	FSTL Final Test Report	Test Facility: FSTL 4545 W. Augusta Blvd. Chicago, IL 60651
Test Date: 6/20/2008	**Test Procedure:** FMVSS 207/210	

Description of Item Tested

All test items are obtained according to FSTL procedure LAI-011 unless otherwise noted. All items are tested for compliance with applicable standards, previously reviewed and approved by the party requesting this test, unless otherwise specifically noted:

FSTL installed (2) FSC LTD driver seat [24281] on pedestal [50369] in the Pull Test Machine (PT - 001). The seat was secured with 1/2" -20 Gr. 8 bolts and nuts to the test platform and 1/2"-13 gr.8 bolt to the 3-point- wall fixture. See photos for seat set-up details.

Description of Results

Summary of FMVSS 571.207.S4.2a & Section 571.210.S5.1

A force of 3,000 lb shall be applied to each lap and shoulder belt at 10° ± 5° above the horizontal plane. In addition, two separated forces equal to 20 times the seat frame and pedestal mass (680 and 1000 lb each) were applied simultaneously through the CG of each seat portion. The required forces must be reached within 30 seconds from the onset of the test then, when reached must be held for 10 seconds. The total of the forces applied during this test was 7,680 lb.

Note: Full compliance with FMVSS and its Regulations, as set forth under 49 USC 301, et. seq., can only be achieved through proper in-vehicle testing. Freedman Seating Company, its agents, employees, affiliates and subsidiaries ("Freedman Seating") is not liable for damages resulting from the installation of any seat in a vehicle that has not been FMVSS tested or any installation of a seat that deviates from a FMVSS tested installation method. Freedman Seating has no responsibility for the design of any vehicle in which the subject seat may be placed, or any resulting damages. The results documented in this report relate only to the items tested, as described herein.

Test Opinions and Interpretations

(Please see page 2 for description of artifacts and summary of results.)

Test Setup Approved by: Digitally signed by Miguel Flores DN: CN = Miguel Flores, C = US, O = Freedmanseat, OU = FSTL Reason: I have reviewed this document / Deputy Technical Manager Location: FSTL Chicago Il Date: 2008.07.08 15:03:12 -05'00'	Test Requested By: John Rutecki FSC 4545 w. Augusta blvd. Chicago (773) 524-2440 ext. 366
Test Report Approved by: Digitally signed by David O'Malley DN: CN = David O'Malley, C = US, O = Freedman Seat Test Lab, OU = FSTL Reason: I am approving this document / Technical Manager Location: Chicago Il Date: 2008.07.08 14:53:58 -05'00'	Request Date: 6/11/2008

Summary of Tests

Sample 1: [drawing 50369] The seat as tested held the loads within the time and additional 43% over for CG loads and 25% for Seat Belt Anchors loads. The pedestal tube showed minimum deformation during the last stage of the test (43% CG & 25% seat belts over loads). See post-photos for details.

The test complied with the FMVSS Test Procedure: Yes **X** No □

Sample 2: [drawing 50369] The seat as tested held the loads within the time and additional 43% over for CG loads and 25% for Seat Belt Anchors loads. The pedestal tube showed minimum deformation during the last stage of the test (43% CG & 25% seat belts over loads). See post-photos for details.

The test complied with the FMVSS Test Procedure: Yes **X** No □

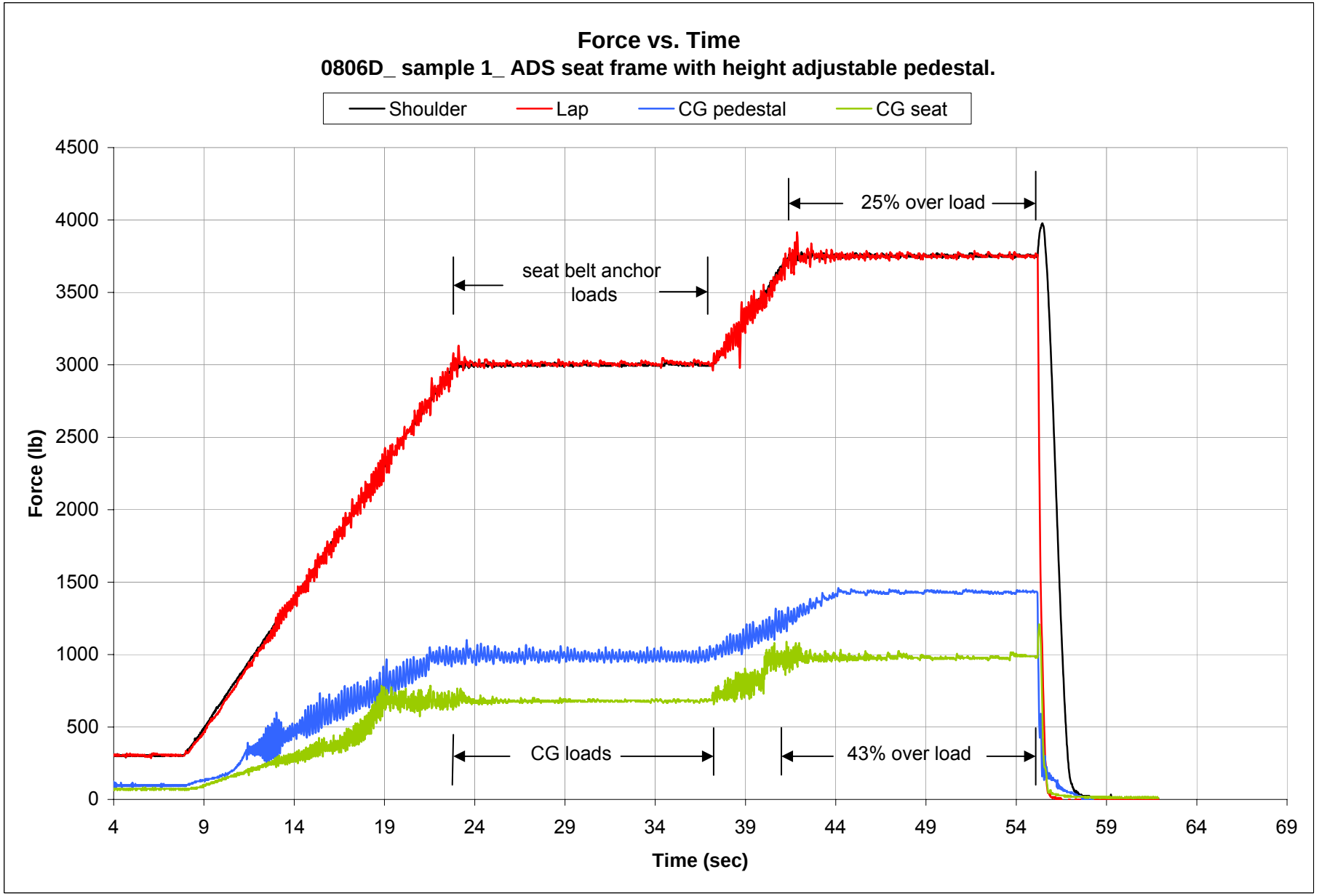
Equipment Documentation

Test Fixtures:

Fixture #:	Description	
PT-001	Pull Test Machine	
PL-205	Torso Block	
PL-206	Body Block	

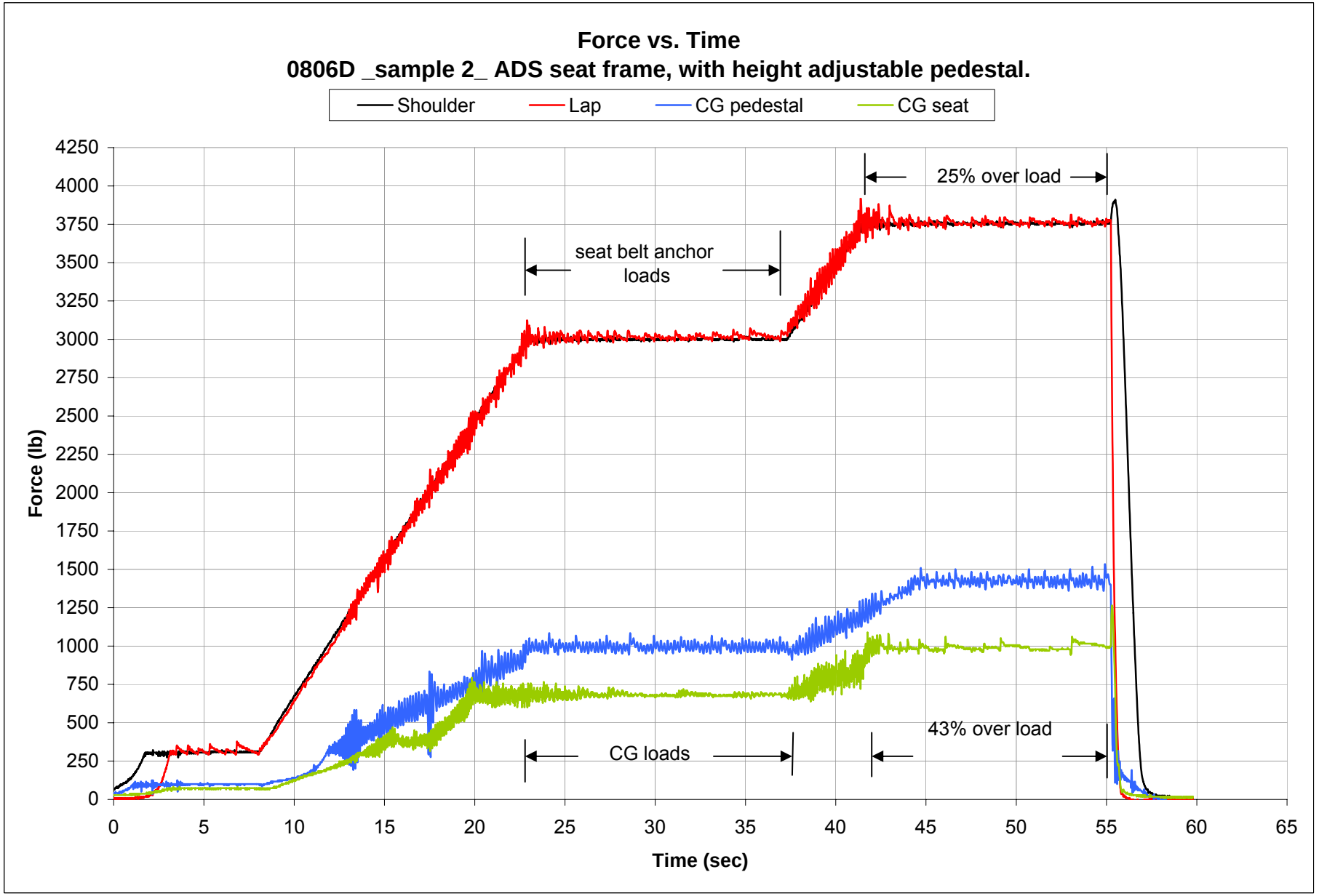
Measurement Equipment:

Equipment #:	Description	Last Calibration #
LC - 002	Load cell -15K, S.N. Y51758	C0803C
LC - 003	Load cell -15K, S.N. Y68886	C0803C
LC - 004	Load cell -15K, S.N. AC45180	C0806C
LC - 005	Load cell -15K, S.N. Y98006	C0806C

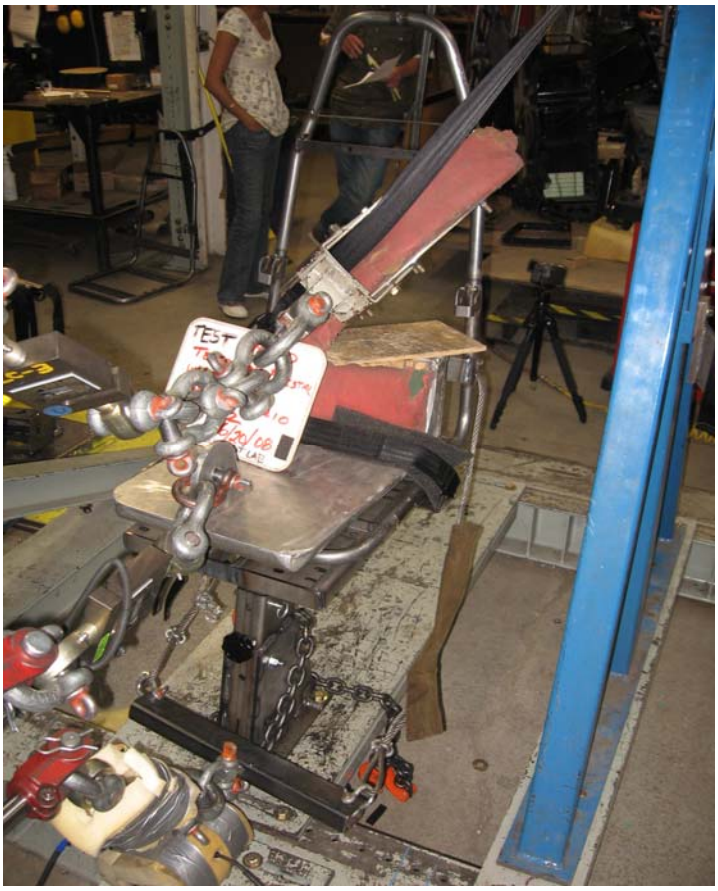

Force vs. Time
0806D_ sample 1_ ADS seat frame with height adjustable pedestal.
Shoulder
Lap
CG pedestal
CG seat
25% over load
seat belt anchor loads
CG loads
43% over load
Force (lb)
Time (sec)
4500
4000
3500
3000
2500
2000
1500
1000
500
0
4
9
14
19
24
29
34
39
44
49
54
59
64
69

Pre Test Sample1

Post Test Sample 1


Force vs. Time
0806D _sample 2_ ADS seat frame, with height adjustable pedestal.
Shoulder
Lap
CG pedestal
CG seat
25% over load
seat belt anchor loads
CG loads
43% over load
Force (lb)
Time (sec)
4250
4000
3750
3500
3250
3000
2750
2500
2250
2000
1750
1500
1250
1000
750
500
250
0
0
5
10
15
20
25
30
35
40
45
50
55
60
65

Pre Test Sample2



Post Test Sample 2

FSTL
4545 W. Augusta Blvd.
Chicago, IL 60651

Seat Test Request Form

Customer: FSC
Contact Name: John R
Contact Phone Number: 773.524.2440 x.366
Contact E-mail: johnr@freedmanseat.c

Date Generated: 6/11/2008
Work Order Number: 0806D
FSC Engineer (If Applicable): John Rutecki
FSC Salesperson (If Applicable): n/a

What seats will be tested? 2 x 50369 height adj pedestals, with slide spacers, and LTD seat.

How many samples of each seat? 2

Total number of tests? 2 4One Seat □ Yes X No

Developmental Testing? □ Yes X No [If Yes, estimate amount of developmental time for changes] __n/a__Days

Full Test Report? (simplified test report will be issued unless "Yes" is check for a full report) x Yes □ No

What tests are requested?

x FMVSS 571.207	□ APTA Handhold & Armrest Load	□ APTA Fatigue
x FMVSS 571.210	□ APTA Seat Back Load	□ FSTL Compression
□ FMVSS 571.222 static	□ APTA Sandbag	□ FSTL Tension
□ FMVSS 571.222 dynamic	□ APTA Downward Performance	□ FSTL Displacement
□ FMVSS 571.225	□ APTA Impact	

□ Other (please describe) n/a

What test completion date is needed? 6/19/2008

Scheduled Completion Date (To be filled out by FSTL) 6/27/2008

Still photos will be taken. Will test be videotaped? x Yes □ No

When will the seats be sent? N/A

FSC Sales Order Number? N/A

When will the seats arrive? 6/18/2008

After testing, the tested seats will be: x Returned or □ Junked

Customer Please Note: You are responsible for all shipping and scrap charges for seats not produced by FSC. Seats not produced by FSC shall be ready to test before arriving at FSTL. If more than minor modifications are to be made to a seat, FSTL shall perform said modifications at the prevailing hourly rate, plus materials, including but not limited to any assembly, welding, reinforcement, hardware, or supplies. Hardware used to attach the seats to the test platform: X
Shall be provided by or □ As specified by the customer.

General Understanding of Tests: Tests are destructive and will render the seats unusable. Responsibility for seating systems is that of both the seat supplier and the vehicle OEM. The seat supplier's responsibility consists of meeting all of the established system performance requirements and obtaining and supplying the required test data to the vehicle OEM. The vehicle OEM has the ultimate system responsibility in assuring that all requirements for safe seat applications have been met.

Customer Monitoring of Test: FSTL shall afford you or your designated representative reasonable access to relevant areas of the laboratory for the witnessing of this testing. However, FSTL may restrict the viewing of certain items in these areas in order to maintain the confidentiality of other customers. Will Monitor Testing? X Yes □ No

This section is to be filled out by FSTL personnel.

Date Request Received: 6/11/2008 Received By: D. O'Malley
Date Request Reviewed: 6/11/2008 Reviewed By: D. O'Malley

Upon reviewing availability of resources and testing capabilities, FSTL is capable of performing this test as requested:
X Yes □ No If not, then the reason being: n/a

This Test Request shall be performed by a competent subcontractor (ISO/IEC 17025 Accredited when Required): □ Yes □ No n/a

Name of Subcontractor: n/a Chosen By: □ FSTL □ Customer n/a

If chosen by FSTL, the reason being: □ Unforeseen Reasons □ Continuing Basis/Arrangement

Upon receiving a copy of this Review the Customer has been notified in writing of the Testing being Subcontracted: □ Yes □ No n/a

Date Reviewed Request was Submitted to Customer:6/12/08 Customer review signature: X John Rutecki

FSTL Work Order Packet Cover Page

FSTL
4545 W. Augusta Blvd.
Chicago, IL 60651

Work Order Number: 0806D **Date Generated:** 6/11/2008

Name of Testing Agency Performing Work: FSTL
Testing Agency Address: 4545 W. Augusta, Chicago, IL 60651
Contact Person: David O'Malley
Telephone: 256 **Fax:** n/a
E-mail: davido@freedmanseat.com

Name of Customer Requesting Test: FSC
Customer Address: 4545 W. Augusta, Chicago, IL 60651
Customer Contact: John Rutecki
Telephone: 366 **Fax:** n/a
E-mail: johnr@freedmanseat.com

Manufacturer of Item to be Tested: FSC

Description of Item to be Tested: 50369 - Height Adj, Non-tilt pedestal with slide spacers and LTD seat.

Attach an assembly drawing and include the assembly drawing number, if available. If no drawing exists, include a sketch describing the assembly. List the fastener types [bolts, washers, and nuts] and sizes, as well as specific amounts and locations to be used. Instructions for the specific mounting configuration to the test fixture must also be included [a drawing or sketch is preferred].

Production Model Seat: x Yes □ No **Production Built Seat:** x Yes □ No

If 'No' is checked above, describe the construction of the seat: n/a

Item to be tested is a:

- □ Finished Assembly - the artifact is a complete upholstered seat
- X Unfinished Assembly - the artifact is a complete seat frame and base frame assembly without foam or cover
- □ Weldment - the artifact is a complete welded piece without other attachments
- □ Other (describe)

The test platform is a:

- □ Complete New Vehicle
- □ Complete Used Vehicle
- □ Full - Scale Vehicle Body Section
- □ Reduced - Scale Vehicle Body Section
- X Static Pull Test Machine Base
- □ Other (describe)

Reason for Test: Testing upgraded center tube. 2 x 4" tube was 11GA, now is 3/16" thick.

ECN Number (if applicable): 5272

Follow-up Test: x Yes □ No

If 'Yes' is checked above, list previous tests: 0804w

Test Setup Review Checklist

FSTL
4545 W. Augusta Blvd.
Chicago, IL 60651

OK	N/A	
✓		The correct fasteners are used to connect the leg/pedestal to the floor
	✓	The correct fasteners are used to connect the leg/pedestal to the base frame
	✓	The correct fasteners are used to connect the seat base frame/pedestal to the wall
	✓	The correct fasteners are used to connect the seat frame to the base frame
	✓	All strut nuts are fully engaged in base frame, wall, and/or floor tracks
	✓	The leg is placed at the correct distance from the wall
	✓	The legs are placed the correct distance apart and from the end of the base frame
✓		All required add-on braces, brackets, reinforcements, etc. have been added correctly
✓		All fasteners have been tightened to the correct torque specification
✓		The seat back angle, pedestal height, slide track position, etc. are adjusted correctly
✓		The correct seat weight has been used to calculate the CG pull forces
✓		The seat system center of gravity location is correct
✓		The target loads for the test are correct
✓		The target load ramp rate is correct
✓		Angles of force application are correct
✓		The seat belts are routed correctly around the body blocks

NOTE : Please provide test lab personel with specific location[s] to include photographs.

n/a

By my signature, I have reviewed the seat assembly to be tested and the test parameters, and find them to be correct. Correcting information gathered on FSTL Records requires the originator to correct the error by lining out the error, provide the correction, and then initial and date the correction.

Seat Designer/Project Engineer John Nutter Date: 6/20/08

FSTL Personnel Miguel A Date: 6/20/08

Note: Tests will not be conducted without a copy of this form signed, dated, and completed by the seat designer or project engineer.

Test Performed By: Miguel A Date: 6/20/08

Test Witnessed By: n/a Date: N/C

Work Order No.: 0806D Sz

Test Setup Review Checklist

FSTL
4545 W. Augusta Blvd.
Chicago, IL 60651

OK	N/A	
✓		The correct fasteners are used to connect the leg/pedestal to the floor
	✓	The correct fasteners are used to connect the leg/pedestal to the base frame
	✓	The correct fasteners are used to connect the seat base frame/pedestal to the wall
	✓	The correct fasteners are used to connect the seat frame to the base frame
	✓	All strut nuts are fully engaged in base frame, wall, and/or floor tracks
	✓	The leg is placed at the correct distance from the wall
	✓	The legs are placed the correct distance apart and from the end of the base frame
✓		All required add-on braces, brackets, reinforcements, etc. have been added correctly
✓		All fasteners have been tightened to the correct torque specification
✓		The seat back angle, pedestal height, slide track position, etc. are adjusted correctly
✓		The correct seat weight has been used to calculate the CG pull forces
✓		The seat system center of gravity location is correct
✓		The target loads for the test are correct
✓		The target load ramp rate is correct
✓		Angles of force application are correct
✓		The seat belts are routed correctly around the body blocks

NOTE : Please provide test lab personel with specific location[s] to include photographs.

N/A

By my signature, I have reviewed the seat assembly to be tested and the test parameters, and find them to be correct. Correcting information gathered on FSTL Records requires the originator to correct the error by lining out the error, provide the correction, and then initial and date the correction.

Seat Designer/Project Engineer John Rucker Date: 6/20/08

FSTL Personnel D. O'Malley Date: 6/20/08

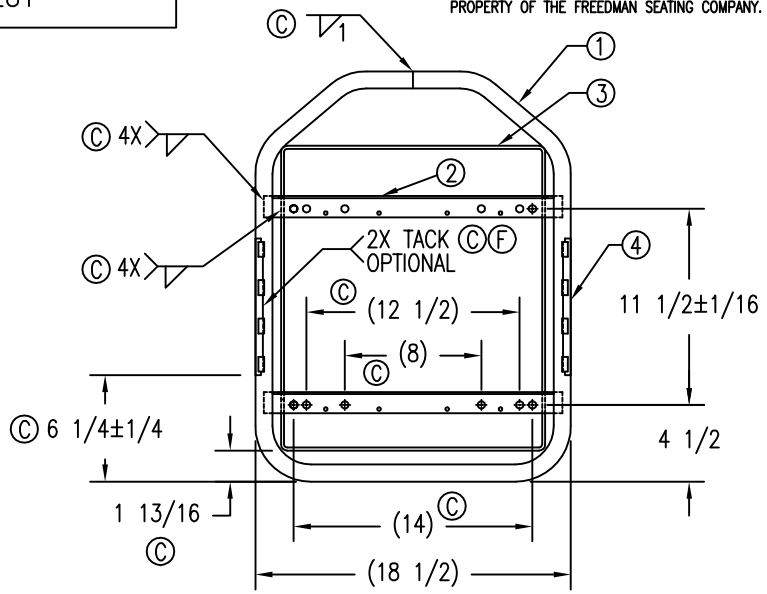
Note: Tests will not be conducted without a copy of this form signed, dated, and completed by the seat designer or project engineer.

Test Performed By: [signature] Date: 6/20/08

Test Witnessed By: N/A Date: N/A

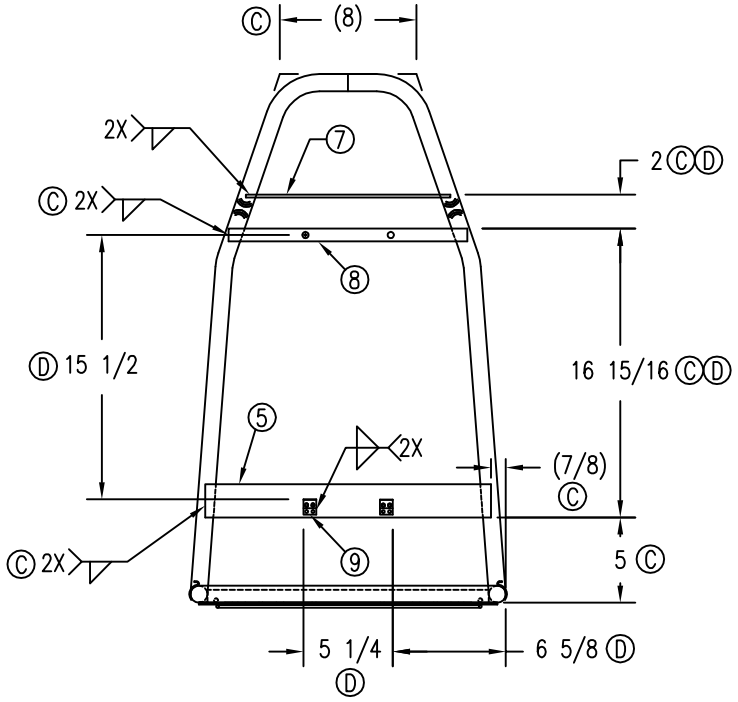
Work Order No.: 0606D-S2

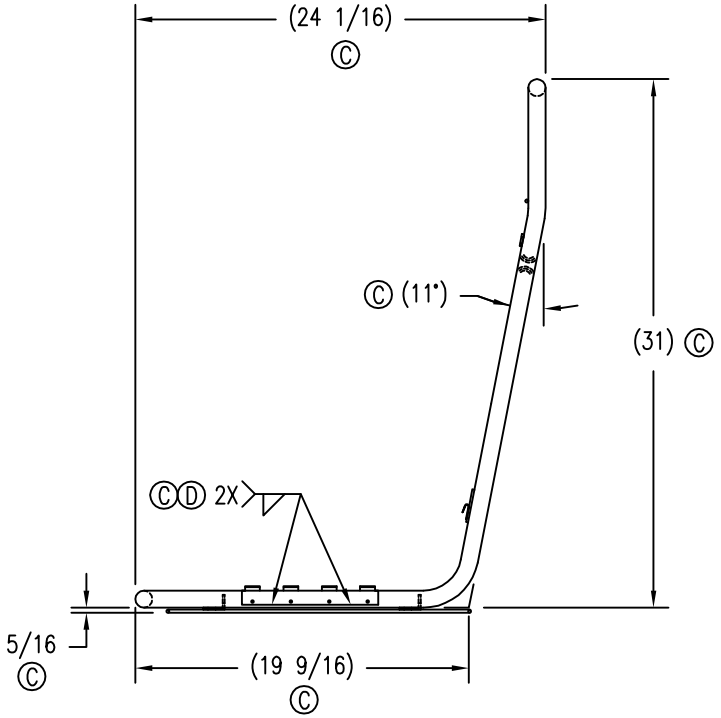
24281



	ITEM	QTY	PART #	DESCRIPTION
	1	1	8431	TUBE FRAME, LTD, RIGID
	2	2	7087	BRACKET, MOUNT
	3	1	7820	PULL WIRE, SEAT
Ⓕ	4	2	7805	SPRING CLIP, 4 GANG
	5	1	8314	PLATE, SUPPORT
Ⓓ	6			
	7	1	41210	WIRE, PULL, 7GA X 12
Ⓓ	8	1	16590	PLATE, SPRING ANCHOR
Ⓓ	9	2	73013	S CLIP

Ⓒ NOTE(S): 1) LINEAR TOLERANCES ARE ±1/8 UNLESS OTHERWISE SPECIFIED.
2) FIXTURE 7941-1 (SEAT COMPONENTS) AND 7941-2 (BACK COMPONENTS).
3) BACK COMPONENTS OMITTED IN TOP VIEW FOR CLARITY.
4) FRAME WELDMENT WITH ARMREST BRACKETS IS PART 7941.





Rev. Level	Description of Change	By	Date	ECN #	Rev. Level	Description of Change	By	Date	ECN #
					C	REDESIGN WLDMNT; UPDATE WLD SYMBLS, BOM, NOTES, PART NAME	RR	05/01	2301
E	CORRECT BOM (WAS 7790), REVISE TACK WELD	RR	08/03	3368	B	CHANGE DWG NUMBER (WAS 12046)	GF	04/01	2268
D	REPLACE STRAPS WITH SPRING CLIPS	RR	07/03	3343	A	RELEASE TO PRODUCTION	GF	02/01	2236

Tolerance Unless Otherwise Specified
FRAC. 1/X ±1/32
DECIMAL .XX ±0.02"
.XXX ±0.005"
ANGULAR ±1°

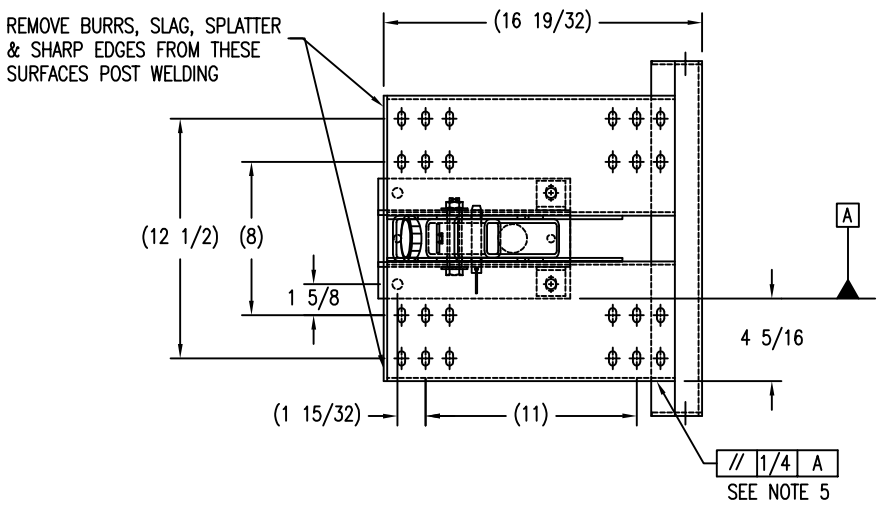
Material:
Specifications:
Drawn by: GF
Date: 02/07/01

Freedman Seating Co.
4545 W. Augusta
Chicago, IL 60651

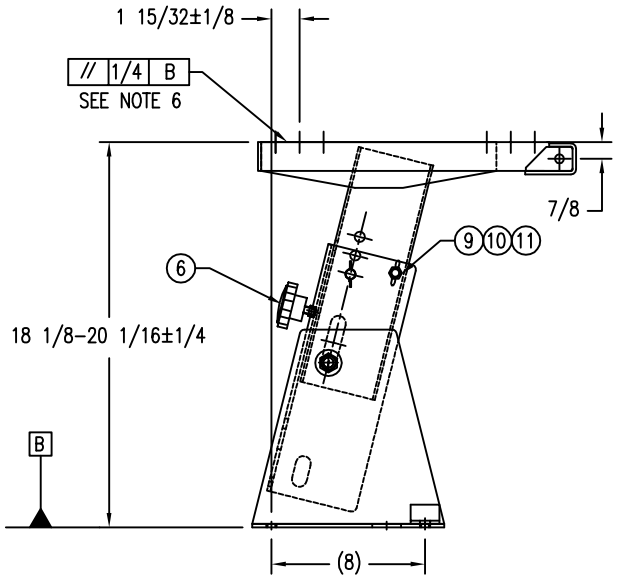
Part Name
Ⓒ WLDMNT, SEAT FRAME, LTD, RIGID, NO ARM BRKT

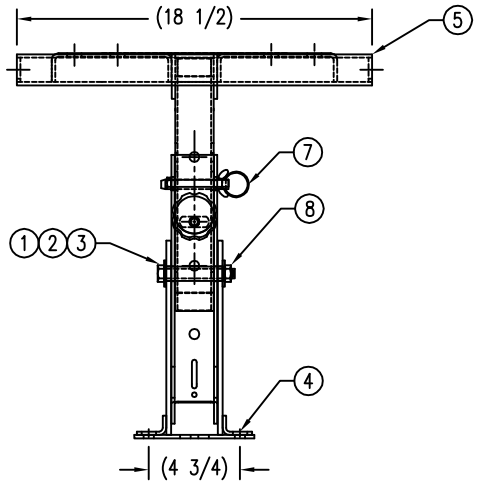
DO NOT SCALE DRAWING
Drawing No. 24281
Rev. E

ITEM	Q	PART #	
1	1	180193	1/2"–13 X 3–3/4" HX HD BOLT, GR5, Z/P
2	1	43170	TUBE, RND, 3/4" OD, 12 GA, 2 31/32"
3	2	120390	1/2" USS FLAT WASHER
4	1	50370	WLDMNT, PED, NON–TILT, HGT ADJ, LWR
5	1	39062	WLDMNT, PED, TILT–TOP, UPR
6	1	11641	LOCK–UP KNOB
7	1	55864	LOCK PIN
8	1	9422301	1/2"–13 HX HD LOCK NUT, Z/P
9	1	180138	3/8"–16 X 3" HX HD BOLT, GR5, Z/P
10	1	120382	3/8" LOCK WASHER
11	1	99394	WING NUT, 3/8"–16



NOTE(S): 1) PLACE EACH PEDESTAL INTO FIXTURE #1 AND CHECK FOR SIDE TO SIDE AND FORE/AFT PLAY.
2) FLOOR MOUNTING HOLES MUST PASS A 1/2" DIAMETER BOLT WITH SAE WASHER AND MUST SIT FLAT.
3) HEIGHT ADJUSTMENT IN 1" INCREMENTS.
4) ITEMS 6 AND 9–11 ARE USED TO REDUCE PLAY IN PEDESTAL
5) SIDE FACE OF 39062 SHOULD BE PARALLEL TO SIDE FACE OF 50370 +/– 1/4"
6) BOTTOM FACE OF 39062 SHOULD BE PARALLEL TO BOTTOM FACE OF 50370 +/– 1/4"





Rev. Level	Description of Change	By	Date	ECN #
A	RELEASED TO PRODUCTION	JER	3/08	5272

Tolerance Unless Otherwise Specified
FRAC. 1/X ±1/32
DECIMAL .XX ±0.02"
.XXX ±0.005"
ANGULAR ±1°

Material:
Specifications:
Drawn by: JER
Date: 3/11/08

Freedman Seating Co.
4043 N. Ravenswood
Chicago, IL 60613

Part Name: ASSY, PED, NON–TILT, HGT ADJ

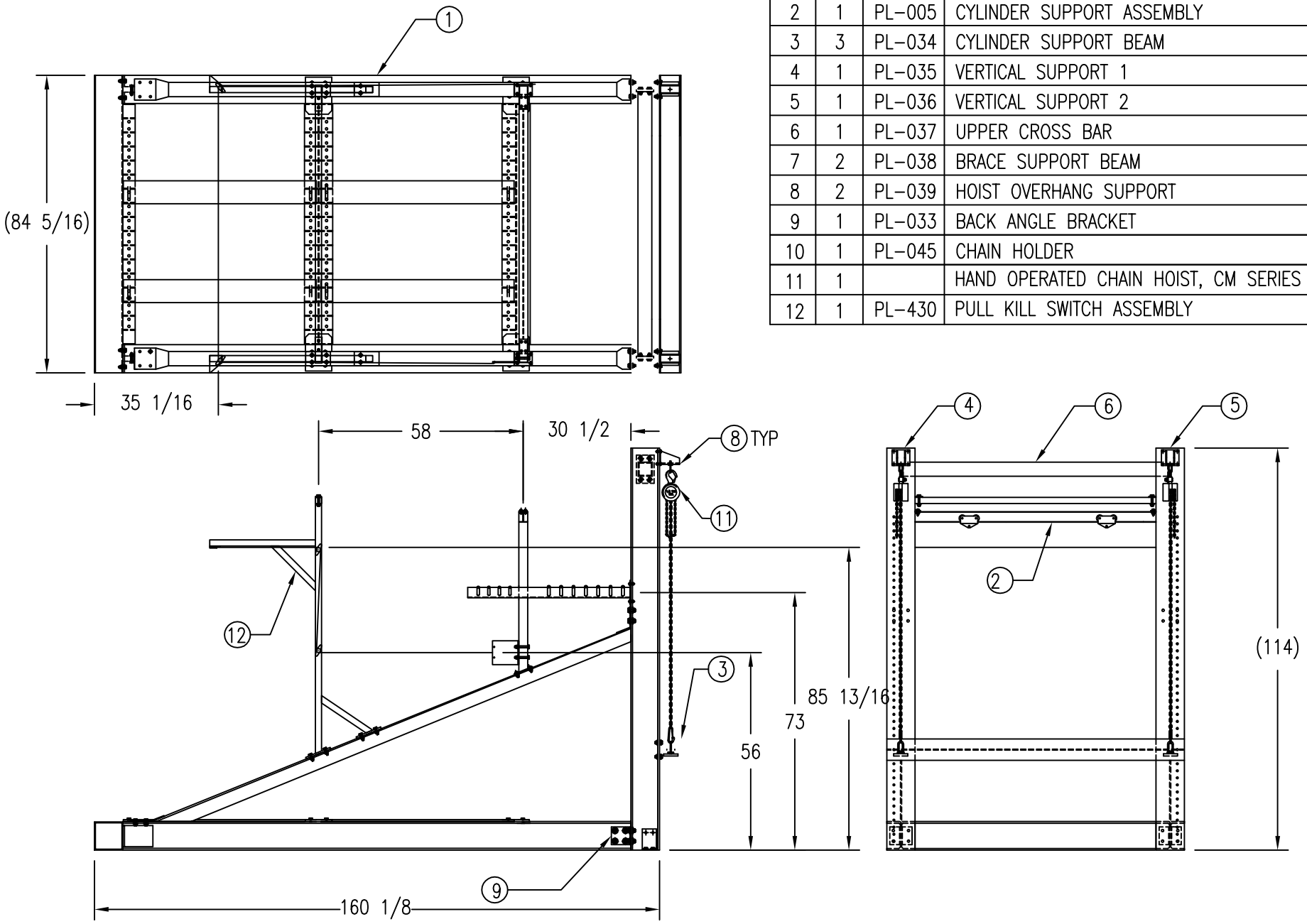
DO NOT SCALE DRAWING

Drawing No. 50369

Rev. A

Work Order No.: 0806D

ITEM	QTY	PART #	DESCRIPTION
1	1	PL-002	PULL TEST MACHINE BASE ASSEMBLY
2	1	PL-005	CYLINDER SUPPORT ASSEMBLY
3	3	PL-034	CYLINDER SUPPORT BEAM
4	1	PL-035	VERTICAL SUPPORT 1
5	1	PL-036	VERTICAL SUPPORT 2
6	1	PL-037	UPPER CROSS BAR
7	2	PL-038	BRACE SUPPORT BEAM
8	2	PL-039	HOIST OVERHANG SUPPORT
9	1	PL-033	BACK ANGLE BRACKET
10	1	PL-045	CHAIN HOLDER
11	1		HAND OPERATED CHAIN HOIST, CM SERIES 622, 1/2 TON.
12	1	PL-430	PULL KILL SWITCH ASSEMBLY



Rev. Level	Description of Change	By	Date	ECN #
A	RELEASE TO SYSTEM	AS	10/04	4067

Tolerance Unless Otherwise Specified
FRAC. 1/X ±1/32
DECIMAL .XX ±0.02"
.XXX ±0.005"
ANGULAR ±1°

Material:

Specifications:

Drawn by: MF

Date: 05/05/04

Freedman Seating Co.
4545 W. Augusta
Chicago, IL 60651

Part Name: PULL TEST MACHINE

DO NOT SCALE DRAWING

Drawing No. PL-001

Rev. A

THE AMERICAN ASSOCIATION FOR LABORATORY ACCREDITATION

ACCREDITED LABORATORY

A2LA has accredited

FSTL
Chicago, IL

for technical competence in the field of

Mechanical Testing

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2005 *General Requirements for the Competence of Testing and Calibration Laboratories*. This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (*refer to joint ISO-ILAC-IAF Communiqué dated 18 June 2005*).

Presented this 8th day of June 2007.

President
For the Accreditation Council
Certificate Number 2324.01
Valid to June 30, 2009

For the tests or types of tests to which this accreditation applies,
please refer to the laboratory's Mechanical Scope of Accreditation.

SCOPE OF ACCREDITATION TO ISO/IEC 17025:2005

FSTL
4545 W. Augusta Blvd.
Chicago, IL 60625
Sudha Veerapaneni (773) 524 2440

MECHANICAL

Valid To: June 30, 2009 Certificate Number: 2324.01

In recognition of the successful completion of the A2LA evaluation process, accreditation is granted to this laboratory to perform the following tests on automotive seating products:

Test	Test Methods
Seating Systems (testing and failure analysis)	FMVSS 571.207; CMVSS 207
Seat Belt Assembly Anchorages (testing and failure analysis)	FMVSS 571.210; CMVSS 210
Child Restraint Anchorage Systems (testing and failure analysis)	FMVSS 571.225; CMVSS 210.1; CMVSS 210.2
Tension (0 to 9000) pounds (six cylinders)	FSTL Tension Test Procedure
Compression (0 to 2500) pounds (two cylinders)	FSTL Compression Test Procedure
Displacement (0 to 18) inches	FSTL Displacement Test Procedure
Cyclic Fatigue (0 to +/- 250) pounds (0 to +/- 12) inches (0 to +/- 10) hertz	FSTL Cycle Fatigue Test Procedure

Also using similar test methods above within the parameters listed above.

Certificate Of Calibration

Equipment Calibration was performed at the address below for

FREEDMAN SEATING
4545 W. AUGUSTA BLVD.
CHICAGO, IL 60651-

Date of Calibration

Thursday, March 13, 2008

Calibration Performed By

Cal~Rite Corporation, Naperville, IL

Machine Profile

Manufacturer:	*RICE LAKE*	**Capacity:**	*9000*	**Next Calibration:**	*13-Sep-08*
Model:	*RL20001-T10-15K*	**Serial #:**	*Y51758-T*	**Temp/Humidity:**	*67.3/24.8*

Force Calibration Results

Language: Lbs **Accuracy +/-: 0.5 %**

Range	Verified Range Force	Uncertainty	Maximum Error
9,000.00	2,000.00 - 9,000.00	0.25%	-0.15%
	-		
	-		
	-		
	-		
	-		

CAL-RITE CORPORATION HAS CALIBRATED THE TESTING EQUIPMENT DESCRIBED ABOVE IN ACCORDANCE WITH THE LATEST SPECIFICATIONS (10-CFR-21, ISO/IEC 17025 AND ISO 10012-1 AND MIL-STD 45662A). ALL VERIFICATION DEVICES CALIBRATED IN ACCORDANCE WITH ASTM-E74 PRACTICES AND ARE TRACEABLE TO THE NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY (NIST).

THE UNCERTAINTY OF THE CALIBRATION PROCESS WAS ESTIMATED AT THE 95% CONFIDENCE LEVEL (K=2).

ASTM Compliant: ☑ Yes ☐ No

MFR Compliant: ☑ Yes ☐ No

☐ 10.1 Lower Limit below 200X Resolution
☐ 10.3 Less than 5 readings taken below 10% FS
☐ 10.5 Does not return to zero in 30 seconds
☐ 15.2 Reading(s) taken below Load Cell Class A limit.
☐ 18.3 Does not meet +/- 1 % accuracy requirement.
☐ A-1 Verified Outside Testing Machine

ACCREDITED

Certificate # 866.01
Calibration

Specification: **NHTSA TP-210-09**

Calibration Procedure: **CR100**

Service Order #: ***9412 - 17***

HATHAWAY, NATHAN ***03/15/08***

SERVICE ENGINEER ***DATE***

LC-2 T

Certificate Of Calibration

Equipment Calibration was performed at the address below for

FREEDMAN SEATING
4545 W. AUGUSTA BLVD.
CHICAGO, IL 60651-

Date of Calibration

Thursday, March 13, 2008

Calibration Performed By

Cal~Rite Corporation, Naperville, IL

Machine Profile

Manufacturer:	*RICE LAKE*	**Capacity:**	*9000*	**Next Calibration:**	*13-Sep-08*
Model:	*RL20001-T10-15K*	**Serial #:**	*Y68886-T*	**Temp/Humidity:**	*67.9/24.8*

Force Calibration Results

Language: Lbs **Accuracy +/-: 0.5 %**

Range	Verified Range Force	Uncertainty	Maximum Error
9,000.00	2,000.00 - 9,000.00	0.25%	0.34%
	-		
	-		
	-		
	-		
	-		

CAL-RITE CORPORATION HAS CALIBRATED THE TESTING EQUIPMENT DESCRIBED ABOVE IN ACCORDANCE WITH THE LATEST SPECIFICATIONS (10-CFR-21, ISO/IEC 17025 AND ISO 10012-1 AND MIL-STD 45662A). ALL VERIFICATION DEVICES CALIBRATED IN ACCORDANCE WITH ASTM-E74 PRACTICES AND ARE TRACEABLE TO THE NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY (NIST).

THE UNCERTAINTY OF THE CALIBRATION PROCESS WAS ESTIMATED AT THE 95% CONFIDENCE LEVEL (K=2).

ASTM Compliant: ☑ Yes ☐ No

MFR Compliant: ☑ Yes ☐ No

☐ 10.1 Lower Limit below 200X Resolution
☐ 10.3 Less than 5 readings taken below 10% FS
☐ 10.5 Does not return to zero in 30 seconds

☐ 15.2 Reading(s) taken below Load Cell Class A limit.
☐ 18.3 Does not meet +/- 1 % accuracy requirement.
☐ A-1 Verified Outside Testing Machine

ACCREDITED

Certificate # 866.01 Calibration

Specification: **NHTSA TP-210-09**

Calibration Procedure: **CR100**

Service Order #: ***9412 - 18***

HATHAWAY, NATHAN ***03/15/08***

SERVICE ENGINEER ***DATE***

LC-3T

Certificate Of Calibration

Equipment Calibration was performed at the address below for

FREEDMAN SEATING
4545 W. AUGUSTA BLVD.
CHICAGO, IL 60651-

Date of Calibration

Friday, June 13, 2008

Calibration Performed By

Cal~Rite Corporation, Naperville, IL

Machine Profile

Manufacturer:	*RICE LAKE*	**Capacity:**	*2000*	**Next Calibration:**	*13-Dec-08*
Model:	*RL20001-T10-15K*	**Serial #:**	*AC45180-T-L*	**Temp/Humidity:**	*84.5/47.8*

Force Calibration Results

Language: Lbs **Accuracy +/-: 0.5 %**

Range	Verified Range Force	Uncertainty	Maximum Error
2,000.00	200.00 - 2,000.00	0.25%	-0.41%
	-		
	-		
	-		
	-		
	-		

CAL-RITE CORPORATION HAS CALIBRATED THE TESTING EQUIPMENT DESCRIBED ABOVE IN ACCORDANCE WITH THE LATEST SPECIFICATIONS (10-CFR-21, ISO/IEC 17025 AND ISO 10012-1 AND MIL-STD 45662A). ALL VERIFICATION DEVICES CALIBRATED IN ACCORDANCE WITH ASTM-E74 PRACTICES AND ARE TRACEABLE TO THE NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY (NIST).

THE UNCERTAINTY OF THE CALIBRATION PROCESS WAS ESTIMATED AT THE 95% CONFIDENCE LEVEL (K=2).

ASTM Compliant: ☑ Yes ☐ No

MFR Compliant: ☑ Yes ☐ No

☐ 10.1 Lower Limit below 200X Resolution
☐ 10.3 Less than 5 readings taken below 10% FS
☐ 10.5 Does not return to zero in 30 seconds
☐ 15.2 Reading(s) taken below Load Cell Class A limit.
☐ 18.3 Does not meet +/- 1 % accuracy requirement.
☐ A-1 Verified Outside Testing Machine

ACCREDITED

Certificate # 866.01 Calibration

Specification: **NHTSA TP-210-09**

Calibration Procedure: **CR100**

QA Review NH

Service Order #: ***9601 - 4***

HATHAWAY, NATHAN ***6/16/2008***

SERVICE ENGINEER ***DATE***

LC-4 TL

Certificate Of Calibration

Equipment Calibration was performed at the address below for

FREEDMAN SEATING
4545 W. AUGUSTA BLVD.
CHICAGO, IL 60651-

Date of Calibration

Friday, June 13, 2008

Calibration Performed By

Cal~Rite Corporation, Naperville, IL

Machine Profile

Manufacturer:	*RICE LAKE*	**Capacity:**	*2000*	**Next Calibration:**	*13-Dec-08*
Model:	*RL20001-T10-15K*	**Serial #:**	*Y98006-T-L*	**Temp/Humidity:**	*83.4/51.7*

Force Calibration Results

Language: Lbs **Accuracy +/-: 0.5 %**

Range	Verified Range Force	Uncertainty	Maximum Error
2,000.00	200.00 - 2,000.00	0.25%	-0.41%
	-		
	-		
	-		
	-		
	-		

CAL-RITE CORPORATION HAS CALIBRATED THE TESTING EQUIPMENT DESCRIBED ABOVE IN ACCORDANCE WITH THE LATEST SPECIFICATIONS (10-CFR-21, ISO/IEC 17025 AND ISO 10012-1 AND MIL-STD 45662A). ALL VERIFICATION DEVICES CALIBRATED IN ACCORDANCE WITH ASTM-E74 PRACTICES AND ARE TRACEABLE TO THE NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY (NIST).

THE UNCERTAINTY OF THE CALIBRATION PROCESS WAS ESTIMATED AT THE 95% CONFIDENCE LEVEL (K=2).

ASTM Compliant: ☑ Yes ☐ No

MFR Compliant: ☑ Yes ☐ No

☐ 10.1 Lower Limit below 200X Resolution
☐ 10.3 Less than 5 readings taken below 10% FS
☐ 10.5 Does not return to zero in 30 seconds
☐ 15.2 Reading(s) taken below Load Cell Class A limit.
☐ 18.3 Does not meet +/- 1 % accuracy requirement.
☐ A-1 Verified Outside Testing Machine

ACCREDITED

Certificate # 866.01
Calibration

Specification: **NHTSA TP-210-09**

Calibration Procedure: **CR100**

QA Review
NH

Service Order #: ***9601 - 9***

HATHAWAY, NATHAN ***6/16/2008***

SERVICE ENGINEER ***DATE***

LC-STL