

SAFETY TEST
VEHICLE CRASH TEST LETTER

PAGE 01

VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
TEST DATE 05/09/96

TEST PURPOSE PRIMARY, 1997 USA 301 DEVELOPMENT.
OBSERVE FUEL SYSTEM INTEGRITY.

IMPACT TYPE TARGET SPEED; 30.1 MPH
DAMAGE LOCATION; REAR
BARRIER TYPE; REAR TYPE IV
BARRIER SURFACE; PLYWOOD

VEHICLE BODY CLASS; ZJ
CAR LINE; J
BODY; 74
ENGINE; 5.2 LITRE
ENGINE NOTE; ELECTRONIC FUEL INJECTION
TRANSMISSION; 4 SPEED AUTO 4x4
TRANS. NOTE;
VIN AS TESTED; 1J4EZ78Y2TC151272 MOD.
VIN AS BUILT; 1J4EZ78Y2TC151272 MOD.

TEST SPEED 30.1 MPH BY ELECTRONIC TRAP TIMER.

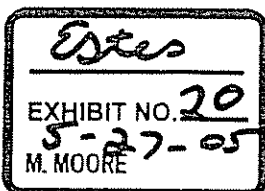
TEST WEIGHT (LBS) 4826 TOTAL, 2779 FRONT 2047 REAR

OCCUPANTS LEFT FRONT, HYB II, BALLAST. AD-63
RESTRAINT-BELTS ONLY.
RIGHT FRONT, HYB II, BALLAST. AD-67
RESTRAINT-BELTS ONLY.

BUILD CONDITION 1996 PRODUCTION ZJ MODIFIED TO REPRESENT 1997.
5.2 LITRE (V8) ENGINE, 4 SPEED AUTO TRANS, 4X4,
POWER STEERING, ABS BRAKES, AIR CONDITIONING.
FULL CENTER CONSOLE AND OVERHEAD CONSOLE.
SUNROOF AND FULL ROOF RACK.
P225/70 R16 TIRES ON ALUMINUM RIMS & FULL SIZE
SPARE.
1997 FUEL SENDING UNIT AND 1997 FUEL TANK DESIGN;
FULL TRAILER HITCH, NO SKID PLATE, NO BRACKET.

TARGET WEIGHT (LBS) 4185 TOTAL, 2336 FRONT, 1849 REAR, REP MAX OPT WT.
NOT INCLUDING OCCUPANTS OR LUGGAGE BALLAST.

FUEL AND BALLAST 21.5 GALLONS OF STODDARD SOLVENT.
300 LBS OF LUGGAGE BALLAST SECURED IN CARGO AREA.



DC 03228

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PAGE 02

VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
TEST DATE 05/09/96

POST TEST REMARKS THERE WAS NO FUEL LEAKAGE DURING IMPACT, NOR DUR-
ING THE SUBSEQUENT THIRTY MINUTES. THERE WAS NO
FUEL LEAKAGE DURING THE STATIC ROLLOVER.

REPORT CODES A = TRANSDUCER DATA B = ALL FILM DATA
 C = HIGH SPEED FILM D = ENGINEER'S REPORT
 E = DUMMY KINEMATICS F = STEERING COLUMN
 G = UNDERBODY H = A-POST
 I = DYNAMIC CRUSH J = ENGINE COMPARTMENT
 K = DOOR CRUSH L = FORCE/CRUSH/ENERGY
 M = SPECIAL N = CATALOG EDP DATA
 * = REPORT REQUESTOR

DISTRIBUTION M.T. STEBELETON 422-05-01 (AB)
 J.B. ESTES 514-15-58 (AB)

DATE 05/10/96 TIME 09.58.53.

DC 03229

CHRYSLER MOTORS
SAFETY TEST
VEHICLE CRASH TEST REQUEST

ITEM ZJ8243 CHARGE NO. MASTERCARD ISSUE DATE 05/01/96

VC 5927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI.
1997 MVSS DEVELOPMENT - 301.

TEST DATE 5/11/96 ENGINEER MARTIN MANNING
SPEED 30.1 MPH SOURCE CRAP

TEST PURPOSE PRIMARY, 1997 USA 301 DEVELOPMENT.
OBSERVE FUEL SYSTEM INTEGRITY.

IMPACT TYPE TARGET SPEED; 30.1 MPH
DAMAGE LOCATION; REAR
BARRIER TYPE; REAR TYPE IV
BARRIER SURFACE; PLYWOOD

VEHICLE BODY CLASS; ZJ
CAR LINE; J
BODY; 74
ENGINE; 5.2 LITRE
ENGINE NOTE; ELECTRONIC FUEL INJECTION
TRANSMISSION; 4 SPEED AUTO 4x4
TRANS. NOTE;
VIN AS TESTED; 1J4EZ78Y2TC151272 MOD.
VIN AS BUILT; 1J4EZ78Y2TC151272 MOD.

BUILD CONDITION 1996 PRODUCTION ZJ MODIFIED TO REPRESENT 1997.
5.2 LITRE (V8) ENGINE, 4 SPEED AUTO TRANS, 4X4,
POWER STEERING, ABS BRAKES, AIR CONDITIONING.
FULL CENTER CONSOLE AND OVERHEAD CONSOLE.
SUNROOF AND FULL ROOF RACK.
P225/70 R16 TIRES ON ALUMINUM RIMS & FULL SIZE
SPARE.
1997 FUEL SENDING UNIT AND 1997 FUEL TANK DESIGN.
FULL TRAILER HITCH, NO SKID PLATE, NO BRACKET.

TARGET WEIGHT (LBS) 4185 TOTAL, 2336 FRONT, 1849 REAR, REP MAX OPT WT.
NOT INCLUDING OCCUPANTS OR LUGGAGE BALLAST.

TEST WEIGHT (LBS) 4900 TOTAL, 2779 FRONT, 2121 REAR

FUEL BALLAST 21.5 GALLONS OF STODDARD SOLVENT.

LUGGAGE BALLAST 300 LBS OF LUGGAGE BALLAST SECURED IN CARGO AREA.

OTHER BALLAST _____

POST TEST REMARKS _____

CHRYSLER MOTORS
SAFETY TEST
VEHICLE CRASH TEST REQUEST

OCCUPANTS LEFT FRONT, HYB II, BALLAST.
RESTRAINT-BELTS ONLY. AD NO
RIGHT FRONT, HYB II, BALLAST. AD NO
RESTRAINT-BELTS ONLY.

MECHANICAL REQ PLACE SEAT IN MID TRACK POSITION.
REAR SEATS MUST REMAIN IN TEST VEHICLE.
FUEL PUMP TO BE RUNNING DURING TEST.
RUN FUEL PUMP PRE TEST TO CHECK CONNECTIONS.
PRESSURE CHECK PRE AND POST TEST.
STATIC ROLL POST TEST.
NO STODDARD ADDED AT JTE FUEL TANK EMPTY.
PAINT REAR DIFFERENTIAL AND GAS TANK FOR VIEWING.
PAINT TANK AND TARGET AS PER 3RD SHEET 106.
PAINT FILLER NECK AREA FOR VISIBILITY.

INSTRUMENTATION REQ SEE 3RD SHEET NO. 106 FOR ACCELEROMETER REQUIRE-
MENTS AND LOCATIONS (THE 4 SILL ACCELEROMETERS
ARE TO BE BI-AXIAL).
TRIAxIAL ON AECM BRACKET.
MONITOR AECM SQUIB, SAFING AND INT. ACCELEROMETER.
ADD TRI-AXIAL ACCELEROMETERS LEFT AND RIGHT AT :
FRONT SEAT RISER REARWARD FLANGE 6 IN. INBOARD
FROM SILL. (UNDER SEAT'S FRONT OUTER CORNER)
ON B-PILLAR REARWARD OF RETRACTOR ON LOWER
RADIUS OF B-PILAR TO FLOOR.
ON B-PILLAR BETWEEN RETRACTOR & ACCESS HOLE AT
THE APPROXIMATE HEIGHT OF THE STRIKER BRACKET.
THESE LOCATIONS ARE MARKED APPROXIMATELY BY PEN
ON THE VEHICLE. QUESTIONS CAN BE DIRECTED TO
J.B. ESTES 733-2519 OR KUMAR SINGARAJAN 733-3615
INSURE AIRBAGS DO NOT FIRE.

PHOTOGRAPHIC REQ 1-LEFT SIDE OVERALL CAMERA TO VIEW ENTIRE VEHICLE.
1-RIGHT SIDE OVERALL CAMERA TO VIEW ENTIRE VEHICLE
1-CATWALK CAMERA TO VIEW ENTIRE VEHICLE.
2-PIT CAMERAS FOR ANALYSIS OF REAR UNDERBODY.
1-PIT CAMERA CLOSE UP OF TRACK BAR BRACKET.
PRE AND POST TEST PHOTOS OVERALL AND UNDERBODY ON
8 X 10 PAPER IN COLOR.
1-VELOCITY CAMERA

FILM ANALYSIS VEHICLE VELOCITY, ONLY IF REQUESTED.
DYNAMIC CRUSH.

REMARKS MAKE 1 FILM COPY AND 1 VHS COPY, SEND TO:
J.B. ESTES 514-15-58
PLEASE RETURN VEHICLE POST TEST TO JTE.
ATTENTION PAM MORTON @ 733-8727

CHRYSLER MOTORS
SAFETY TEST
VEHICLE CRASH TEST REQUEST

T. E. REPORT

301 FUEL SYSTEMS REPORT REQUIRED.

REPORT CODES

A = TRANSDUCER DATA	B = ALL FILM DATA
C = HIGH SPEED FILM	D = ENGINEER'S REPORT
E = DUMMY KINEMATICS	F = STEERING COLUMN
G = UNDERBODY	H = A-POST
I = DYNAMIC CRUSH	J = ENGINE COMPARTMENT
K = DOOR CRUSH	L = FORCE/CRUSH/ENERGY
M = SPECIAL	N = CATALOG EDP DATA
* = REPORT REQUESTOR	

DISTRIBUTION

M.T. STEBELETON
J.B. ESTES

422-05-01 (AB)
514-15-58 (AB)

X, Y, Z DIMENSIONS

TEST NUMBER VC5927

LOC.	X	Y	Z
LFS	93.9	-34.1	15.5
LMS	63.8	-34.1	16.3
LRA	38.8	44-12.8 -31.2	13.5
LAP	116.0	44-14.0 -30.0	49.5
LCP	42.3	44-13.4 -30.6	45.1
		-	

LOC.	X	Y	Z

TRAMMEL MEASUREMENTS:

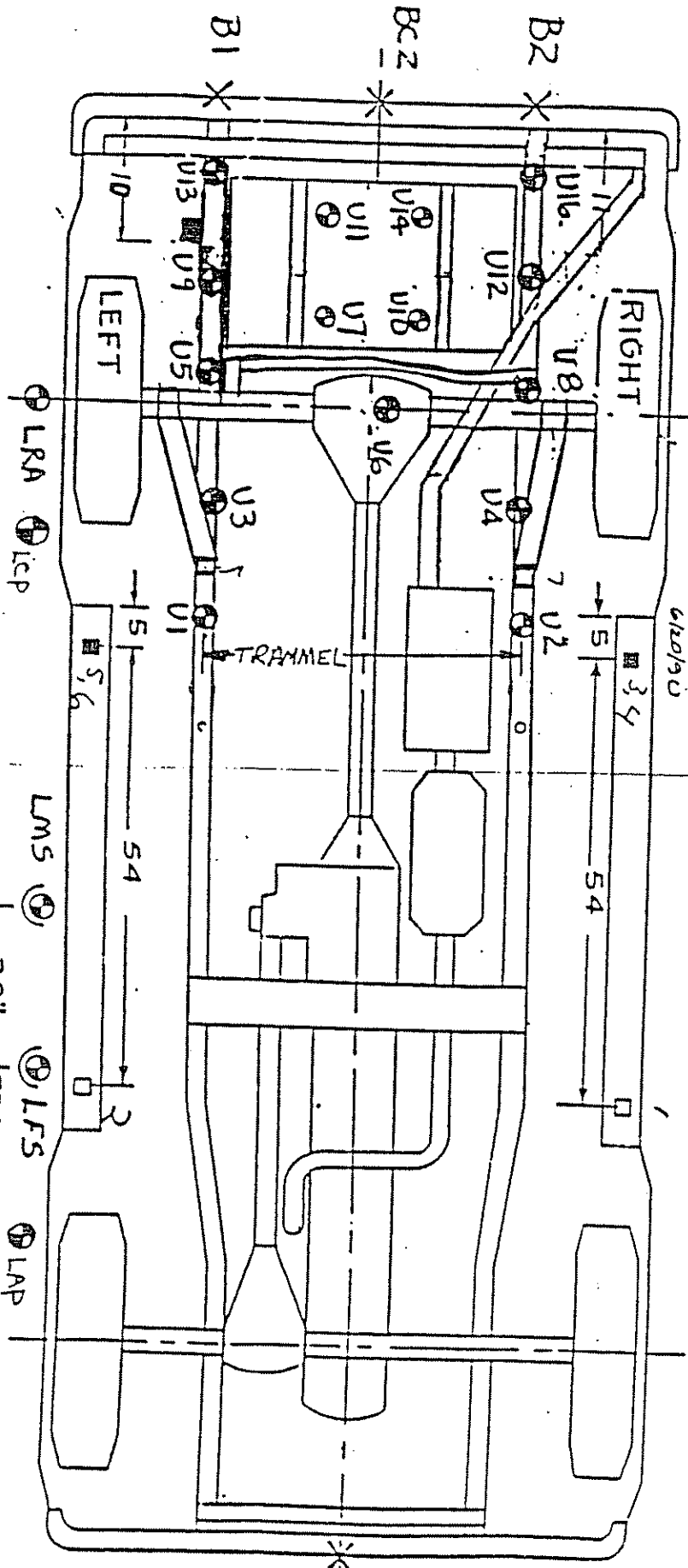
LEFT SILL: PRE 79.95

THIRD SHEET 106, ITEM #38243, VC 59227
 JEEP ZJ .4x4
 TARGET AND ACCELEROMETER LOCATIONS
 FOR REAR IMPACTS

ZENONS READ ON ROOF

ACCEL. LOCATIONS ARE XJ (REF. SHEET 102)
 ACTUAL LOCATIONS PER TRAMMEL

ELEC FUEL PUMP TO BE
 RUNNING DURING IMPACT



TARGETS

- X PUNCH POINT
- ⊙ UNDERBODY
- ⊙ SIDE VIEW

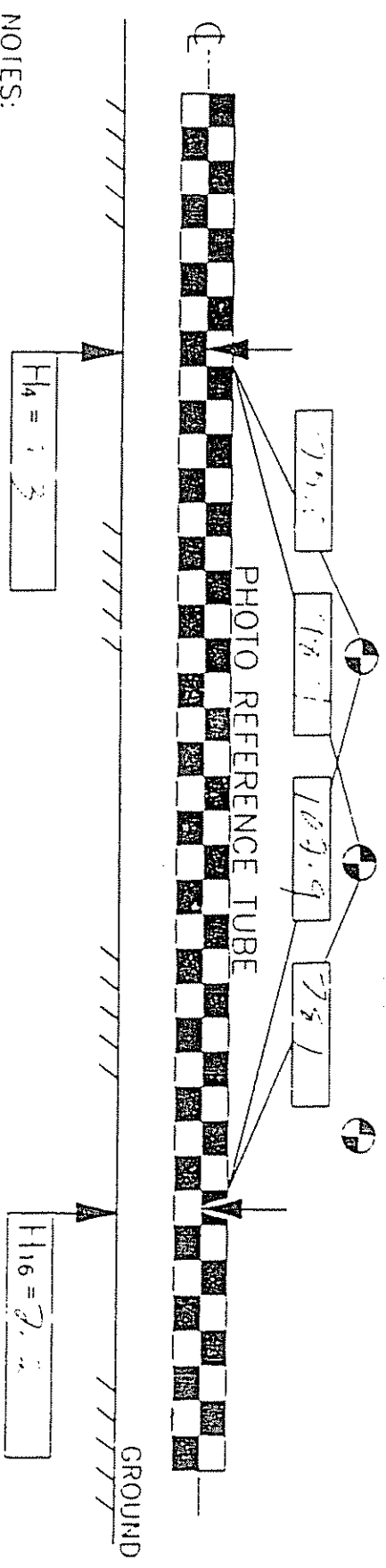
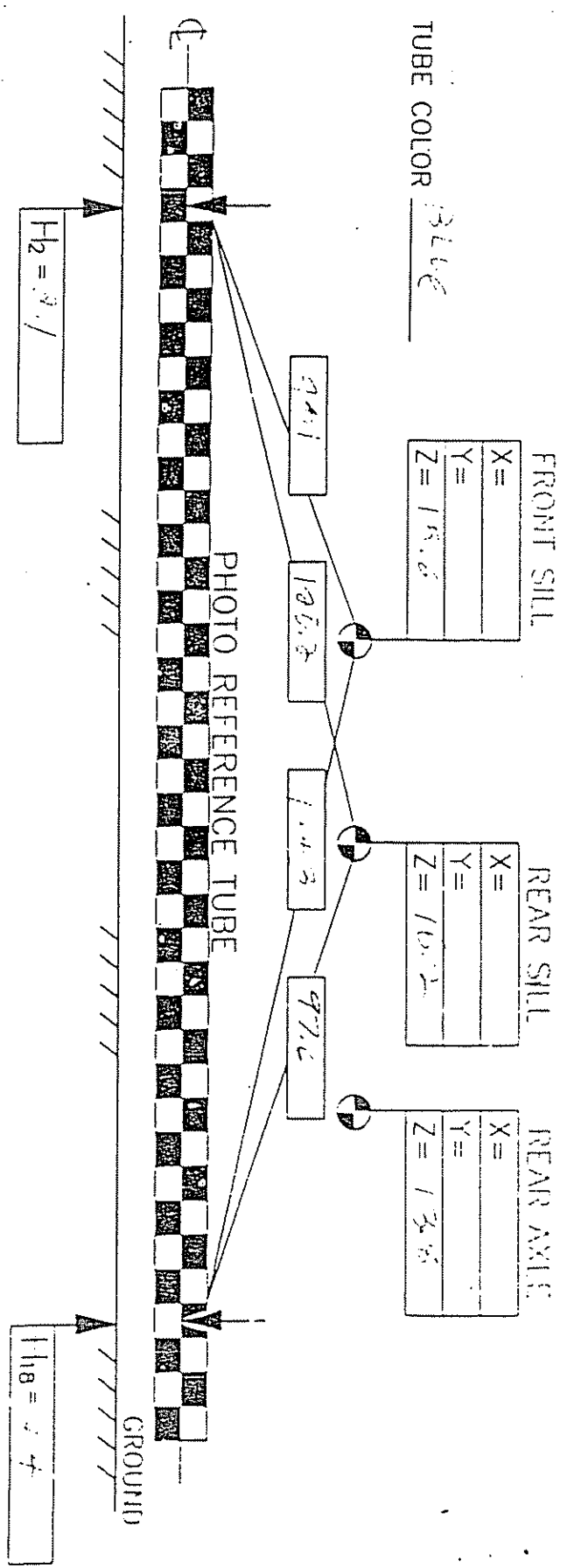
NOTES -

1. PRE AND POST DIMENSIONS ARE REQUIRED PER BREITMOSER LETTER OF 01-04-68
2. NUMBERS ASSIGNED TO EACH TARGET ARE PERMANENT
3. TARGETS MAY BE DELETED BY NUMBER PER TRAMMEL
4. ADDITIONAL TARGETS MAY BE REQUESTED BY TRAMMEL

LEGEND

ACCELEROM - □ SINGLE AXIS, X

TUBE COLOR Blue



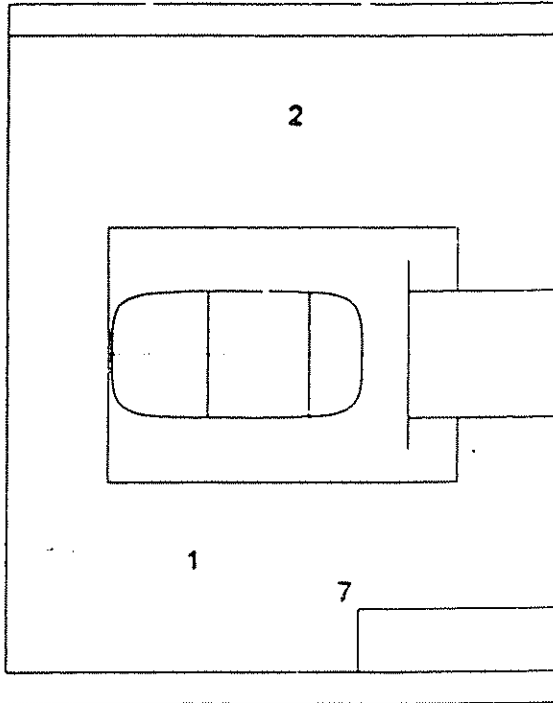
NOTES:

1. THE Z DIMENSION FOR THE SILL TARGETS AND REAR AXLE MUST BE RETAKEN AT THE TEST SITE
2. IF OTHER TUBE POINTS ARE USED, SO INDICATE

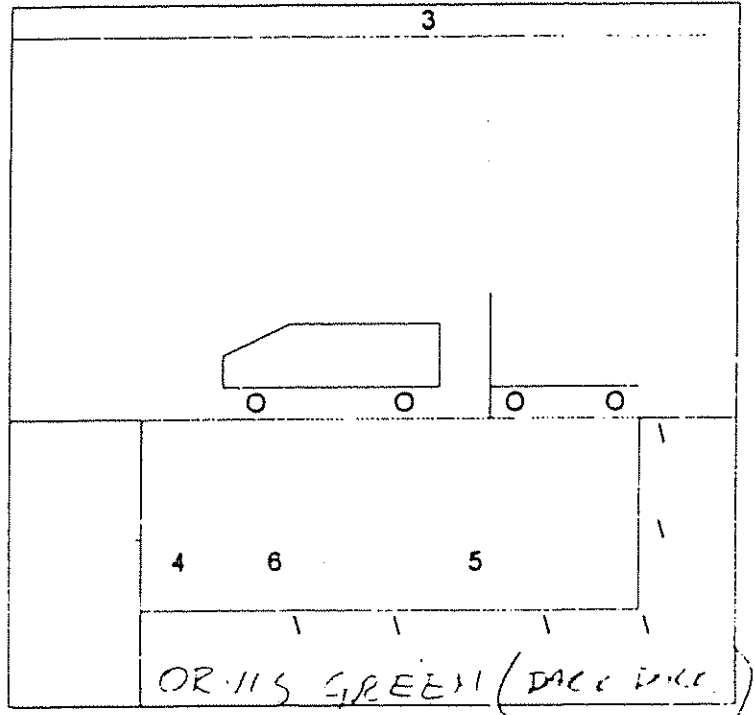
FOR REAR IMPACT TESTS -- DIMENSIONING BETWEEN SILL TARGETS AND PHOTO REFERENCE TUBE TEST ENGR JD/2000

VC 5722

PLAN VIEW



SIDE VIEW



TEST NUMBER:	VC5927	VEHICLE TYPE:	ZJ
TEST TYPE:	30 MPH REAR TYPE IV IMPACT	TEST ENGINEER:	MARTIN
REQUEST DATE:	05/02/98		

#	VIEW DESCRIPTION A=ANALYSIS	CAM S/N	LENS FL	LENS S/N	LENS MFG.	F- STP	PNE	SKT	CEL	CAM MFG
1	A LEFT SIDE OVERALL DYNAMIC CRUSH	426	25mm	110509	E111					
2	RIGHT SIDE OVERALL	281	8mm	107230						
3	CATWALK VIEW VEHICLE AT IMPACT	275	18mm	107233						
4	A SOUTH PIT OVERALL	430	13mm	1	cos					
5	A NORTH PIT OVERALL	431	13mm	3	cos					
6	PIT TRACK BAR BRACKET	276	50mm	19183	cos					
7	A VELOCITY	286	100mm	82088	E111					

VC5927

DC 03237

THUSSIAN

FUEL SYSTEM AND STATIC ROLLOVER SUMMARY

TEST NUMBER VC5927 ITEM NUMBER ZJ8243 TEST ENGINEER MANUEL

V.I.N. 1J4EZ78Y2TC151272, TEST DATE 5/9/96 ROLL DATE 5/10/96

TEST TYPE; 30 MPH FRONT FLAT FIXED BARRIER IMPACT

FUEL; TYPE AND QUANTITY - .767 S.G. STODDARD SOLVENT, 21.5 GALLONS

TEST SPEED 30.1 MPH, TEST WEIGHT 4526 POUNDS.

POST TEST FUEL SYSTEM OBSERVATIONS OK

POST IMPACT LEAKAGE(OZ); AT IMPACT 0
 1ST 5 MIN. 0
 NEXT 25 MIN. 0

POST TEST PRESSURE CHECK OK

ELECTRIC FUEL PUMP RUN OK

STATIC ROLL LEAKAGE WITH VEHICLE 66 SIDE DOWN FIRST

		FUEL LEAKAGE LOCATIONS DURING STATIC ROLL				TOTAL
ROLL TIME						
0-90	1ST 5 MIN					*
	POST 5 MIN					**
90-180	1ST 5 MIN					*
	POST 5 MIN					**
180-270	1ST 5 MIN					*
	POST 5 MIN					**
270-360	1ST 5 MIN					*
	POST 5 MIN					**

* OUNCES IN 5 MINUTES, ** OUNCES PER MINUTE

LAST FORM MODIFICATION 5/27/93 - GAB

TE 05/10/96 ELECTRONIC DATA PROCESSING VEHICLE CRASH ENGINEERING
 ME 12.30.45. EDP TEST LETTER DEPT 5320

05927 ITEM ZJ8243
 05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI ITEM ZJ8243
 97 MVSS DEVELOPMENT - 301.
 ST DATE 05/09/96

ST PURPOSE PRIMARY, 1997 USA 301 DEVELOPMENT.
 OBSERVE FUEL SYSTEM INTEGRITY.

PACT TYPE TARGET SPEED; 30.1 MPH
 DAMAGE LOCATION; REAR
 BARRIER TYPE; REAR TYPE IV
 BARRIER SURFACE; PLYWOOD

VEHICLE BODY CLASS; ZJ
 CAR LINE; J
 BODY; 74
 ENGINE; 5.2 LITRE
 ENGINE NOTE; ELECTRONIC FUEL INJECTION
 TRANSMISSION; 4 SPEED AUTO 4x4
 TRANS. NOTE;
 VIN AS TESTED; 1J4EZ78Y2TC151272 MOD.
 VIN AS BUILT; 1J4EZ78Y2TC151272 MOD.

ST SPEED 30.1 MPH BY ELECTRONIC TRAP TIMER.

ST WEIGHT (LBS) 4826 TOTAL, 2779 FRONT, 2047 REAR

OCCUPANTS LEFT FRONT, HYB II, BALLAST. AD-63
 RESTRAINT-BELTS ONLY.
 RIGHT FRONT, HYB II, BALLAST. AD-67
 RESTRAINT-BELTS ONLY.

VEHICLE CONDITION 1996 PRODUCTION ZJ MODIFIED TO REPRESENT 1997.
 5.2 LITRE (V8) ENGINE, 4 SPEED AUTO TRANS, 4X4,
 POWER STEERING, ABS BRAKES, AIR CONDITIONING.
 FULL CENTER CONSOLE AND OVERHEAD CONSOLE.
 SUNROOF AND FULL ROOF RACK.
 P225/70 R16 TIRES ON ALUMINUM RIMS & FULL SIZE
 SPARE.
 1997 FUEL SENDING UNIT AND 1997 FUEL TANK DESIGN.
 FULL TRAILER HITCH, NO SKID PLATE, NO BRACKET.

VEHICLE WEIGHT (LBS) 4185 TOTAL, 2336 FRONT, 1849 REAR, REP MAX OPT WT.
 NOT INCLUDING OCCUPANTS OR LUGGAGE BALLAST.

FUEL AND BALLAST 21.5 GALLONS OF STODDARD SOLVENT.
 300 LBS OF LUGGAGE BALLAST SECURED IN CARGO AREA.

ST TEST REMARKS THERE WAS NO FUEL LEAKAGE DURING IMPACT, NOR DUR-
 ING THE SUBSEQUENT THIRTY MINUTES. THERE WAS NO
 FUEL LEAKAGE DURING THE STATIC ROLLOVER.

DATE 05/10/96
TIME 12.30.45.

ELECTRONIC DATA PROCESSING
EDP TEST LETTER

VEHICLE CRASH ENGINEERING
DEPT 5320

VC05927 ITEM ZJ8243
VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
TEST DATE 05/09/96

EDP TECHNICIAN S. MARCHENIA

No. of Pages 58
CC

J. B. ESTES 514-15-58
M. T. STEDELETON 422-05-01

DC 03240

TITLE: Page Index of EDP plots

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Page I-01

***** VC05927A *****

TITLE: Transducer Summary Reports

Pages 001 - 005

PAGE: 001 TSR Channels 001 - 008
PAGE: 002 TSR Channels 009 - 016
PAGE: 003 TSR Channels 017 - 024
PAGE: 004 TSR Channels 025 - 032
PAGE: 005 TSR Channels 033 - 035

***** VC05927B *****

TITLE: Vehicle Channels

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PAGE: 007 Average of Rear Sill Chls 5 & 7
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PAGE: 009 LEFT FRONT SILL X, Chl 1, VD
PAGE: 010 LEFT FRONT SILL Z, Chl 2
PAGE: 011 RIGHT FRONT SILL X, Chl 3
PAGE: 012 RIGHT FRONT SILL X, Chl 3, VD
PAGE: 013 RIGHT FRONT SILL Z, Chl 4
PAGE: 014 LEFT REAR SILL X, Chl 5
PAGE: 015 LEFT REAR SILL X, Chl 5, VD
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PAGE: 017 RIGHT REAR SILL X, Chl 7
PAGE: 018 RIGHT REAR SILL X, Chl 7, VD
PAGE: 019 RIGHT REAR SILL Z, Chl 8
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PAGE: 021 LT RAIL TRAIL ARM PIV X, Chl 9, VD
PAGE: 022 RT RAIL TRAIL ARM PIV X, Chl 10
PAGE: 023 RT RAIL TRAIL ARM PIV X, Chl 10, VD
PAGE: 024 RT REAR RAIL MID TANK X, Chl 11
PAGE: 025 RT REAR RAIL MID TANK X, Chl 11, VD
PAGE: 026 RT REAR RAIL MID TANK Z, Chl 12
PAGE: 027 AECM EXTERN X, Chl 13
PAGE: 028 AECM EXTERN X, Chl 13, VD
PAGE: 029 AECM EXTERN Y, Chl 14
PAGE: 030 AECM EXTERN Z, Chl 15
PAGE: 031 LT FT SEAT RISER X, Chl 16
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PAGE: 033 LT FT SEAT RISER Y, Chl 17
PAGE: 034 LT FT SEAT RISER Z, Chl 18
PAGE: 035 RT FT SEAT RISER X, Chl 19
PAGE: 036 RT FT SEAT RISER X, Chl 19, VD
PAGE: 037 RT FT SEAT RISER Y, Chl 20
PAGE: 038 RT FT SEAT RISER Z, Chl 21
PAGE: 039 LT B POST AT FLOOR X, Chl 22
PAGE: 040 LT B POST AT FLOOR X, Chl 22, VD
PAGE: 041 LT B POST AT FLOOR Y, Chl 23
PAGE: 042 LT B POST AT FLOOR Z, Chl 24
PAGE: 043 RT B POST AT FLOOR X, Chl 25
PAGE: 044 RT B POST AT FLOOR X, Chl 25, VD
PAGE: 045 RT B POST AT FLOOR Y, Chl 26
PAGE: 046 RT B POST AT FLOOR Z, Chl 27
PAGE: 047 LT B POST AT STRIKER X, Chl 28
PAGE: 048 LT B POST AT STRIKER X, Chl 28, VD
PAGE: 049 LT B POST AT STRIKER Y, Chl 29
PAGE: 050 LT B POST AT STRIKER Z, Chl 30
PAGE: 051 RT B POST AT STRIKER X, Chl 31
PAGE: 052 RT B POST AT STRIKER X, Chl 31, VD
PAGE: 053 RT B POST AT STRIKER Y, Chl 32
PAGE: 054 RT B POST AT STRIKER Z, Chl 33

C

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***** VC05927C *****

TITLE: Moving barrier Channels

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PAGE: 055 LT RAIL MBAR MID X Chl 34

PAGE: 056 LT RAIL MBAR MID X , Chl 34, VD

PAGE: 057 RT RAIL MBAR MID X Chl 35

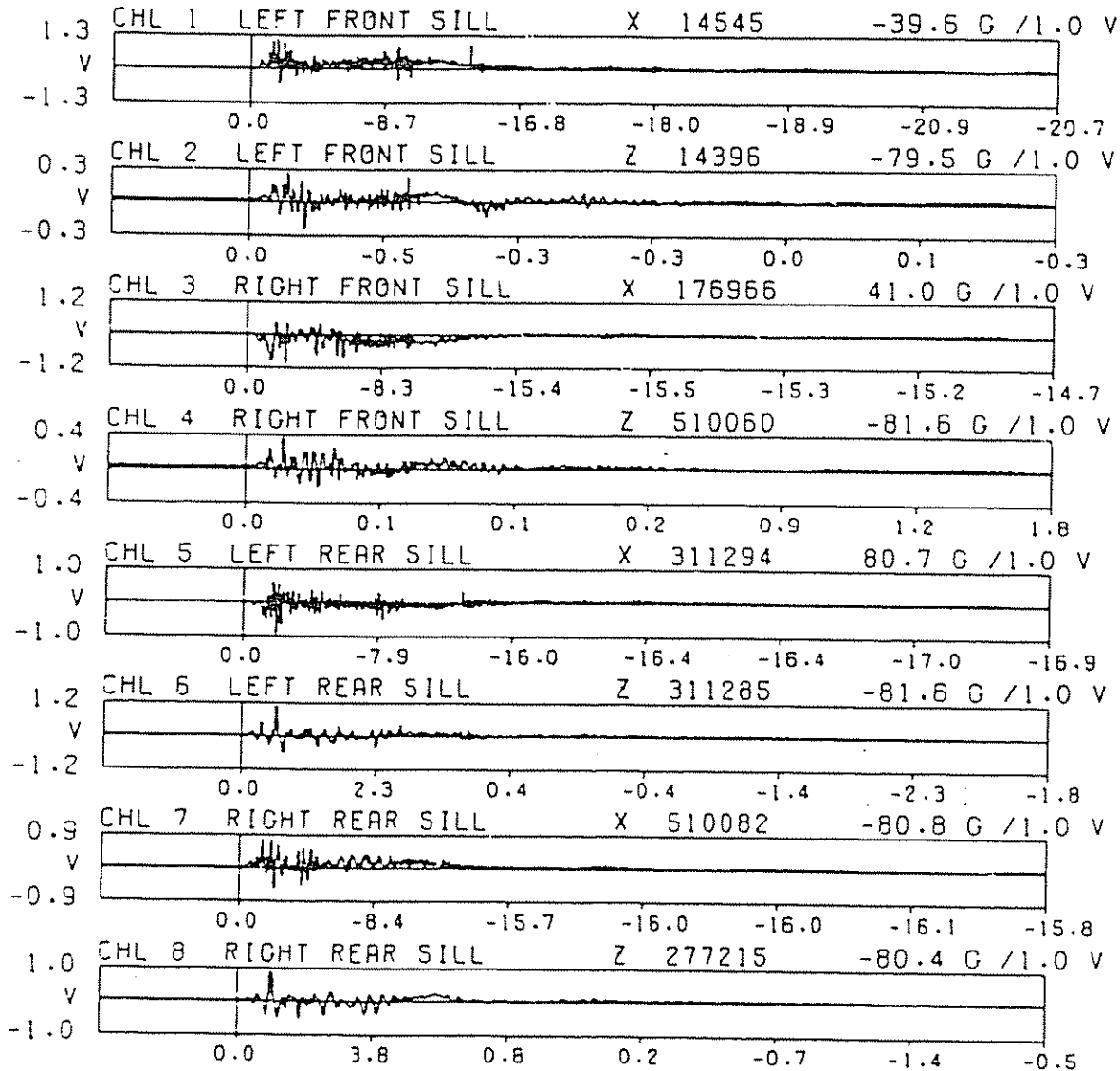
PAGE: 058 RT RAIL MBAR MID X , Chl 35, VD

TRANSDUCER SUMMARY REPORT

VC05927 30 MPH REAR BARRIER, ZJJ74. 5.2L MPI. ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.
 IMPACT ANALYSIS DEPT. 5320
 MAY 10.1996

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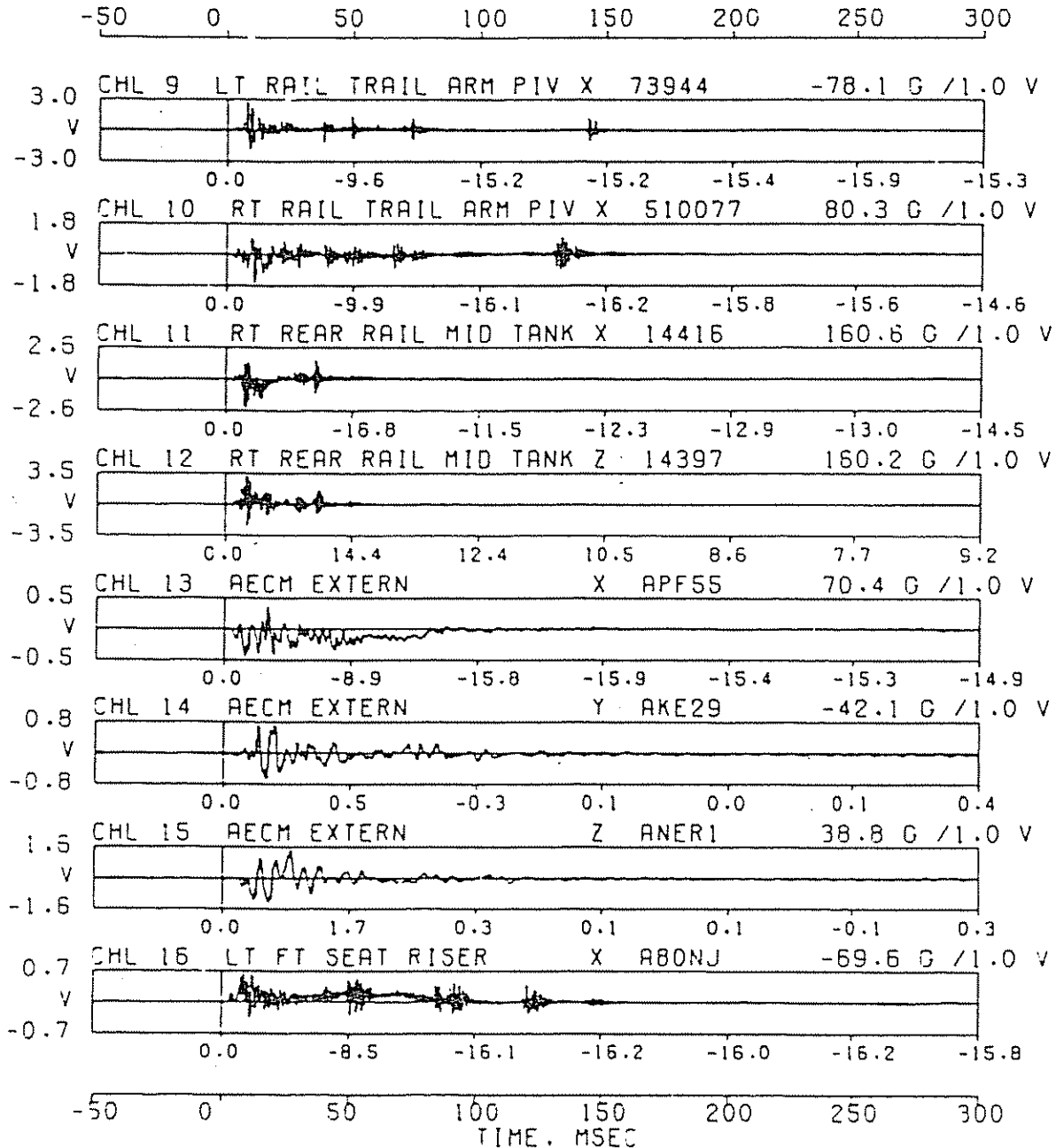
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 TIME. MSEC

NOTE COMPUTED FIRST INTEGRAL VALUES ARE INDICATED BELOW
 EACH CHANNEL AND BRIDGED DATA IS INDICATED BY A -B-.

TRANSDUCER SUMMARY REPORT

VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI, ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.
 IMPACT ANALYSIS DEPT. 5320
 MAY 10, 1996

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 ERRATA 1



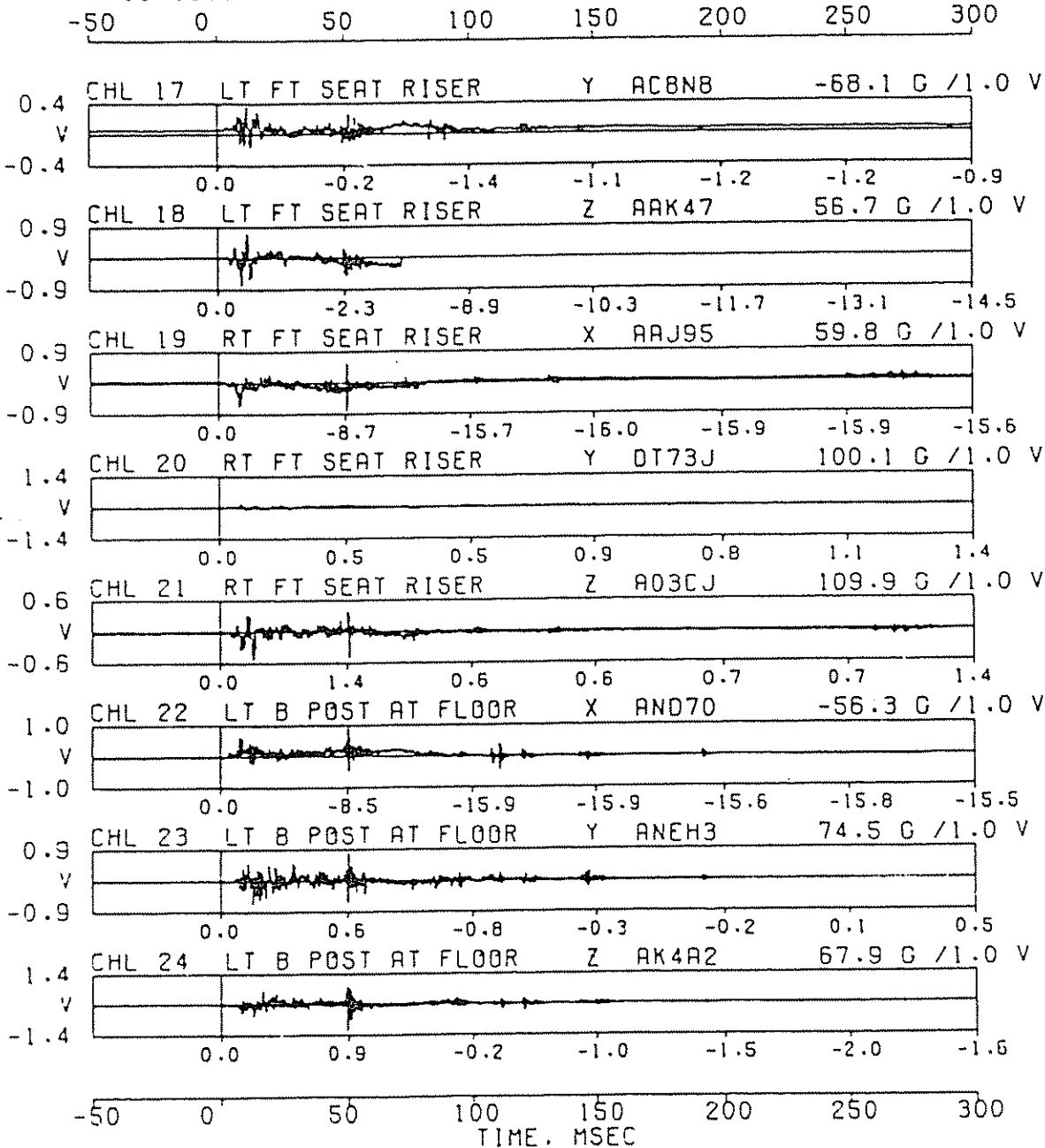
NOTE COMPUTED FIRST INTEGRAL VALUES ARE INDICATED BELOW EACH CHANNEL AND BRIDGED DATA IS INDICATED BY A -B-.

TRANSDUCER SUMMARY REPORT

VC059 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ9243
 1997 MVSS DEVELOPMENT - 301.
 IMPACT ANALYSIS DEPT. 5320
 MAY 10, 1996

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DATA SET 05/09/96BG
 ERRATA 1

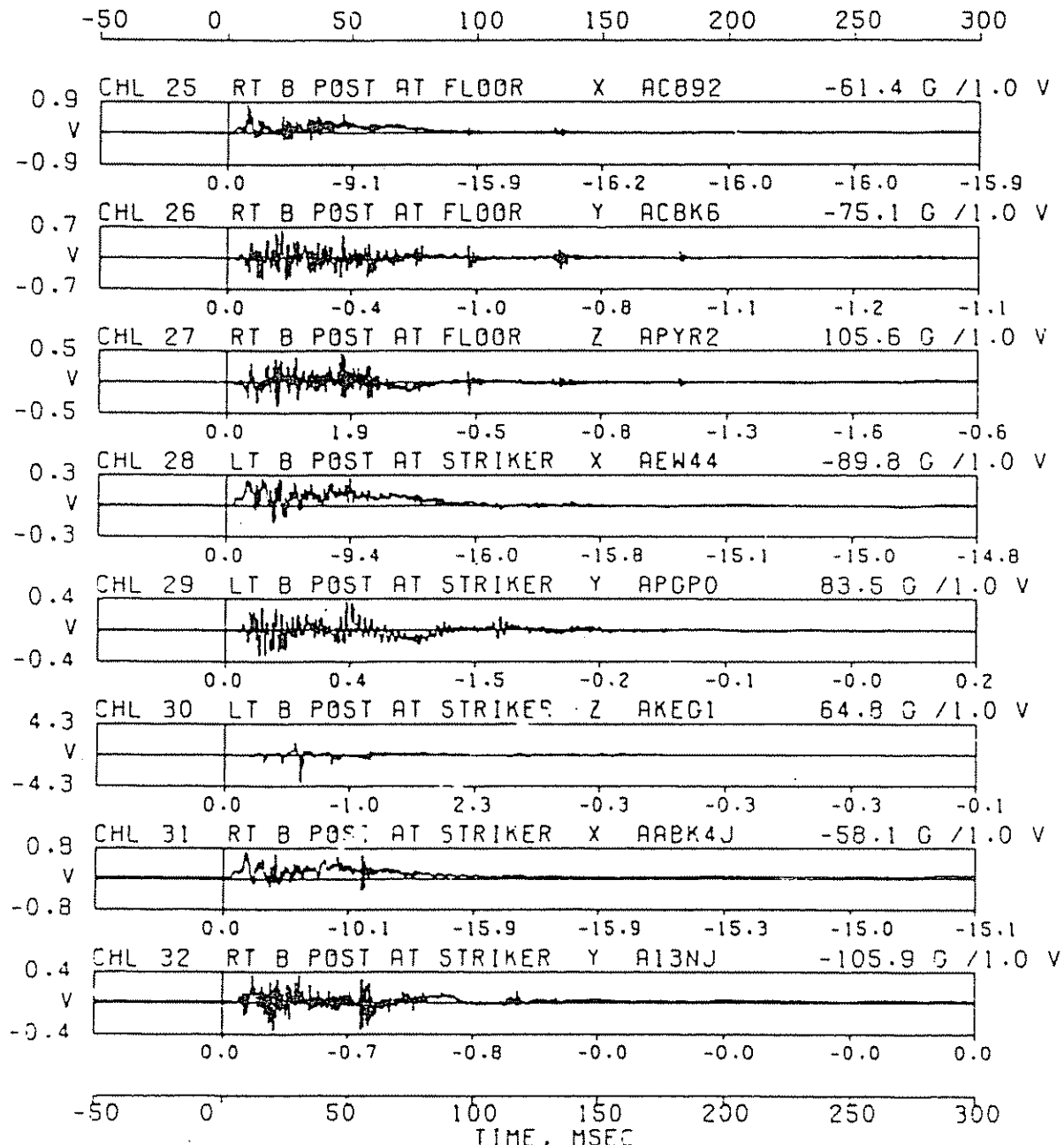


NOTE COMPUTED FIRST INTEGRAL VALUES ARE INDICATED BELOW EACH CHANNEL AND BRIDGED DATA IS INDICATED BY A -B-.

TRANSDUCER SUMMARY REPORT

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.
 IMPACT ANALYSIS DEPT. 5320
 MAY 10, 1996

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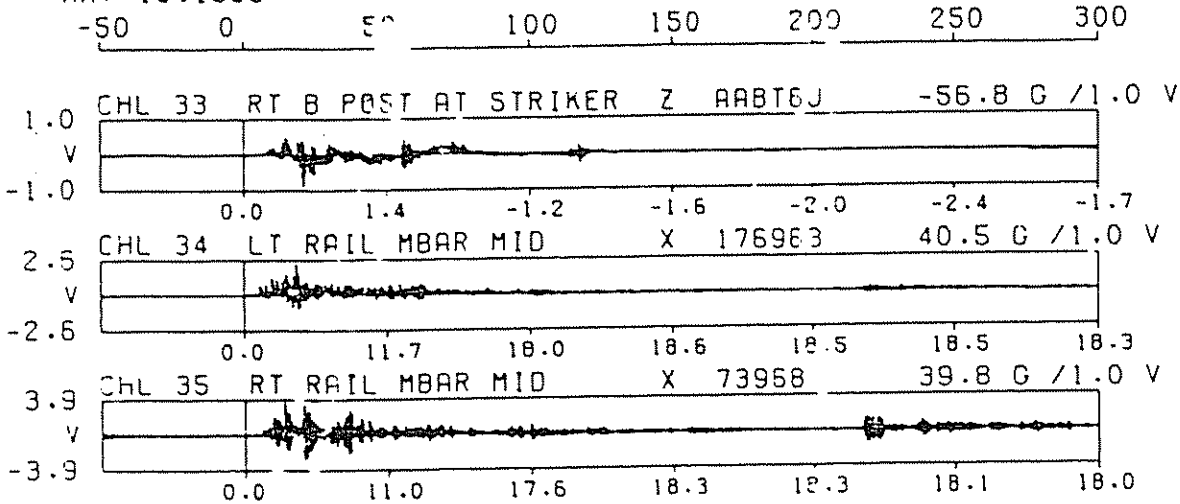


NOTE COMPUTED FIRST INTEGRAL VALUES ARE INDICATED BELOW EACH CHANNEL AND BRIDGED DATA IS INDICATED BY A -B-

TRANSDUCER SUMMARY REPORT

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.
 IMPACT ANALYSIS DEPT. 5320
 MAY 10.1996

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 DATA SET 05/09/96BH
 ERRATA 1



-50 0 50 100 150 200 250 300
 TIME. MSEC

NOTE COMPUTED FIRST INTEGRAL VALUES ARE INDICATED BELOW
 EACH CHANNEL AND BRIDGED DATA IS INDICATED BY A -B-.

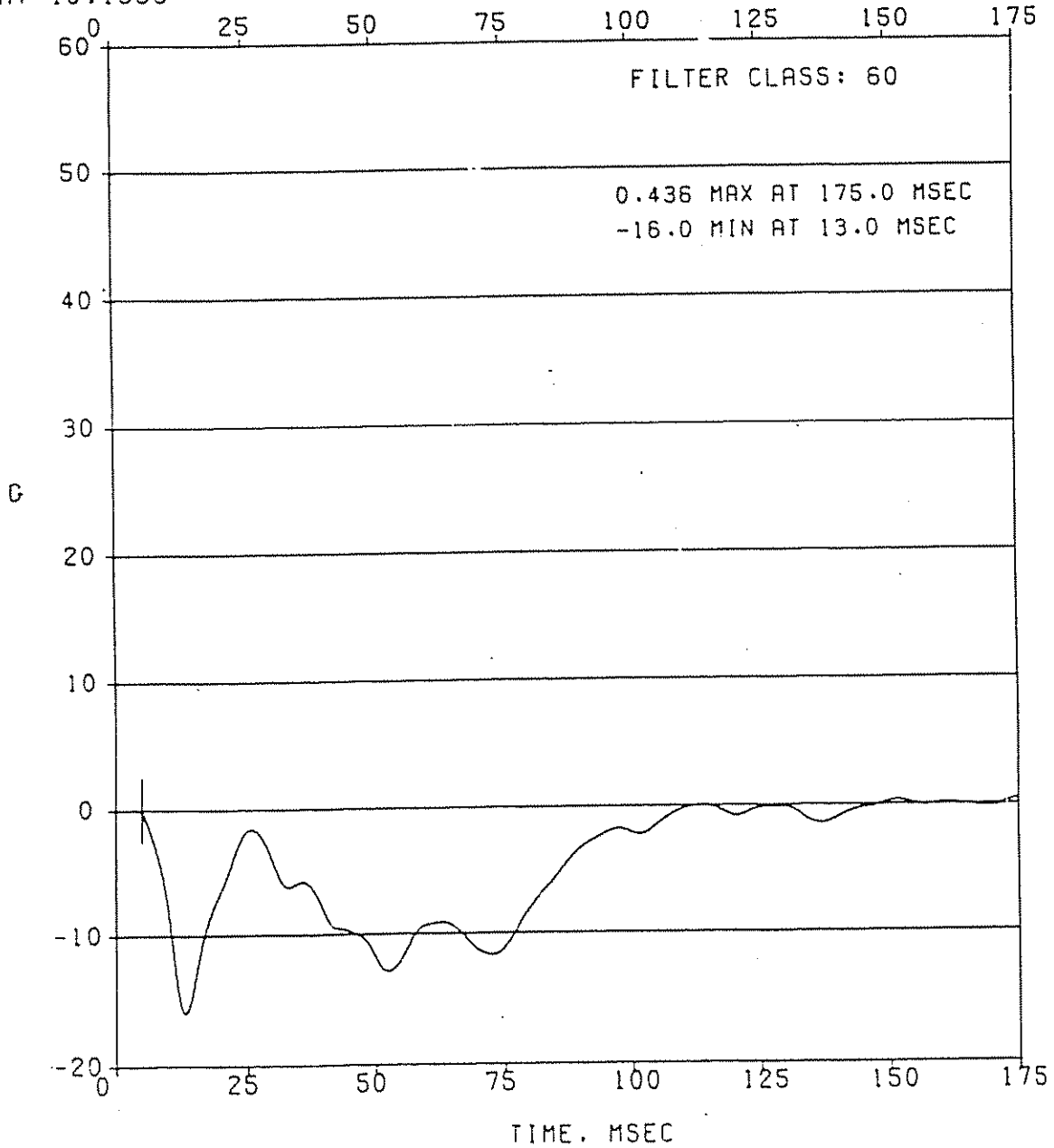
VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
AVERAGE OF

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CHANNEL 001 LEFT FRONT SILL	X	14545
CHANNEL 003 RIGHT FRONT SILL	X	176966
CHANNEL 005 LEFT REAR SILL	X	311294
CHANNEL 007 RIGHT REAR SILL	X	510082

FILTER TYPE: SAE J211B/80 DC C60(TPF-R) EFF 3/24/86
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BF
ERRATA 1



DC 03248

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.

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AVERAGE OF

CHANNEL 005 LEFT REAR SILL X 311294
CHANNEL 007 RIGHT REAR SILL X 510082

FILTER TYPE: SAE J211B/80 DC C60(TPF-R) EFF 3/24/86

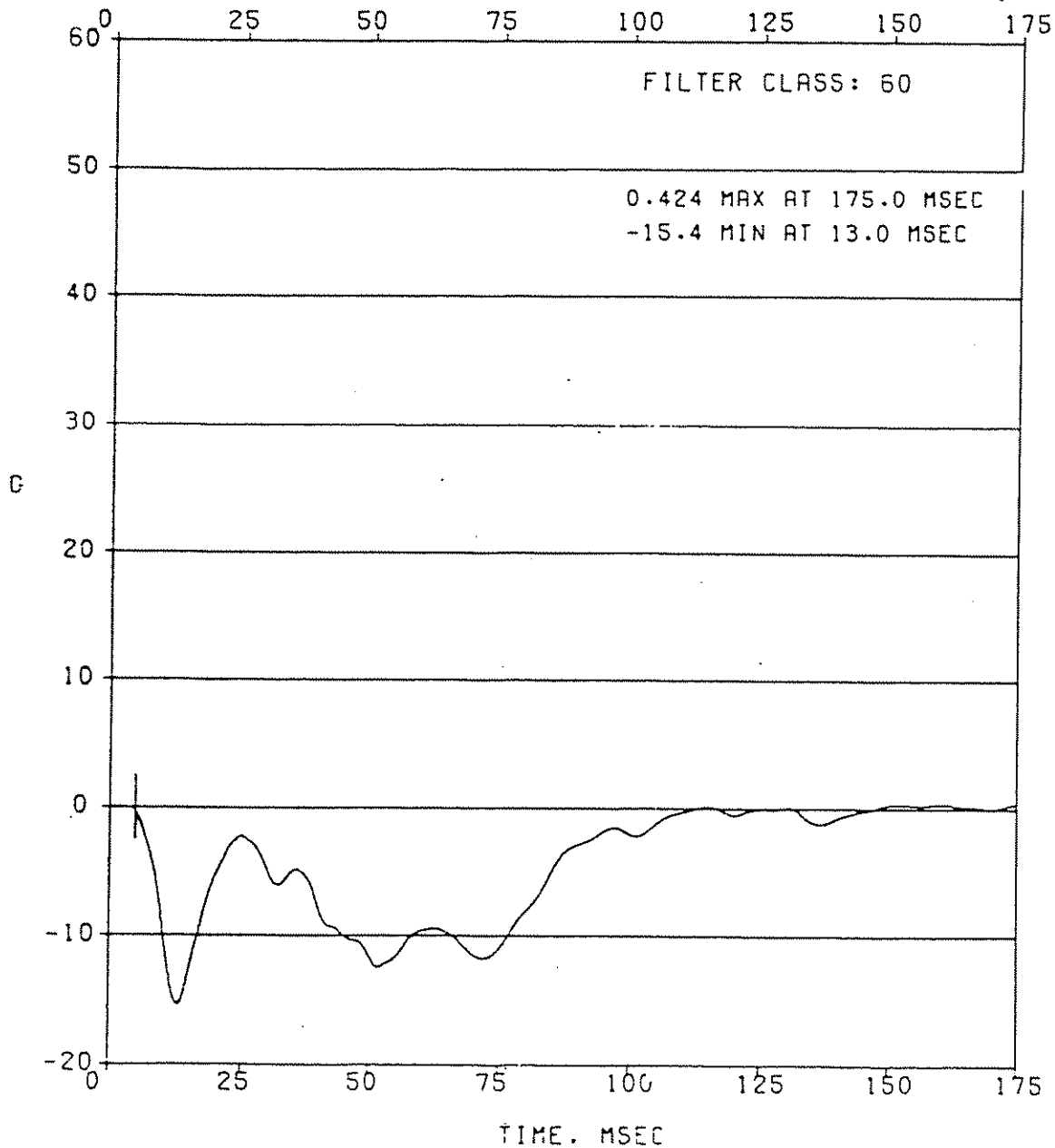
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10.1996

ERRATA

1

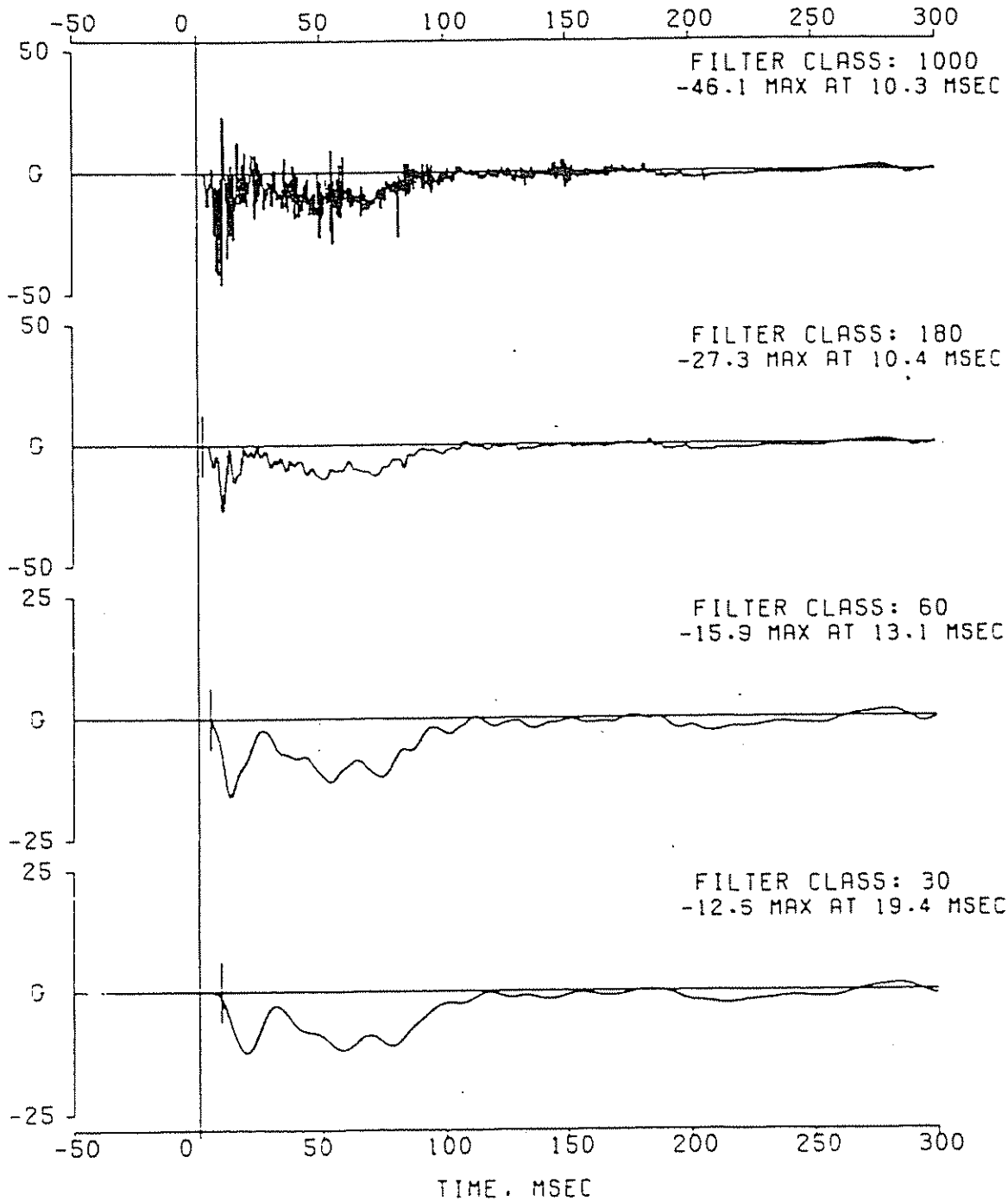


DC 03249

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 001 LEFT FRONT SILL X 14545
FILTER TYPE: 0BDAS-1:1 RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/96BF
ERRATA 1

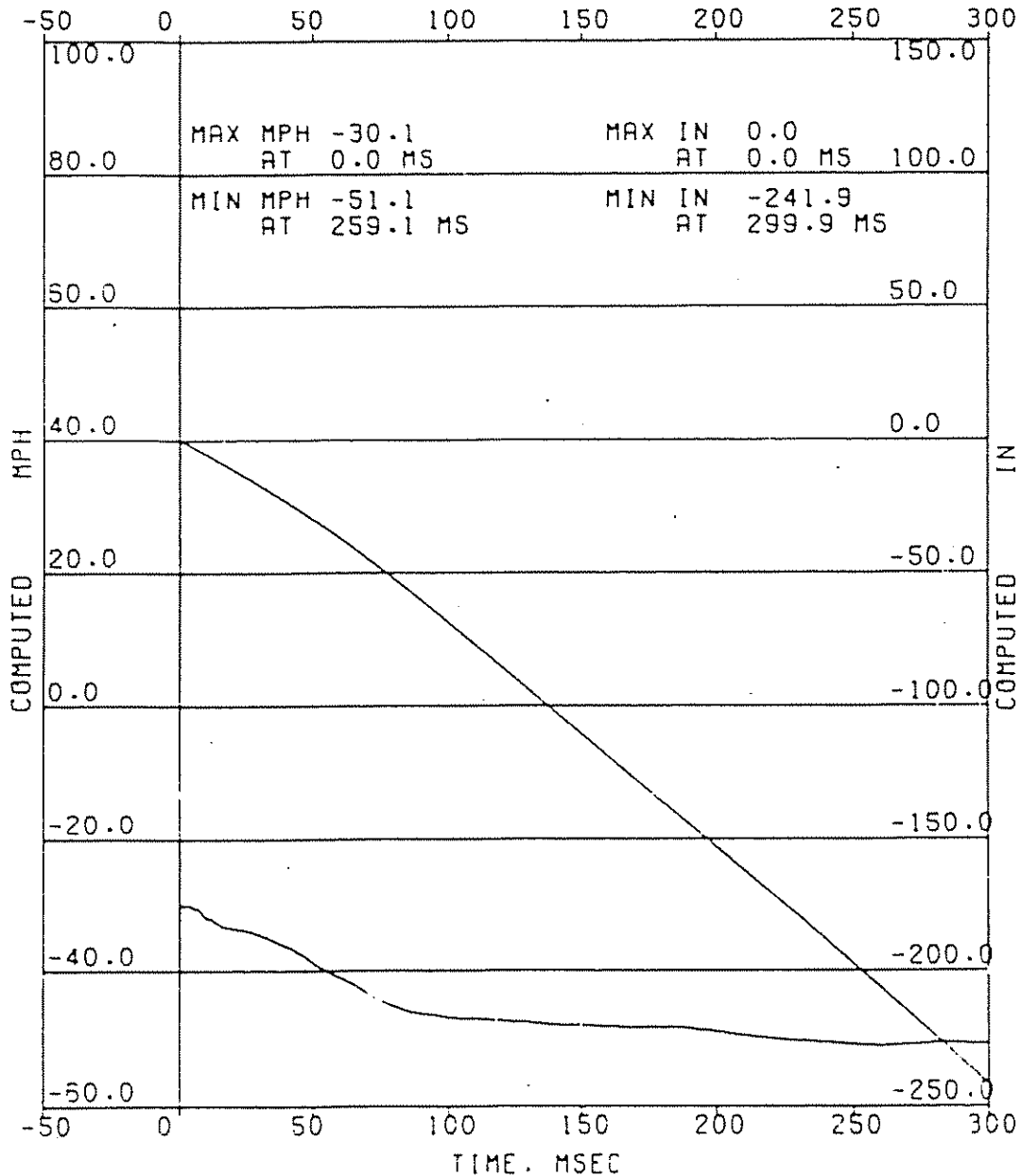


DC 03250

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650);
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

DATA SET 05/09/96BF
ERRATA 1



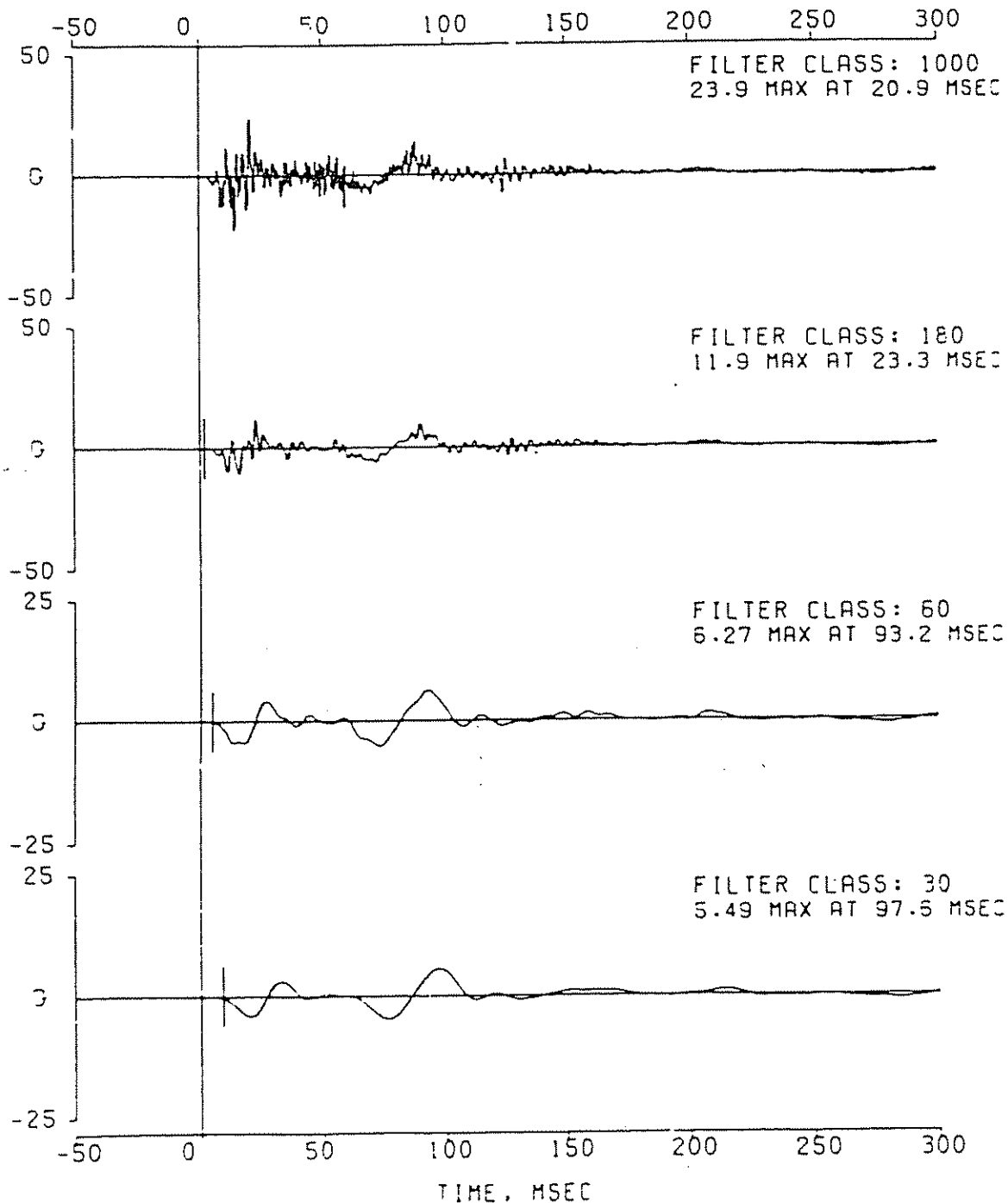
COMPUTED MPH
COMPUTED IN

DC 03251

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ9243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 002 LEFT FRONT SILL Z 14396
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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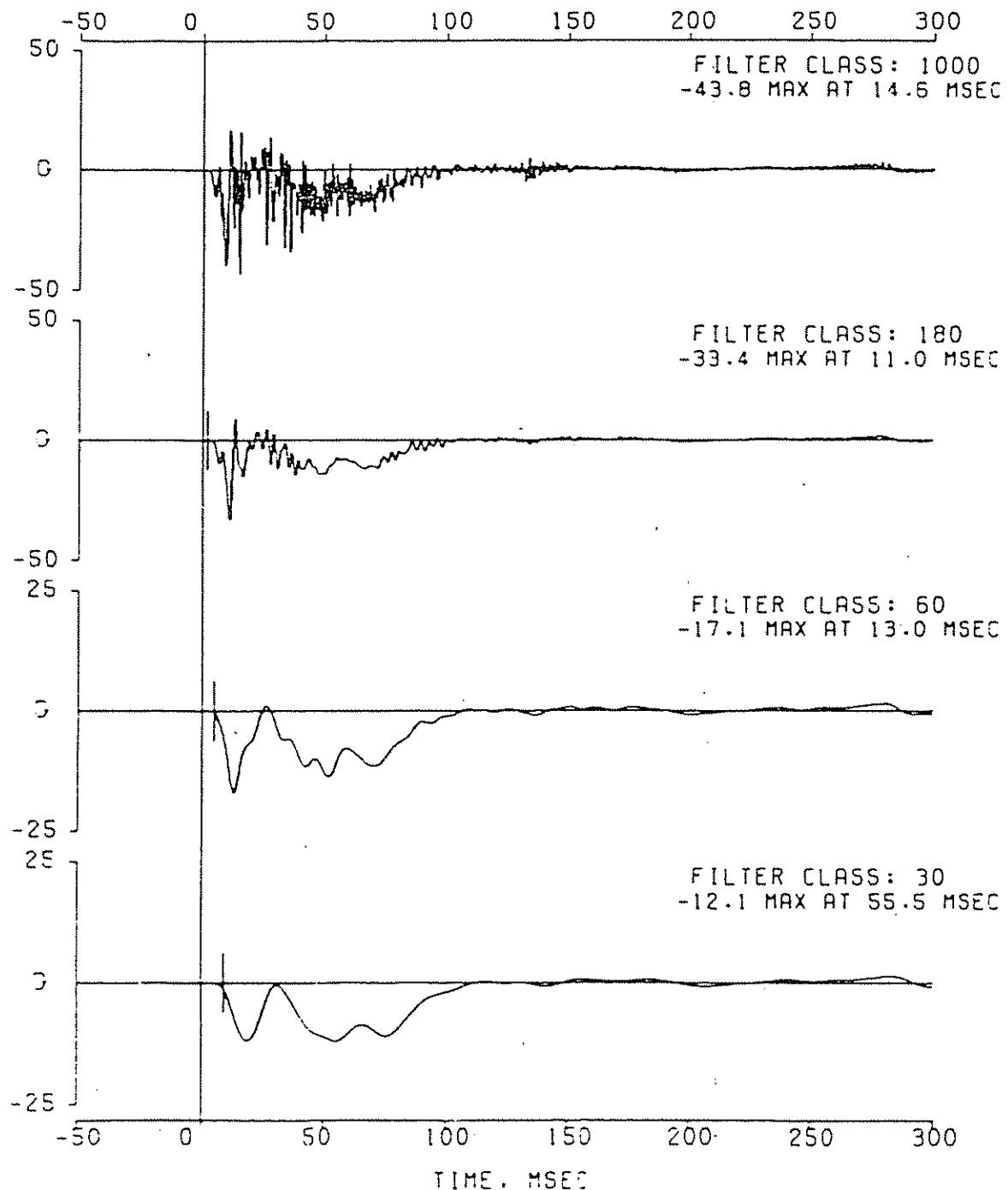
DATA SET 05/09/96BF
ERRATA 1



DC 03252

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 003 RIGHT FRONT SILL X 176966
FILTER TYPE: 08DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

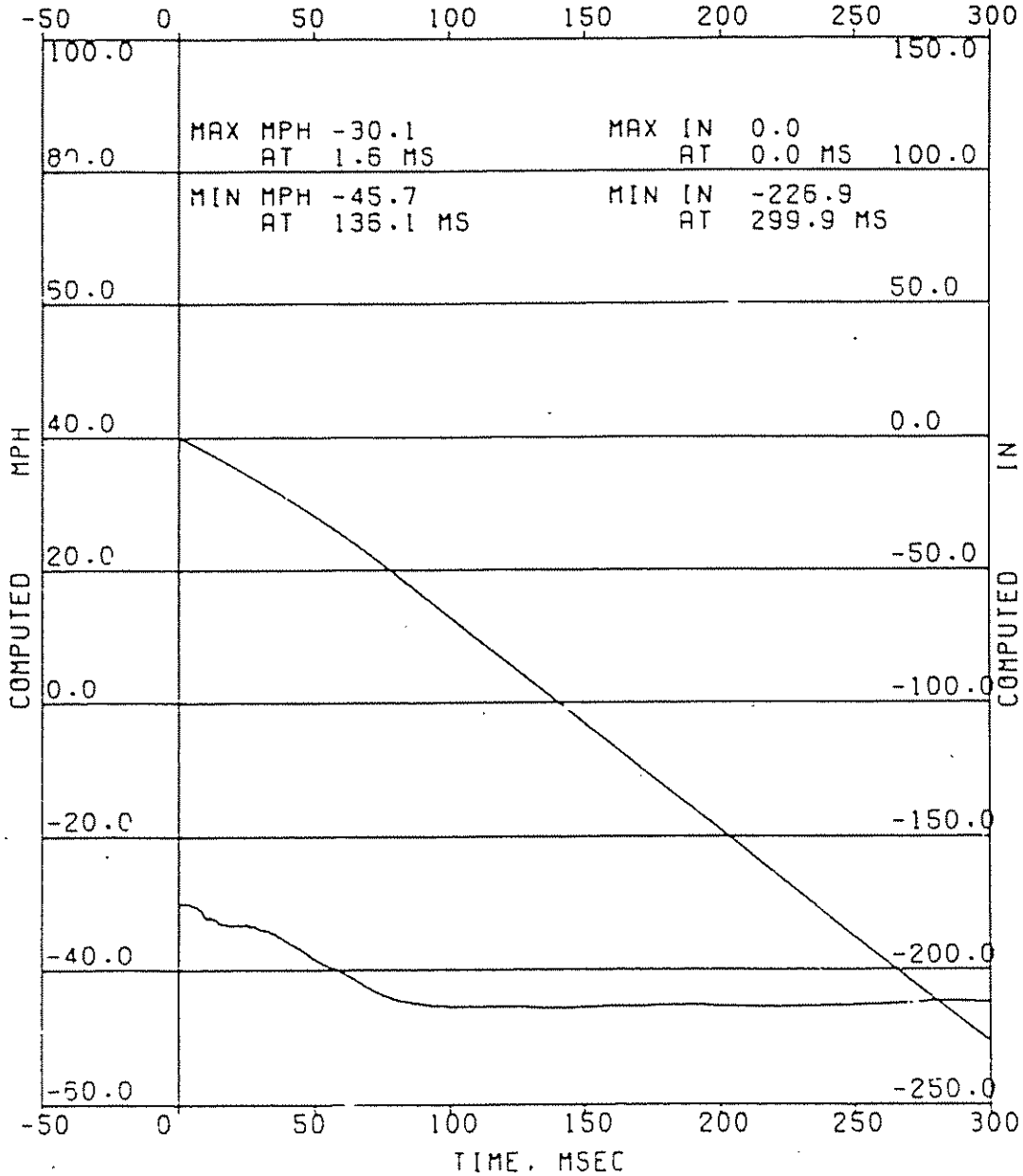
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DATA SET 05/09/96BF
ERRATA 1



FILTER TYPE: 080A5-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
 FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
 MAY 10, 1996

DATA SET 05/09/96BF
 ERRATA 1



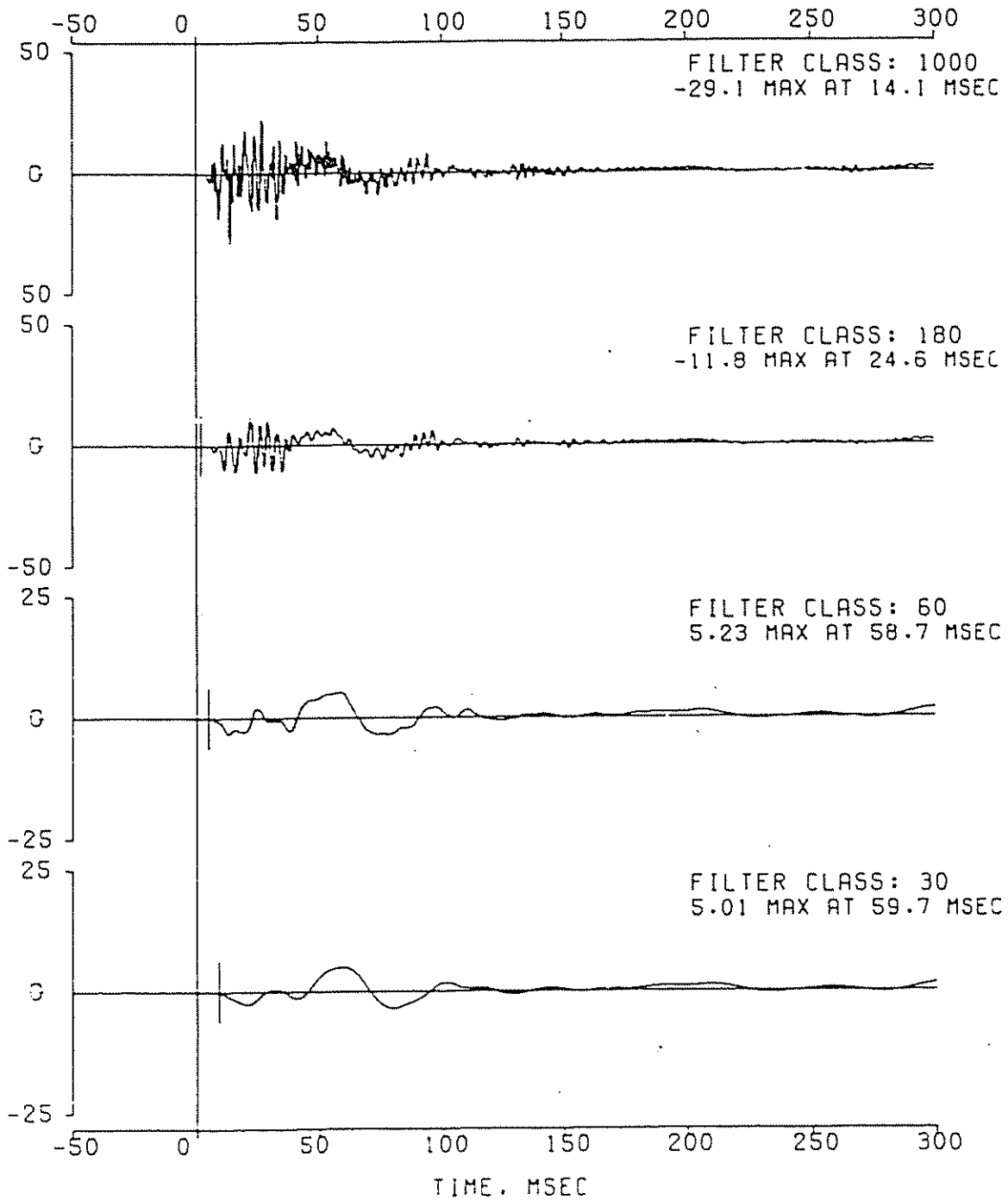
COMPUTED MPH
 COMPUTED IN

DC 03254

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 004 RIGHT FRONT SILL Z 510060
FILTER TYPE: 08DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.199E

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DATA SET 05/09/96BF
ERRATA 1

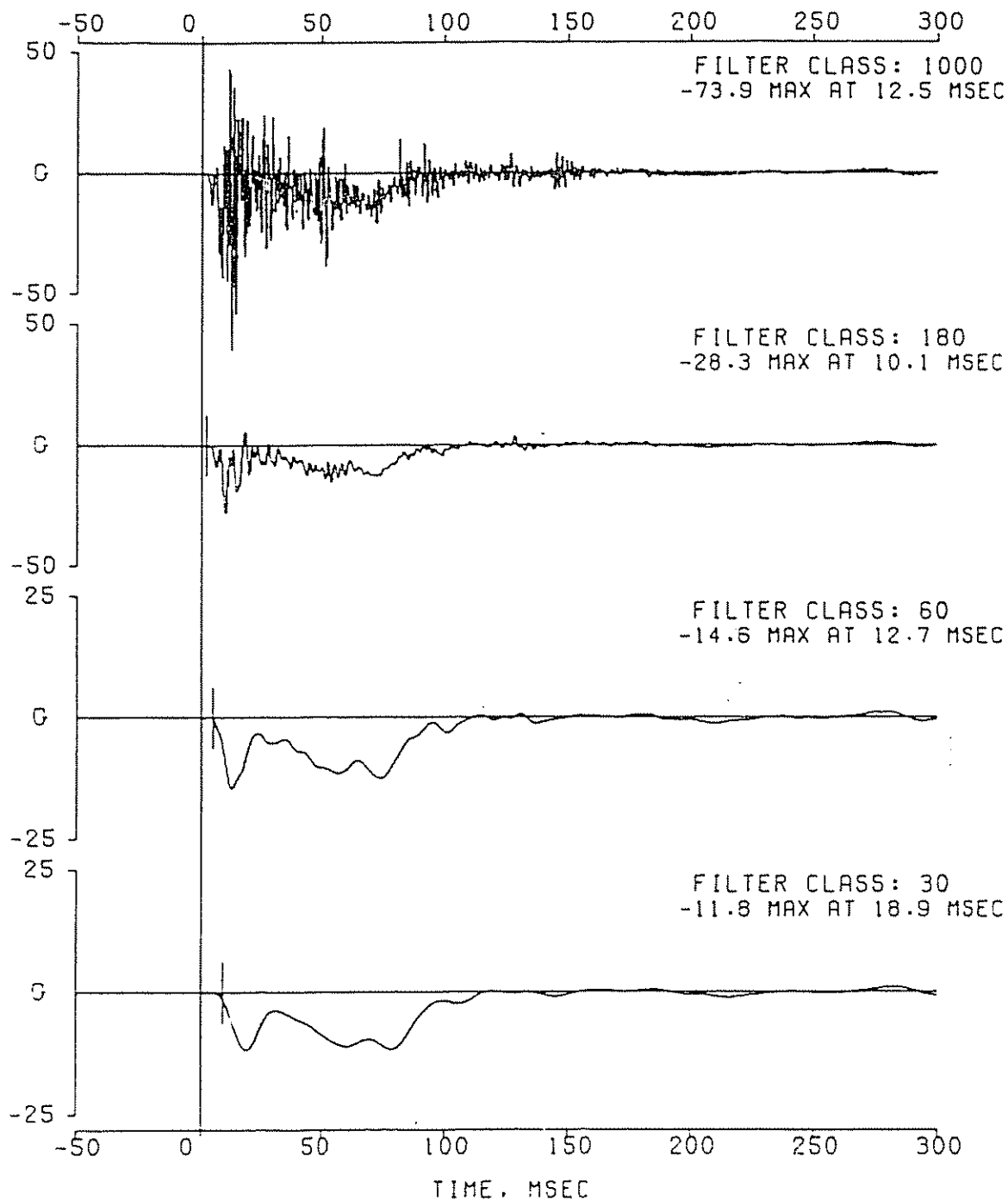


DC 03255

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 005 LEFT REAR SILL X 311294
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/96BF
ERRATA 1

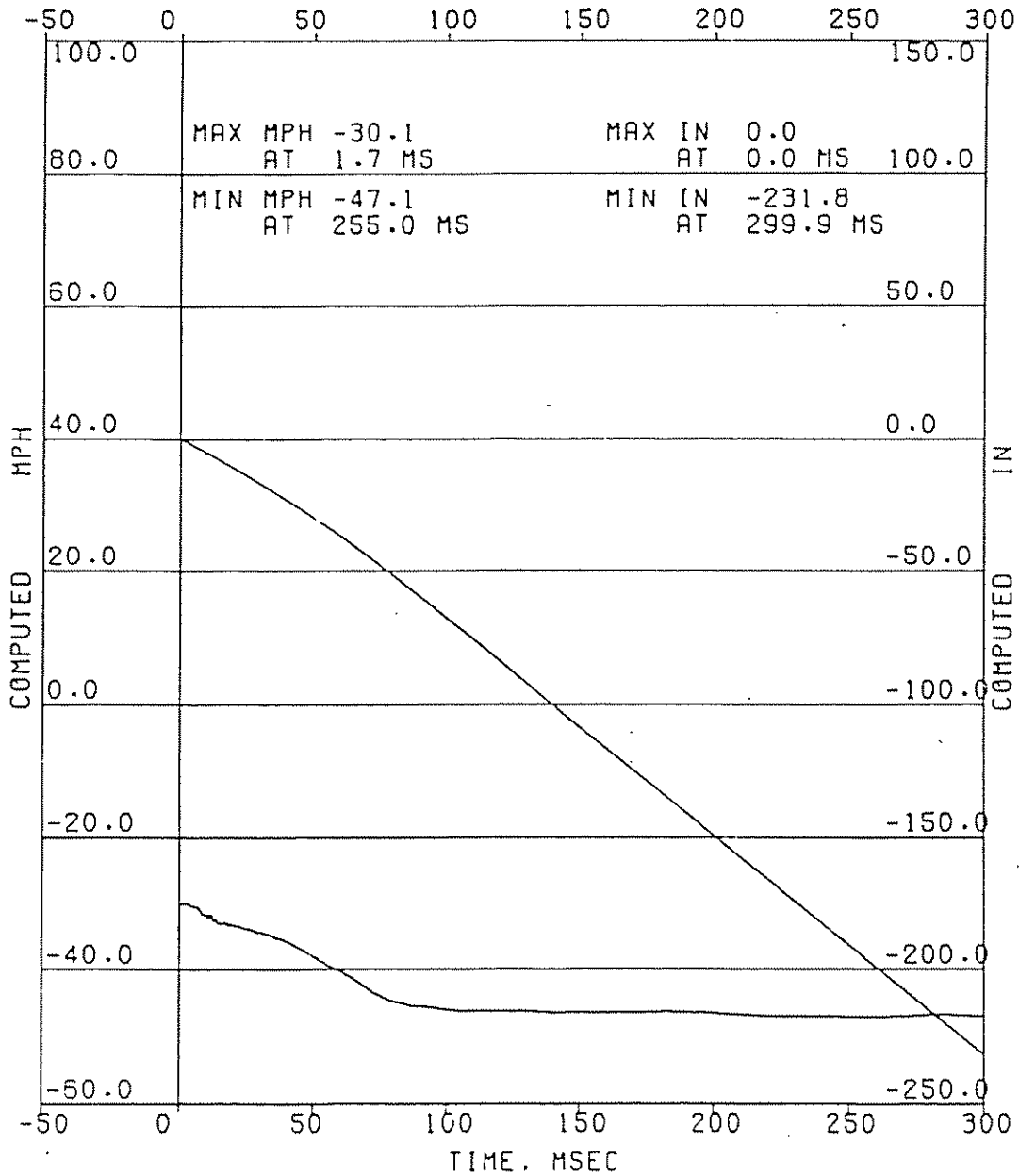


DC 03256

FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

DATA SET 05/09/96BF
ERRATA 1

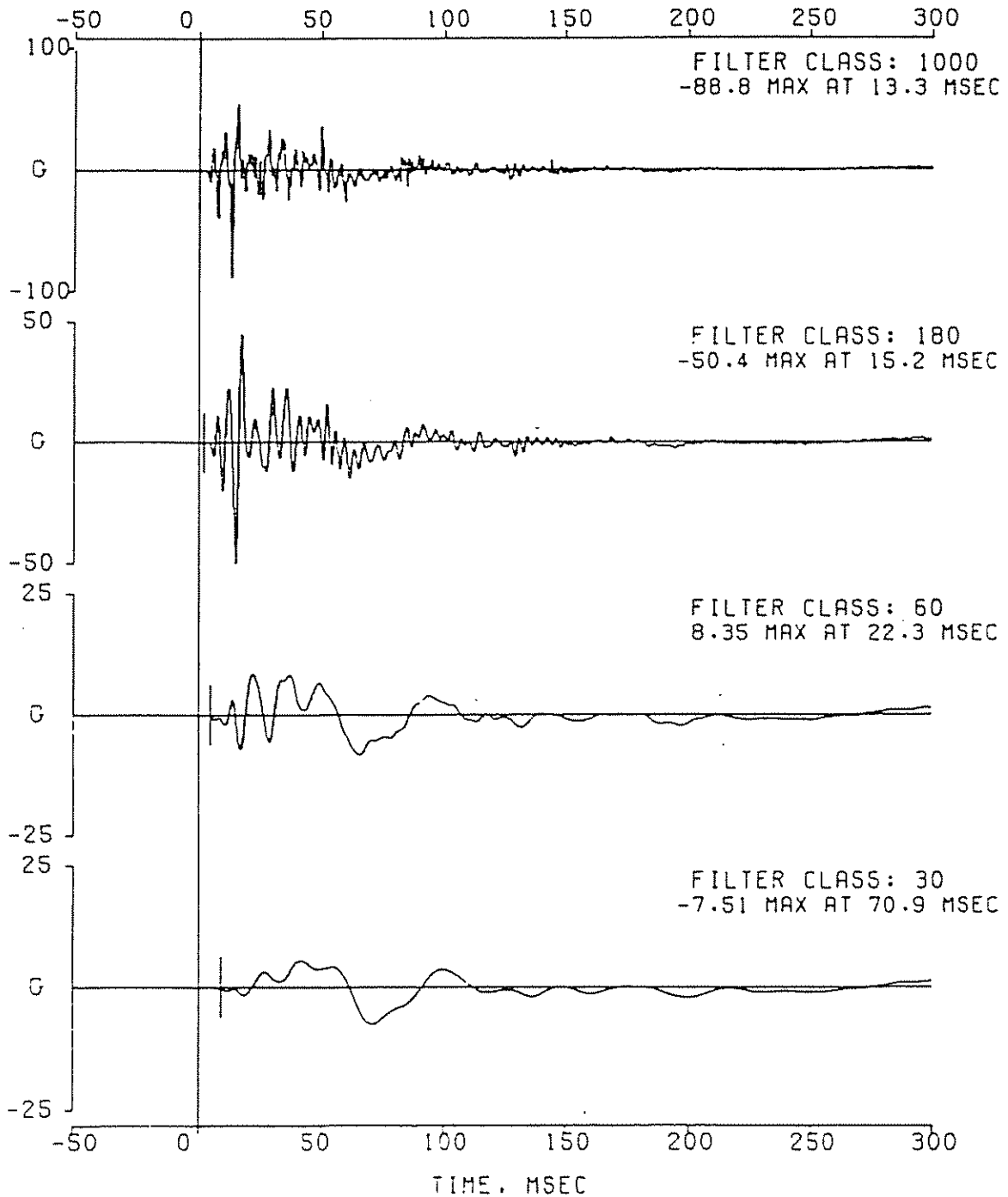


COMPUTED MPH
COMPUTED IN

DC 03257

VC05927 30 MPH REAR BARRIER. ZJJ74. S.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 006 LEFT REAR SILL Z 311285
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

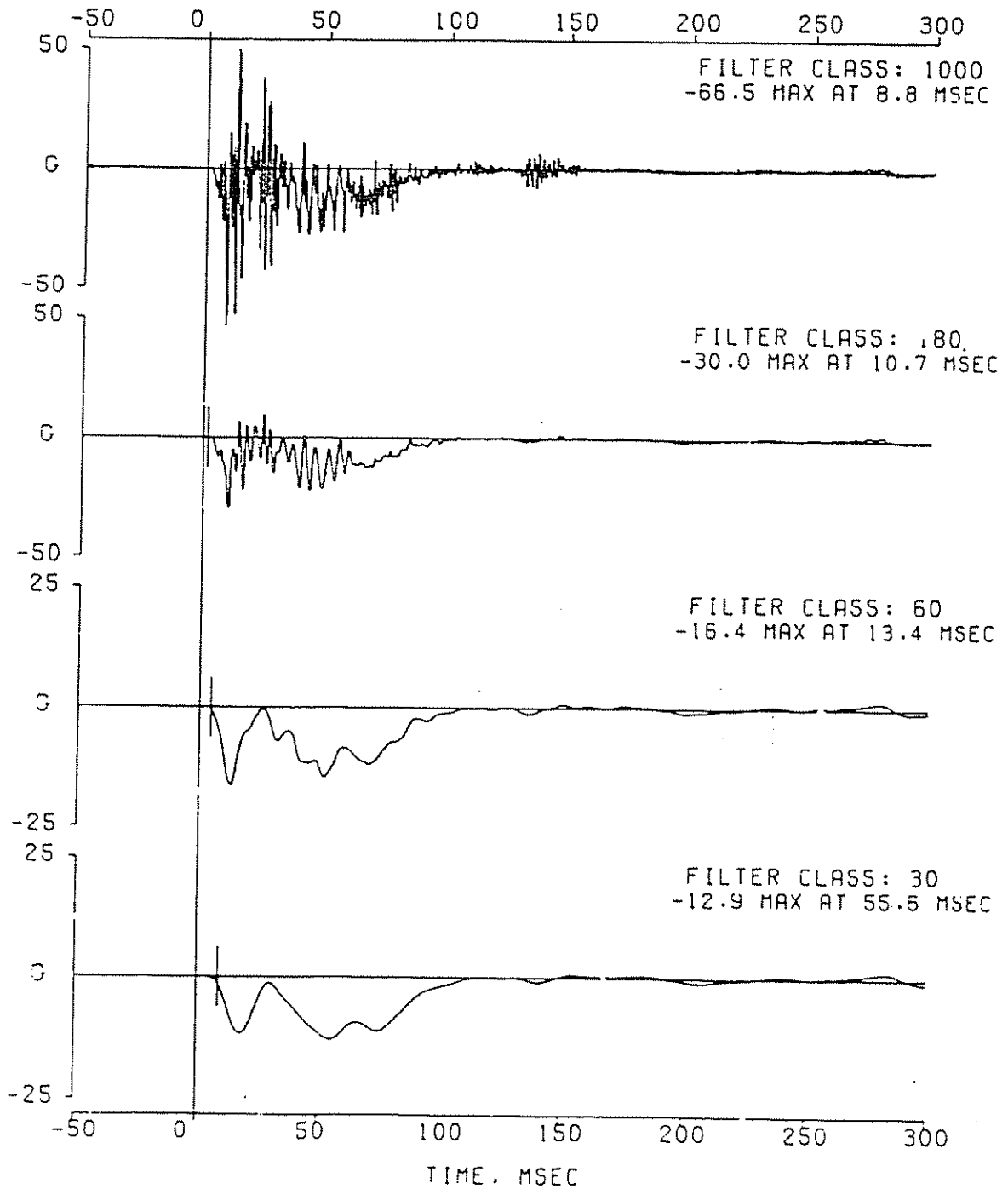
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DATA SET 05/09/96BF
ERRATA 1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM: ZJB243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 007 RIGHT REAR SILL X 510082
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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OF: 058

DATA SET 05/09/96BF
ERRATA 1

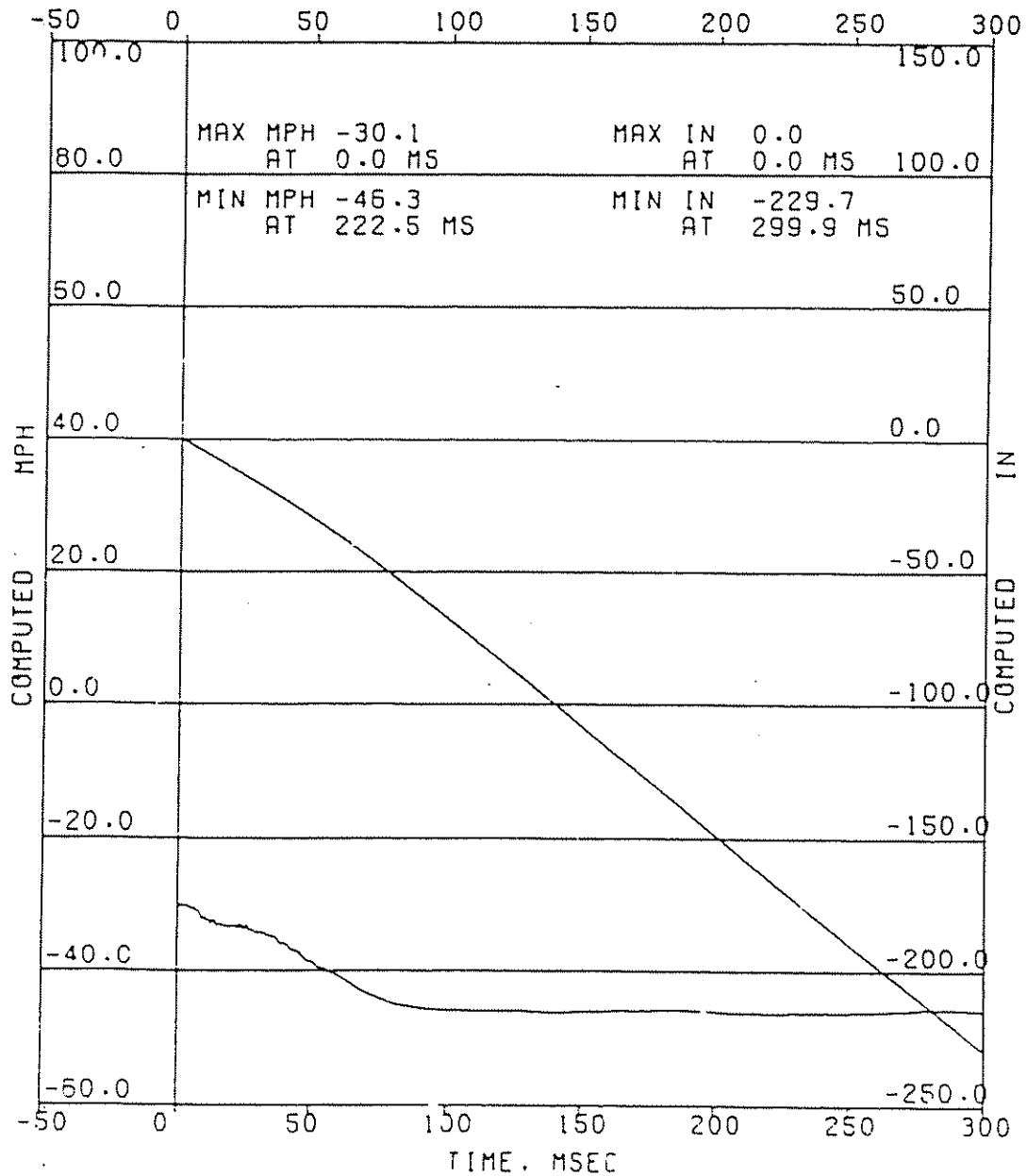


DC 03259

FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

DATA SET 05/09/96BF
ERRATA 1



COMPUTED MPH
COMPUTED IN

VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI, ITEM ZJB243

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1997 MVSS DEVELOPMENT - 301.
CHANNEL 008 RIGHT REAR SILL Z 277215

FILTER TYPE: OBDAS-III RESPONSE CORRECTION, CLASS 1000 FILTER(1650)

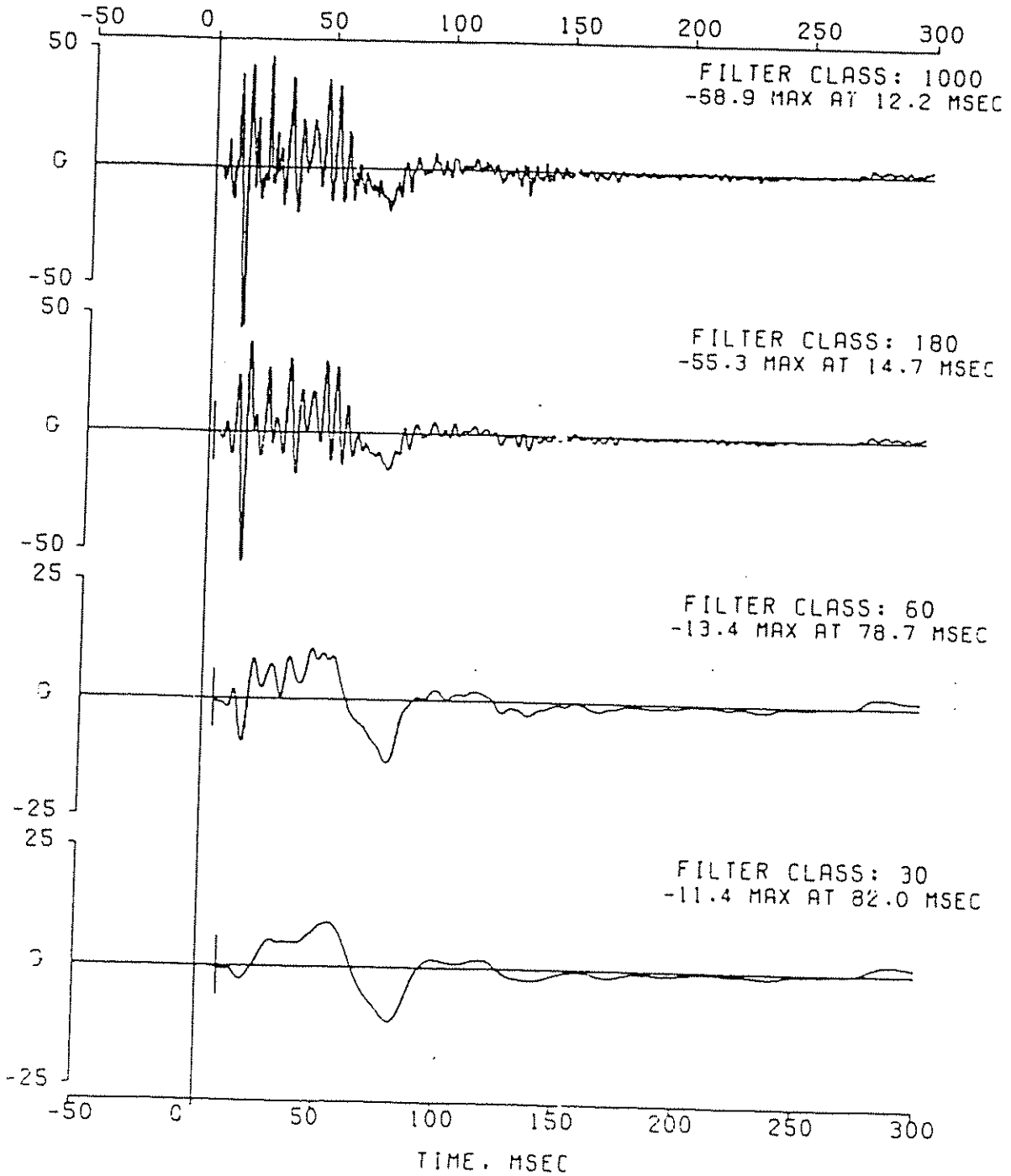
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10, 1996

ERRATA

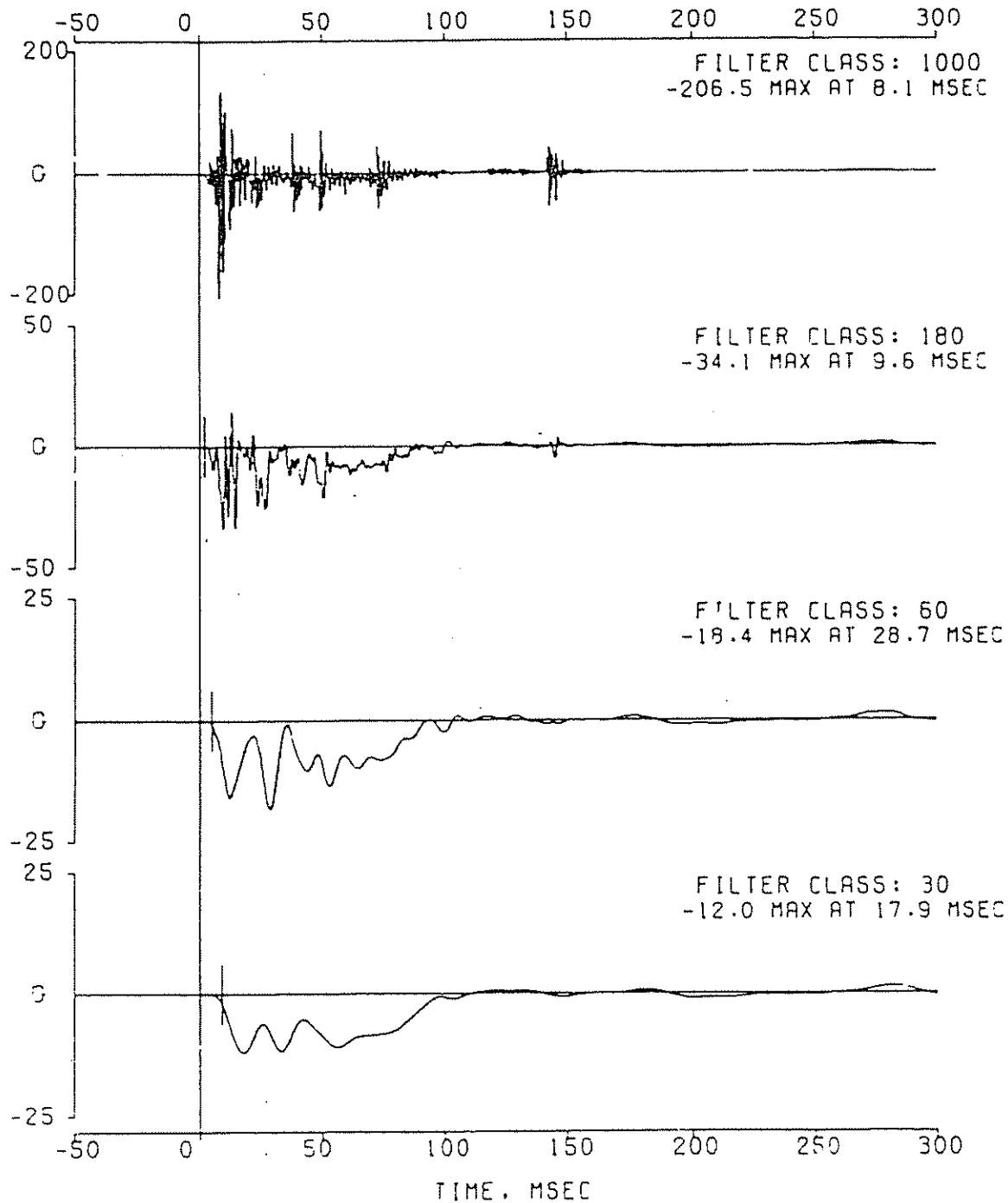
1



VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI, ITEM 7J8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 009 LT RAIL TRAIL ARM PIV X 73944
FILTER TYPE: OBDAS-III RESPONSE CORRECTION, CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

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DATA SET 05/09/96BF
EPI.ATA 1

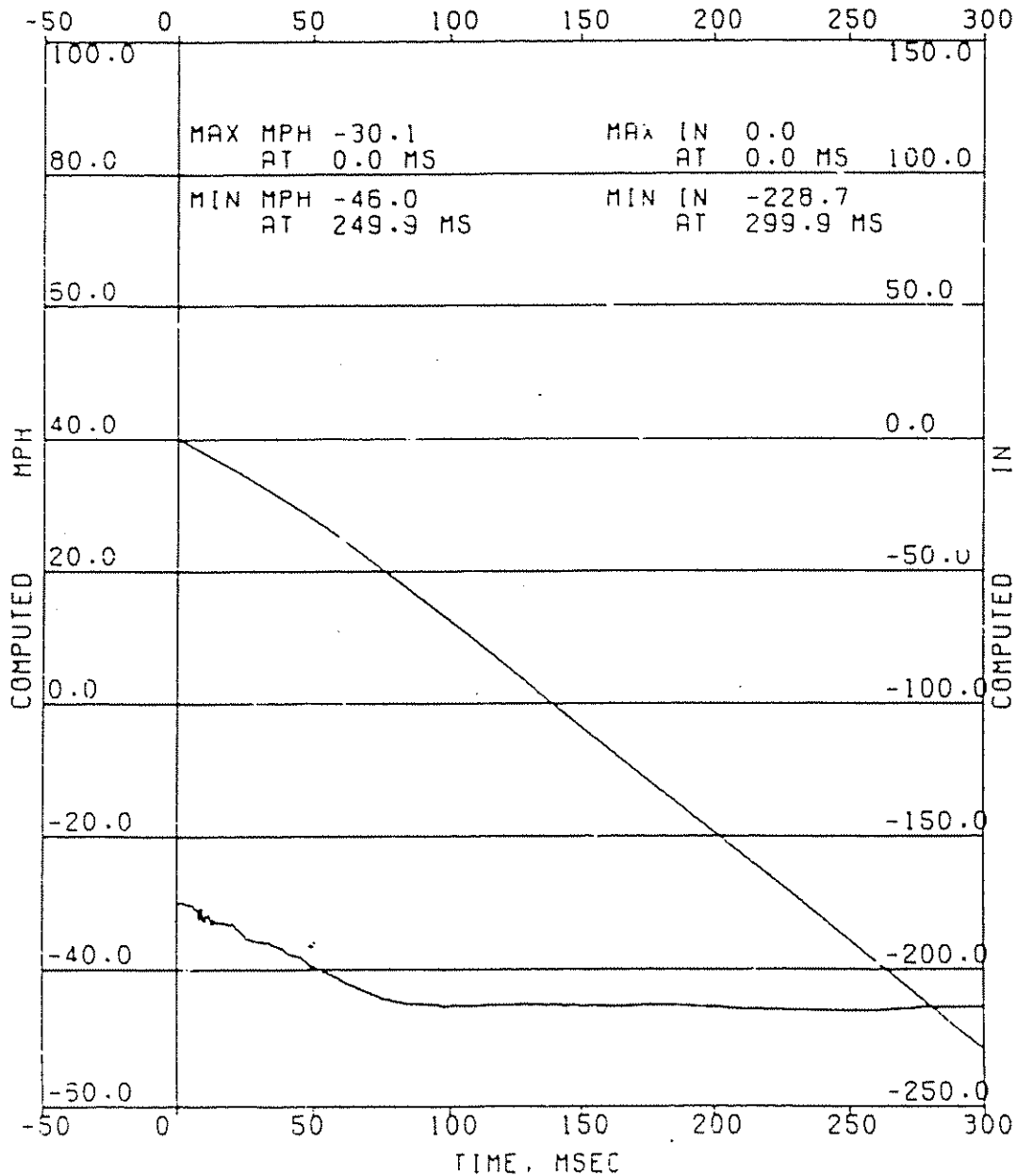


DC 03262

FILTER TYPE: 98DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96RF
ERRATA 1

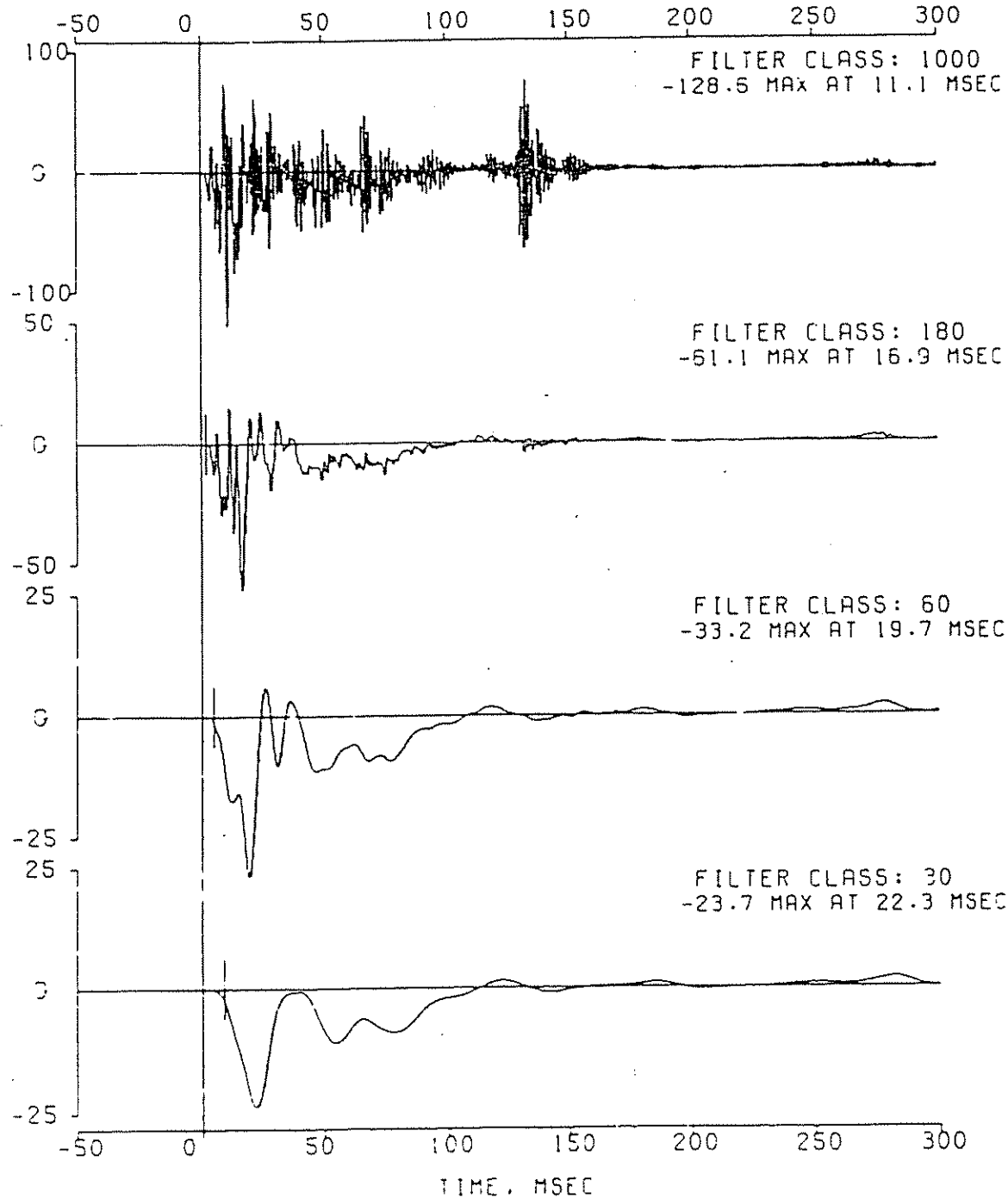


COMPUTED MPH
COMPUTED IN

VC05027 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI, ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 010 RT RAIL TRAIL ARM PIV X 510077
FILTER TYPE: OBDAS-III RESPONSE CORRECTION, CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

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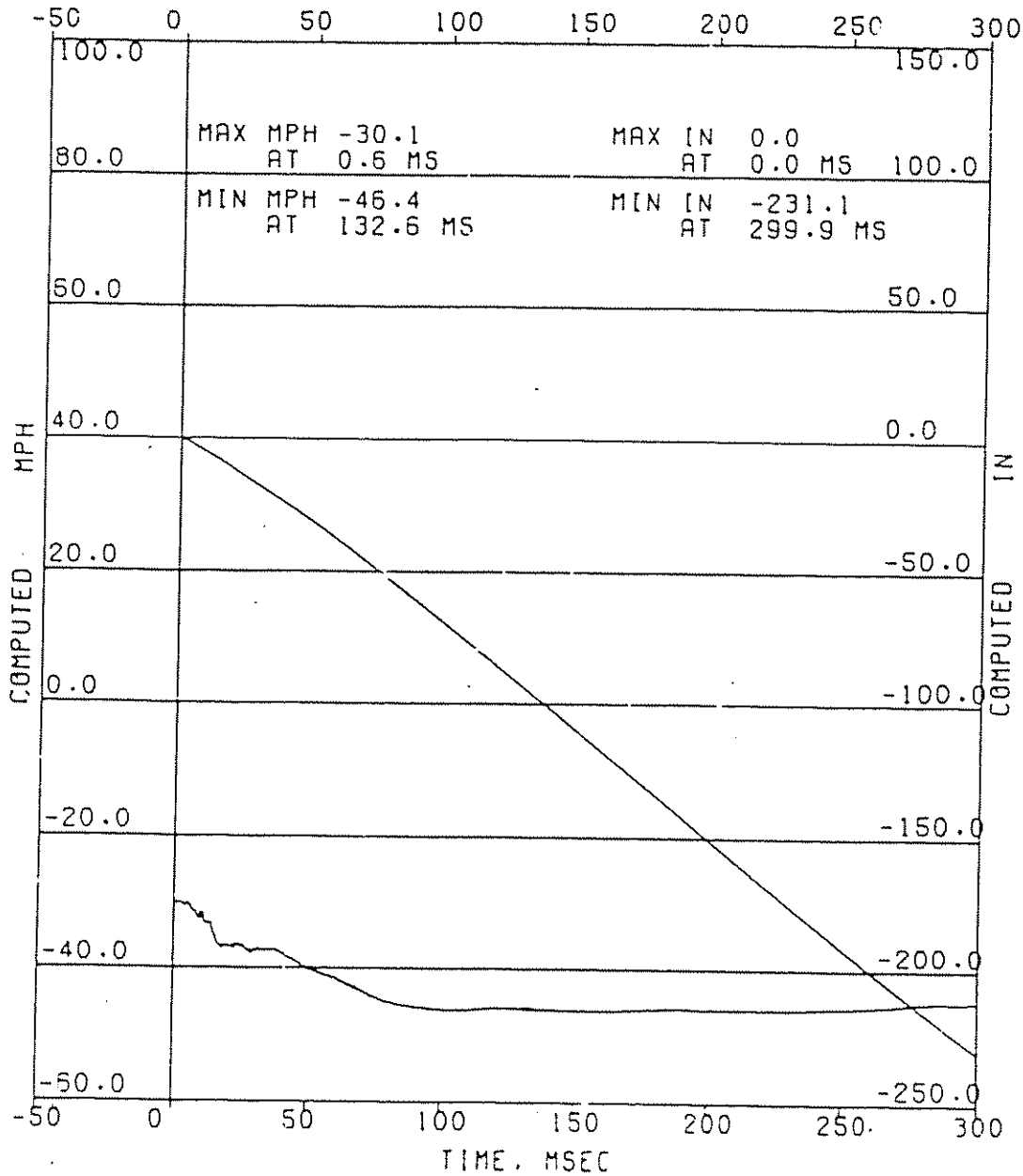
DATA SET 05/09/96BF
ERRATA 1



FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BF
ERRATA 1



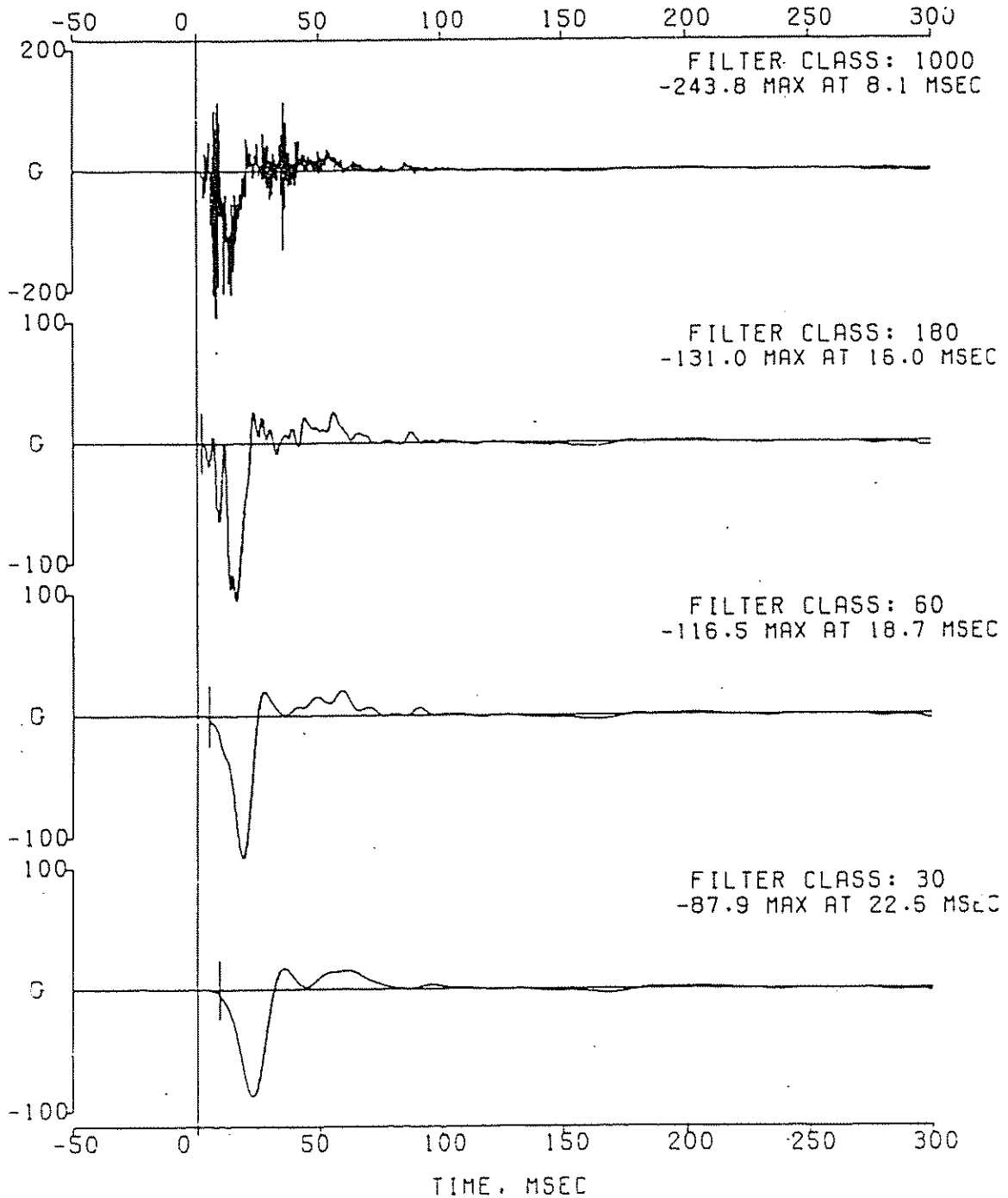
COMPUTED MPH
COMPUTED IN

DC 03265

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJBZ43
1997 MVSS DEVELOPMENT - 301.
CHANNEL 011 RT REAR RAIL MID TANK X :4416
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

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DATA SET 05/09/96BF
ERRATA 1

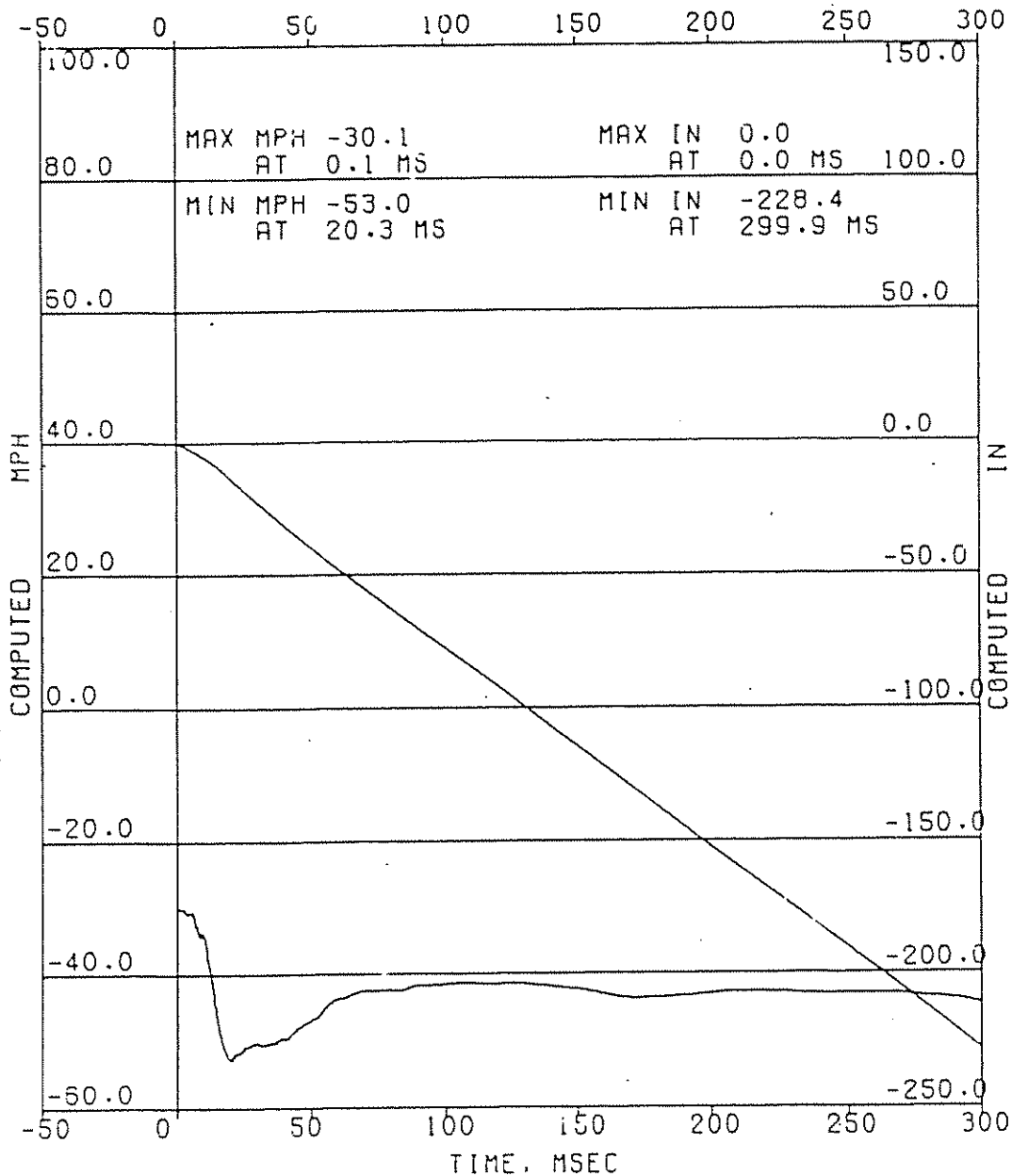


..... CAUTION
..... ORIENTATION CHANGE DURING TEST

FILTER TYPE: 080AS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
 FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
 MAY 10.1996

DATA SET 05/09/96BF
 ERRATA 1



..... CAUTION
 ORIENTATION CHANGE DURING TEST

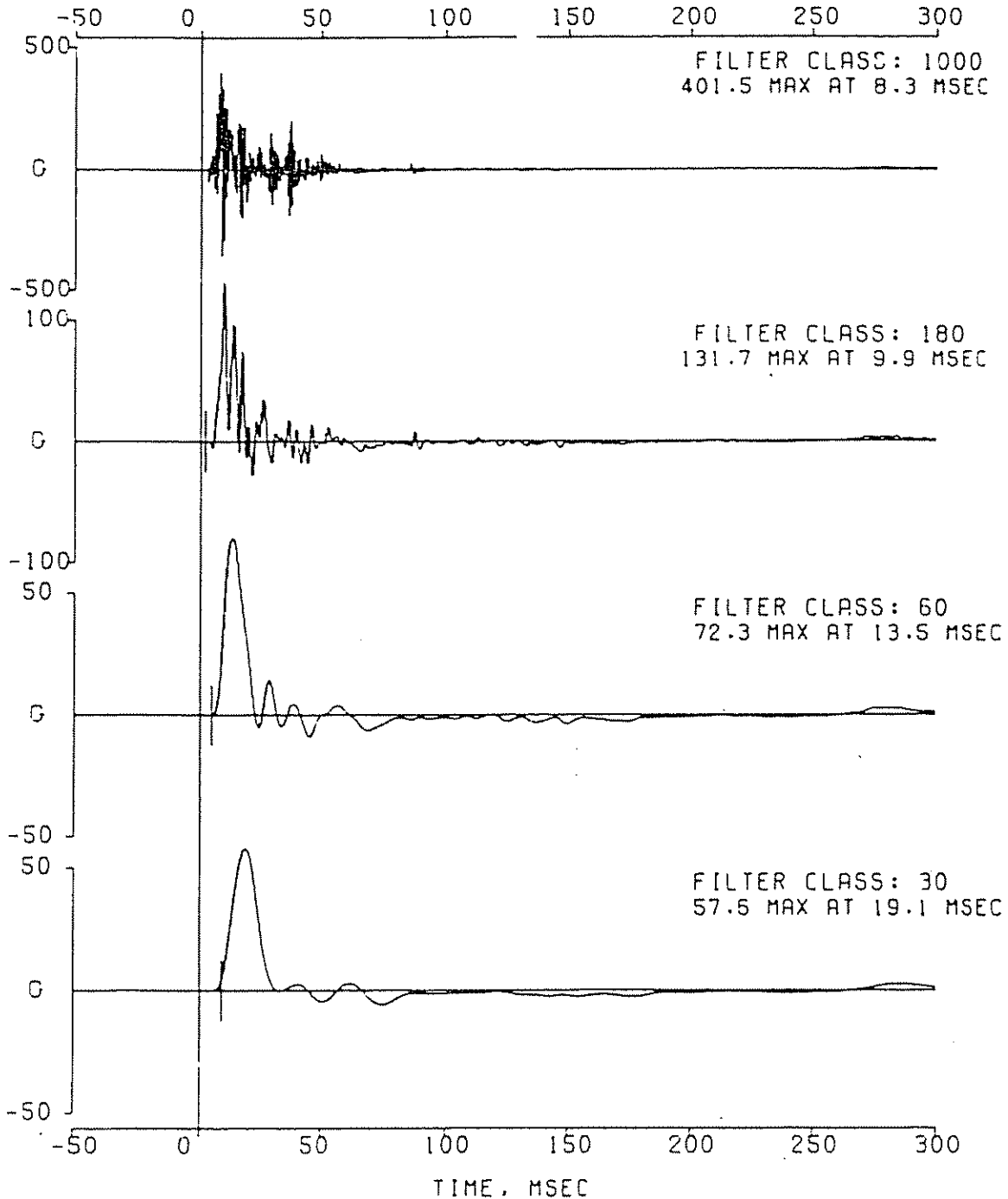
COMPUTED MPH
 COMPUTED IN

DC 03267

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 012 RT REAR RAIL MID TANK Z 14397
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/968F
ERRATA 1



***** CAUTION *****
***** ORIENTATION CHANGE DURING TEST *****

DC 03268

VC05927 30 MPH REAR BARRIER. ZJJ74. -5.2L MPI. ITEM ZJ8243

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1997 MVSS DEVELOPMENT - 301.

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CHANNEL 013 AECM EXTERN

X APF55

FILTER TYPE: 080AS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

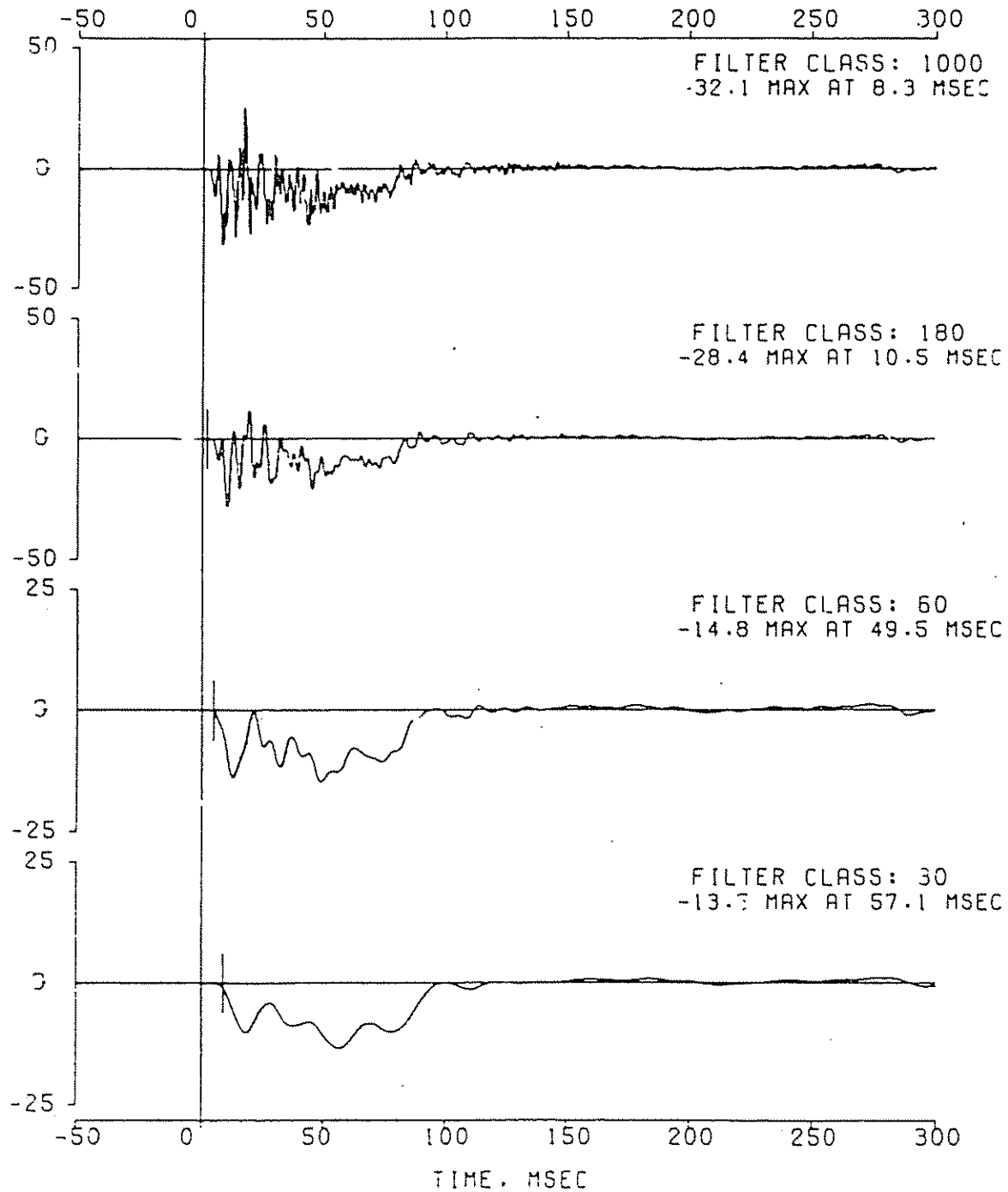
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10.1996

ERRATA

!

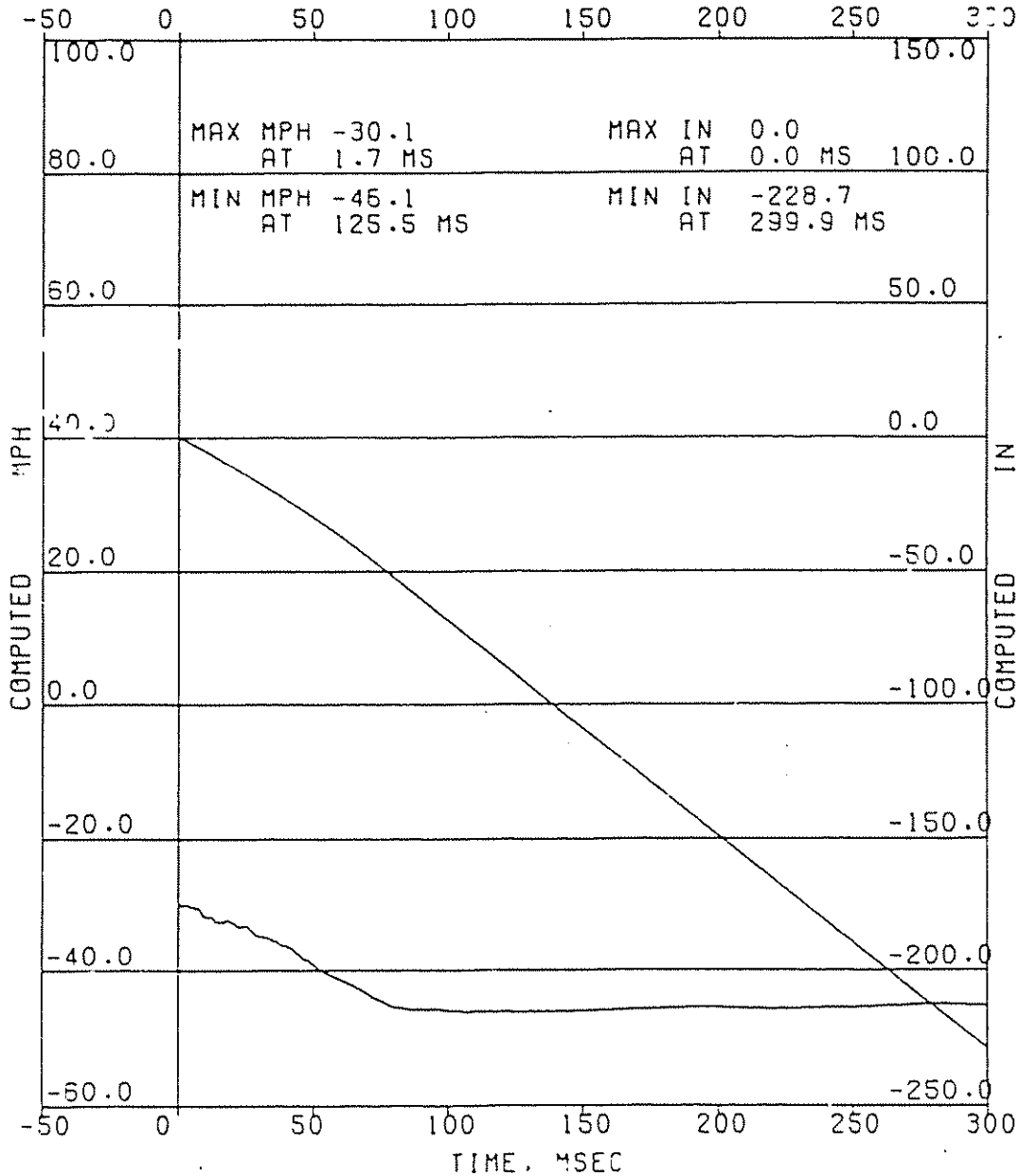


DC 03269

FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

DATA SET 05/09/96BF
ERRATA 1



COMPUTED MPH
COMPUTED IN

DC 03270

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243

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1997 MVSS DEVELOPMENT - 301.

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CHANNEL 014 AECM EXTERN

Y AKE29

FILTER TYPE: 08DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

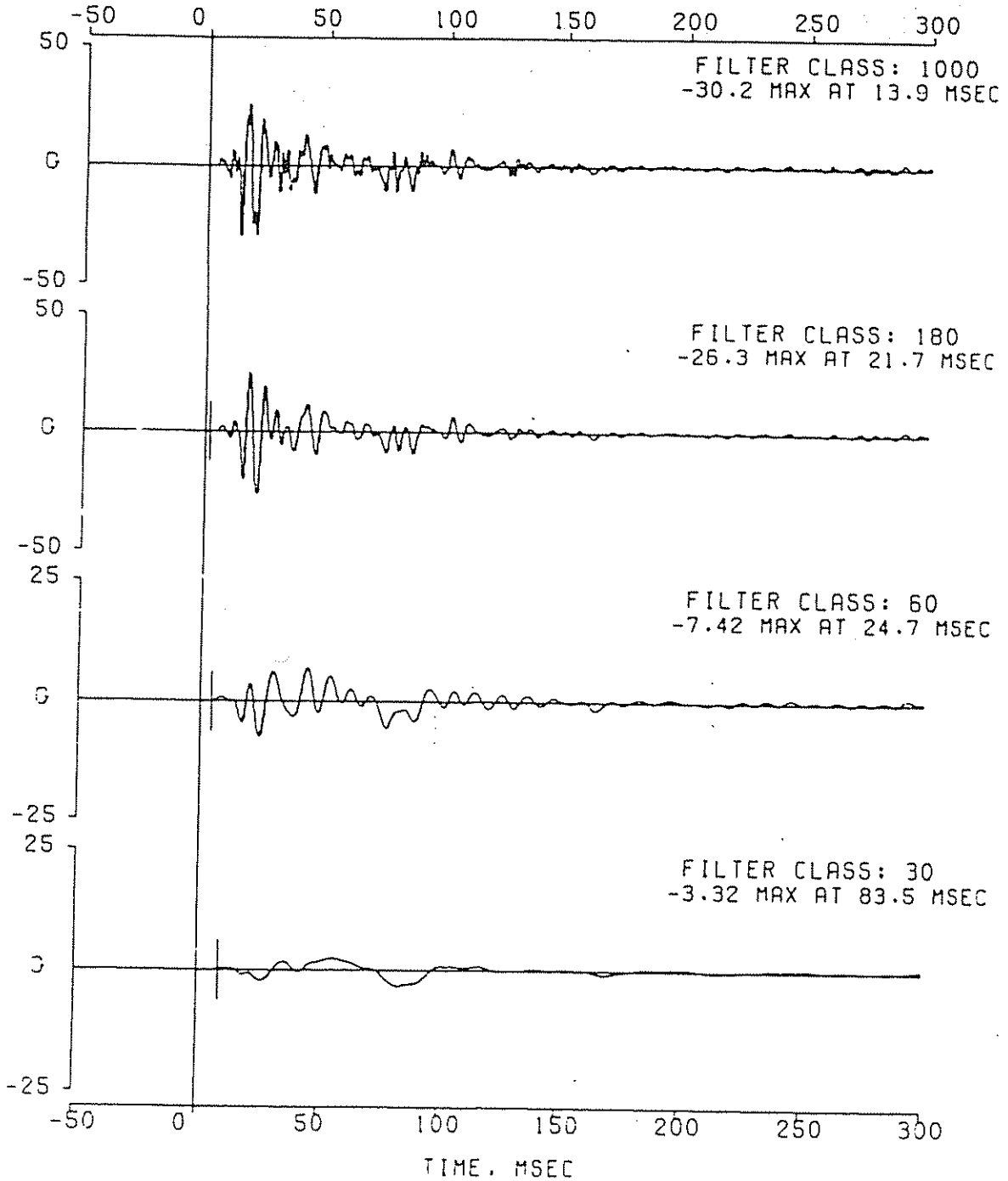
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10, 1996

ERRATA

1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243

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1997 MVSS DEVELOPMENT - 301.

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CHANNEL 015 RECM EXTERN

Z ANER1

FILTER TYPE: 08DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

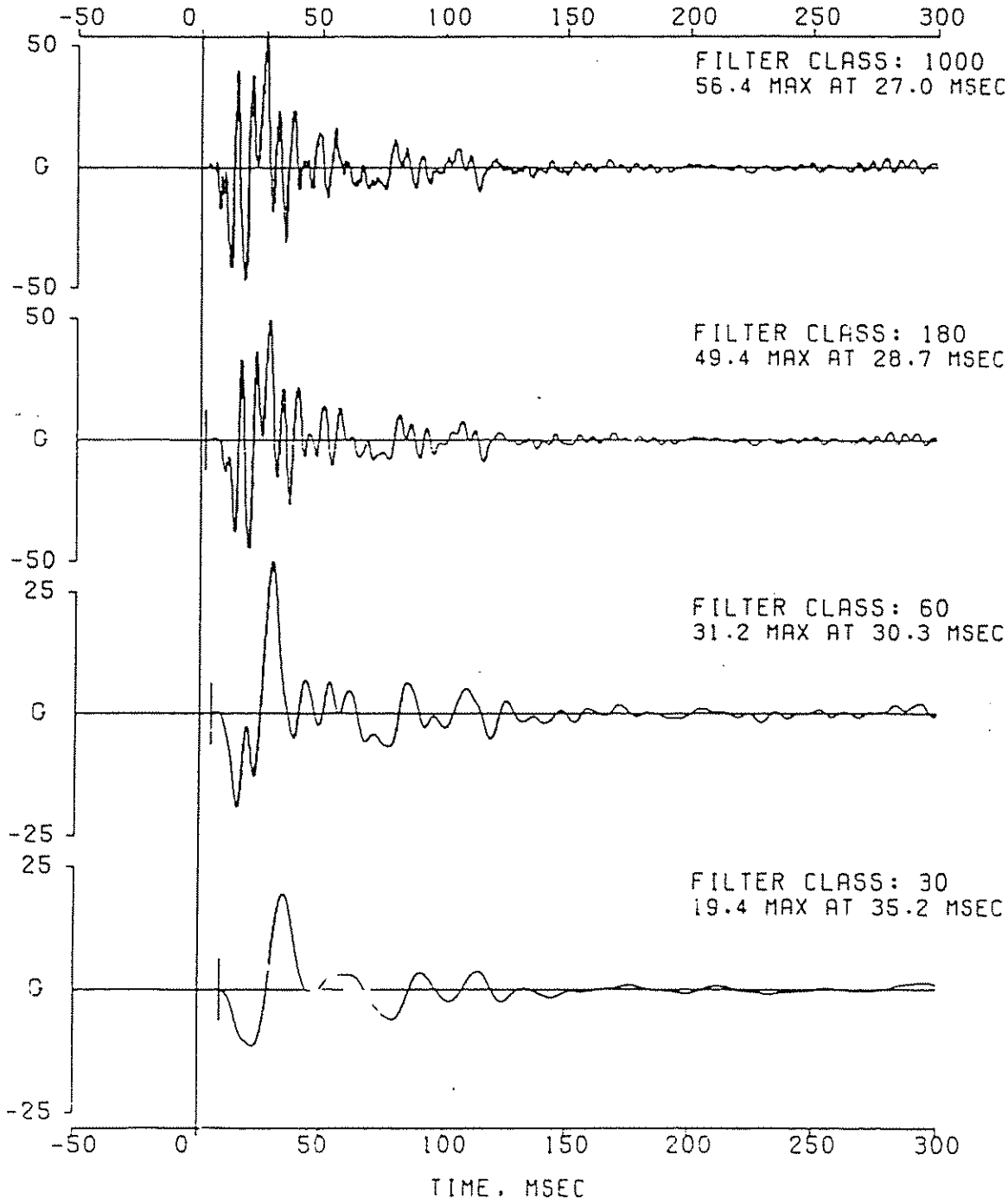
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10.1996

ERRATA

1



DC 03272

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243

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1997 MVSS DEVELOPMENT - 301.

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CHANNEL 016 LT FT SEAT RISER X A80NJ

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

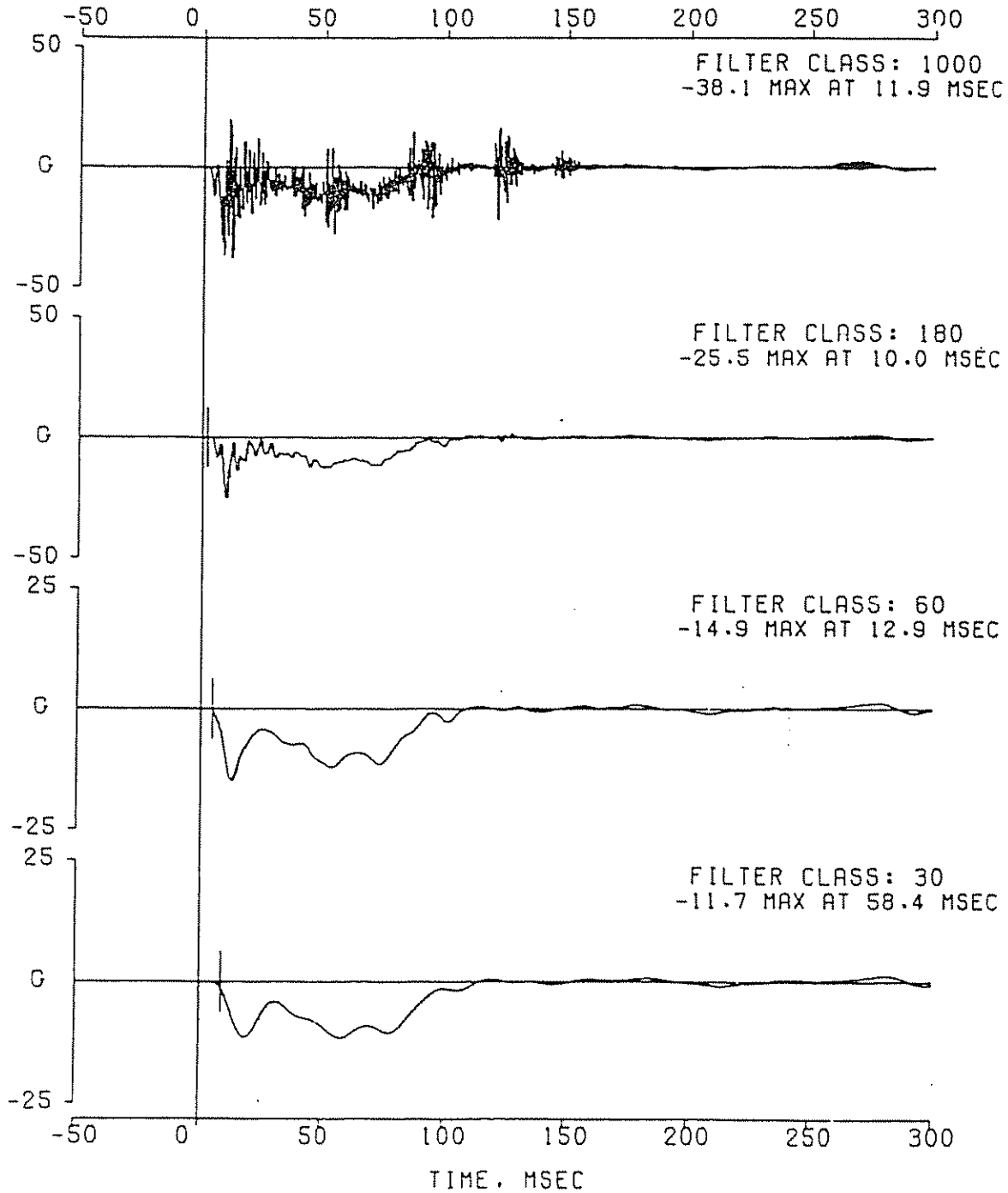
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BF

MAY 10, 1996

ERRATA

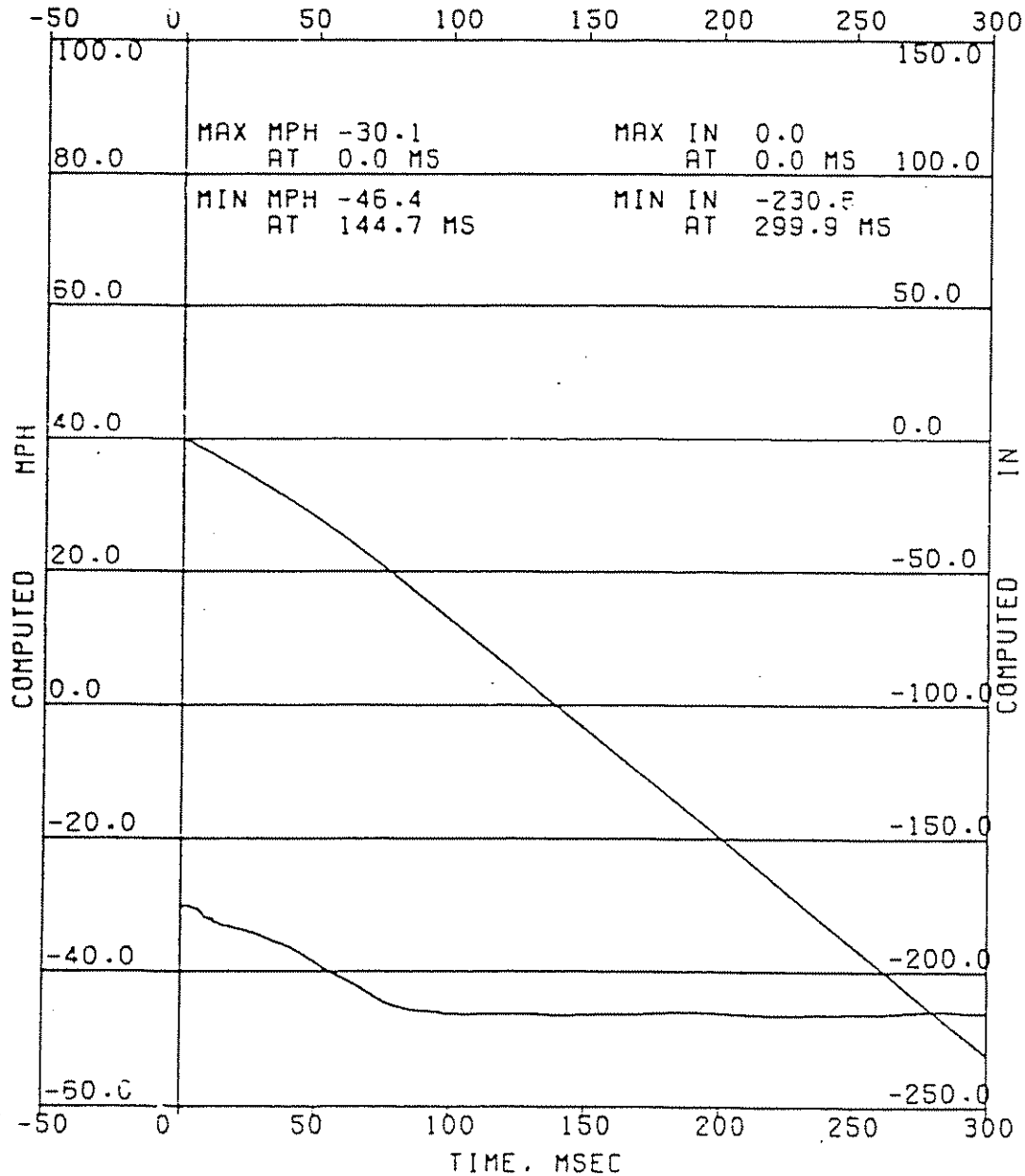
1



FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BF
ERRATA 1



COMPUTED MPH
COMPUTED IN

DC 03274

VC05927 30 MPH REAR BARRIER. ZJJ74. 5-2L MPI. ITEM ZJB243

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1997 MVSS DEVELOPMENT - 301.

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CHANNEL 017 LT FT SEAT RISER Y AC8N8

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

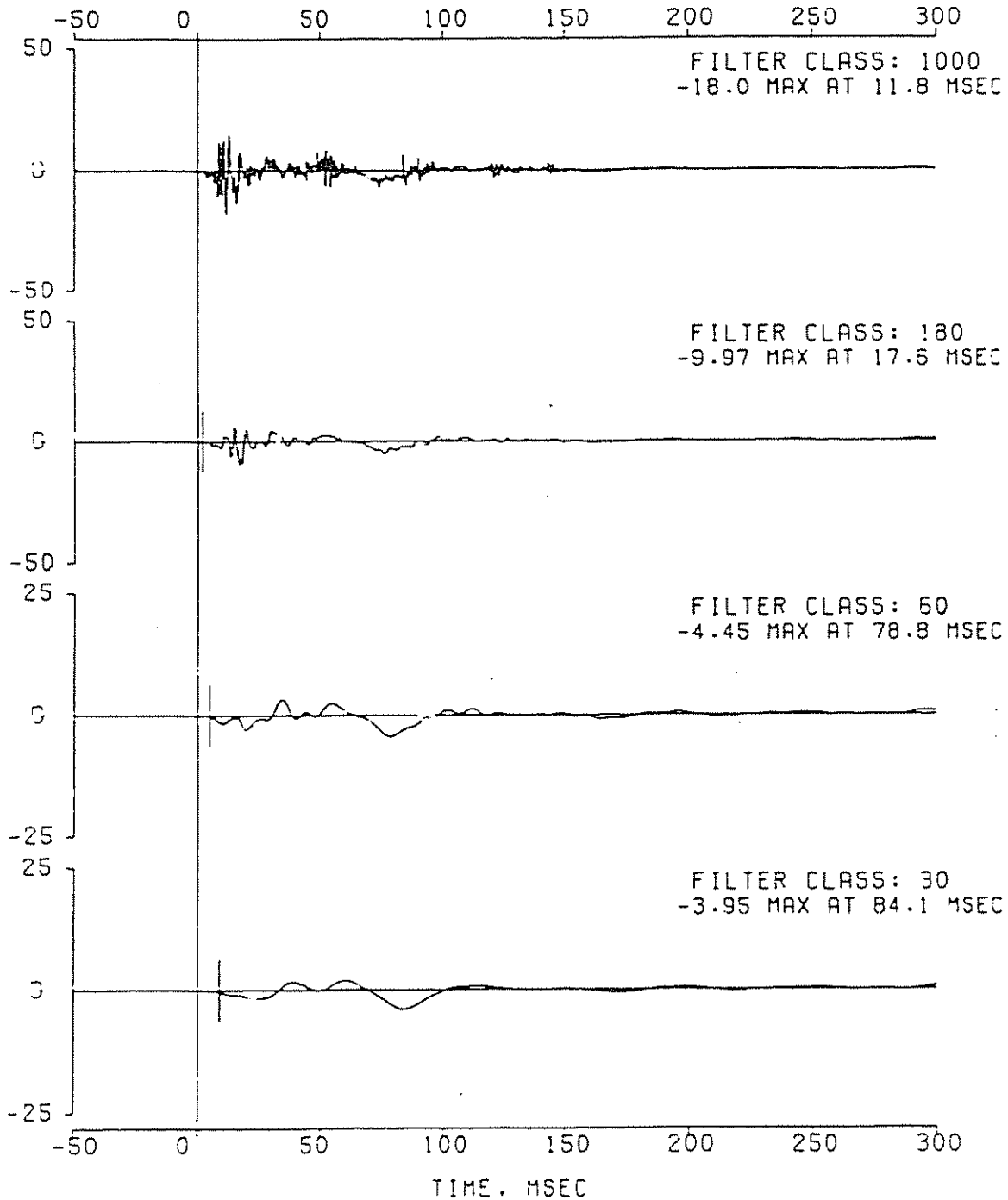
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BG

MAY 10.1996

ERRATA

1

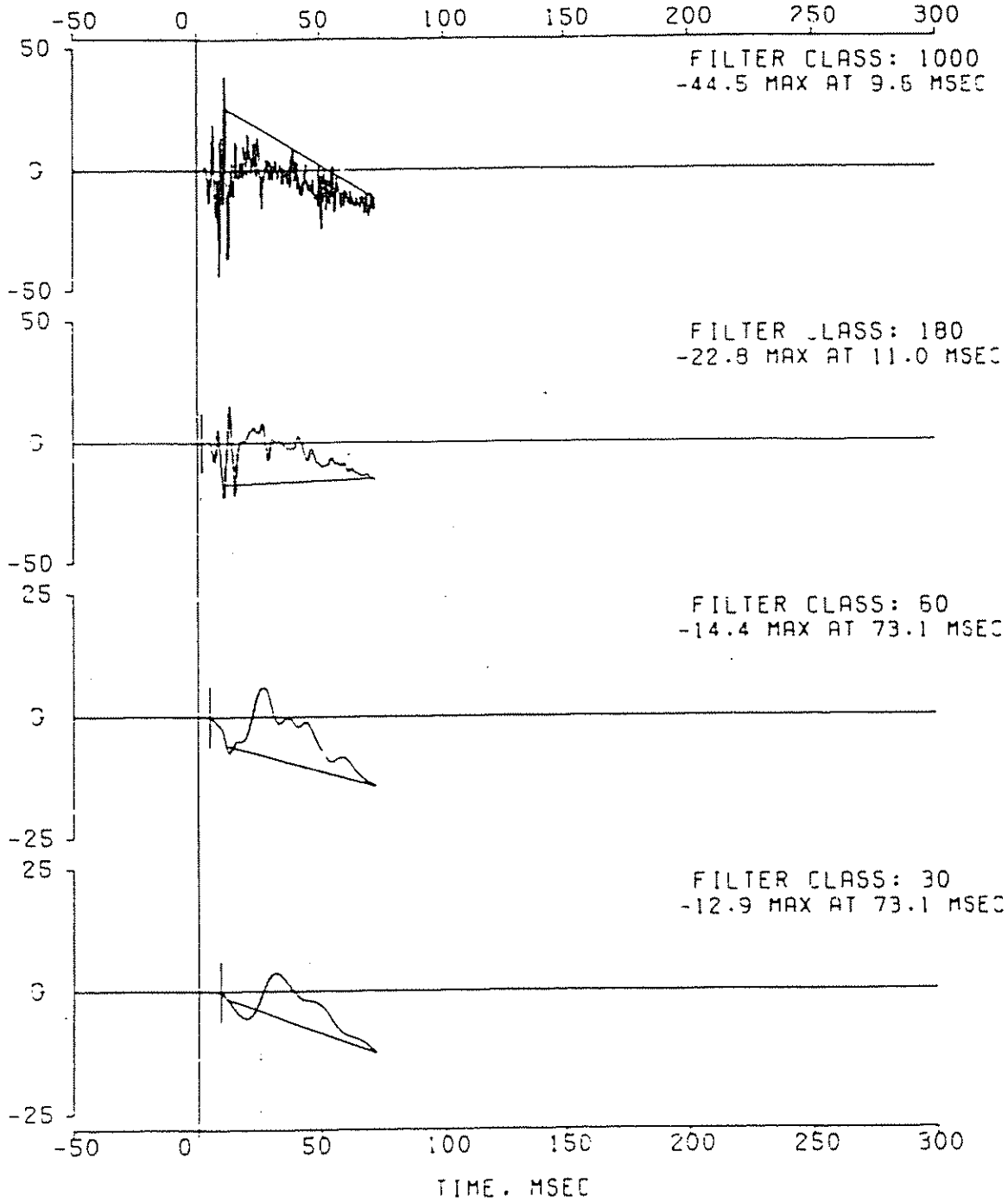


DC 03275

VC05927 30 MPH REAR BARRIER. ZJJ74. S.2L MPI. ITEM ZJB243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 018 LT FT SEAT RISER Z AAK47
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/96BG
ERRATA 1



***** CAUTION *****
***** INST. MALFUNCTION AFTER 73.0 MS *****

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJBC43

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CHANNEL 019 RT FT SEAT RISER X AAJ95

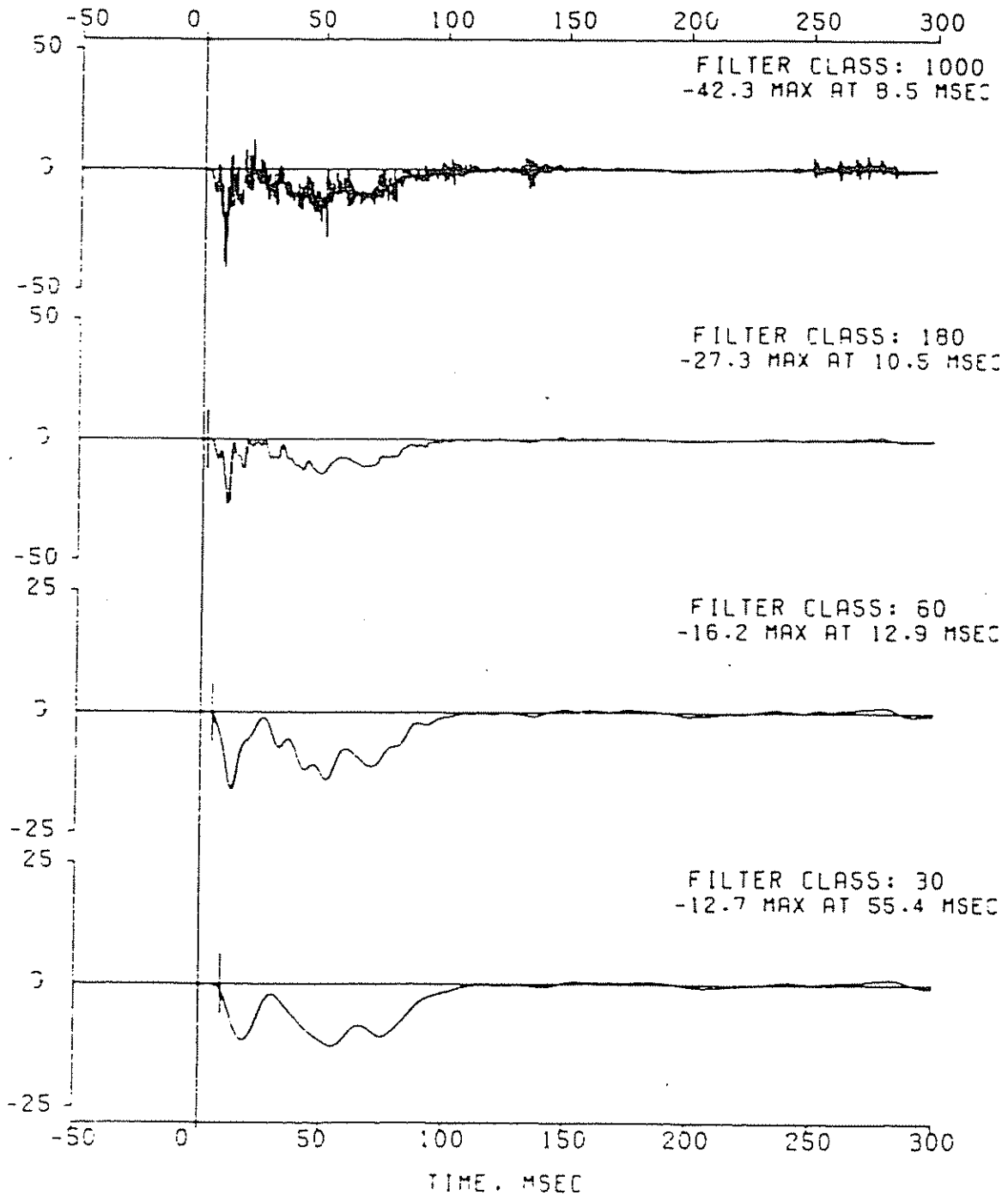
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BG

MAY 10, 1995

ERRATA 1



DC 03277

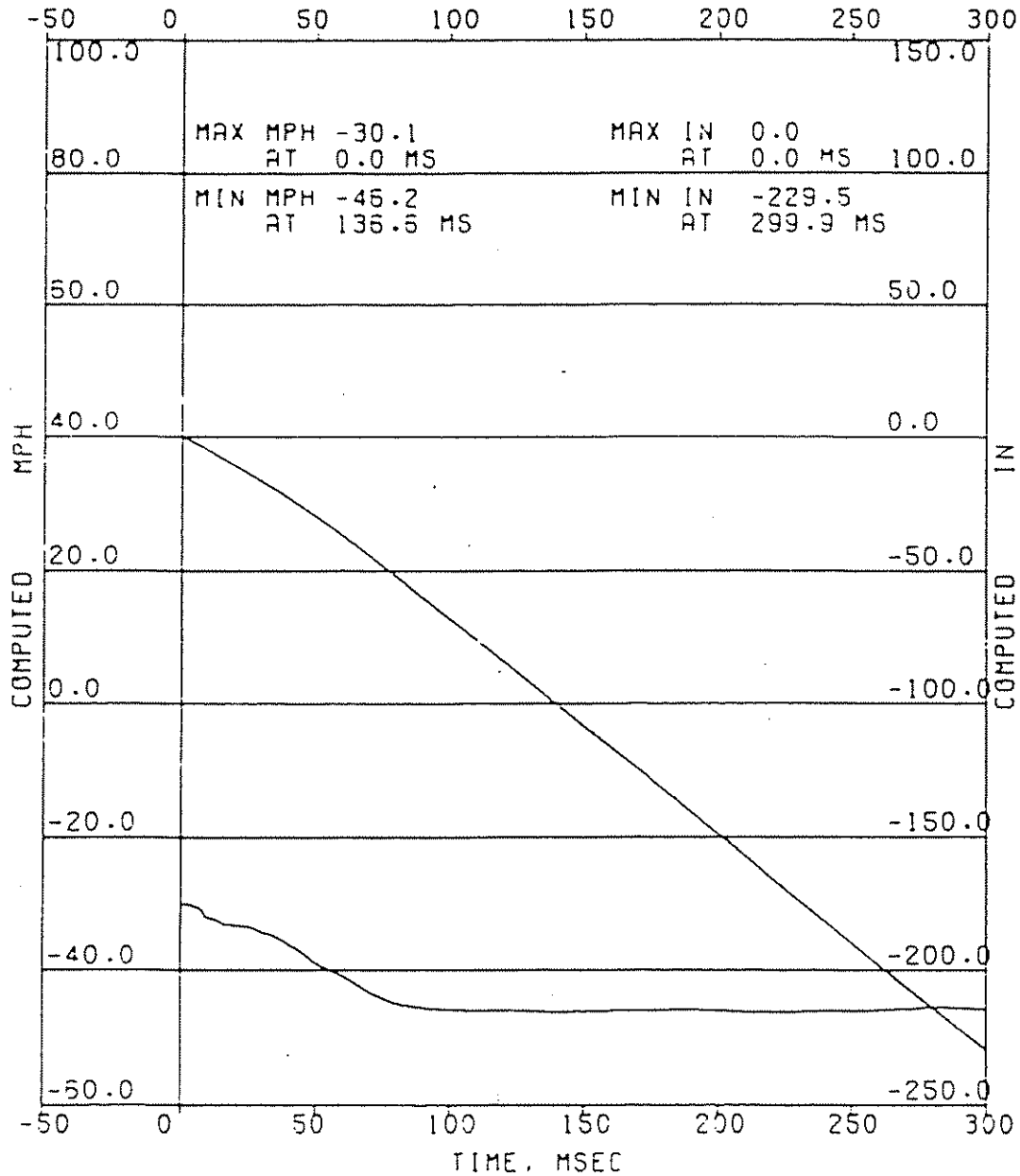
VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 019 RT FT SEAT RISER X AAJ95

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FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10. 1996

DATA SET 05/09/968C
ERRATA 1



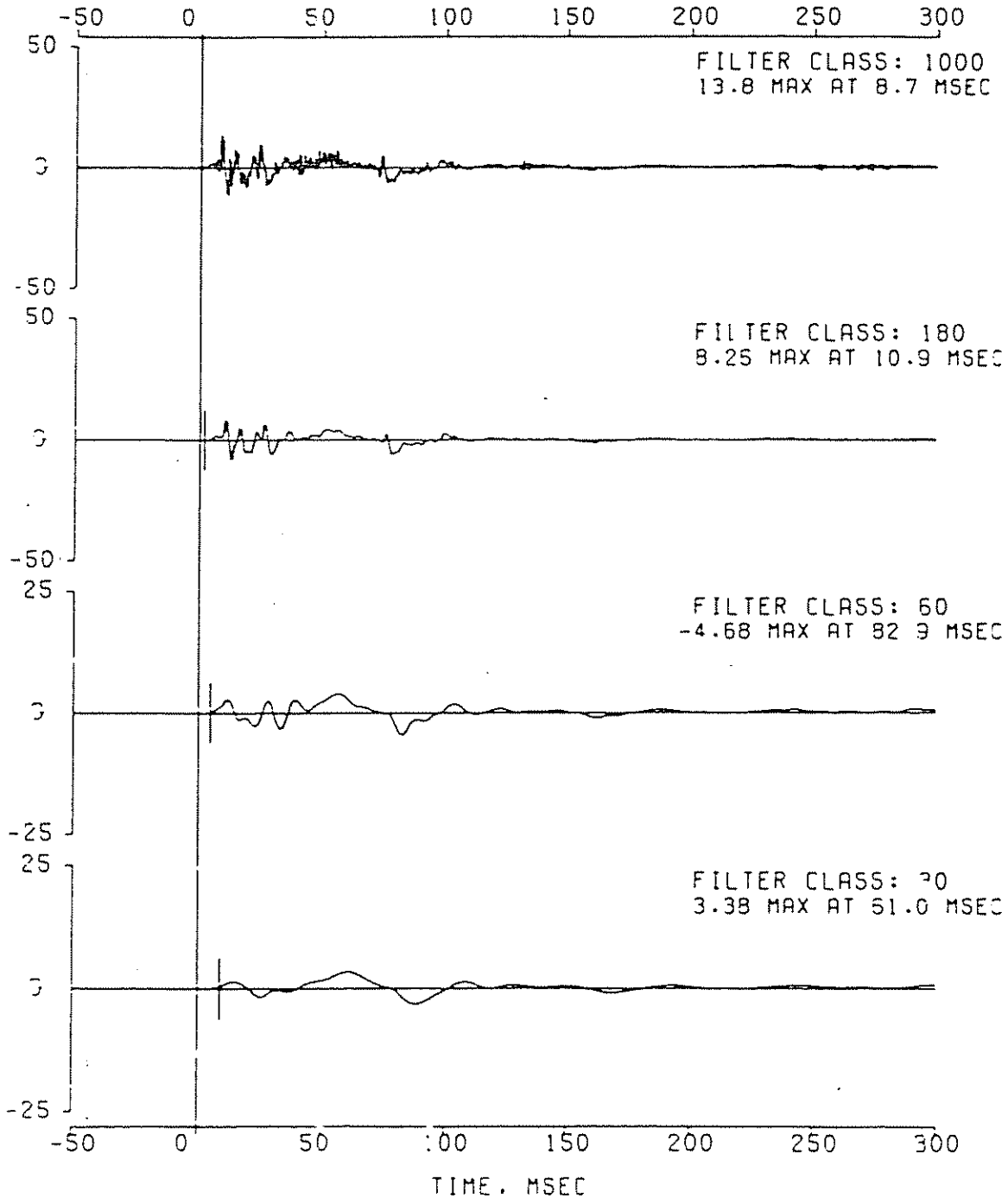
COMPUTED MPH
COMPUTED IN

DC 03278

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 020 RT FT SEAT RISER Y DT73J
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/96BG
ERRATA 1



DC 03279

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243
1997 MVSS DEVELOPMENT - 301.

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CHANNEL 021 RT FT SEAT RISER Z A03CJ

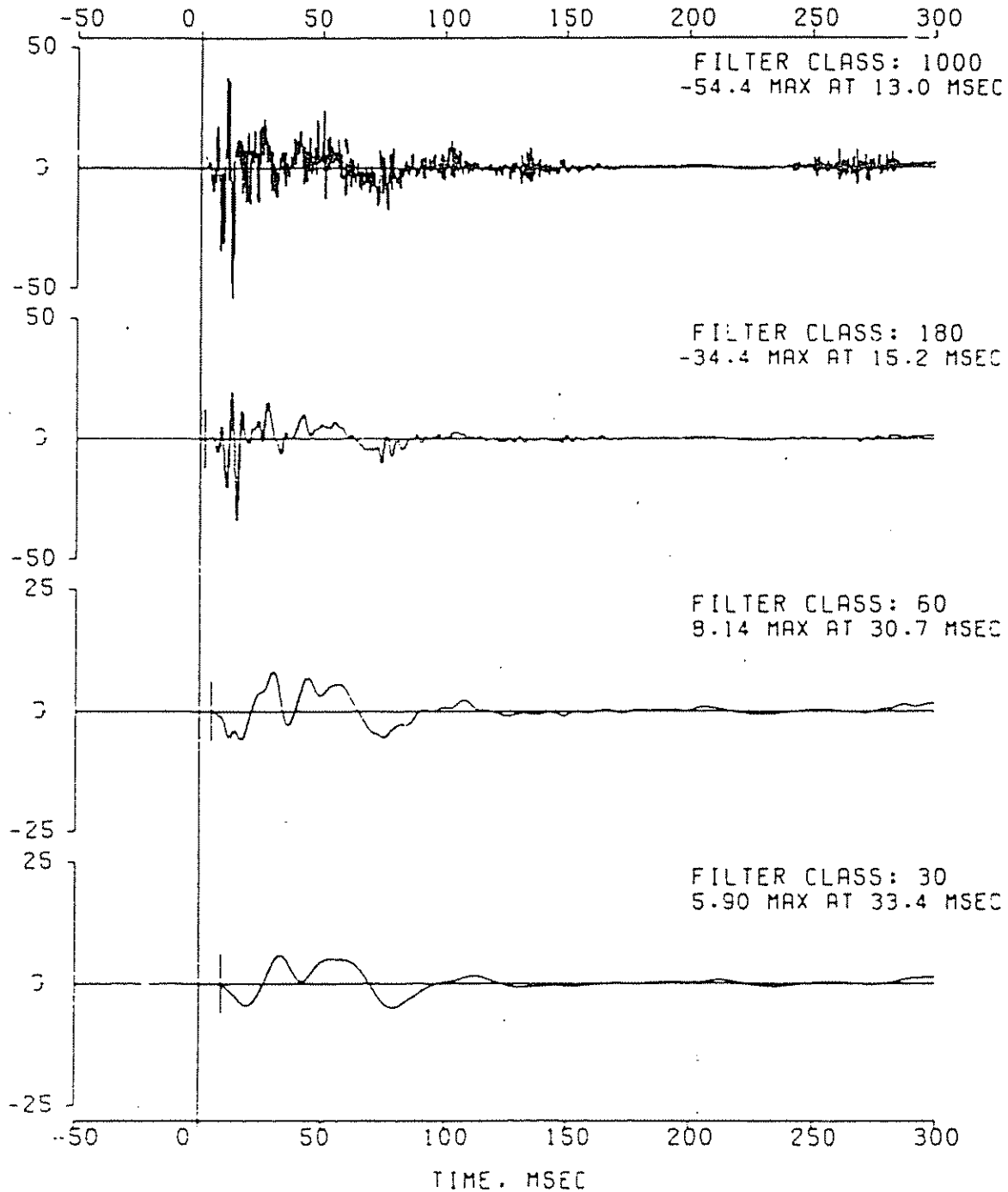
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BG

MAY 10.1996

ERRATA 1



DC 03280

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243

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CHANNEL 022 LT B POST AT FLOOR X AND70

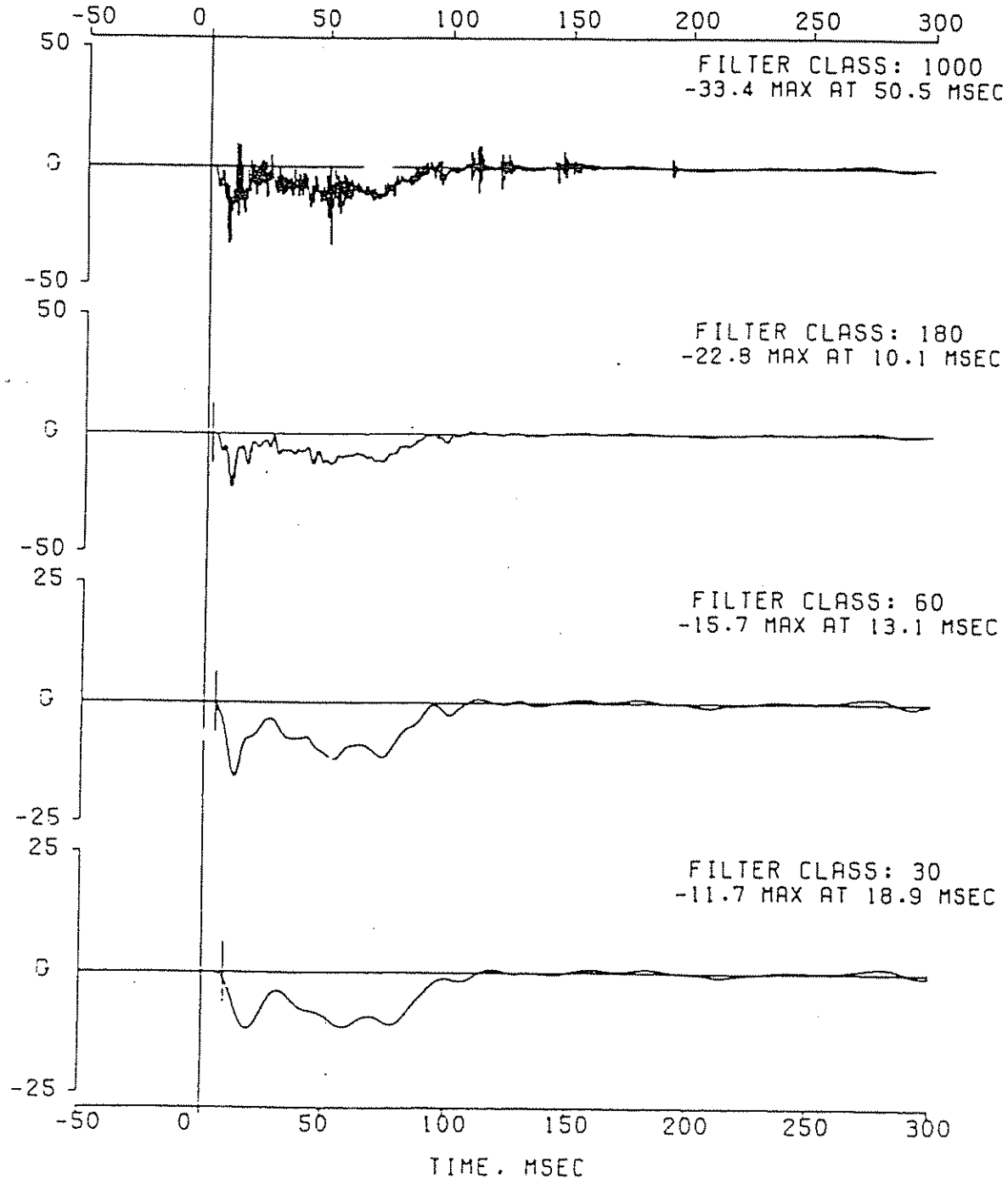
FILTER TYPE: 08DAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BG

MAY 10.1996

ERRATA 1

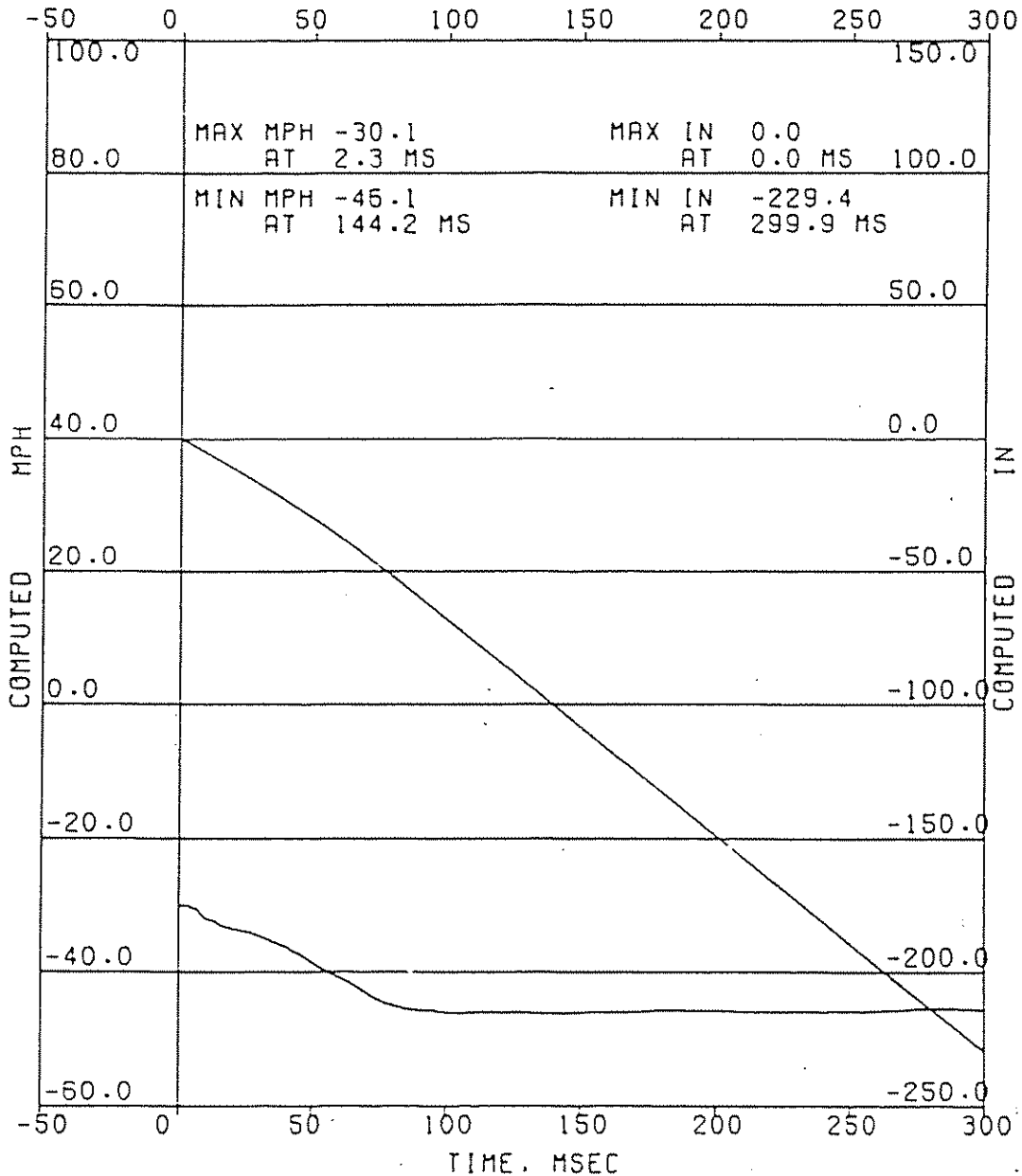


DC 03281

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/968C
ERRATA 1



COMPUTED MPH
COMPUTED IN

DC 03282

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.

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CHANNEL 023 LT B POST AT FLOOR Y ANEH3

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

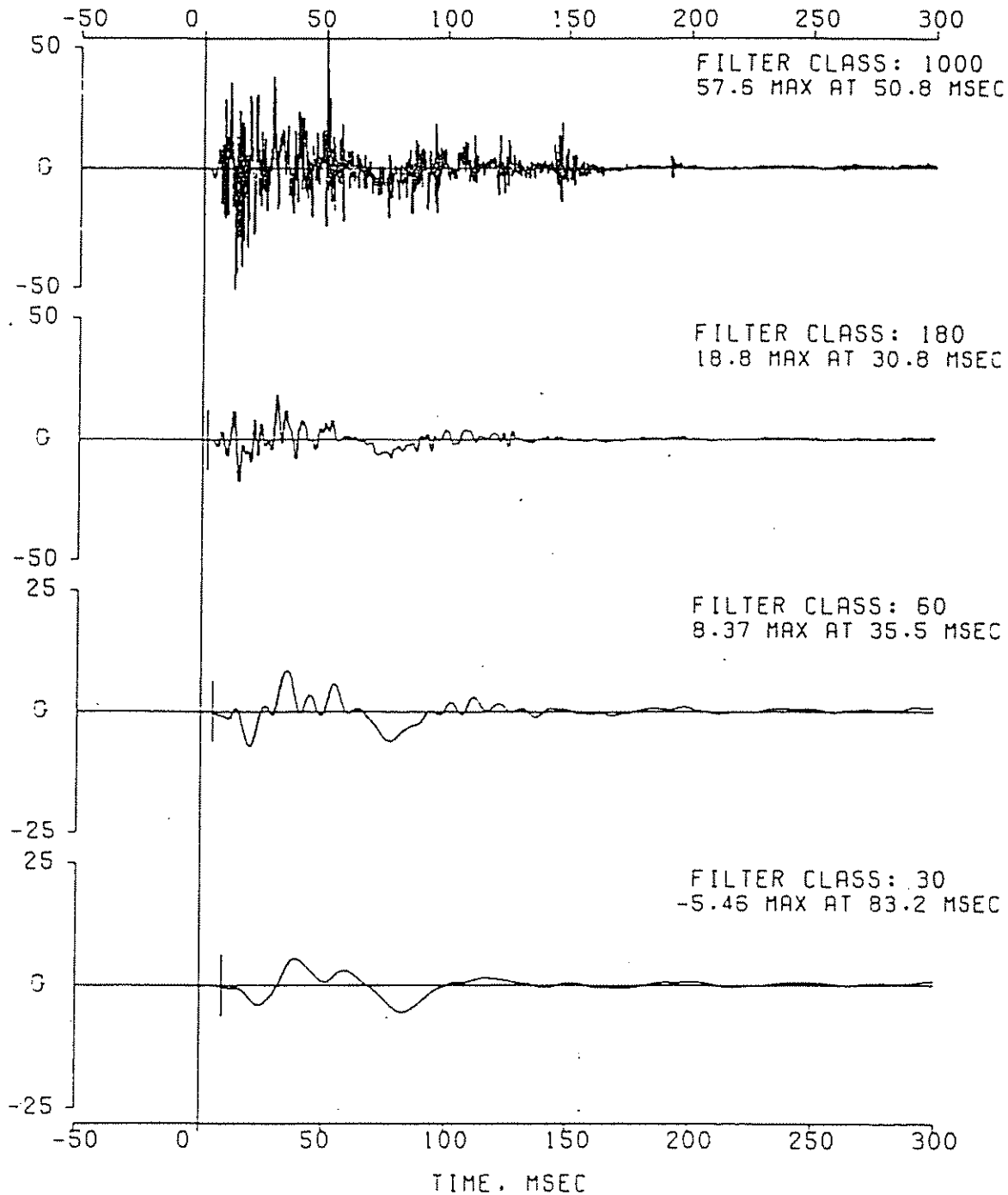
IMPACT ANALYSIS DEPT. 5320

DATA SET 05/09/96BC

MAY 10.1996

ERRATA

1



DC 03283

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 024 LT B POST AT FLOOR Z AK4A2
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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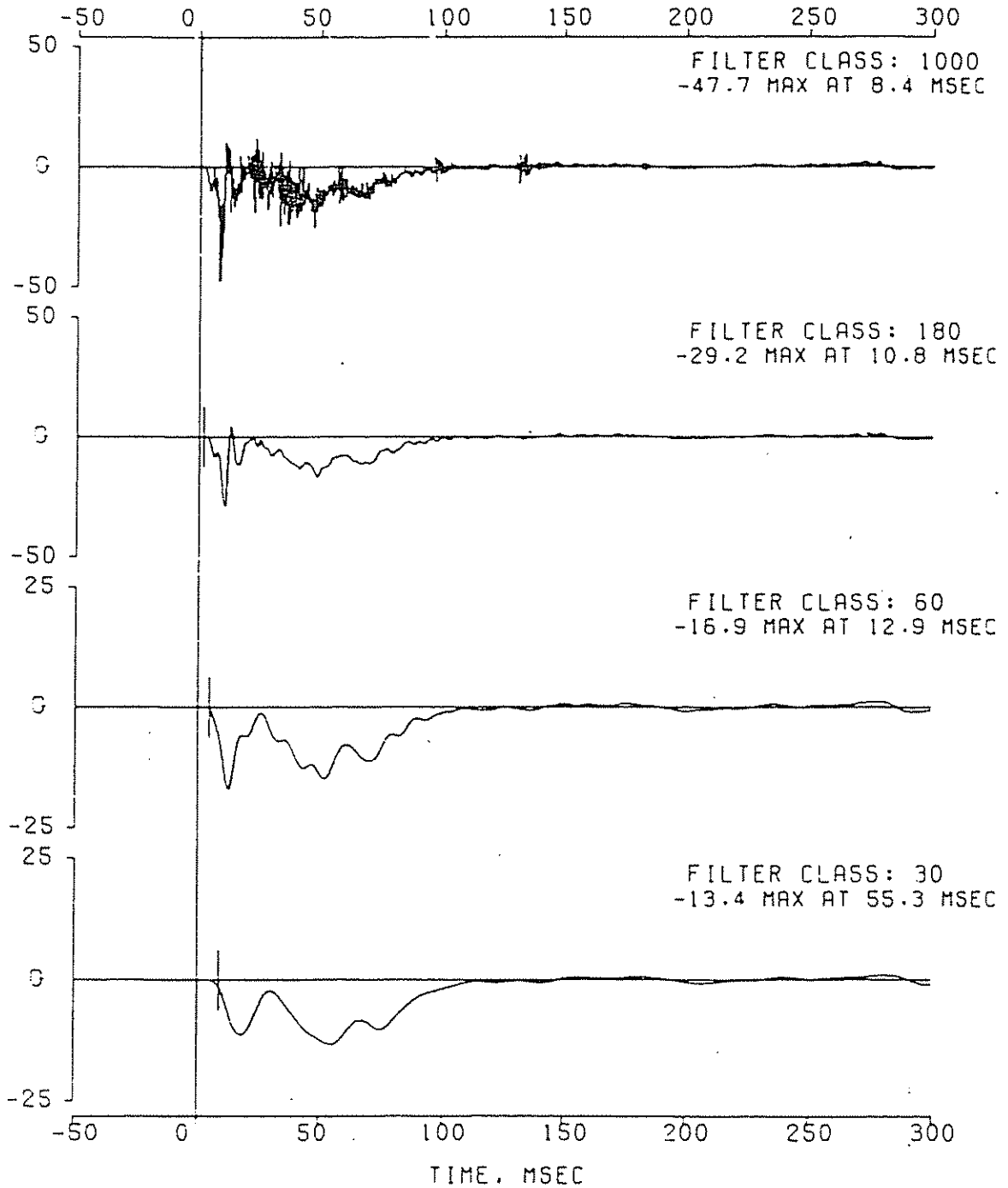
DATA SET 05/09/96BG
ERRATA 1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 025 RT B POST AT FLOOR X AC892
FILTER TYPE: 080AS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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DATA SET 05/09/96BG
ERRATA 1

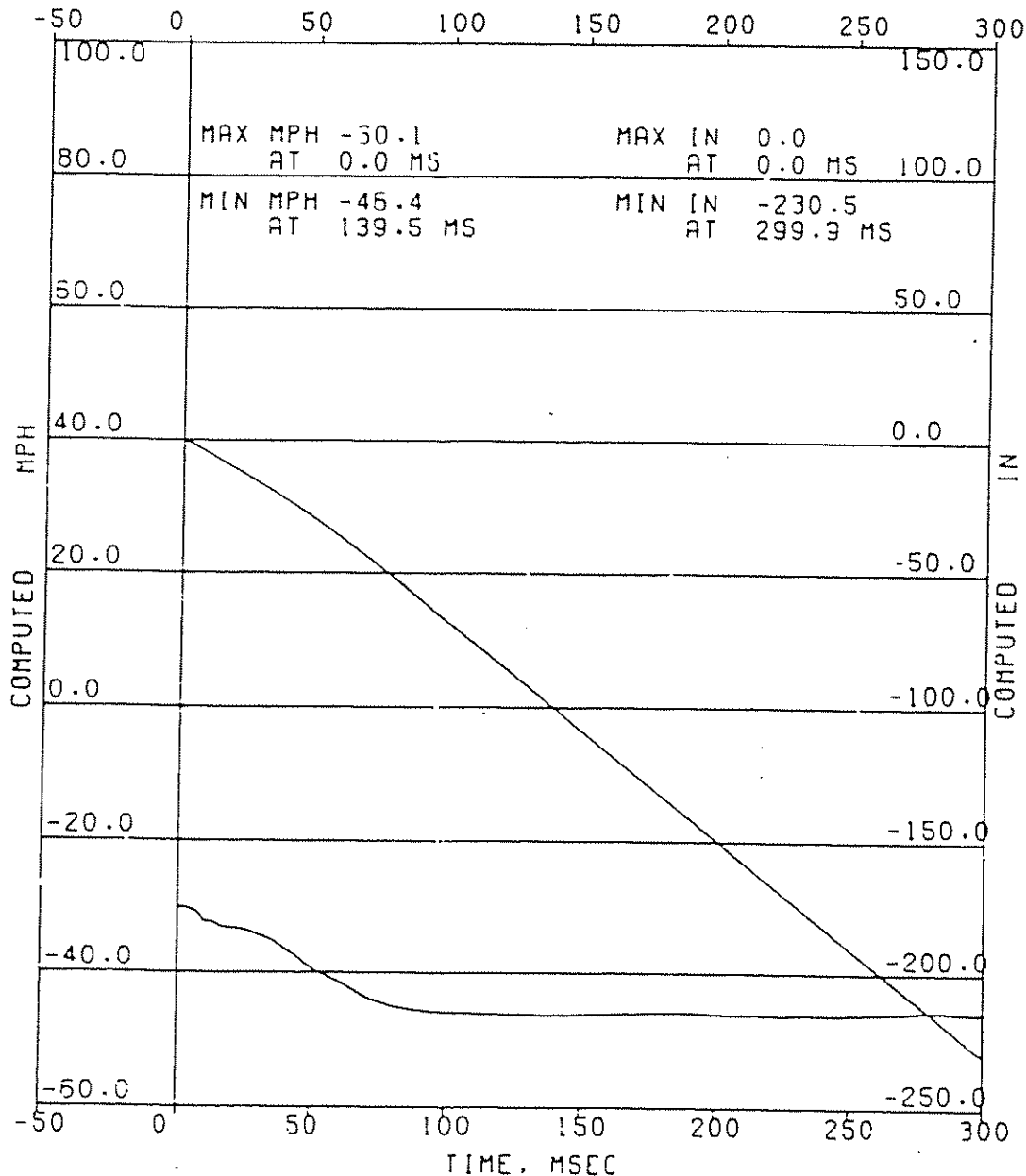


DC 03285

FILTER TYPE: 080A5-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BG
ERRATA 1



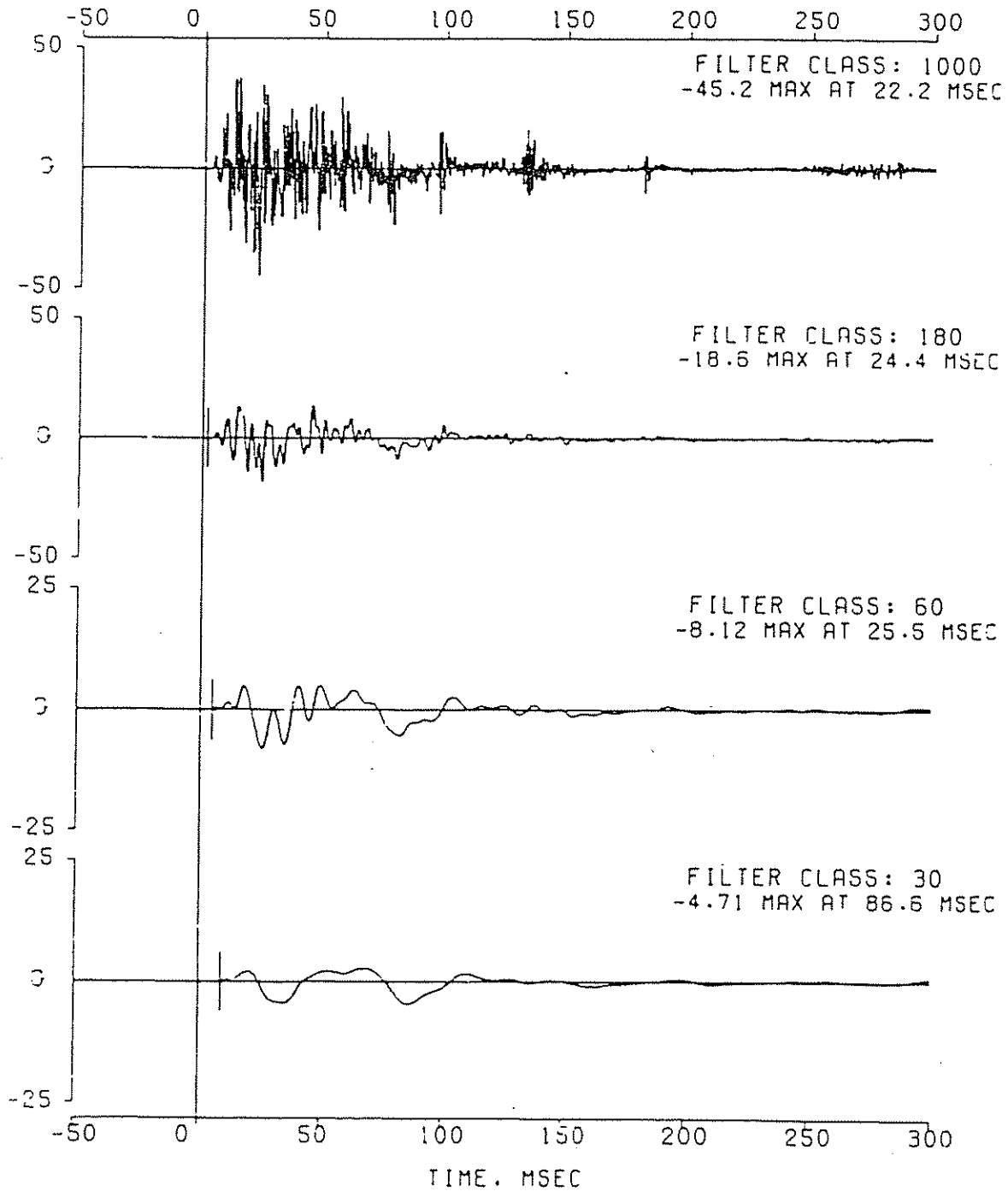
COMPUTED MPH
COMPUTED IN

DC 03286

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 026 RT B POST AT FLOOR Y AC8K6
FILTER TYPE: 08DAS-III; RESPONSE CORRECTION, CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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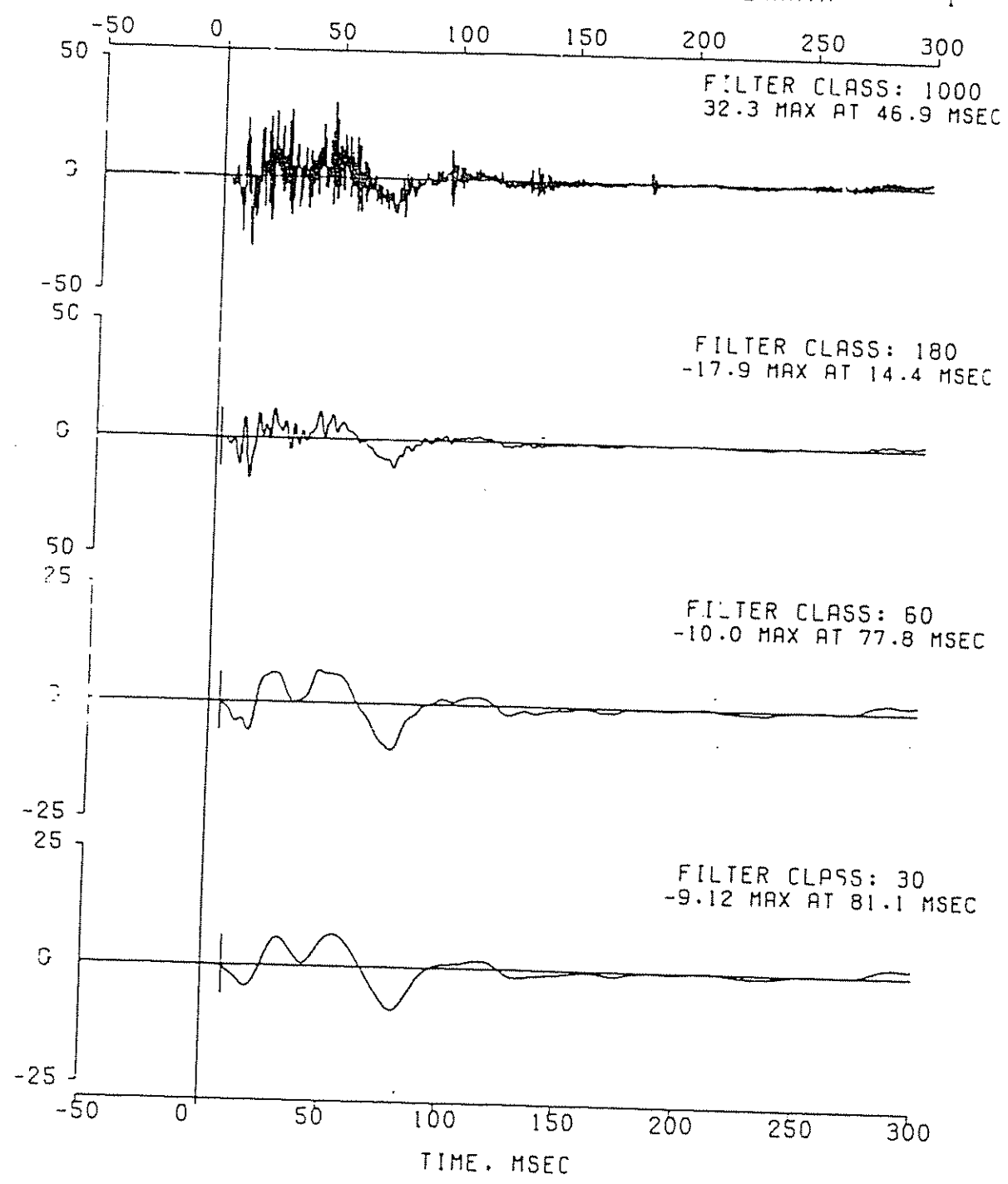
DATA SET 05/09/96BG
ERRATA 1



DC 03287

VC05927 30 PH REAR BARRIER. ZJJ74. S.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 027 RT B POST AT FLOOR Z APYR2
FILTER TYPE: 080AS-III RESPONSE CORRECTION. CLASS 1000 FILTER 1650;
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

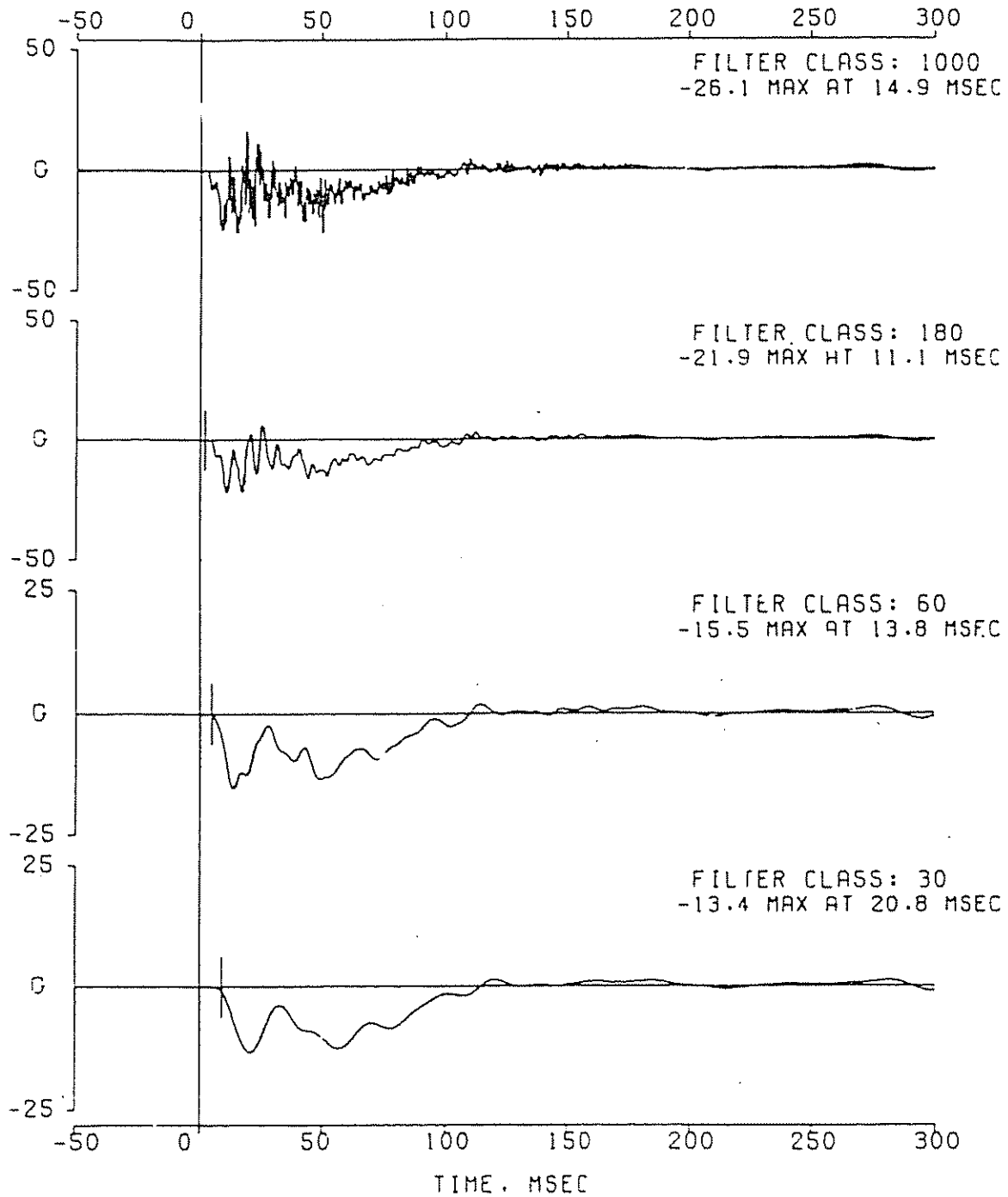
DATA SET 05/09/95BG
ERRATA 1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 028 LT B POST AT STRIKER X AEW44
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1995

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DATA SET 05/09/96BG
ERRATA 1

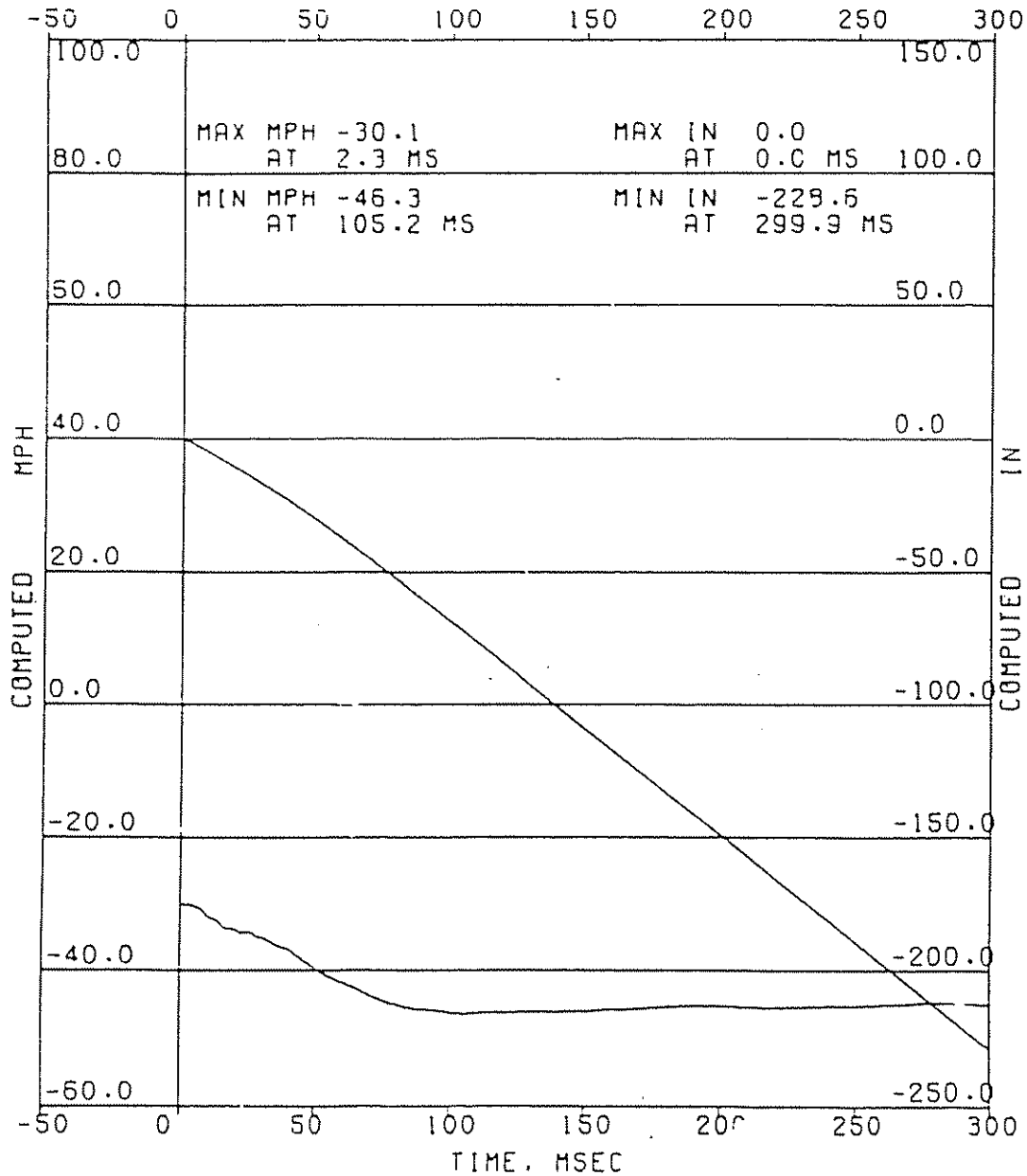


DC 03289

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

DATA SET 05/09/96BC
ERRATA 1



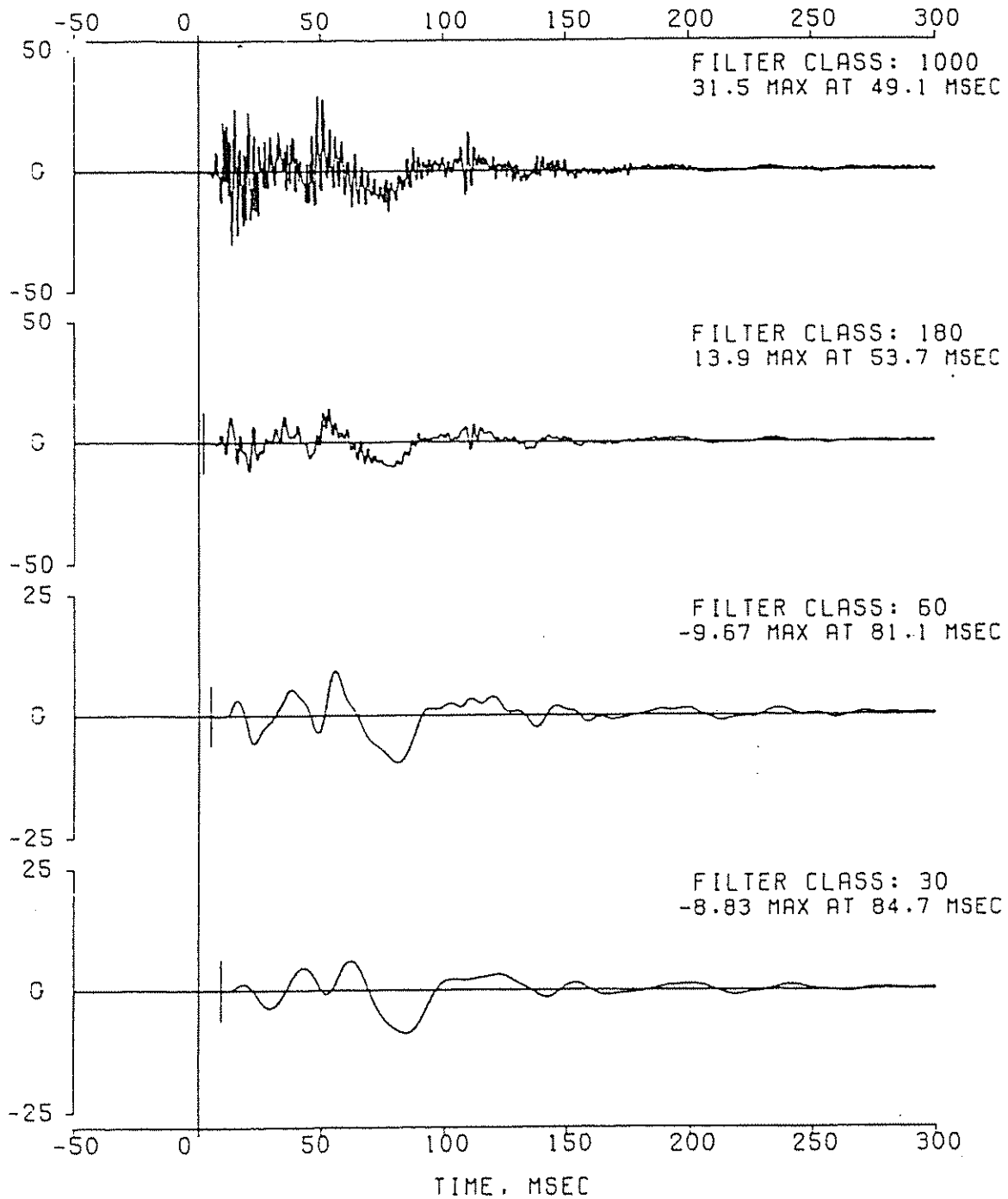
COMPUTED MPH
COMPUTED IN

DC 03290

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 029 LT B POST AT STRIKER Y APGPO
FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

PAGE 049
OF 058

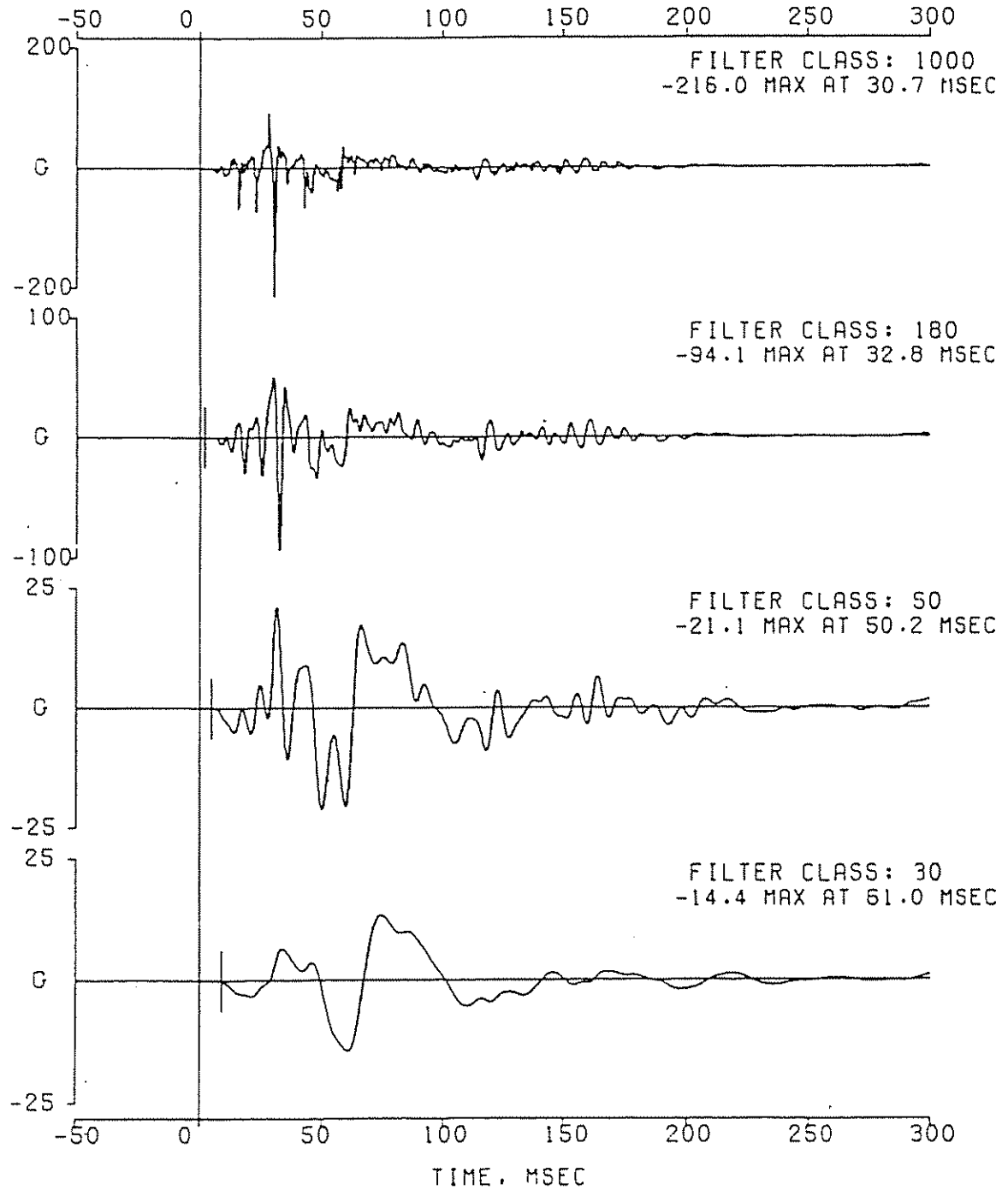
DATA SET 05/09/968G
ERRATA 1



DC 03291

VC05927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI. ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
CHANNEL 030 LT B POST AT STRIKER Z AKEG1
FILTER TYPE: OBDAS-III RESPONSE CORRECTION, CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996

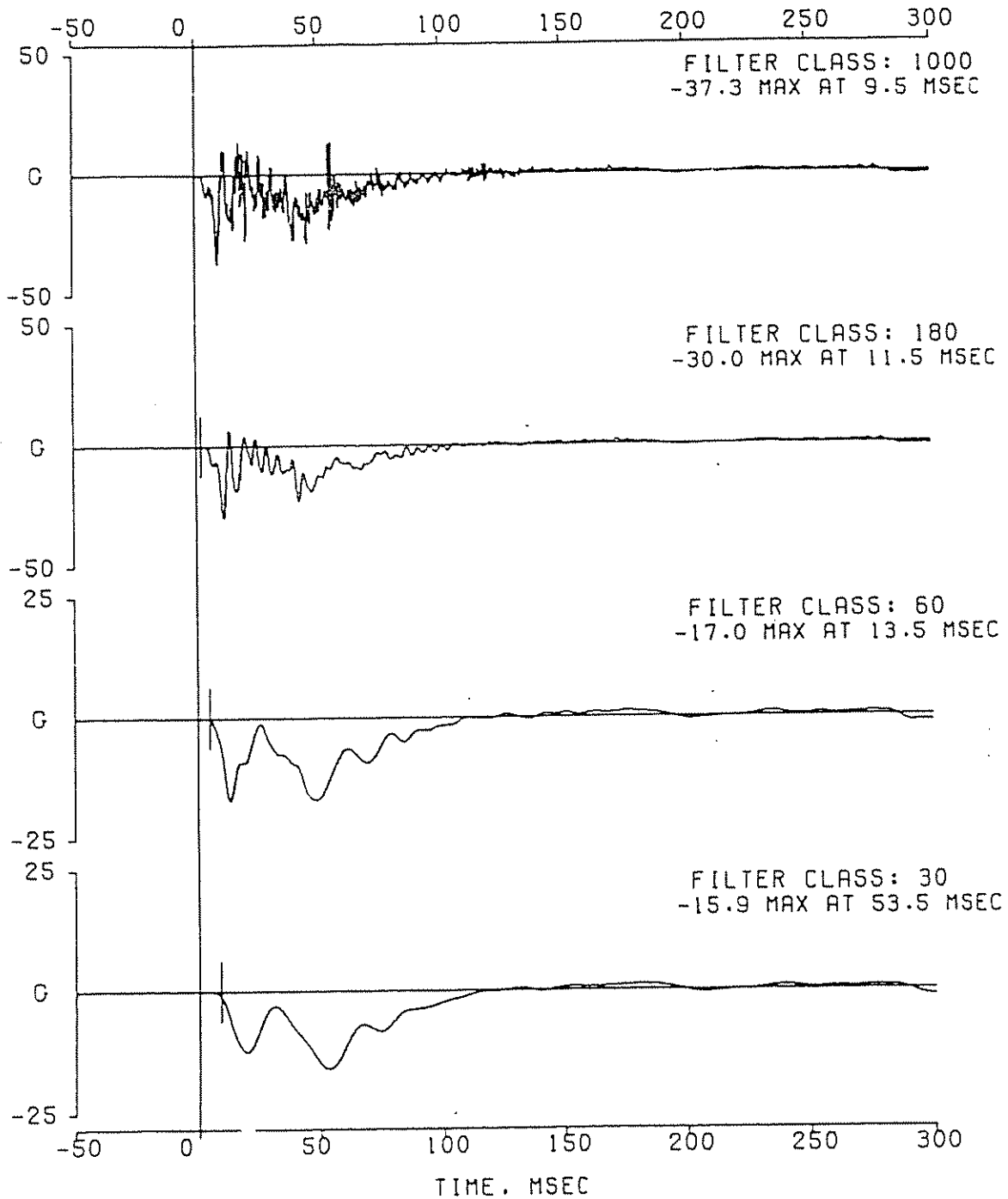
PAGE 050
OF 058
DATA SET 05/09/96BG
ERRATA 1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJBZ43
1997 MVSS DEVELOPMENT - 301.
CHANNEL 031 RT B POST AT STRIKER X AABK4J
FILTER TYPE: 0BDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

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OF 058

DATA SET 05/09/96BG
ERRATA 1

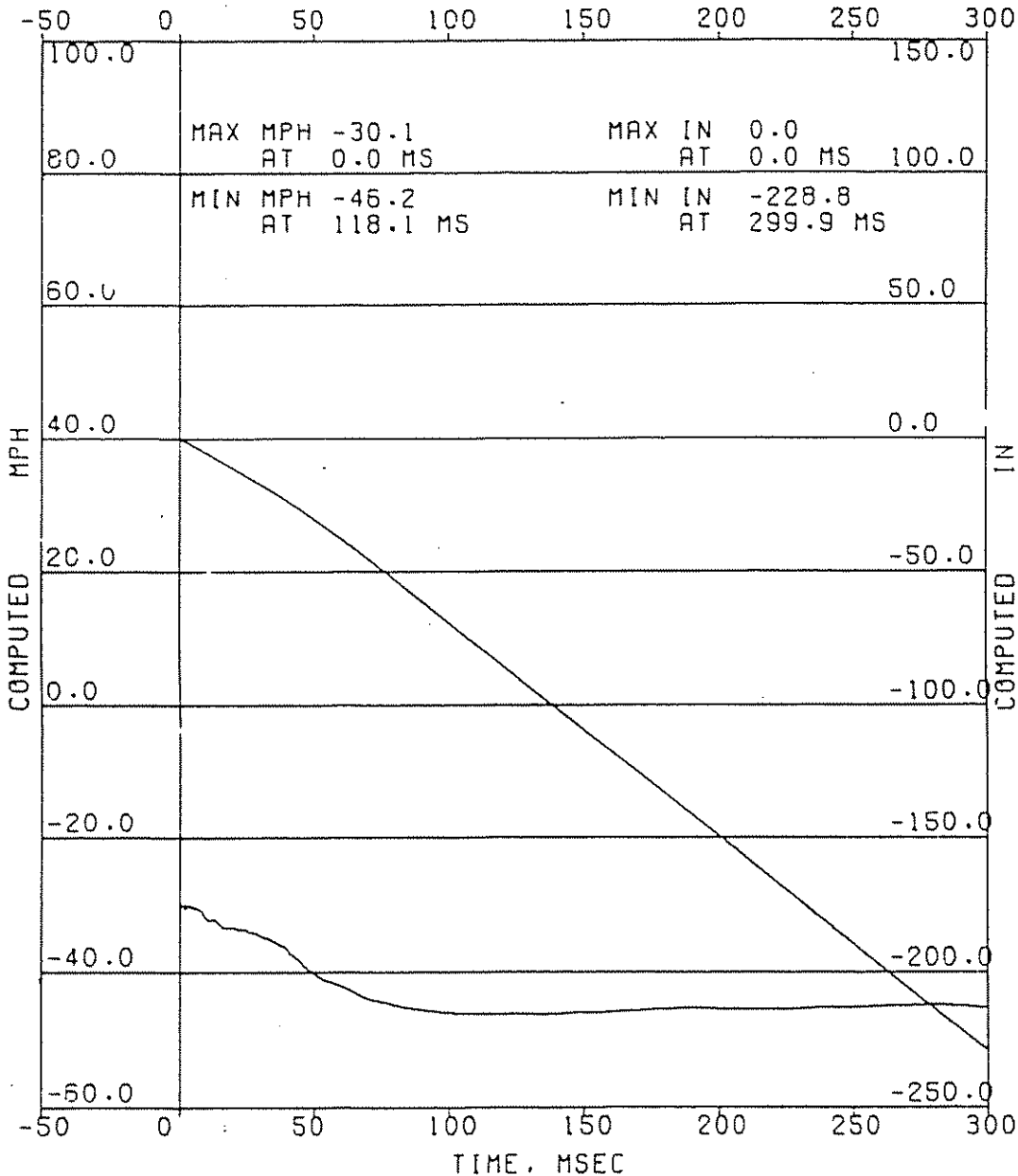


DC 03293

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BG
ERRATA 1



COMPUTED MPH
COMPUTED IN

DC 03294

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243

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OF 058

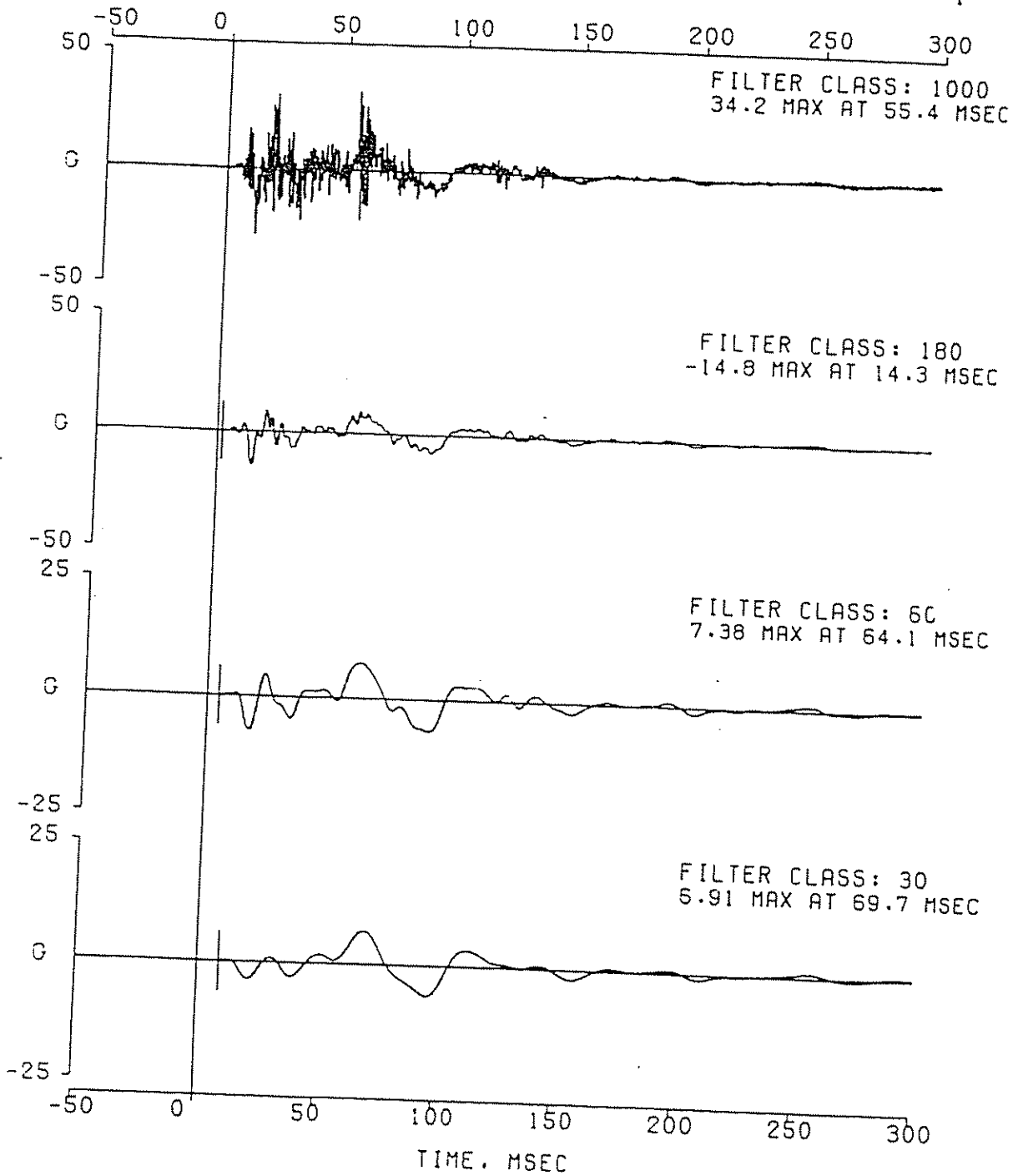
1997 HVSS DEVELOPMENT - 301.
CHANNEL 032 RT B POST AT STRIKER Y A13NJ

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

DATA SET 05/09/96BG

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

ERRATA 1



DC 03295

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJ8243

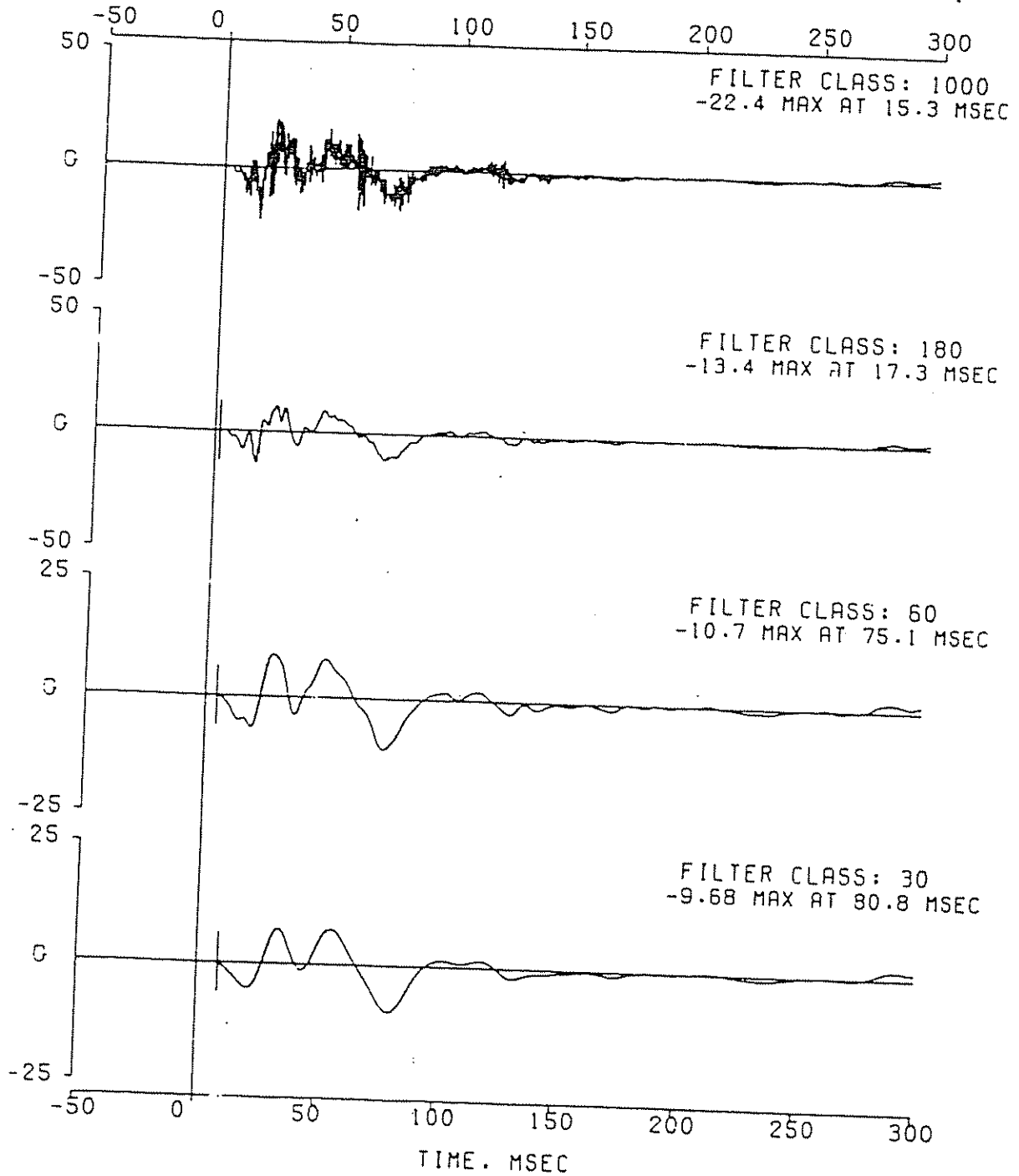
PAGE 054
OF 058

1997 MVSS DEVELOPMENT - 301.
CHANNEL 033 RT B POST AT STRIKER Z AABT6J

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BH
ERRATA 1



VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243

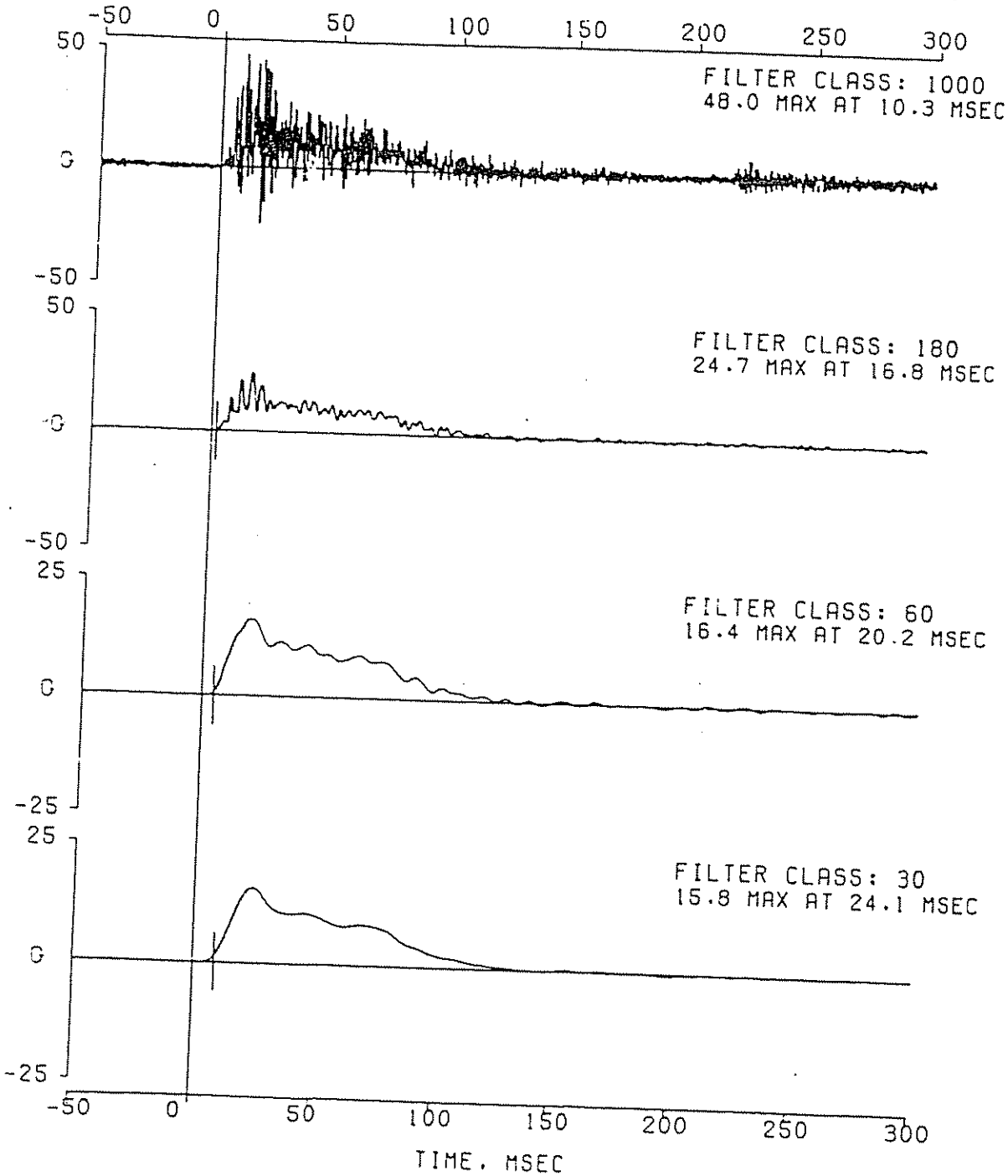
PAGE 055
OF 058

1997 MVSS DEVELOPMENT - 301.
CHANNEL 034 LT RAIL MBAR MID X 176963

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

DATA SET 05/09/96BH
ERRATA 1

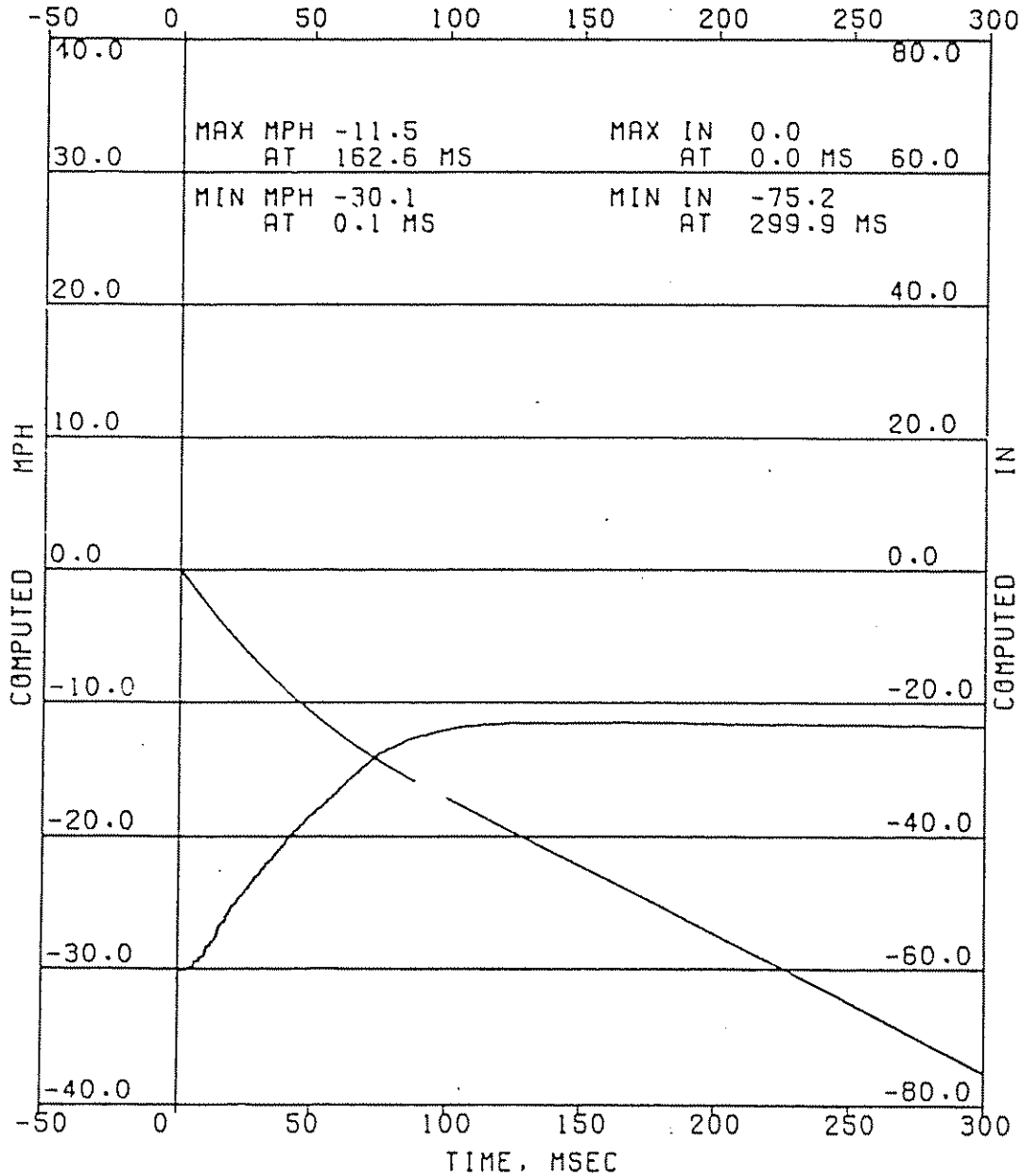
IMPACT ANALYSIS DEPT. 5320
MAY 10, 1996



FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
MAY 10.1996

DATA SET 05/09/96BH
ERRATA 1



COMPUTED MPH
COMPUTED IN

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243

PAGE 057

1997 MVSS DEVELOPMENT - 301.

OF 058

CHANNEL 035 RT RAIL MBAR MID X 73968

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)

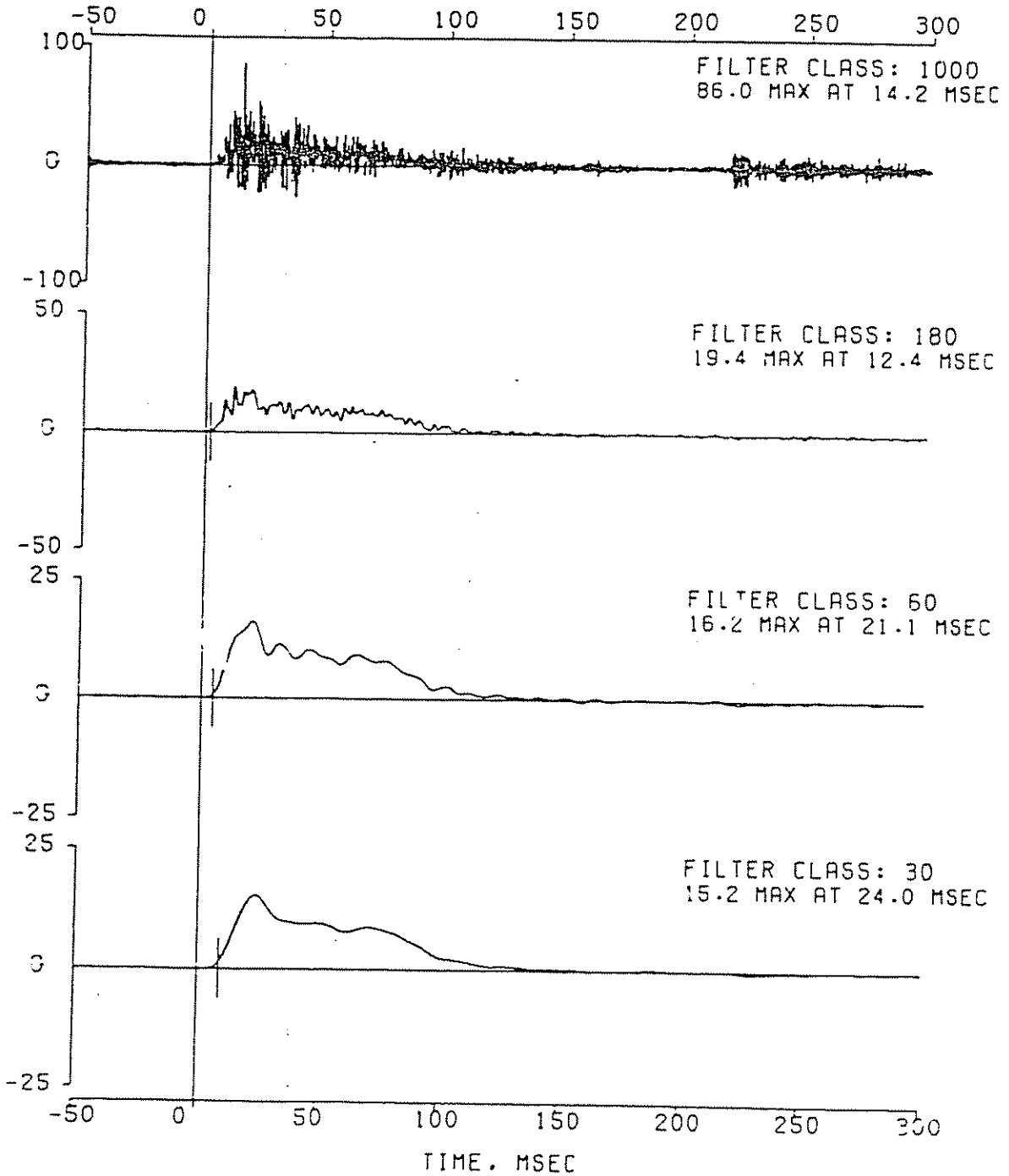
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DATA SET 05/09/96BH

MAY 10.1996

ERRATA

1



DC 03299

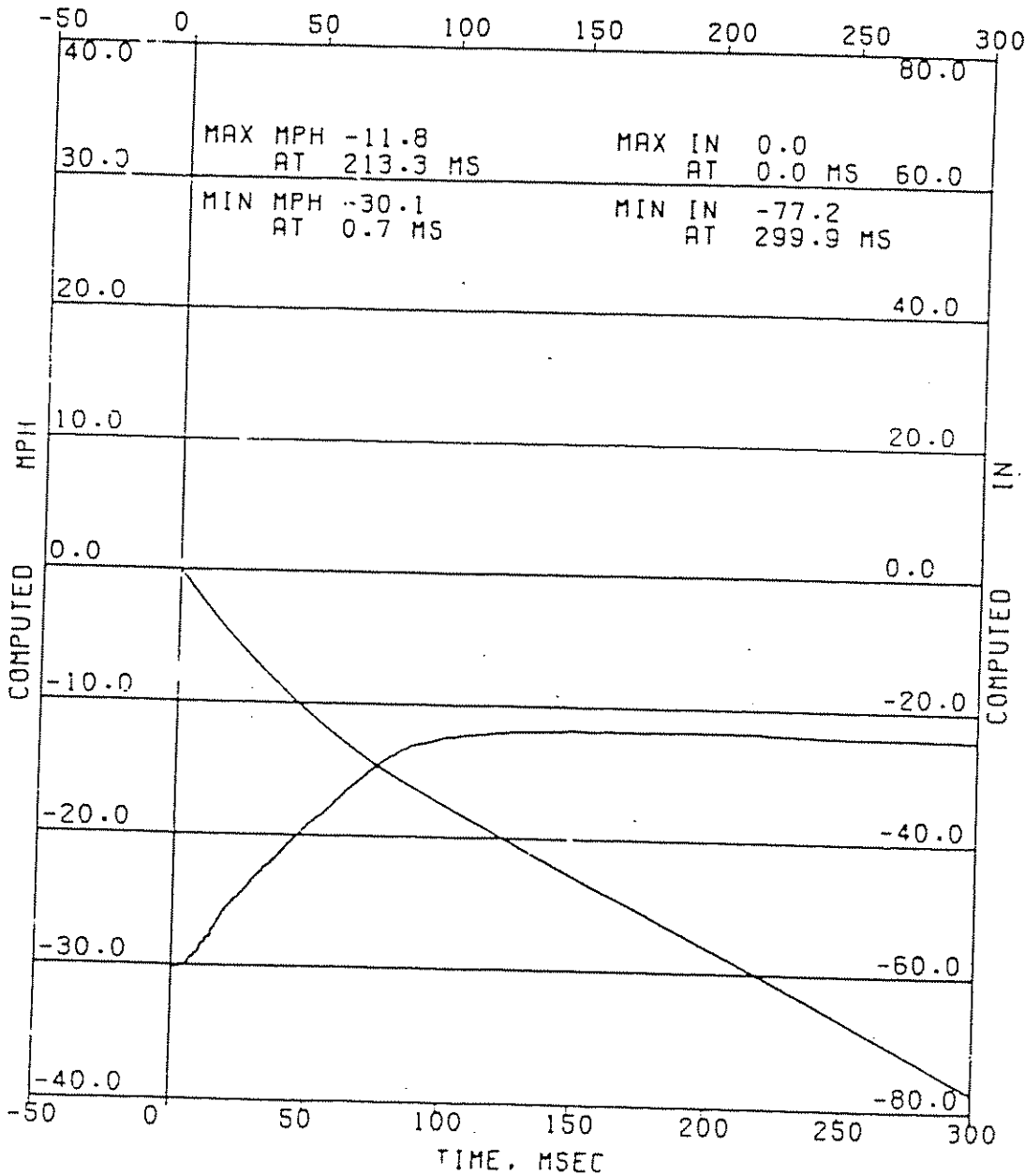
VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI. ITEM ZJB243
 1997 MVSS DEVELOPMENT - 301.
 CHANNEL 035 RT RAIL MBRK MID X 73968

PAGE 058
 OF 058

FILTER TYPE: OBDAS-III RESPONSE CORRECTION. CLASS 1000 FILTER(1650)
 FILTER CLASS: 1000

IMPACT ANALYSIS DEPT. 5320
 MAY 10.1996

DATA SET 05/09/96BH
 ERRATA 1



COMPUTED MPH
 COMPUTED IN

DC 03300

1098

INTER COMPANY CORRESPONDENCE

TO
DISTRIBUTION

DATE 05/24/96

FROM
B. D. CARLISLE

DEPARTMENT -- PLANT/OFFICE
5320 CTC

CIMS NUMBER
481-00-27

SUBJECT:
REAR DYNAMIC CRUSH ANALYSIS
VCCS927 30 MPH REAR BARRIER, ZJJ74, 5.2L MPI ITEM ZJ8243
1997 MVSS DEVELOPMENT - 301.
TEST DATE 05/03/96

TEST PURPOSE PRIMARY, 1997 USA 301 DEVELOPMENT.
OBSERVE FUEL SYSTEM INTEGRITY.

IMPACT TYPE TARGET SPEED: 30.1 MPH
DAMAGE LOCATION: REAR
BARRIER TYPE: REAR TYPE IV
BARRIER SURFACE: PLYWOOD

VEHICLE BODY CLASS: ZJ
CAR LINE: J
BODY: 74
ENGINE: 5.2 LITRE
ENGINE NOTE: ELECTRONIC FUEL INJECTION
TRANSMISSION: 4 SPEED AUTO 4x4
TRANS. NOTE:
VIN AS TESTED: 1J4EZ78Y2TC151272 MOD.
VIN AS BUILT: 1J4EZ78Y2TC151272 MOD.

TEST SPEED 30.1 MPH BY ELECTRONIC TRAP TIMER.

TEST WEIGHT (LBS) 4826 TOTAL, 2779 FRONT, 2047 REAR

OCCUPANTS LEFT FRONT, HYB II, BALLAST. AD-63
RESTRAINT-BELTS ONLY.
RIGHT FRONT, HYB II, BALLAST. AD-67
RESTRAINT-BELTS ONLY.

BUILD CONDITION 1996 PRODUCTION ZJ MODIFIED TO REPRESENT 1997.
5.2 LITRE (V8) ENGINE, 4 SPEED AUTO TRANS, 4x4.
POWER STEERING, ABS BRAKES, AIR CONDITIONING.
FULL CENTER CONSOLE AND OVERHEAD CONSOLE.
SUNROOF AND FULL ROOF RACK.
P225/70 R16 TIRES ON ALUMINUM RIMS & FULL SIZE
SPARE.
1997 FUEL SENDING UNIT AND 1997 FUEL TANK DESIGN.
FULL TRAILER HITCH, NO SKID PLATE, NO BRACKET.

TARGET WEIGHT (LBS) 4185 TOTAL, 2335 FRONT, 1849 REAR, REP MAX OPT WT.
FUEL AND BALLAST NOT INCLUDING OCCUPANTS OR LUGGAGE BALLAST.
21.5 GALLONS OF STODDARD SOLVENT.
300 LBS OF LUGGAGE BALLAST SECURED IN CARGO AREA.


TEST VCCS927 05/24/96 13.15 PAGE 1 OF 2

DC 03301

POST TEST REMARKS THERE WAS NO FUEL LEAKAGE DURING IMPACT, NOR DURING THE SUBSEQUENT THIRTY MINUTES. THERE WAS NO FUEL LEAKAGE DURING THE STATIC ROLLOVER.

DYNAMIC CRUSH, PITCH, AND REAR WHEEL MOTION RELATIVE TO THE FRONT SILL HAVE BEEN DETERMINED BY FILM ANALYSIS. TIME WAS BASED ON CAMERA TIMING DATA.

DYNAMIC CRUSH 19.6 +OR- 1 INCH AT 73. +OR- 5 MSEC.



L. G. PLATA



B. D. CARLISLE

GRAPHS - 4

G L O S S A R Y O F T E R M S

U S E D I N S T A N D A R D R E P O R T S

AD ANTHROPOMORPHIC DEVICE
ADT ANTHROPOMORPHIC TEST DEVICE
BASE COORD BASE COORDINATE SYSTEM
C/L CENTERLINE
CAR COORD CAR COORDINATE SYSTEM
CCW COUNTER CLOCKWISE
CORR-IN SEPARATION IN INCHES (MINUS INITIAL LENGTH)
CORR-MM SEPARATION IN MM (MINUS INITIAL LENGTH)
CORR-P CORRECTED (ZERØED) PITCH
CORR-R CORRECTED (ZERØED) ROLL
CORR-Y CORRECTED (ZERØED) YAW
CW CLOCKWISE
EFI ELECTRONIC FUEL INJECTOR
ENG ENGINE
ENGPY ENGINE PITCH AND YAW
FESH FRONT END SHEET METAL
FIDUCIAL REFERENCE POINT OR TARGET
FS FRONT SILL TARGET
FWD FORWARD
IP INSTRUMENT PANEL TARGET
LBS POUNDS
LCP.LQP LEFT C-POST & QUARTER PANEL TARGETS
LFS.LMS.LRS LEFT FRONT SILL, MID SILL, & REAR SILL TARGETS
LT LEFT
MS MID SILL TARGET
NORMALIZE PUT ON A COMMON BASIS
NOSE-DOWN LEADING END BELOW TRAILING
NOSE-UP LEADING END ABOVE TRAILING
PERF PERFORMANCE
REF REFERENCE
REL RELATIVE TO (ONE-DIMENSIONAL)
RCP.RQP RIGHT C-POST & QUARTER PANEL TARGETS
RFS.RMS.RRS RIGHT FRONT, MID, & REAR SILL TARGETS
ROLL-LEFT LEFT SIDE LOWER THAN RIGHT
ROLL-RIGHT RIGHT SIDE LOWER THAN LEFT
RS REAR SILL TARGET
RT RIGHT
SEP SEPARATION OF (THREE-DIMENSIONAL)
SYS SYSTEM
TBI THROTTLE BODY INJECTOR
TIME.MS TIME IN MILLISECONDS
U/B UNDERBODY
VS VERSUS
X LONGITUDINAL AXIS (INCREASING TOWARD TRAILING EDGE)
XF X-FILTERED
Y LATERAL AXIS (INCREASING TO THE RIGHT)
YAW-LEFT LEADING EDGE TO LEFT
YAW-RIGHT LEADING EDGE TO RIGHT
Z VERTICAL AXIS (INCREASING UPWARD)
ZERØED SHIFTED TO START AT ZERO
ZERØ-IN ZERØED INCHES
ZERØ-MM ZERØED MILLIMETERS

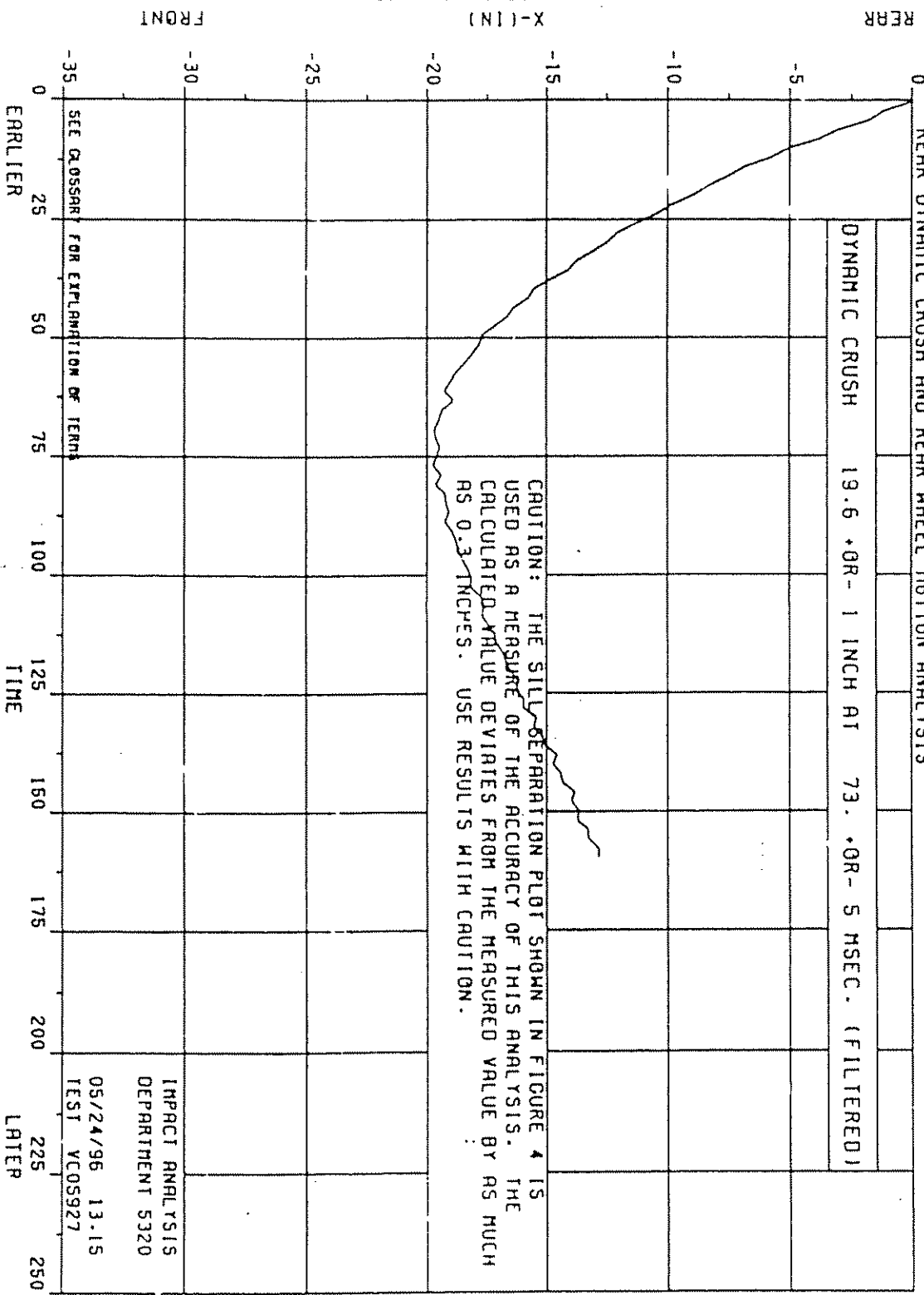
IMPACT ANALYSIS
DEPARTMENT 5320
05/24/96 13.15
TEST VC05927

DC 03303

VC05927 30 MPH REAR BARRIER. ZJJ74. 5.2L MPI ITEM ZJ8243
 1997 HVSS DEVELOPMENT - 301.

ZERGED X MOTION OF F. REL TO LFS IN BASE COORD SYS
 VERSUS TIME IN MILLISECONDS.

REAR DYNAMIC CRUSH AND REAR WHEEL MOTION ANALYSIS



CAUTION: THE SILL SEPARATION PLOT SHOWN IN FIGURE 4 IS
 USED AS A MEASURE OF THE ACCURACY OF THIS ANALYSIS. THE
 CALCULATED VALUE DEVIATES FROM THE MEASURED VALUE BY AS MUCH
 AS 0.3 INCHES. USE RESULTS WITH CAUTION.

IMPACT ANALYSIS
 DEPARTMENT 5320
 05/24/96 13.15
 TEST VC05927

FIGURE 1

ZERGED LONGITUDINAL MOTION

FRONT

REAR

0 25 50 75 100 125 150 175 200 225 250
 EARLIER TIME EVENT TIME LATER

VC05927 30 MPH REAR BARRIER. ZJ74. 5.2L MPI ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.

ZEROED Z OF WHEEL RELATIVE TO LFS IN CAR COORD
 VERSUS ZEROED X OF WHEEL RELATIVE TO LFS IN CAR COORD
 REAR DYNAMIC CRASH AND REAR WHEEL MOTION ANALYSIS

WHEEL VS LFS IN CAR COORD

SIDE VIEW

CAUTION: THE SILL SEPARATION PLOT SHOWN IN FIGURE 4 IS
 USED AS A MEASURE OF THE ACCURACY OF THIS ANALYSIS. THE
 CALCULATED VALUE DEVIATES FROM THE MEASURED VALUE BY AS MUCH
 AS 0.3 INCHES. USE RESULTS WITH CAUTION.

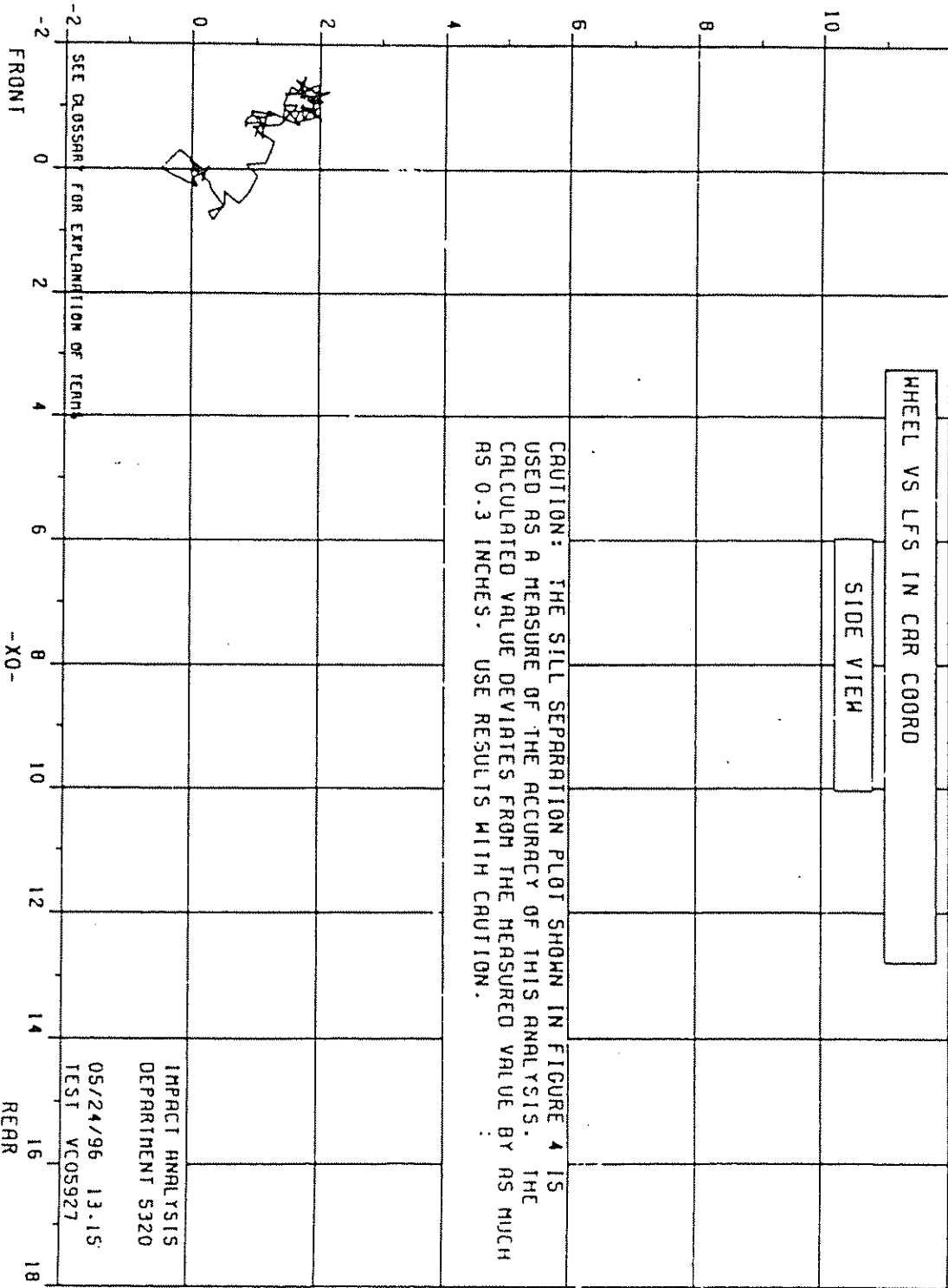


FIGURE 2

ZEROED VERTICAL MOTION (IN), NO FILTER

DOWN

UP

FRONT

REAR

ZEROED HORIZONTAL MOTION (IN) VS TIME (SEC)

VC05927 30 MPH REAR BARRIER, ZJ74, S-2L HPI ITEM ZJ8243
 1997 HVSS DEVELOPMENT - 301.

ZERGED PITCH OF LHS TO LFS IN BASE COORD SYSTEM
 VERSUS TIME IN MILLISECONDS
 REAR DYNAMIC CRUSH AND REAR WHEEL MOTION ANALYSIS

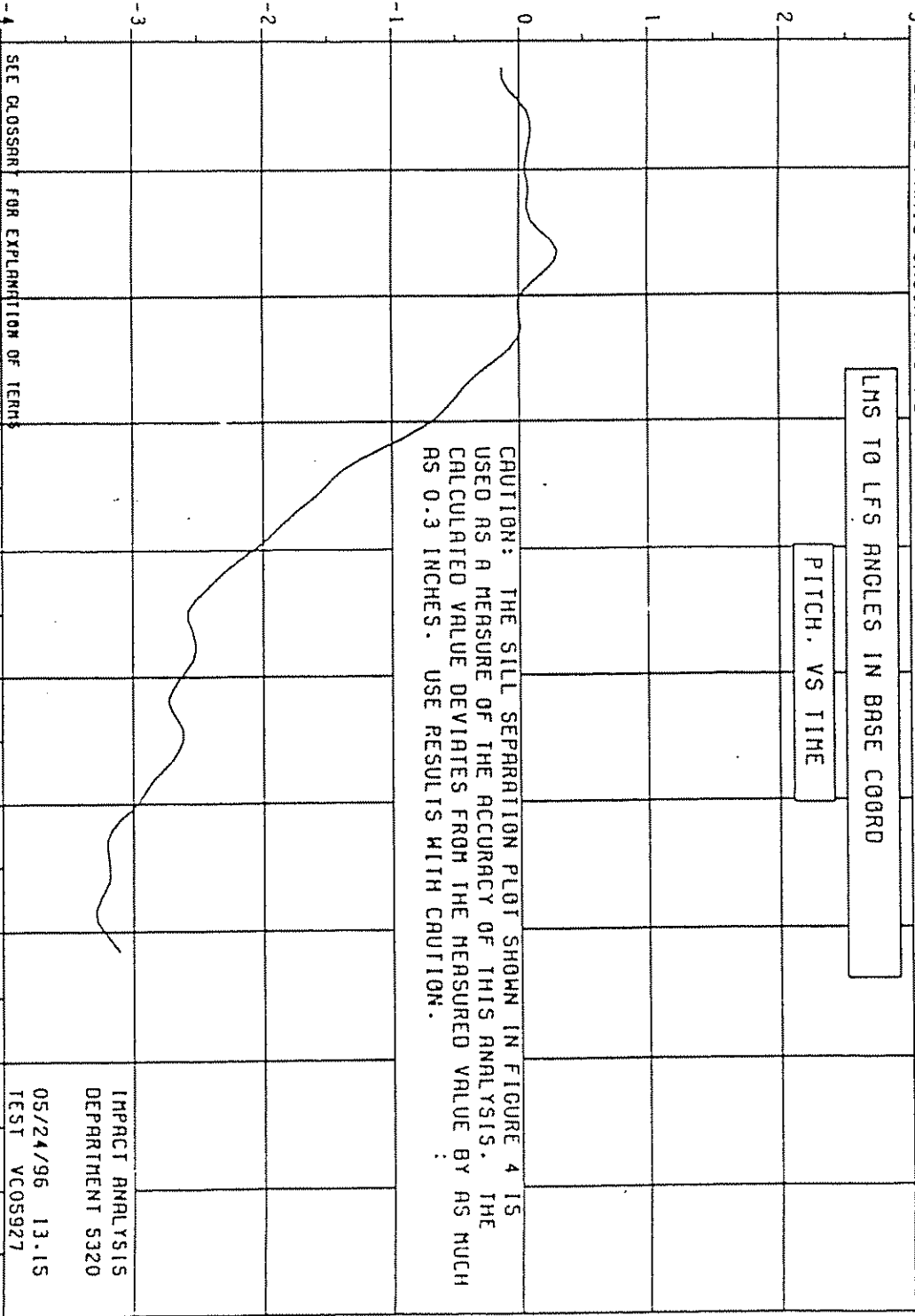


FIGURE 3

DEGREES CCM AROUND Y RELATIVE TO X (RT SIDE VIEW) 50HZ FILTER
NOSE-DOWN

VC05927 30 MPH REAR BARRIER. ZJ74. S.2L MPI ITEM ZJ8243
 1997 MVSS DEVELOPMENT - 301.

LMS TO LFS DISTANCE -29.95 INCHES (INITIAL DIST) (IN)
 VERSUS TIME IN HILISECONDS
 REAR DYNAMIC CRUSH AND REAR WHEEL MOTION ANALYSIS

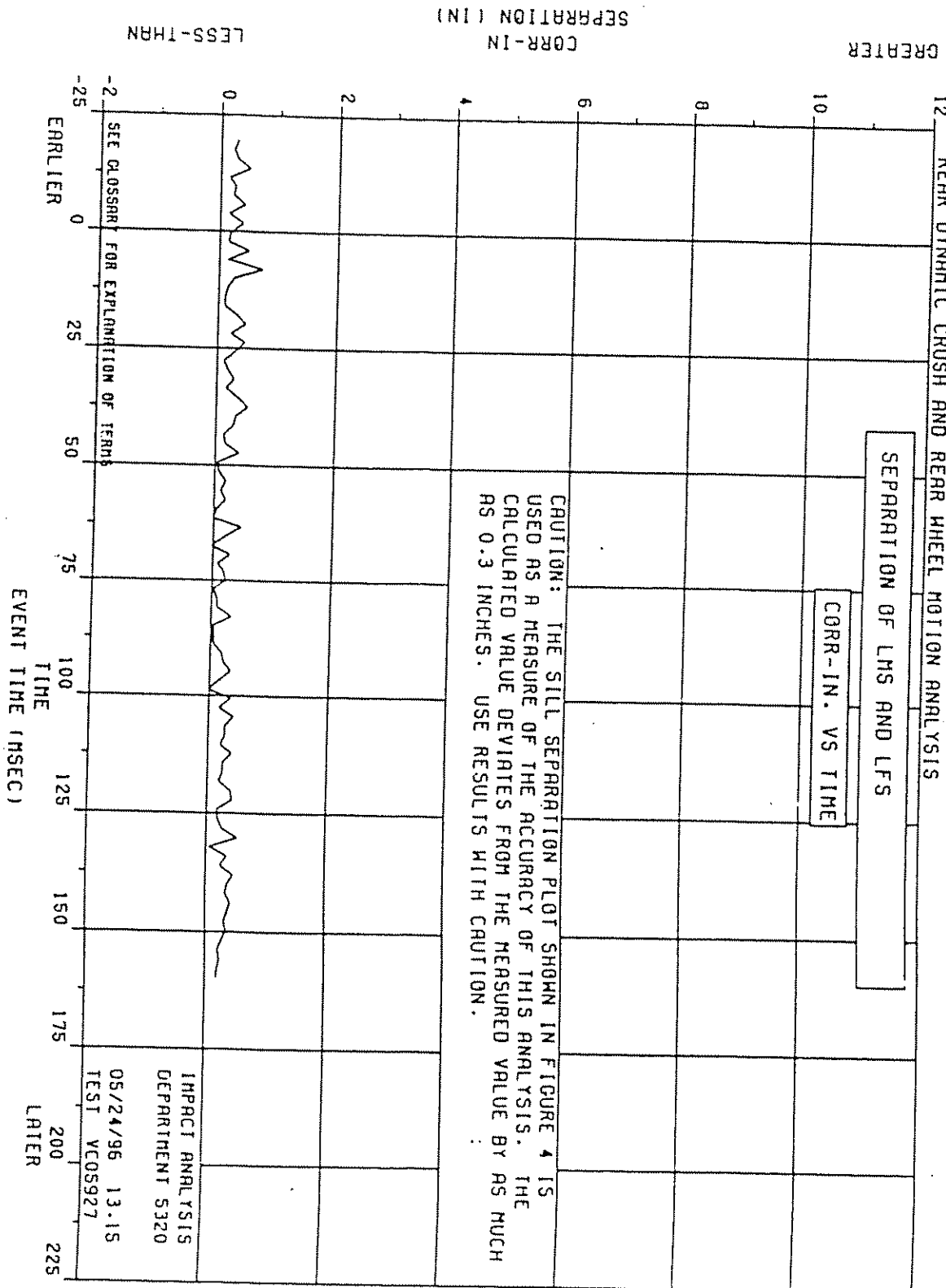
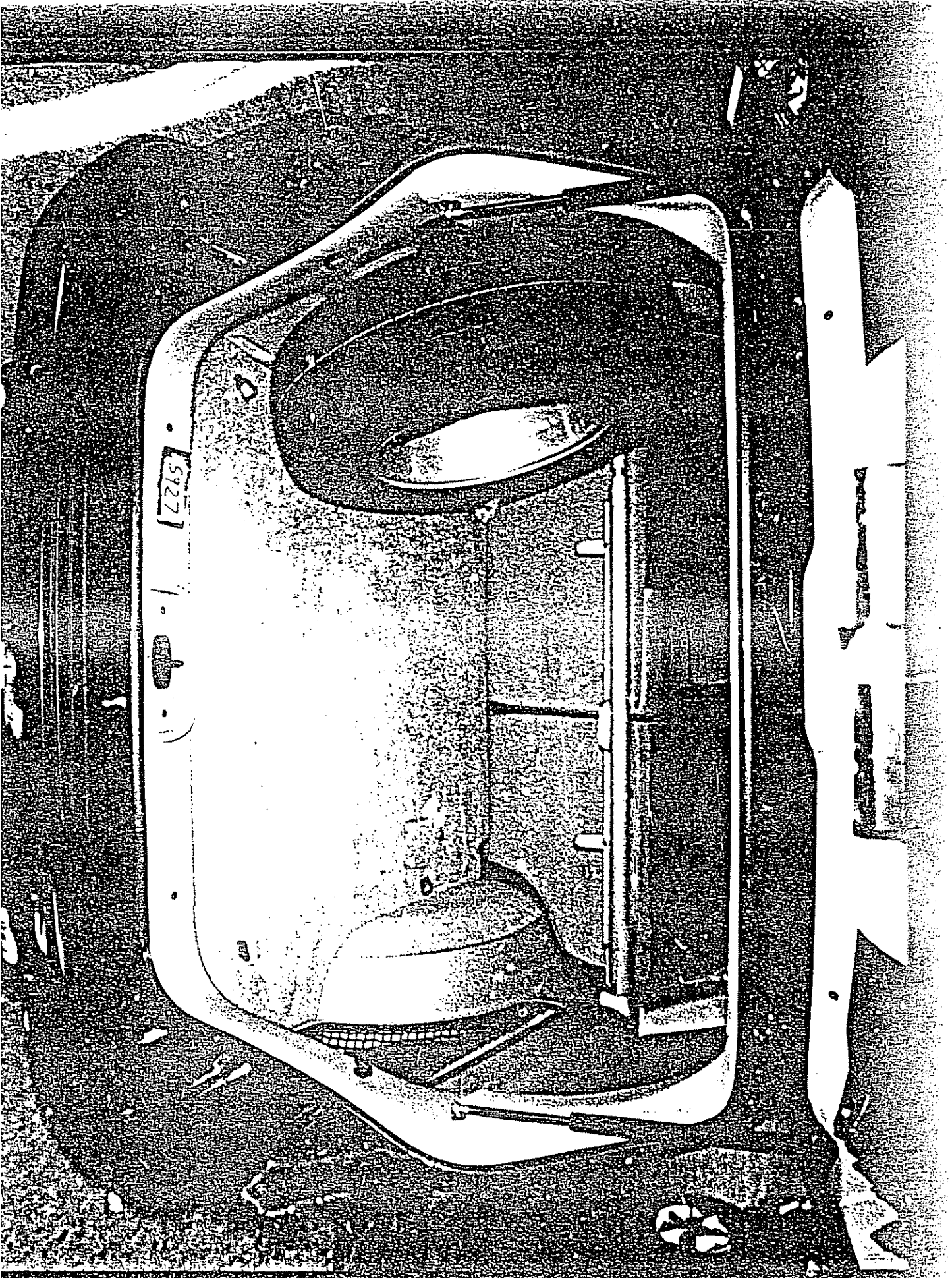
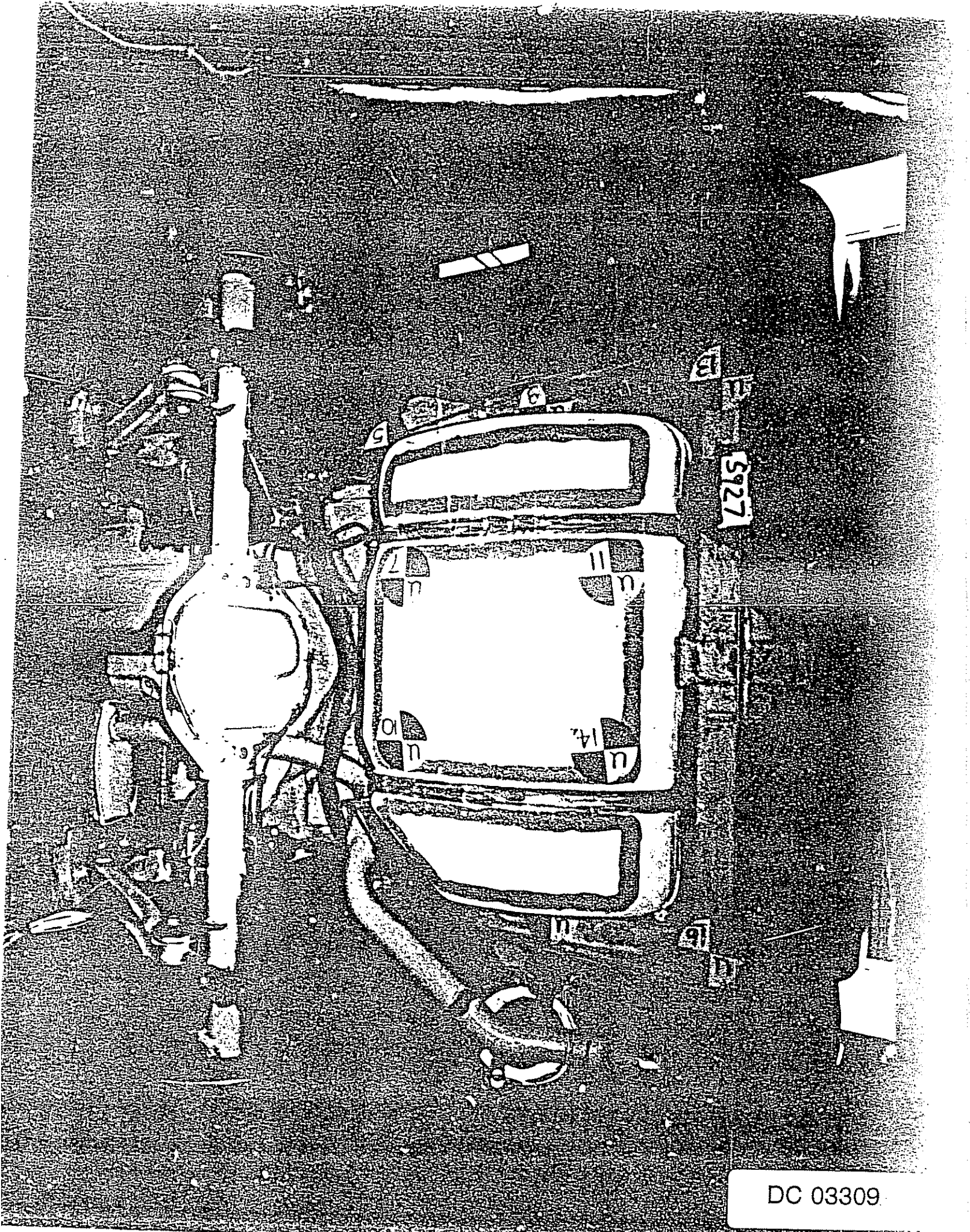


FIGURE 4



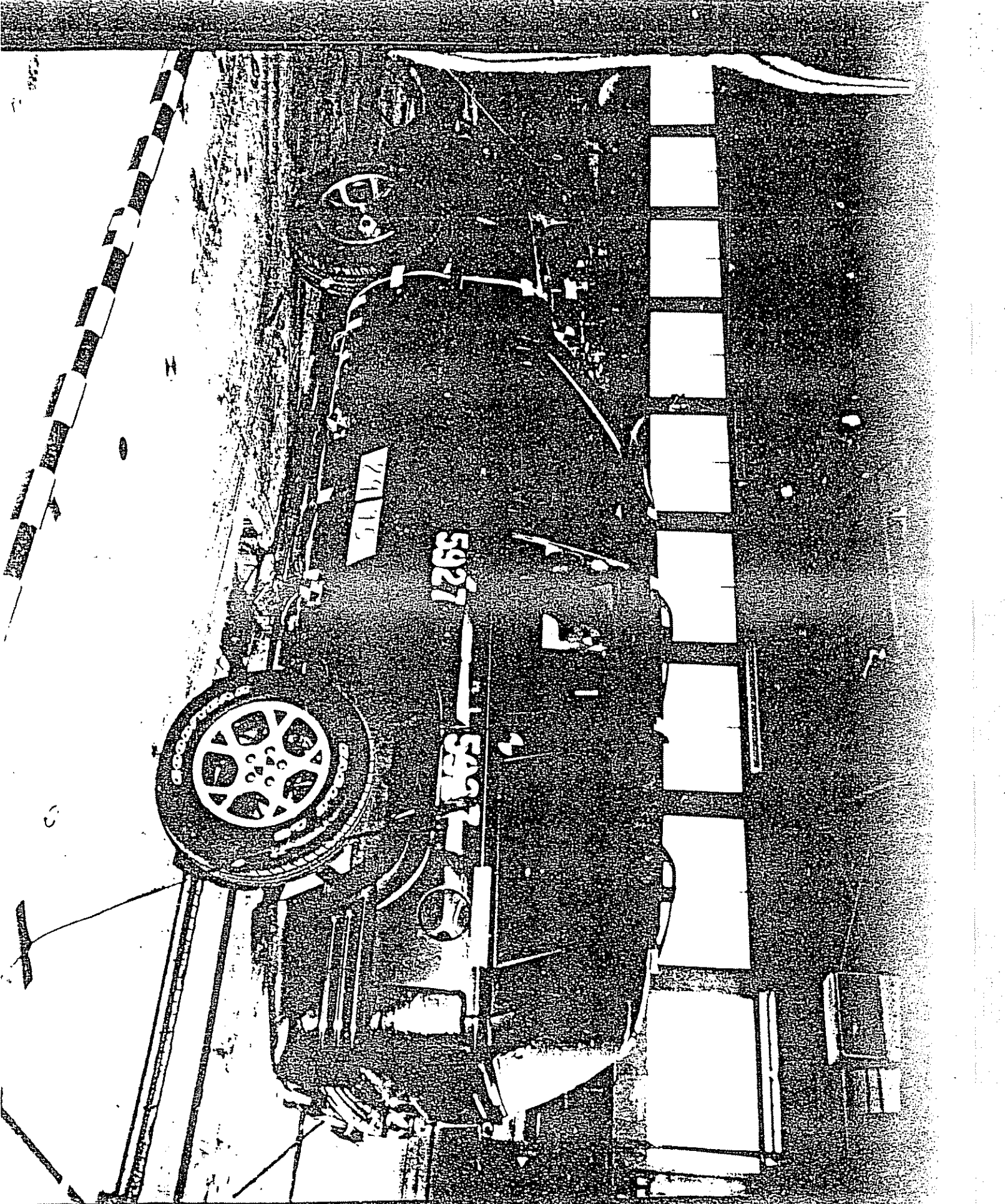
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DC 03308

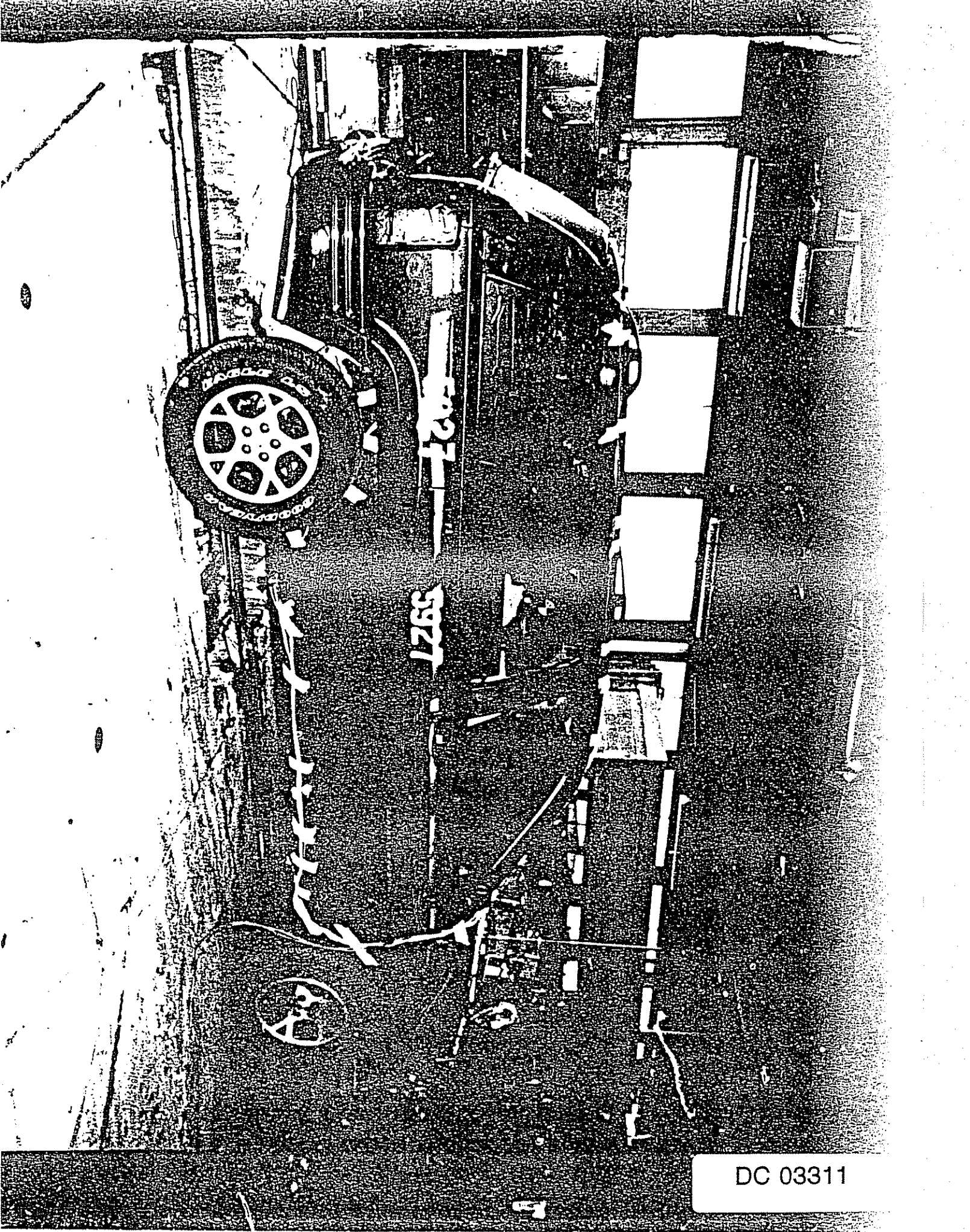


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U 14



DC 03310



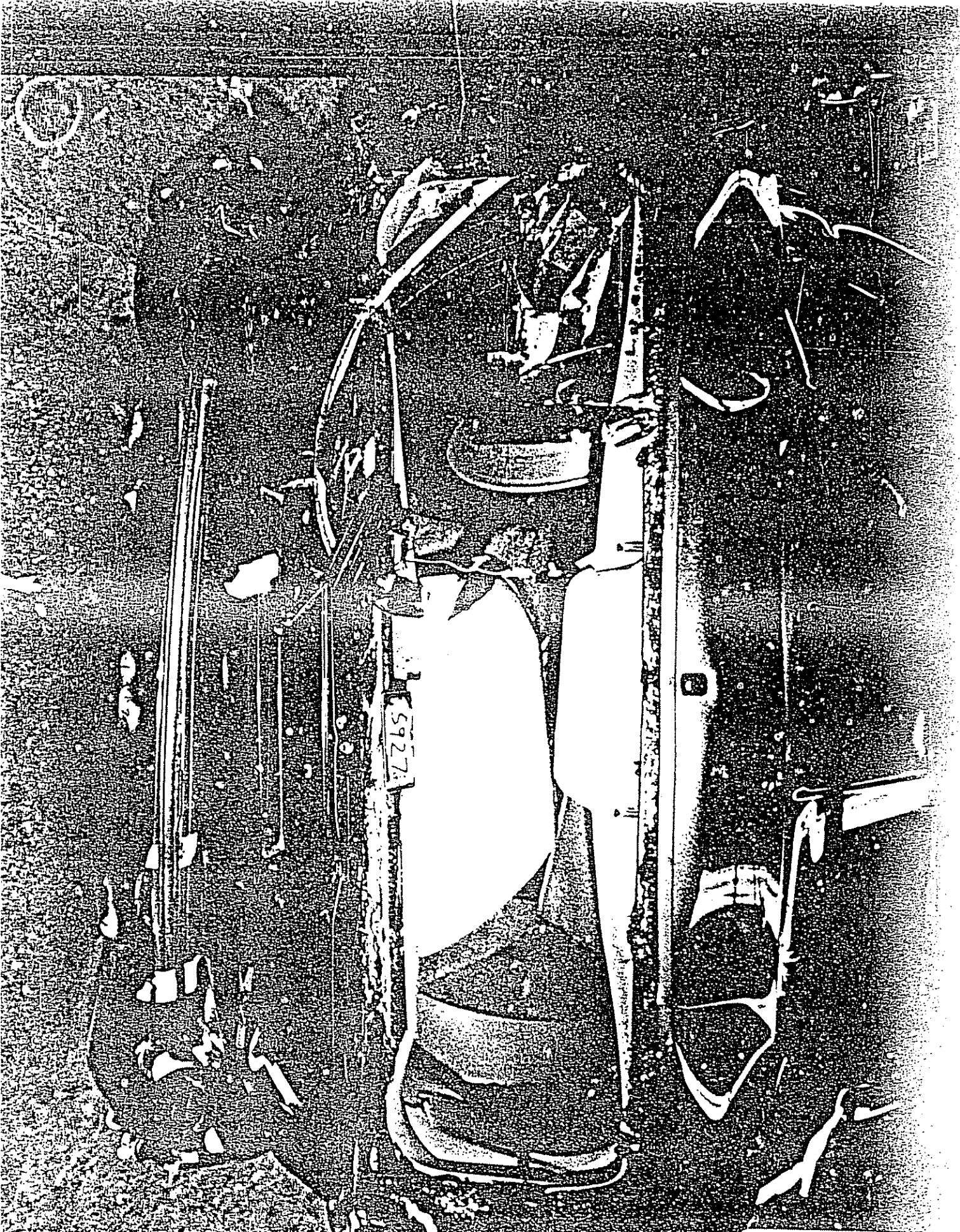
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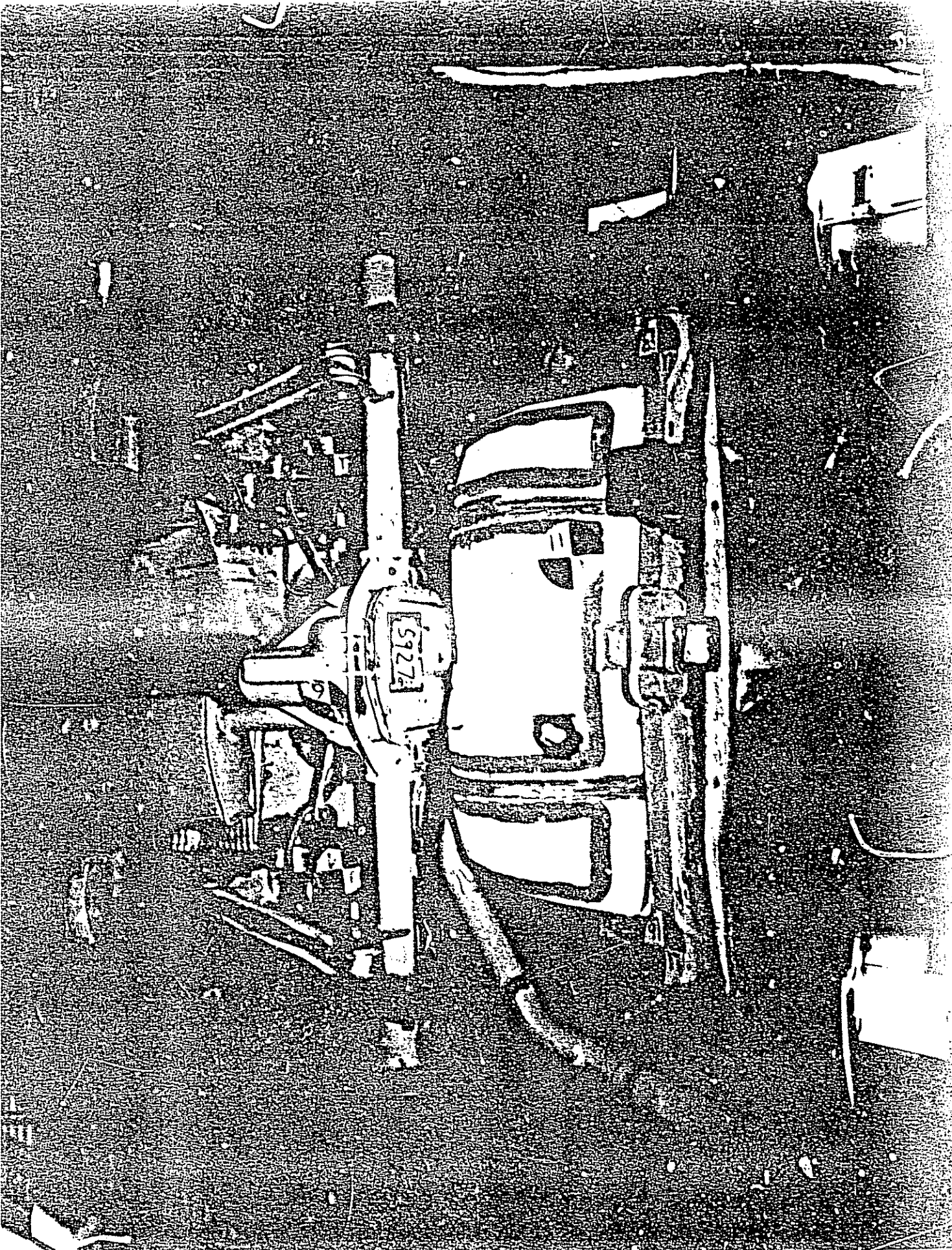


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5927A

DC 03313



DC 03314

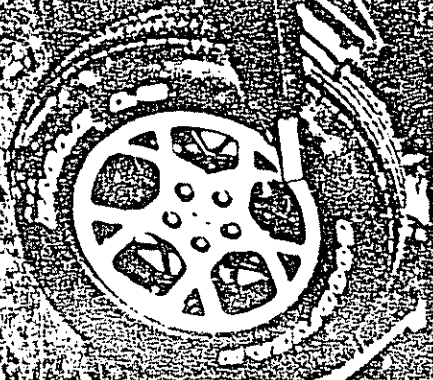
29/15

5927

15927



DC 03315

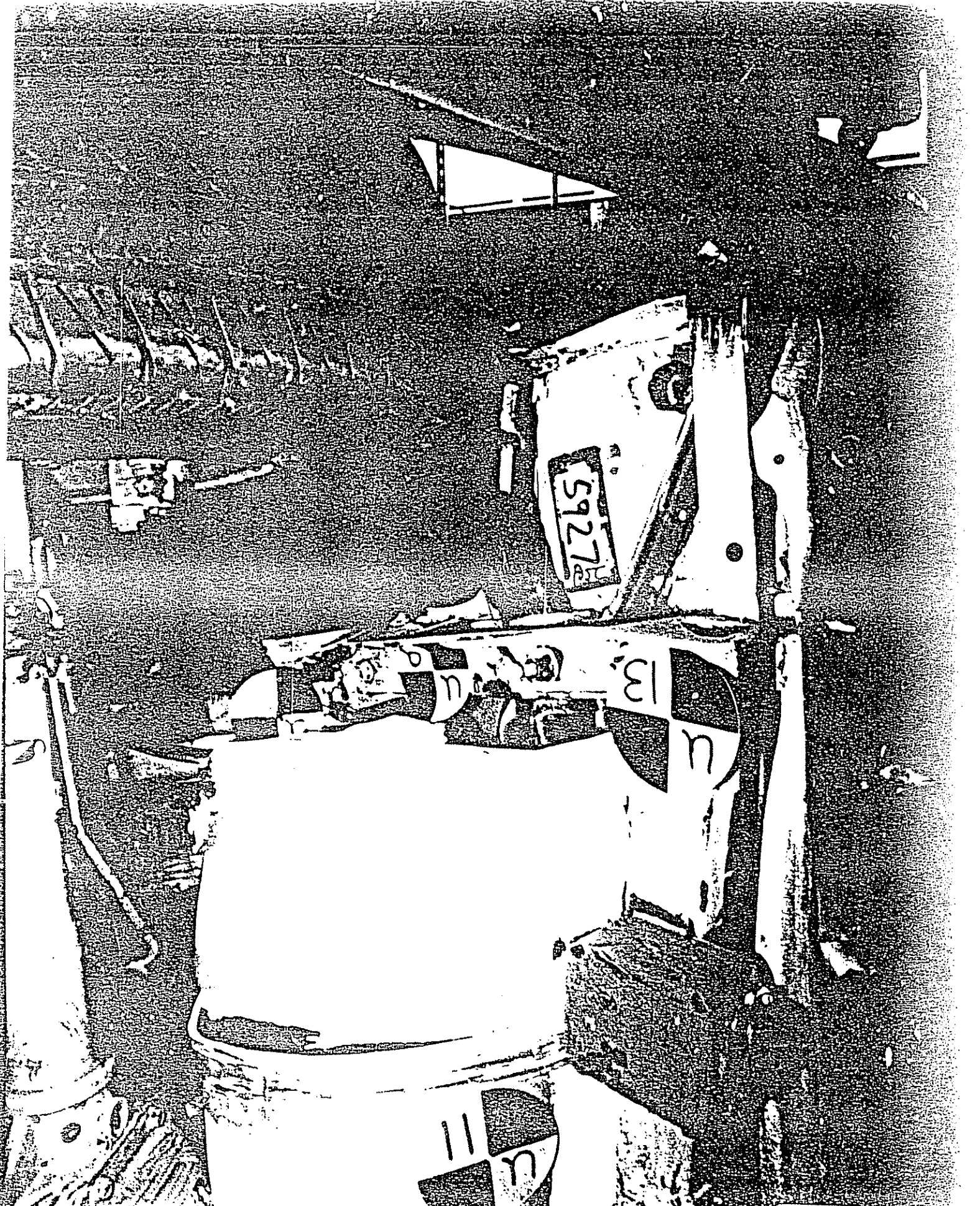


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5927



DC 03316



DC 03317