Conveyor Diameter															
	6		9		12		14		16		18		20		24	
	No.	Size	No.	Size	No.	Size	No.	Size	No.	Size	No.	Size	No.	Size	No.	Size
* Covers to Troughs [per std. section]	14	1/4x3/4	14	1/4x3/4	16	1/4x3/4	16	1/4x3/4	16	1/4x3/4	16	1/4x3/4	16	1/4x3/4	16	1/4x3/4
Ends to Trough Flanges																
Std. outside pattern																
U-Trough	6		8		8		8		8		10		10		12	
Flared	6	3/8x3/4	8	3/8x1	10	1/2x1-1/4	10	1/2x1-1/4	10	5/8x1-1/4	10	5/8x1-1/4	12	5/8x1-1/2	12	5/8x1-1/2
Tubular	8		8		8		8		8		10		10		12	
Rectangular	10		10		10		11		13		13		13		16	
Flush Discharge Ends																
U-Trough	6	3/8x3/4	8	3/8x1	8	1/2x1-1/4	8	1/2x1-1/4	10	5/8x1-1/4	10	5/8x1-1/4	10	5/8x1-1/2	12	5/8x1-1/2
Tubular	6		8		8		8		8		10		10		12	
Discharge Ends																
U-Trough & Rectangular	4	3/8x3/4	4	3/8x1	4	1/2x1-1/4	4	1/2x1-1/4	4	5/8x1-1/4	4	5/8x1-1/4	4	5/8x1-1/2	6	5/8x1-1/2
	4		4		4		4		4		4		4		6	
Flanges																
U-Trough	6		8		8		8		8		10		10		12	
Flared	6	3/8x3/4	8	3/8x1	10	1/2x1-1/4	10	1/2x1-1/4	10	5/8x1-1/4	10	5/8x1-1/4	12	5/8x1-1/4	12	5/8x1-1/4
Tubular	8		8		8		8		8		10		10		12	
Rectangular	10		10		10		11		13		13		13		16	
Flange Foot To Trough	2	3/8x1	2	3/8x1-1/4	2	1/2x1-1/2	2	1/2x1-1/2	2	5/8x1-1/2	2	5/8x1-1/2	2	5/8x1-1/2	2	5/8x1-1/2
Saddle to Trough	2	5/16x3/4	2	5/16x3/4	2	3/8x3/4	2	3/8x3/4	2	3/8x3/4	2	1/2x3/4	2	1/2x3/4	2	1/2x3/4

*BOLT SIZE SHOWN IS FOR 16, 14, 12 GA. COVER. USE. ⅜ X 1 BOLT FOR 10 GA. COVER.

BOLTS RELATED TO SHAFT SIZES

Components Assembled	Shaft Diameter									
	1-1/2"		2"		2-7/16"		3"		3-7/16"	
	No.	Size	No.	Size	No.	Size	No.	Size	No.	Size
Bearings [end] to Trough Ends										
Ball, flanged	4	1/2x1-1/2	4		4	5/8x2	4		4	
Ball, discharge	3	1/2x1-1/2	3	5/8x2	3	5/8x2	3	3/4x2-1/2	3	3/4x2-3/4
Babbitt, flanged	4	1/2x2	4		4	5/8x2-1/4	4		4	
Babbitt, disch.	3	1/2x2	3		3	5/8x2-1/4	3		3	
Bearings [thrust] to ends										
Type M	4	1/2x3	4	1/2x3	4	5/8x3	4	3/4x3-1/2	4	3/4x4-1/2
Type H	4	3/4x2-1/4	4	3/4x2-1/4	4	3/4x2-1/4	4	1x3	4	1x3
Seals to ends										
Packed gland seal	4	1/2x1-1/2	4	5/8x2	4	5/8x2	4	3/4x2-1/4	4	3/4x2-1/4
Packed seal housing [ball bearing]	4	1/2x3	4	5/8x3-1/2	4	5/8x3-1/2	4	3/4x3-1/2	4	3/4x4-1/2
Split gland seal	2	1/2x2	2	1/2x2	2	5/8x2	2	5/8x2	2	5/8x2

Hanger Bolts

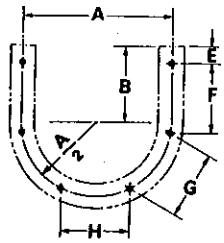
HANGER BOLTS

Hanger Size		Hanger Number									
Screw Dia.	Shaft Dia.	30		99A		216		216D		220	
		No.	Size	No.	Size	No.	Size	No.	Size	No.	Size
6	1-1/2	3	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1
9	1-1/2 2	3	1/2x1	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1
12	2 2-7/16 3	3	1/2x1-1/4 1/2x1-1/4 5/8x1-1/2	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4
14	2-7/16 3	3	5/8x1-1/2	4	1/2x1-1/4	4	1/2x1-1/2	4	1/2x1-1/2	4	1/2x1-1/2
16	3	3	5/8x1-1/2	4	1/2x1-1/2	4	1/2x1-1/2	4	1/2x1-1/2	4	1/2x1-1/2
18	3	3	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2
20	3 3-7/16	3	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2
24	3-7/16	3	3/4x2	4	5/8x2	4	5/8x2	4	5/8x2	4	5/8x2

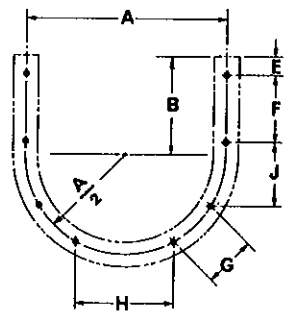
Hanger Size		Hanger Number									
Screw Dia.	Shaft Dia.	226		230		316		326		Air-Swept	
		No.	Size	No.	Size	No.	Size	No.	Size	No.	Size
6	1-1/2	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1
9	1-1/2 2	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1	4	3/8x1
12	2 2-7/16 3	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4
14	2-7/16 3	4	1/2x1-1/2	4	1/2x1-1/2	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4
16	3	4	1/2x1-1/2	4	1/2x1-1/2	4	1/2x1-1/4	4	1/2x1-1/4	4	1/2x1-1/4
18	3	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2
20	3 3-7/16	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2	4	5/8x1-1/2
24	3-7/16	4	5/8x2	4	5/8x2	4	5/8x2	4	5/8x2	4	5/8x2

Bolt Patterns

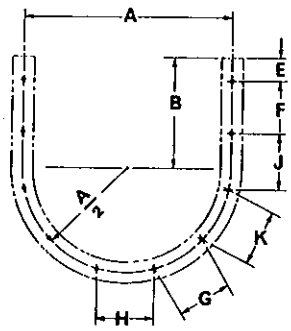
U-Trough End Flanges



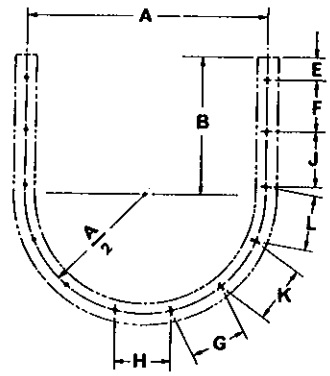
6 Bolts



8 Bolts



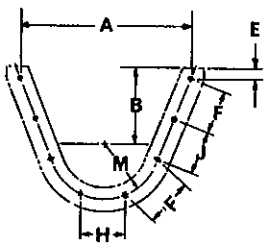
10 Bolts



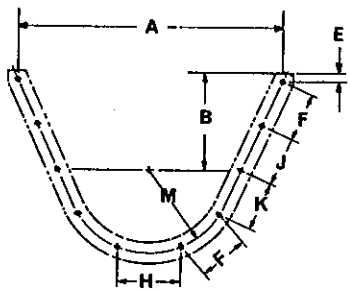
12 Bolts

Screw Dia.	Bolts No.	Bolts Dia.	A	B	E	F	G	H	J	K	L
6	6	3/8	8-7/8	4-1/2	1-1/32	4-1/8	4-1/16	4-1/16			
9	8	3/8	12-1/2	6-1/8	1-3/16	4-1/8	3-3/4	5-1/8	4-1/8		
12	8	1/2	15-7/8	7-3/4	1-1/2	5-5/16	4-1/16	7-3/4	5-3/16		
14	8	1/2	17-7/8	9-1/4	2-17/32	5-5/8	5-15/16	6	5-15/16		
16	8	5/8	20	10-5/8	2-5/8	6-3/8	6-5/8	7-1/2	6-5/8		
18	10	5/8	22	12-1/8	2-23/32	5-15/16	5-7/8	5-7/8	5-7/8	5-7/8	
20	10	5/8	24-3/8	13-1/2	2-25/32	6-1/4	6-11/16	6-11/16	6-11/16	6-11/16	
24	12	5/8	28-1/2	16-1/2	2-25/32	6-1/8	6-5/8	6-5/8	6-5/8	6-5/8	6-5/8

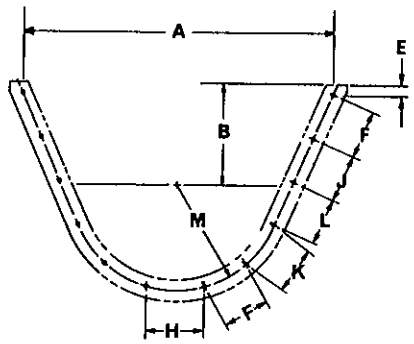
Flared Trough End Flanges



8 Bolts



10 Bolts

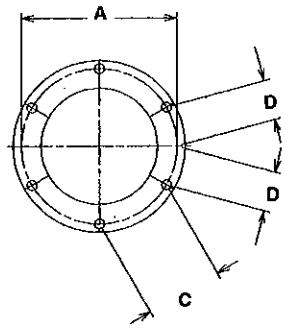


12 Bolts

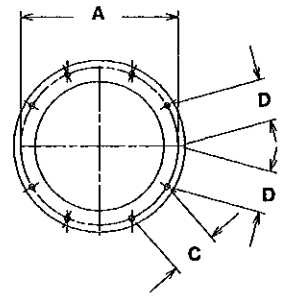
Screw Dia.	Bolts No.	Bolts Dia.	A	B	E	F	H	J	K	L	M
6	8	3/8	14-3/8	7	1-27/32	5-1/4	4-1/16				4-7/16
9	8	3/8	19-3/8	9	1-11/16	5	5-1/8	5			6-1/4
12	10	1/2	23-5/8	10	1-13/16	5-3/4	7-3/4	5-3/4			7-15/16
14	10	1/2	25-1/2	11	2-1/16	5-1/8	6	5-1/8			8-15/16
16	10	5/8	29-5/8	11-1/2	2-1/4	5-1/2	7-1/2	5-1/2	5-1/2		10
18	10	5/8	32	12-1/8	2-5/8	6-3/16	5-7/8	6-3/16	6-3/16		11
20	10	5/8	35-5/8	13-1/2	2-9/32	7	6-11/16	7	7		12-3/16
24	12	5/8	41-7/8	16-1/2	2-5/16	6-7/8	6-5/8	6-7/8	6-7/8	6-7/8	14-1/4

Bolt Patterns

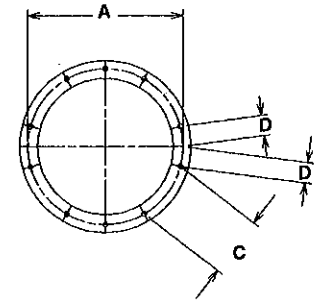
Tubular Housing End Flanges



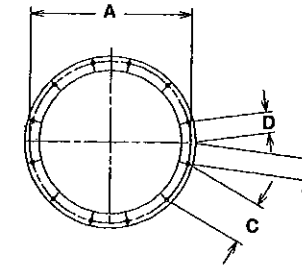
6 Bolts



8 Bolts



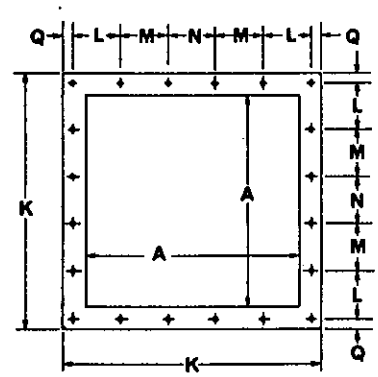
10 Bolts



12 Bolts

Screw Dia.	Bolts		A	C	D
	No.	Dia.			
6	6	3/8	8-7/8	4-7/16	2-7/32
9	8	3/8	12-1/2	4-13/16	2-13/32
12	8	1/2	15-7/8	6-1/16	3-1/32
14	8	1/2	17-7/8	6-13/16	3-13/32
16	8	5/8	20	7-5/8	3-13/16
18	10	5/8	22	6-13/16	3-13/32
20	10	5/8	24-3/8	7-1/2	3-3/4
24	12	5/8	28-1/2	7-3/8	3-11/16

Discharge Spout



12 Bolts/20 Bolts

Screw Dia.	Bolts		A	K	L	M	N	Q
	No.	Dia.						
6	12	3/8	7	10	2-13/16		3	11/16
9	12	3/8	10	13	4		4	1/2
12	12	3/8	13	17-1/4	5-1/8		5-1/4	7/8
14	20	3/8	15	19-1/4	3-1/2	3-1/2	3-1/2	7/8
16	20	3/8	17	21-1/4	3-3/4	4	4	7/8
18	20	1/2	19	24-1/4	4-7/16	4-3/8	4-3/8	1-1/8
20	20	1/2	21	26-1/4	4-7/8	4-3/4	4-3/4	1-1/8
24	20	1/2	25	30-1/4	5-5/8	5-5/8	5-1/2	1-1/8

Safety, Installation and Maintenance Instructions

Screw conveyors may be ordered by individual components, with all assembly operations performed in the field. Or we can assemble all components completely and supply drawings and material list.

In the latter case, long conveyors are separated into convenient shipping lengths and match-marked for proper reassembly.

Factory assembled screw conveyors are furnished with all required nuts and bolts **except** anchor bolts.

When individual parts are ordered for complete field assembly, nuts and bolts are **not** furnished unless ordered.

The installation instructions should be adequate for complete field assembly of individual components. They should also be reviewed for assistance in the proper installation of factory-assembled units and installation of replacement components.

The safety section must be reviewed before actual startup of the screw conveyor. See page 2.

Receiving and Inspection

Immediately upon receipt, all conveyor units and components should be checked against shipping papers for shortages and inspected for any damage. In the event of shortage or damage, a claim should be filed promptly with the carrier.

Assembly

Place conveyor troughs in correct order, with discharge spouts and inlets properly located. Connect trough end flanges loosely; do not tighten bolts. Align trough bottom center lines, using the piano wire technique (or similar method). Tighten anchor and flange bolts.

1. Begin assembly of the conveyor screws at the discharge end (or fixed shaft end).
2. If shaft seal units are provided for the conveyor end plate, slightly oil the shaft and carefully slide the seal assembly onto the thrust bearing shaft. Check seal instructions or drawings to be certain that the seal is facing the proper direction.
3. Bolt thrust bearing assembly, with shaft and seal unit if required, to conveyor end plate (discharge end). Where the screw conveyor drive shaft is part of the reducer assembly, mount the reducer assembly into position as with the thrust bearing assembly.
4. Install the discharge conveyor screw section by slipping it onto the drive shaft. Insert coupling bolts and tighten nuts.

Note: Flight-supporting end lugs must be opposite the conveying side of the flight.

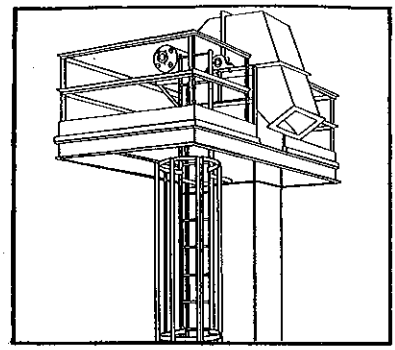
5. Insert a coupling shaft into the opposite end of the conveyor screw and secure with coupling bolts and nuts.
6. Slide hanger bearing on coupling shaft to within approximately 1/16" of screw conveyor pipe and clamp hanger top lightly to trough on both sides with C-clamps.
7. Continue assembly of remaining conveyor screws, couplings and temporary clamping of hangers as described above. During assembly, each conveyor screw section should be rotated so that the end flight is approximately 180 degrees from the adjacent conveyor end flight.
8. When all conveyor screws and hangers are in place, assemble the end shaft with required bearing or drive. Do not secure shaft with set screws furnished with bearings or drive.
9. If a seal is required, see Step 2.
10. Insert shaft through conveyor end plate into conveyor screw. Bolt drive or bearing to end plate. Secure end shaft to conveyor with coupling bolts and nuts.
11. Return to the first conveyor hanger installed at the thrust end. Remove any slack due to manufacturing tolerances from the conveyor screws and couplings by pulling the second conveyor screw section away from the thrust end.
12. Gently strike the hanger bearing top to position the screw for proper clearance from the trough bottom. Move the bearing away from the thrust end until it has only running clearance (1/16") from the second conveyor screw.
13. Tighten clamps securely and drill necessary hanger mounting holes in trough, using the hanger as a drill template. Determine the proper hole size from the hanger mounting holes.
14. Bolt hanger tightly and remove clamps. For inside mounted hangers, bolts should be installed with heads on inside of trough (nuts outside). For top mounted hangers, bolts should be installed with heads on top and extended down through the trough flange.
15. Repeat Steps 11 through 14 for each successive hanger bearing, progressing away from the thrust (discharge) end.
16. It is not necessary to tighten set screws or other securing devices between the shaft and bearing in drive opposite the thrust (discharge) end.
17. Rotate the conveyor by hand to check for free rotation. If any binding occurs, check hanger and end bearings by loosening mounting bolts. Realign bearings where necessary and tighten all bolts.

Initial Starting

1. After locking off power, check conveyor and drive for proper lubrication.
2. After locking off power, turn drive unit by hand to check for alignment and obstructions.
3. Once conveyor and drive turn freely, momentarily start the motor for a few revolutions and check for proper screw rotation. (Review safety procedures before startup, see Page 4).
4. Start unit and operate empty for a few minutes to check for unusual noise, vibrations or loose fasteners.
5. When unit is operating smoothly, begin conveying the material and check system for proper operation.

Routine Inspection and Maintenance

1. Periodic inspection should be made of the following components to plan replacement before unexpected failure occurs during operation.
   a. All internal and external bearings for wear of bearing or shaft.
   b. Flight edge thickness for wear or damage.
   c. Coupling bolts at drive shaft. Remove and inspect bolt and hole for wear.
   d. All coupling bolts and nuts for external wear or loss.
   e. Seals for leakage.
   f. Bearing, flange and cover bolts for loose or missing nuts.
   g. Gasketed joints for leakage.
2. Several types of bearings may be used on screw conveyors, some of which require periodic lubrication. Frequency of lubrication varies depending upon material being conveyed, temperature, speed and operating time.
   a. Ball bearings in hangers, or at tail end or discharge end, are furnished with grease fittings (for periodic lubrication).
   b. Roller bearings, when used on conveyor ends for drive or thrust loads, should be routinely lubricated. Over-greasing may cause seal damage and early failure.
   c. The following bearing material may or may not require lubrication, depending on application: babbitt, bronze, graphite-impregnated phenolic, hard-iron, hard-surfaced bearings, oil or graphite-impregnated bronze, oil-impregnated wood, Nylon, Teflon.



Standard Bucket Elevators

To obtain a more efficient elevator we are furnishing industry standard chains, or using readily available multiple ply all synthetic carcass belting, increasing speeds where applicable and eliminating unnecessary duplication of elevator sizes.

The purpose of a bucket elevator is to lift material from one level to another and discharge it into a chute or container. This is accomplished by buckets that are attached to and lifted by a belt or chain arrangement.

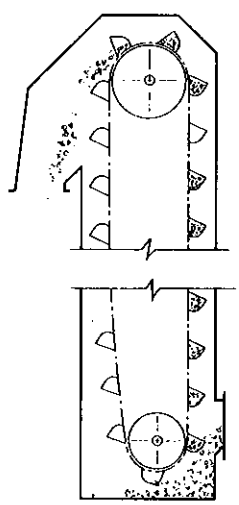
Bucket elevators are comprised of three main assemblies: head terminal, boot terminal, and intermediate sections complete with components.

The **head** is the top section of the elevator and contains the head shaft, shaft seal, bearings, discharge chute, adjustable throat plate and drive assembly. The drive assembly could be either a shaft-mounted reducer or coupled gear motor reducer. Other drives can be used but these are the most common.

The **boot** is the section anchored to the foundation that supports the rest of the structure. It contains the foot shaft, the feed chute or loading leg, the take-ups (internal gravity or screw type) and if necessary, a curved bottom plate.

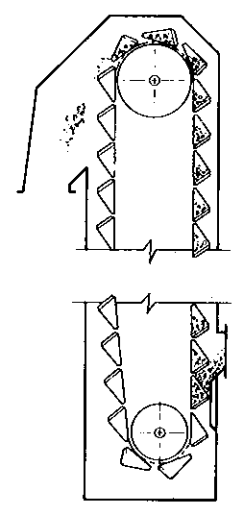
The sections between the head and boot are called the **intermediate** sections. The standard intermediate section is 12 ft. long. The required elevator height would be obtained by using a head, a boot, and the correct amount of intermediate sections, whether it be standard or odd lengths.

Goodman Conveyor Standard Elevators are designed to cover practically every need in elevating loose bulk, material. For every material there is a choice of one or more types and sizes which will serve.
Should there be any doubt in selecting the type elevator, our engineers will gladly assist you in selecting the proper unit. Selection of a Standard Elevator insures lower cost and more prompt delivery as it is constructed of standard parts.



Centrifugal Discharge

Centrifugal discharge bucket elevators can have buckets mounted at intervals on chain or on belt. This type of elevator is used to handle bulk materials which can be picked up by the spaced buckets as they pass under the foot wheel and discharged by centrifugal force as the buckets pass over the head wheel.
See Type CDC and CDB Elevators on pages 112, 113, 114 and 115.



Continuous Bucket

Continuous bucket elevators have buckets mounted continuously on chain or on belt. The material is directed to the buckets through a loading led and is discharged over the face of the preceding bucket while passing around the headwheel. These elevators may be used to handle the same kinds of material as the certrifugal type, however, they are recommended especially for handing materials that are difficult to pick up in a boot, or friable materials. See Type CEC and CEB Elevators listed on pages 116, 117, 118 and 119.

Type CDC Bucket Elevators

Chain Mounted Style AA Buckets — Centrifugal Discharge

Elevator Number	Maximum Size Pieces		(2) Rated Capacity In Cubic Feet Per Hr. (CFH)	Rated Capacity				Max Centers				Buckets		Chain		Motor Horsepower For Various Wt of Mat'l (3)			
				Tons Per Hour Material Weighing (2)				In Feet for Material Weighing				Style AA M. Iron		Chain Number	Speed In Feet Per Min.	For Max Ctrs			
				Lbs Per Cu Ft				Lbs Per Cu Ft								Lbs Per Cu Ft			
	Uniform Size	10% of Whole (1)		25	50	75	100	25	50	75	100	Size	Spacing Ins.			25	50	75	100
CDC-64	½	2½	292	3.7	7.3	11.0	14.6	90	90	90	90	6 x 4	13	C188M	235	2	3	3	5
CDC-85	¾	3	596	7.5	14.9	22.4	29.8	80	80	80	80	8 x 5	16	C102BM	260	3	5	5	7½
CDC-106	1	3½	1044	13.1	26.1	39.2	52.2	100	100	100	100	10 x 6	16	C102BM	260	5	7½	10	15
CDC-127	1¼	4	1702	21.3	42.6	63.8	85.1	100	100	*90	*80	12 x 7	16	C102BM	260	5	10	15	15
CDC-147	1¼	4	2034	25.4	50.9	76.3	101.7	100	100	100	100	14 x 7	18	6110MB	300	7½	15	20	25
CDC-168	1½	4½	3051	38.1	76.3	114.4	152.6	100	100	*95	*80	16 x 8	18	6110MB	300	10	20	25	25

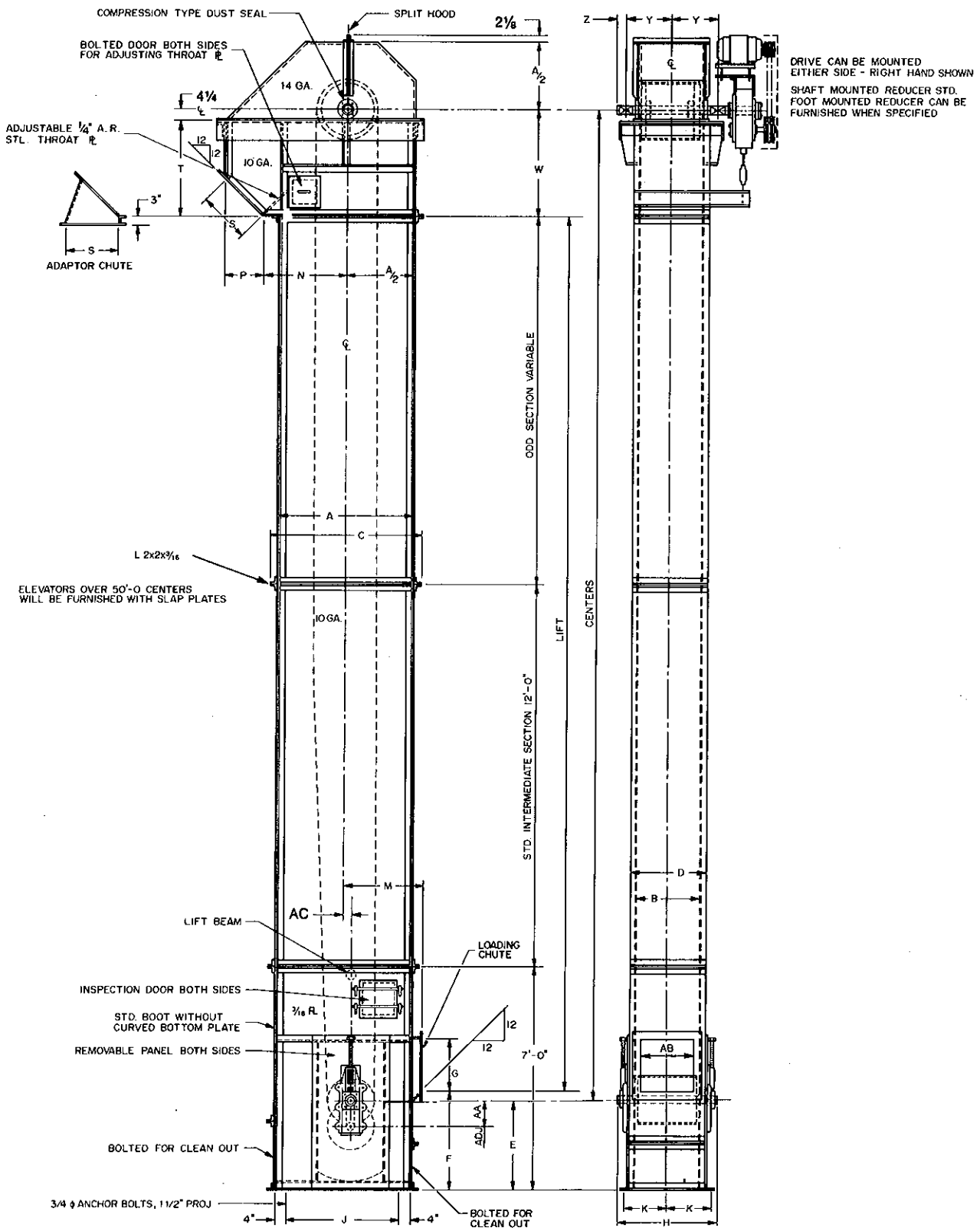
Elevator Number	Head Shaft				Boot (7)		Casing	Shipping Weight Lbs. (5)			
	Diam. Shaft	Brg. Size (6)	No. of Teeth/ P.D. Spkt.	R.P.M.	Diam. Shaft	No. of Teeth/ P.D. Spkt.	Number	Head & Boot Sections		Intermediate Sections	
								Machinery (4)	Casing	Chain & Bkts Per Ft.	Casing Per Ft.
CDC-65	2 7/16	2 7/16	24T/19.95	45.	1 7/16	18T/15.02	36x12	384	1460	7.09	60
CDC-85	2 15/16	2 15/16	19T/24.26	41.	1 15/16	14T/17.94	42x12	716	1650	12.66	66
CDC-106	3 7/16	3 7/16	19T/24.26	41.	1 15/16	14T/17.94	48x14	823	1885	15.75	74
CDC-127	3 7/16	3 7/16	19T/24.26	41.	1 15/16	14T/17.94	48x16	1037	1950	19.68	76
CDC-147	3 15/16	3 15/16	16T/30.71	37.3	2 7/16	11T/21.27	54x18	1314	2190	21.02	84
CDC-168	4 7/16	3 15/16	16T/30.71	37.3	2 7/16	11T/21.27	54x20	1456	2250	24.67	86

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes sprockets, bearings, shafts and chain & buckets for head and boot sections.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x chain & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up can be furnished when specified.
*(8) Limited by chain rated working value. For larger elevator centers, other chains and casings are available.
(9) Shaft dia. based on 100 PCF material and max. centers.
All dimensions in inches unless noted.

Combination Chains have Cast Block Links & Steel Connecting Side Bars and Pins Steel Knuckle Chain is Fab. of Steel	Type Chain	Chain No.	Pitch	Avg. U.S. Lbs.	Rated Working Value, Lbs.	Wt. Per Ft/ Atch. No./Spa.
	Combination	C188M	2.609	14,000	2,000	4.23/K2/5
	Combination	C102BM	4	24,000	4,000	7.0/K2/4
	Steel Knuckle	6110MB	6	40,000	6,300	7.1/K2/3

Dimensions subject to change, use certified prints for construction.

Elevator Number	A	B	C	D	E	F	G	H	J	K	M	N	P	S	T	W	Y	Z	AA	AB	AC
CDC- 64	36	12	40¼	16½	28⅞	31	16	24½	28	8	21	24	8½	12	33	37⅛	9⅞	2⅜	6⅛	4	2¼
CDC- 85	42	12	46¼	16½	30¾	31	16	25½	34	8	24	27	11 5/16	16	33	37⅛	10	2⅝	8	6	3¼
CDC-106	48	14	52¼	18½	30¾	31	16	27½	40	9	27	30	11 5/16	16	36	40¼	11⅛	2⅞	8	8	3½
CDC-127	48	16	52¼	20½	30¾	31	16	29½	40	10	27	30	11 5/16	16	36	40¼	12⅛	2⅞	8	10	3½
CDC-147	54	18	58¼	22½	33¾	32	19	32¾	46	11	30	33	14⅛	20	36	40¼	13⅜	3¼	10	12	5
CDC-168	54	20	58¼	24½	33¾	32	19	34¾	46	12	30	33	14⅛	20	36	40¼	14⅜	3¼	10	14	5



Type CDB Bucket Elevators

Belt Mounted, Style AA Bucket — — Centrifugal Discharge

Elevator Number	Maximum Size Pieces		Rated Capacity (2) In Cubic Feet Per Hr. (CFH)	Rated Capacity				Max Centers				Buckets		Belt		Motor Horsepower For Various Wt of Mat'ls (3)			
				Tons Per Hour Material Weighing (2)				In Feet for Material Weighing				Style AA M. Iron		Width Min PIW at Max Ctrs & 100 PCF Mat'l	Speed In Feet Per Min.	For Max Ctrs			
				Lbs Per Cu Ft				Lbs Per Cu Ft								Lbs Per Cu Ft			
	Uniform Size	10% of Whole (1)		25	50	75	100	25	50	75	100	Size	Spacing			25	50	75	100
CDB-64	½	2½	292	3.7	7.3	11.0	14.6	90	90	90	90	6 x 4	13	7/117	235	2	3	3	5
CDB-85	¾	3	596	7.5	14.9	22.4	29.8	90	90	90	90	8 x 5	16	9/150	260	3	5	5	7½
CDB-106	1	3½	1044	13.1	26.1	39.2	52.2	100	100	100	100	10 x 6	16	11/207	260	5	7½	10	15
CDB-127	1¼	4	1702	21.3	42.6	63.8	85.1	100	100	100	100	12 x 7	16	13/261	260	7½	10	15	20
CDB-147	1¼	4	2034	25.4	50.9	76.3	101.7	100	100	100	100	14 x 7	18	15/246	300	7½	15	20	25
CDB-168	1½	4½	3051	38.1	76.3	114.4	152.6	100	100	100	100	16 x 8	18	18/279	300	10	20	25	30

Elevator Number	Head Shaft					Boot (7)			Casing	Shipping Weight Lbs. (5)			
	Diam. Shaft	Brg. Size (6)	RPM	Pulley		Slated Pulley			Number	Head & Boot Sections		Intermediate Sections	
				Dia. Incl. Lagging	Face	Dia. Shaft	Dia.	Face		Machinery (4)	Casing	Belt & Bucket Per Ft	Casing Per Ft.
CDB-64	2 7/16	2 7/16	43.8	20½	10	1 7/16	16	10	36 x 12	395	1460	4.16	60
CDB-85	2 15/16	2 15/16	40.5	24½	12	1 15/16	18	12	42 x 14	585	1710	7.26	68
CDB-106	2 15/16	2 15/16	40.5	24½	14	1 15/16	18	14	48 x 16	761	1950	10.95	76
CDB-127	3 7/16	3 7/16	40.5	24½	16	1 15/16	18	16	48 x 18	1056	2010	15.6	78
CDB-147	3 7/16	3 7/16	37.6	30½	18	2 7/16	20	18	54 x 20	1377	2250	17.3	86
CDB-168	3 15/16	3 15/16	37.6	30½	20	2 7/16	20	20	54 x 22	1606	2320	21.67	88

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes pulleys, bearings, shafts, belt and buckets for head and boot sections.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x belt & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up can be furnished when specified.
*(8) Shaft dia. based on 100 PCF and max. centers.
All dimensions in inches unless noted.

BELT DATA

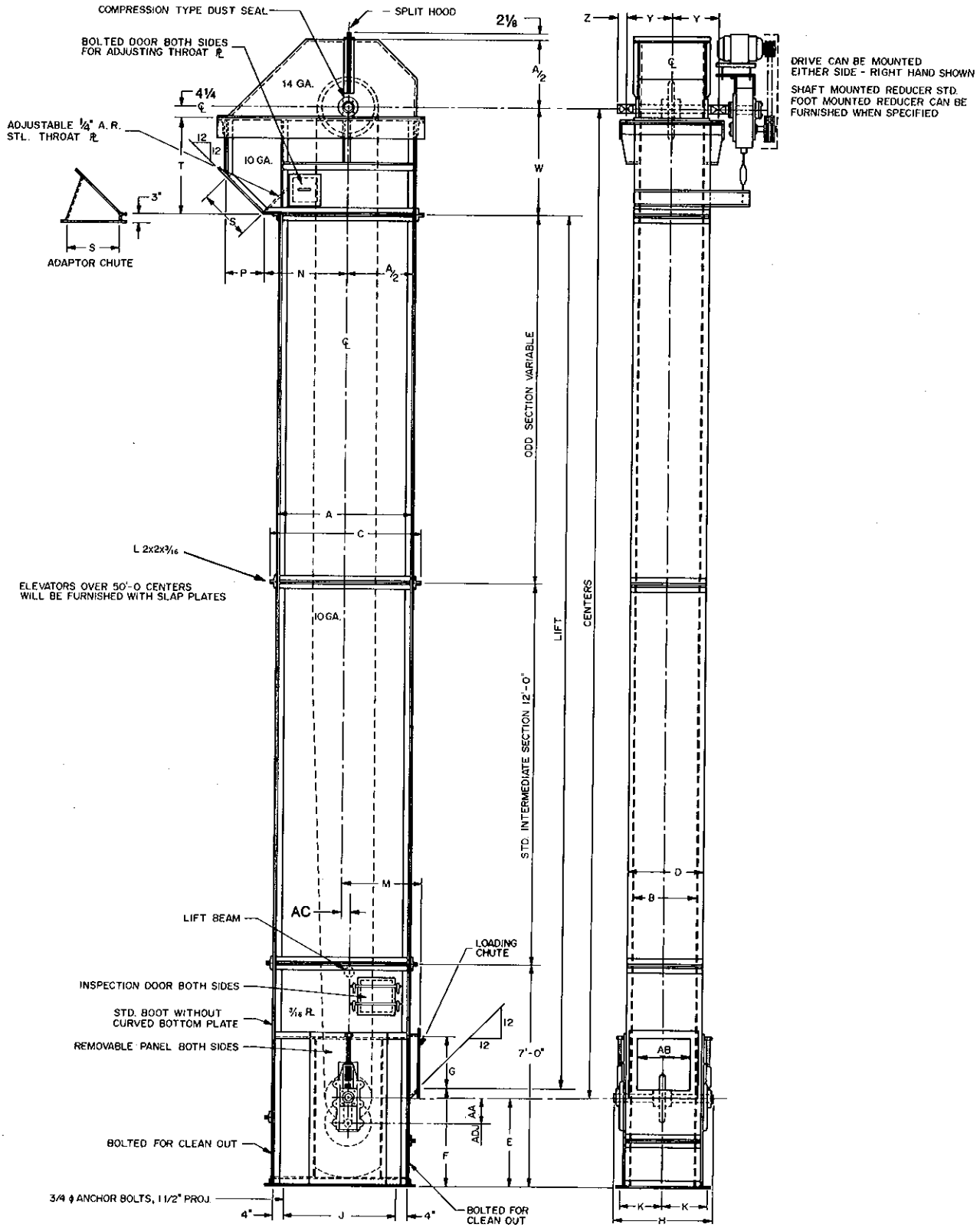
* Centrifugal Bucket Projection	Multi-Ply Type/No. Plies	PVC Type	Allow. Ten. PIW		Wt Lb/In. Width (Lineal Foot)	
			Multi-Ply	PVC	Plyon	PVC
4	220/2	2000	160	150	.175	.16
5	220/2	2500	160	235	.175	.17
6	220/2	3500	160	270	.175	.18
7	330/3	4000	240	310	.20	.19
8	440/4	5000	320	385	.225	.21

BELT NOTES:
PVC WTS WITH HVY. COVERS
MULTI-PLY WTS. WITH 1/8 x 1/16 COVERS
ADD .017 #/IN PER 1/32 COVER THK.

*ACTUAL PIW REQUIREMENT MAY DICTATE STRONGER BELT.

Dimensions subject to change, use certified prints for construction.

Elevator Number	A	B	C	D	E	F	G	H	J	K	M	N	P	S	T	W	Y	Z	AA	AB	AC
CDB- 64	36	12	40¼	16½	28⅞	31	16	24½	28	8	21	24	8½	12	33	37¼	9⅞	2⅛	6⅛	4	2¼
CDB- 85	42	14	46¼	18½	30¾	31	16	27½	34	9	24	27	11 5/16	16	33	37¼	11⅛	2⅝	8	6	3¼
CDB-106	48	16	52¼	20½	30¾	31	16	29½	40	10	27	30	11 5/16	16	36	40¼	12⅛	2⅝	8	8	3½
CDB-127	48	18	52¼	22½	30¾	31	16	32¾	40	11	27	30	11 5/16	16	36	40¼	13⅜	2⅞	10	10	3½
CDB-147	54	20	58¼	24½	33¾	32	19	34¾	46	12	30	33	14⅛	20	36	40¼	14⅜	2⅞	10	10	5
CDB-168	54	22	58¼	26½	33¾	32	19	36¾	46	13	30	33	14⅛	20	36	40¼	15⅜	3¼	10	12	5



Type CEC Bucket Elevators

Chain Mounted, Style D Buckets — continuous discharge

Elevator Number	Maximum Size Pieces		(2) Rated Capacity in Cubic Feet Per Hr. (CFH)	Rated Capacity				Max Centers				Buckets		Chain		Motor Horsepower For Various Wt of Mat'l (3)			
				Tons Per Hour Material Weighing (2)				In Feet For Material Weighing				Style D 10 GA		Chain Number	Speed In Feet Per Min.	For Max Ctrs			
	Uniform Size	10% of Whole (1)		Lbs Per Cu Ft				Lbs Per Cu Ft				Size	Spacing			Lbs Per Cu Ft			
				25	50	75	100	25	50	75	100					25	50	75	100
CEC-85	¾	2½	633	7.9	15.8	23.7	31.6	90	90	90	90	8x5x 7¾	8	C102BM	125	2	3	5	7½
CEC-105	¾	2½	759	9.5	19.0	28.5	38.0	100	100	*95	*85	10x5x 7¾	8	C102BM	125	3	5	5	7½
CEC-107	1	3	1097	13.7	27.4	41.1	54.9	80	80	*75	*65	10x7x11¾	12	C110M	125	3	5	7½	7½
CEC-128A	1½	4	1659	20.7	41.5	62.2	83.0	*85	*70	*60	*50	12x8x11¾	12	C110M	125	5	7½	7½	10
CEC-128B	1½	4	1659	20.7	41.5	62.2	83.0	100	100	100	*90	12x8x11¾	12	6110MB	125	5	7½	15	15
CEC-148A	1¾	4½	1941	24.3	48.5	72.8	97.0	*80	*65	*50	*40	14x8x11¾	12	C110M	125	5	7½	7½	10
CEC-148B	1¾	4½	1941	24.3	48.5	72.8	97.0	100	100	*95	*80	14x8x11¾	12	6110MB	125	5	10	15	15
CEC-168A	1¾	4½	2222	27.8	55.5	83.3	111.1	100	100	*85	*70	16x8x11¾	12	6110MB	125	7½	10	15	15
CEC-168B	1¾	4½	2222	27.8	55.5	83.3	111.1	100	100	100	100	16x8x11¾	12	6844M	125	7½	10'	15	20
CEC-188A	1¾	4½	2531	31.6	63.3	94.9	126.6	100	*95	*75	*65	18x8x11¾	12	6110MB	125	7½	15	15	15
CEC-188B	1¾	4½	2531	31.6	63.3	94.9	126.6	100	100	100	90	18x8x11¾	12	6844M	125	7½	15	20	20

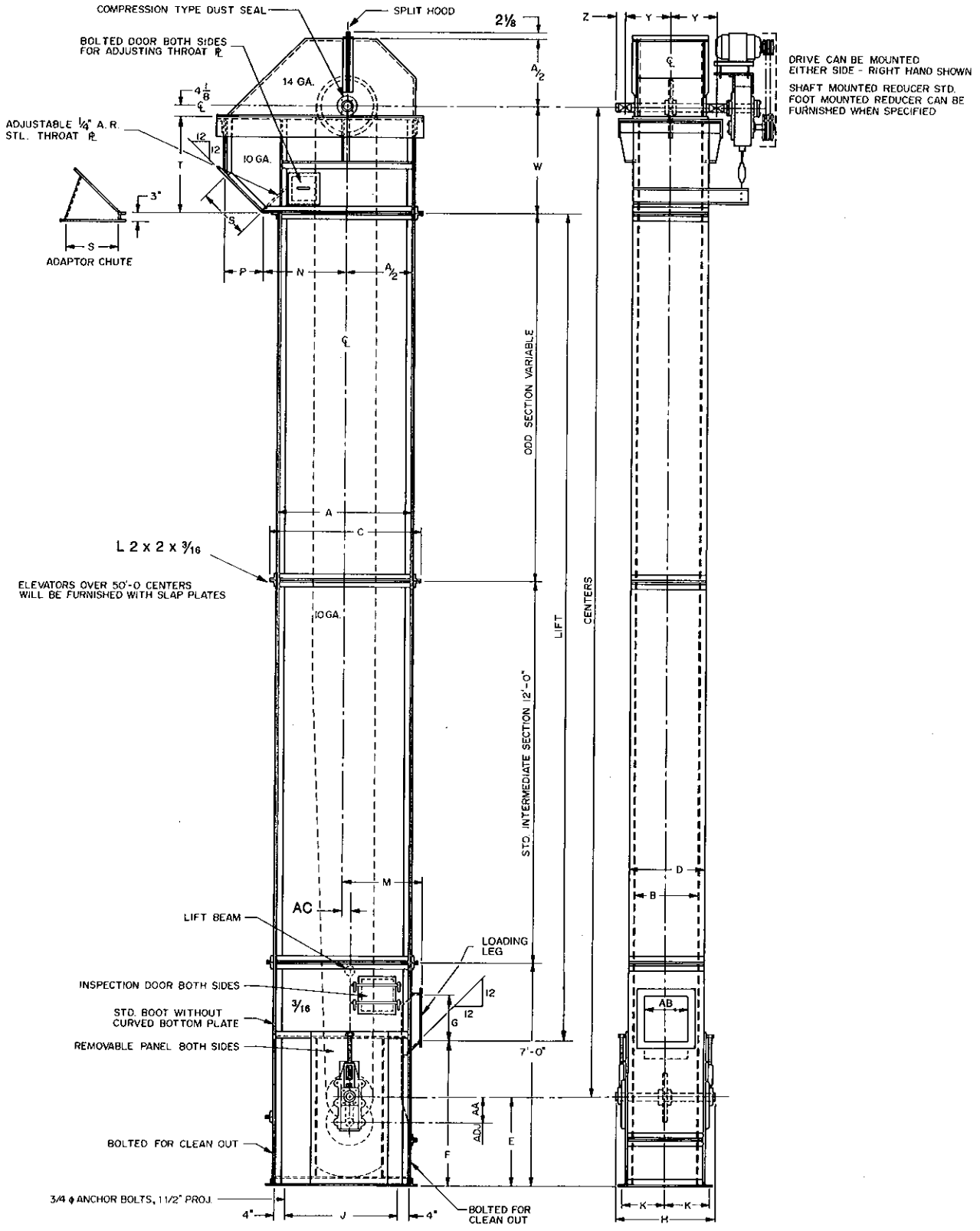
Elevator Number	Head Shaft					Boot (7)		Casing	Shipping Weight Lbs (5)			
	Diam. Shaft	Brg. Size (6)	RPM	No. of Teeth	PD of Spkt	Dia. Shaft	No. of Teeth P.D. of Spkt	Number	Head & Boot Sections		Inter Sections	
									Machinery (4)	Casing	Chain & Bucket/Ft	Casing Per Ft.
CEC-85	3 7/16	3 7/16	26.61	14	17.94	1 7/16	11T/14.2	36 x 12	750	1460	17.8	60
CEC-105	3 7/16	3 7/16	26.61	14	17.94	1 7/16	11T/14.2	36 x 14	815	1520	19.3	62
CEC-107	3 7/16	3 7/16	19.07	13	25.04	1 15/16	9T/17.52	48 x 14	945	1885	18.9	74
CEC-128A	3 15/16	3 7/16	19.07	13	25.04	1 15/16	9T/17.52	48 x 16	1070	1950	22.9	76
CEC-128B	4 7/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 16	1130	1950	23.2	76
CEC-148A	3 15/16	3 7/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 18	1170	2010	24.4	78
CEC-148B	4 7/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 18	1130	2010	24.7	78
CEC-168A	4 7/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 20	1275	2070	26.7	80
CEC-168B	4 15/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 20	1275	2070	31.65	80
CEC-188A	4 7/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 22	1320	2130	28.2	82
CEC-188B	4 15/16	3 15/16	19.07	13	25.04	2 7/16	9T/17.52	48 x 22	1420	2130	33.15	82

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes sprockets, bearings, shafts and chain & buckets for head and boot sections.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x chain & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up can be furnished when specified.
*(8) Limited by chain rated working value. For larger elevator centers, other chains and casings are available.
(9) Shaft dia. based on 100 PCF material and max. centers.
All dimensions in inches unless noted.

Combination Chains Have Cast Block Links & Steel Connecting Side Bars and Pins Steel Knuckle Chain is Fab. of Steel	Type Chain	Chain No.	Pitch	Avg. U.S. Lbs.	Rated Working Value, Lbs.	Wt. Per Ft/ Atch. No./Spa.
	Combination	C102BM	4.0	24,000	4,000	7.3/K2/2
	Combination	C110M	6.0	24,000	4,000	7.4/K2/2
	Steel Knuckle	6110MB	6.0	40,000	6,300	7.7/K2/2
	Steel Knuckle	6844M	6.0	70,000	9,200	12.65/K2/2

Dimensions subject to change, use certified prints for construction.

Elevator Number	A	B	C	D	E	F	G	H	J	K	M	N	P	S	T	W	Y	Z	AA	AB	AC
CEC- 85	36	12	40¼	16½	30¾	48	16	24½	28	8	21	24	8½	12	33	37¼	9⅞	2⅞	6⅛	6	2¼
CEC-105	36	14	40¼	18½	30¾	48	16	26½	28	9	21	24	8½	12	33	37¼	11⅛	2⅞	6⅛	8	2¼
CEC-107	48	14	52¼	18½	33¾	54	19	27½	40	9	27	30	11⁵⁄₁₆	16	36	40¼	11⅛	2⅞	8	8	3½
CEC-128	48	16	52¼	20½	33¾	54	19	29½	40	10	27	30	11⁵⁄₁₆	16	36	40¼	12⅛	2⅞	8	10	3½
CEC-148	48	18	52¼	22½	33¾	54	19	32¾	40	11	27	30	11⁵⁄₁₆	16	36	40¼	13⅜	2⅞	10	12	3½
CEC-168	48	20	52¼	24½	33¾	54	19	34¾	40	12	27	30	11⁵⁄₁₆	16	36	40¼	14⅜	3¼	10	14	3½
CEC-188	48	22	52¼	26½	33¾	54	19	36¾	40	13	27	30	11⁵⁄₁₆	16	36	40¼	15⅜	3¼	10	16	3½



Type CEB Bucket Elevators

Belt Mounted, Style D Buckets — continuous discharge

Elevator Number	Maximum Size Pieces		Rated Capacity in Cubic Feet Per Hr. (CFH)	Rated Capacity				Max Centers				Buckets		Belt		Motor Horsepower For Various Wt of Mat'l (3)			
				Tons Per Hour Material Weighing (2)				In Feet For Material Weighing				Style D 10 GA		Width Min PIW at Max Ctrs & 100 PCF Mat'l	Speed in Feet per Min.	For Max Ctrs			
	Uniform Size	10% of Whole (1)		Lbs Per Cu Ft				Lbs Per Cu Ft				Size	Spacing			Lbs Per Cu Ft			
				25	50	75	100	25	50	75	100					25	50	75	100
CEB85	¾	2½	810	10.1	20.3	30.4	40.5	100	100	90	80	8x5x 7¾	8	9/240	160	3	5	7½	7½
CEB105	¾	2½	972	12.2	24.3	36.5	48.6	100	100	100	85	10x5x 7¾	8	11/237	160	3	5	7½	10
CEB107	1	3	1404	17.6	37.1	52.7	70.2	100	100	100	85	10x7x11¾	12	11/320	160	5	7½	10	15
CEB128	1½	4	2124	26.6	53.1	79.7	106.2	100	100	100	80	12x8x11¾	12	13/384	160	7½	10	15	15
CEB148	1¾	4½	2484	31.0	62.1	93.2	124.2	100	100	100	95	14x8x11¾	12	15/449	160	7½	15	20	25
CEB168	1¾	4½	2844	35.6	71.1	106.7	142.2	100	100	100	100	16x8x11¾	12	18/446	160	7½	15	20	25
CEB188	1¾	4½	3240	40.5	81	121.5	162.0	100	100	100	100	18x8x11¾	12	20/456	160	7½	15	25	30

Elevator Number	Head Shaft					Boot (7)			Casing	Shipping Weight Lbs (5)			
	Diam. Shaft	Brg. Size (6)	RPM	Pulley		Dia. Shaft	Slatted Pulley		Number	Head & Boot Sections		Inter Sections	
				Dia. Incl. Lagging (8)	Face		Dia.	Face		Machinery (4)	Casing	Belt & Bucket/Ft	Casing Per Ft
CEB85	3 7/16	2 15/16	29.8	20½	12	1 15/16	16	12	36 x 14	810	1520	12.3	62
CEB105	3 7/16	2 15/16	29.8	20½	14	1 15/16	16	14	36 x 16	910	1600	14.2	66
CEB107	3 15/16	3 7/16	25.0	24½	14	1 15/16	18	14	48 x 16	1020	1950	14.0	76
CEB128	3 15/16	3 7/16	25.0	24½	16	1 15/16	18	16	48 x 18	1150	2010	18.5	78
CEB148	4 7/16	3 7/16	25.0	24½	18	2 7/16	18	18	48 x 20	1200	2070	20.6	80
CEB168	4 7/16	3 15/16	25	24½	20	2 7/16	18	20	48 x 22	1355	2130	23.1	82
CEB188	4 7/16	3 15/16	25	24½	22	2 7/16	18	22	48 x 24	1520	2190	25.0	84

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes pulleys, bearings, shafts, belt and buckets for head and boot section.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x belt & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up can be furnished when specified.
(8) Verify drive pulley dia. compatability with final belt selection.
(9) Shaft dia. based on 100 PCF material and max. centers.
All dimensions in inches unless noted.

BELT DATA

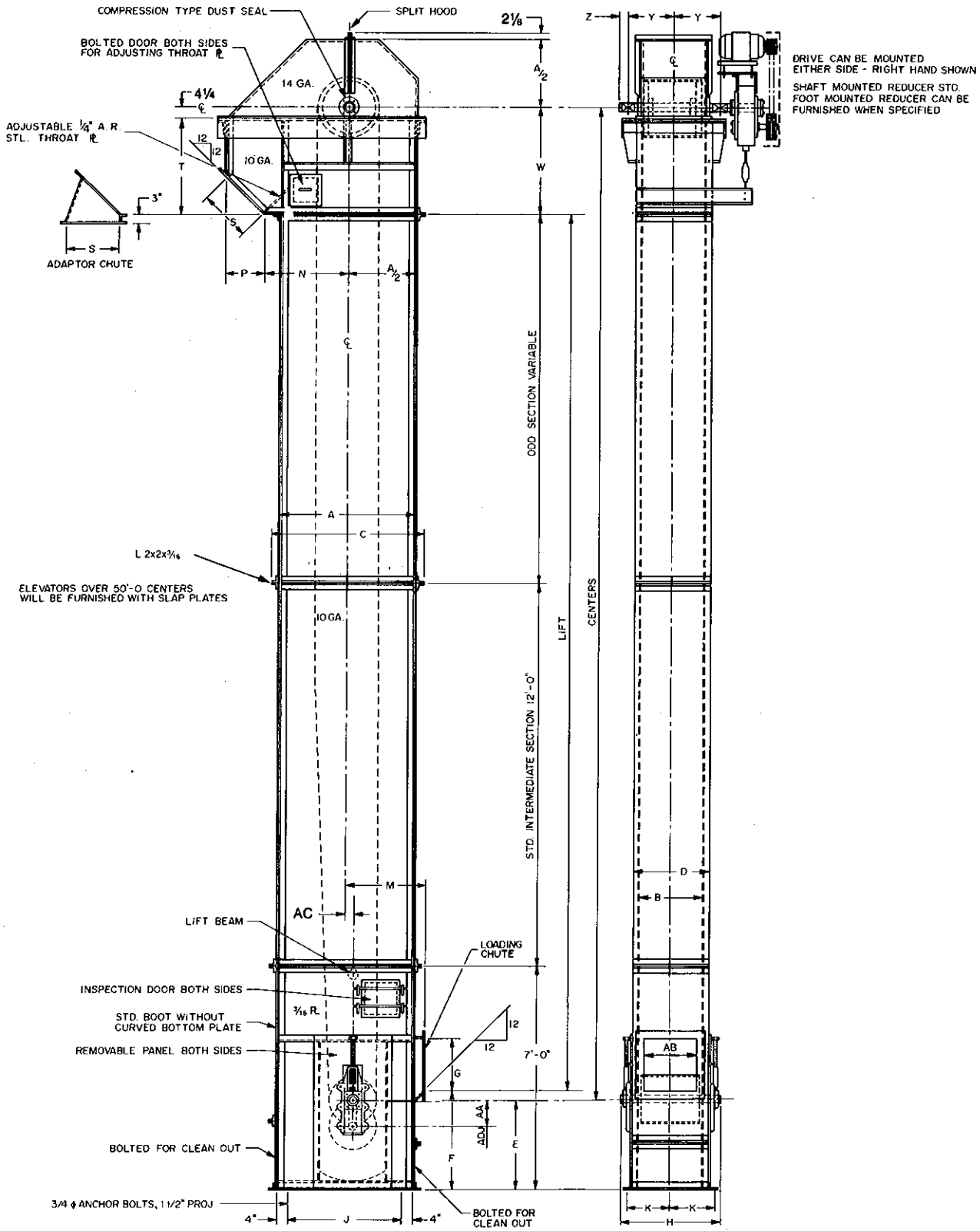
* Continuous Bucket Projection	Multi-Ply Type/No. Plies	PVC Type	Allow. Ten. PIW		Wt Lb/In. Width (Lineal Foot)	
			Multi-Ply	PVC	Plyon	PVC
5	220/2	2500	160	235	.175	.16
7	330/3	4000	240	310	.20	.19
8	440/4	5000	320	385	.225	.21
9	450/3	6000	330	460	.225	.22
10	600/3	8000	465	615	.225	.24

BELT NOTE:
Multi-ply wts with ⅛ x 1/16 covers
PVC wts with hvy covers add .017 #/IN per 1/32 cover thk

*Actual PIW requirement may dictate stronger belt.

Dimensions subject to change, use certified prints for construction.

Elevator Number	A	B	C	D	E	F	G	H	J	K	M	N	P	S	T	W	Y	Z	AA	AB	AC
CEB- 85	36	14	40¼	18½	30¾	48	16	27½	28	9	21	24	8½	12	33	37¼	10⅞	2⅝	8	6	2¼
CEB-105	36	16	40¼	20½	30¾	48	16	29½	28	10	21	24	8½	12	33	37¼	12⅛	2⅝	8	8	2¼
CEB-107	48	16	52¼	20½	33¾	54	19	29½	40	10	27	30	11⅝	16	36	40¼	12⅛	2⅝	8	8	3½
CEB-128	48	18	52¼	22½	33¾	54	19	31½	40	11	27	30	11⅝	16	36	40¼	13⅛	2⅞	8	10	3½
CEB-148	48	20	52¼	24½	33¾	54	19	34¾	40	12	27	30	11⅝	16	36	40¼	14⅜	2⅞	10	10	3½
CEB-168	48	22	52¼	26½	33¾	54	19	36¾	40	13	27	30	11⅝	16	36	40¼	15⅜	3¼	10	12	3½
CEB-188	48	24	52¼	28½	33¾	54	19	38¾	40	14	27	30	11⅝	16	36	40¼	16⅜	3¼	10	14	3½

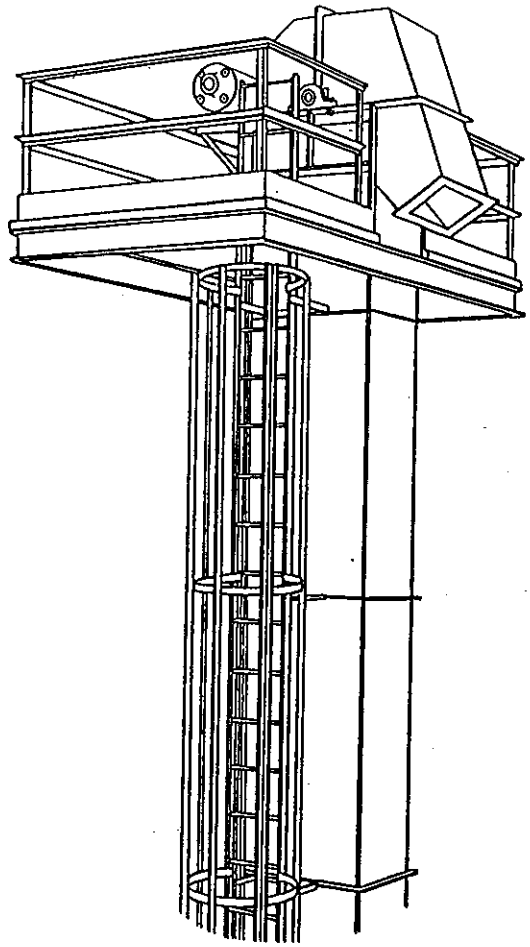


Service Platforms
Service platforms provide convenient access to the head terminal for inspection, lubrication and general servicing. Platforms cover three sides of the elevator and are securely supported by the steel elevator casings. Floors may be constructed of steel grating, expanded metal, or wood planks. Steel angles and pipes provide a safety railing on all exposed sides.

Ladders
Steel ladders with safety cages are recommended for elevators with service platforms. Ladders may mount on the steel angles of the elevator casing and may be furnished in virtually any length.

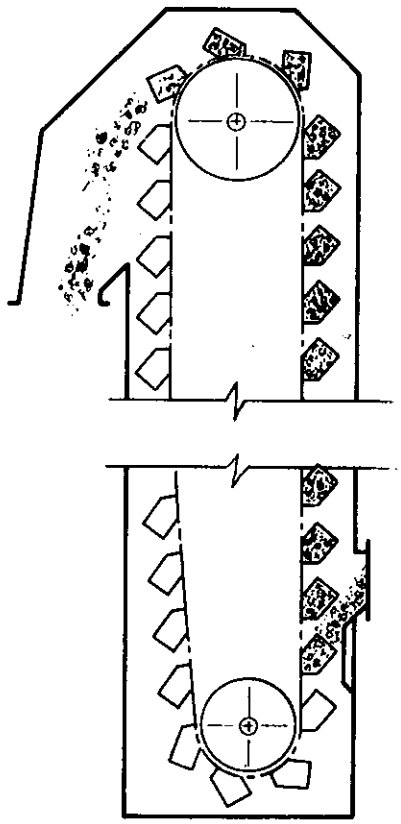
Rest Platforms
Intermediate rest platforms may be required. When necessary, one rest platform is recommended for the first thirty feet of shaft centers. An additional rest platform is recommended for each additional twenty feet of shaft centers.

Bracing
All elevators must be anchored or braced to a rigid structure. Bracing should be installed at a point not more than ten feet below the head shaft and at intermediate points not over 20 ft. apart. (Bracing-anchors not normally supplied by Goodman Conveyor.)



Backstops
In some elevators, the headshaft may have an overhauling load that will cause reverse rotation of the shaft when the elevator is stopped while loaded. Various types of backstops are available to prevent such reverse rotation. Several kinds of drives are available with integral backstops.

Engineered Bucket Elevators



Cement Mill

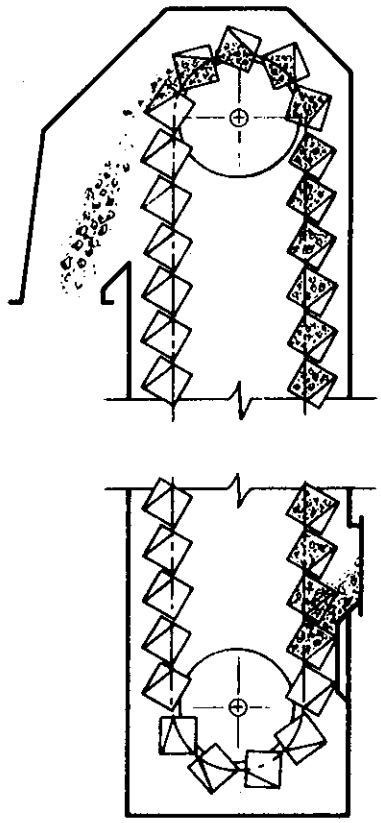
Cement mill elevators are furnished with Style AC buckets mounted on a single strand of chain.

When buckets are closely spaced, material is directed to the buckets through a loading leg.

If buckets are more widely spaced, loading is accomplished through a combination of picking up material from the boot and direct loading through the loading leg.

Material is discharged by centrifugal force as the buckets pass over the head wheel.

See Type CM Elevators on pages 122 and 123.



Super-Capacity

Super-capacity elevators are a continuous type elevator in which the buckets are mounted between two strands of chain. This design permits the bucket to extend back of the chain centerline resulting in greater capacities.

SC Elevators are used when handling high capacities of friable, heavy, or abrasive material ranging from fines to lumps.

See Type SC Elevators on pages 124 and 125.

Cement Mill Elevators

Chain Mounted, Style AC Buckets, Steel Knuckle Chains

Elevator Number	Maximum Size Pieces		(2) Rated Capacity in Cubic Feet Per Hr. (CFH)	Rated Capacity		Max Centers		Buckets				Motor Horsepower For Various Wt. of Mat'l (3)	
				Tons Per Hour Material Weighing (2)		In Feet For Material Weighing		Style AC M.I.		Chain Number	Speed In Feet Per Min.	For Max Ctrs	
	Uniform Size	10% of Whole (1)		Lbs Per Cu Ft		Lbs Per Cu Ft		Size	Spacing			Lbs Per Cu Ft	
				50	100	50	100					50	100
CM128A	1½	4½	2226	55.5	111	100	100	12 x 8	18	6856M	265	15	25
CM128B	1½	4½	3339	83.5	167	100	100	12 x 8	12	6856M	265	20	40
CM168A*	1¾	4½	3021	75.5	151	100	100	16 x 8	18	6856M	265	20	30
CM168B*	1¾	4½	4531	113	226	100	100	16 x 8	12	6856M	265	25	50
CM1810A	2	5	4929	123	246	100	100	18 x 10	18	6869	265	25	50
CM1810B	2	5	7393	185	370	100	§85	18 x 10	12	6869	265	40	75

Elevator Number	Head Shaft					Boot (7)		Casing	Shipping Weight Lbs (5)			
	Diam. Shaft	Brg. Size (6)	RPM	Dia. Traction Wheel	Effective P.D.	Dia. Shaft	No. of Teeth P.D. of Spkt	Number	Head & Boot Sections		Inter Sections	
									Mach-inery (4)	Casing	Chain & Bucket Per Ft	Casing Per Ft
CM128A	4 15/16	4 7/16	36.5	26	27¾	2 15/16	13/25.04	56 x 20	2300	2805	37.5	93
CM128B	5 7/16	4 7/16	36.5	26	27¾	2 15/16	13/25.04	56 x 20	2400	2805	47	93
CM168A*	5 7/16	4 7/16	36.5	26	27¾	2 15/16	13/25.04	56 x 24	2400	2900	40.5	100
CM168B*	5 15/16	4 15/16	36.5	26	27¾	2 15/16	13/25.04	56 x 24	2570	2900	53	100
CM1810A	6½	5 7/16	35.7	26	28⅜	2 15/16	13/25.04	64 x 26	4460	4000	79.7	120
CM1810B	6¾	5 7/16	35.7	26	28⅜	2 15/16	13/25.04	64 x 26	4460	4000	103	120

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes chain and buckets required for head and boot sections.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x chain & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up furnished with hard surfaced shaft and blocks.
(8) Shaft dia. based on 100 PCF material and max. centers.

*Critical traction values are reached with this elevator when used with > 75 PCF material at max. centers. In many cases sprockets are recommended. Consult Goodman Conveyor before applying this elevator.

§Limited by chain rated working value.

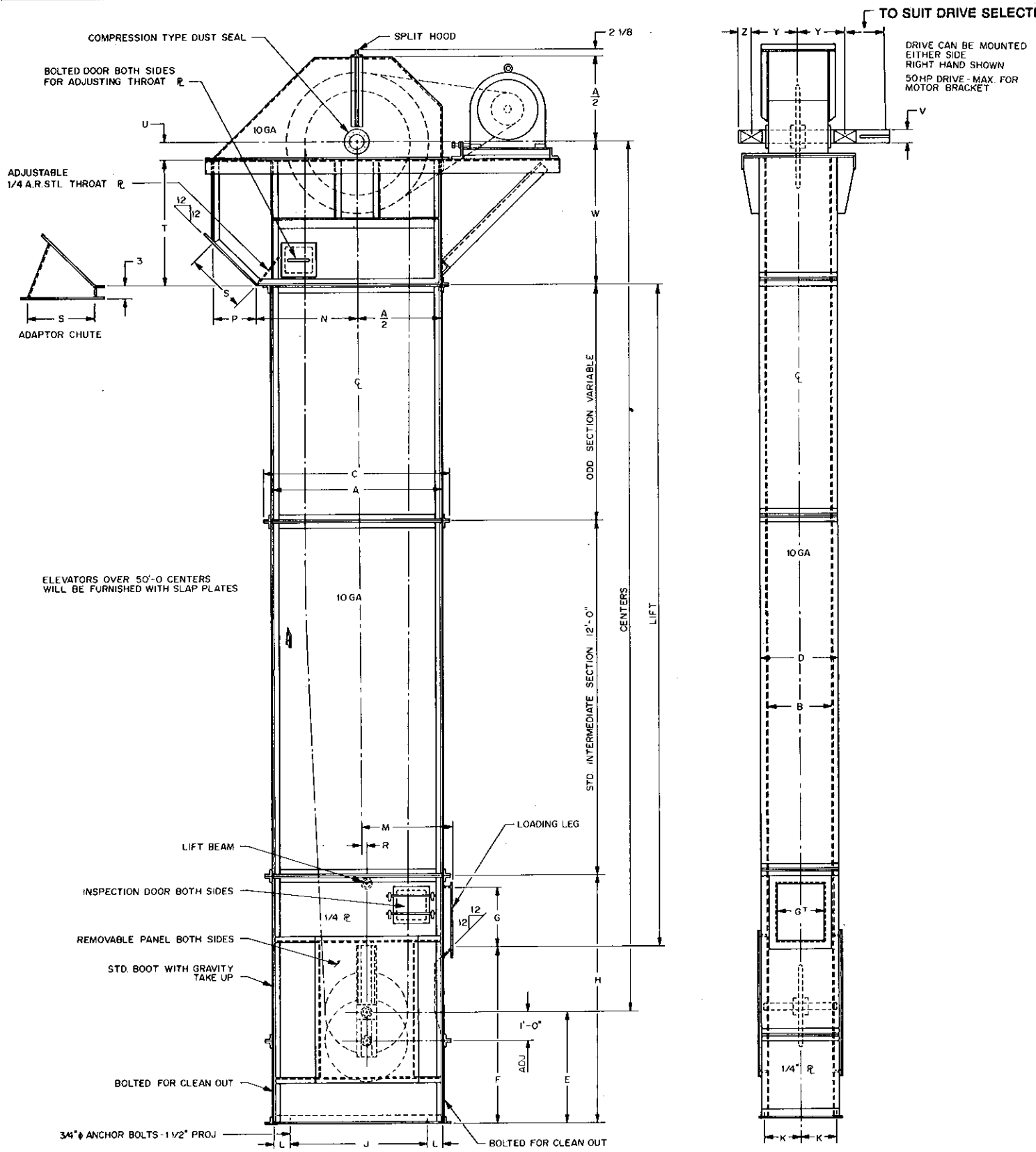
All dimensions in inches unless noted.

	Type Chain	Chain No.	Pitch	Avg. U.S. Lbs.	Rated Working Value, Lbs.	Wt. Per Ft/ Atch. No./Spa.
Steel Knuckle Chain is Fab. Of Steel	Steel Knuckle	6856M (9)	6	100,000	14,000	17.8/K-24/3
	Steel Knuckle	6856M (9)	6	100,000	14,000	19/K-24/2
	Steel Knuckle	6869 (10)	6	200,000	21,800	45/K44/3
	Steel Knuckle	6869 (10)	6	200,000	21,800	51/K44/2

(9) Chain No. 6956PM available with Avg of 144,500 lb and RWV of 16,000 lb.
(10) Chain No. 6869R available with Avg of 235,000 lb and RWV of 22,000 lb.

Dimensions subject to change, use certified prints for construction.

Elevator Number	A	B	C	D	E	F	G	G	H	J	K	L	M	N	P	R	S	T	U	V	W	Y	Z
CM-128-A	56	20	60¼	24¼	26¾	56	19	10	86	46	12	5	31	34	14⅛	1½	20	39	6⅛	4 7/16	45⅛	15½	4¼
CM-128-B	56	20	60¼	24¼	36¾	56	19	10	86	46	12	5	31	34	14⅛	1½	20	39	6⅛	4 7/16	45⅛	15½	4¼
CM-168-A	56	24	60¼	28¼	36¾	56	19	14	86	46	14	5	31	34	14⅛	1½	20	39	6⅛	4 7/16	45⅛	17½	4¼
CM-168-B	56	24	60¼	28¼	39¾	56	19	14	86	46	14	5	31	34	14⅛	1½	20	39	6⅛	4 15/16	45⅛	17½	4¼
CM-1810-A	64	26	69¼	31¼	39	66	24	16	94	52	15	6	35	38	18	1¾	25½	50	6⅞	5 7/16	56⅞	18⅜	4⅝
CM-1810-B	64	26	69¼	31¼	39	66	24	16	94	52	15	6	35	38	18	1¾	25½	50	6⅞	5 7/16	56⅞	18⅜	4⅝



Super Capacity Bucket Elevators

Two Chains, End Mounted Buckets, Steel Knuckle Chains

Elevator Number	Maximum Size Pieces		(2) Rated Capacity In Cubic Feet Per Hr. (CRH)	Rated Capacity		Max Centers (8)		Buckets		Chain Number	Speed In Feet Per Min.	Motor Horsepower For Various Wt of Mat'l (3)	
				Tons Per Hour Material Weighing (2)		In Feet For Material Weighing		Steel Super Capacity				For Max Ctrs	
	Uniform Size	10% of Whole (1)		Lbs Per Cu Ft		Lbs Per Cu Ft		Size	Spacing			Lbs Per Cu Ft	
				50	100	50	100					50	100
SC168A	2½	6	3150		157		100	16 x 8¾ x 11⅝ x 10 GA	12	6215B	100		30
SC168B	2½	6	3150	78		100		16 x 8¾ x 11⅝ x 10 GA	12	6322	100	15	
SC208A	2½	6	4050		202		80	20 x 8¾ x 11⅝ x 10 GA	12	6215B	100		30
SC208B	2½	6	4050	101		85		20 x 8¾ x 11⅝ x 10 GA	12	6322	100	20	
SC1612A	3½	8	5625		281		100	16 x 12¾ x 17⅝ x 3/16	18	6359A	125		50
SC1612B	3½	8	5625	140		100		16 x 12¾ x 17⅝ x 3/16	18	6859	125	30	
SC2012A	3½	8	7125		356		95	20 x 12¾ x 17⅝ x 3/16	18	6359A	125		60
SC2012B	3½	8	7125	178		92		20 x 12¾ x 17⅝ x 3/16	18	6859	125	40	
SC2412A	3½	8	8250		412		85	24 x 12¾ x 17⅝ x 3/16	18	6359A	125		75
SC2412B	3½	8	8250	206		100		24 x 12¾ x 17⅝ x 3/16	18	6859	125	40	
SC3012A	3½	8	10500		525		85	30 x 12¾ x 17⅝ x 3/16	18	6129PC	125		100
SC3012B	3½	8	10500	262		100		30 x 12¾ x 17⅝ x 3/16	18	6359A	125	50	
SC3612A	3½	8	12375		618		75	36 x 12¾ x 17⅝ x 3/16	18	6129PC	125		100
SC3612B	3½	8	12375	309		95		36 x 12¾ x 17⅝ x 3/16	18	6359A	125	60	

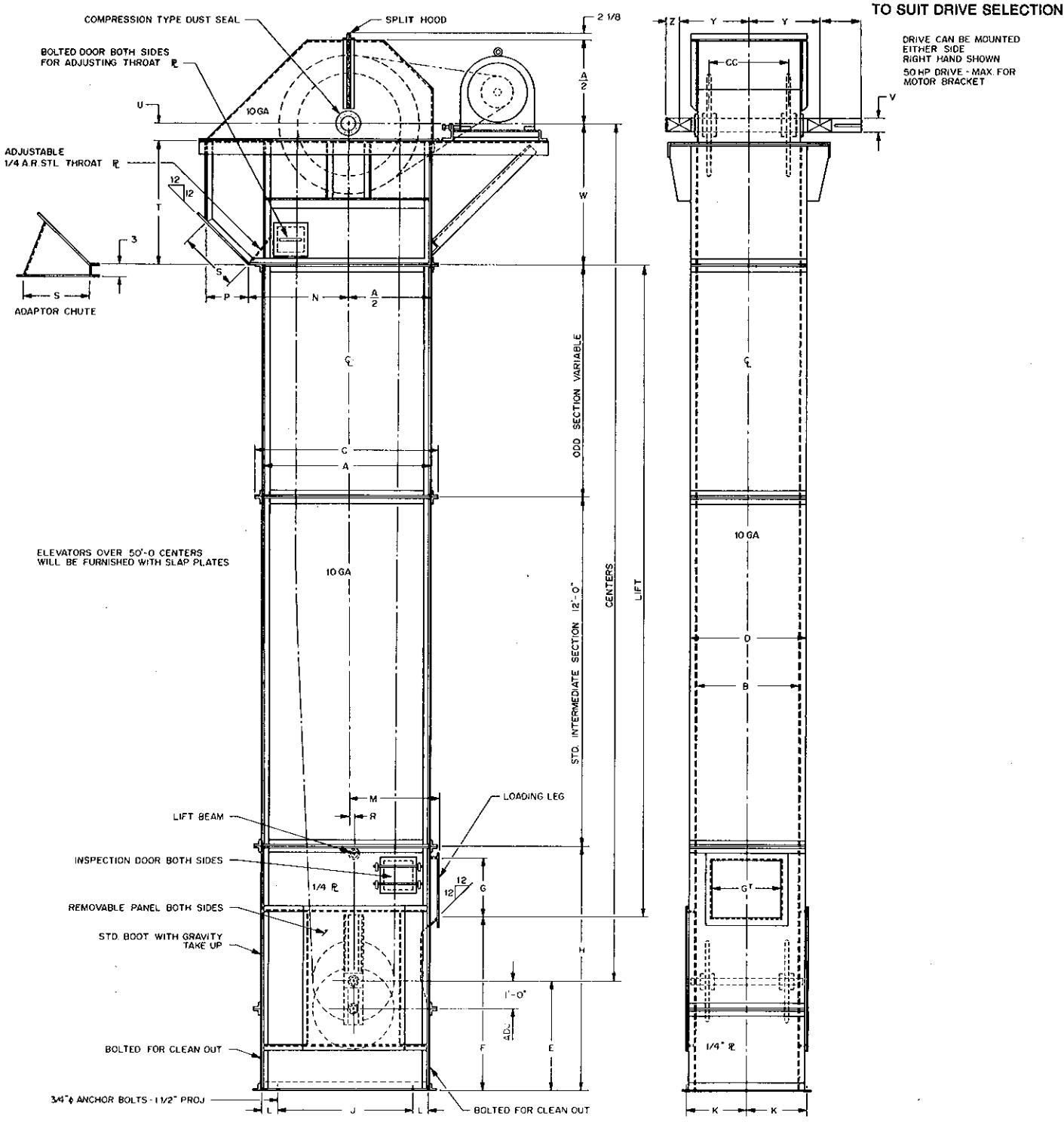
Elevator Number	Head Shaft					Boot (7)		Casing	Shipping Weight Lbs (5)			
									Head & Boot Sections		Inter Sections	
	Diam. Shaft (9)	Brg. Size (6)	RPM	P.D. Spkt	No. of Teeth	Dia. Shaft	No. of Teeth P.D. of Spkt	Number	Mach-inery (4)	Casing	Chain & Bucket Per Ft	Casing Per Ft
SC168A	5 15/16	4 15/16	12.18	31.36	8	2 15/16	6/23.96	56 x 34	3365	3530	58	104
SC168B	4 15/16	4 7/16	12.18	31.36	8	2 15/16	6/23.96	56 x 34	3140	3530	41.44	104
SC208A	5 7/16	4 15/16	12.18	31.36	8	2 15/16	6/23.96	56 x 34	3450	3530	62	104
SC208B	4 15/16	4 7/16	12.18	31.36	8	2 15/16	6/23.96	56 x 34	3170	3530	45.44	104
SC1612A	6½	5 7/16	13.73	34.77	12	2 15/16	12/34.77	68 x 33	5550	4745	84.67	121
SC1612B	5 15/16	5 7/16	13.73	34.77	12	2 15/16	12/34.77	68 x 33	5400	4745	76.67	121
SC2012A	7	5 15/16	13.73	34.77	12	2 15/16	12/34.77	68 x 37	5950	4850	90	125
SC2012B	6½	5 7/16	13.73	34.77	12	2 15/16	12/34.77	68 x 37	5300	4850	82	125
SC2412A	7	6 7/16	13.73	34.77	12	2 15/16	12/34.77	68 x 41	6250	5015	96.67	130
SC2412B	6½	5 7/16	13.73	34.77	12	2 15/16	12/34.77	68 x 41	5700	5015	88.67	130
SC3012A	7½	6 15/16	13.73	34.77	12	2 15/16	12/34.77	68 x 47	6500	5220	122	135
SC3012B	7	5 15/16	13.73	34.77	12	2 15/16	12/34.77	68 x 47	6100	5220	104	135
SC3612A	7¾	6 15/16	13.73	34.77	12	2 15/16	12/34.77	68 x 53	6900	5425	130.67	144
SC3612B	7	5 15/16	13.73	34.77	12	2 15/16	12/34.77	68 x 53	6700	5425	112.67	144

(1) Mixed with fines.
(2) Buckets filled to approx. 75% of catalog rating.
(3) Motor horsepower based on buckets 100% full.
(4) Weight of machinery includes chain and buckets required for head and boot sections.
(5) Total weight of elevator = (weight of head & boot sections and machinery) + [interm. section casing wt/ft + (2 x chain & bkt. wt/ft)] x total height of interm. sections.
(6) Head shaft & screw take-up shaft furnished with roller bearings.
(7) Gravity take-up furnished with hard surfaced shaft and blocks.
(8) Max. centers limited by chain rated working value for most sizes.
(9) Shaft dia. based on max. centers listed.
All dimensions in inches unless noted.

	Type Chain	Chain No.	Pitch	Avg. U.S. Lbs.	Rated Working Value, Lbs.	Wt. Per Ft/ Atch. No./Spa.
Steel Knuckle Chain is Fab. of Steel	Steel Knuckle	6322	12"	46,000	7,250	8.22/O.S.G16A/1
	Steel Knuckle	6215B	12"	88,000	12,000	16.5/O.S.G16A/1
	Steel Knuckle	6859	9"	87,000	12,250	19/O.S.G9/2
	Steel Knuckle	6359A	9"	149,000	17,300	23/G9-O.S./2
	Steel Knuckle	6129PC	9"	155,000	22,900	32/G9-O.S./2

Dimensions subject to change, use certified prints for construction.

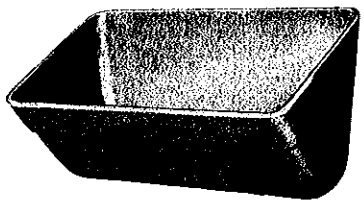
Elevator Number	A	B	C	D	E	F	G	G	H	J	K	L	M	N	P	R	S	T	U	V	W	Y	Z	CC
SC-168-A	56	34	60¼	38¼	36¾	56	19	14	86	46	19	5	31	34	14⅛	3½	20	39	6⅛	4 15/16	45⅛	23¼	4¼	21
SC-168-B	56	34	60¼	38¼	36¾	56	19	14	86	46	19	5	31	34	14⅛	3½	20	39	6⅛	4 7/16	45⅛	23¼	4¼	20½
SC-208-A	56	34	60¼	38¼	36¾	56	19	18	86	46	19	5	31	34	14⅛	3½	20	39	6⅛	4 15/16	45⅛	23¼	4¼	25
SC-208-B	56	34	60¼	38¼	36¾	56	19	18	86	46	19	5	31	34	14⅛	3½	20	39	6⅛	4 7/16	45⅛	23¼	4¼	24½
SC-1612-A	68	33	73¼	38¼	45	72	24	14	100	56	18½	6	37	40	18	0	25½	51	6⅞	5 7/16	57⅞	23 3/16	4⅝	22⅜
SC-1612-B	68	33	73¼	38¼	45	72	24	14	100	56	18½	6	37	40	18	0	25½	51	6⅞	5 7/16	57⅞	23 3/16	4⅝	21⅝
SC-2012-A	68	37	73¼	42¼	45	72	24	18	100	56	20½	6	37	40	18	0	25½	51	7¼	5 15/16	58¼	25⅝	5⅛	26⅜
SC-2012-B	68	37	73¼	42¼	45	72	24	18	100	56	20½	6	37	40	18	0	25½	51	6⅞	5 7/16	57⅞	25⅝	4⅝	25⅝
SC-2412-B	68	41	73¼	46¼	45	72	24	22	100	56	22½	6	37	40	18	0	25½	51	7¾	6 7/16	58¾	27¾	5¼	30⅜
SC-2412-B	68	41	73¼	46¼	45	72	24	22	100	56	22½	6	37	40	18	0	25½	51	6⅞	5 7/16	57⅞	27¾	4⅝	29⅝
SC-3012-A	68	47	73¼	52¼	45	72	24	28	100	56	25½	6	37	40	18	0	25½	51	8	6 15/16	59	31¼	5¼	35⅞
SC-3012-B	68	47	73¼	52¼	45	72	24	28	100	56	25½	6	37	40	18	0	25½	51	7¼	5 15/16	58¼	31¼	4⅝	36⅜
SC-3612-A	68	53	73¼	58¼	45	72	24	34	100	56	28½	6	37	40	18	0	25½	51	8	6 15/16	59	34¼	5¼	41⅞
SC-3612-B	68	53	73¼	58¼	45	72	24	34	100	56	28½	6	37	40	18	0	25½	51	7¼	5 15/16	58¼	34¼	5⅛	42⅜



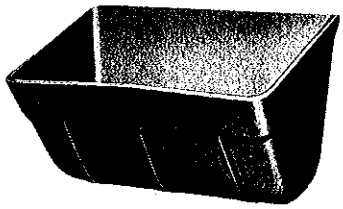
Goodman Conveyor Cast Elevator Buckets

Malleable Iron and Supermal®

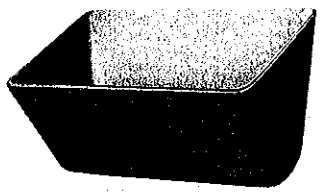
Type AA is used on standard centrifugal discharge elevators. These buckets can be mounted either on chain or belt. The heavily reinforced lip and sides give longer life in handling gritty materials. They are also available with the **lip zone hardened.**



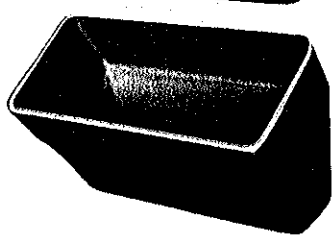
Type AA-RB is designed to handle the same type of materials as types A and AA. Extra heavy backs are provided to give more strength and durability. The reinforcing ribs and digging lip on the front add to the life of the bucket. They are also available with the **lip zone hardened.**



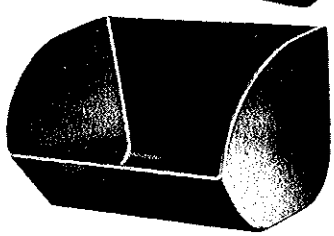
Type A buckets are used on small elevators for light service. For other sizes, use Type AA.

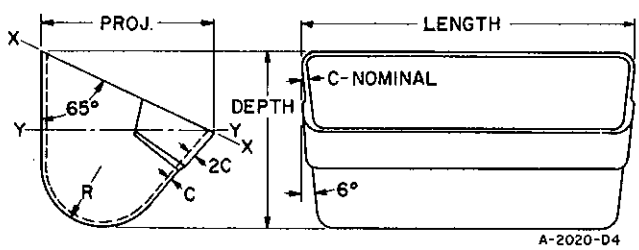


Type AC has a hooded back that permits closer bucket spacing. Air vents prevent the trapping of air and assure a cleaner discharge when handling light fluffy materials. They are extensively used on cement mill elevators.



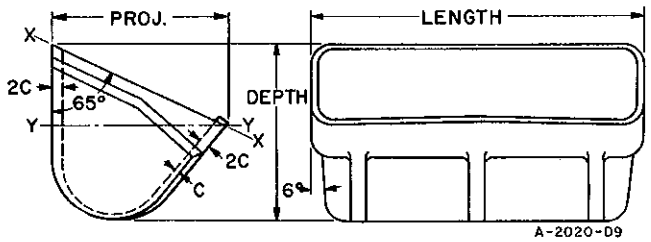
Type SC is a modified bucket with a low front which provides increased carrying capacity. It handles materials such as moist sand, clay, damp sugar, and other materials having a packing tendency.





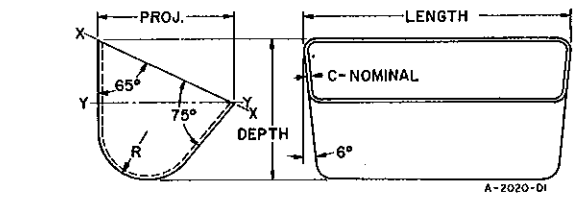
Type AA

Bucket Sizes In Inches			▲ Capacity In Cu. Ft.		Approx. Weight In Lbs.	Dimensions	
Length	Projection	Depth	At Line "X-X"	At Line "Y-Y"		C	R
6	4	4¼	.030	.019	3.10	3/32	1¼
7	4½	5	.050	.033	4.85	3/32	1⅜
8	5	5½	.068	.045	7.55	3/32	1½
10	6	6¼	.119	.075	11.67	7/64	2
12	6	6¼	.131	.086	13.75	7/64	2
12	7	7¼	.194	.121	16.90	9/64	2⅜
14	7	7¼	.226	.147	20.88	9/64	2⅜
14	8	8	.300	.187	27.00	11/64	2¾
16	7	7¼	.258	.162	21.50	9/64	2⅜
16	8	8½	.339	.221	26.36	11/64	2¾
18	8	8½	.381	.243	30.50	11/64	2¾
18	10	10½	.565	.336	46.00	13/64	3¼



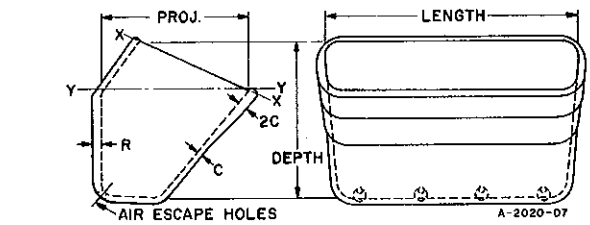
Type AA-RB

Bucket Sizes In Inches			▲ Capacity In Cu. Ft.		Approx. Weight In Lbs.	Dimensions
Length	Projection	Depth	At Line "X-X"	At Line "Y-Y"		C
10	6	6¼	.119	.075	10.44	7/64
12	7	7¼	.194	.121	17.50	9/64
14	7	7¼	.226	.147	18.92	9/64
14	8	8½	.300	.187	28.40	11/64
16	8	8½	.339	.221	31.60	11/64
18	8	8½	.381	.243	28.04	11/64
24	8	8½	.528	.312	45.63	13/64
24	10	10½	.744	.447	64.60	13/64



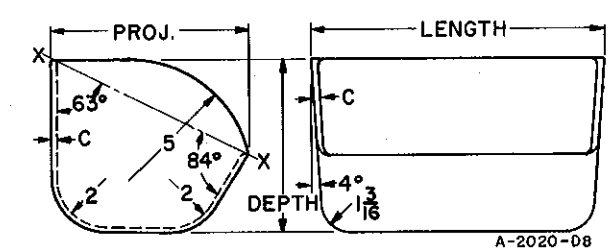
Type A

Bucket Sizes In Inches			▲ Capacity In Cu. Ft.		Approx. Weight In Lbs.	Dimensions	
Length	Projection	Depth	At Line "X-X"	At Line "Y-Y"		C	R
4	2¾	3	.009	.007	1.30	5/64	1
5	3½	3¾	.018	.013	2.26	5/64	1 1/16
9	6	6¼	.107	.067	8.89	1/8	2



Type AC

Bucket Sizes In Inches			▲ Capacity In Cu. Ft.		Approx. Weight In Lbs.	Dimensions	
Length	Projection	Depth	At Line "X-X"	At Line "Y-Y"		C	R
12	8	8½	.28	.21	28.0	7/32	3/8
16	8	8½	.38	.28	34.0	7/32	3/8
18	10	10½	.62	.49	52.0	1/4	7/16
24	10	10½	.85	.68	72.0	1/4	7/16



Type SC

Bucket Sizes In Inches			▲ Capacity In Cu. Ft.	Approx. Weight In Lbs.	Dimensions
Length	Projection	Depth	At Line "X-X"		C
8	6	5	.073	5.6	5/32
10	8	7	.170	10.4	3/16
12	8	7	.210	14.0	3/16
14	8	7	.245	17.0	3/16
16	8	7	.280	18.5	3/16
18	8	7	.317	22.0	3/16
20	8	7	.354	25.5	3/16

▲ It is customary, when designing elevators, to figure that the buckets are loaded 75% of the capacity at line "X-X." Actual capacities depend upon the angle of repose of the material and the inclination of the elevator.

Specifications subject to change without notice.

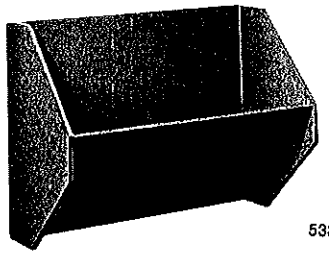
Goodman Conveyor Steel Elevator Buckets

Type D Continuous is used very extensively for handling broken stone, sand, gravel, coal, etc. The Goodman Conveyor continuous bucket is a two-piece bucket—the ends and back formed from one piece, with the bottom welded in place. Continuous welded construction is standard.

Idler wheels are usually used to carry buckets and chain, or belt, when elevators are inclined.

Guide angles, carrying rollers and wearing blocks can be furnished, when desired, for inclined elevators with runways.

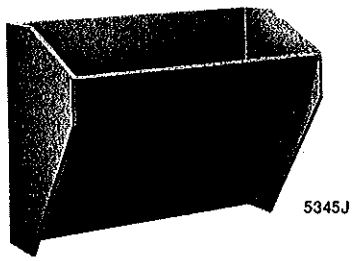
All continuous buckets 26 inches and over are strengthened by the addition of a center brace.



5335J

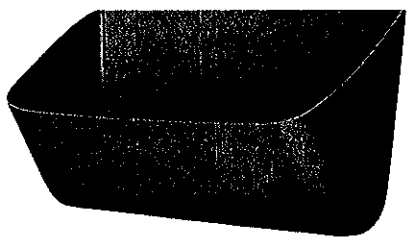
Type DH Continuous is used for handling materials that are sluggish in nature, such as light soda ash, etc. The steeper lip permits the material to slide off faster as it discharges onto the preceding bucket. A filler in the bottom prevents the clogging of material between the front and back plates. Continuous welded construction is standard.

This bucket is also ideal for use where materials tend to level off in the bucket. Products such as cement or other light, fluffy, free-flowing materials can be carried higher in the bucket, increasing capacity.



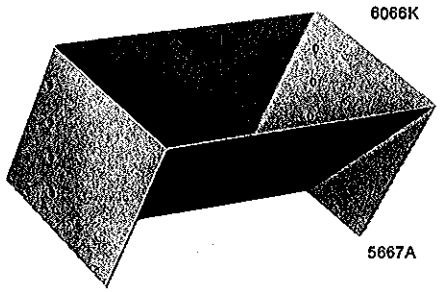
5345J

Salem Steel buckets are made in standard gauges for flour grain, seeds, etc.; in medium gauges for coal, lime, cement, etc.; in heavy gauges for gravel, broken stone, etc.; and in extra heavy gauges for ashes, sand, coke and ores.



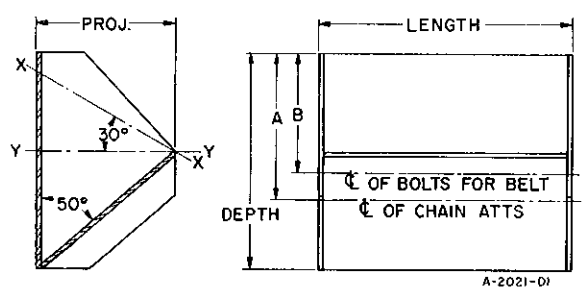
6066K

Super Capacity Steel elevator buckets are of the continuous type, designed for mounting between two strands of chain, permitting the bucket to extend back of the chain centerline. This design provides a much greater capacity and makes possible the handling of larger size lumps than ordinary continuous type bucket. Continuous welded construction is standard. These buckets are used on Goodman Conveyor Standard Super-Capacity Bucket Elevators.

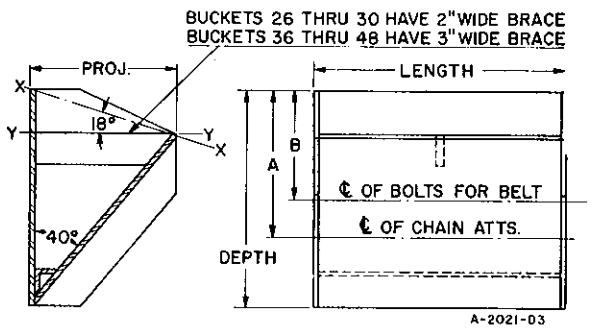


5667A

Type D Continuous Bucket



Type DH Continuous Bucket



Type D Continuous Buckets

Bucket Size In Inches			▲Capacity In Cu. Ft.		Dim. In Inches		Gauge of Steel	Approx. Weight In Lbs.
Lgth.	Projection	Depth	At Line "X-X"	At Line "Y-Y"	A	B		
8	5	7¾	.075	.045	4 13/16	3⅞	14 12 10	4.0 5.5 7.0
10	5½	8¾	.115	.070	5 7/16	4⅜	14 12 10	5.0 7.0 9.0
11	6	8¾	.150	.085	5 7/16	4⅜	12 10	8.0 10.0
12	6	8¾	.165	.095	5 7/16	4⅜	12 10	8.5 10.5
8	8	11¾	.195	.115	7 3/16	5⅞	12 10	9.5 12.
10	5	7¾	.090	.050	7 3/16	5⅞	12	7.4
10	7	11¾	.195	.113	7 3/16	5⅞	10	11.5
10	8	11¾	.245	.145	7 3/16	5⅞	12 10	11. 13.5
12	6	11¾	.165	.095	7 3/16	5⅞	12 10 3/16	10.5 12.5 17.0
12	7	11¾	.225	.135	7 3/16	5⅞	12 10 3/16	10.5 14.5 19.5
12	8	11¾	.295	.170	7 3/16	5⅞	12 10 3/16	12.0 15.5 21.0
14	8	11¾	.345	.200	7 3/16	5⅞	12 10 3/16 ¼	13.5 17.0 23.0 30.5
16	8	11¾	.395	.230	7 3/16	5⅞	12 10 3/16 ¼	15.0 19.0 26.0 37.5
18	8	11¾	.450	.260	7 3/16	5⅞	12 10 3/16 ¼	16.0 20.5 28.0 38.5
20	8	11¾	.495	.290	7 3/16	5⅞	12 10 3/16 ¼	17.5 22.5 30.5 41.0
22	8	11¾	.550	.320	7 3/16	5⅞	10 3/16 ¼	24.0 33.0 43.5
24	8	11¾	.600	.350	7 3/16	5⅞	10 3/16 ¼	26.0 35.0 47.0
16	10	11¾	.550	.360	7 3/16	5⅞	10 3/16 ¼	22.0 30.0 40.0
18	10	11¾	.610	.405	7 3/16	5⅞	10 3/16 ¼	23.8 32.5 43.8
20	10	11¾	.690	.450	7 3/16	5⅞	10 3/16 ¼	25.5 35.0 47.5
24	10	11¾	.830	.540	7 3/16	5⅞	10 3/16 ¼	29.0 39.5 53.0
16	12	17¾	.885	.515	10 13/16	8⅞	10 3/16 ¼	32.0 45.0 50.0
20	12	17¾	1.110	.645	10 13/16	8⅞	10 3/16 ¼	37.0 50.5 67.5
24	12	17¾	1.345	.780	10 13/16	8⅞	10 3/16 ¼	43.0 58.5 77.5
30	12	17¾	1.680	.975	10 13/16	8⅞	3/16 ¼	69.0 91.5
36	12	17¾	2.020	1.175	10 13/16	8⅞	3/16 ¼	80.5 107.0
42	12	17¾	2.370	1.370	10 13/16	8⅞	3/16 ¼	90.5 122.0
48	12	17¾	2.700	1.570	10 13/16	8⅞	3/16 ¼	101.0 134.0
42	16	23¾	4.230	2.490	14 7/16	11⅞	3/16 ¼	130.0 172.0
48	16	23¾	4.850	2.840	14 7/16	11⅞	3/16 ¼	143.0 191.0

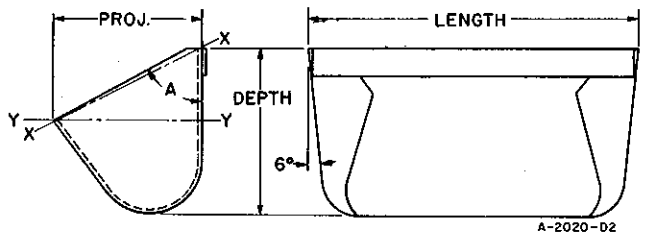
Type DH Continuous Buckets

Bucket Size In Inches			▲Capacity In Cu. Ft.		Dim. In Inches		Gauge of Steel	Approx. Weight In Lbs.
Lgth.	Projection	Depth	At Line "X-X"	At Line "Y-Y"	A	B		
8	5	7¾	.075	0.59	4 13/16	3⅞	14 12 10	4.5 6.0 7.5
10	5½	8¾	.115	.090	5 7/16	4⅜	14 12 10	6.1 8.5 10.9
11	6	8¾	.147	.116	5 7/16	4⅜	12 10	9.2 11.5
12	6	8¾	.160	.126	5 7/16	4⅜	12 10	10.2 12.8
8	8	11¾	.195	.151	7 3/16	5⅞	12 10	11.5 14.1
10	8	11¾	.244	.190	7 3/16	5⅞	12 10	12.4 16.5
12	6	11¾	.160	.126	7 3/16	5⅞	12 10 3/16	11.9 14.9 19.8
12	7	11¾	.224	.178	7 3/16	5⅞	12 10 3/16	12.7 16.0 21.4
12	8	11¾	.292	.229	7 3/16	5⅞	12 10 3/16	15.0 18.5 24.0
14	8	11¾	.341	.286	7 3/16	5⅞	12 10 3/16 ¼	17.0 21.0 27.0 35.0
16	8	11¾	.390	.307	7 3/16	5⅞	12 10 3/16 ¼	19.0 23.0 30.0 38.7
18	8	11¾	.439	.346	7 3/16	5⅞	12 10 3/16 ¼	20.7 25.5 32.8 42.5
20	8	11¾	.488	.385	7 3/16	5⅞	12 10 3/16 ¼	22.7 27.8 35.8 46.4
22	8	11¾	.536	.424	7 3/16	5⅞	10 3/16 ¼	30.1 38.8 50.3
24	8	11¾	.585	.463	7 3/16	5⅞	10 3/16 ¼	32.4 41.8 54.2
16	10	11¾	.500	.410	7 3/16	5⅞	10 3/16 ¼	23.8 32.9 42.6
18	10	11¾	.550	.460	7 3/16	5⅞	10 3/16 ¼	25.9 35.8 46.5
20	10	11¾	.620	.510	7 3/16	5⅞	10 3/16 ¼	28.0 38.8 50.3
24	10	11¾	.750	.620	7 3/16	5⅞	10 3/16 ¼	32.2 44.8 57.9
16	12	17¾	.700	.700	10 13/16	8⅞	10 3/16 ¼	37.5 51.0 66.0
20	12	17¾	.901	.901	10 13/16	8⅞	10 3/16 ¼	46.3 60.3 77.5
24	12	17¾	1.079	1.079	10 13/16	8⅞	10 3/16 ¼	53.5 69.2 89.0
30	12	17¾	1.312	1.312	10 13/16	8⅞	3/16 ¼	83.0 104.0
36	12	17¾	1.579	1.579	10 13/16	8⅞	3/16 ¼	97.0 124.0
42	12	17¾	1.846	1.846	10 13/16	8⅞	3/16 ¼	111.0 144.0
48	12	17¾	2.113	2.113	10 13/16	8⅞	3/16 ¼	125.0 165.0
42	16	23¾	3.380	3.380	14 7/16	11⅞	3/16 ¼	157.0 200.0
48	16	23¾	3.860	3.860	14 7/16	11⅞	3/16 ¼	175.0 225.0

▲ Working capacities should be 75% of those listed.

Specifications subject to change without notice.

Goodman Conveyor Steel Elevator Buckets



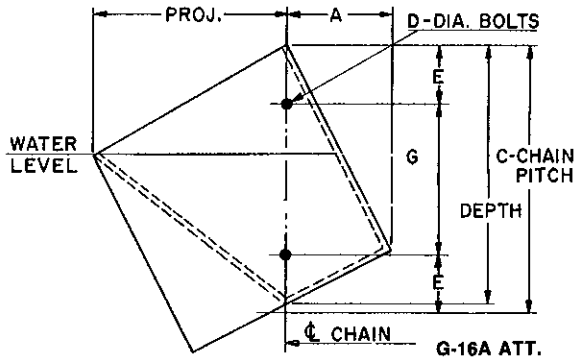
Salem

★ Nominal Size		Bucket Size in Inches			Angle A	▲Capacity in Cubic Feet		Average Weight (in Lbs.) of 100 Buckets For Various Metal Gauges							
		Lgth.	Pro-jection	Depth		At Line "X-X"	At Line "Y-Y"	20 Ga.	18 Ga.	16 Ga.	14 Ga.	12 Ga.	10 Ga.	8 Ga.	3/16"
2½	2½	2½	2 5/16	2 3/8	68°	.005	.0035	29	...	...	....	....	....	....	....
3	2½	3	2 5/16	2 3/8	68°	.006	.0042	38	...	...	....	....	....	....	....
3½	2½	3½	2 5/16	2 3/8	68°	.007	.0049	45	...	...	....	....	....	....	....
3	3	3	2¾	2⅞	67°	.008	.0056	42	...	...	....	....	....	....	....
3½	3	3½	2¾	2⅞	67°	.010	.0070	44	...	...	....	....	....	....	....
4	3	4	2¾	2⅞	67°	.011	.0077	48	...	...	....	....	....	....	....
4½	3	4½	2¾	2⅞	67°	.013	.0091	54	...	...	....	....	....	....	....
4	3½	4	3¼	3⅜	68°	.016	.0112	58	...	...	....	....	....	....	....
4½	3½	4½	3¼	3⅜	68°	.017	.0119	72	...	...	....	....	....	....	....
5	3½	5	3¼	3⅜	68°	.018	.0126	84	...	...	....	....	....	....	....
5	4	5	3¾	3⅞	64°	.026	.0182	..	120	...	....	....	....	....	....
5½	4	5½	3¾	3⅞	64°	.028	.0196	..	130	...	....	....	....	....	....
6	4	6	3¾	3⅞	64°	.031	.0217	..	140	...	....	....	....	....	....
7	4½	7	4⅛	4⅜	66°	.042	.0294	..	160	...	....	....	....	....	....
8	5	8	4½	5⅛	61°	.059	.0413	..	190	200	225	300	460	....	....
9	5	9	4½	5⅛	61°	.067	.0469	..	210	220	275	350	507	....	....
10	5	10	4½	5⅛	61°	.075	.0525	..	233	260	325	420	554	....	....
10	5½	10	5⅛	5⅝	66°	.101	.0707	..	265	280	350	480	600	....	....
9	6	9	5⅜	6	62°	.098	.0686	..	200	240	300	390	570	....	....
10	6	10	5⅜	6	62°	.108	.0756	..	260	300	390	500	621	793	872
11	6	11	5⅜	6	62°	.119	.0833	..	280	340	400	520	672	855	940
12	6	12	5⅜	6	62°	.130	.0910	..	300	360	450	600	723	917	1008
13	6	13	5⅜	6	62°	.141	.0987	..	380	380	474	625	774	979	1076
14	6	14	5⅜	6	62°	.152	.1064	..	400	400	502	650	825	1041	1144
15	6	15	5⅜	6	62°	.162	.1134	..	425	432	530	675	876	1103	1212
16	6	16	5⅜	6	62°	.174	.1218	..	450	450	558	693	927	1165	1280
18	6	18	5⅜	6	62°	.196	.1372	..	...	490	614	741	1029	1289	1416
10	7	10	6⅜	6¾	69°	.151	.1057	..	...	360	500	600	790	964	1060
11	7	11	6⅜	6¾	69°	.168	.1176	..	...	380	531	640	848	1034	1137
12	7	12	6⅜	6¾	69°	.183	.1281	..	...	450	563	680	906	1104	1214
13	7	13	6⅜	6¾	69°	.200	.1400	..	...	475	595	715	964	1174	1291
14	7	14	6⅜	6¾	69°	.216	.1512	..	...	500	600	750	1022	1244	1368
15	7	15	6⅜	6¾	69°	.232	.1624	..	...	520	659	825	1080	1314	1445
16	7	16	6⅜	6¾	69°	.249	.1743	..	...	540	691	950	1138	1384	1522
18	7	18	6⅜	6¾	69°	.272	.1904	..	...	580	755	960	1254	1524	1676
20	7	20	6⅜	6¾	69°	.307	.2149	..	...	640	819	1030	1370	1664	1830
12	8	12	7¼	7½	67°	.214	.1498	..	...	500	625	860	950	1160	1276
14	8	14	7¼	7½	67°	.254	.1778	..	...	530	670	925	1076	1314	1444
16	8	16	7¼	7½	67°	.292	.2044	..	...	570	712	970	1202	1468	1612
18	8	18	7¼	7½	67°	.332	.2324	..	...	600	750	1050	1328	1622	1780
20	8	20	7¼	7½	67°	.370	.2590	..	...	690	860	1150	1454	1776	1948
22	8	22	7¼	7½	67°	.410	.2870	..	...	750	937	1210	1580	1930	2116
24	8	24	7¼	7½	67°	.450	.3150	..	...	810	1013	1300	1706	2084	2284

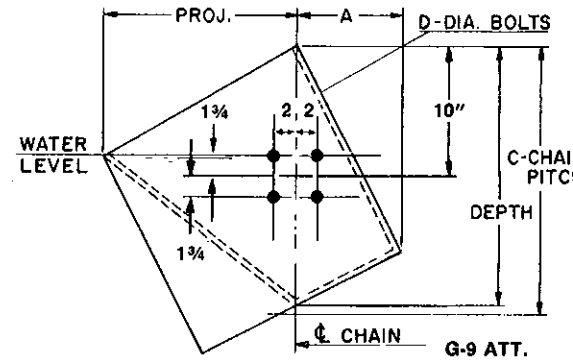
★ Back reinforcing bands are provided on all buckets #18 ga. and lighter, and on #16 ga. buckets, sizes 10 x 5½ and larger. All other size buckets are regularly furnished without back bands. Stainless steel or hot dipped galvanized buckets can be furnished on application.

▲ Working capacities should be 75% of those listed.

Specifications subject to change without notice.



G-16A ATT.



G-9 ATT.

Super Capacity

Bucket Size in Inches			▲Capacity in Cubic Feet		Approx. Weight in Lbs.	Dimensions in Inches							• Used with Chains Numbered For Vertical Elevators
Lgth.	Pro-jection	Depth	At Water Level Full	At 100% Full		A	C	D	E	F	G	Gauge of Metal	
12	8¾	11⅝	.32	.5	20	4¾	12	⅝	4⅛	0	3¾	10	6322•
14	8¾	11⅝	.37	.6	23	4¾	12	⅝	4⅛	0	3¾	10	6322•
16	8¾	11⅝	.43	.7	25	4¾	12	⅝	4⅛	0	3¾	10	6322•
18	8¾	11⅝	.48	.8	27	4¾	12	⅝	4⅛	0	3¾	10	6322•
20	8¾	11⅝	.53	.9	29	4¾	12	⅝	4⅛	0	3¾	10	6322•
16	12¾	17⅝	.95	1.5	58	6½	18	⅝	5	4	0	3⁄16	6859*
20	12¾	17⅝	1.20	1.9	66	6½	18	⅝	5	4	0	3⁄16	6859*
24	12¾	17⅝	1.40	2.2	76	6½	18	⅝	5	4	0	3⁄16	6859*
30	12¾	17⅝	1.80	2.8	87	6½	18	⅝	5	4	0	3⁄16	6859*
36	12¾	17⅝	2.20	3.3	100	6½	18	⅝	5	4	0	3⁄16	6859*

▲ For vertical elevators only.
Working capacities should be 75% of those listed.

• G-16-A chain attachments.

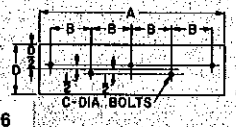
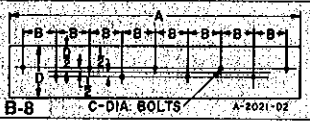
* G-9 chain attachment.

Specifications subject to change without notice.

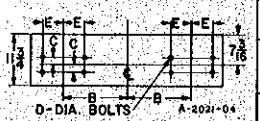
Goodman Conveyor Punching for Elevator Buckets

Punching for Continuous Buckets Types D and DH

For Belt

Punching Diagrams	Dimensions in Inches		
	Bucket Length A	B	C
 CEMA B-6	8	1½	¼
	10	1¾	5/16
	11	2	5/16
	12	2¼	5/16
 CEMA B-7	14	2	5/16
	16	2¼	5/16
	18	2½	5/16
 CEMA B-8	20	2	5/16
	22	2¼	5/16
	24	2½	5/16

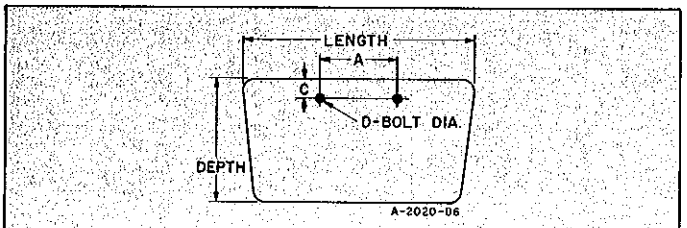
For Two Strands of Chain

Punching Diagram	Chain Number with K2 Attachment	Dimensions In Inches				
		Bucket Length A	B	C	D	E
	C110M	16	4 3/16	7/8	3/8	2 21/32
		18	5 3/16			
		20	6 3/16	1 5/16	½	3
	830R	22	7⅛	1 5/16	½	3
		24	8⅛			

For punching for continuous buckets mounted on a single chain see next page.

Specifications subject to change without notice.

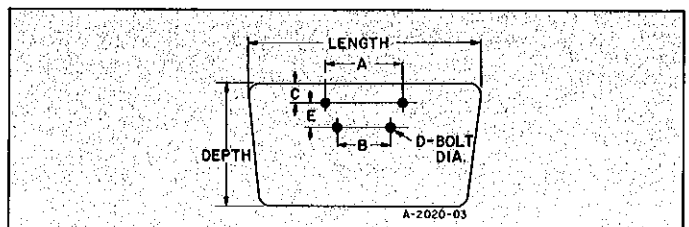
Bucket Punching for Use with Various Chains with K1 and K2 Attachments



Punching for K1 Attachments

Chain No.	Dimensions In Inches				
	A	* C	D	Bucket Minimum Length	Bucket Minimum Depth
32 34 42 45	1¾ 1 11/16 2 2	3/16 5/8 5/8 1 1/16	3/16 3/16 3/16 3/16	4	3
52	2⅜	¾	3/16	5	3¾
55	2	1 1/16	3/16	4	3
57 H60 62 67 H74 75 H75 77	3 3 2⅜ 3 2⅞ 2 13/16 2 13/16 3	1 3/16 1 3/16 1 1/16 ¾ ¾ 1 5/16 1 ⅞	¼ 5/16 ¼ ¼ 5/16 ¼ 5/16 ¼	5	3¾
78 H78 H79	3⅜ 4 4	1 5/16 1 5/16 1 5/16	¼ ⅜ ⅜	6	4¼
H82	4 3/16	1⅛	⅜	7	4
88	3 13/16	1 5/16	5/16	6	4¼
C102B	4¾	1⅝	⅜	8	5½
103	4 3/16	1⅛	⅜	7	4
124	6	1 7/16	⅝	9	6¼
C131	4 3/32	1 5/16	⅜	7	4
C160	3	¾	5/16	5	3¾
C188	3¾	⅞	⅜	6	4¼
442 445 452 455	2 2 1/16 2 1/16 2	⅝ ⅝ ⅝ ⅝	3/16 3/16 3/16 ¼	4	3
462 477	2⅜ 3	1 1/16 ⅞	¼ ¼	5	3¾
488	3 13/16	1 5/16	¼	6	4¼
1155	2	⅝	¼	4	3
4103	4 3/16	1⅛	⅜	7	4
6102B	4¾	1⅝	⅜	8	5½
6131 6188	4 3/32 3¾	1½ 1 5/16	⅜ ⅜	7	4

* For continuous buckets, disregard the C dimension. Otherwise, bolt holes will be punched as shown above, except centerline of holes will be as given under dimension A (centerline of chain attachments) on types D and DH bucket drawings.



Punching for K2 Attachments

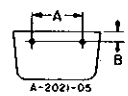
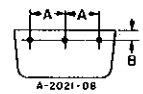
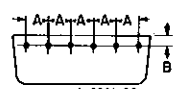
Chain No.	Dimensions In Inches						
	A	B	* C	D	E	Bucket Minimum Length	Bucket Minimum Depth
H82	4¼	4¼	¾	⅜	1 5/16	7	4
95 C102B C102½	5 5/16 5 5/16 5⅜	5 5/16 5 5/16 5⅜	¾ ¾ ⅞	⅜ ⅜ ⅜	1⅝ 1¾ 1¾	8	5½
103	4⅛	4⅛	¾	½	1½	7	4
C110	5 5/16	5 5/16	1 1/16	⅜	1¾	8	5½
C111	6¼	6¼	⅞	½	2 3/16	10	6¼
H124	5¼	5¼	¾	⅜	1 15/16	8	5½
C131	4 3/32	4 3/32	⅞	½	1½	7	4
C132	7½	7½	⅞	½	2¾	11	6¼
C188	4 3/16	4 3/16	1 1/16	5/16	1¼	7	4
488	3 5/8	3 5/8	1 1/16	5/16	1¼	6	4¼
710 720S 730	6¼ 6 6	6¼ 6 6	¾ 1 1	⅜ ½ ½	2 5/16 2⅝ 2⅝	10	6¼
823	5¼	5¼	¾	⅜	1 1/16	8	5½
825 830 844	6 6 6	6 6 4⅞	⅞ 1 5/16 1	½ ½ ½	2⅝ 2⅝ 2¾	10	6¼
847	9¾	8⅝	1 5/16	¾	3½	14	7¼
4103	4⅛	4⅛	⅞	½	1½	7	4
6102B 6110	5 5/16 5 5/16	5 1/4 5 1/4	¾ 1	⅜ ⅜	1¾ 1¾	8	5½
6111	6¼	6¼	1 5/16	½	2 5/16	10	6¼
6188	4 3/16	4 3/16	1 1/16	5/16	1¼	7	4
6825 6830 6844	6 6 6 5/16	6 6 6 5/16	⅞ ⅞ 1	½ ½ ½	2⅝ 2⅝ 2¾	10	6¼
6150P	7½	7½	1	½	2¾	11	6¼

Specifications subject to change without notice.

Bucket Punching for Belts

Unless otherwise specified, Goodman Conveyor Malleable Iron Buckets Types A, AA, AA-RB and SC, and Salem Steel Buckets, when ordered "Punched for Belt," will be punched according to the following tables.

Punching for Salem Steel Buckets

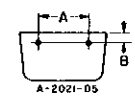
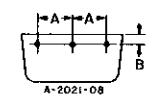
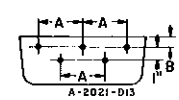
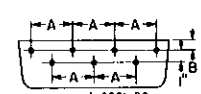
★ Diagram No.		Punching Diagrams	Dimensions in Inches		
			Bucket Length	A	B
Good-man	CEMA		2½	⅞	½
			3	1⅜	½
			3½	1⅞	½
1	B-1		4	2⅝	⅝
			4½	2¾	⅝
			5	3⅜	⅝
			5½	3⅝	⅝
			6	4⅜	⅝
2	B-2		7	2¹¹⁄₁₆	¾
			8	3⅛	⅞
			9	3⅝	⅞
			10	4⅛	⅞
3	B-3		11	3	⅞
			12	3⅜	⅞
			13	3¾	⅞
4	B-4		14	3	⅞
			15	3¼	⅞
5	B-5		16	2⅞	⅞
			18	3⅛	⅞
			20	3½	⅞
			22	4	⅞
			24	4⅝	⅞

★ Use ¼″ dia. bolts for Salem buckets with a projection of less than 7″; ⅜″ dia. bolts for 7″ projection and over.
For all buckets, the width of the belt = the length of the bucket +1″ (up to 16″) and the length of the bucket + 2″ for 16″ long and over. Use Excelsior head bolts for attaching buckets to the belt. 4-ply belt takes a ¾″ long bolt; 5 and 6-ply take a 1″ long bolt, and 8-ply take a 1¼″ long bolt. Use one leather washer on each bolt between bucket and belt.

■ For type SC buckets 8″ long use diagram 8. For all other types 8″ long use diagram 9.

• Dimension B for type SC buckets is 1″.

Punching for Malleable Iron Buckets Types A, AA, AA-RB, and SC

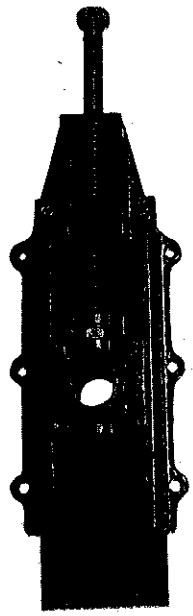
★ Diagram No.		Punching Diagrams	Dimensions in Inches			
			Bucket Length	A	B	Bolt Dia.
Good-man	CEMA		3	1⅜	¾	¼
7	B-1		4	2⅝	¾	¼
			5	3⅜	1	¼
			6	4⅜	1	¼
8	B-2		7	2½	1	¼
			■ 8	3	1	¼
9	B-6		■ 8	3	⅞	¼
			9	3	⅞	¼
			10	3½	• ⅞	5⁄16
			11	4	⅞	5⁄16
			12	4½	• ⅞	5⁄16
10	B-7		13	3½	⅞	5⁄16
			14	4	• ⅞	5⁄16
			15	4	⅞	5⁄16
			16	4½	• ⅞	5⁄16
			17	4½	⅞	5⁄16
			18	5	• ⅞	5⁄16
11	B-8		19	4	⅞	5⁄16
			20	4	• ⅞	5⁄16
			21	4½	⅞	5⁄16
			22	4½	⅞	5⁄16
			23	5	⅞	5⁄16
			24	5	⅞	5⁄16

Specifications subject to change without notice.

Type CU Take-up is for vertical side mounting on a bucket elevator boot (or on a similar chain type conveyor) requiring a sealed shaft slot and compensation for the change in chain centers due to oscillation. The take-up frame is gray iron and has a flush steel sliding cover plate, supported on the bearing housing, which moves with the bearing as it is adjusted. The cover plate has a felt seal around the shaft and is held against the elevator casing by wave springs mounted in recesses in the take-up frame, sealing the shaft slot in the casing.

The take-up can be furnished with self-aligning babbitted, ball or roller bearings. The babbitted bearing has a gray iron housing, finished on the ends, with a common babbitt lining which is broached and burnished to size. The housing is tapped for a grease fitting and the bearing has a grease groove. The housing is mounted in two-piece gray iron slide brackets that can be taken apart to remove the bearing from the take-up without removing the whole take-up from the elevator. The ball bearing take-up block is gray iron with an externally self-aligning, #200 series, deep groove ball bearing. The bearing has labyrinth seals and a set screwed, eccentric locking collar for holding it to the shaft.

Type CU



To Our Customers:

It is the objective of Goodman Conveyor Company, Inc. to provide products that are safe. User safety is a primary consideration in product design; we maintain high quality manufacturing standards; and we take a leadership position in the promotion of safety in our industry.

Safety Precautions

In its usual application, a bucket elevator is enclosed within a housing or casing and is fundamentally a safe machine. Most accidents are usually the result of someone's carelessness or negligence. Certain precautions should be exercised to insure that the natural safety provisions of an elevator assembly are utilized. Goodman Conveyor Company bucket elevators are neither manufactured nor designed to handle materials hazardous to personnel. Such materials would include those which are explosive, flammable, toxic or in some way dangerous to people. Consult Goodman Conveyor Company for elevators handling these materials. The following should be considered as minimum provisions in order to avoid unsafe or hazardous conditions:

1. Use good, sound judgement when working around an elevator (walking on covers, guards, etc., poking at material in an operating elevator, or putting ones arms or legs inside elevator should be avoided).

2. Maintain periodic safety equipment operation/maintenance programs for personnel.

3. Maintain good and routine housekeeping practices as well as adequate lighting about the elevator area.

4. Safety devices and controls must be provided by purchaser/owner as required by local, state, and federal codes, statues, and laws.

5. All operating personnel should be kept aware of the location and operation of emergency controls. Frequent inspections of these controls as well as covers, guards, and other equipment is required to ensure proper working conditions and correct positioning.

6. Bucket elevators should not be operated unless the elevator housing completely encloses the elevator's moving elements and power transmission guards are in place. If the inspection door or housing is to be open, lock out the motor electrically in such a manner that it can not be restarted by anyone (either in the same vicinity or from a remote location).

7. If, because of application, the elevator must require an open housing, separate the entire elevator from personnel areas by a fence and warning signs posted.

8. Open feed hoppers, spouts for shovel, end loader, or other loading means must incorporate a grating. If such conditions exist that a grating cannot be used, the exposed portion of the elevator must be guarded by a fence and warning signs posted.

9. All rotating equipment (drives, gears, couplings, etc.) must be guarded as required by applicable codes, statues, and laws.

10. Inlet and discharge openings shall be connected such that all moving parts of the elevator are completely enclosed.

11. Upon arrival, all equipment should be checked for damage. Damaged equipment should not be installed.

12. It is the responsibility of contractor, installer, owner, and user to supplement the materials furnished by Goodman Conveyor Company to result in a safe elevator installation and to comply with Williams-Steiger Occupational Safety and Health Act, state or local laws and ordinances, and the American National Standard Institute Safety Code.

This Elevator Section contains all the necessary descriptive, dimensional and engineering data for maximum ease in selecting a Goodman Conveyor Standard Elevator.

For bulk materials from fines to 8" lumps, capacities as much as 600 tons per hour and centers up to 100 feet, a Goodman Conveyor Standard Bucket Elevator can be found in this catalog to meet most requirements.

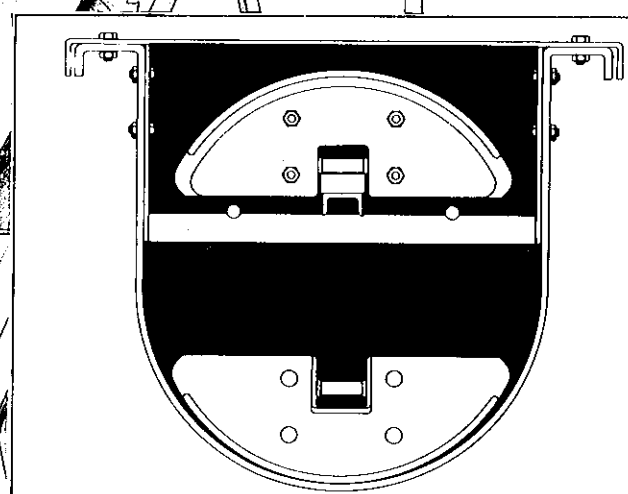
Through many years of experience in designing and manufacturing elevators, Goodman Conveyor engineers have succeeded in selecting a complete line of Standard Elevators, embodied herein, which will meet the demands of most industries.

Pre-engineering benefits the customer by savings in time and expense of designing special elevators. Time required to prepare approval drawings is drastically reduced, and through use of pre-engineered components, quick delivery is assured.

Goodman Conveyor Multi-Flo®
Drag Type Conveyo

GOODMAN CONVEYOR

GOODMAN CONVEYOR HAS THE SIMPLE SOLUTION



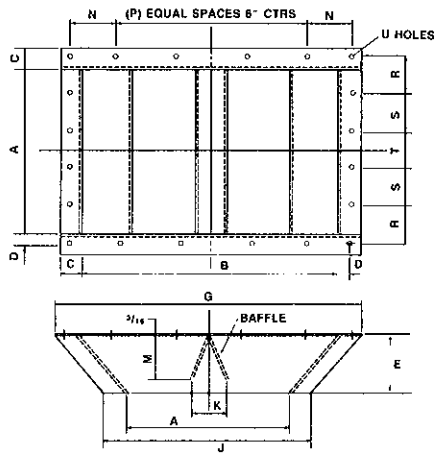
9" to 24" Standard

GOODMAN CONVEYOR FREE-FLO INLET

FOR MULTI-FLO® CONVEYORS

Goodman Conveyor offers two ways to solve the problem of locating multiple inlets on conveyors handling free flowing grain products. The Free-Flo Inlet combines the advantage of an inverted V baffle (to divert material around the returning strand of chain and flights) with ease of location anywhere along the length of the conveyor. The Free-Flo Inlet is available in two styles, rectangular and square. The rectangular Free-Flo Inlet retains the same flange and drilling pattern as our standard By-Pass Inlet. The square Free-Flo Inlet is designed to match CEMA standard screw conveyor discharge patterns. Both Free-Flo Inlets have the same backing height from conveyor centerline to top of inlet flange as our standard By-Pass Inlet. Whether your plans call for cross-feeding your Multi-Flo Conveyor with another Multi-flo Conveyor or with a Goodman Conveyor screw conveyor, Goodman Conveyor offers an economical method which combines ease of design with ease of fit-up. Let Goodman Conveyor solve your material handling problems.

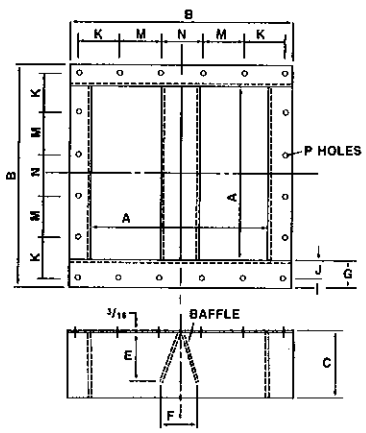
Rectangular FREE-FLO INLET DIMENSIONS



Conv. Size	A	B	C	D	E	F	G	J	K	M	N	P	R	S	T	U
9	10	18	1½	1	3 13/16	10	21	13½	2	3	4	2	4	—	4	7/16
12	13	21	2	1¼	5 3/16	13	25	17	3	4	5¾	2	5 1/8	—	5¼	7/16
14	15	24	2	1¼	5 11/16	15	29	19	3	4	4¼	3	3½	3½	3½	7/16
16	17	27	2	1¼	6 5/16	17	31	21	6	3	6¼	3	3 3/4	4	4	7/16
18	19	30	2½	1½	6 13/16	19	35	24	6	3	5½	4	4 7/16	4 3/8	4 3/8	9/16
20	21	34	2½	1½	7 7/16	21	39	26	6	3	4½	5	4 7/8	4 3/4	4¾	9/16
24	25	40	2½	1½	8 7/16	25	45	30	6	3	5½	6	5 5/8	5 5/8	5½	9/16

Dimensions in inches — Models and specifications subject to change without notice.

Square FREE-FLO INLET DIMENSIONS



Conv. Size	A	B	C	D	E	F	G	J	K	M	N	P
9	10	13	3 13/16	10	3	2	1½	1	4	—	4	7/16
12	13	17	5 3/16	13	4	3	2	1¼	5 1/8	—	5 1/4	7/16
14	15	19	5 11/16	15	4	3	2	1¼	3 1/2	3 1/2	3 1/2	7/16
16	17	21	6 5/16	17	3	6	2	1¼	3 3/4	4	4	7/16
18	19	24	6 13/16	19	3	6	2½	1½	4 7/16	4 3/8	4 3/8	9/16
20	21	26	7 7/16	21	3	6	2½	1½	4 7/8	4 3/4	4 3/4	9/16
24	25	30	8 7/16	25	3	6	2½	1½	5 5/8	5 5/8	5 1/2	9/16

Dimensions in inches — Models and specifications subject to change without notice.

The Goodman Conveyor Free-Flo Inlet is designed for use with dry, clean, free-flowing, grain-type materials. The Goodman Conveyor Free-Flo Inlet is not designed nor intended to serve as a volumetric feed control device.

Goodman Conveyor Multi-Flo® Drag Type Conveyors

The clean, quiet, efficient money-saving approach to conveying free-flowing bulk materials

Multi-Flo® drag-flights push dry bulk materials through the system and clean as they convey. Thus, Goodman Conveyor Multi-Flo® systems are ideal for applications in which several materials must move through the same network without cross-contamination. Materials travel with little agitation or friction, so that material degradation, noise and power requirements are reduced.

Low friction, low agitation running is also highly efficient running. Generally, Multi-Flo® conveyors will move the **same volume as screw type conveyors with much less horsepower.** Easy, more flexible installation cuts costs, too.

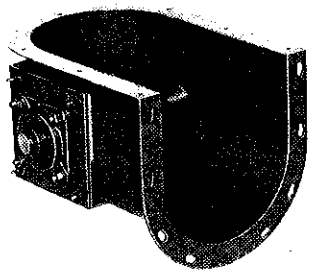
Here are some other points to consider as you select the conveyor for your application.

- **More conveying capacity.** Screw conveyors are considered full by CEMA at 45% trough loading because of the need for internal bearings for support. Multi-Flo® systems generally carry a greater cross sectional loading which results in higher capacities.
- **CEMA standard trough.** Standardization and interchangeability pay off in quick availability, lower start-up costs, easy replacement.
- **Simplified installation.** The flexibility of a chain-pulled drag flight system solves engineering problems, reduces the need for custom components. Drop-in return track takes impractical tolerances out of on-site installation.
- **Lower installation costs.** Multi-Flo® conveyors are lighter than screw conveyors and therefore are less costly to install and can use lighter intermediate supports.
- **Less metal-to-metal contact.** Polyethylene flights and a polymer return track eliminate the friction and noise of metal against metal throughout the bulk of the system.
- **Expert consultation, wide distribution.** Fast service is available to you on complete Goodman Conveyor Multi-Flo® conveyors and components through our strategically located Distribution Network. Their factory training and wide experience in bulk material handling is immediately available to you.

GOODMAN CONVEYOR

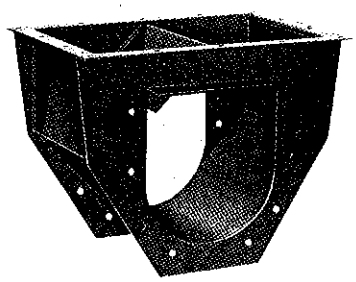
MEMBER CEMA CONVEYOR EQUIPMENT MANUFACTURERS ASSOCIATION

Eight Reasons Why Multi-Flo®



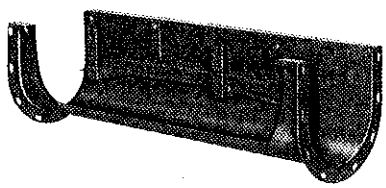
1. Self-Cleaning Tail Section

Contoured shape virtually eliminates material build-up in tail section because the flights give it a full, clean sweep. A standard feature that prevents cross contamination in multi-material applications and purges degradable material from the system.



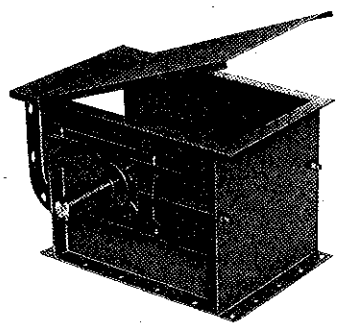
2. Standard By-Pass Inlet

Internal "V" shaped shroud diverts incoming material around chain and returning flights to prevent clogging and choking.



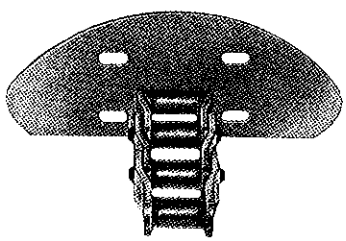
3. Intermediate Section

Low friction high strength polymer track liner eliminates metal-to-metal contact within the section, increases useful life of chain and provides quieter operation. Return track also features **drop-in** installation—its design eliminates the need for painstaking, on-site alignment. Easier is quicker . . . and more economical.



4. Head Section

Flanged anti-friction bearing take-ups insure proper chain tension, less wear. Shaft projection ready for connection to drive equipment. Hinged relief lid reduces potential damage should the system become clogged.

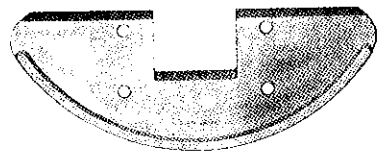


5. Welded Steel Chain

Standard on Multi-Flo® conveyors, welded steel chain provides more strength, longer life. Rugged attachments are jig welded for constant alignment and give maximum support to the flights. Result: less flight replacement.

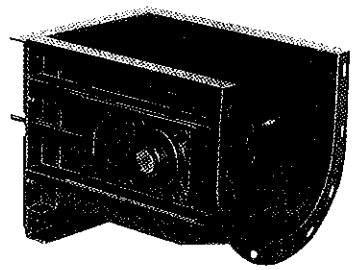
is the Simple Solution for a Variety of Applications

6. Precision Molded Flights



Linear high-density polyethylene flights are precision molded with a **wear shoe** for proper fit in conveyor trough. The fit makes them highly efficient; the slightly flexible polyethylene insures low friction; the result is **extended life.** Heavy duty Elastomer flights are available as an option for moving materials with abrasive codes 6 or 7.

7. Optional Tail Section with Take-Up



Ideally suited for applications where additional take-up is desired and tail section need not be self-cleaning. Flanged anti-friction bearing take-ups provide for greatly extended running life before chain links must be removed to compensate for stretch and wear.

8. Intermediate Discharge Options

Multi-Flo® discharge gate options include **hand slide type, rack** and **pinion, pneumatic,** and **electrically operated in flat or curved slide models.**

Safe Operation

Your Goodman Conveyor Multi-Flo® type conveyor is designed to comply with CEMA safety standards, obtainable through the American Society of Mechanical Engineers as ANSI B20.1a-(1989). These standards (as well as the Goodman Conveyor installation, maintenance, safety and operating instructions) should be consulted before installation and operation of the conveyor.

Design and Selection of a Multi-Flo® Conveyor System

The basic design criteria required for the selection of a Multi-Flo® conveyor are:

- the bulk density and flowability characteristics of the material to be moved
- the quantity to be moved (pounds or tons) per hour
- the distance the material is to be conveyed
- the material loading method (Standard Multi-Flo® units are **conveyors**, not feeders)

Using this catalog, you can select a properly sized and powered Multi-Flo® conveyor in six simple steps: **(1)** classifying the unit as a conveyor (not a feeder), **(2)** noting the characteristics of the material to be conveyed; **(3)** selecting the necessary size and speed for your system; **(4)** calculating the required horsepower; **(5)** calculating the required chain pull capacity; **(6)** selecting conveyor components. Necessary tabular data and equations are available on the following pages, as well as an example of how the process works.

Please contact Goodman Conveyor for special or unusual applications (i.e. inclined units or units with bend sections) not covered in this catalog.

Unit Classification—Multi-Flo® Conveyor Loading

There are two basic methods of loading:

- **From regulated output devices.** Multi-flo® conveyors are designed to operate at a pre-determined capacity level. Using regulated material loading devices, the Multi-Flo® conveyor can be designed to handle anticipated loads without further regard to input regulation. When two or more inlets are used simultaneously, the aggregate rate of loading must not exceed the design limits of the conveyor.
- **From static storage.** Unregulated loading directly from static storage classifies the Multi-Flo® unit as a feeder, not a conveyor. In such situations, consult Goodman Conveyor.

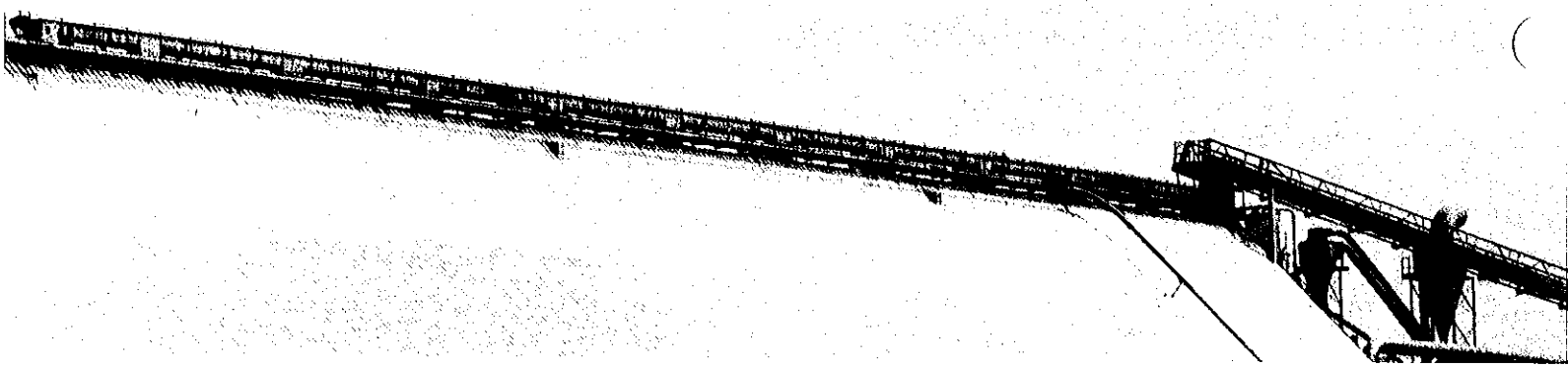
Conveyor overloading can cause accelerated wear on conveying and drive components and/or breakage due to increased stresses.

Multi-Flo® Capacity

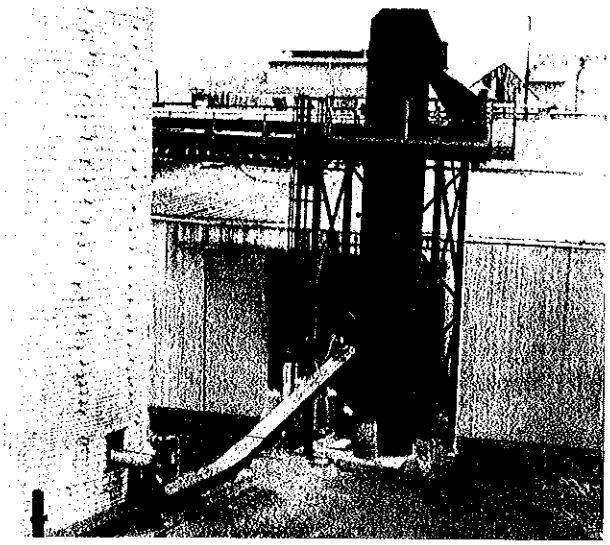
Unit Size	Unit of Measure	100 FPM		125 FPM		150 FPM		175 FPM	
		Capacity	RPM	Capacity	RPM	Capacity	RPM	Capacity	RPM
9″	CFH	2050	73	2650	91	3075	110	3585	128
	BPH	1640	73	2048	91	2460	110	2868	128
12″	CFH	3500	56	4375	70	5250	84	6125	98
	BPH	2800	56	3500	70	4200	84	4900	98
14″	CFH	4800	50	6000	63	7200	75	8400	88
	BPH	3840	50	4800	63	5760	75	6720	88
16″	CFH	6200	38	7750	48	9300	58	10850	67
	BPH	4960	38	6200	48	7440	58	8680	67
18″	CFH	8300	35	10375	44	12450	53	14525	61
	BPH	6640	35	8300	44	9960	53	11620	61
20″	CFH	10660	30	13250	37	15900	44	18550	52
	BPH	8480	30	10600	37	12720	44	14840	52
24″	CFH	15000	27	18750	34	22500	40	26250	47
	BPH	12000	27	15000	34	18000	40	21000	47

This table, used in conjunction with the Materials Table, will enable you to select the proper conveyor size and speed for your application.

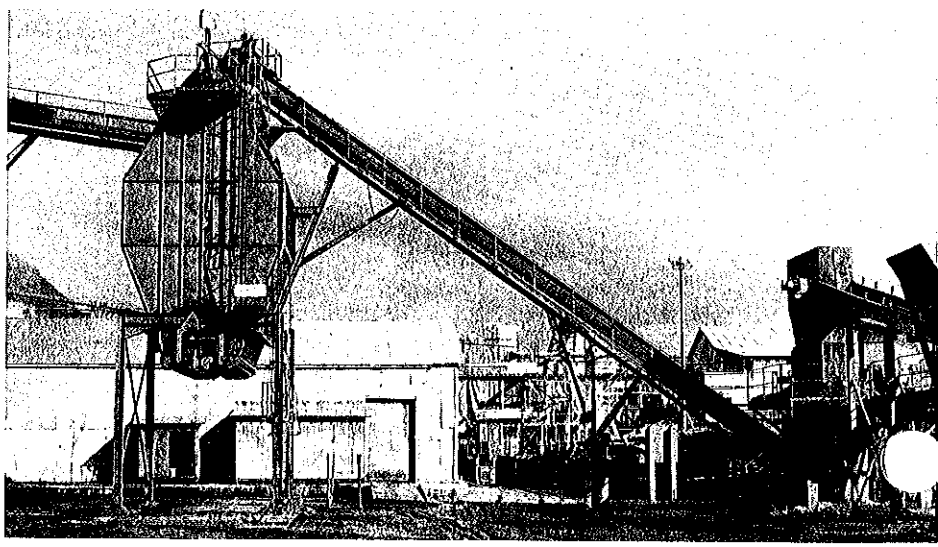
Note: Listed capacities are for dry, clean, free-flowing, grain-type materials moving horizontally. Applications for materials with flowability codes 3 and 4 which require the use of intermediate discharges reduce chart capacities by 30%. If complete discharge is required at these intermediate points, other features or considerations may be necessary. Consult Goodman Conveyor Company, Inc.



Multi-Flo® conveyor transporting sawdust from bulk storage to processing facility.



Multi-Flo® gathering conveyor taking material from storage to processing.



Multi-Flo® conveying hogged wood to storage bin.

Equation Symbols

TSHP = Total Shaft Horsepower
CFH = Capacity in Cubic Feet per Hour
PCF = Bulk Density
MF = Material HP Factor (From Materials Table)
L = Conveyor Length in Feet
E = Drive Efficiency (usually assumed to be 85%)
RPM = Drive Shaft RPM
(From Capacity Table)
F = Pitch Radius of Sprocket (Inches)
(From Chain Data Table)
CP = Chain Pull

Conveyor Selection

Capacity is required in cubic feet per hour for conveyor selection. If not readily available, it can be determined using the following equation. "Material density" can be acquired from the first column of the Materials Table. Consult Goodman Conveyor for materials not listed.

$$CFH = \frac{\text{REQUIRED CAPACITY (tons/hour) x 2000 (lbs/ton)}}{\text{MATERIAL DENSITY (PCF)}}$$

Example: Material: Shelled Corn
Density: 45 lbs. per cubic foot
Required Capacity: 100 tons per hour
Length of Conveyor: 50 feet

$$\frac{\text{100 (TPH) x 2000 (lbs/ton)}}{\text{45 (PCF)}} = \text{4445 CFH}$$

Now, refer to the capacity columns in the Capacity Table. Based on recommended speed (column 3 of the Materials Table), select the minimum size that equals or just exceeds required capacity.

Example: 4445 CFH needed
9"Multi-Flo® at 150 ft./min. yields 3075 CFH
12" Multi-Flo® at 150 ft./min. yields 5250 CFH
Therefore, the proper selection will be the 12" Multi-Flo® at 150 FPM.

Horsepower Calculation

The following formula is for horizontal conveyors receiving a uniform, regulated feed of materials (as listed in the Materials Table). It applies to normal operating conditions and pre-supposes infrequent starting in a fully loaded condition.

We recommend that suitable service factors be applied to the calculation of horsepower for conveyors operating under conditions unlike those described or in areas subject to low voltage. Consult Goodman Conveyor Company, Inc. for suggestions.

$$TSHP = \frac{CFH \times PCF \times MF \times L}{1{,}980{,}000}$$

$$\text{Example: } TSHP = \frac{4445 \times 45 \times .4 \times 50}{1{,}980{,}000} = 2.02$$

$$\text{MOTOR HP} = \frac{2.02}{.85} = 2.38$$

Therefore, use 3 HP motor

Chain Pull Calculation

The maximum operating chain pull must be checked to ensure that maximum allowable working loads shown have not been exceeded.

$$CP = \frac{63025 \times TSHP}{RPM \times F}$$

$$\text{Example: } \frac{63025 \times 2.02}{84 \times 3.41} = 444.5 \text{ lbs}$$

From the Chain Data Table we find that the 12" diameter Multi-Flo® is rated for 2400 lbs of chain pull. Therefore, our 12" diameter selection is OK.

Chain Data

Conveyor Size	Chain Pitch (In.)	Max. Chain Pull (lbs.)	"F" Sprocket Pitch Rad. (in.)	Average Wt. Per Foot (lbs.) Assembled Chain Standard Spacing
9 12 14	2.609	1300 2400 3000	2.61 3.41 3.82	6.2
16 18	3.075	3400 3750	4.98 5.46	8.4
20 24	4.000	6300 6300	6.47 7.10	11.6

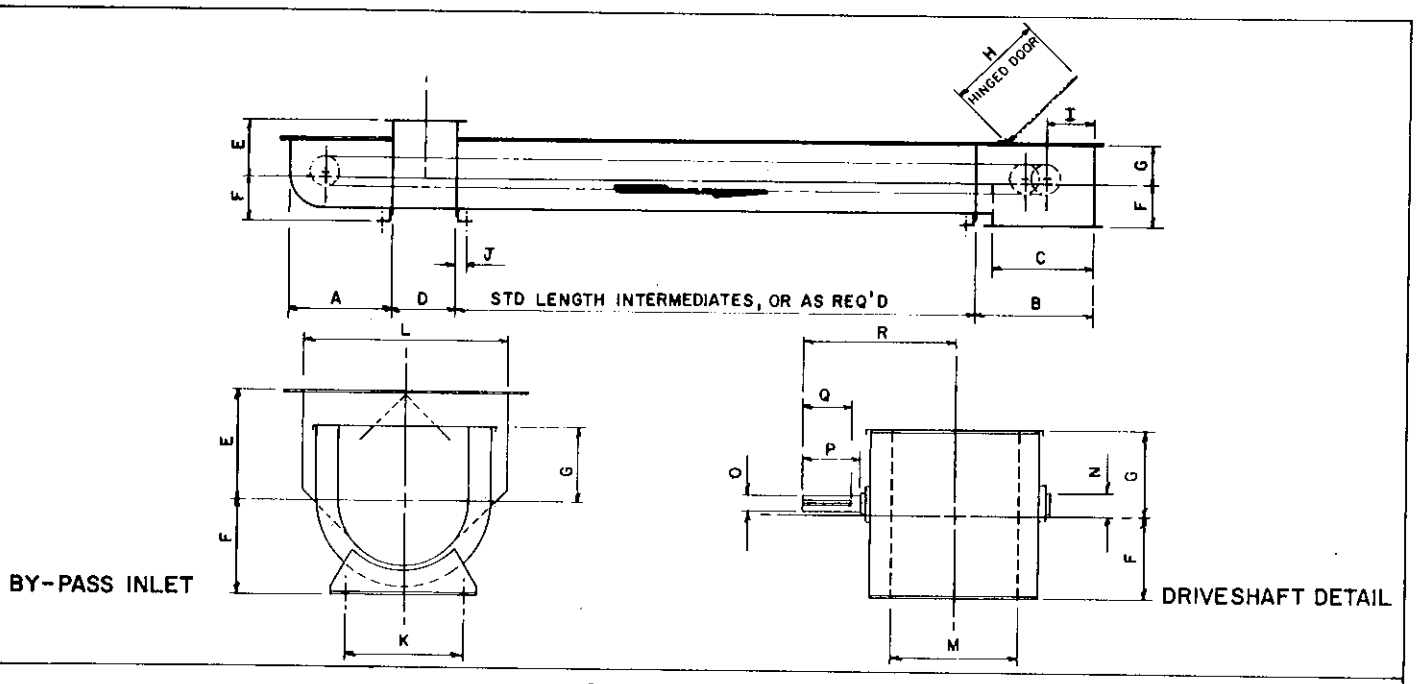
Components and Dimensions

MATERIAL THICKNESS AND APPROXIMATE SHIPPING WEIGHTS

Conveyor Size	Tail	Wgt.[1]	By-Pass	Wgt.	Head	Wgt.[1]	INTERMEDIATE[3]				Cover
							Std. Duty	Wgt.[2]	Spec. Duty	Wgt.[2]	
9	3/16	105	3/16	80	3/16	155	14 Ga.	138	3/16	255	16 Ga.
12	3/16	140	3/16	115	3/16	203	12 Ga.	285	3/16	420	14 Ga.
14	3/16	180	3/16	150	3/16	256	12 Ga.	315	3/16	460	14 Ga.
16	3/16	225	3/16	180	3/16	310	12 Ga.	365	3/16	520	14 Ga.
18	3/16	310	3/16	225	3/16	420	10 Ga.	510	3/16	640	14 Ga.
20	3/16	420	3/16	300	3/16	595	10 Ga.	570	3/16	705	14 Ga.
24	3/16	510	3/16	340	3/16	666	10 Ga.	715	3/16	870	12 Ga.

1) Tail and head weights shown include bearings, shaft, sprocket and cover
2) Intermediate weights shown include return track assembly and cover
3) Intermediate standard lengths: 9" diameter, 10' lengths; 12"-24" diameters, 12' lengths.

Multi-Flo® Conveyor Dimensions

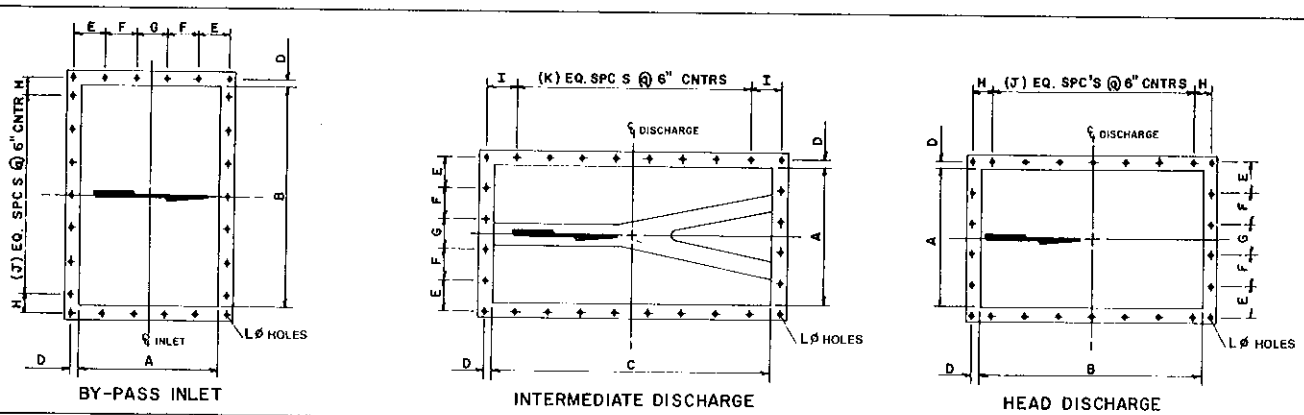


Conveyor Dimensions

Conveyor Size	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R
9	18	21	18	10⅜	10	7⅞	6⅛	12	7½	1¾	9⅜	18	10	1½	1 7/16	6½	5½	14¼
12	21	24	21	13⅜	13	9⅝	7¾	15	10	1⅞	12¼	21	13	2	1 15/16	7	6	16⅝
14	21	27	24	15⅜	15	10⅞	9¼	15	11	1⅞	13½	24	15	2 1/16	2 3/16	8	7	18¾
16	24	30	27	17⅜	17	12	10⅝	18	11	2¼	14⅞	27	17	2 1/16	2 1/16	8½	7	20¼
18	24	33	30	19⅜	19	13⅜	12⅛	18	11	2¼	16	30	19	3	2 15/16	10	7	23¾
20	30	37	34	21⅜	21	15	13½	21	12½	2½	19¼	34	21	3 1/16	3 1/16	11½	7½	26¾
24	30	43	40	25⅜	25	18⅛	16½	25	15	2¾	20	40	25	3 1/16	3 1/16	11½	7½	28¾

Dimensions in inches.

Flange Dimensions



Flange Dimensions

Conveyor Size	A	B	C	D	E	F	G	H	I	J	K	L
9	10	18	20	1	4	—	4	4	5	2	2	7/16
12	13	21	26	1¼	5⅛	—	5¼	5¾	5¼	2	3	7/16
14	15	24	30	1¼	3½	3½	3½	4¼	4¼	3	4	7/16
16	17	27	34	1¼	3¾	4	4	5¾	6¼	3	4	7/16
18	19	30	38	1½	4 7/16	4⅜	4⅜	4½	5½	4	5	9/16
20	21	34	42	1½	4⅞	4¾	4¾	3½	4½	5	6	9/16
24	25	40	50	1½	5⅝	5⅝	5½	3½	5½	6	7	9/16

Dimensions in inches.

Models and specifications subject to change without notice.

INSPECTION:

Inspect the unit periodically for excessive wear and damaged components. Important areas to check: Intake and discharge points for excessive wear, flights, chain and bearing condition, etc.

Frequent inspection of the conveyor often can detect trouble early so that replacement components can be ordered ahead of time, eliminating costly downtime.

If and when flights are replaced, be sure they are bolted securely to the chain attachment. If the conveyor is properly aligned and assembled at the outset and given proper maintenance when in operation, the service life of the unit will be lengthened substantially.

SAFETY:

Your Multi-Flo drag type conveyor has been designed to comply with CEMA safety standards. These safety standards can be obtained through the American Society of Mechanical Engineers as ANSI B20.1. These standards should be consulted before installation and operation of the conveyor.

Operating and maintenance personnel should be thorougly trained in safe operating procedures, recognition of possible hazards, and maintenance of a safe area around the conveyor.

Shown below is an example of the warning sign attached to Multi-Flo conveyor housings.

The following safety guidelines should be followed. THESE ARE GUIDELINES ONLY AND COMPLIANCE WITH SAFETY STANDARDS — LOCAL, STATE, AND FEDERAL, INCLUDING OSHA — IS THE RESPONSIBILITY OF THE USER OF THE MULTI-FLO CONVEYOR.

1. Maintain a safety program for all operating personnel.
2. All operating personnel should be advised of the location of all emergency controls and safety devices. Clear access should be made to these controls and devices.
3. Good lighting, housekeeping, and maintenance contribute to a safe work area around the Multi-Flo conveyor.
4. Frequent inspections should be made of all conveyor equipment, and all safety devices should be in position and in proper working order.
5. Conduct a pre-startup safety check of the conveyor equipment to determine that the machinery and area are safe for operation and that guards and warning devices are in place.
6. There should be absolutely no reckless actions or horseplay in the vicinity of drag type conveyors. Most accidents are caused by lack of proper safety training, carelessness, horseplay, nd lack of awareness of possible hazards.
7. Drag type conveyors should not be operated unless the conveyor housing completely encloses the moving elements and power transmission guards are in place. If the conveyor cover or housing is to be opened, the motor must be locked out electrically in such a way that it can not be restarted by anyone in the vicinity or remote from the conveyor. Overflow cover sections or doors should not be opened while the conveyor is operating.
8. If, because of its application, the conveyor must have open housing, then the entire conveyor must be guarded by others and warning signs posted.
9. Open feed hoppers or spouts for shovel, front end loaders or their manual or mechanical loading must incorporate a grating. If the characteristics of the material being handled as such that a grating can not be used, then the exposed portion of the conveyor must be guarded by a fence and warning signs posted.
10. Do not walk or stand on conveyor cover, grating, or power transmission guards.

Electrical Equipment

Emergency stop switches, safety shut-off switches, zero speed switches, overflow and overload devices, and other electrical controls are all necessary considerations for a safe conveyor installation. (Controls and switches are usually furnished by conveyor user.)

Hazardous Materials

Multi-Flo conveyors are not designed for use in handling hazardous materials, (i.e.—explosive, toxic, noxious, flammable, etc.) or for operating in hazardous conditions or locations.

GOODMAN CONVEYOR

PRODUCT LINE SUMMARY

Belt Conveyor Idler & Components

- CEMA "B" Series Ball Bearing Idlers & Returns/Trainers
- CEMA "C" Series Roller Bearing Idlers & Returns/Impacts/Trainers
- CEMA "D" Series Roller Bearing Idlers & Returns/Impacts/Trainers
- CEMA "E" Series Roller Bearing Idlers & Returns/Impacts/Trainers
- CEMA C, D & E Idlers Also Available In Sealed For Life (SL) Series
- Underground Mine Structure, Rope or Rigid
- Grain Series Roller Bearing Idlers & Returns (Off-Set Frame)

Manufactured Assemblies

- Impact Bar Assemblies for 24" to 72" Belt Width
- Belt Conveyor Trippers
- Terminal & Drive Groups, Underground Mine
- Belt Take-ups and Powerpack, Underground Mine

Screw & Multi-Flo Conveyors

- Shop Assembled Screw Conveyors
- Shop Assembled Screw Feeders
- Shop Assembled Multi-Flo Conveyors
- Troughs
- Screws, Sectional & Helicoid
- Flights, Sectional & Helicoid
- Flights, Multi-Flo
- Hangers/Bearings/Coupling Etc.
- Air Swept Hangers

Bucket Elevators

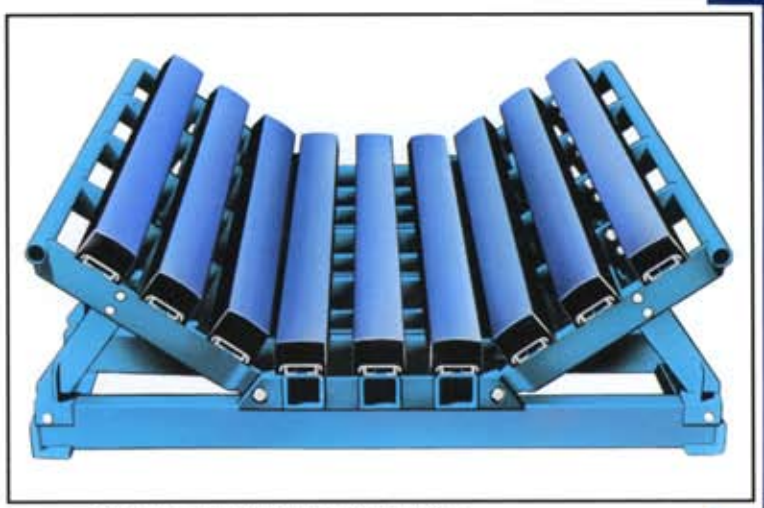
- Shop Assembled Bucket Elevators
- Buckets
- Bucket Elevator Components

Goodman Main Line Structure

UBC capabilities include terminals and intermediate structure. Main-Line Structure is available with heavy channel rails and rigid frame in-line troughing idlers. Intermediate structure is also available in single or double member frames, wire rope and rail varieties. It includes all necessary supports and hardware for roof or floor mounting.

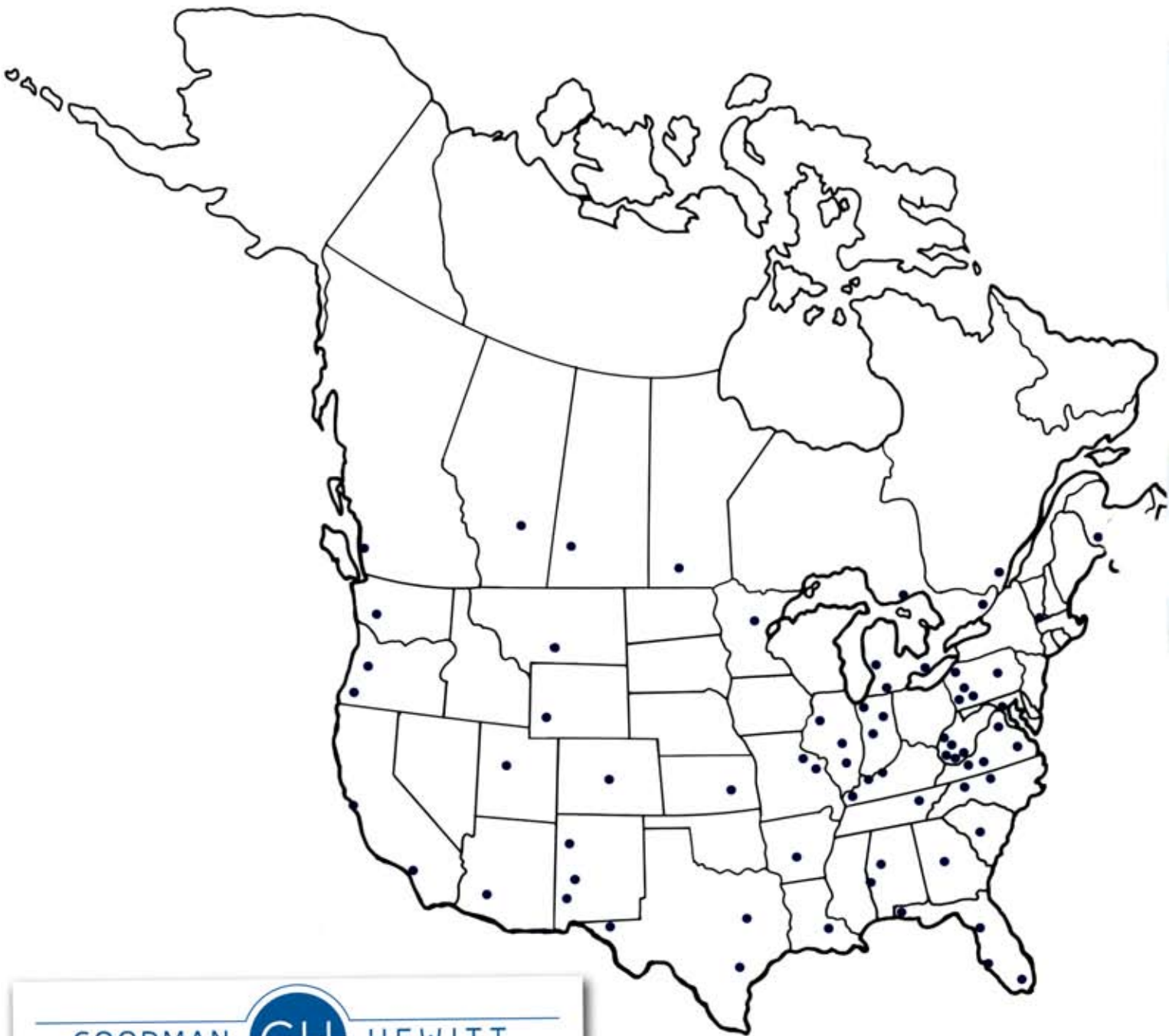
Goodman Idlers

Goodman Conveyor offers a complete line of belt conveyor idlers, which meet or exceed CEMA ratings in B,C, D & E series. All rolls of the standard C,D, and E series idlers have our patented Permaseal II® seal, single point lubrication from either side, or can be furnished with a sealed for life configuration.



Goodman Impact Bar Assemblies

The Impact Bar Assembly is constructed of a rigid tubular steel frame with removable wings on each side. This allows for easy installation or bar replacements. The removable bars have a slick UHMW wear surface with a thick impact absorbing rubber section, vulcanized to a metal insert. Each bar is secured to the frame by easy access T-bolts. Impact bar assemblies are available in both 20° and 35° styles for CEMA C, D, and E series applications.



GOODMAN GH HEWITT

CONVEYORS & COMPONENTS

On August 1, 2009, Goodman Conveyor Company and Hewitt-Robins Conveyor Components were united to create a new kind of conveyor and component company—one dedicated to giving you what you want, when you want it. Call us and a real person will answer the phone and see that you get what you want.

800.388.7701 **www.goodman-hewitt.com**

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