



**mga research corporation**

**MGA RESEARCH CORPORATION  
FMVSS 208 SUPPRESSION  
ALEA LEATHER SPECIALIST, INC.  
2007 BUICK LUCERNE**

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**0850-01**



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### TEST REPORT

**MGA REPORT NO.:** C07I7-036.2

**TEST (S) PERFORMED ON:** June 11 - 13, 2007

**TEST DESCRIPTION:** FMVSS 208 - Suppression

**ITEM DESCRIPTION:** One (1) 2007 Buick Lucerne

**PROCEDURE NUMBER:** MGATP208 – 12SUP\_DS14.doc  
Last revision date: 09/15/03

**TEST REFERENCE NUMBER (S):** SU7037 – SU7054

**TEST LABORATORY:** MGA Research Corporation  
446 Executive Drive  
Troy, Michigan 48083

**SUBMITTED TO:** Doug Heath  
Alea Leather Specialist, Inc.  
55412 Lyon Industrial Drive  
New Hudson, MI 48165

**MGA PERSONNEL:**

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Helen Kaleto  
Project Leader

Test Personnel:  
Louis S. Campbell  
Tony Frontera

\* The results presented in this report relate only to the specified test items.

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### **Objective**

This report contains results for FMVSS 208 – Suppression testing requested by Alea Leather Specialist, Inc. The test samples provided were tested to the requirements stated in FMVSS 208 (49CFR 572, Subpart N S20 dated 01/14/03). A testing matrix was constructed based upon the requirements and needs of Classic Soft Trim on one (1) vehicle with one (1) seat (2007 Buick Lucerne). No statement of compliancy will be made in this report.

### **Purpose**

This standard specifies requirements for airbag suppression determination in the right front outboard seating position to eliminate the inflation of the passenger-side airbag when there is no occupant, an unrestrained child, or a child restraint system in the event of a collision.

### **FMVSS 208 Requirements**

The National Highway Traffic Safety Administration (NHTSA) Test Procedure FMVSS 208-TP-12 specified the requirements of this test series.

Compliance shall be determined by the following:

- (a) Place the Child Restraint System (CRS) at the designated seating position.
- (b) Tighten the seat belt load to  $130N \pm 3N$  for child seats.
- (c) Tighten the seat belt load to  $9N - 18N$  for booster seats.
- (d) Shut all doors and turn the vehicle ignition to the on position.
- (e) Verify that the airbag suppression light is off.

### **Additional Customer-Specified Requirements**

Per request, one (1) photograph was taken (passenger side) of each individual car seat and dummy position.

### **Equipment**

MGA Research Corporation's FMVSS 208 Child Seats were used for this testing. For the complete test series, equipment included 10 child seats, a 50 lbs load cell, and the following dummies: Newborn Infant, CRABI 12 month-old, Hybrid III 3 year-old, Hybrid III 6 year-old, and Hybrid III 5<sup>th</sup>% Female.

### **Procedure/Method**

Each vehicle was tested in accordance with FMVSS 208-12 test procedure Data Sheets 14-21 & 29. For each test scenario, the vehicle ignition was cycled and the suppression was verified.

### **Test Results**

1 car bed, 3 rear facing, 4 convertible, and 2 booster Child Restraint Systems (CRS) were used to evaluate each seat. All tests requiring the Dummies were completed. All tests were conducted with respect to the standard. The 2007 Buick Lucerne with Alea Leather Specialist, Inc. Leather appeared to meet the requirements of FMVSS 208 Suppression. All data traceable to the National Institute of Standards and Technology (NIST).



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Date: 6/11/2007  
Customer: Alea Leather  
MGA Job Number: C0717-036.2

### **VEHICLE INFORMATION:**

Year: 2007  
Make: Buick  
Model: Lucerne CX  
Body Style: 4-Door sedan  
VIN Number: 1G4HP57277U144338

### **DESCRIPTION OF TEST PROCEDURE:**

This test procedure is used to conduct airbag suppression determination testing for FMVSS 208 – Occupant Crash Protection procedures. This procedure is based upon Data Sheet(s) 14 of the NHTSA Test Procedure (TP208-12).

Test Personnel: LSC

### **PASSENGER DESIGNATED SEATING POSITIONS:**

Using any part of any control, other than the parts just used for fore-aft positioning, determine the range of angles of the seat cushion reference line and set the seat cushion reference line at the mid-angle.

Maximum Angle: 18.1°  
Minimum Angle: 18.1°  
Mid Angle: 18.1°

Visually mark for future reference the seat back angle, if adjustable, at the manufacturer's nominal design riding position for a 50th percentile adult male in the manner specified by the manufacturer.

Design Seat Back Angle: N/A  
Actual Seat Back Angle: 22.2° @ Seat Back

### **BUCKET SEATS:**

Locate and mark for future reference the longitudinal centerline of the seat cushion. The longitudinal centerline of a bucket seat cushion is determined at the widest part of the seat cushion. Measure perpendicular to the longitudinal centerline of the vehicle.

Width Of Seat Cushion: 484  
1/2 Width Of Seat Cushion: 242

### **BENCH SEATS:**

Locate and mark for future reference the longitudinal centerline of the passenger seat cushion. The longitudinal centerline is the same distance from the longitudinal centerline of the vehicle as the center of the steering wheel.

Distance from the centerline of vehicle to center of steering wheel: N/A  
Distance From The Centerline Of Vehicle To Center Of Passenger Seat: N/A

### **HEAD RESTRAINTS:**

Measure the vertical distance from the top most point of the head restraint to the bottom most point. Locate and mark a horizontal plane through the midpoint of this distance.

Height Of Head Restraint: N/A  
Mid-Point Height: N/A

### **SEAT BELT ANCHORAGES:**

Place any adjustable seat belt anchorages at the vehicle manufacturer's nominal design position for a 50<sup>th</sup> percentile adult male occupant.

Design Anchorage Position: Notch 2 of 4 from top  
Actual Anchorage Position: Notch 2 of 4 from top