



ASSOCIATION
OF AMERICAN
RAILROADS



Universal Securement Chock Loading Study April 2010 Update

VEQ Universal Securement Test Loading Summary 4/2010

Numbers of Tri-Level Loadings

Numbers of Bi-Level Loads

Trinity Straight Loads = 17

Holden Straight Loads = 9

Zeftec/SCT Straight Loads = 46

Holland Straight Loads = 8

Mixed Loads = 53

Trinity Straight Loads = 9

Zeftec/SCT Straight Loads = 8

Mixed Holland Zeftec/SCT = 12

Mixed All Types of Bi-Level

Chock Systems = 8

VEQ Universal Securement Test Loading Summary 4/2010

Tri-Level Loading Totals

Bi-Level Loading Totals

Trinity = 70

Holden = 17

Zeftec/SCT = 99

Holland = 28

Trinity = 17

Zeftec/SCT = 28

Trinity Tri-Level Chocks



The photos above and below show vehicles arriving at Destination with the front tires turned.

Chocks held no vehicle damage reported

The photo above, shows a “C1” positioned vehicle arriving at Destination with the LR strap key lock disengaged and strap off the tire.

The photo below, shows a vehicle that shifted rearward slightly in the chocks causing a gap between the tire and the chock. Please note the strap contact.



Zeftec/SCT (Low Pro) Tri-Level Chocks



The photos above and below shows the “C3” positioned vehicle on ETTX 853880 Waybill date 3 21 09. The Left front/rear chocks were disengaged.

Although several vehicles were involved in the load shift reported at destination, no vehicle damage was reported. Since January 2010 no chock or strap disengagements have been reported on chocks reports received.

Holland Bi-Level Chocks

Loader/Unloader Comments:

-Strap tucks onto chock very well and doesn't get in the way at all when chock is stored.

Holland Bi-Level Chocks

Loader/Unloader Comments:

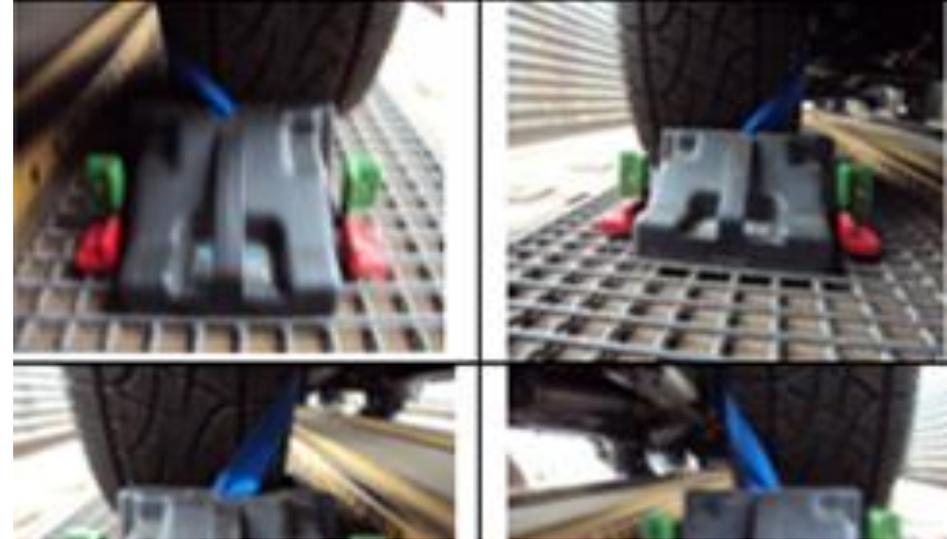
- Strap can snap back quickly, endangering breaker and potentially damaging unit.
- Slot which strap goes in is T-shaped and strap snags in slot at times, which wastes time.
- Hooks very difficult to get off at times. If they're too close to the tire, it can be hard to get leverage to push them off and unhook them from the grate. This problem would be compounded greatly if there was snow/ice on the grate.
- Weight chock seem heavier than other chocks.
- Securing chock to sidewall of railcar is awkward compared to other chocks. A lot of time is wasted trying to align chock perfectly so that it can be secured properly.
- Tension on strap can be slackened pretty easily, which might be the reason why those 8 straps shifted off the tires.
- Rubber coating on hooks was ripped on at least 5 occasions, exposing metal. This could lead to further damage if the hooks aren't handled carefully.
- Chocks are relatively low, which doesn't effectively stop the tires from rolling on top of them. None of the chocks were damaged; however, a couple of the chocks were difficult to take off because the tires were partially on top of them.
- Handle protruding from chock is not always easily visible when chock is stored, making it a tripping hazard.

Please note; the lifting of the grate at the junction point.



The photos above and below show vehicles at destination on TTGX 254046 Waybill date 3 3 2010.

No vehicle damage was reported.



The photos above and below show the "A-3" and "A-5" positioned vehicles at destination on TTGX 254046 Waybill date 4 16 2010. Although several chock defects on this load were observed.

No vehicle damage was reported.



Holden Bi-Level Chocks

Loader/Unloader Comments:

- Ease of collapsing chock is a plus!
- Easy to remove and less bulky than current Holden chocks.
- Hands down the best liked chock out of all tested systems (Lansing, MI.)
- The loader also liked the bypass ability and the green front lock indicators. (Shreveport, LA.)
- Chocks fit very tight against wheels.

Holden Bi-Level Chocks

Loader/Unloader Comments:

- An additional 1/2" clearance between the chock body and handle would make installation much easier. (Lansing, MI.)
- Eight Chocks Per Vehicle is time consuming

-An additional ½” clearance between the chock body and handle would make installation much easier. (Lansing, MI.)



**Destination report on GTW 504144
Waybill date 1 20 2010 reported a
chock exception. No exceptions
could be found on any report
received thus far.**



Trinity Bi-Level Chocks

Loader/Unloader Comments:

- Anti-abrasion sleeve becomes torn and/or missing easily.
- Tripping hazard when fastened to grate.
- Can cause damage to bumpers when pumping handle to loosen strap.
- Can potentially snag fingers.
- Exposed metal from handle and hooks can damage vehicle if it makes contact.
- Loosening strap time-consuming and clumsy compared to chock.
- All ratchet handles are out board.
- All straps require hand and knee installation.

No exceptions could be found on any report received thus far.



Please, refer to comments.

Zeftec/SCT Bi-Level Chocks

Loader/Unloader Comments:

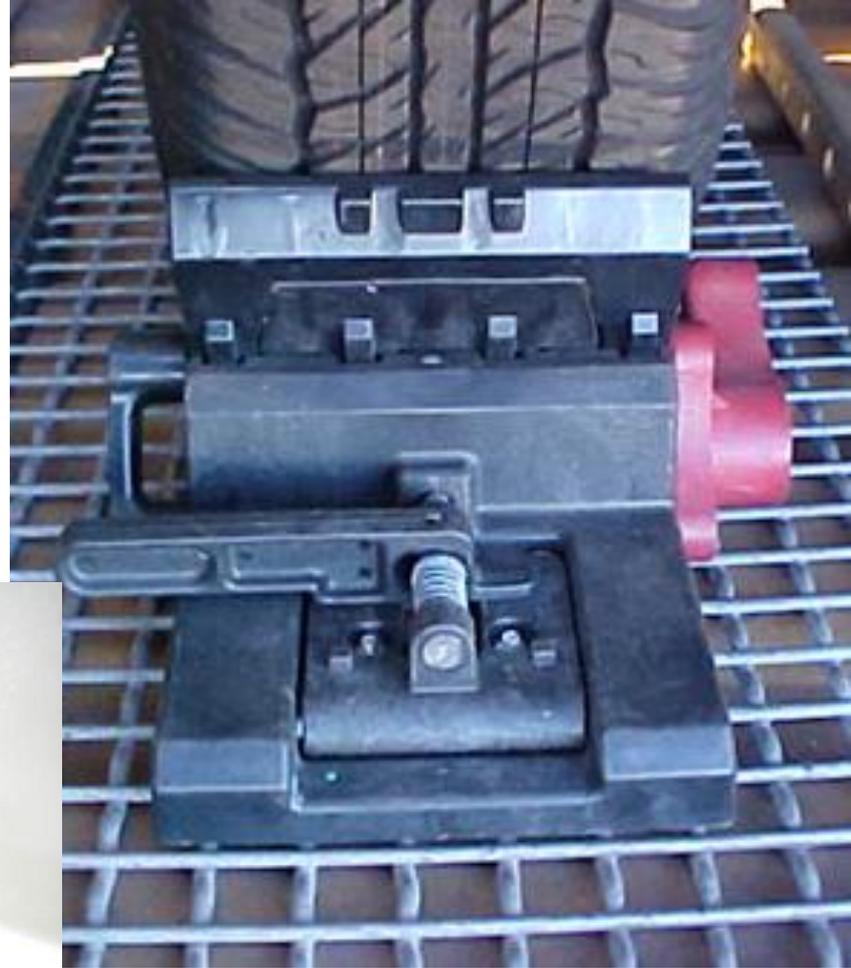
- They also stated that the slim profile of the chock made it easier to remove without contact to the lowest points at the front of the vehicle.
- They also liked the low profile when stored on the sides of the railcar.
- The Loaders Also liked the light weight of the chock

Zeftec/SCT Bi-Level Chocks

Loader/Unloader Comments:

- Unloaders stated that it took a lot of force to disengage the release pin when a tire was in hard contact with the chock.
- Installers feel that chock is too heavy and needs a centralized handle to hold the chock
- Unloading CO. states, flimsy release handle will break.
- When on a split grate unit has to be moved to secure chock.
- Potential long term back issues due to weight and two handed installation.
- Locking lever, in locked position comes out past tire, possible foot contact may unlock chock.
- Repetitive installation may cause wrist fatigue.
- Loaders disliked the strap configuration with this chock. They found it difficult to attach the hooks to the chock body. Concern was also raised about the lack of a rubberized coating on the strap hardware and the resulting exposed metal. .

Please, refer to comments.



Number of Test Loads Shipped vs. Reports Received

Railcar Number	Total Number of Loads	Number of Origin Reports Received	Number of Destination Reports Received
ETTX 803317	17	6	10
ETTX 853880	27	9	7
ETTX 909272	23	9	11
SP 517141	26	12	14
ETTX 909805	3	0	1
TTGX 254046	10	6	7
TTGX 700261	8	7	3
TTGX 982500	8	8	7
TTGX 995144	9	7	8
TTGX 986577	9	5	4
AOK 501865	20	3	2
TTGX 851226	7	0	1
TTGX700942	5	0	2
Totals	172	72	77

Locations Missing the Highest Number of Reports

Origin Locations	Number of Reports Missing	Destination Locations	Number of Reports Missing
Warm Springs (Fremont, CA)	13	New Boston, MI	11
Georgetown, KY	11	Richmond, CA	7
New Boston, MI	10	Lawrenceville, GA	7
Smyrna, TN	9	Nashville, TN	5
Fairfax, KS	8	Muncie, KS	5
East Liberty, OH	7	Milpitas, CA	5
		Midlothian, TX	5
		Logistics Park, IL	5