



# LEGACY (U-SERIES) MODELS: U3\_U4\_U5\_UT\_UM RAIL TYPES: HH & EH "DEADLIFT"

**Tandem Axle:** 30,000-50,000 lb. capacities 14' up to 22' recommended container lengths

**Deadlift (HH)** cable hoists were designed to work in low clearance areas. They work with specific containers that feature front vertical rails to help guide them onto the hoist when lifted up to the hoist tail assembly. A "Deadlift" hoist, like its name suggests, picks up containers without the need to engage the hoist rails from the ground but rather raises them up off the ground and onto the hoist rails. Due to the nature of the deadlift containers, these hoist models also feature a slightly more narrow main frame that is set to 35" O.D. and use an inside rail container hold down. These style of hoists can come in the HH short fixed tail or in an EH model that has 80" of extendable tail.

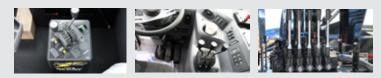


# **Standard Features**

- Inside air controls mounted in our ergonomic Power Tower featuring Plug And Play<sup>™</sup> wiring
- Secondary manual controls mounted outside on driver's side
- 50 gallon Side Mounted Hydraulic Tank
- 3 Micron Filtration inside Steel Tank with Dual Sight/Temp Gauge & Air Breather
- Forward Mount Lift Cylinders except on Single Axle U3models
- Vertical Front Sheave Assembly w/ Knuckle Cable End
- 6 x 37 XIPS Steel cable and cable end holder
- Dual Cylinder Winch Rail w/ Rod Protectors
- Single Stationary Rear Hold Down Inside of Frame Rails
- Dual Automatic spring loaded pass over front container locks
- Tri-Roller Rear Tail Assembly w/ Cable End Holder
- 3/8" T1 Wear Strips on Top of Main Frame Rails (EH models)
- HD Cast Ductile Iron Rear Hinge with Pintle Adaptable Rear Apron and Split Bumpers w/ LED Lighting
- LED Mid Body Turn Signal Lights
- Dual Hoist Maintenance/Safety Props
- Dual Functioning Backup (auto adjusting) & Hoist Up Alarm with signal light in cab
- Warranty: Limited lifetime on frame & 2 year limited on hydraulic system
- Customized engineering layouts ensure the best fit for each customer
- Engineered and manufactured in the US

#### FEATURE TANDEM AXLE

I EATONE	
Hoist main frame	8" x 4" x ½" A500 grade C tubing (%" on EH & U4 models)
Hoist subframe	3" x 2" x ¾6" A500 grade C tubing
Hydraulic pump	Gear type 42 GPM @1,500 RPM
Operating pressure	1,850 PSI
Hydraulic valve	2 OR 3 spool / 45 GPM w/ safety bypass
Oil reservoir	50 gallon steel tank w/ internal 3 micron return filtration
Lift cylinders	(2) DA Rod Type (3-stage DAT - UT models; 2-stage DAT - UM models)
Hinge shaft	2 ½" solid steel
Winch cylinders	(2) DA Rod Type
Cable / cable end	$\%''$ - (U3) $\ 34''$ - (U4) and $\%''$ - (U5/UT/UM) Steel Cable with Knuckle End
Cable sheaves	10" grease grooved
Cable anchors	(4) cable clamps
Front stops	1" steel plate
Front safety lock	Dual Automatic Spring Loaded Pass Over Front Container Safety Locks
Rear hold downs	Stationary Rear Hold Down In Frame
Outside rollers	Side Rollers are 4" O.D. with bronze bearings; Rear Rollers are 8" O.D.
Rails	$\%"\mbox{T1}$ Wear Strips added to top of main frame on EH models
Tail	No Tail (HH models); 80" ext. tail (EH models)
ICC bumper	Not Available



Inside air controls in power tower or integrated into center counsel on cab over trucks w/ in cab hoist up light; Secondary outside manual controls at main control valve



50 gal. Side Mount Steel hydraulic tank w/ 3 micron in tank filtration and dual sight with temperature gauge



Single stationary rear hold down inside of frame rails



HD Cast Ductile Iron Rear Hinge with Pintle Adaptable Rear Apron and Split Bumpers w/ LED Lighting



Raised Front Stops w/ Knuckle Cable End and Dual Automatic Spring Loaded Pass Over Front Container Safety Locks



Forward Mount Lift

as needed

Cylinders w/ drop shaft



Protectors



Dual Cylinder Winch4" side rollers w/ bronzeRail w/ Formed Rodbushings



Rear Tail Roller Assembly Consists of an 8"'V' Grooved Center Rear Roller w/ Flanged Side Rollers & Cable End Holder

80" extendable tail on EH-models

# **Available Options**

- **Pioneer Tarping Systems** •
- **Pintle Hooks and Towing Applications**
- **Reverse Mount Lift Cylinders** •
- **Telescopic Lift Cylinders** •
- Auxiliary hydraulic hook ups and wet kits
- Outside Rail Skid Plates; Full Length or Rear Wing
- **Outboard Supported Side Rollers**
- Toolboxes in various types and sizes (poly, steel, aluminum)
- Fenders in various types and configurations ٠ (poly, steel, aluminum)
- **Rear Window Screen Protection** .
- Lift Axles (steer and non-steer)
- Auxiliary Container Stops and Rear Hold Downs
- Hard Plumbing
- Safety and additional LED Work Lights
- Speed Limiting Parameters for hoist up and ground speed
- Scale Systems
- **Backup Camera Systems**



Pioneer® tarping systems



Pintle hooks and wet kits for towing applications



Lift Axles (steer and non-

steer) & Rims and or Tires

Outboard supported side rollers

LED work lights



Toolboxes in various types and sizes





Auxillary Front Container Stops; Rear Wing Skid Plates and Nylon Ratchet Hold Downs



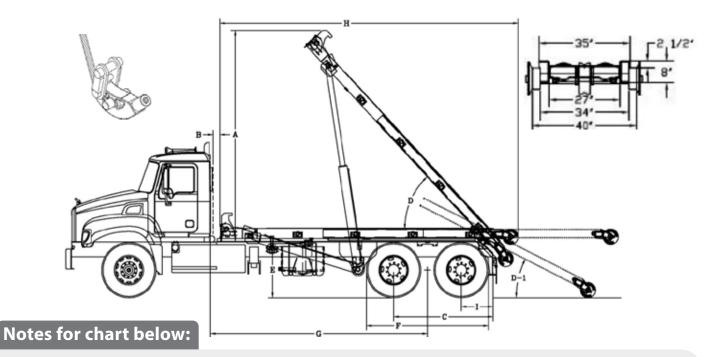
Rear window screen protection

U5-EH-174 shown with a Pioneer RP4500 SARG tarp system, HD nylon ratchet hold downs, Steel toolbox, Poly fenders, Mega bumper and Safety Vis light options





Backup camera systems



1) When recommending container lengths, weight distribution, fender interference and overhang are factors. Please consult your local ordinances when determining the model of hoist needed to suit your container needs.

2) Factory tested with recommended container length and water level load.

3) Frame Height = top of truck chassis frame to ground. Using 22.5" tires only. For larger tires, consult engineering for clearance.

## Models

FEATURE	U3-HH-138	U3-HH-156	U4-HH-156	U4-HH-174	U5-HH-156	U5-HH-174
Recommended Container Size <sup>1</sup>	14' to 16'	16' to 18'	16' to 18'	18' to 20'	16' to 18'	18' to 20'
Rated Hoist Capacity <sup>2</sup>	30,000 lbs.	30,000 lbs.	40,000 lbs.	40,000 lbs.	50,000 lbs.	50,000 lbs.
Cable Size	5/8"	5/8"	3/4"	3/4"	7/8"	7/8"
A – Height above truck frame <sup>3</sup>	147"	159"	153"	166"	153"	166"
B – Back of cab to hoist <sup>4</sup>	6"	6"	6"	6"	6"	6"
C – Axle spread	n/a	n/a	51" - 60"	51" - 60"	51" - 60"	51" - 60"
D – Raised Dump Angle <sup>3</sup>	51°	47°	47°	47°	47°	47°
D1 – Load Angle <sup>3</sup>	-	-	-	-	-	-
E – Top of truck frame to ground $^3$	42"	42"	44"	44"	44"	44"
F – Tire O.D. to O.D.	n/a	n/a	101" max	101" max	101" max	101" max
G – Cab to Axle/Trunnion (CA/CT) <sup>4</sup> - add 12" for Pioneer Tarp or 16" for Roll Rite Tarp	138"	156"	156"	174"	156"	174"
H – Hoist Length	187"	208"	208"	226"	208"	226"
H1 – Hoist Length w/ Tail Extended	n/a	n/a	n/a	n/a	n/a	n/a
I – After Frame (add 2" for air ride)	41"	41"	25"	25"	25"	25"
Lift Cylinders (Fwd Mount Standard except on U3 models)	5" x 3" x 54"	5" x 3" x 54"	6"x 4"x 72"	6"x 4"x 72"	6"x 4"x 72"	6"x 4"x 72"
Winch Cylinders	5" x 3" x 66"	5" x 3" x 66"	6"x 3"x 75"	6"x 4"x 80"	7"x 3"x 75"	7"x 4"x 80"
Tail Cylinder (Extendable tail - EH models)	-	-	-	-	-	-
Approximate weight with standard feature (ship out weight used; unmounted)	4,300 lbs.	4,498 lbs.	5,650 lbs.	5,764 lbs.	6,102 lbs.	6,489 lbs.

4) This distance does not allow for a behind the cab (BTC) oil reservoir, tarper platform and or room to add a tarper; must add distance for those items.

#### Minimum Truck Requirements (Single Axle)

Axle Rating: 9,000 Front / 24,400 Real Transmission torque: 212 ft. lbs.

\*The chart below is an example of how to calculate the chassis section modulus (RBM / PSI = SM). Regardless of the frame YIELD and RBM, the min. SM must be 17.5 in<sup>3</sup> or more per each frame rail.

Truck Channel Ht.	RBM	Yield (PSI)	RBM/PSI = SM in <sup>3</sup>
10" or More (single wall)	2,100,000 - 3,000,000	120,000 psi	17.5 in <sup>3</sup> - 25 in <sup>3</sup>
10" or More (double wall)	1,750,000 - 3,000,000	100,000 psi	17.5 in <sup>3</sup> - 30 in <sup>3</sup>

Note: the single walled 120k psi with RBM less than 2,100,000 would not be acceptable because its SM would fall below the 17.5 in<sup>3</sup> minimum specification (2,000,000 / 120,000 = 16.67 in<sup>3</sup>). For frames less than 10" consult engineering.

#### Minimum Truck Requirements (Tandem Axle)

Axle Rating: 18,000 Front / 44,000 Rear Transmission torque: 248 ft. lbs..

\*The chart below is an example of how to calculate the chassis section modulus (RBM / PSI = SM). Regardless of the frame YIELD and RBM, the min. SM must be 20 in<sup>3</sup> or more per each frame rail.

Truck Channel Ht.	RBM	Yield (PSI)	RBM/PSI = SM in <sup>3</sup>
10" or More (single wall)	2,400,000 - 4,000,000	120,000 psi	20 in <sup>3</sup> - 33.3 in <sup>3</sup>
10" or More (double wall)	2,400,000 - 4,000,000	100,000 psi	20 in <sup>3</sup> - 40 in <sup>3</sup>

Note: The single walled 120k psi with RBM less than 2,400,000 would not be acceptable because its SM would fall below the 20 in<sup>3</sup> minimum specification (2,300,000 / 120,000 = 19.17in<sup>3</sup>). For frames less than 10" consult engineering.

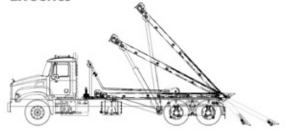
Cycle Times @ @ 1850 PSI & 1,500 RPM	42 GPM
Hoist Up -	25 sec.
Hoist Down -	14 sec.
Winch On -	38 sec.
Winch Off -	26 sec.

U5-HH-174 theoretical times shown. These times will vary slightly depending on the length of cylinder stroke required by model number

UT-HH-174	U5-HH-194	UT-HH-194	UM-HH-194	U5-EH-174	UT-EH-174	U5-EH-194	UT-EH-194
18' to 20'	20' to 22'	20' to 22'	20' to 22'	18' to 20'	18' to 20'	20' to 22'	20' to 22'
50,000 lbs.	50,000 lbs.	50,000 lbs.	50,000 lbs.	50,000 lbs.	50,000 lbs.	50,000 lbs.	50,000 lbs.
7/8"	7/8"	7/8"	7/8"	7/8"	7/8"	7/8"	7/8"
168"	185"	183"	184"	166"	168"	185"	183"
6"	6"	6"	6"	6"	6"	6"	6"
51" - 60"	51" - 60"	51" - 60"	51" - 60"	51" - 60"	51" - 60"	51" - 60"	51" - 60"
47°	47°	47 <sup>0</sup>	47°	47°	47°	47 <sup>0</sup>	47°
-	-	-	-	27°	27°	27°	27°
44"	44"	44"	44"	44"	44"	44"	44"
101" max	101" max	101" max	101" max	101" max	101" max	101" max	101" max
174"	194"	194"	194"	174"	174"	194"	194"
226"	245"	245"	245"	229"	229"	248"	248"
n/a	n/a	n/a	n/a	309"	309"	328"	328"
25"	25"	25"	25"	25"	25"	25"	25"
6"-5"-4" x 118" DAT	6"x 4"x 72"	6"-5"-4" x 118" DAT	6"-5"x 79" DAT	6"x 4"x 72"	6"-5"-4" x 118" DAT	6"x 4"x 72"	6"-5"-4" x 118" DAT
7"x 4"x 80"	7"x 4"x 90"	7"x 4"x 90"	7"x 4"x 90"	7"x 4"x 80"	7"x 4"x 80"	7"x 4"x 90"	7"x 4"x 90"
-	-	-	-	(1) 3.5" x 2.5" x 80"			
6,489 lbs.	6,834 lbs.	6,834 lbs.	6,834 lbs.	7,124 lbs.	7,124 lbs.	7,469 lbs.	7,469 lbs.

## **Extendable Tail Models**

#### **EX** Series

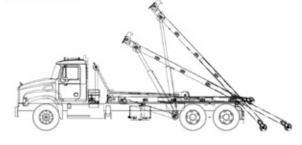


Essentially a shortened OR-model with a 80" extendable tail section that generates low loading angles and has 35.5 inch rail width.

# IX Series

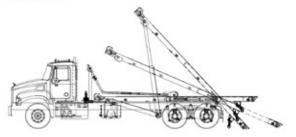
An OR/EX-model extendable tail (60") with both inside and outside rails and rollers. The hoist has set rail widths of 35.5 inches.

### **EH Series**



A combination of an EX & HH-model, designed for picking up dead lift containers at low loading angles with an 80" extendable tail section. This hoist has a narrower rail width set at 35 inches.

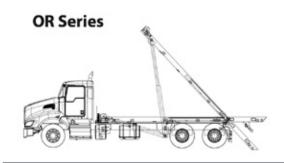
### **OX** Series



An OR-style hoist with a tail that is extendable out to an additional 48". The hoist has set rail widths of 35.5 inches.

# **Fixed Tail Models**

**IO** Series



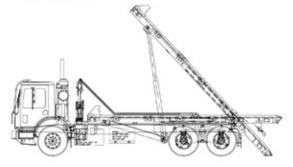
The OR-model (industry standard) is an outside/inside rail and roller hoist set at 35.5 inches wide between rails.

Similar to the OR-model, the IO-model has additional inside rollers (inside of main frame tubes) and inside rails fixed to the top of main frame. The hoist is set at 35.5 inches wide between rails.

HH Series

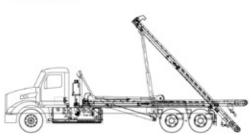
HH - A shortened and narrowed version of the OR-model that is designed to pick up deadlift containers with a knuckle cable end. The hoist rails are set at 35 inches wide.

**SI Series** 



A cross breed of sorts, the SI-model is unique in the fact that it is designed to pick up a variety of different styles of containers. Specifically, it will pick up either outside rail, inside/outside rail and deadlift containers. The hoist is set at 35 inches.

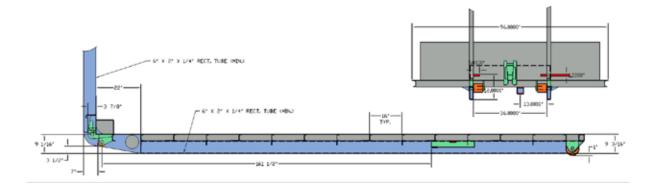




A representative of a unique market sector of the Pacific Northwest, the TM-model (Trough Mount) is typically a hoist that utilizes a trough section on either side to support the containers as opposed to rollers or rails. Many different variations exist for its dimensions and can be adapted to suit most consumer requirements.



## DEADLIFT CONTAINER REQUIREMENTS



NOTE: For use with 10' containers, the hold down system will require other means such as ratchet type hold downs

**Distributed by:** 



Galbreath is a Wastequip brand. Wastequip is the leading North American manufacturer of waste and recycling equipment for collecting, processing and transporting recyclables and solid or liquid waste. © Wastequip 2019 All rights reserved. Specifications subject to improvement without notice. Equipment displayed should be operated by properly trained personnel. Operators should become familiar with OSHA, ANSI and any other applicable standards or laws for using this equipment. Improper use, misuse, or lack of maintenance could cause injury to people and/or property. Photos used in the literature are illustrative only. We assume no liability or responsibility for proper training/operation of equipment not manufactured by Wastequip. We reserve the right to make changes at any time without notice. Information contained within this literature is intended to be the most accurate available at time of printing.

GAL111-122019