

**ES-2 - FULL SCALE VEHICLE TESTS
NCAP LEFT SIDE IMPACT**

**Ford Motor Company
2002 Ford Escape 4 door 4WD**

**PREPARED BY:
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BURLINGTON, WI 53105**



October 12, 2001

FINAL REPORT

**PREPARED FOR:
U.S. DEPARTMENT OF TRANSPORTATION
VOLPE NATIONAL TRANSPORTATION SYSTEM CENTER
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This final test report was prepared for the U.S. Department of Transportation, Volpe National Transportation System Center, under Contract No. DTRS57-98-D-00041.

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SECTION 1
PURPOSE AND TEST PROCEDURE

This Side Impact test was conducted as part of Contract No. DTRS57-98-D-00041, task order 6, sponsored by the U.S. Department of Transportation, Volpe National Transportation System Center. The purpose of this test was to evaluate the response of the ES-2 dummies in a 2002 Ford Escape 4 door 4WD when subjected to an NCAP left side impact.

MGA does not endorse or certify products. The manufacturer's name appears solely for identification purposes.

SECTION 2

SUMMARY OF SIDE IMPACT TEST

A 2002 Ford Escape 4 door 4WD was impacted on the left side by a Moving Deformable Barrier (MDB) which was moving forward in a 27° crabbed position to the tow road guidance system at a velocity of 62.0 kph (38.5 mph). The target vehicle was stationary and was positioned at an angle of 63° to the line of forward motion. The side impact test was conducted by MGA Research Corporation in Burlington, Wisconsin, on October 12, 2001. Pre- and post-test photographs of the test vehicle, the MDB and the side impact dummies (ES-2 front and CRABI left and right mid seat) are included in Appendix A.

Two ES-2 side impact dummies were placed in the left front and left rear designated seating positions according to instructions specified in the FMVSS 214 Side Impact Laboratory Test Procedure which is dated August 2, 1999 and Evaluation of Eurosid-1 Positioning Procedure Appendix A dated February 5, 1997. The side impact event was documented by ten high speed cameras. Camera locations and other pertinent camera information can be found in this report.

Appendix B contains the vehicle and dummy response data traces. A summary of the side impact dummy (ES-2) configuration and performance verification test data is shown in Appendix C. Dummy and vehicle calibration data can be found in Appendix D of this report.

Appendix E contains a copy of the dummy positioning procedure used, Appendix F contains the ES-2 peak responses, and Appendix G contains the ES-2 sign conventions.

The following table summarizes the results of the Left Side Impact test:

		Left Front	Left Rear
1) Head Performance Criteria			
< 1000	T1 (msec)	34.5	53.2
	T2 (msec)	86.1	208.2
	HPC	74	370
2) Thorax Performance Criteria			
2.1) Chest Deflection < 42 mm	Upper Rib Deflection	NVD	18.4
	Mid Rib Deflection	5.6	15.4
	Lower Rib Deflection	11.1	6.8
2.2) Viscous Criteria < 1.0 (m/sec)	Upper Rib	NVD	0.12
	Mid Rib	-0.04	0.09
	Lower Rib	0.10	0.04
3) Abdominal Protection Criterion			
Sum < 2500 N	Front Abdominal Force	231	327
	Mid Abdominal Force	408	406
	Rear Abdominal Force	731	375
	Sum of Abdominal Force	1339	1085
4) Pelvis Performance Criterion			
< 6000 N	Pubic Symphysis Force	3739	2636

NVD=No Valid Data Collected

HIC		Left Front	Left Rear
	T1 (msec)	43.5	57.2
	T2 (msec)	77.7	67.4
	T2 - T1 (msec)	34.2	10.2
	HIC	74	370

Fir Filtered	Left Front	Left Rear
Upper Rib Y (g's)	36.6	81.0
Mid Rib Y (g's)	79.5	65.7
Lower Rib Y (g's)	73.8	74.0
Lower Spine Y (g's)	50.0	42.6
Pelvis Y (g's)	79.2	68.2
TTI (g's)	65	62

Contacts	Left Front	Left Rear
Head (msec)	42.2	53.2
Arm (msec)	25.0	32.5
Rib (msec)	37.1	49.7
Pelvis (msec)	25.0	21.1

TEST NOTES

A complete data set, including all ES-2 instrumentation, can be found by accessing the electronic data from the U.S. Department of Transportation.

The following load cell channels were found to be bad during pre test calibration and inspection:

Driver T-12 - MX

The passenger T12 load cell was not available for use during this test.

SECTION 3
SIDE IMPACT DUMMY (ES-2) AND VEHICLE TEST DATA

DATA SHEET NO. 1**GENERAL TEST AND VEHICLE PARAMETER DATA**Test Vehicle: 2002 Ford Escape 4 doorTest Date: October 12, 2001**TEST VEHICLE INFORMATION**

Make	Ford
Model	Escape
Body Style	4 door
VIN	1FMYU04152KA09774
Color	Painted Orange
Odometer Reading	47 miles
Transmission	Automatic
Final Drive	4WD
Number of Cylinders	6
Engine Displacement	3.0 liters
Engine Placement	lateral

TEST VEHICLE OPTIONS

Front Airbags	yes
Side Airbags	no
Power Windows	yes
Power Steering	yes
Power Door Locks	yes
Tilt Wheel	yes
Air Conditioning	yes
Power Brakes	yes
Anti-lock Brakes	no
AM/FM	yes
Cruise Control	yes

DATA FROM CERTIFICATION LABEL

Manufactured By	Ford Motor Company
Date of Manufacture	8/01

DATA FROM TIRE PLACARD

Measured Parameter	Front	Rear
Maximum Tire Pressure (kPa)	207	207
Cold Pressure (kPa)	207	207
Recommend Tire Size	P235/70R16	P235/70R16
Tire Size on Vehicle	P235/70R16	P235/70R16
Tire Manufacturer	Firestone	Firestone

Measured Parameter	Front	Rear	Third	Total
Type of Seats	bucket	bench		
Number of Occupants	2	3		5
Capacity Wt. (VCW) (kg)				408
Cargo Weight (RCLW) (kg)				67.6

DATA SHEET NO. 1...(continued)
GENERAL TEST AND VEHICLE PARAMETER DATA

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

TEST VEHICLE WEIGHTS

	Units	As Delivered (UVW)			As Tested (ATW)		
		Front	Rear	Total	Front	Rear	Total
Left	kg	475.4	320.7		538.9	415.0	
Right	kg	462.2	314.3		463.1	378.8	
Ratio	%	59.6	40.4		55.8	44.2	
Totals	kg	937.6	635.0	1572.6	1002.0	793.8	1795.8

TARGET TEST WEIGHT CALCULATION

Measured Parameter	Units	Value
Total Delivered Weight (UVW)	kg	1572.6
Weight of 2 P572F Side Impact Dummies	kg	161.5
Rated Cargo/Luggage Weight (RCLW)	kg	67.6
Calculated Vehicle Target Weight (TVTW)	kg	1801.7

TEST VEHICLE ATTITUDES AND CG

	Units	LF	RF	LR	RR	CG (aft of front axle)
As Delivered	mm	806	816	838	845	1058
As Tested	mm	794	806	804	815	1158
Fully Loaded	mm	793	809	804	822	

GENERAL TEST VEHICLE DATA

Measurement Description	Units	Value
Test Vehicle Wheel Base	mm	2620
Total Vehicle Length at Left Side	mm	3708
Total Vehicle Length at Centerline	mm	4396
Total Vehicle Length at Right Side	mm	3708
Weight of Ballast in Cargo Area	kg	0

TEST VEHICLE VERTICAL IMPACT LINE DATA

Measurement Description	Units	Value
Test Vehicle Wheel Base	mm	2620
Target Impact Point Aft of Front Axle	mm	370
Actual Impact Point Aft of Front Axle	mm	392

DATA SHEET NO. 1...(continued)

GENERAL TEST AND VEHICLE PARAMETER DATA

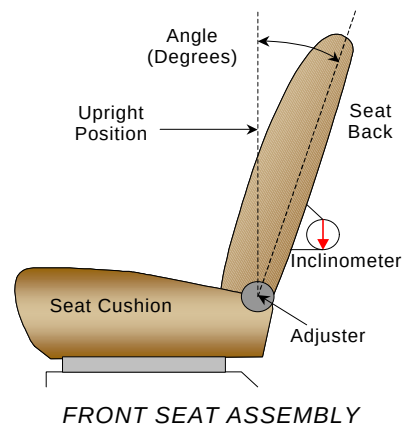
Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

NORMAL DESIGN RIDING POSITION

Driver seat back angle: 5th latch, first as 0
(16.8 deg)

Passenger seat back angle: non adjustable



SEAT FORE/AFT POSITIONS

Driver seat fore/aft total travel: 240 mm electric

Rear passenger seat fore/aft total travel: non adjustable

Driver seat fore/aft position: 120 mm

Rear passenger seat fore/aft position: non adjustable

SEAT BELT UPPER ANCHORAGE

The D ring was placed in the full up position.

STEERING COLUMN ADJUSTMENT

The steering column was placed in the mid position.

DATA SHEET NO. 2
TEST VEHICLE SUMMARY OF RESULTS

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

TEST VEHICLE WEIGHTS

	Units	As Delivered (UVW)			As Tested (ATW)		
		Front	Rear	Total	Front	Rear	Total
Left	kg	475.4	320.7		538.9	415.0	
Right	kg	462.2	314.3		463.1	378.8	
Weight Ratio	%	59.6	40.4		55.8	44.2	
Totals	kg	937.6	635.0	1572.6	1002.0	793.8	1795.8

MAXIMUM EXTERIOR STATIC CRUSH

Level	Measured Parameter	Units	Maximum Crush	Above Ground
Level 1	Sill Top Height	mm	126	382
Level 2	Occupant H-Point	mm	276	675
Level 3	Mid Door	mm	302	736
Level 4	Window Sill	mm	197	1042
Level 5	Window Top	mm	46	1548
N/A	Maximum Penetration	mm	302	736

INSTRUMENTATION

Left Front ES-2 Channels	70
Left Rear ES-2 Channels	66
Vehicle Structure Channels	31
MDB Channels	7
Total	174

DATA SHEET NO. 3**MOVING DEFORMABLE BARRIER (MDB) SUMMARY OF RESULTS**Impactor: FMVSS 214 Side Impact BarrierTest Date: October 12, 2001**MDB SPECIFICATIONS (mm)**

Measurement Description	Length
Overall Width of Framework Carriage	1252
Overall Length Including Honeycomb Face	4115
Wheel base of Framework Carriage	2590
C.G. Location aft of Front Axle	1105

MDB WEIGHTS

	Units	Front Axle	Rear Axle	Total
Left	kg	395.1	293.8	
Right	kg	385.7	287.4	
Ratio	%	57.3	42.7	
Totals	kg	780.8	581.2	1362.0

SPEED AND IMPACT ANGLE DATA

Measured Parameter	Units	Requirement	Value
Trap No. 1 Velocity (Primary)	km/h	61.1 - 62.8	62.0
Trap No. 2 Velocity (Redundant)	km/h	61.1 - 62.8	61.8
MDB CL to Target Vehicle CL	degrees	88.5 to 91.5	90.3

MAXIMUM STATIC CRUSH OF HONEYCOMB FACE (mm)

Vertical Location			From Centerline		Max. Crush
Row	Description	Height	Distance	Direction	
A	Center of Bumper	813	800	Right	234
B	Top of Bumper	686	800	Right	172
C	Mid Level	533	800	Right	126
D	Top of Stack	432	800	Left	163

MDB INSTRUMENTATION AND CAMERAS

Accelerometers	5
Contact Switches	2
High Speed Cameras	2

DATA SHEET NO. 4**POST TEST OBSERVATIONS**Test Vehicle: 2002 Ford Escape 4 doorTest Date: October 12, 2001**TEST DUMMY INFORMATION AND CONTACT POINTS**

Description	Left Front	Left Rear
Dummy Type / Serial No.	ES-2/009	ES-2/010
Head Contact	side header, headrest	C post
Upper Torso Contact	door trim panel	door trim panel
Lower Torso Contact	door trim panel	door trim panel
Left Knee Contact	door trim panel	door trim panel
Right Knee Contact	left knee	left knee

POST TEST DOOR OPENING AND SEAT TRACK INFORMATION

Description	Front	Rear
Left Side Door Opening	remained closed	remained closed
Right Side Door Opening	remained closed	remained closed
Left Side Seat Movement	none	none
Left Side Seat Back Failure	none	none

POST TEST STRUCTURAL OBSERVATIONS

Critical Areas of Performance	Observations and Conclusions
Pillar Performance	No failures
Sill Separation	None noted
Windshield Damage	Broke
Window Damage	left side broke
Other Notable Effects	fuel filler door came open

AIRBAG DEPLOYMENT

	Driver	Right Front	Left Rear
Front	yes	yes	
Side			

MDB LEFT EDGE IMPACT POINT DATA

Measured Parameter	Units	Requirement	Value
Horizontal Offset	mm	+/- 50	22 rear
Vertical Offset	mm	+/-20	3 up

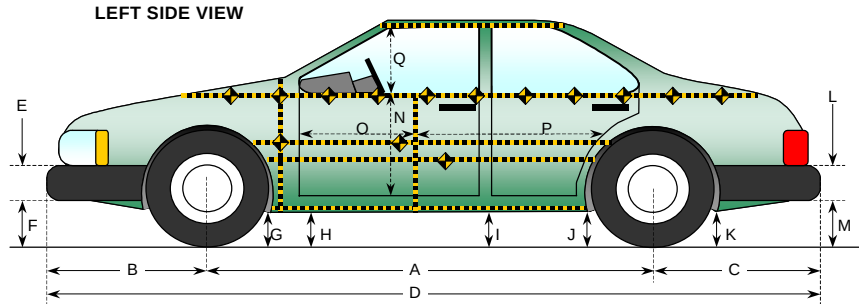
SECTION 4
OCCUPANT AND VEHICLE INFORMATION

DATA SHEET NO. 5

VEHICLE PRE-TEST AND POST-TEST MEASUREMENTS

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



All Measurements in mm

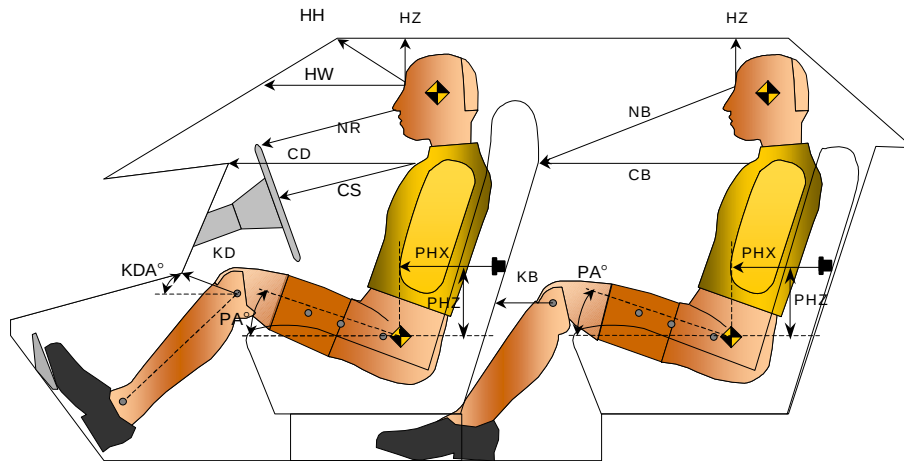
Code	Measurement Description	Pre-Test	Post-Test	Difference
A	Wheelbase	2620	2600	-20
B	Front Axle to FSOV	882	894	12
C	Rear Axle to RSOV	894	882	-12
D	Total Length at Centerline	4396	4376	-20
E	Front Bumper Thickness	198	198	0
F	Front Bumper Bottom to Ground	509	524	15
G	Sill Height at Front Wheel Well	248	244	-4
H	Sill Height at Front Door Leading Edge	268	248	-20
I	Sill Height at "B" Pillar	280	288	8
J1	Sill Height at Rear Wheel Well	284	298	14
J2	Pinch Weld Height at Rear Wheel Well	282	292	10
K	Sill Height Aft of Rear Wheel Well	334	352	18
L	Rear Bumper Thickness	125	125	0
M	Rear Bumper Bottom to Ground	524	540	16
N	Sill Height to Window Bottom Sill	692	613	-79
O	Front Door Leading Edge to Impact CL	797	787	-10
P	Rear Door Trailing Edge to Impact CL	1177	1057	-120
Q	Front Window Opening	500	486	-14
R	Right Side Length	3708	3717	9
S	Left Side Length	3708	3665	-43
T	Vehicle Width at "B" Post	1739	1531	-208

DATA SHEET NO. 6

ES-2 LONGITUDINAL CLEARANCE DIMENSIONS

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



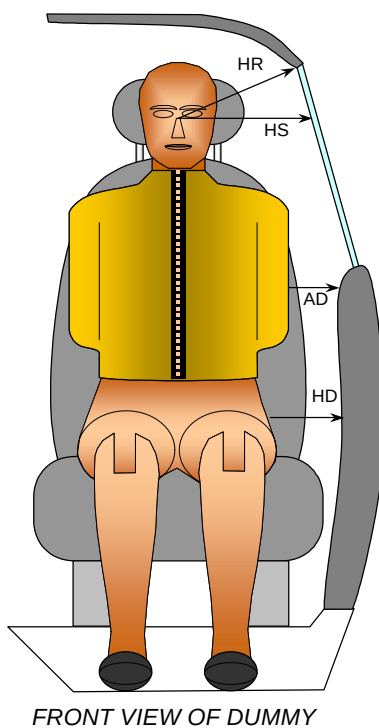
Driver Code	Pass. Code	Measurement Description	Left Front 009		Left Rear 010	
			Length(mm)	Angle(°)	Length(mm)	Angle(°)
HH		Head to Header	406			
HW		Head to Windshield	572			
HZ	HZ	Head to Roof	177		175	
NR	NB	Nose to Rim/Nose to Seatback	482		640	
CD	CB	Chest to Dash or Seatback	571		562	
CS		Chest to Steering Wheel	363			
KDL	KBL	Left Knee to Dash or Seatback	141	0.0	223	0.0
KDR	KBR	Right Knee to Dash or Seatback	139	0.0	225	0.0
PA	PA	Pelvic Angle (Longitudinal)		21.6		21.6
PA	PA	Pelvic Angle (Lateral)		1.9		0.7
SA	SA	Spine Angle (Longitudinal)		26.4		25.4
SA	SA	Spine Angle (Lateral)		1.6		1.1
PHX	PHX	H-Point to Striker (X-Axis)	225		252	
PHZ	PHZ	H-Point to Striker (Z-Axis)	86		266	

DATA SHEET NO. 7

ES-2 LATERAL CLEARANCE DIMENSIONS

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



Code	Measurement Description	Units	Left Front 009	Left Rear 010
HR	Head to Side Header	mm	238	253
HS	Head to Side Window	mm	321	345
AD	Arm to Door	mm	84	114
HD	H-Point to Door	mm	160	166

DATA SHEET NO. 8

DUMMY POSITIONING

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

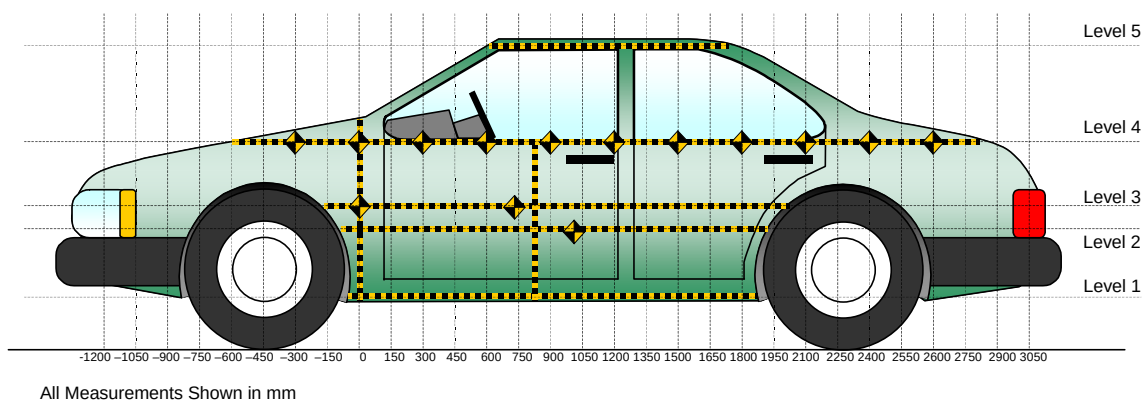
	Left Front S/N 009	Left Front S/N 009	Left Rear S/N 010	Left Rear S/N 010
	H-Point	Dummy	H-Point	Dummy
HP to Floor Z (mm)	218	228	56	68
HP to Hinge X (mm)	719	729	636	640
HP to Sill Y (mm)	131	143	147	159
HP to Striker X (mm)	347	340	452	451
HP to Dash X (mm)	510	518	582	585
HP to Header Z (mm)	792	789	770	768
H-POINT MACHINE (deg)				
Left Knee	120		120	
Right Knee	118		128	
Left Foot	123		139	
Right Foot	84		136	
Left Leg (mm)	130		92	
Right Leg (mm)	127		90	
Hip Angle	100		105	
Back Angle	24.5		25	

DATA SHEET NO. 9

VEHICLE SIDE MEASUREMENTS

Test Vehicle: 2002 Ford Focus 4 door

Test Date: October 12, 2001



LEFT SIDE VIEW

Measurements are taken with vehicle in the as tested condition.

Measurements along the vertical 800 mm.

Level	Measurement Description	Units	Height Above Ground
5	Window Top	mm	1548
4	Window Sill	mm	1042
3	Mid Door	mm	736
2	Occupant H-Point	mm	675
1	Axle Centerline Height (or Sill Top)	mm	382

DATA SHEET NO. 10

VEHICLE EXTERIOR CRUSH PROFILES

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

	Pre-Test					Post-Test					Difference				
	1	2	3	4	5	1	2	3	4	5	1	2	3	4	5
-900				350					360					10	
-750				320					333					13	
-600				304					317					13	
-450				289					304					15	
-300				282					295					13	
-150				274					289					15	
0				271					297					26	
150	287	241	243	267		326	455	445	319		39	214	202	52	
300	323	239	240	265		436	503	500	320		113	264	260	55	
450	323	236	239	262		444	505	514	339		121	269	275	77	
600	323	235	238	260	458	449	508	521	348	499	126	273	283	88	41
750	323	235	237	259	444	445	509	526	358	293	122	274	289	99	-151
900	323	234	235	258	442	440	510	523	370	309	117	276	288	112	-133
1050	323	234	235	259	445	438	505	520	386	326	115	271	285	127	-119
1200	324	234	236	258	444	430	502	538	455	346	106	268	302	197	-98
1350	323	235	236	260	444	420	507	530	427	484	97	272	294	167	40
1500	323	236	236	262	447	410	486	514	400	467	87	250	278	138	20
1650	320	236	237	263	448	402	464	485	372	453	82	228	248	109	5
1800	267	236	240	265	453	382	432	458	345	438	115	196	218	80	-15
1950				269	453				326	499				57	46
2100				273	454				320	497				47	43
2250				278	462				343	498				65	36
2400				285	465				336	503				51	38
2550				288	474				330	500				42	26
2700				298					325					27	
2850				313					330					17	
3000															

Reference plane is parallel to test vehicle longitudinal centerline.

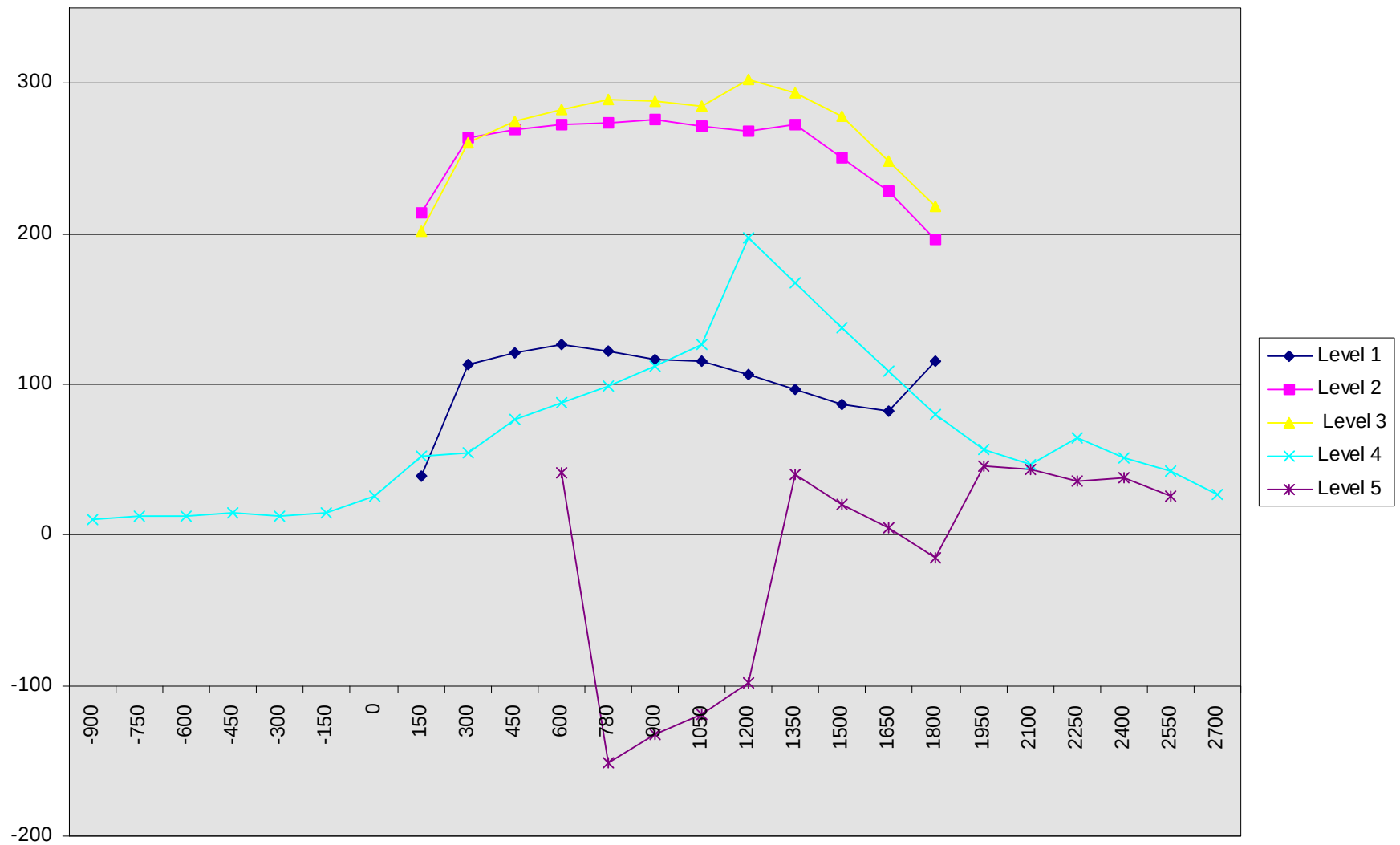
Given dimensions = Reference plane to car body.

DATA SHEET NO. 10...(continued)

VEHICLE EXTERIOR CRUSH PROFILES

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

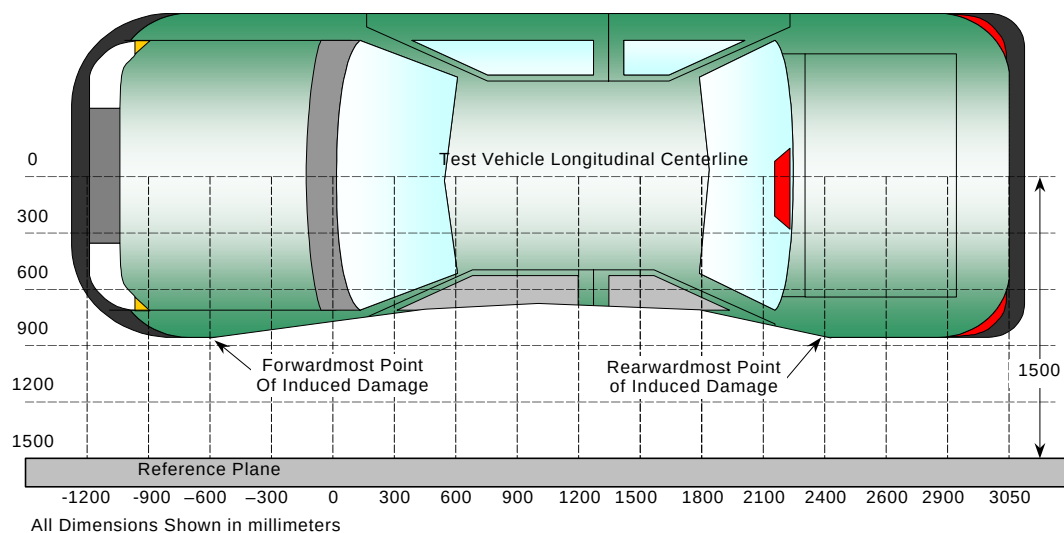


DATA SHEET NO. 11

VEHICLE DAMAGE PROFILE DISTANCES

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



TOP VIEW

Damage Profile Distances

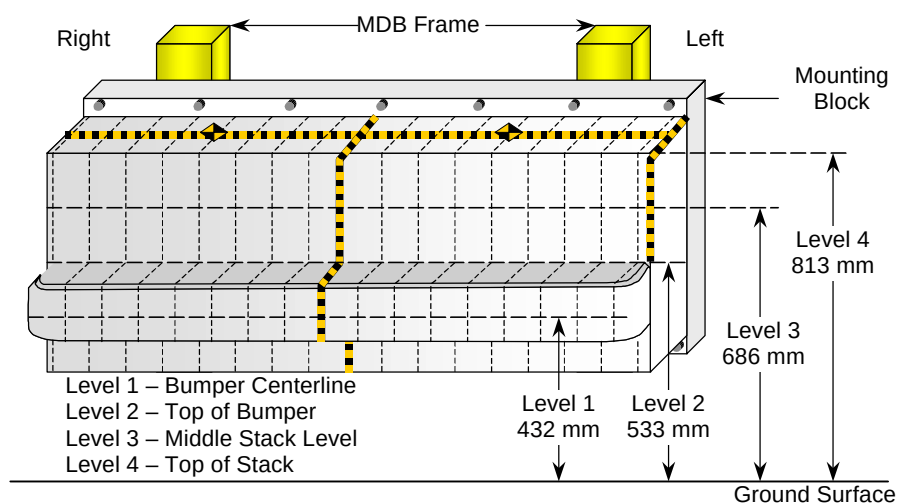
DPD	Distance from Impact Point in mm	Level	Pre-Test (mm)	Post-Test (mm)	Max Static Crush (mm)
1	2850 mm	4	318	330	12
2	2110 mm	4	273	316	43
3	1320 mm	3	236	529	293
4	580 mm	3	238	512	274
5	-140 mm	4	274	287	13
6	-900 mm	4	350	360	10

DATA SHEET NO. 12

DEFORMABLE BARRIER HONEYCOMB FACE STATIC CRUSH

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



DEFORMABLE BARRIER STATIC CRUSH

Stack Level	Distance Right of Center								C _L	Distance Left of Center							
	800	700	600	500	400	300	200	100		100	200	300	400	500	600	700	800
4	94	77	50	26	25	30	27	31	34	41	55	63	72	85	99	127	163
3	126	78	68	84	46	46	60	39	41	34	33	35	36	41	48	65	105
2	172	167	157	148	140	138	127	129	124	119	117	115	112	107	105	105	112
1	234	232	226	219	204	203	199	200	192	190	188	183	178	177	176	183	184

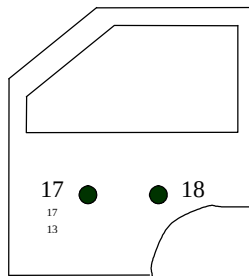
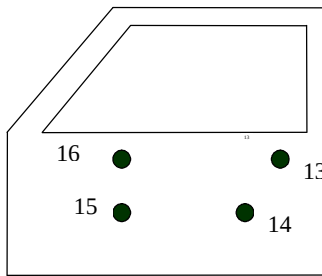
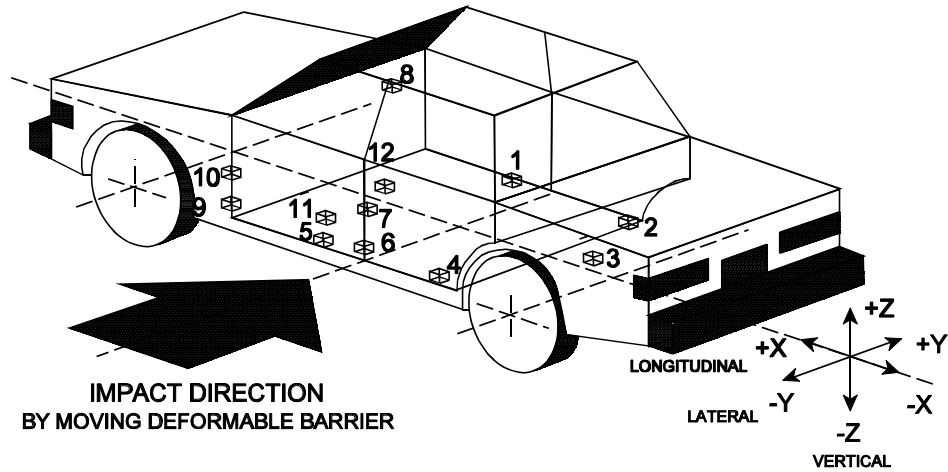
All Dimensions in mm

DATA SHEET NO. 13

VEHICLE ACCELEROMETER LOCATIONS AND DATA SUMMARY

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



No.	Location
1	Right Side Sill at Front Seat
2	Right Side Sill at Rear Seat
3	Rear Floorpan Above Axle
4	Left Side Sill at Rear Door
5	Left Side Sill at Front Door
6	Left Lower B Post
7	Left Mid B Post
8	Left Upper B Post
9	Left Lower A Post
10	Left Mid A Post
11	Driver Seat Track
12	Vehicle CG

No.	Location
13	Left Front Door @ Mid Rib
14	Left Front Door @ Pelvis
15	Left Front Door @ Knee
16	Left Front Door @ Arm
17	Left Rear Door @ Mid Rib
18	Left Rear Door @ Pelvis
19	Left Rear Door @ Knee
20	Left Rear Door @ Arm
21	Left Seat Frame
22	Right Seat Frame
23	Right Rear Occupant Compartment

DATA SHEET NO. 13...(continued)

VEHICLE ACCELEROMETER LOCATION AND DATA SUMMARY

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

VEHICLE ACCELEROMETER PEAK DATA AND PRE-TEST LOCATIONS

Loc. No.	Accelerometer Location	Long. (X) Maximums (g's) (CFC 60)		Lat. (Y) Maximums (g's) (CFC 60)		Vert. (Z) Maximums (g's) (CFC 60)		Resultant (g's) (CFC 60)
		Pos.	Neg.	Pos.	Neg.	Pos.	Neg.	Max.
1	Right Side Sill at Front Seat	4.8	6.9	36.9	2.9	4.8	8.4	37.4
2	Right Side Sill at Rear Seat	4.8	6.6	47.1	3.4	7.8	8.4	47.3
3	Rear Floorpan Above Axle	3.7	11.8	30.3	3.3	6.4	6.0	30.8
4	Left Side Sill at Rear Door			47.0	4.2			
5	Left Side Sill at Front Door			60.6	8.2			
6	Left Lower B Post			38.8	9.0			
7	Left Mid B Post			146.9	54.6			
8	Left Upper B Post			60.8	21.4			
9	Left Lower A Post			86.9	14.5			
10	Left Mid A Post			22.8	2.2			
11	Driver Left Seat Track			90.3	83.1			
12	Vehicle CG	1.9	7.5	31.3	2.4	10.7	15.2	32.2
13	Left Front Door @ Mid Rib			110.9	103.8			
14	Left Front Door @ Pelvis *			181.8	19.1			
15	Left Front Door @ Knee			247.5	181.7			
16	Left Front Door @ Arm			174.3	157.1			
17	Left Rear Door @ Mid Rib			67.3	50.4			
18	Left Rear Door @ Pelvis			87.5	114.6			
19	Left Rear Door @ Knee			161.0	289.1			
20	Left Rear Door @ Arm			117.5	127.2			
21	Left Driver Seat Frame			154.9	56.1			
22	Right Driver Seat Frame			144.9	54.7			
23	Right Rear Occupant Compartment			41.5	2.6			

* No valid data collected after 20 msec

DATA SHEET NO. 13...(continued)

VEHICLE ACCELEROMETER LOCATION AND DATA SUMMARY

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

VEHICLE ACCELEROMETER COORDINATES

Loc. No.	Description	Coordinates (mm)*		
		X	Y	Z
1	Right Side Sill at Front Seat	2439	692	312
2	Right Side Sill at Rear Seat	1517	694	319
3	Rear Floorpan Above Axle	872	0	624
4	Left Side Sill at Rear Door	1509	-694	328
5	Left Side Sill at Front Door	2414	-692	305
6	Left Lower B Post	1939	-673	417
7	Left Mid B Post	1911	-707	1014
8	Left Upper B Post	1856	-553	1624
9	Left Lower A Post	2933	-676	411
10	Left Mid A Post	2959	-761	1106
11	Driver Left Seat Track	2118	-534	502
12	Vehicle CG	2386	0	398
13	Left Front Door @ Mid Rib	2179	-743	1018
14	Left Front Door @ Pelvis	2242	-742	647
15	Left Front Door @ Knee	2603	-746	810
16	Left Front Door @ Arm	2421	-744	938
17	Left Rear Door @ Mid Rib	1214	-729	1098
18	Left Rear Door @ Pelvis	1332	-724	834
19	Left Rear Door @ Knee	1692	-722	886
20	Left Rear Door @ Arm	1483	-746	1094
21	Left Driver Seat Frame	1921	-537	976
22	Right Driver Seat Frame	1921	-214	981
23	Right Rear Occupant Compartment	1672	0	514

Reference Points X - Rear Bumper (+ Forward)
 Y - Vehicle Centerline (+ to right)
 Z - Ground Level (+ up)

DATA SHEET NO. 14

MDB ACCELEROMETER LOCATIONS AND DATA SUMMARY

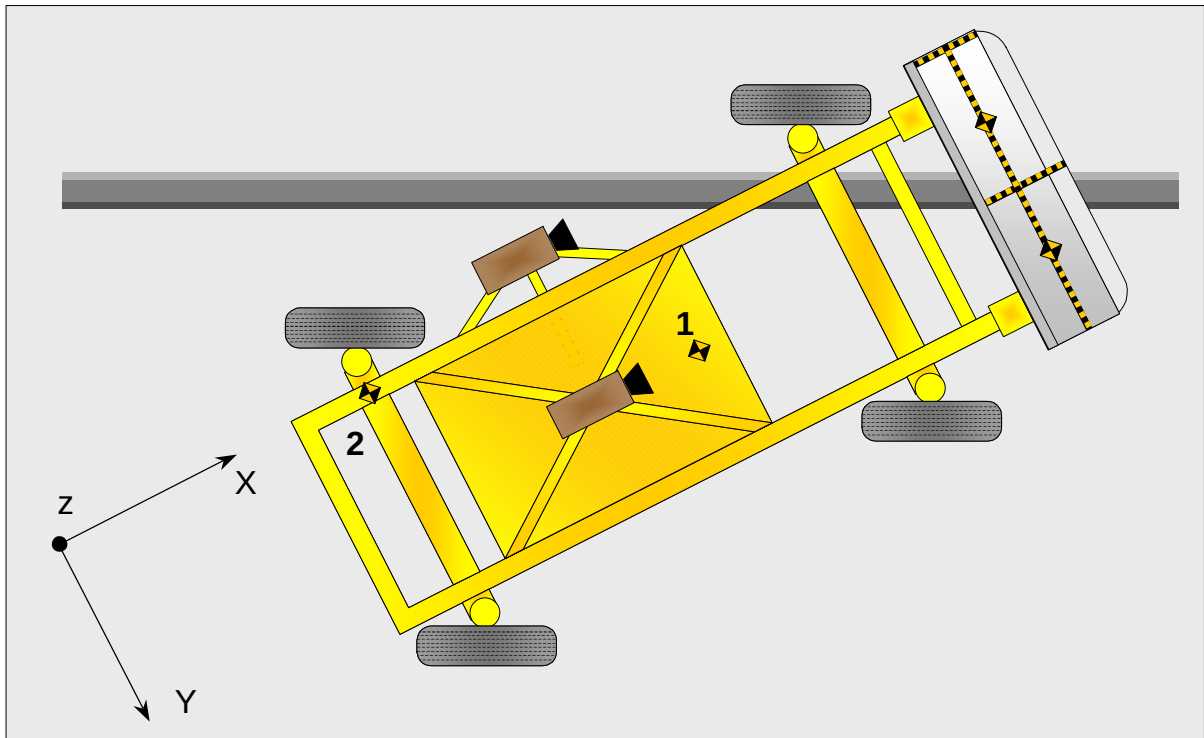
Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001

MDB ACCELEROMETER PEAK DATA AND LOCATIONS

Loc. No.	Accelerometer Location	Measurement (mm)			Peak Values (G's)				
		X	Y	Z	Axis	Max	Time	Min	Time
1	MDB CG	-1092	0	483	X	1.6	149	19.1	44
					Y	2.8	64	9.6	36
					Z	25.7	59	23.3	22
					RES	29.6	38		
2	MDB Rear	-2591	-625	622	X	2.2	120	22.8	38
					Y	6.6	33	2.2	128

Reference Points
 X - MDB Front Axle
 Y - MDB Centerline
 Z - Ground Plane

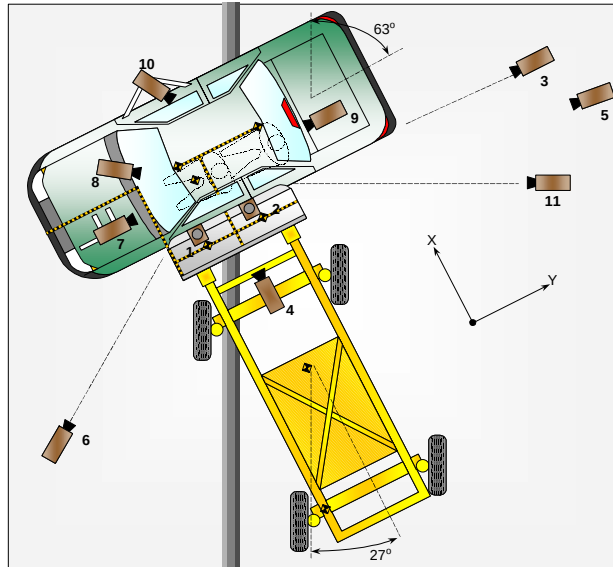


DATA SHEET NO. 15

HIGH SPEED CAMERA LOCATIONS AND DATA

Test Vehicle: 2002 Ford Escape 4 door

Test Date: October 12, 2001



No.	Camera View	Location (mm)			Lens (mm)	Film Speed (fps)
		X	Y	Z		
1	Overhead Overall	-140	1210	5000	8	NR
2	Overhead Close-up	-500	-260	5000	50	NR
3	Right LoCam	-500	10600	1950	35	532
4	MDB Onboard, Centerline of Impact				13	1010
5	MDB Impact				25	909
6	Left Side Overall	-100	-5220	1870	25	1031
7	Vehicle Onboard Front SID, Front				13	503
8	Vehicle Onboard Front SID, Hip to Door				13	506
9	Vehicle Onboard Rear SID, Rear				13	513
10	Vehicle Onboard Rear SID, Hip to Door				13	513
11	Real Time				17	32

Reference Points
X - + Forward of Impact
Y - +Right of Impact
Z - + Up from Ground

NR - No Run

APPENDIX A

PHOTOGRAPHS

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Photo No. A-2 - Post-Test Front View of Test Vehicle



Photo No. A-3 - Pre-Test Rear View of Test Vehicle



Photo No. A-4 - Post-Test Rear View of Test Vehicle

A-5



Photo No. A-5 - Pre-Test Left Side View of Test Vehicle



Photo No. A-6 - Post-Test Left Side View of Test Vehicle



Photo No. A-7 - Pre-Test MDB Positioned Against Vehicle (left side)



Photo No. A-8 - Pre-Test MDB Positioned Against Vehicle (right side)



Photo No. A-9 - Pre-Test MDB Positioned Against Vehicle Overhead View



Photo No. A-10 - Post-Test MDB and Vehicle (left side)



Photo No. A-11 - Post-Test MDB and Vehicle (right side)

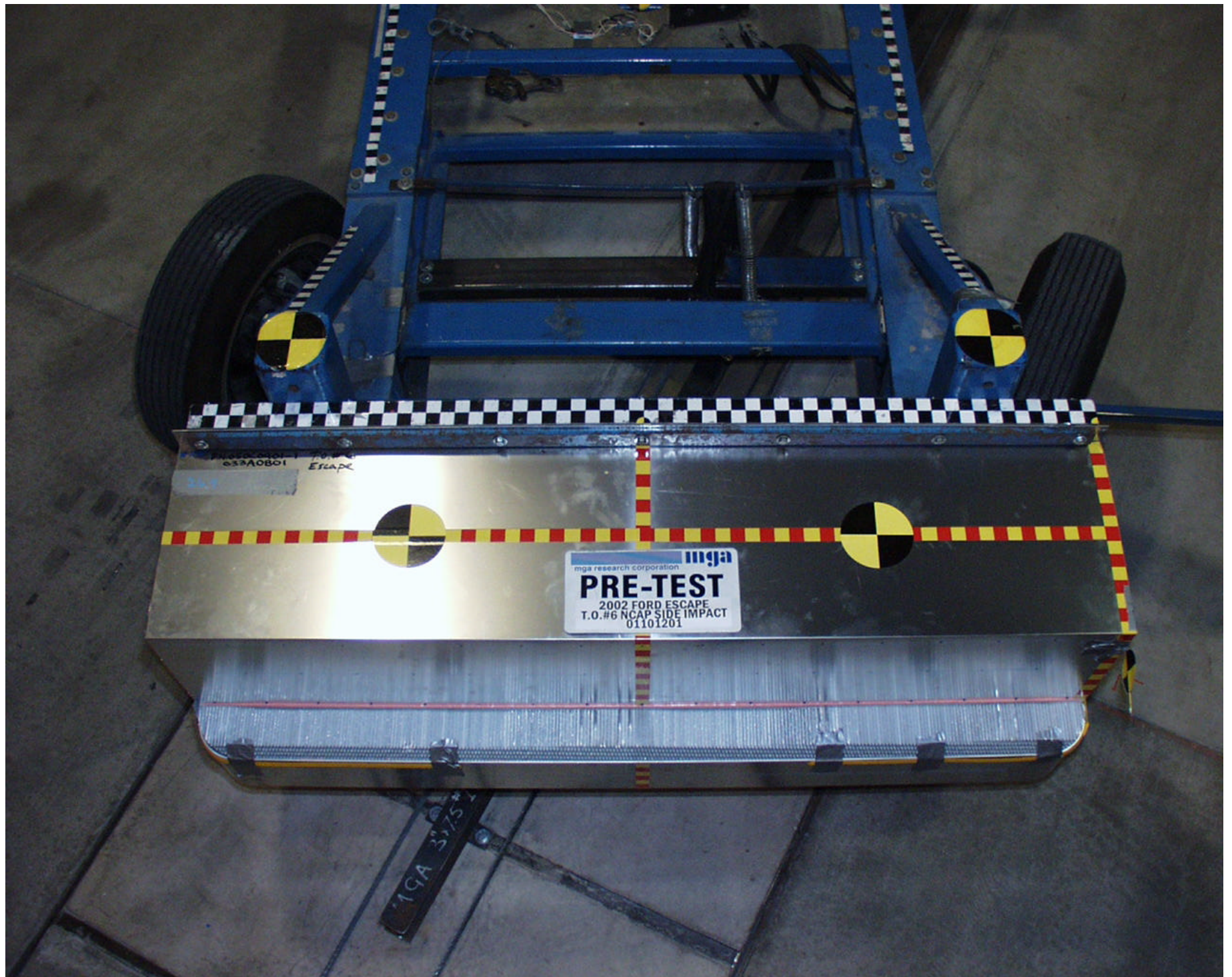


Photo No. A-12 - Pre-Test MDB Top View

A=13



Photo No. A-13 - Post-Test MDB Top View

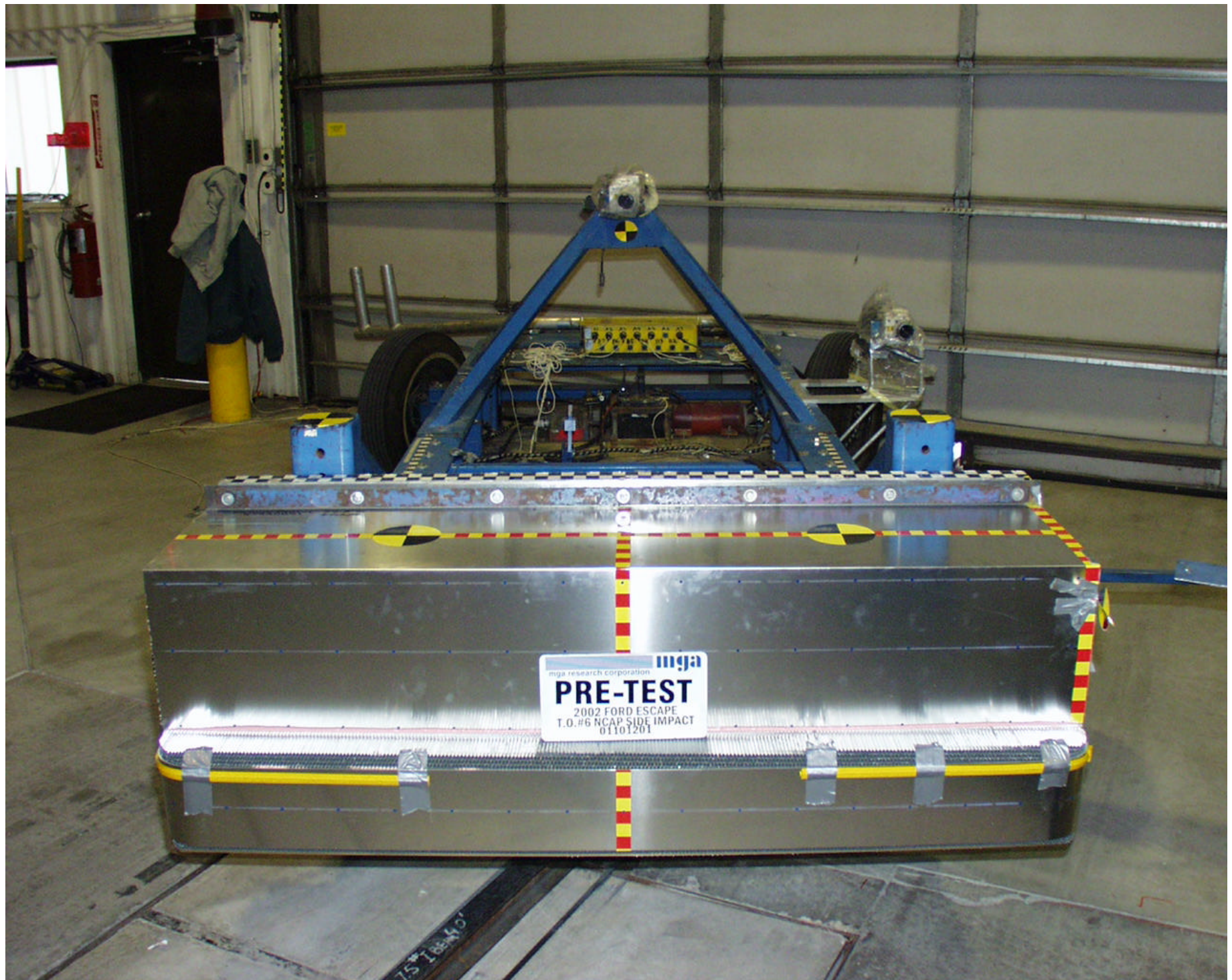


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Photo No. A-15 - Post-Test MDB Front View



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Photo No. A-17 - Post-Test MDB Right Side View



Photo No. A-18 - Pre-Test MDB Left Side View



Photo No. A-19 - Post-Test MDB Left Side View

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Photo No. A-20 - Pre-Test Driver Dummy Right Side View



Photo No. A-21 - Post-Test Driver Dummy Right Side View



Photo No. A-22 - Pre-Test Driver Dummy Left Side View



Photo No. A-23 - Post-Test Driver Dummy Left Side View



Photo No. A-24 - Pre-Test Driver Dummy Left Side View (Door Open)



Photo No. A-25 - Pre-Test Driver Dummy Shoulder and Door Top View



Photo No. A-26 - Post-Test Driver Dummy Shoulder and Door Top View



Photo No. A-27 - Pre-Test Rear Passenger Left Side View



Photo No. A-28 - Post-Test Rear Passenger Left Side View



Photo No. A-29 - Pre-Test Rear Passenger Right Side View

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Photo No. A-30 - Post-Test Rear Passenger Right Side View



Photo No. A-31 - Pre-Test Rear Passenger Shoulder and Door Top View

Photo No. A-32 - Post-Test Rear Passenger Shoulder and Door Top View

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Photo No. A-33 - Post-Test Driver Dummy Contact



Photo No. A-34 - Post-Test Driver Dummy Head Contact



Photo No. A-35 - Post-Test Rear Passenger Dummy Contact



Photo No. A-36 - Post-Test Rear Passenger Dummy Head Contact



Photo No. A-37 - Pre-Test Impact Point on Vehicle



Photo No. A-38 - Post-Test Impact Point on Vehicle



Photo No. A-39 – Impact

MFD. BY FORD MOTOR CO. IN U.S.A.

DATE: 08/01

GVWR: 4528LB/ 2053KG

FRONT GAWR: 2398LB

REAR GAWR: 2319LB

1087KG

WITH

1051KG

WITH

P235/70R16AS

TIRES

P235/70R16AS

TIRES

16X7.0J

RIMS

16X7.0J

RIMS

AT 207 kPa/30

PSI COLD

AT 207 kPa/30

PSI COLD

THIS VEHICLE CONFORMS TO ALL APPLICABLE FEDERAL MOTOR
VEHICLE SAFETY AND THEFT PREVENTION STANDARDS IN
EFFECT ON THE DATE OF MANUFACTURE SHOWN ABOVE.

VIN: 1FMYU04152KA09774

TYPE: MPV

F0000

T0000



EXT PNT:

E4

IRC: 41

DSQ:

WB BRK

INT TR

TP/PS

R

AXLE

TR

SPR

OM11A

103

4

22

X

69

4

GC

305

1200108022266

UTC

2USA1520472-AA

APPENDIX B

ES-2, VEHICLE, AND MDB RESPONSE DATA

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* No valid data

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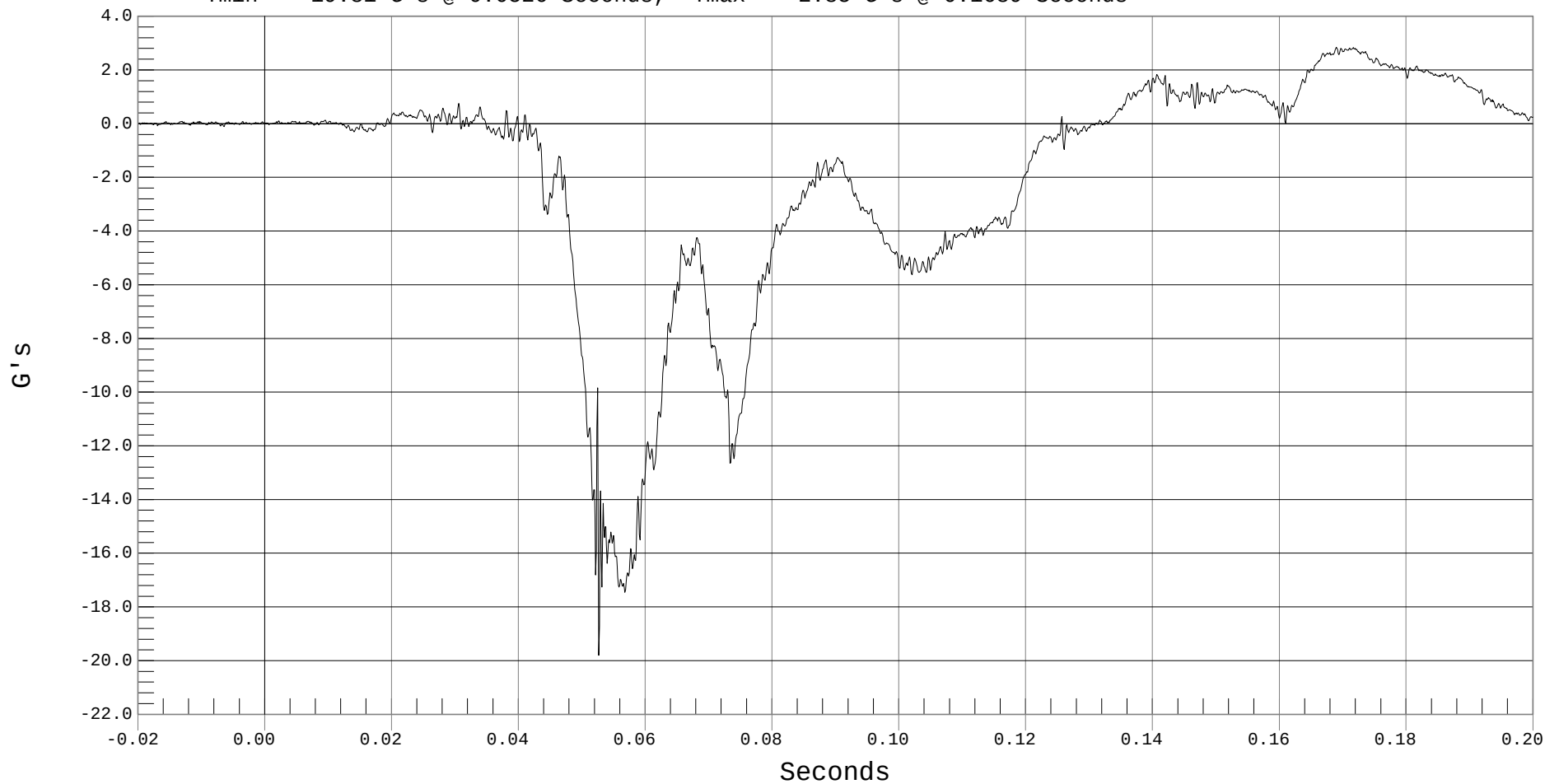
DRIVER HEAD CG X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD CG X, B01105AT.A01

Ymin = -19.81 G's @ 0.0526 Seconds, Ymax = 2.85 G's @ 0.1689 Seconds





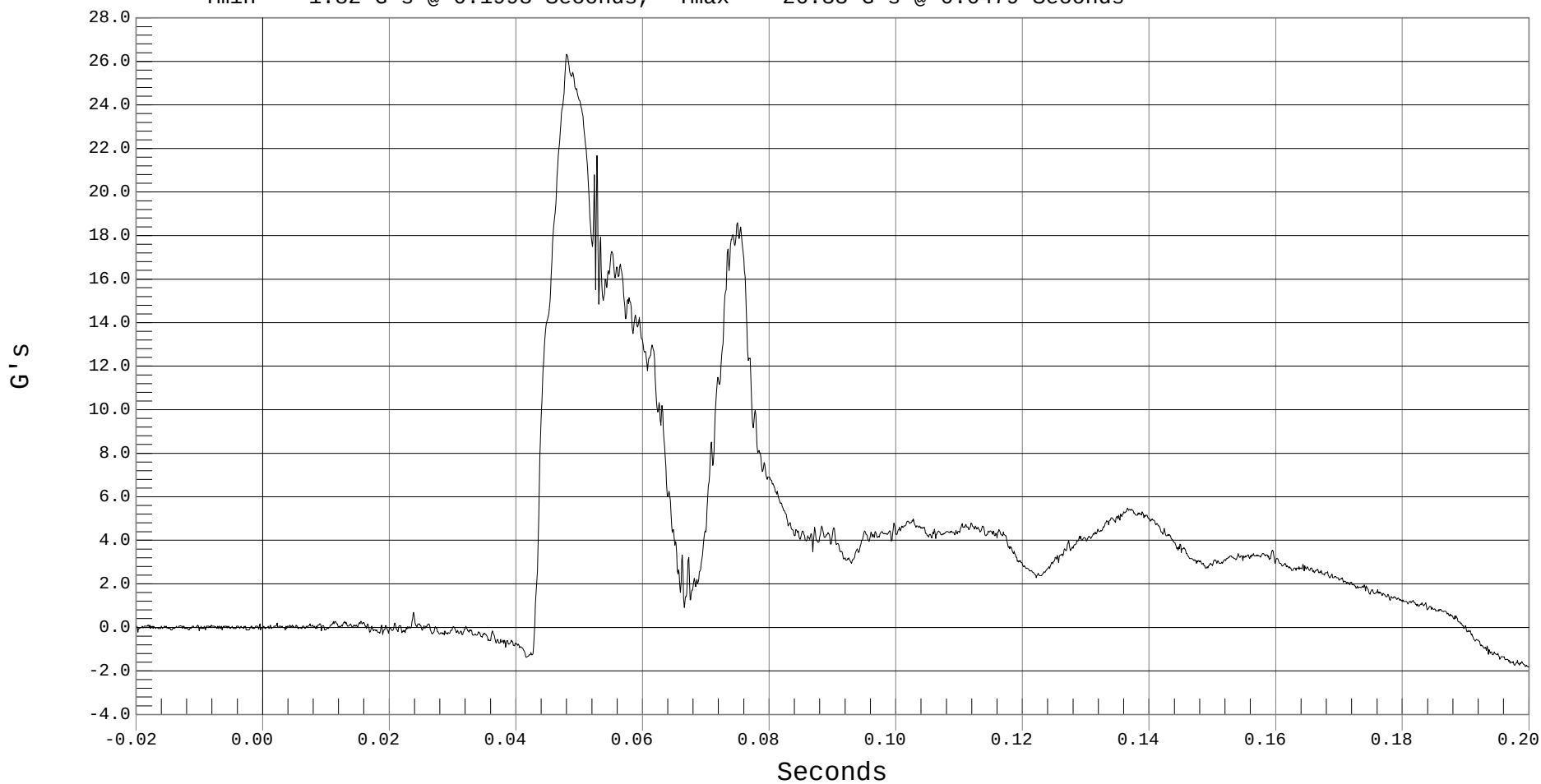
DRIVER HEAD CG Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD CG Y, B01105AT.A02

Ymin = -1.82 G's @ 0.1998 Seconds, Ymax = 26.33 G's @ 0.0479 Seconds





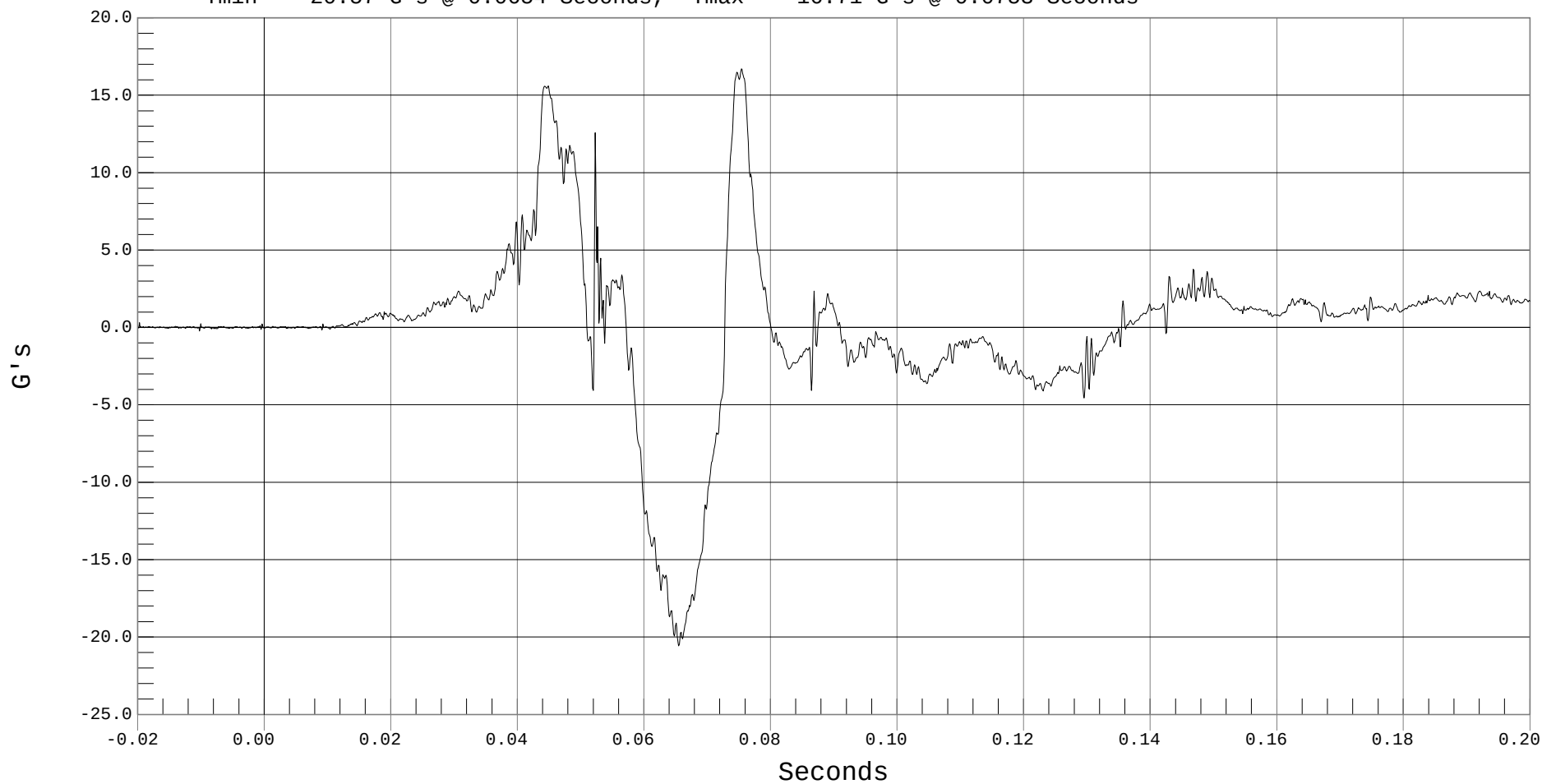
DRIVER HEAD CG Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD CG Z, B01105AT.A03

Ymin = -20.57 G's @ 0.0654 Seconds, Ymax = 16.71 G's @ 0.0753 Seconds





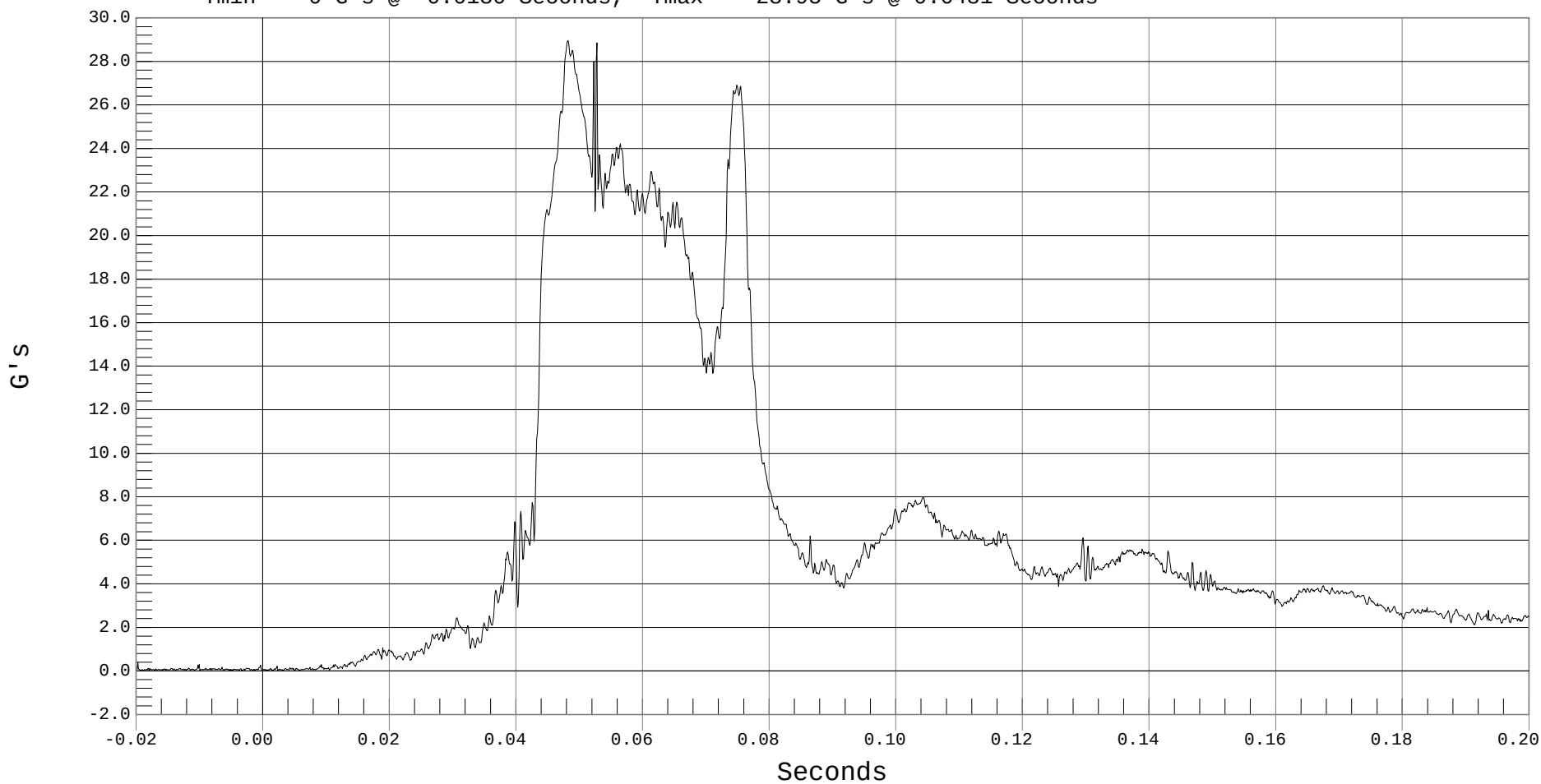
DRIVER HEAD CG RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD RESULTANT, B01105AV.A01

Ymin = 0 G's @ -0.0180 Seconds, Ymax = 28.95 G's @ 0.0481 Seconds





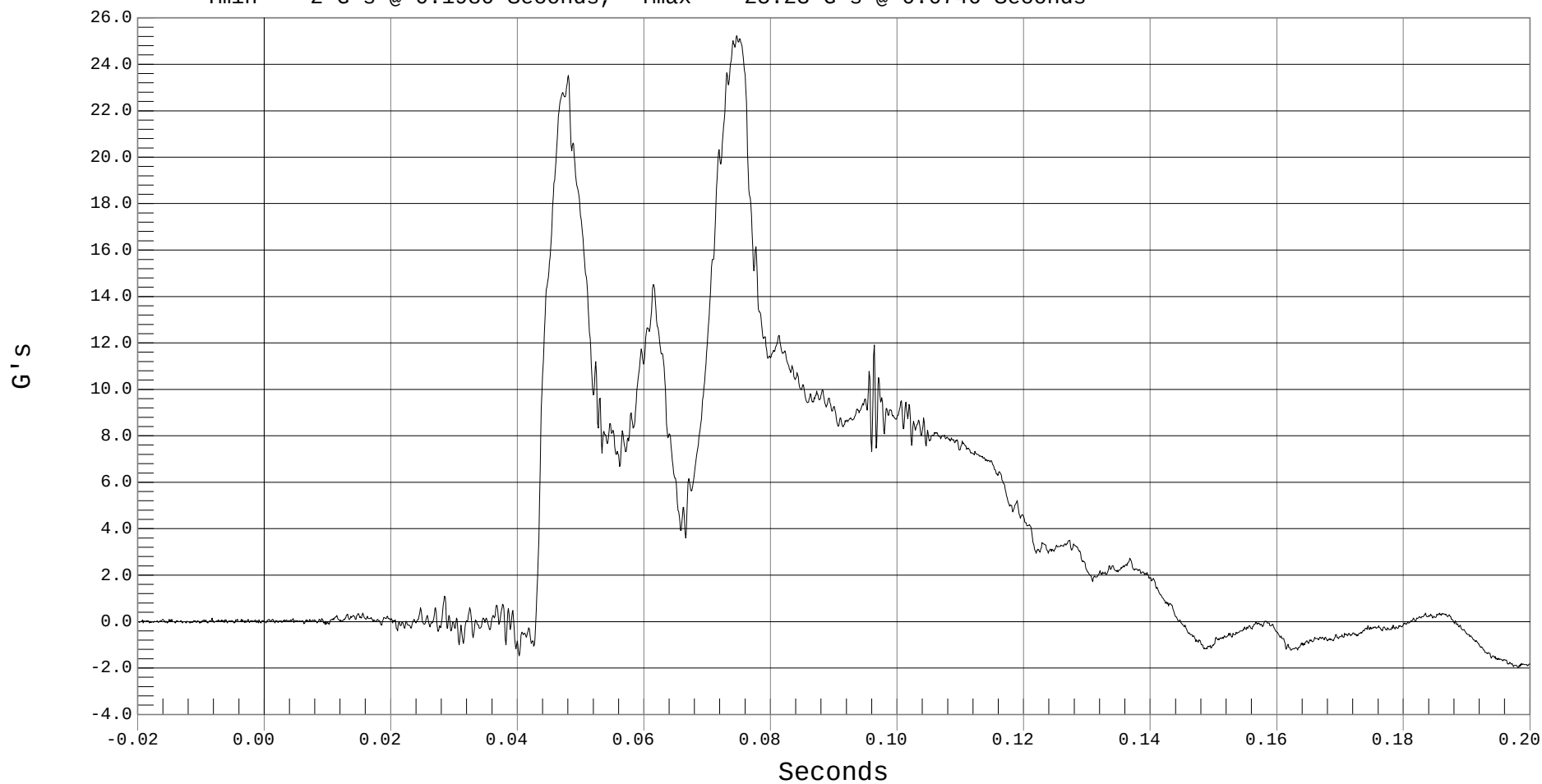
DRIVER HEAD FRONT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD FRONT Y, B01105AT.A70

Ymin = -2 G's @ 0.1980 Seconds, Ymax = 25.23 G's @ 0.0746 Seconds





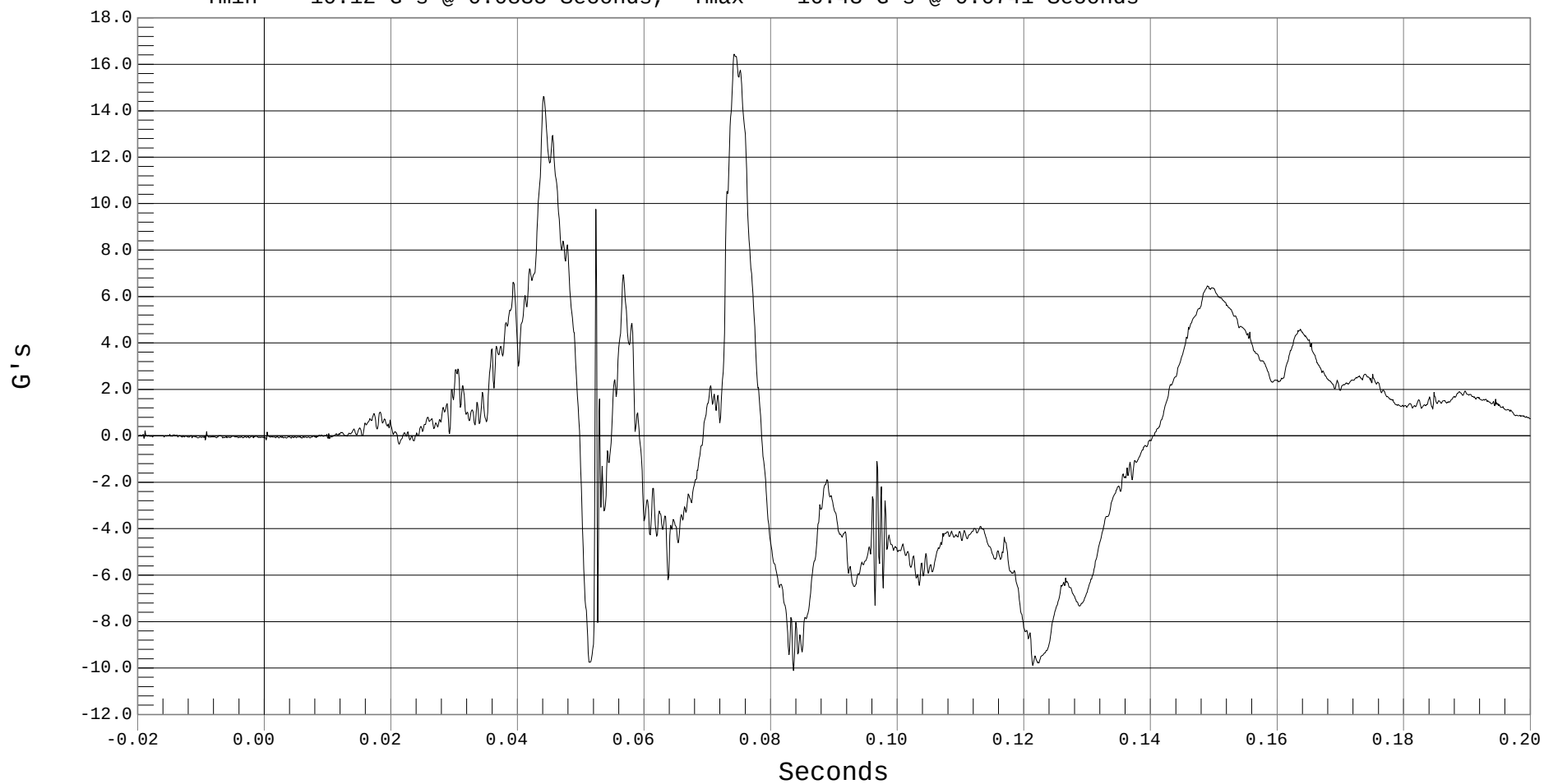
DRIVER HEAD FRONT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD FRONT Z, B01105AT.A71

Ymin = -10.12 G's @ 0.0835 Seconds, Ymax = 16.43 G's @ 0.0741 Seconds





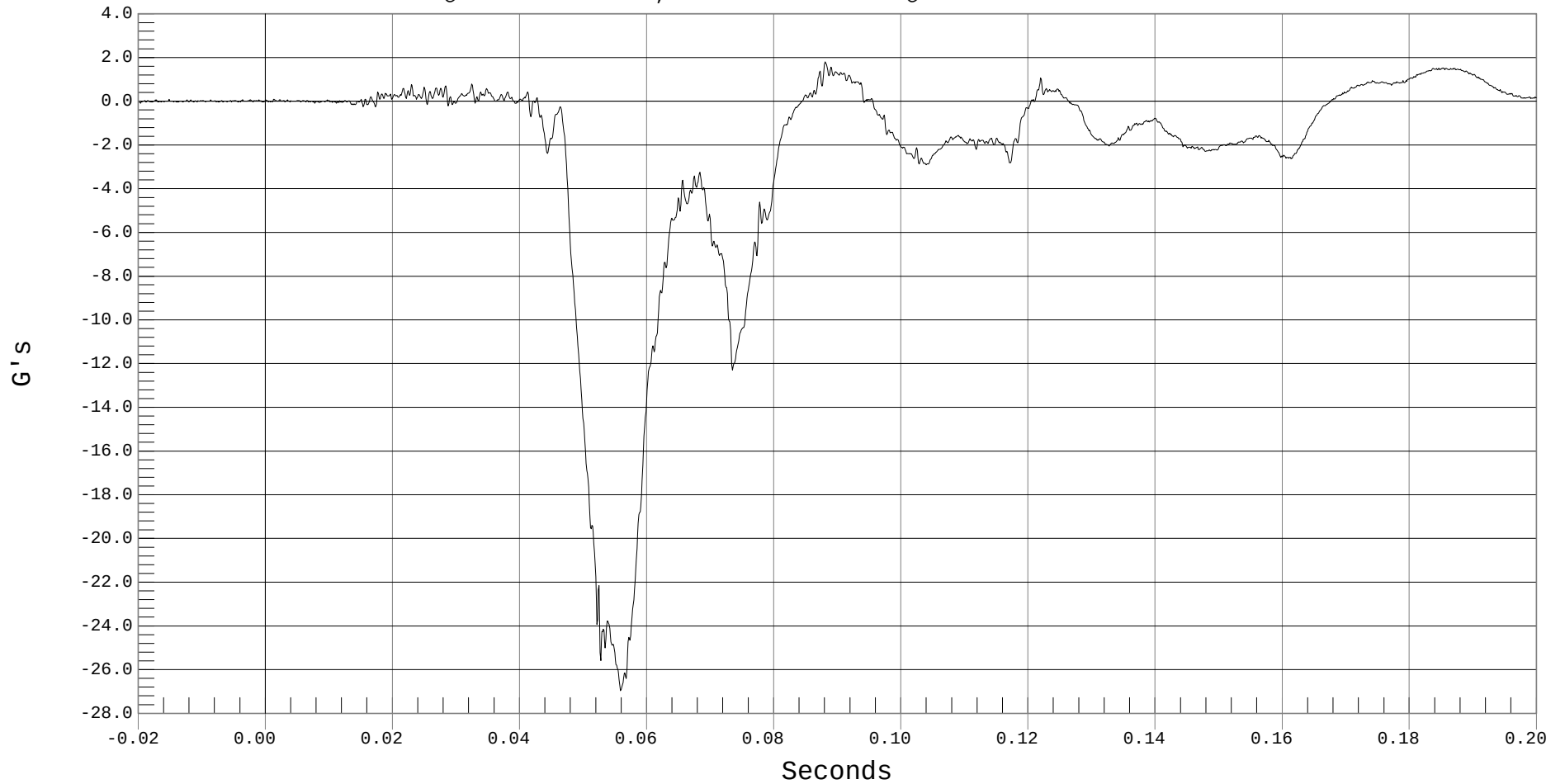
DRIVER HEAD LEFT X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD LEFT X, B01105AT.A72

Ymin = -26.97 G's @ 0.0558 Seconds, Ymax = 1.8 G's @ 0.0880 Seconds





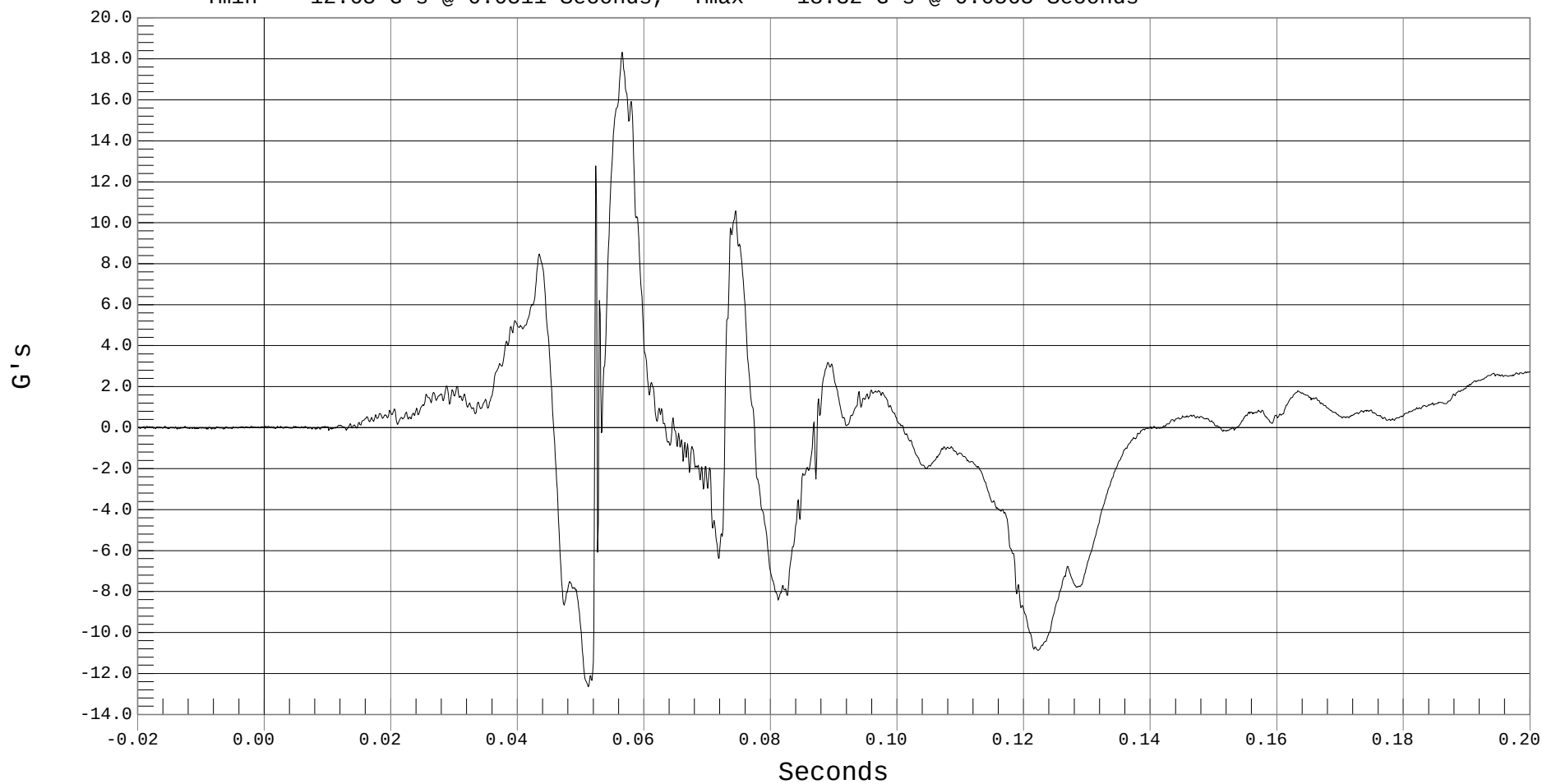
DRIVER HEAD LEFT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD LEFT Z, B01105AT.A73

Ymin = -12.65 G's @ 0.0511 Seconds, Ymax = 18.32 G's @ 0.0565 Seconds





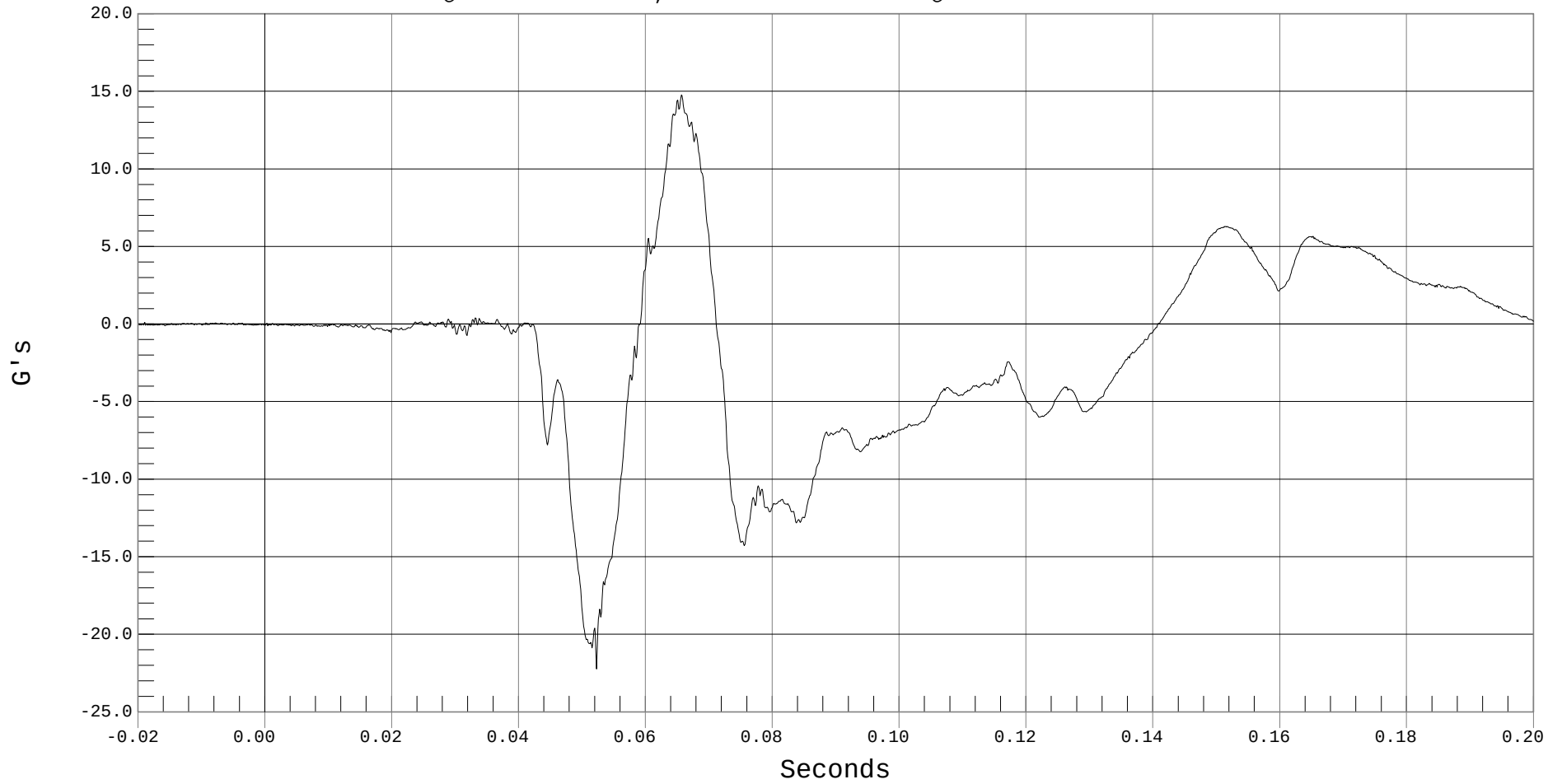
DRIVER HEAD TOP X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD TOP X, B01105AT.A74

Ymin = -22.25 G's @ 0.0522 Seconds, Ymax = 14.77 G's @ 0.0656 Seconds





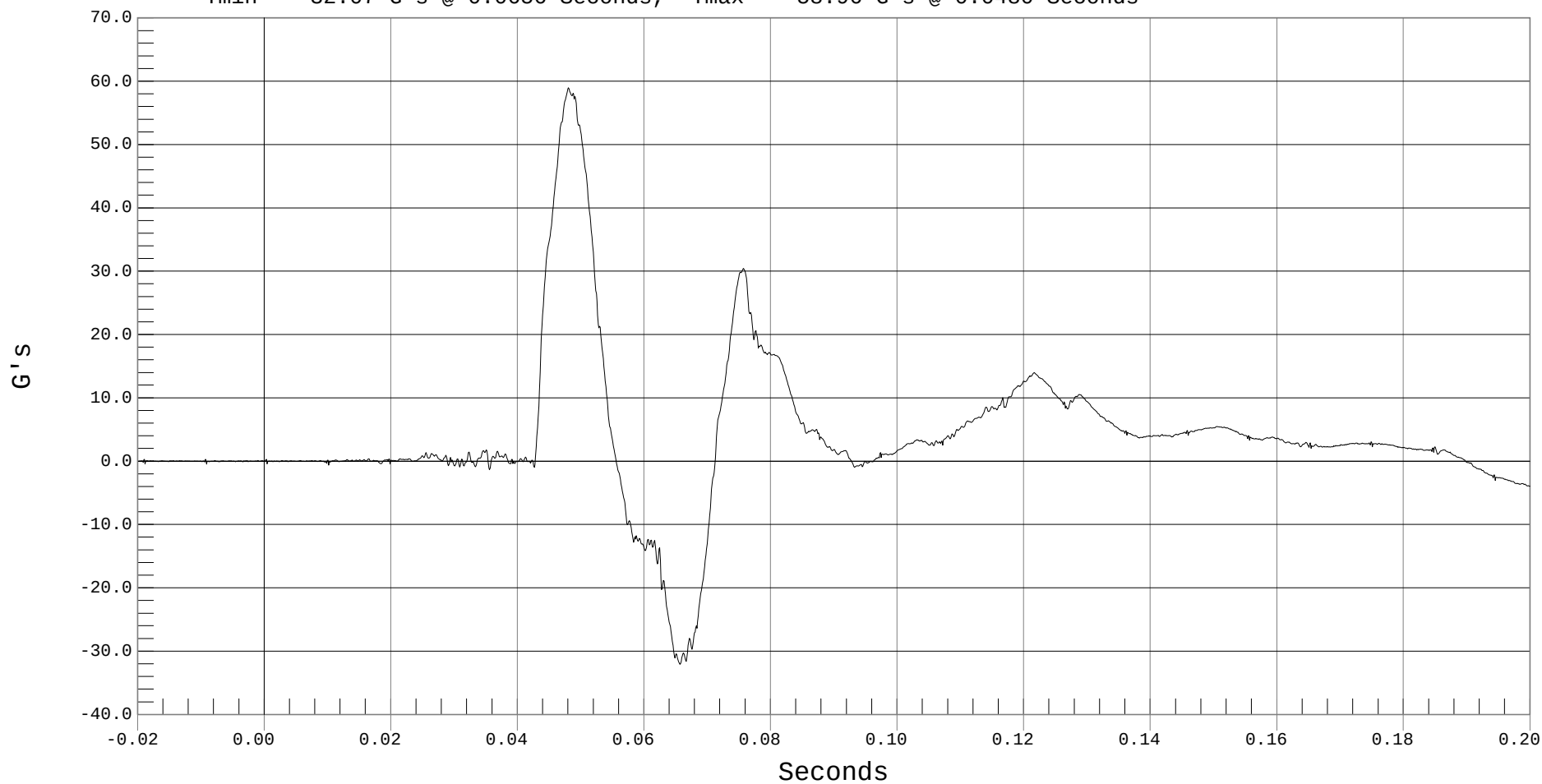
DRIVER HEAD TOP Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER HEAD TOP Y, B01105AT.A75

Ymin = -32.07 G's @ 0.0656 Seconds, Ymax = 58.96 G's @ 0.0480 Seconds





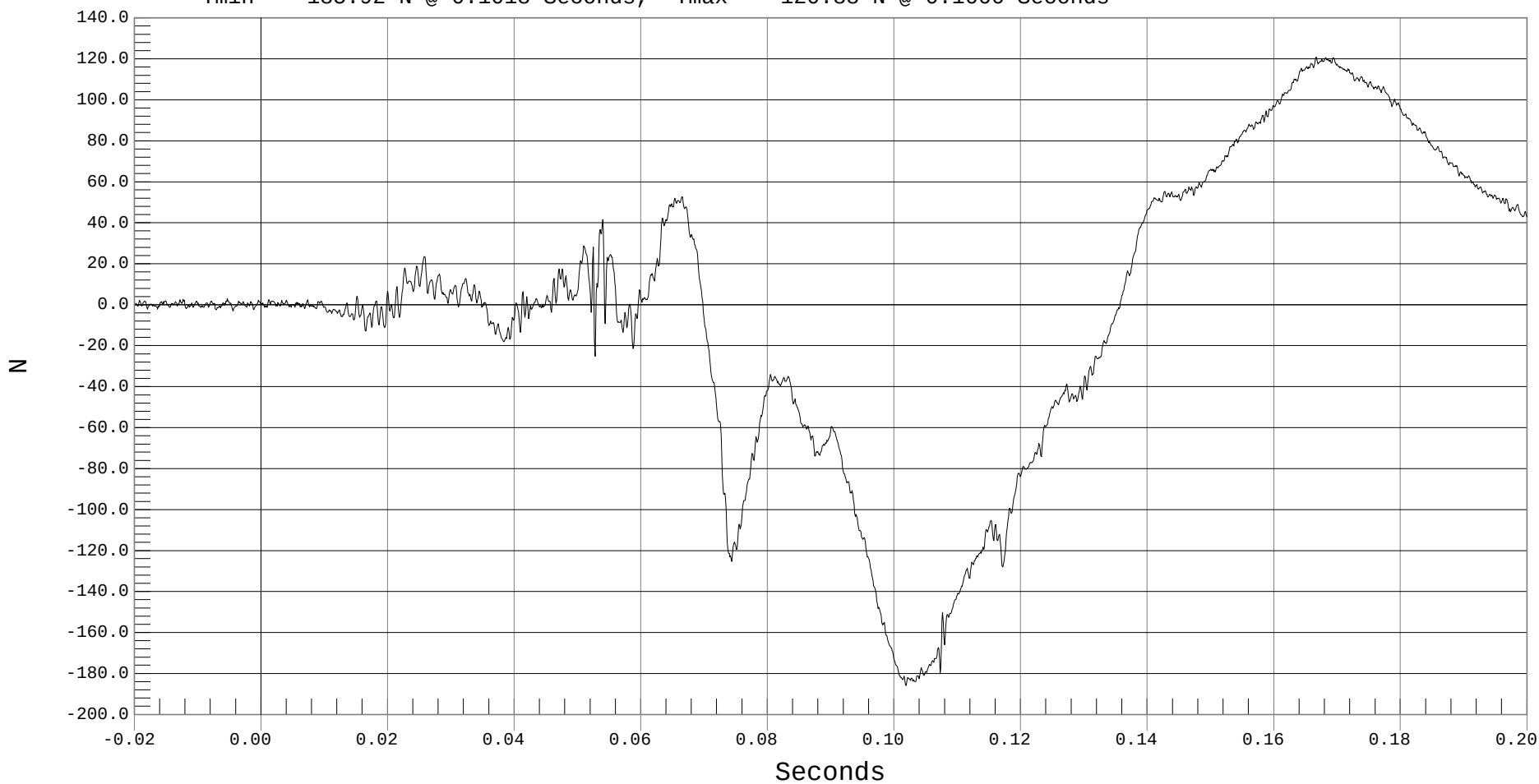
DRIVER UPPER NECK FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER UPPER NECK FORCE X, B01105FT.F04

Ymin = -185.92 N @ 0.1018 Seconds, Ymax = 120.88 N @ 0.1666 Seconds





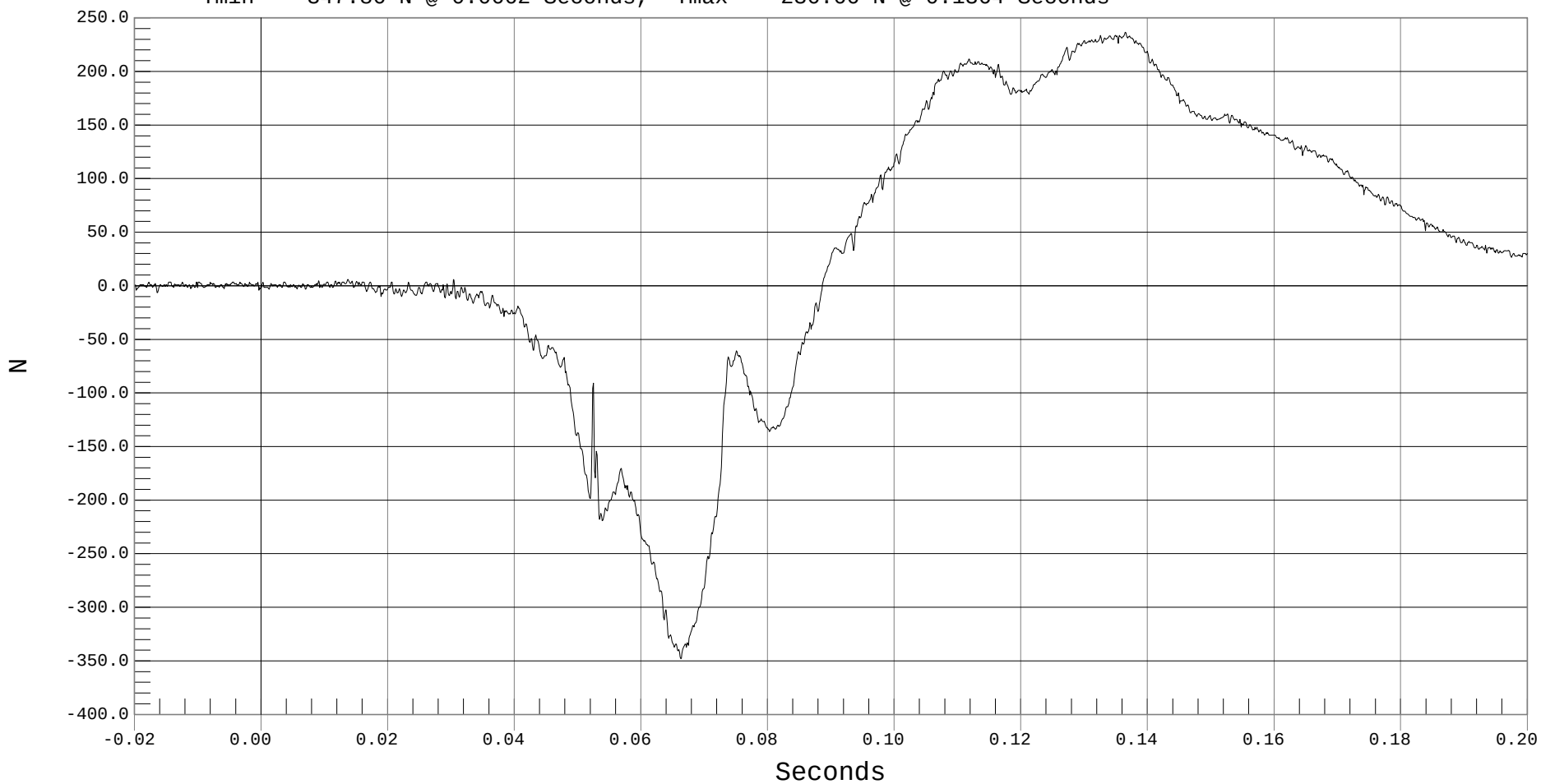
DRIVER UPPER NECK FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER UPPER NECK FORCE Y, B01105FT.F05

Ymin = -347.86 N @ 0.0662 Seconds, Ymax = 236.66 N @ 0.1364 Seconds





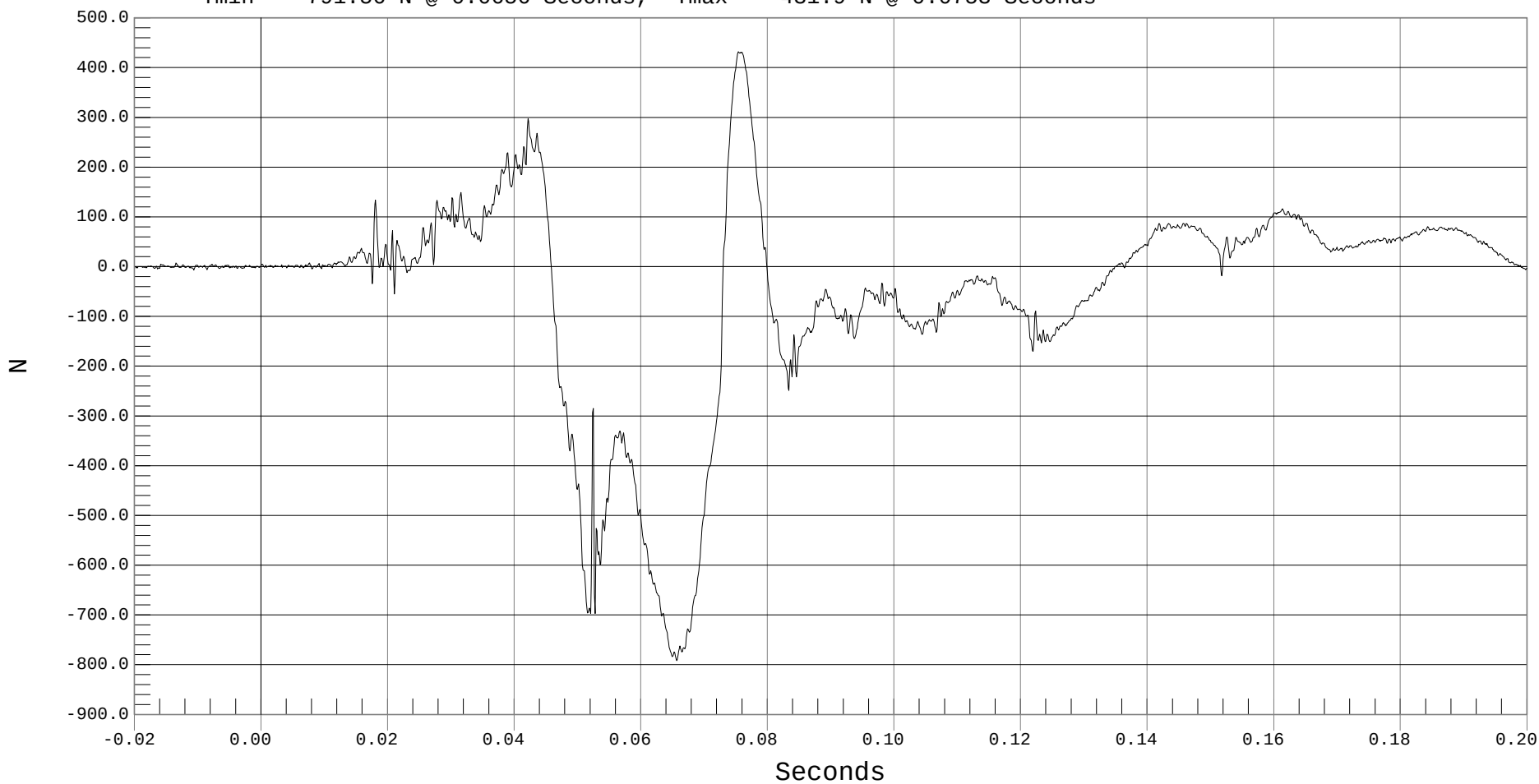
DRIVER UPPER NECK FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER UPPER NECK FORCE Z, B01105FT.F06

Ymin = -791.56 N @ 0.0656 Seconds, Ymax = 431.9 N @ 0.0753 Seconds





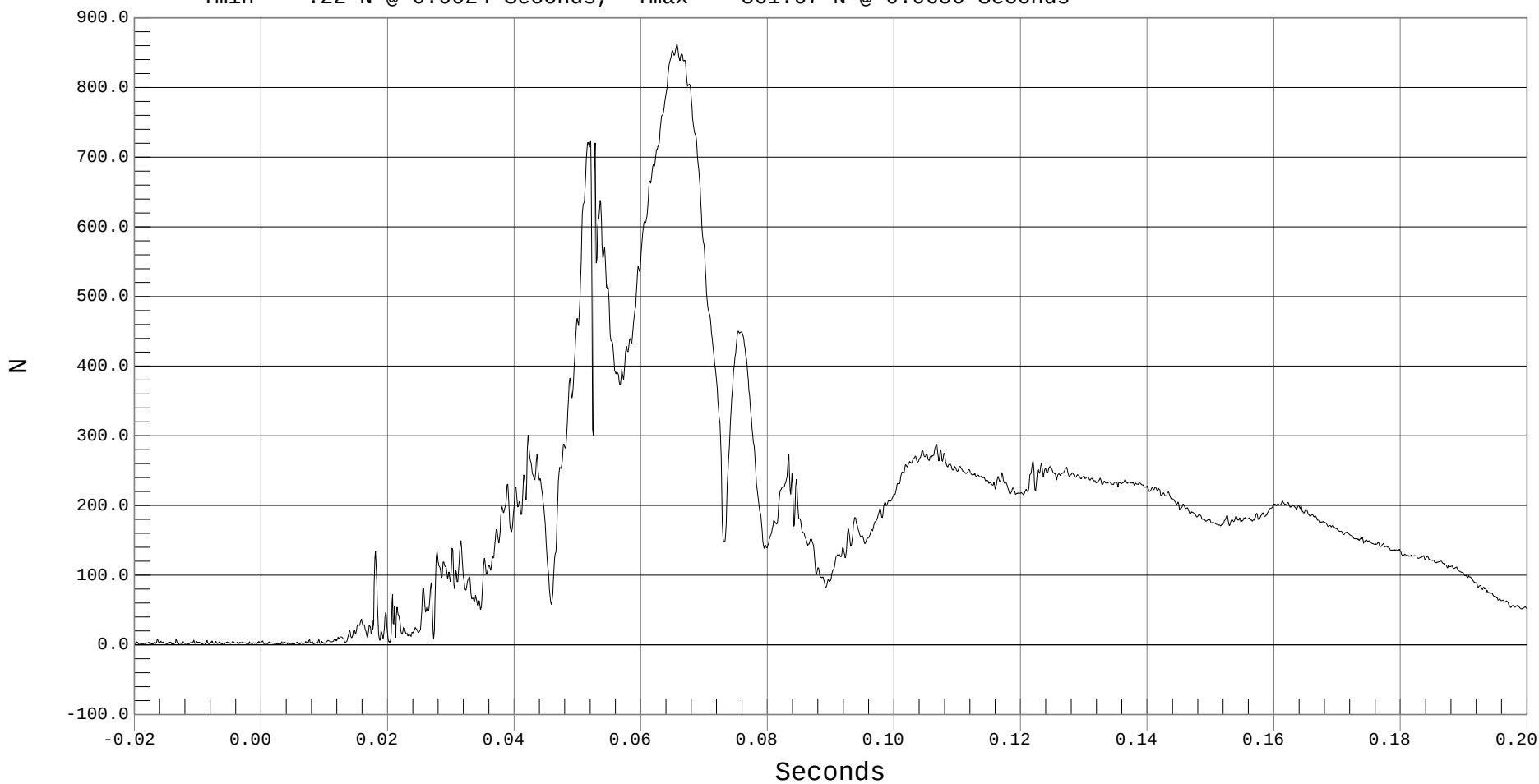
DRIVER UPPER NECK FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER UPPER NECK FORCE RESULTANT, B01105FV.F04

Ymin = .22 N @ 0.0024 Seconds, Ymax = 861.67 N @ 0.0656 Seconds





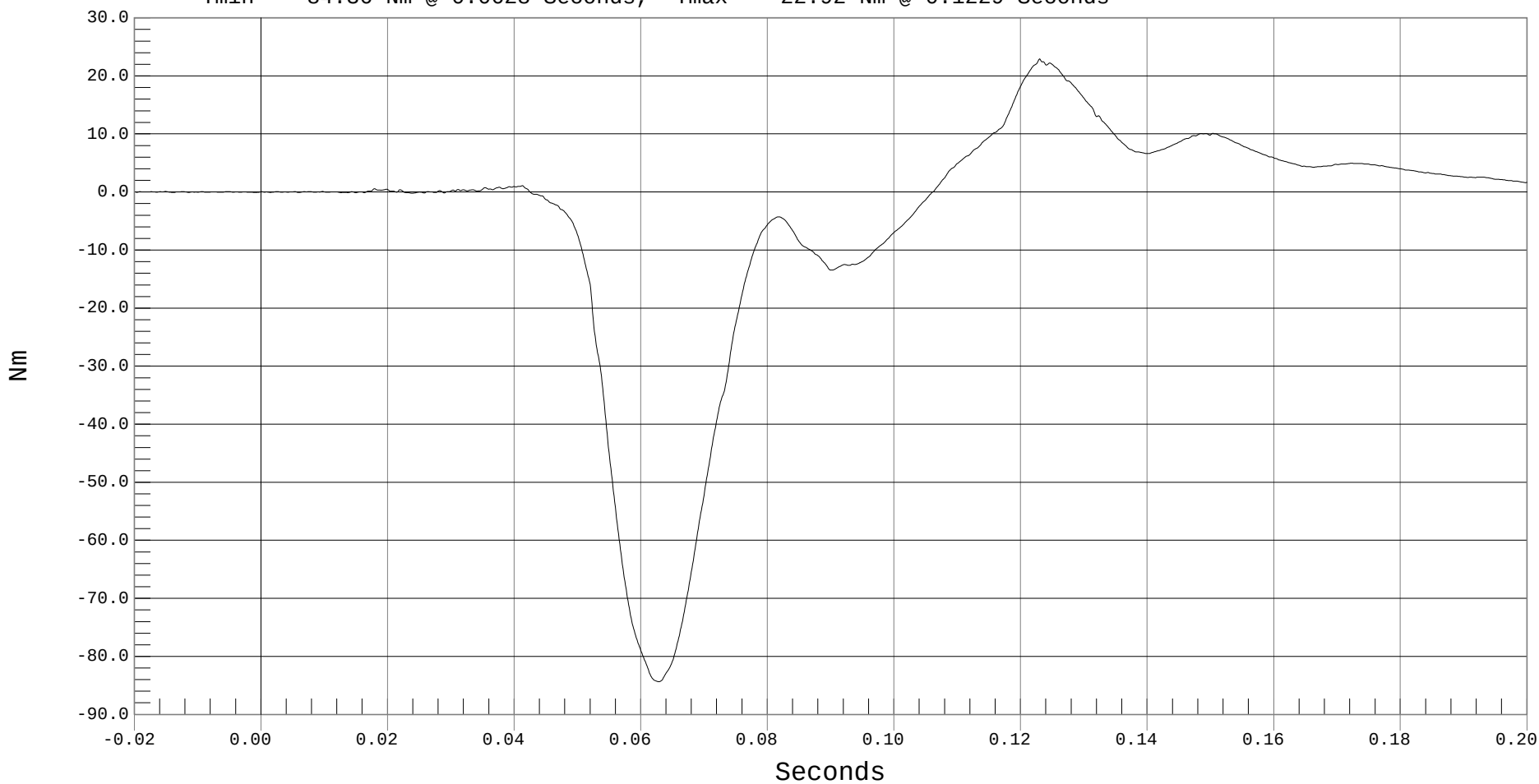
DRIVER UPPER NECK MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER UPPER NECK MOMENT X, B01105MF.M07

Ymin = -84.36 Nm @ 0.0628 Seconds, Ymax = 22.92 Nm @ 0.1229 Seconds





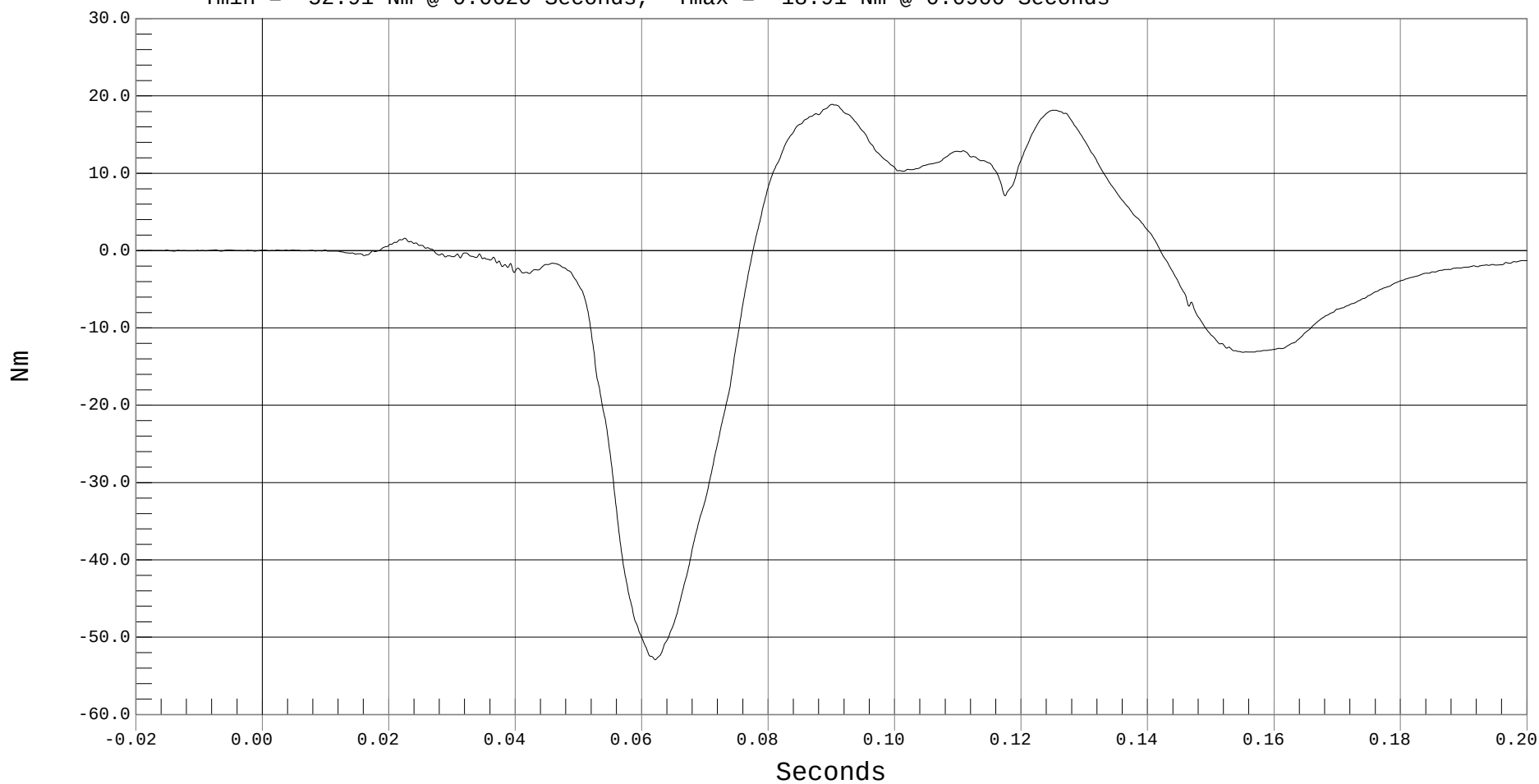
DRIVER UPPER NECK MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER UPPER NECK MOMENT Y, B01105MF.M08

Ymin = -52.91 Nm @ 0.0620 Seconds, Ymax = 18.91 Nm @ 0.0900 Seconds





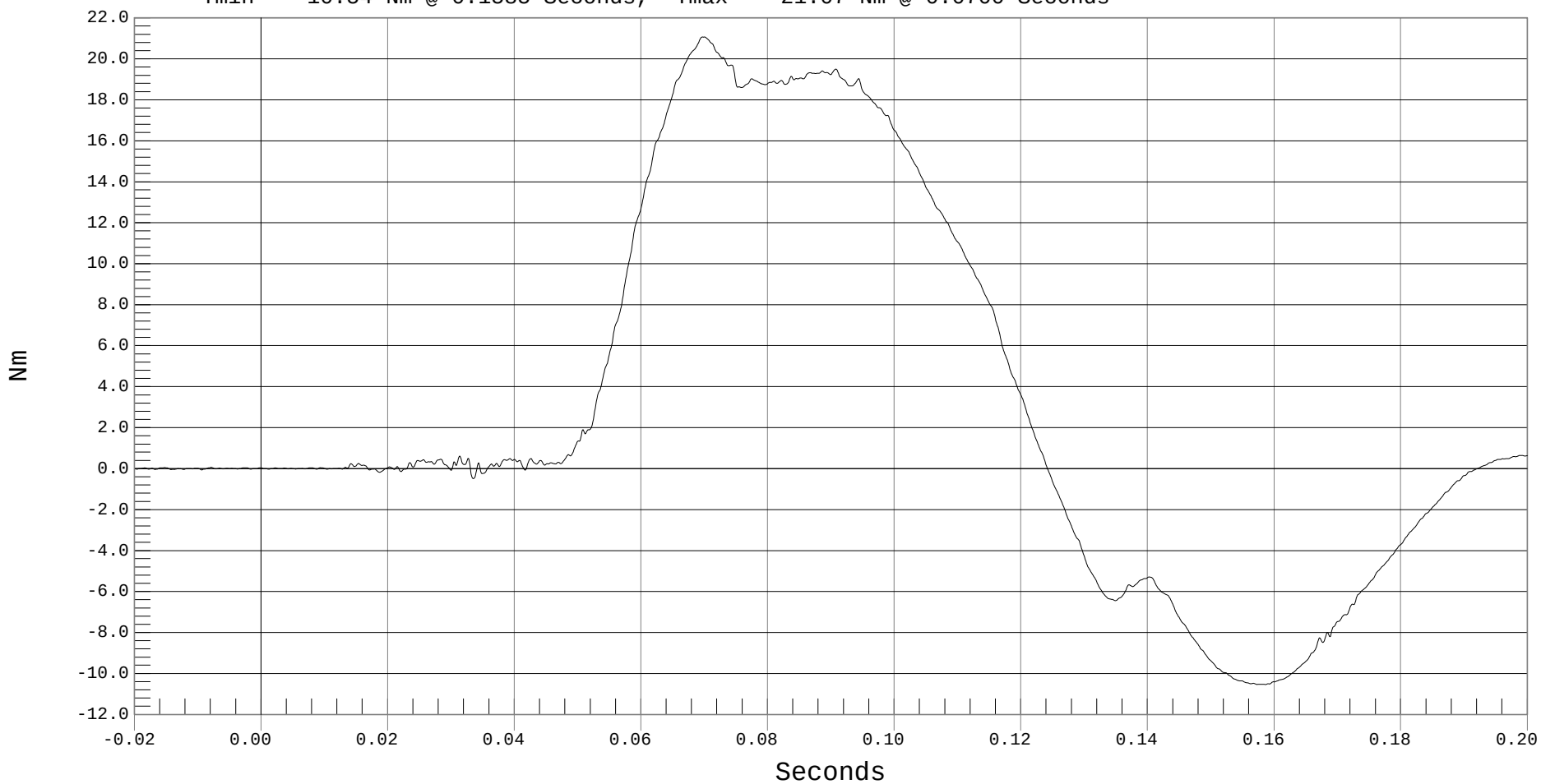
DRIVER UPPER NECK MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER UPPER NECK MOMENT Z, B01105MF.M09

Ymin = -10.54 Nm @ 0.1585 Seconds, Ymax = 21.07 Nm @ 0.0700 Seconds





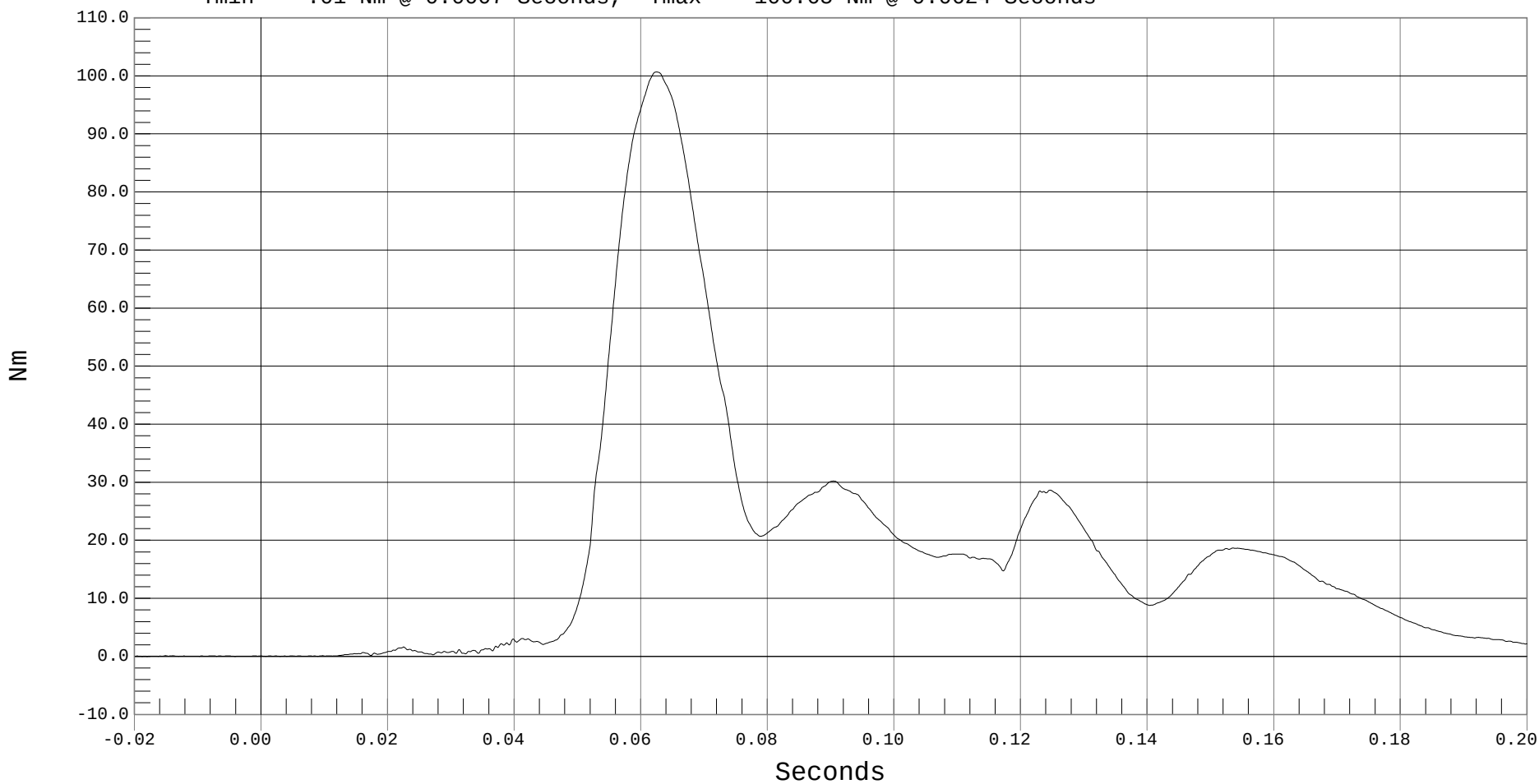
DRIVER UPPER NECK MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER UPPER NECK MOMENT RESULTANT, B01105MV.M07

Ymin = .01 Nm @ 0.0007 Seconds, Ymax = 100.65 Nm @ 0.0624 Seconds





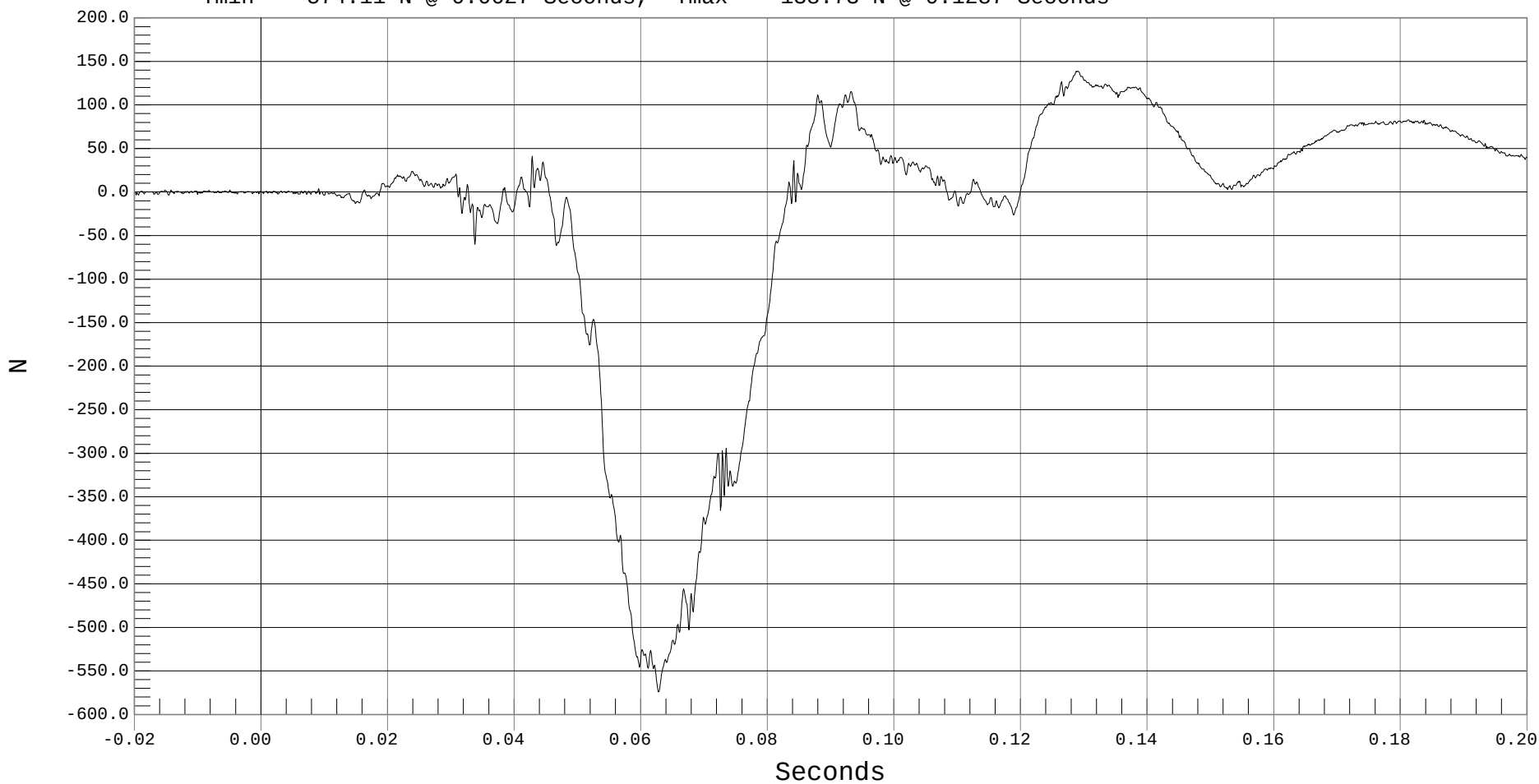
DRIVER LOWER NECK FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER LOWER NECK FORCE X, B01105FT.F10

Ymin = -574.11 N @ 0.0627 Seconds, Ymax = 138.73 N @ 0.1287 Seconds





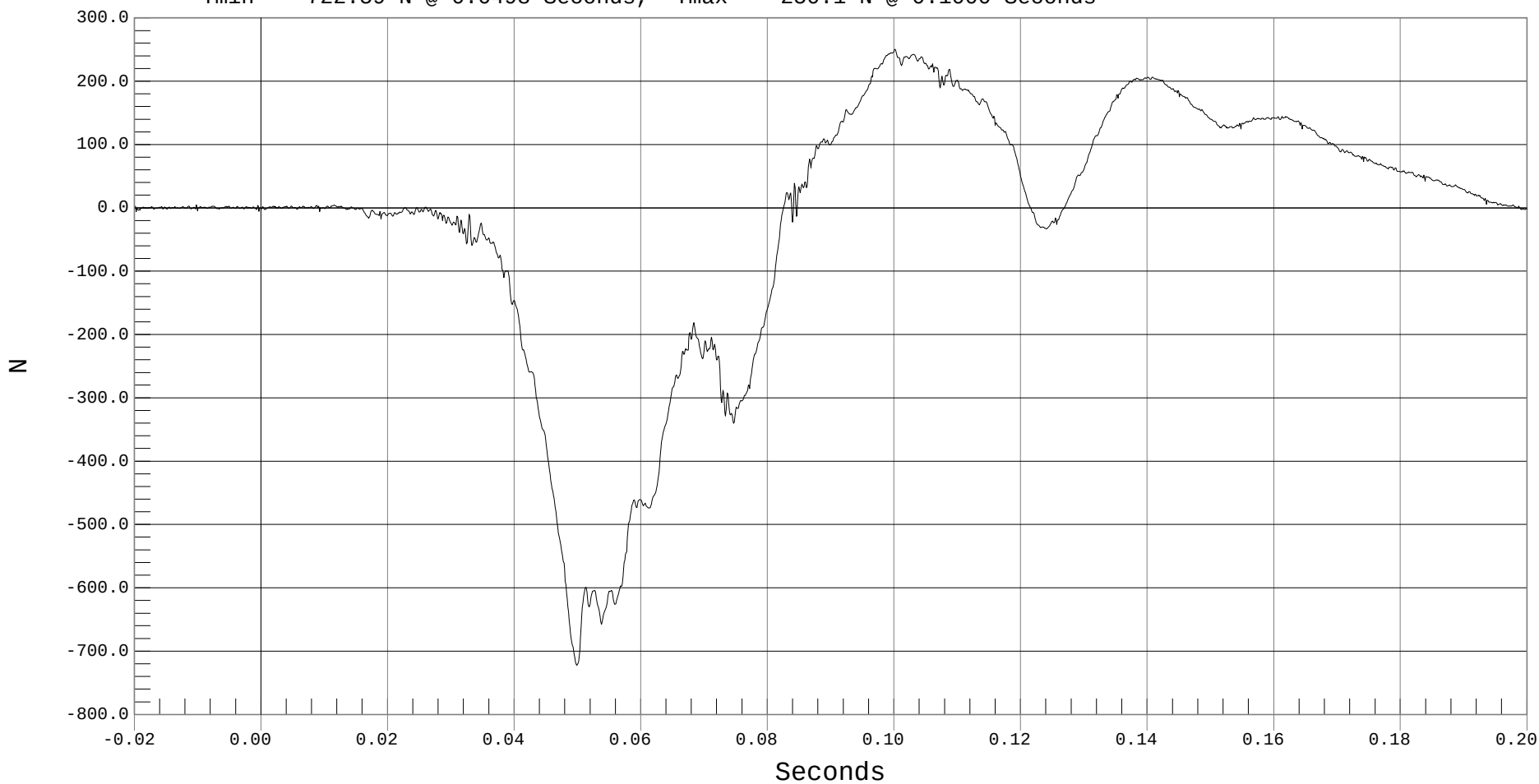
DRIVER LOWER NECK FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER LOWER NECK FORCE Y, B01105FT.F11

Ymin = -722.59 N @ 0.0498 Seconds, Ymax = 250.1 N @ 0.1000 Seconds





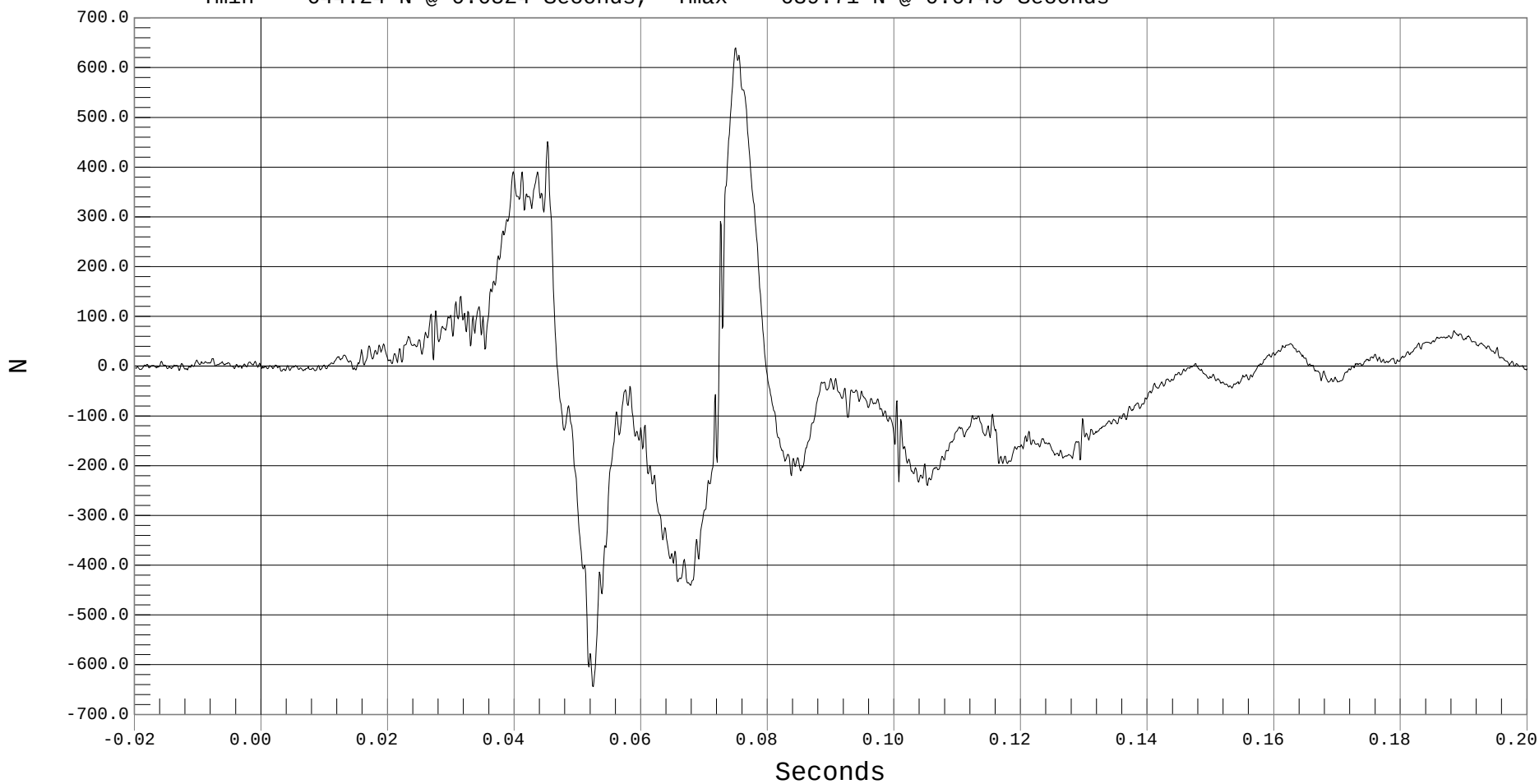
DRIVER LOWER NECK FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER LOWER NECK FORCE Z, B01105FT.F12

Ymin = -644.24 N @ 0.0524 Seconds, Ymax = 639.71 N @ 0.0749 Seconds





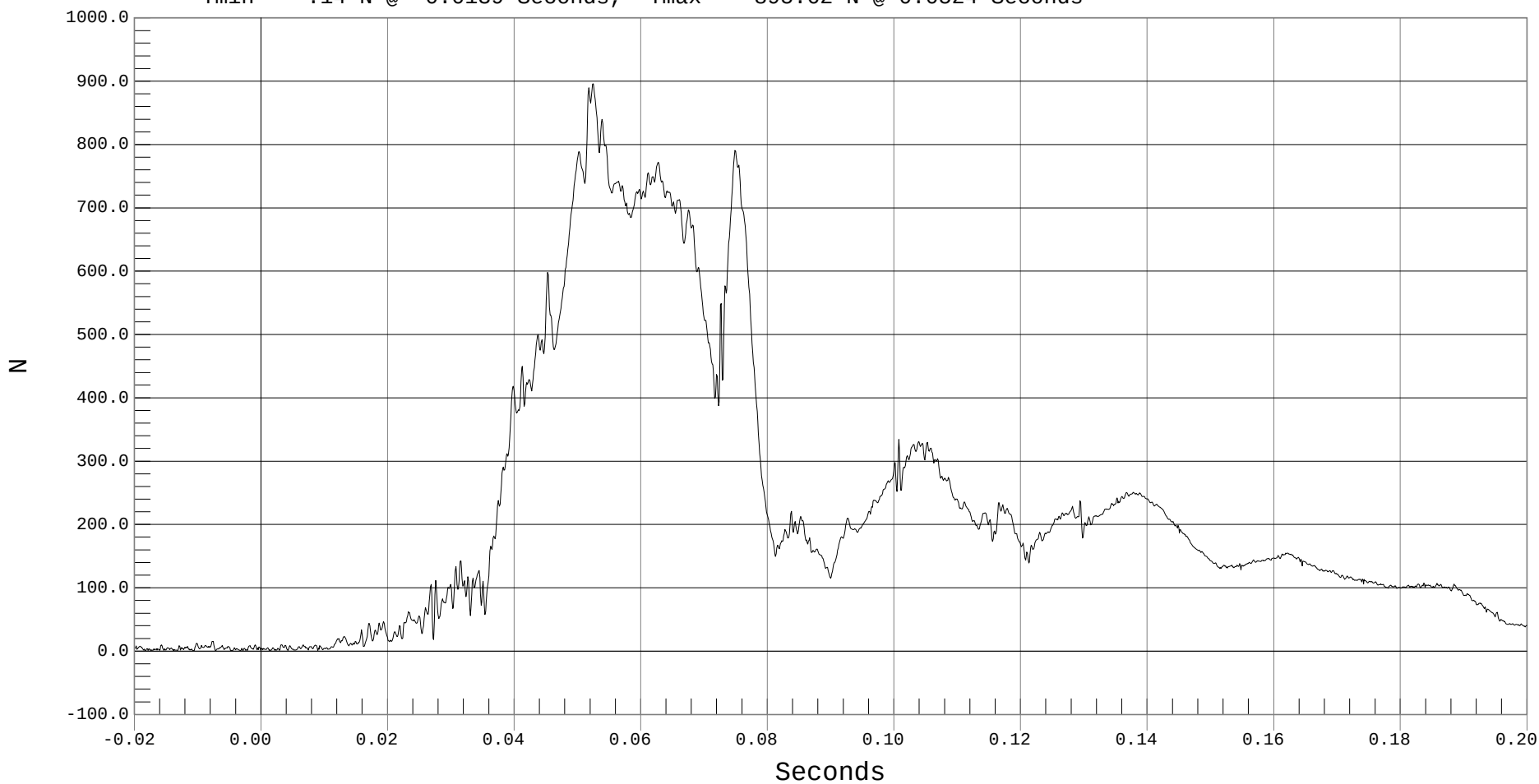
DRIVER LOWER NECK FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER LOWER NECK FORCE RESULTANT, B01105FV.F10

Ymin = .14 N @ -0.0139 Seconds, Ymax = 895.62 N @ 0.0524 Seconds





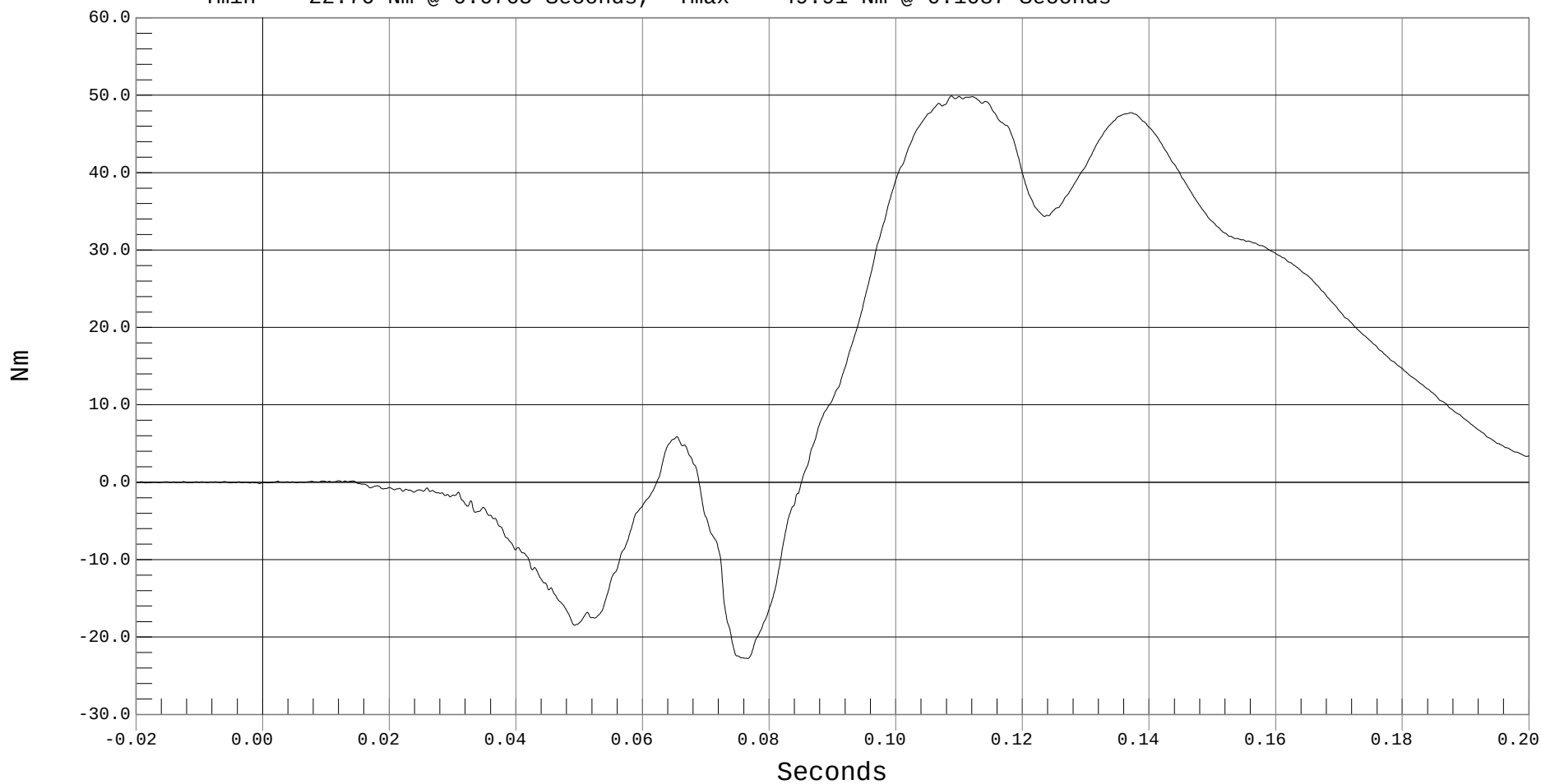
DRIVER LOWER NECK MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER LOWER NECK MOMENT X, B01105MF.M13

Ymin = -22.76 Nm @ 0.0765 Seconds, Ymax = 49.91 Nm @ 0.1087 Seconds





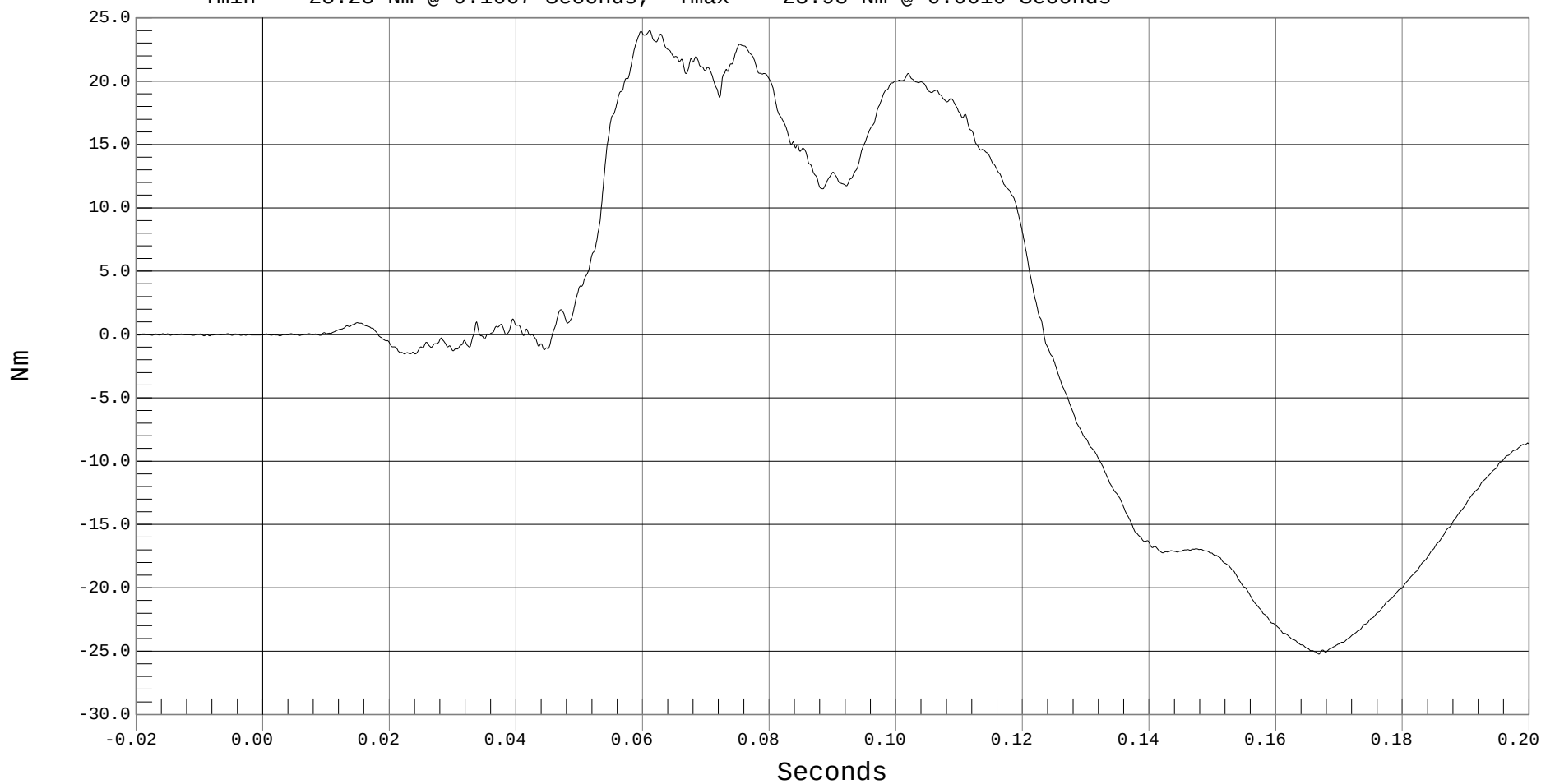
DRIVER LOWER NECK MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LOWER NECK MOMENT Y, B01105MF.M14

Ymin = -25.23 Nm @ 0.1667 Seconds, Ymax = 23.98 Nm @ 0.0610 Seconds





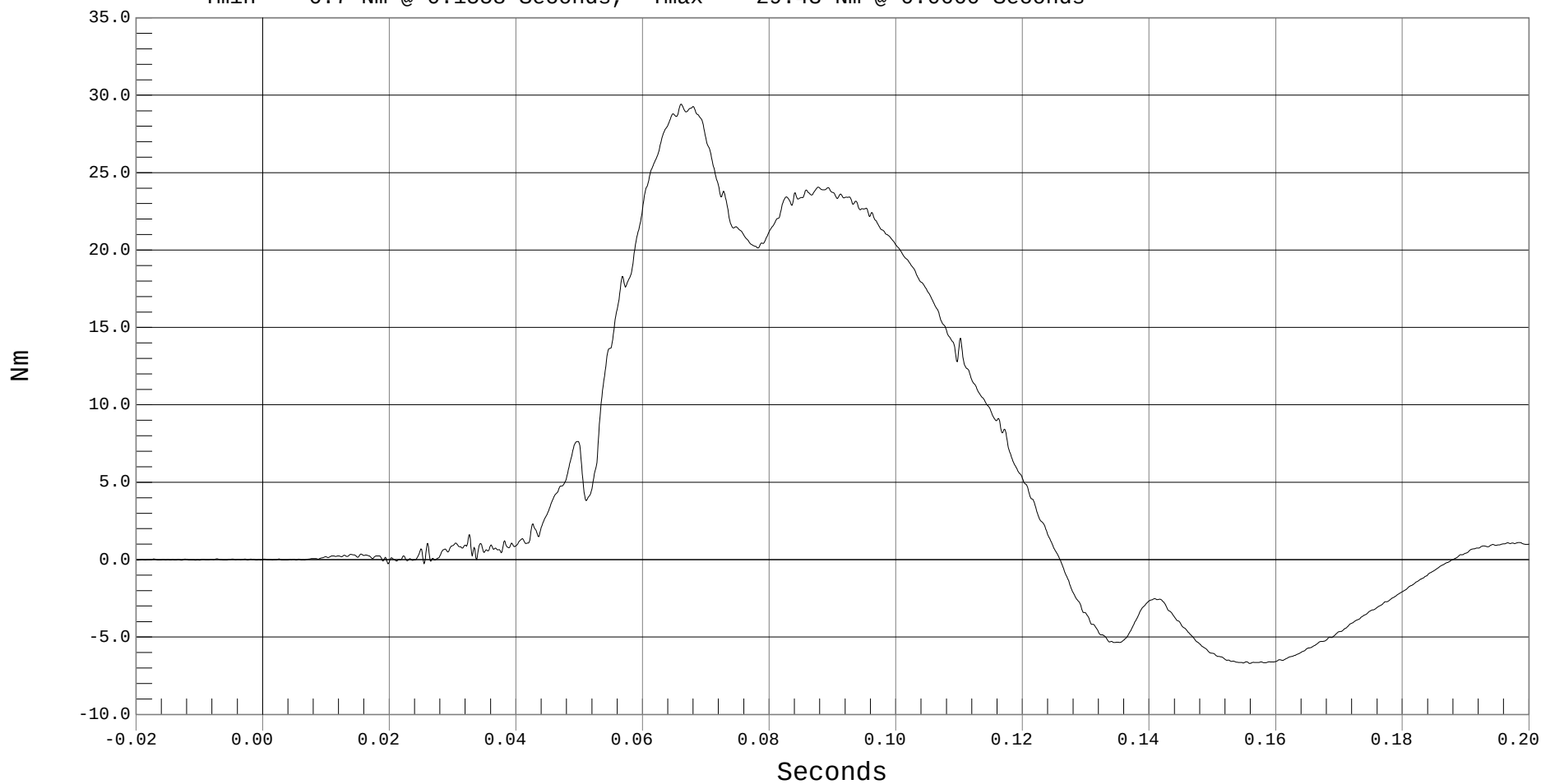
DRIVER LOWER NECK MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LOWER NECK MOMENT Z, B01105MF.M15

Ymin = -6.7 Nm @ 0.1558 Seconds, Ymax = 29.43 Nm @ 0.0660 Seconds





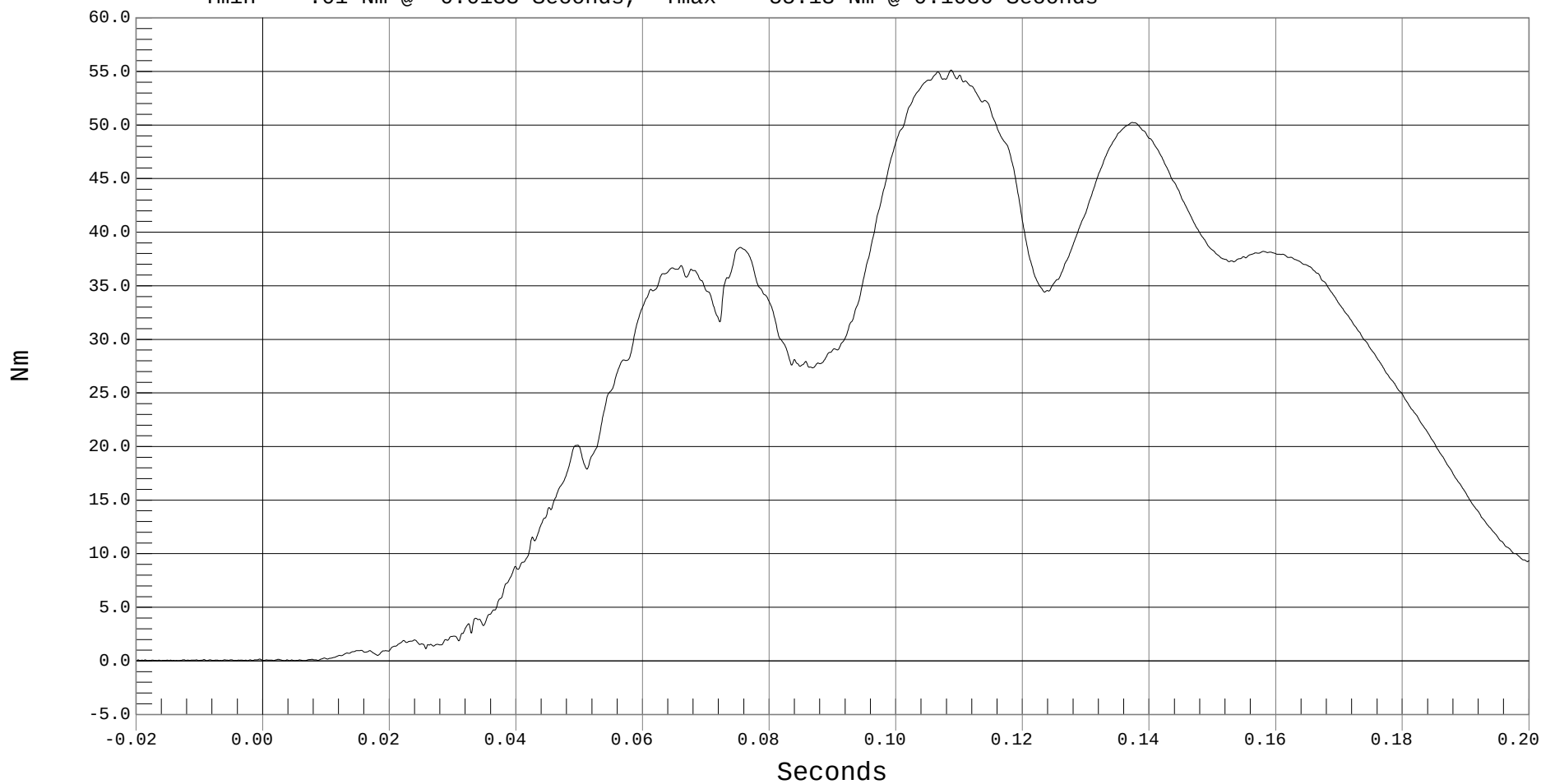
DRIVER LOWER NECK MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LOWER NECK MOMENT RESULTANT, B01105MV.M13

Ymin = .01 Nm @ -0.0133 Seconds, Ymax = 55.13 Nm @ 0.1086 Seconds





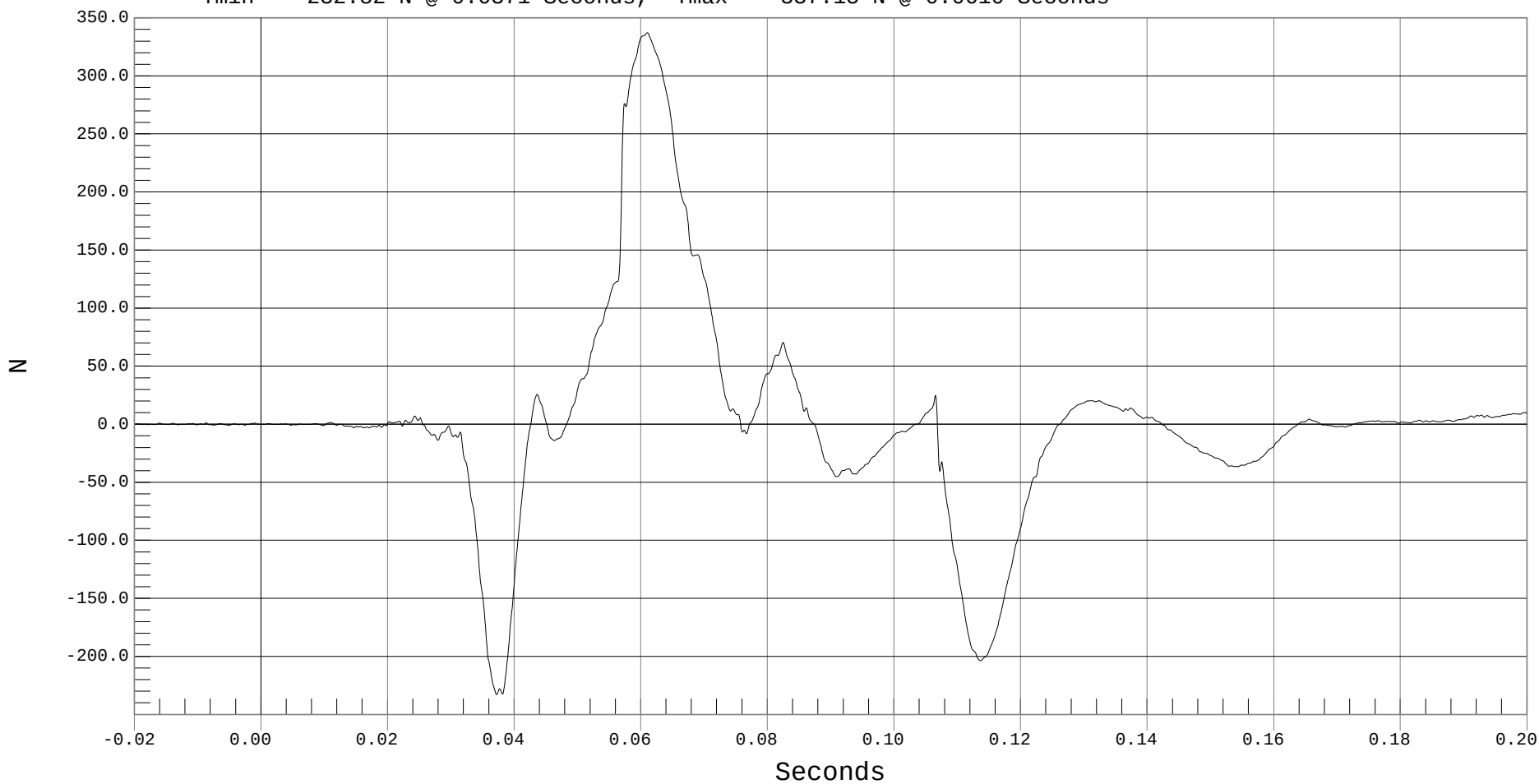
DRIVER SHOULDER FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER SHOULDER FORCE X, B01105FF.F16

Ymin = -232.82 N @ 0.0371 Seconds, Ymax = 337.15 N @ 0.0610 Seconds





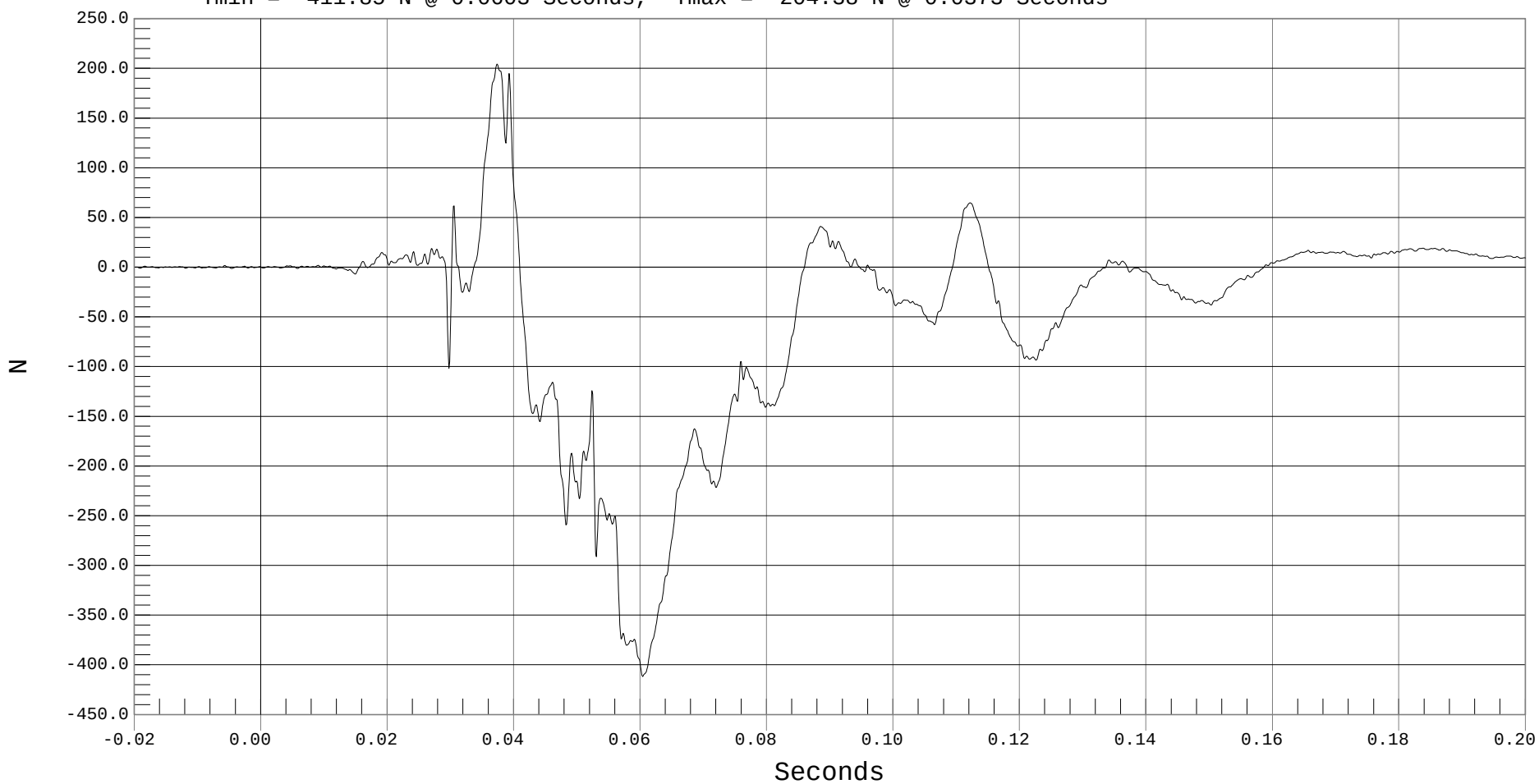
DRIVER SHOULDER FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER SHOULDER FORCE Y, B01105FF.F17

Ymin = -411.85 N @ 0.0603 Seconds, Ymax = 204.38 N @ 0.0373 Seconds





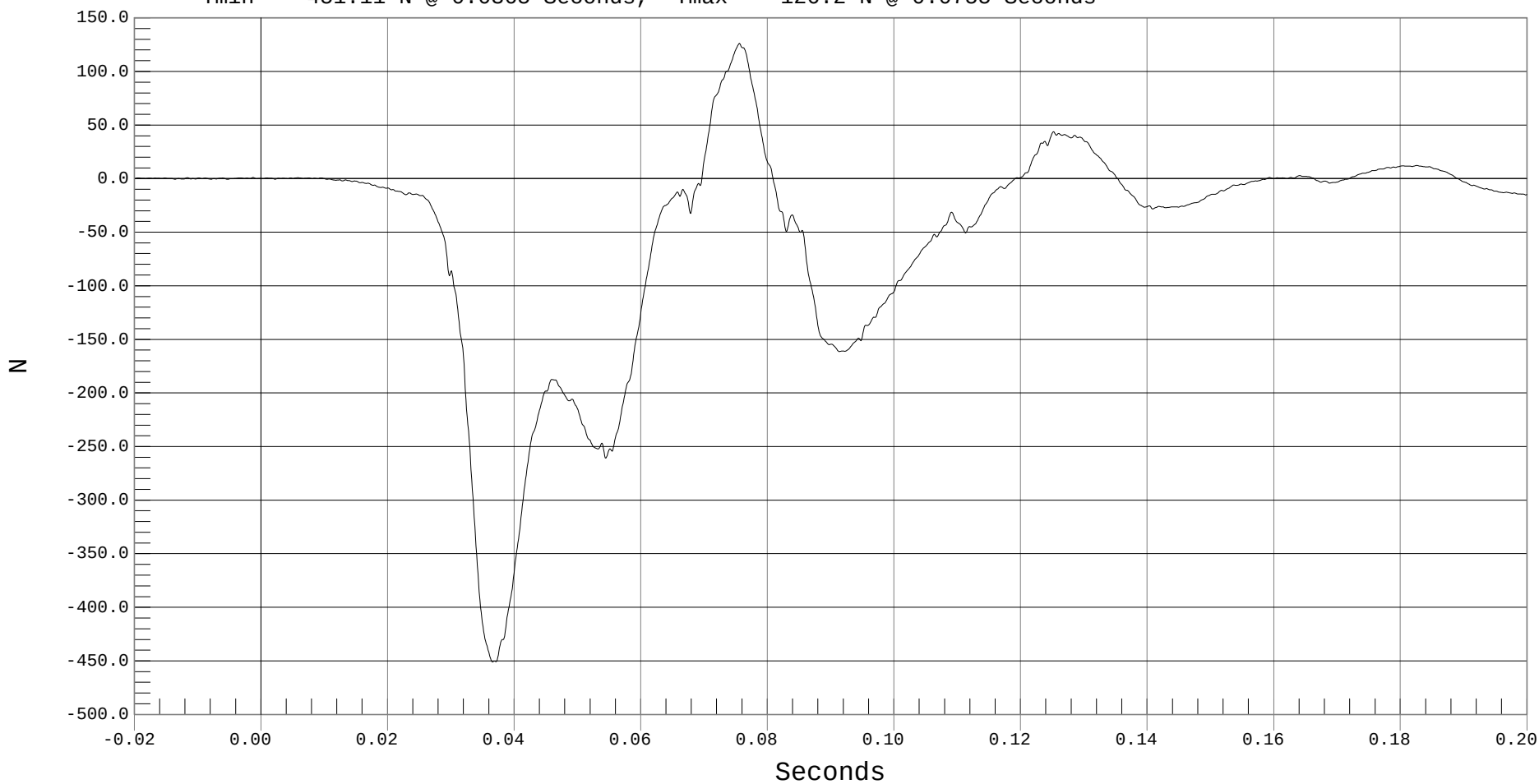
DRIVER SHOULDER FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER SHOULDER FORCE Z, B01105FF.F18

Ymin = -451.11 N @ 0.0365 Seconds, Ymax = 126.2 N @ 0.0755 Seconds





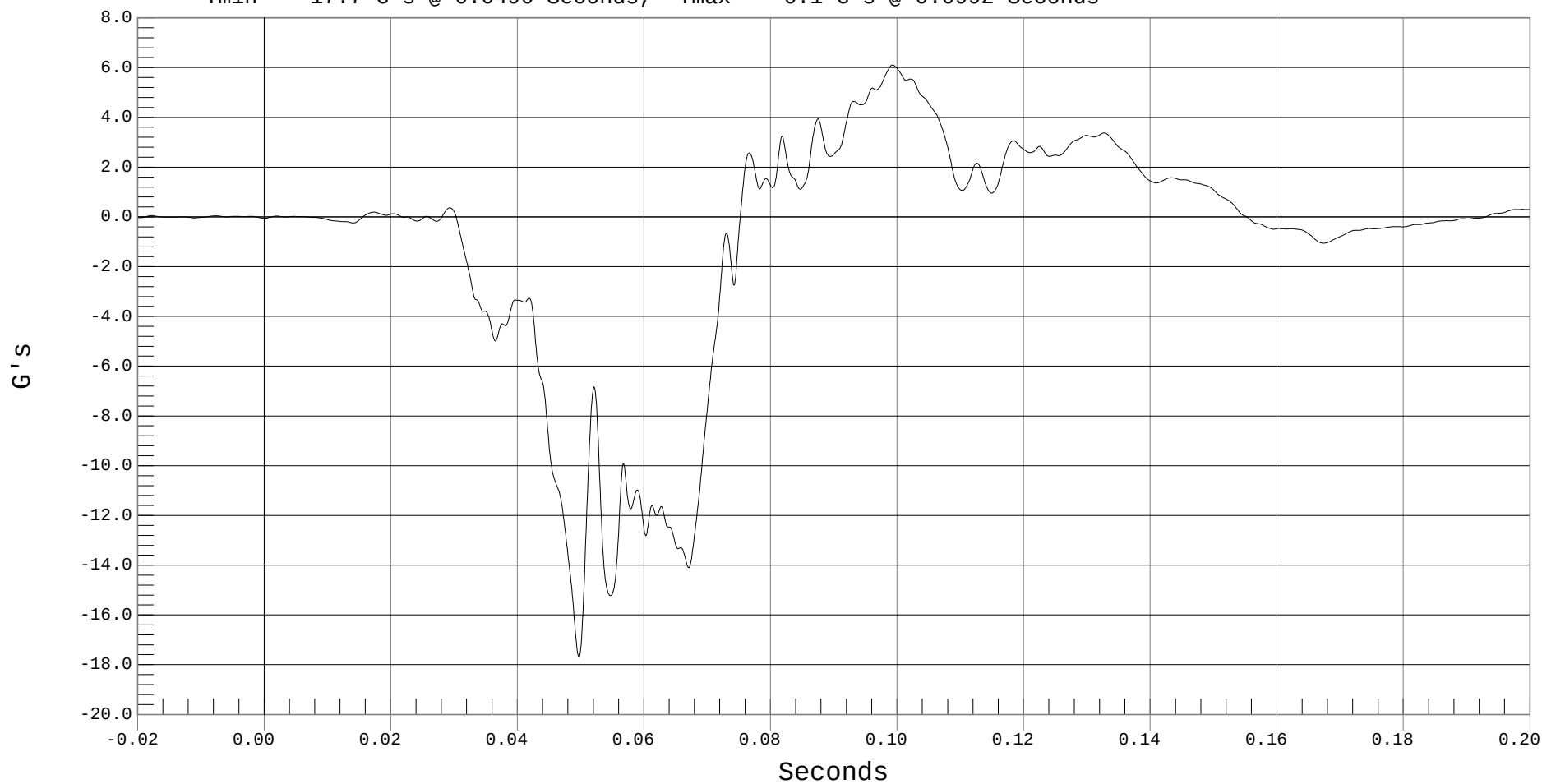
DRIVER UPPER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER UPPER SPINE X, B01105AF.A20

Ymin = -17.7 G's @ 0.0496 Seconds, Ymax = 6.1 G's @ 0.0992 Seconds





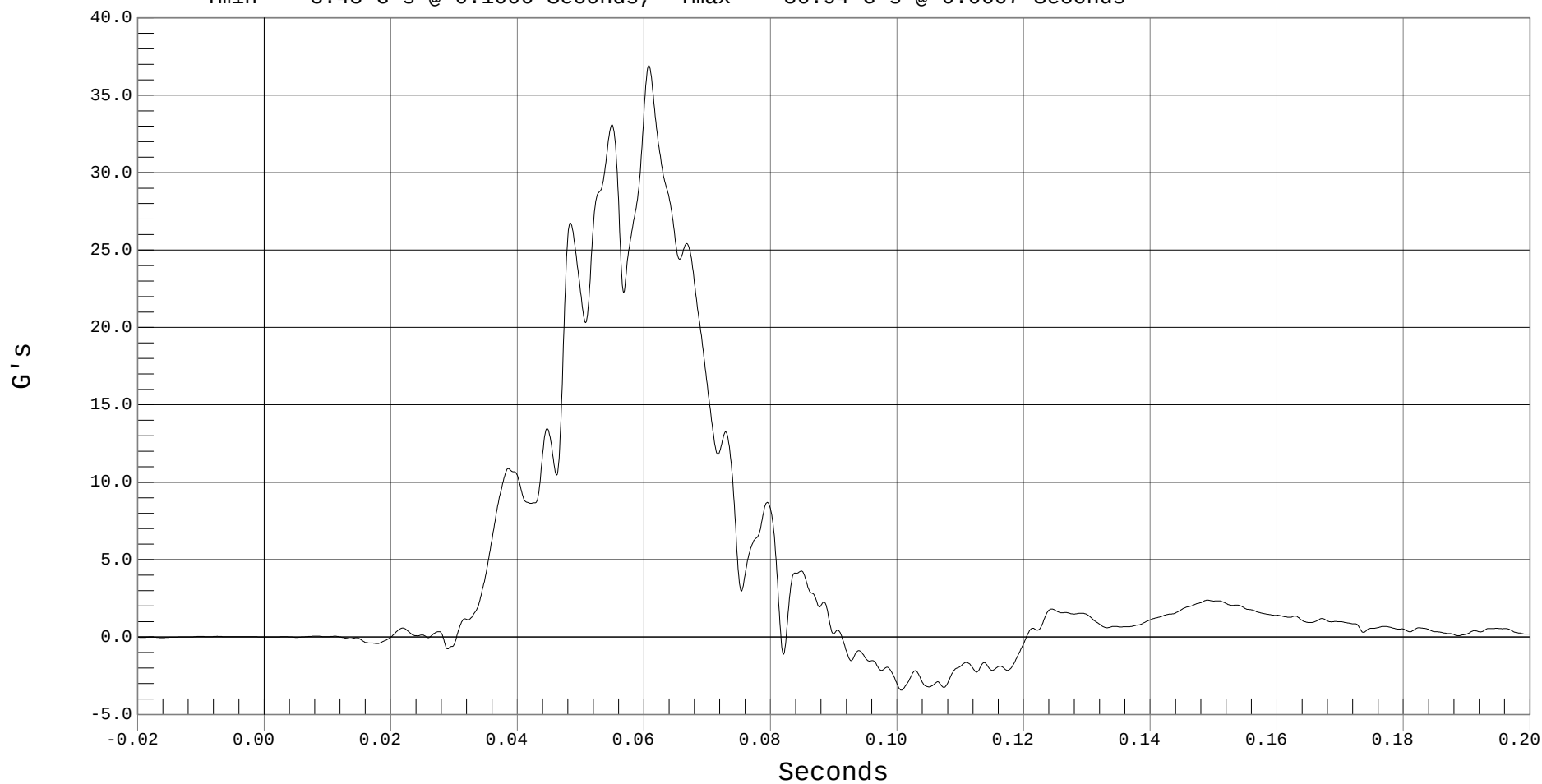
DRIVER UPPER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

1 DRIVER UPPER SPINE Y, B01105AF.A21

Ymin = -3.43 G's @ 0.1006 Seconds, Ymax = 36.94 G's @ 0.0607 Seconds





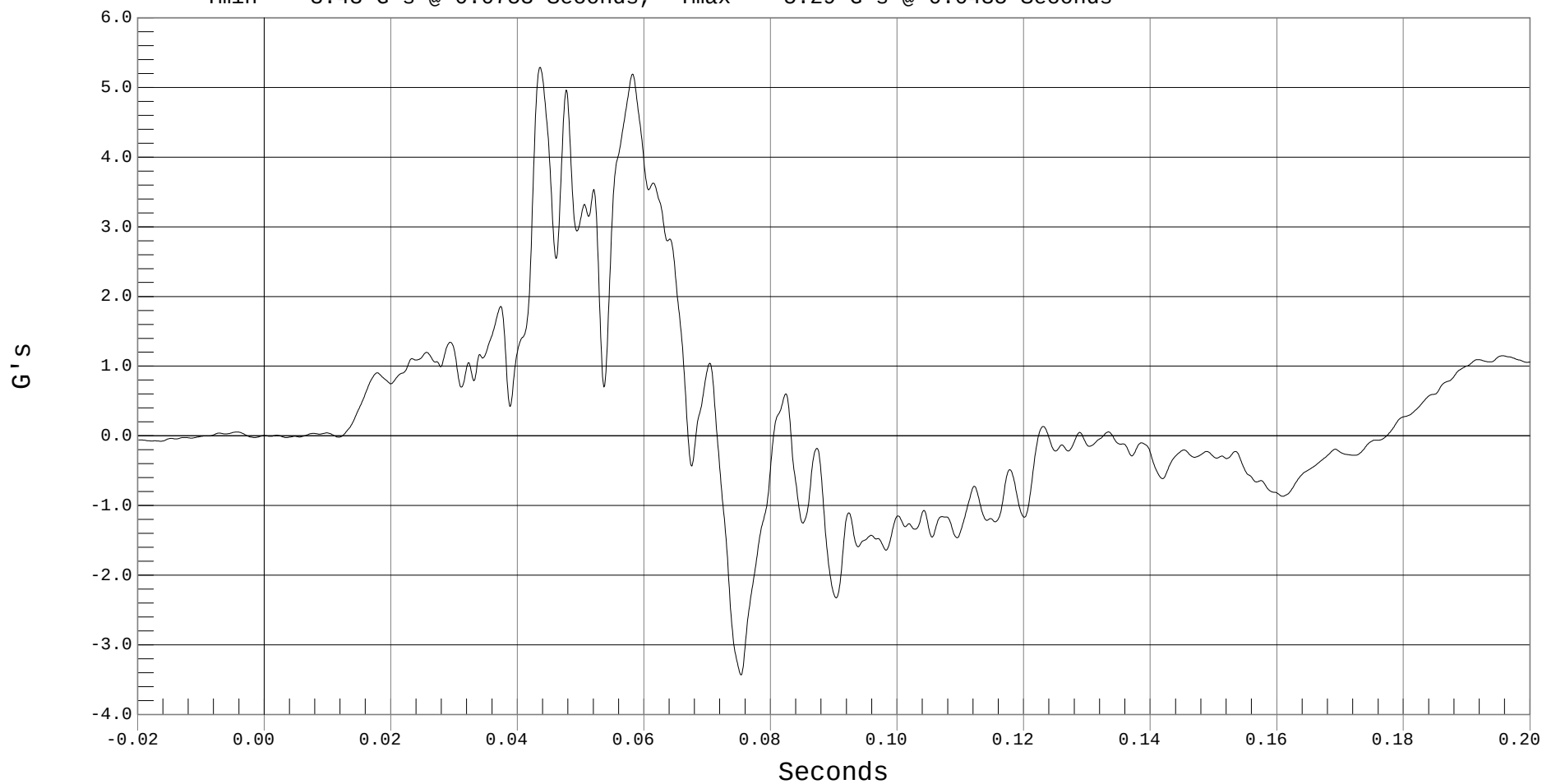
DRIVER UPPER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

1 DRIVER UPPER SPINE Z, B01105AF.A22

Ymin = -3.43 G's @ 0.0753 Seconds, Ymax = 5.29 G's @ 0.0435 Seconds





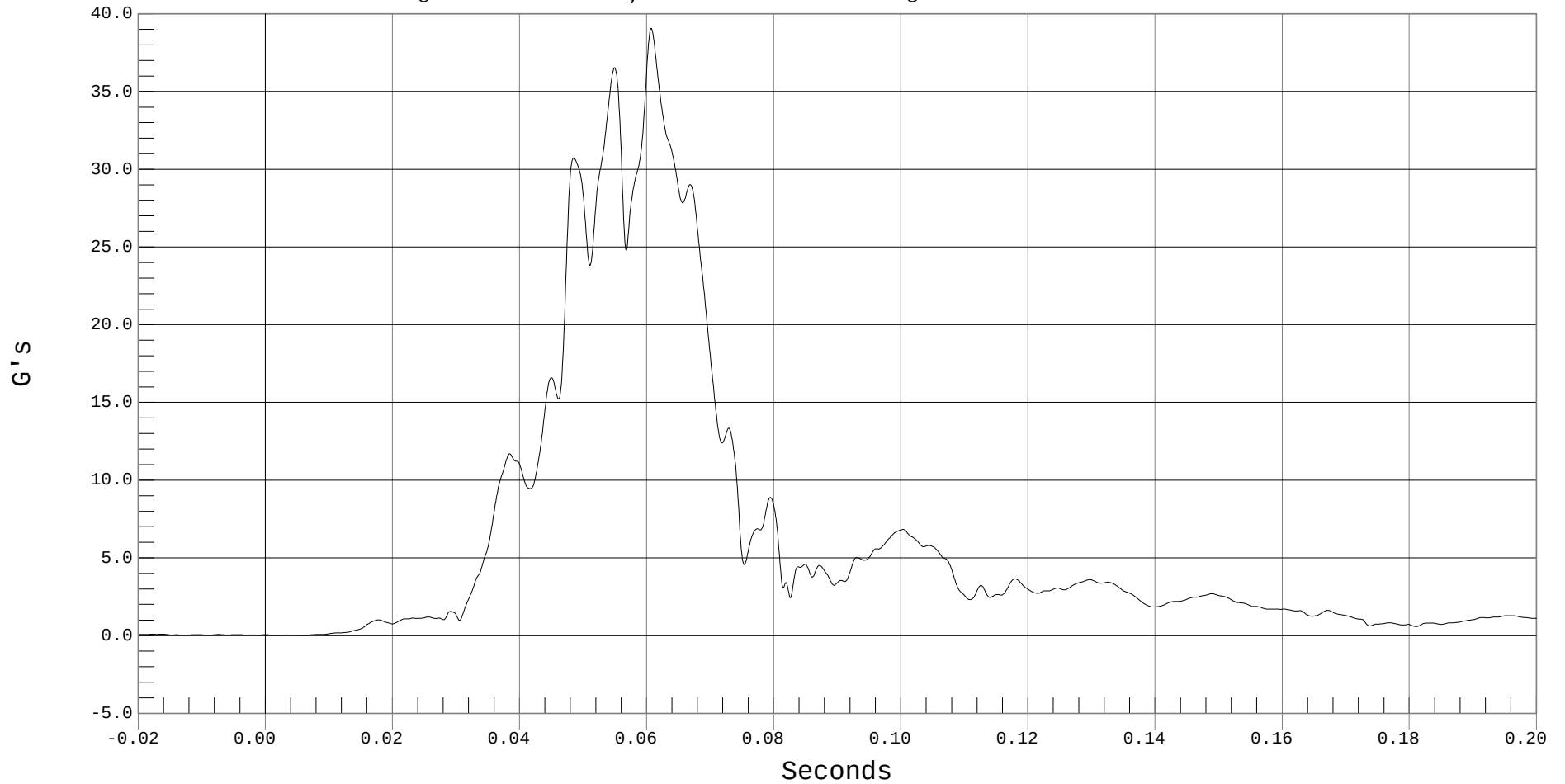
DRIVER UPPER SPINE RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER UPPER SPINE RESULTANT, B01105AV.A20

Ymin = .01 G's @ 0.0011 Seconds, Ymax = 39.06 G's @ 0.0606 Seconds





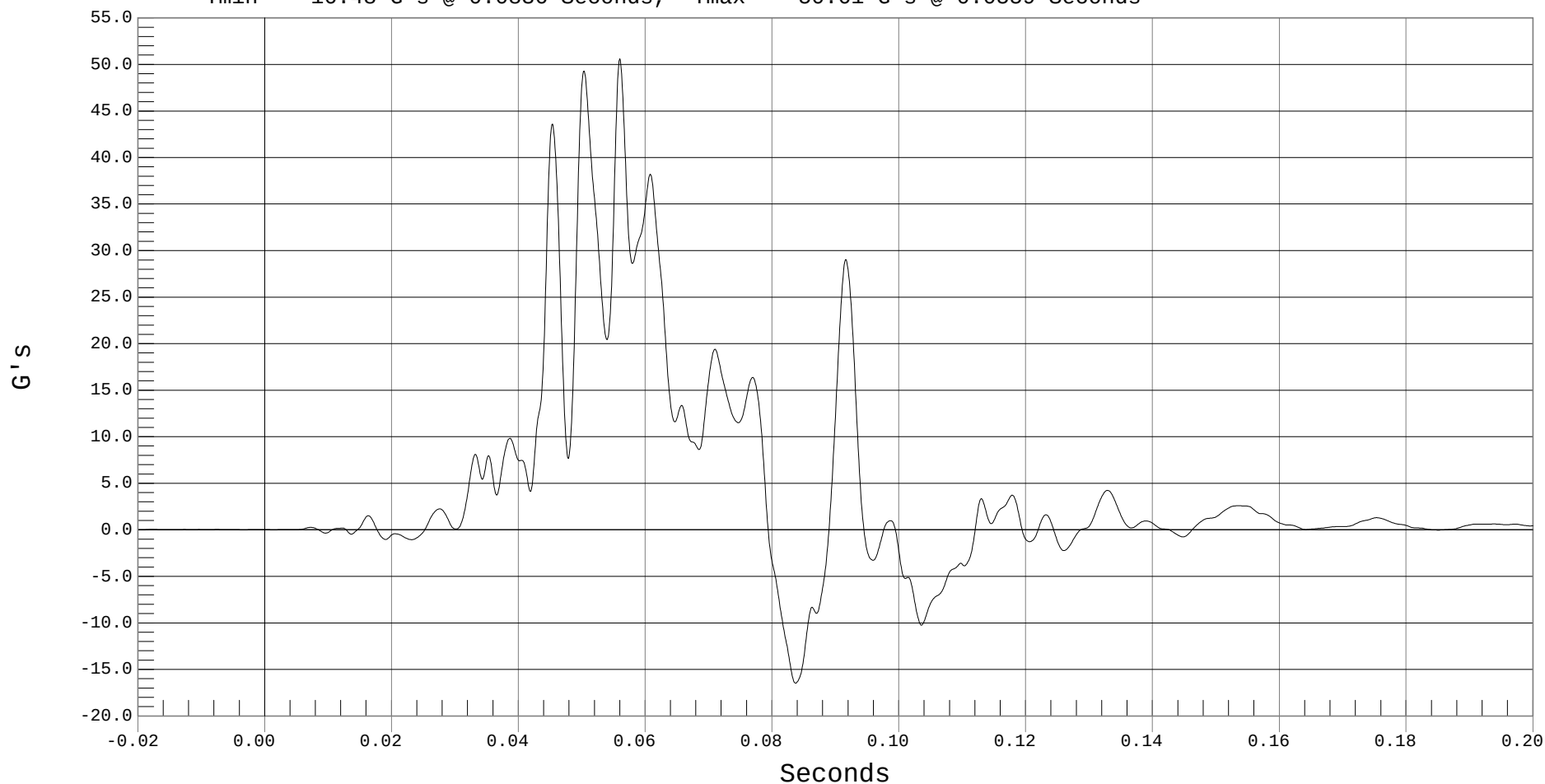
DRIVER UPPER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

1 DRIVER UPPER RIB Y, B01105AF.A23

Ymin = -16.48 G's @ 0.0836 Seconds, Ymax = 50.61 G's @ 0.0559 Seconds





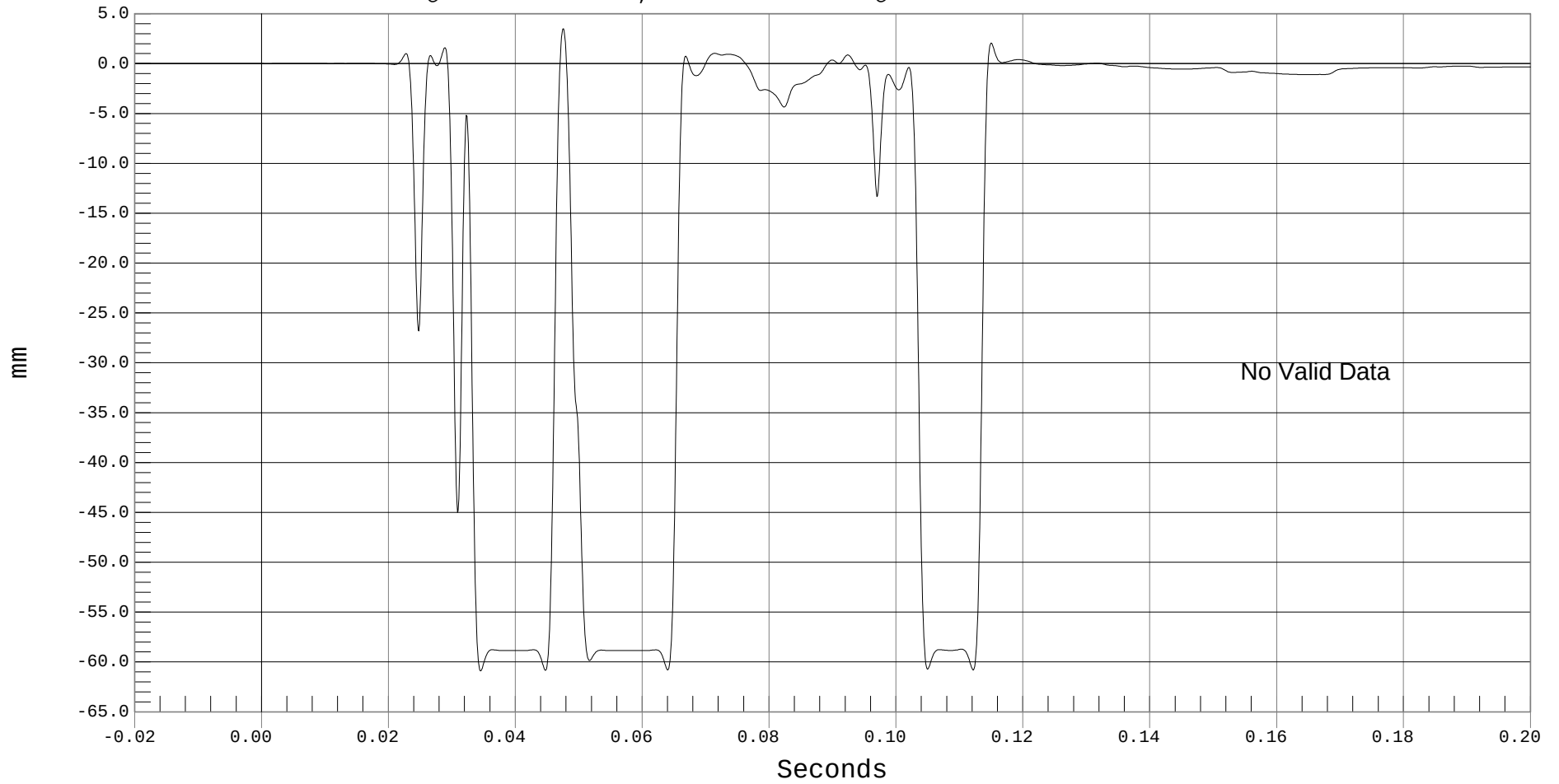
DRIVER UPPER RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER UPPER RIB DISPLACEMENT, B01105DF.D26

Ymin = -60.89 mm @ 0.0344 Seconds, Ymax = 3.5 mm @ 0.0475 Seconds





DRIVER UPPER RIB VISCOUS CRITERIA

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

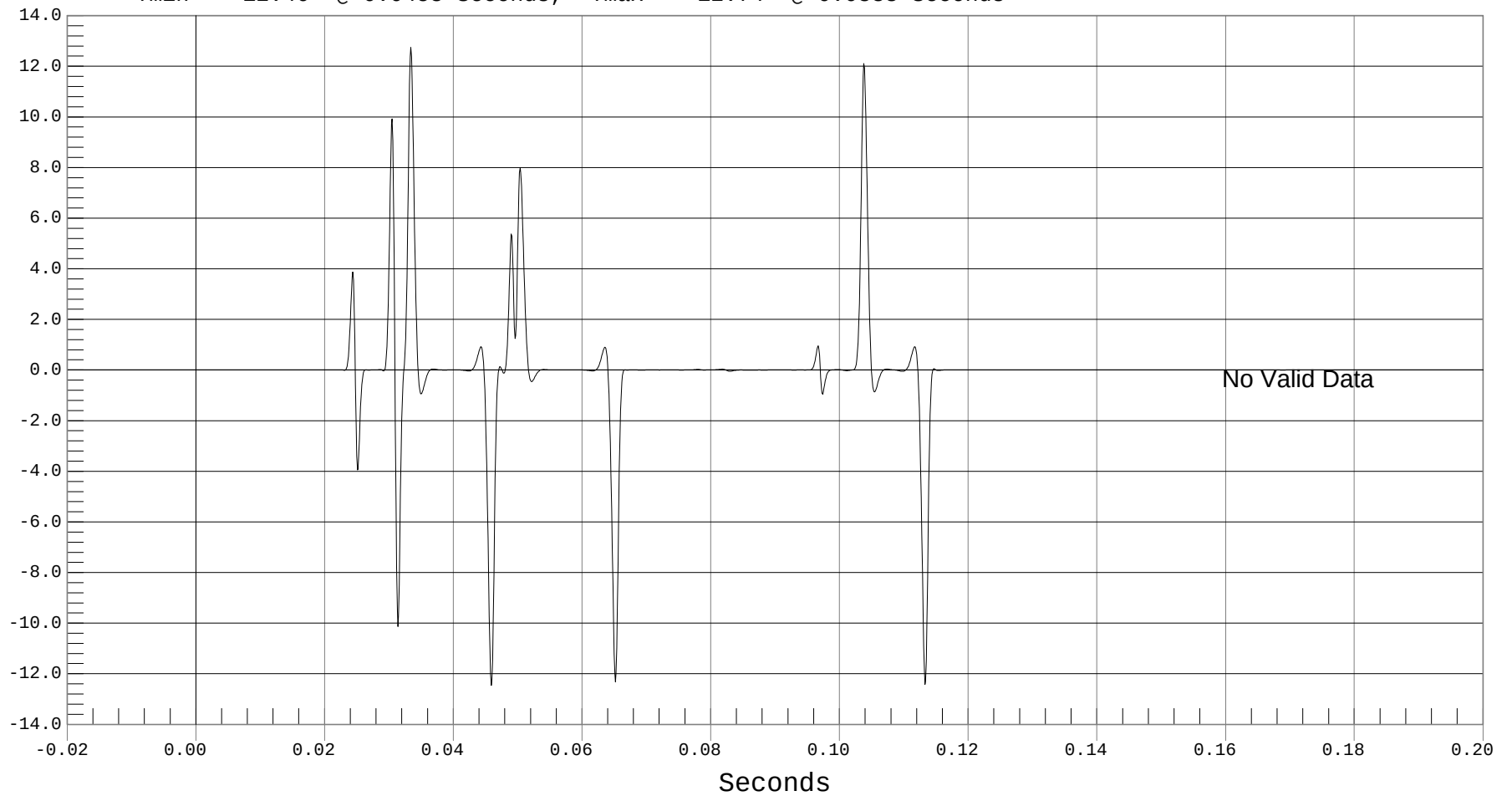
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 180

— 1 Viscous Criterion, B01105DV.C26

Ymin = -12.46 @ 0.0458 Seconds, Ymax = 12.74 @ 0.0333 Seconds





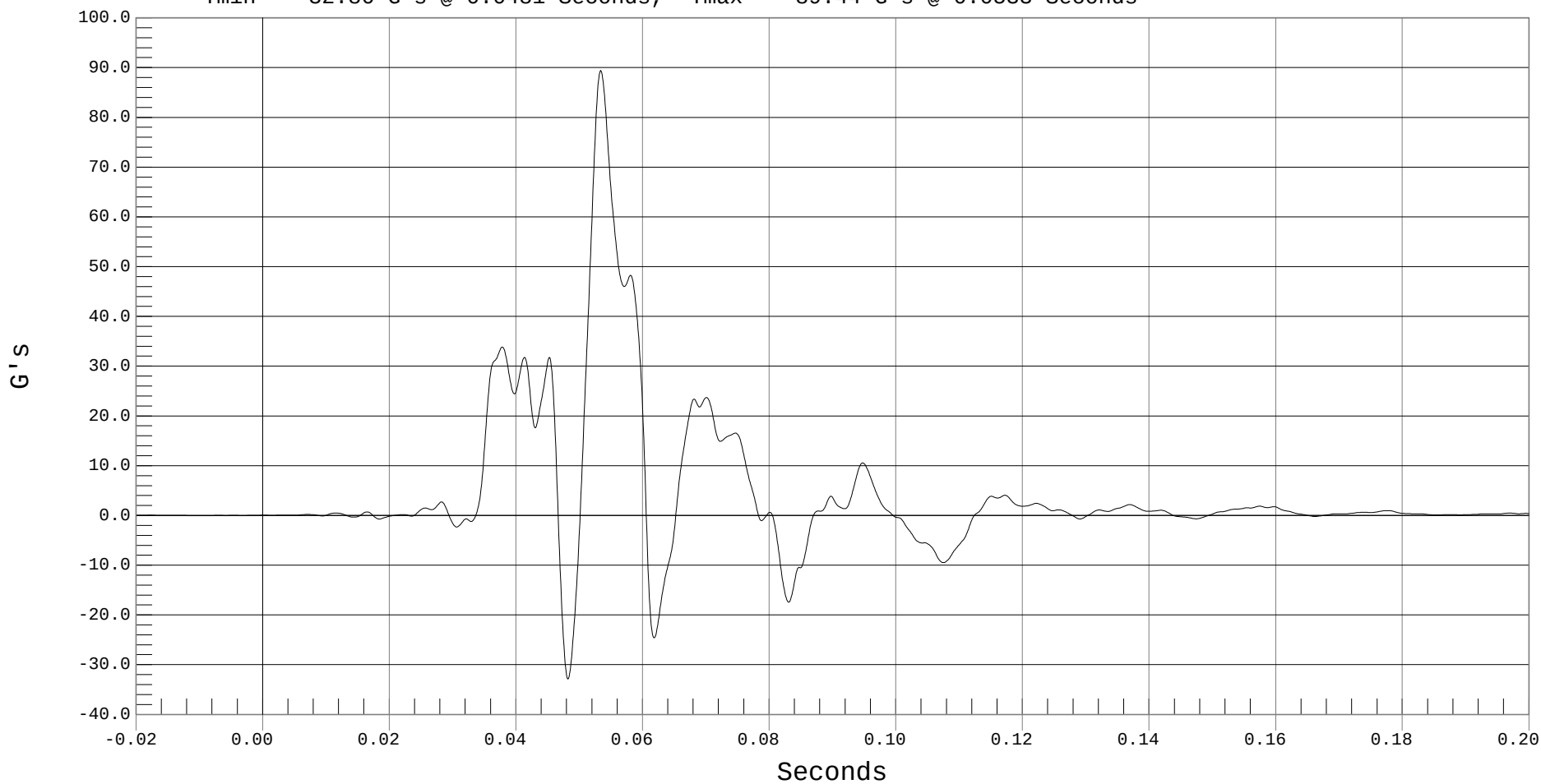
DRIVER MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER MID RIB Y, B01105AF.A24

Ymin = -32.86 G's @ 0.0481 Seconds, Ymax = 89.44 G's @ 0.0533 Seconds





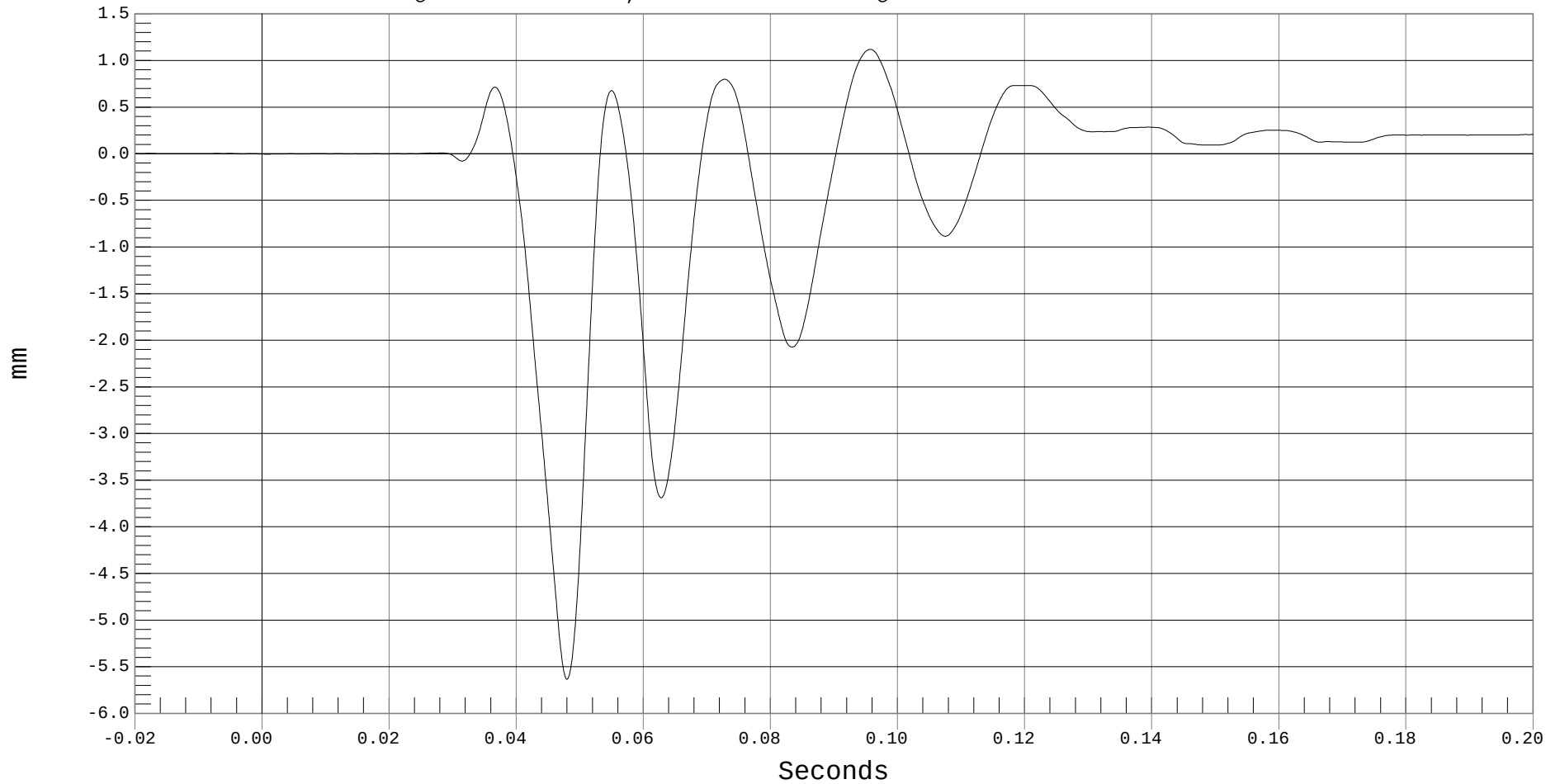
DRIVER MID RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER MID RIB DISPLACEMENT, B01105DF.D27

Ymin = -5.64 mm @ 0.0479 Seconds, Ymax = 1.12 mm @ 0.0956 Seconds





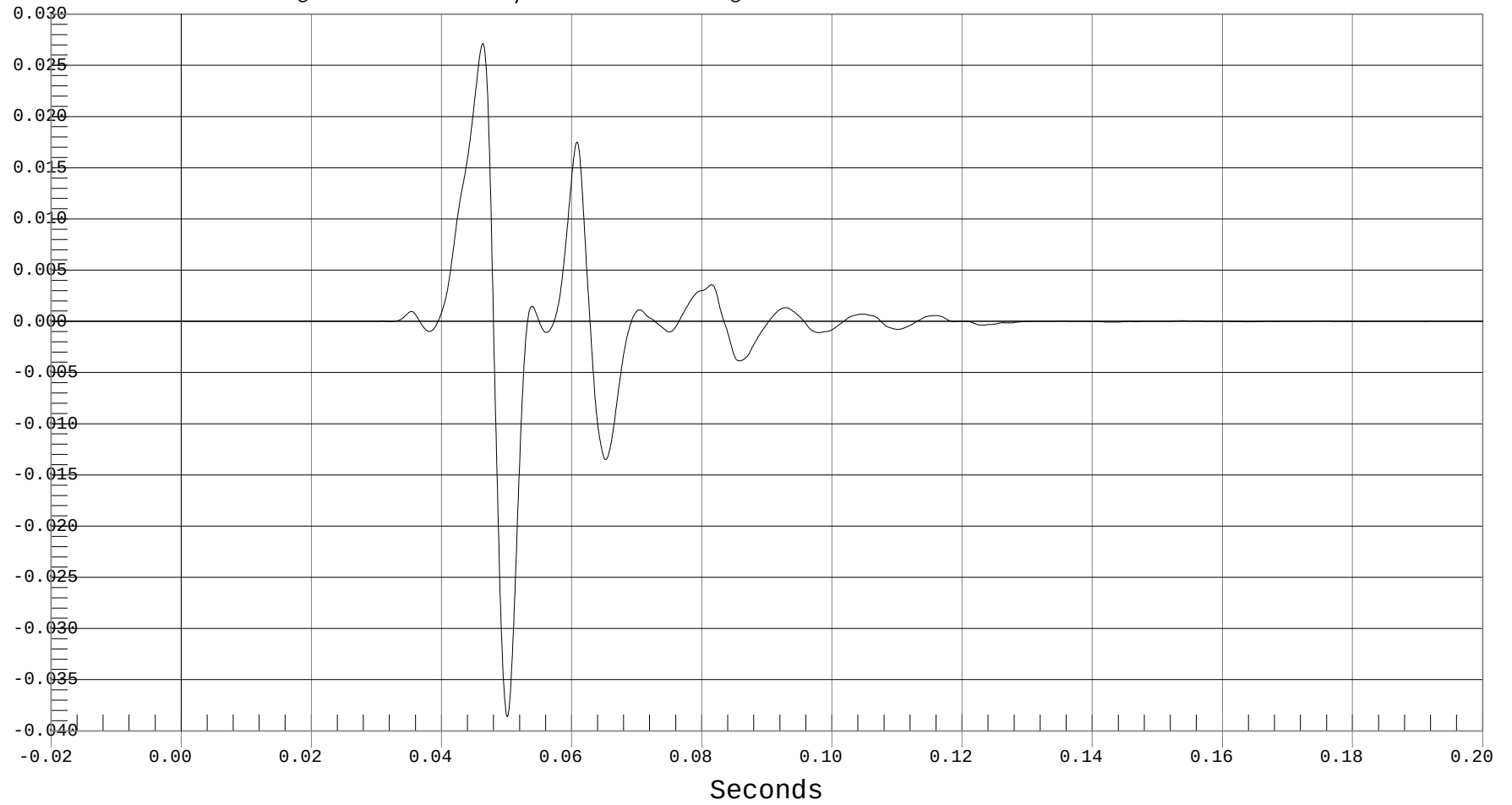
DRIVER MID RIB VISCOUS CRITERIA

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 Viscous Criterion, B01105DV.C27

Ymin = -.04 @ 0.0500 Seconds, Ymax = .03 @ 0.0462 Seconds





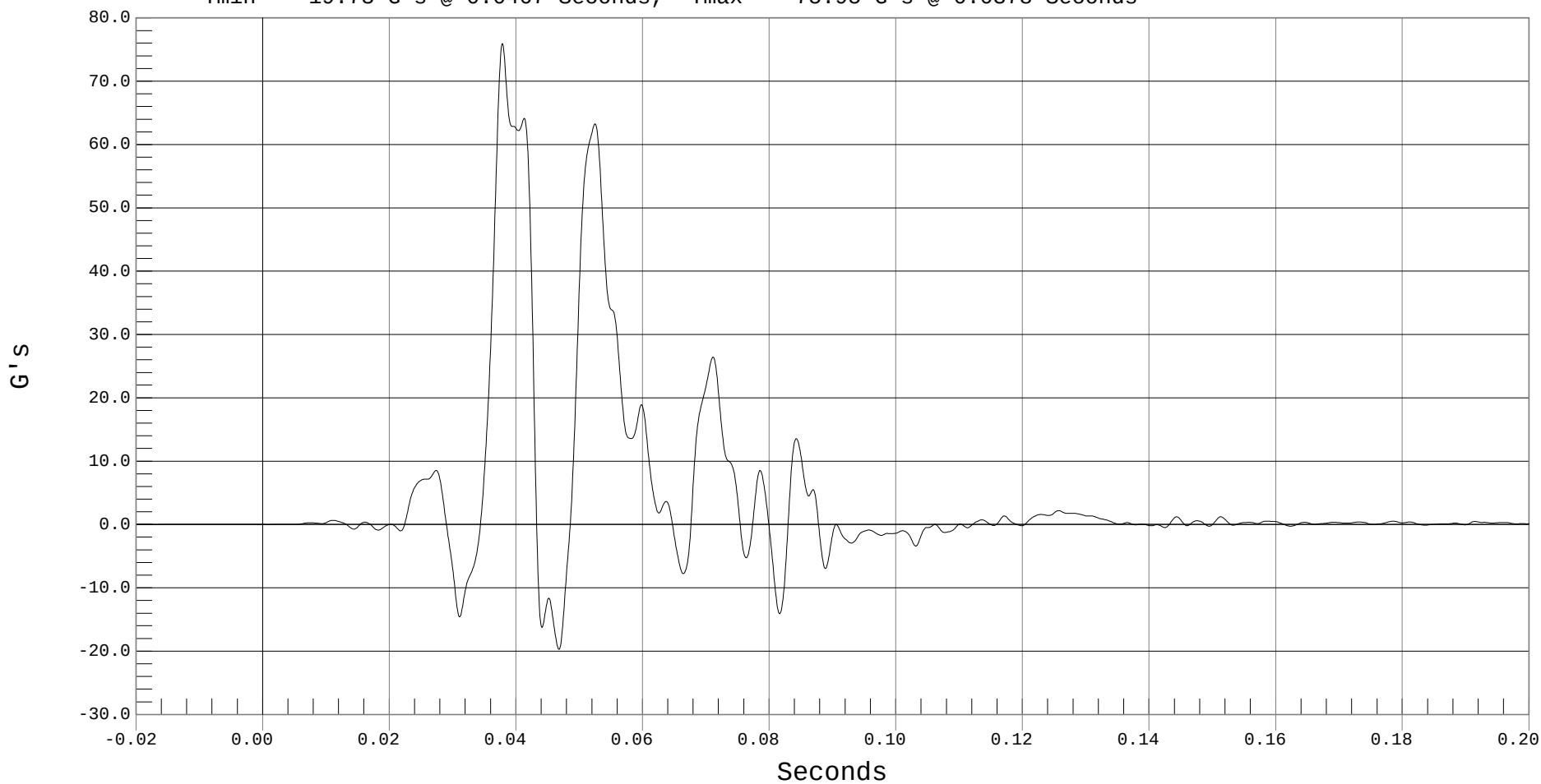
DRIVER LOWER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

1 DRIVER LOWER RIB Y, B01105AF.A25

Ymin = -19.73 G's @ 0.0467 Seconds, Ymax = 75.95 G's @ 0.0378 Seconds





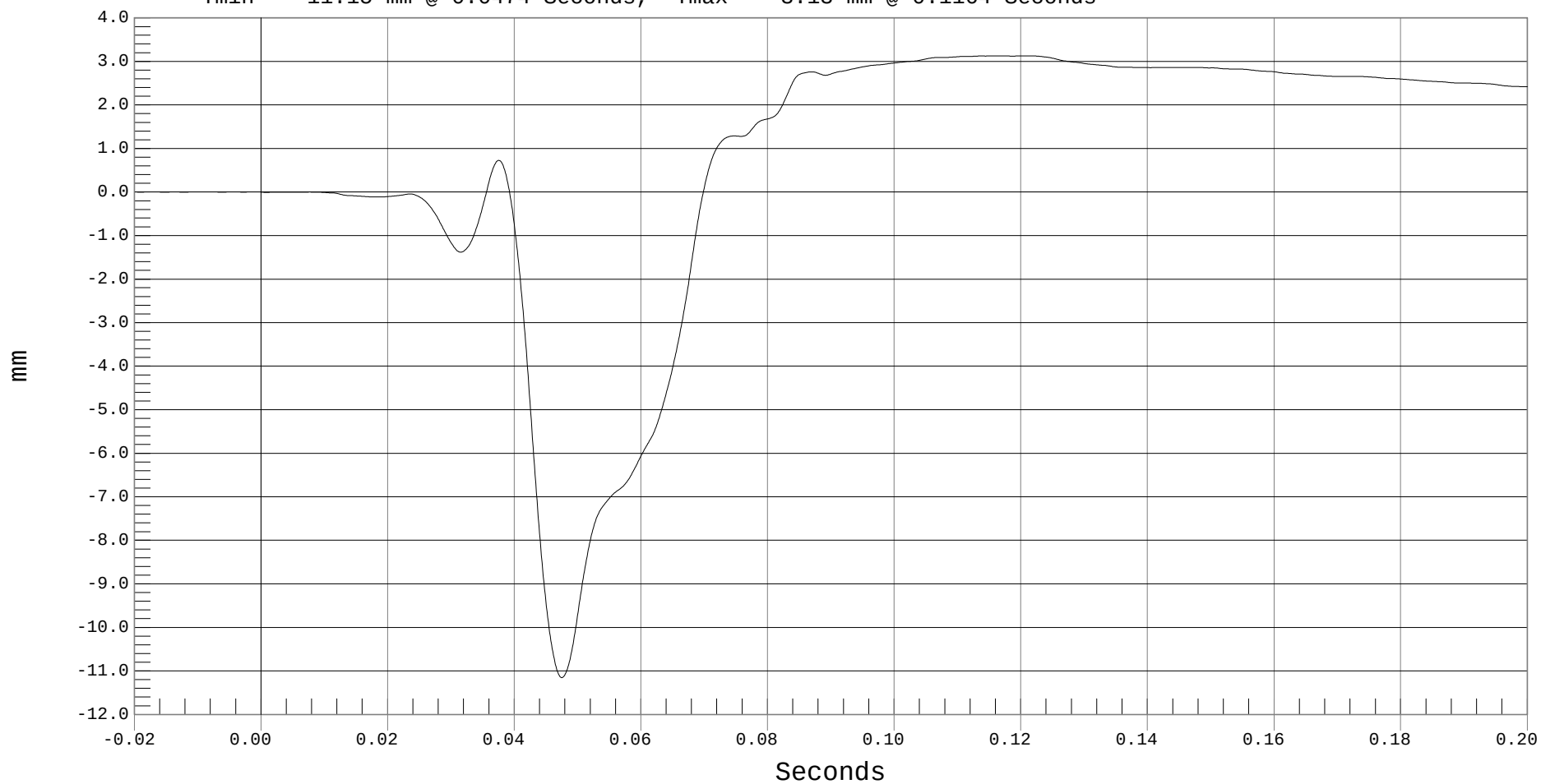
DRIVER LOWER RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER LOWER RIB DISPLACEMENT, B01105DF.D28

Ymin = -11.15 mm @ 0.0474 Seconds, Ymax = 3.13 mm @ 0.1164 Seconds





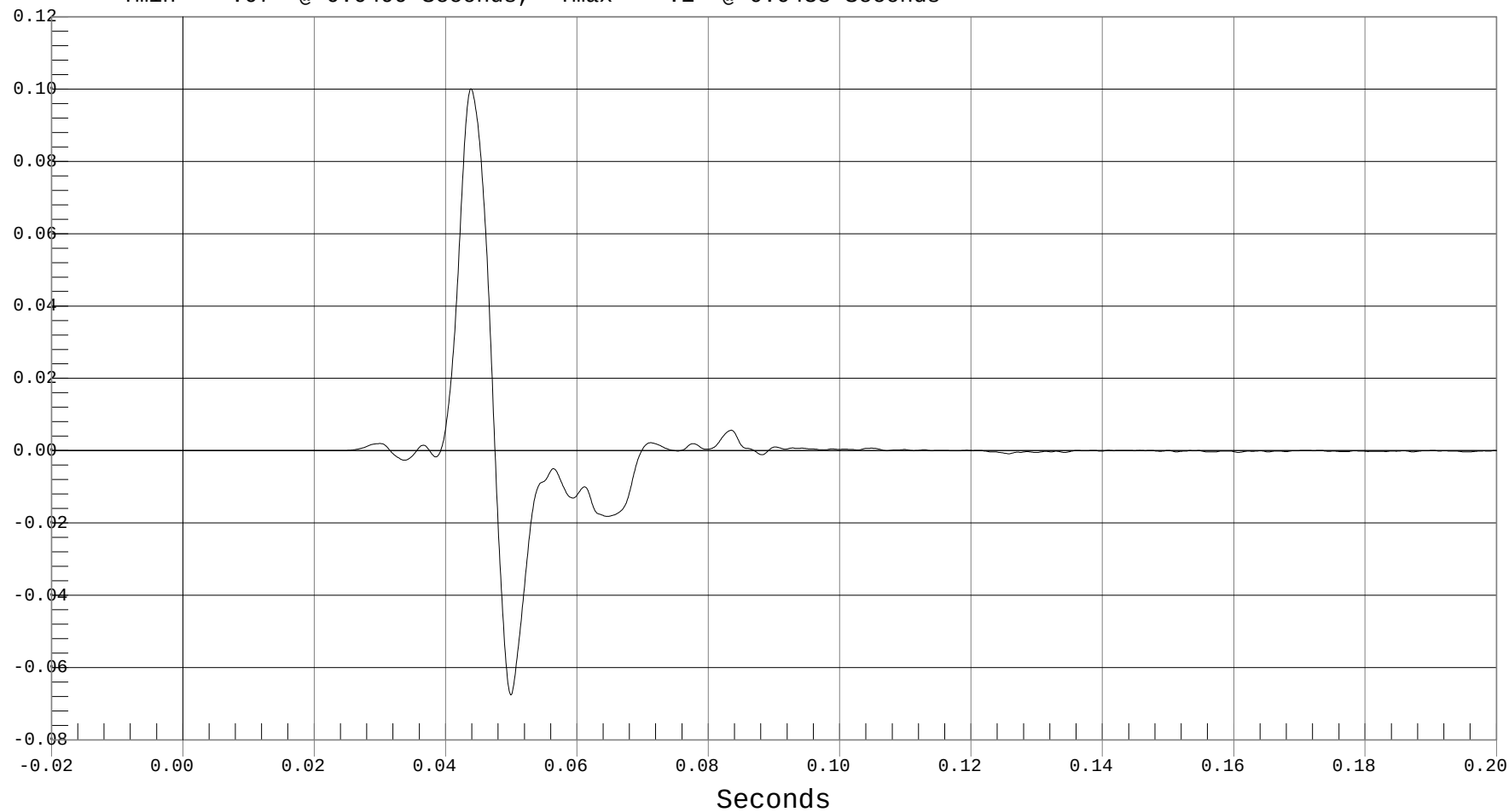
DRIVER LOWER RIB VISCOUS CRITERIA

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 Viscous Criterion, B01105DV.C28

Ymin = -.07 @ 0.0499 Seconds, Ymax = .1 @ 0.0438 Seconds





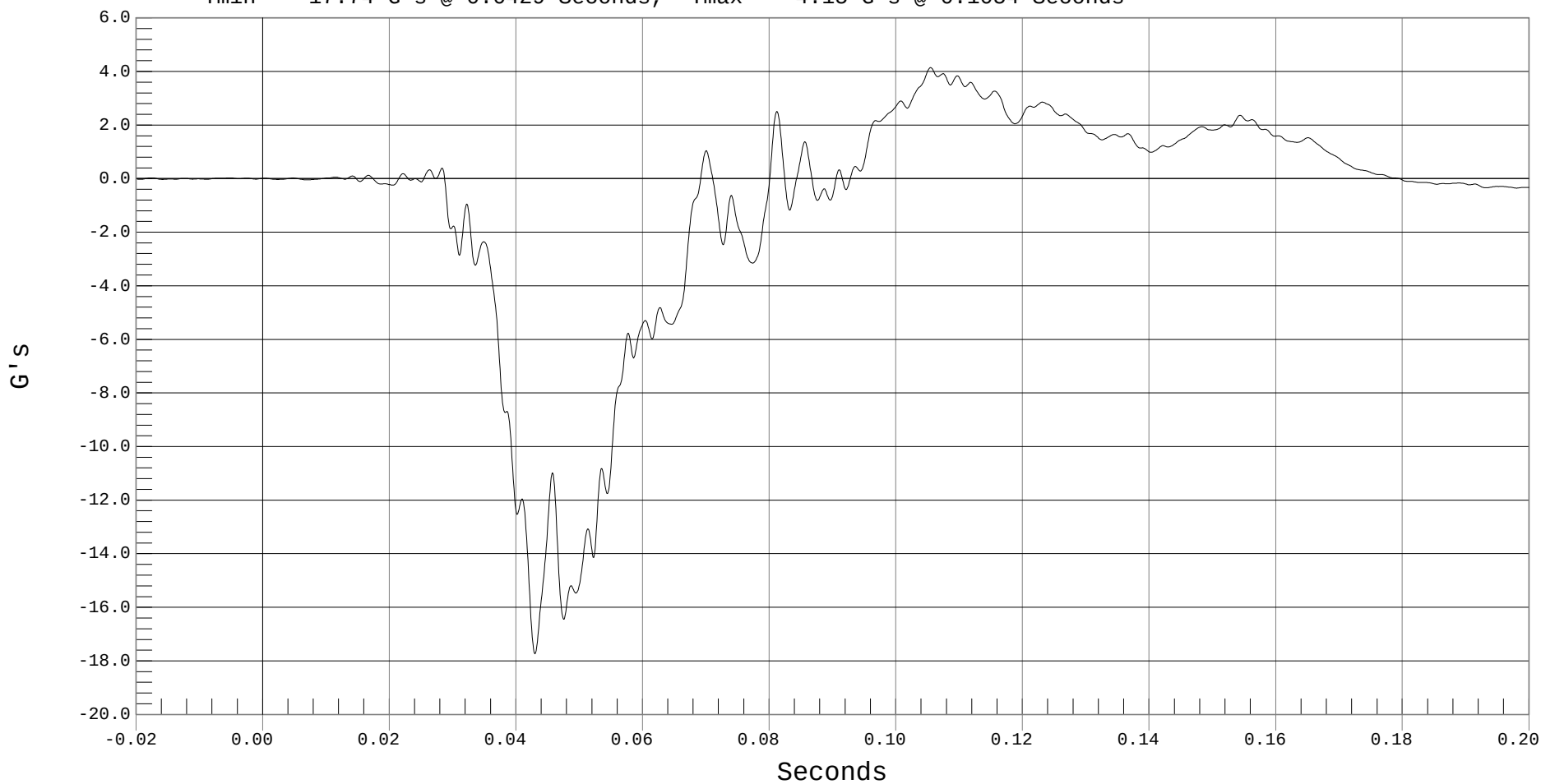
DRIVER LOWER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER LOWER SPINE X, B01105AF.A29

Ymin = -17.74 G's @ 0.0429 Seconds, Ymax = 4.15 G's @ 0.1054 Seconds





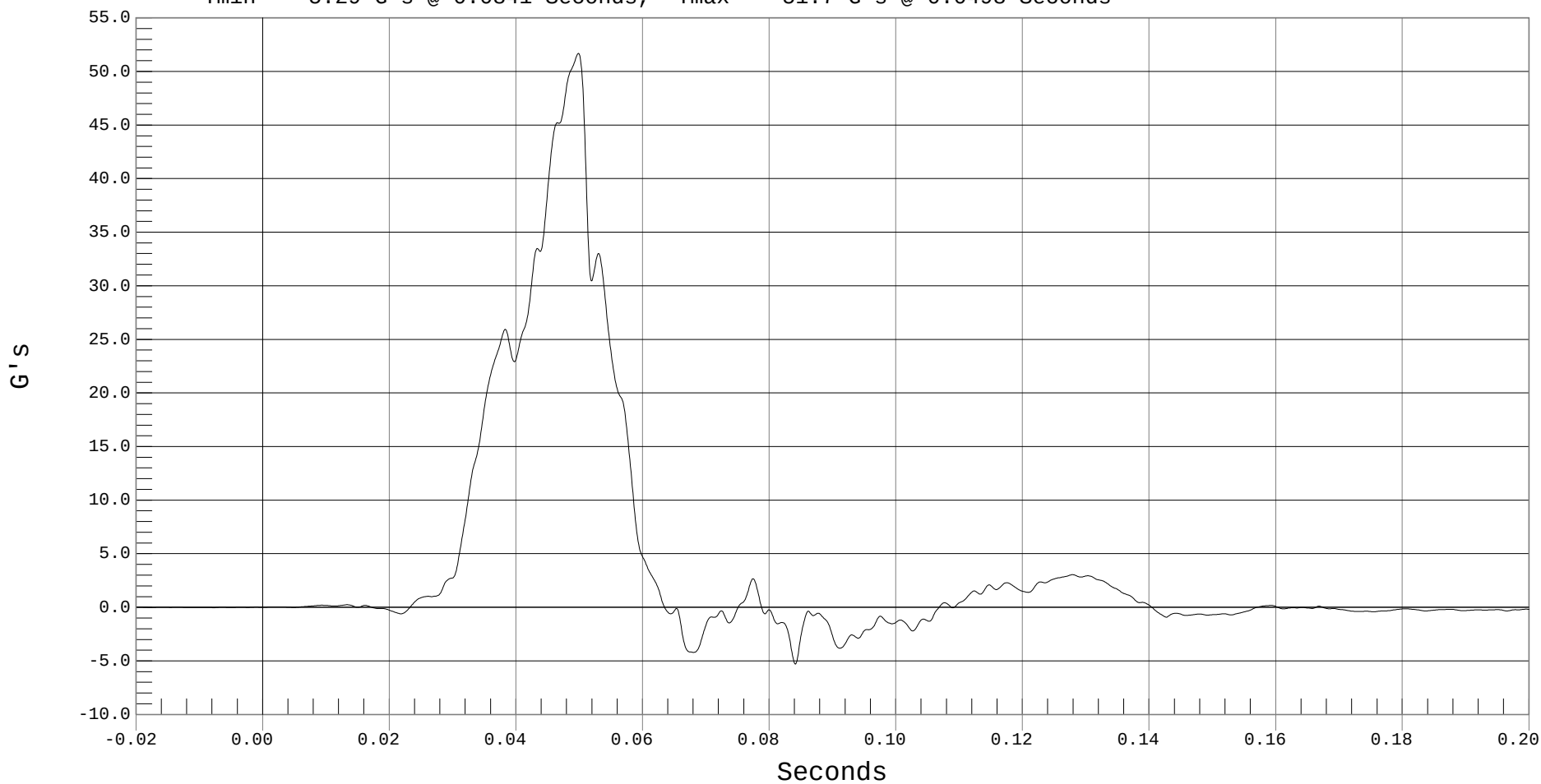
DRIVER LOWER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER LOWER SPINE Y, B01105AF.A30

Ymin = -5.29 G's @ 0.0841 Seconds, Ymax = 51.7 G's @ 0.0498 Seconds





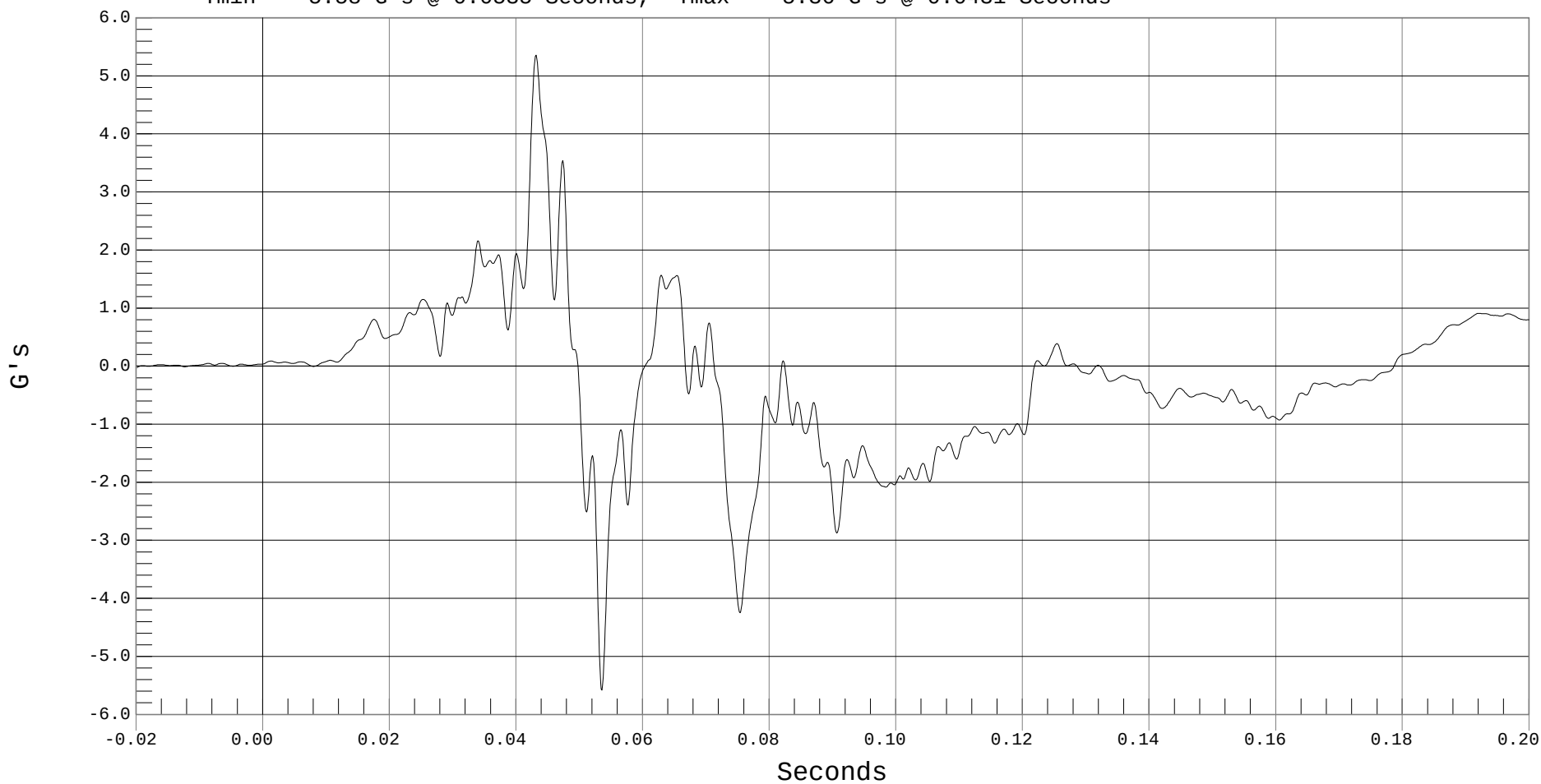
DRIVER LOWER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER LOWER SPINE Z, B01105AF.A31

Ymin = -5.58 G's @ 0.0535 Seconds, Ymax = 5.36 G's @ 0.0431 Seconds





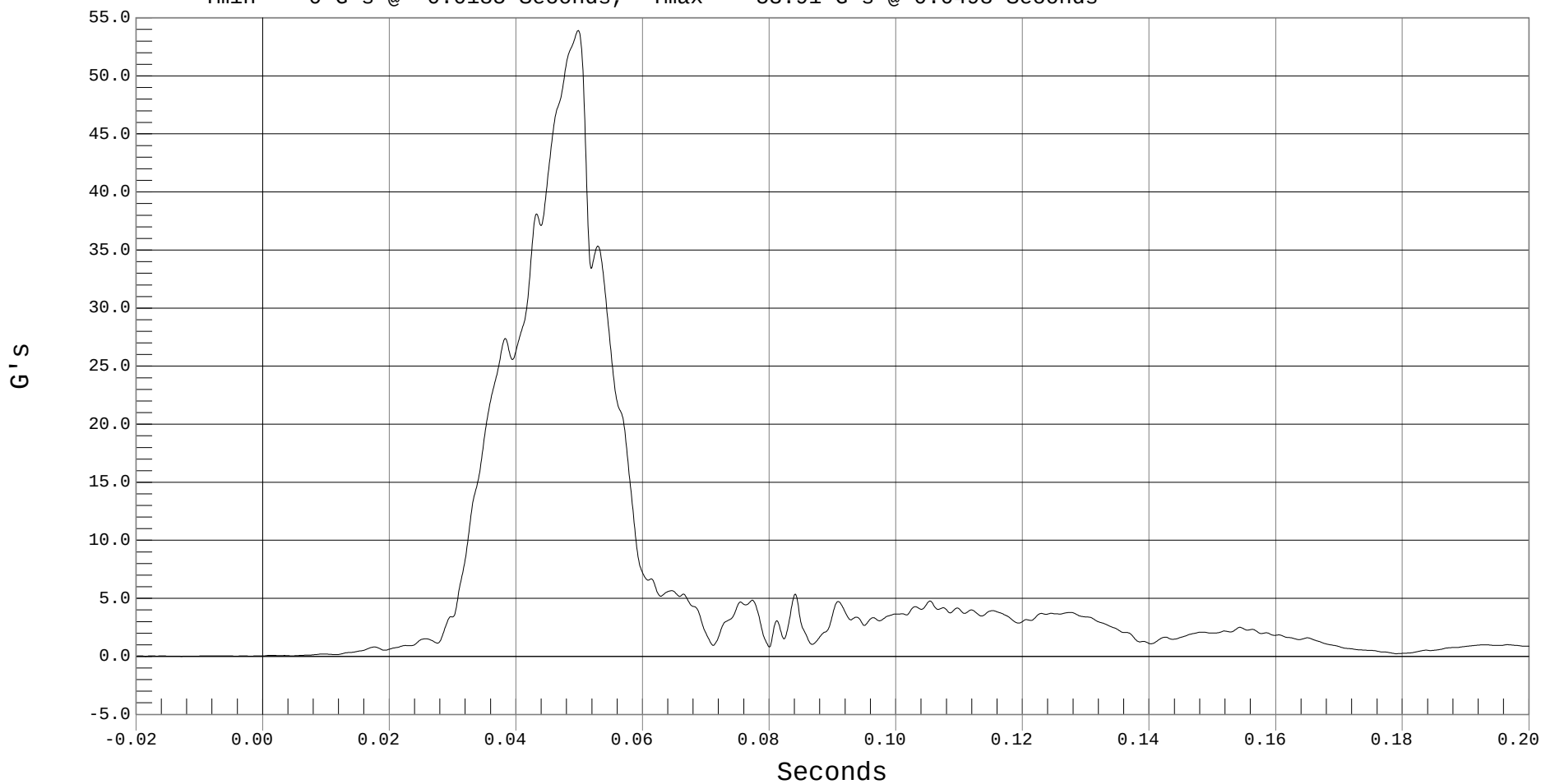
DRIVER LOWER SPINE RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 DRIVER LOWER SPINE RESULTANT, B01105AV.A29

Ymin = 0 G's @ -0.0185 Seconds, Ymax = 53.91 G's @ 0.0498 Seconds





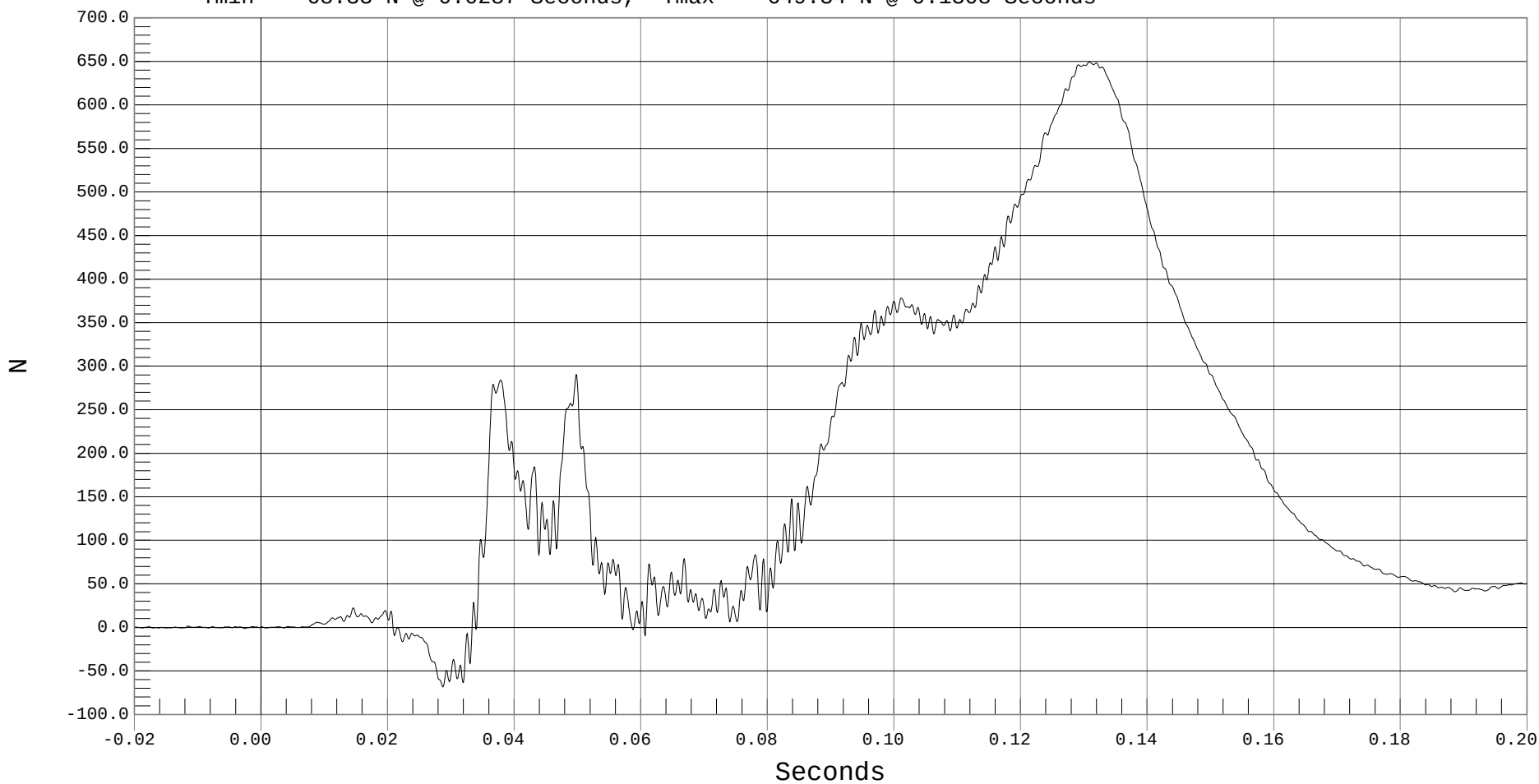
DRIVER TORSO FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER TORSO FORCE X, B01105FF.F33

Ymin = -68.33 N @ 0.0287 Seconds, Ymax = 649.34 N @ 0.1308 Seconds





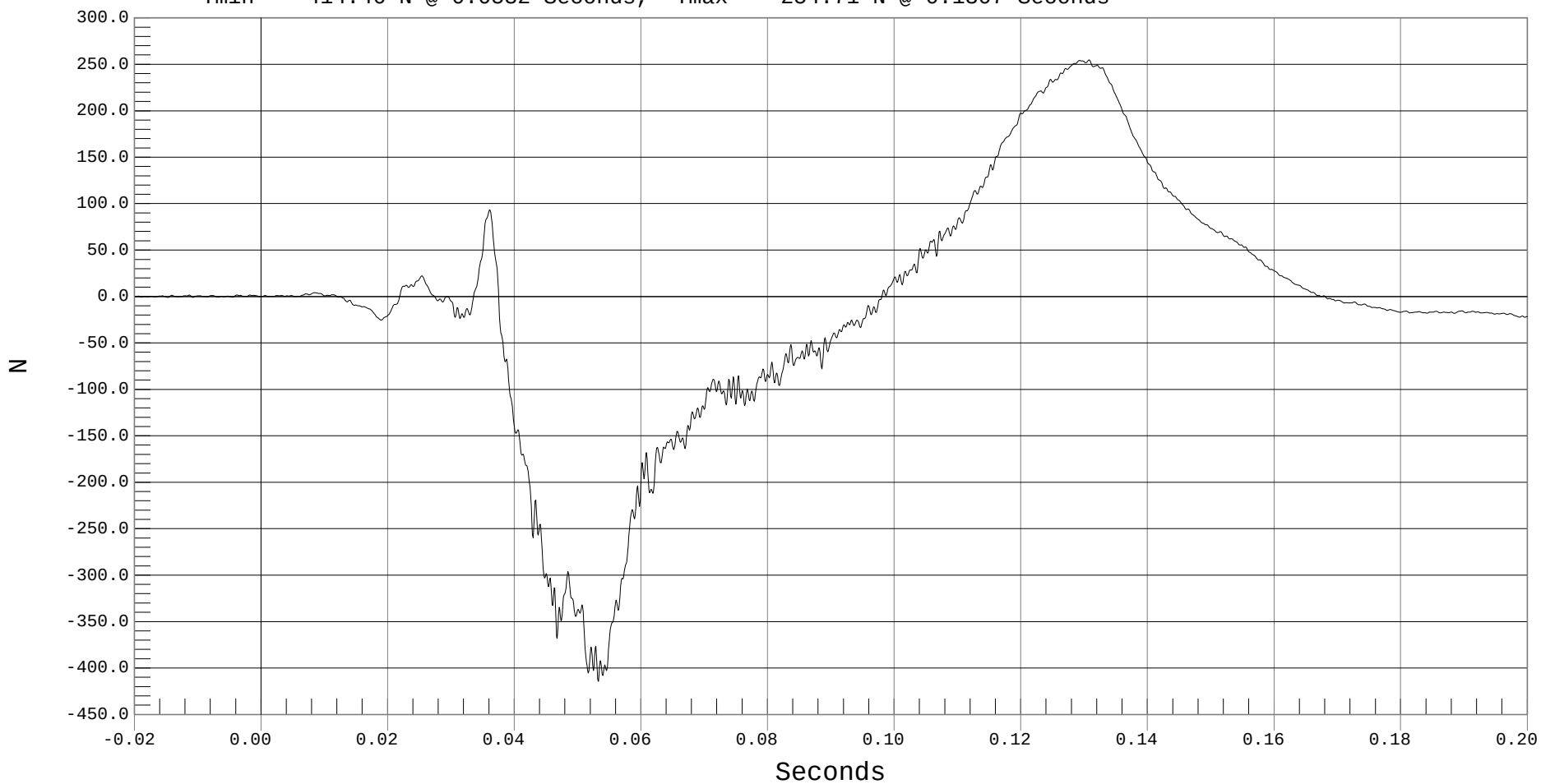
DRIVER TORSO FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER TORSO FORCE Y, B01105FF.F34

Ymin = -414.46 N @ 0.0532 Seconds, Ymax = 254.71 N @ 0.1307 Seconds





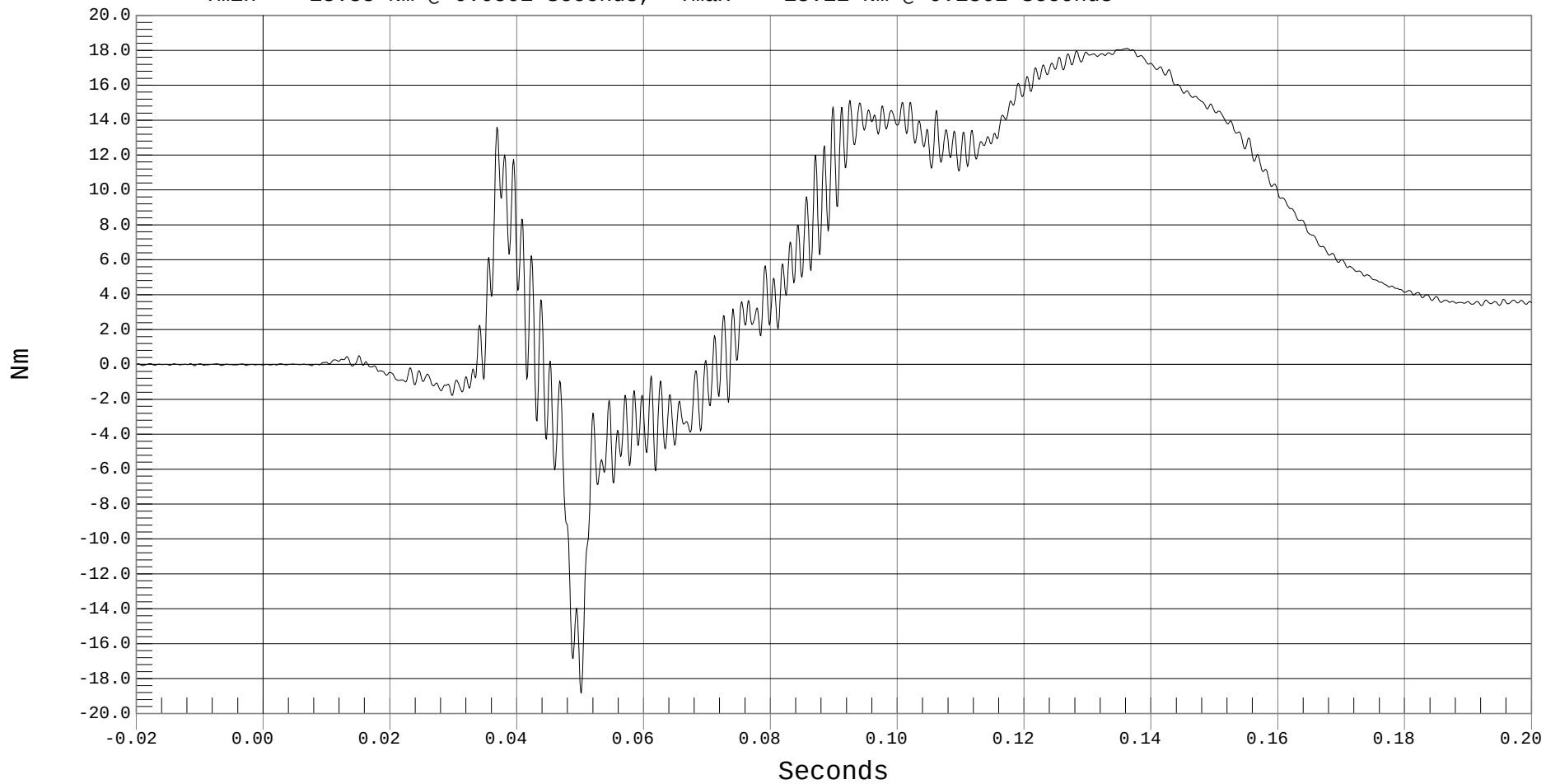
DRIVER TORSO MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER TORSO MOMENT Y, B01105MF.M35

Ymin = -18.83 Nm @ 0.0501 Seconds, Ymax = 18.11 Nm @ 0.1361 Seconds





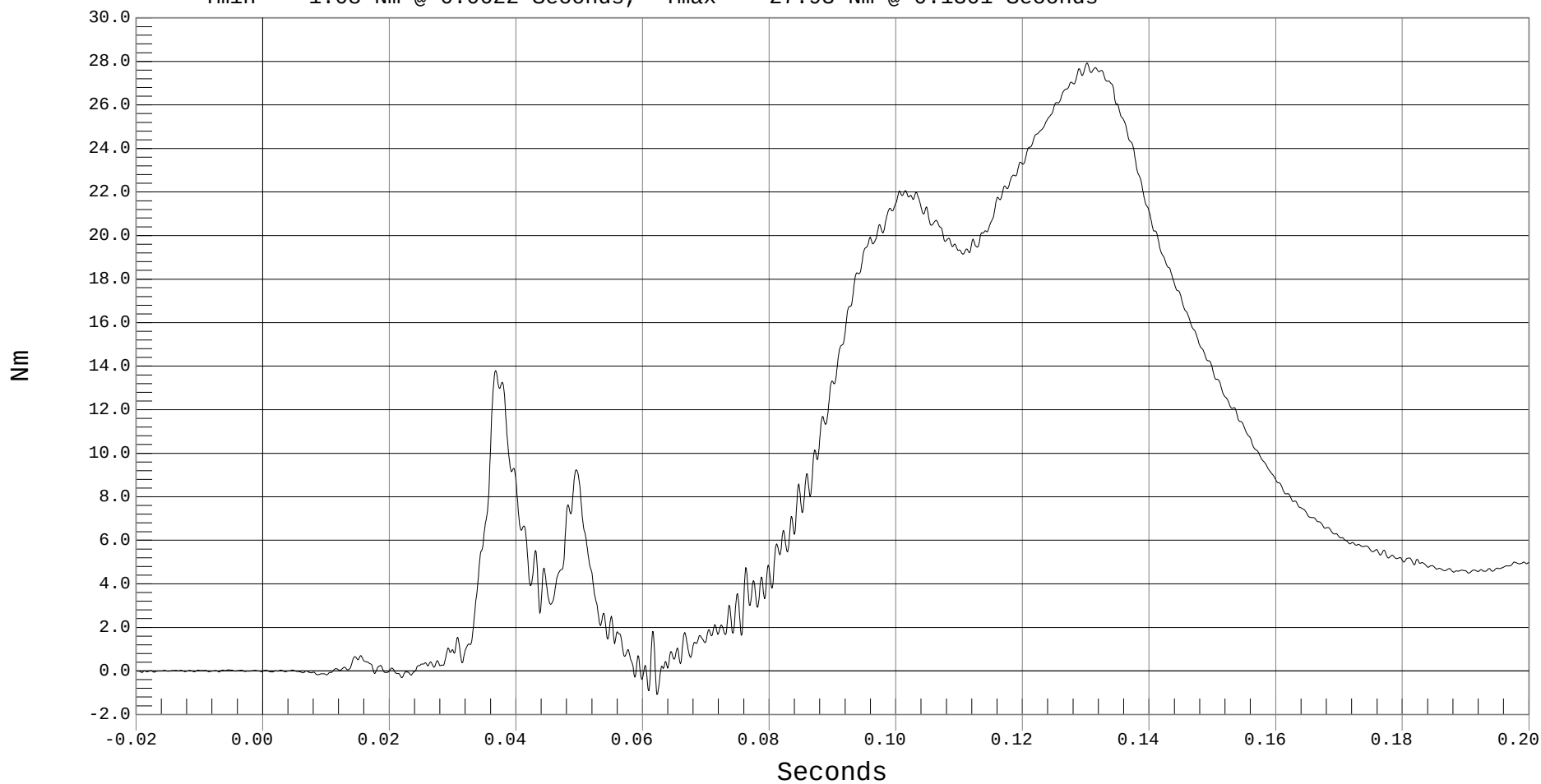
DRIVER TORSO MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER TORSO MOMENT Z, B01105MF.M36

Ymin = -1.08 Nm @ 0.0622 Seconds, Ymax = 27.93 Nm @ 0.1301 Seconds





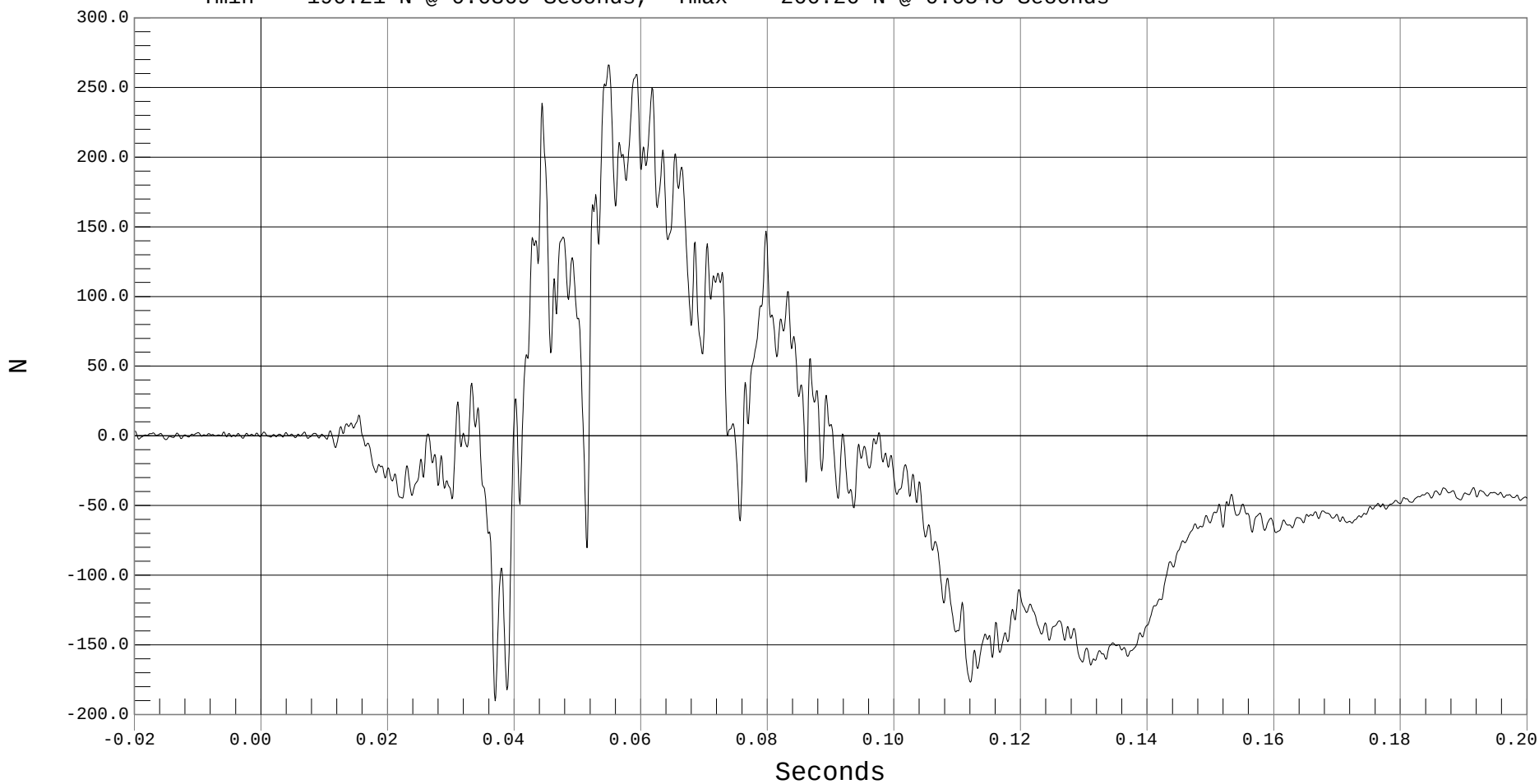
DRIVER T-12 FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER T-12 FORCE X, B01105FF.F37

Ymin = -190.21 N @ 0.0369 Seconds, Ymax = 266.26 N @ 0.0548 Seconds





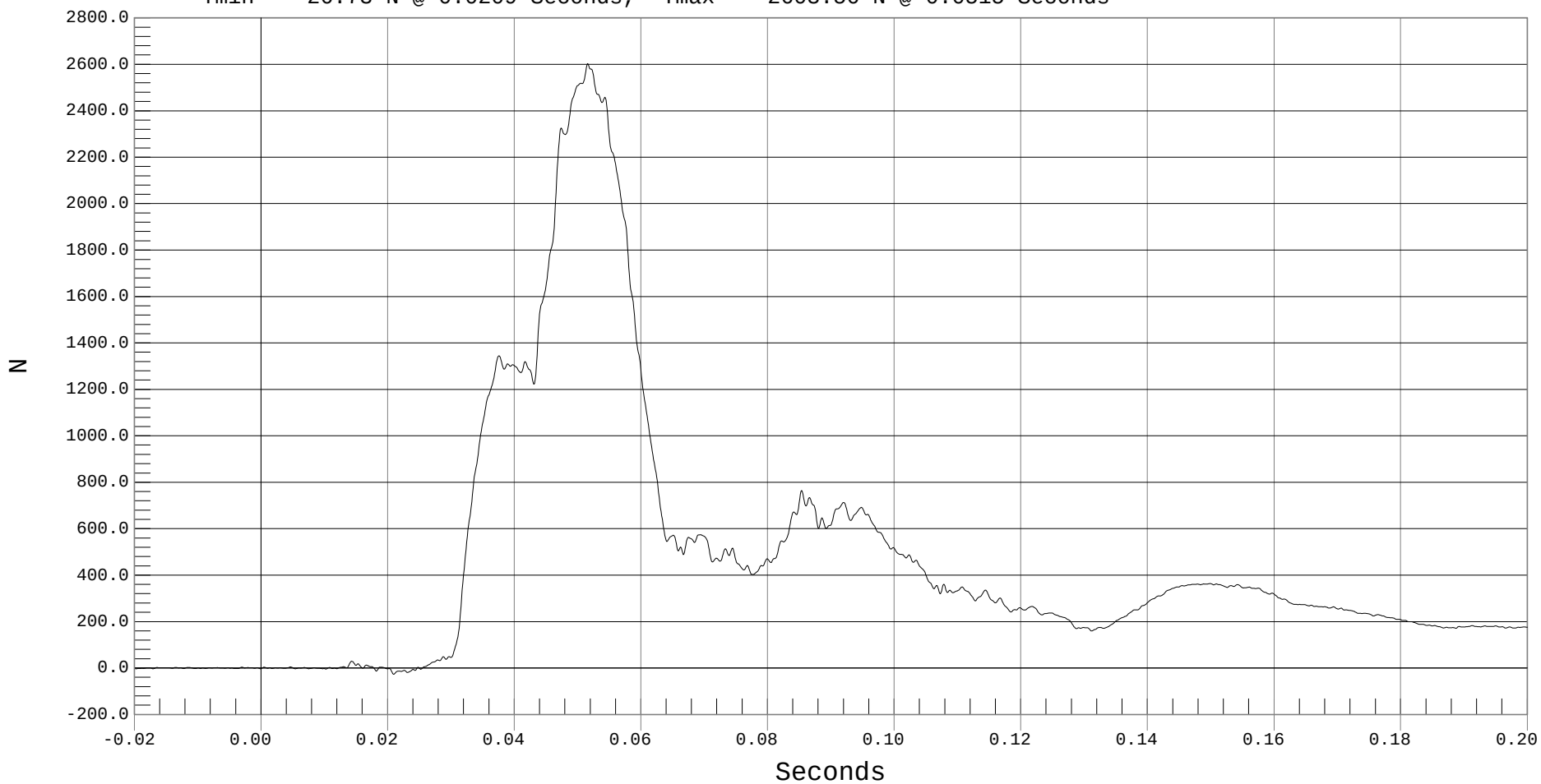
DRIVER T-12 FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER T-12 FORCE Y, B01105FF.F38

Ymin = -26.73 N @ 0.0209 Seconds, Ymax = 2603.56 N @ 0.0515 Seconds





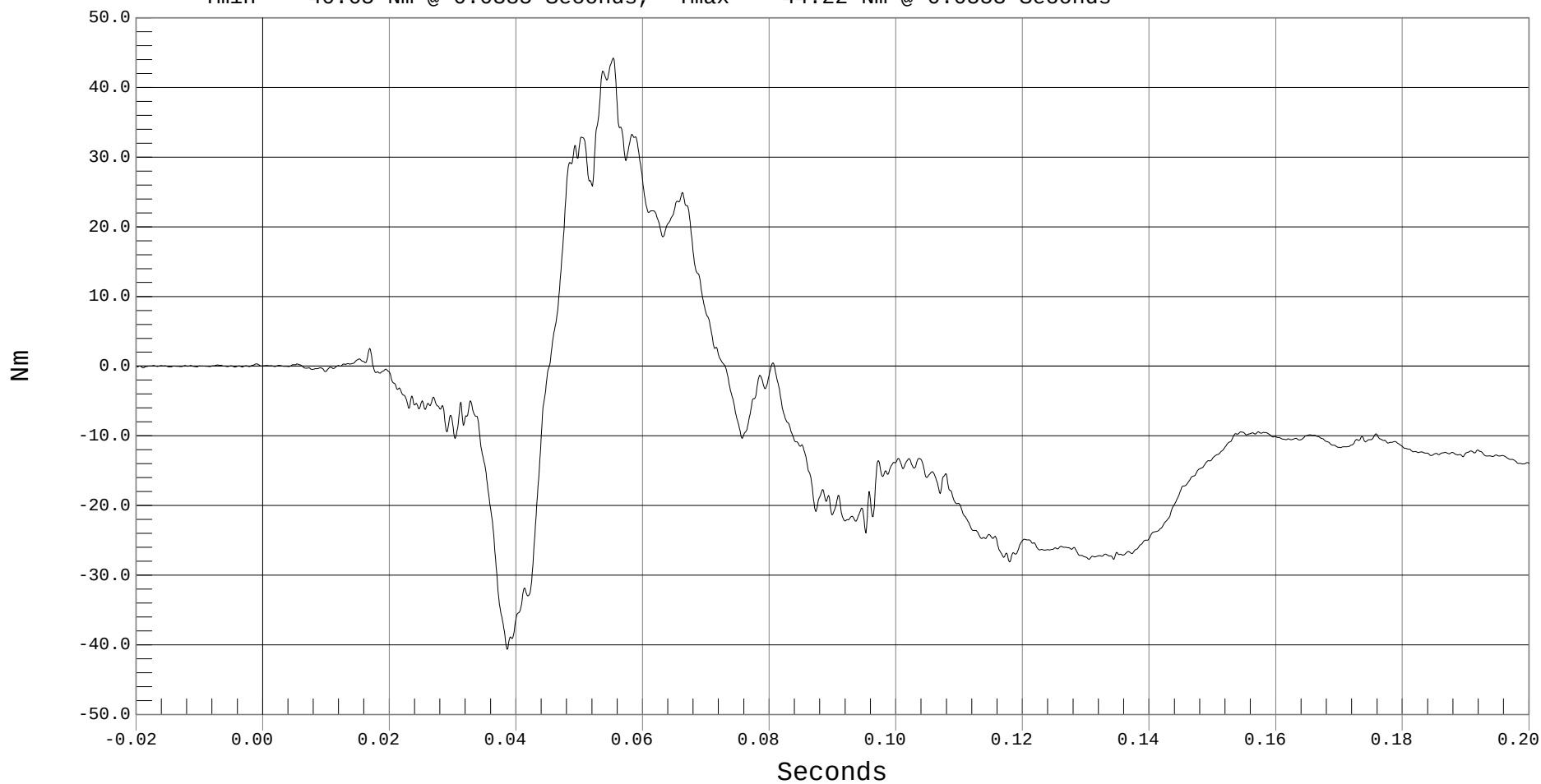
DRIVER T-12 MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER T-12 MOMENT Y, B01105MF.M40

Ymin = -40.65 Nm @ 0.0385 Seconds, Ymax = 44.22 Nm @ 0.0553 Seconds





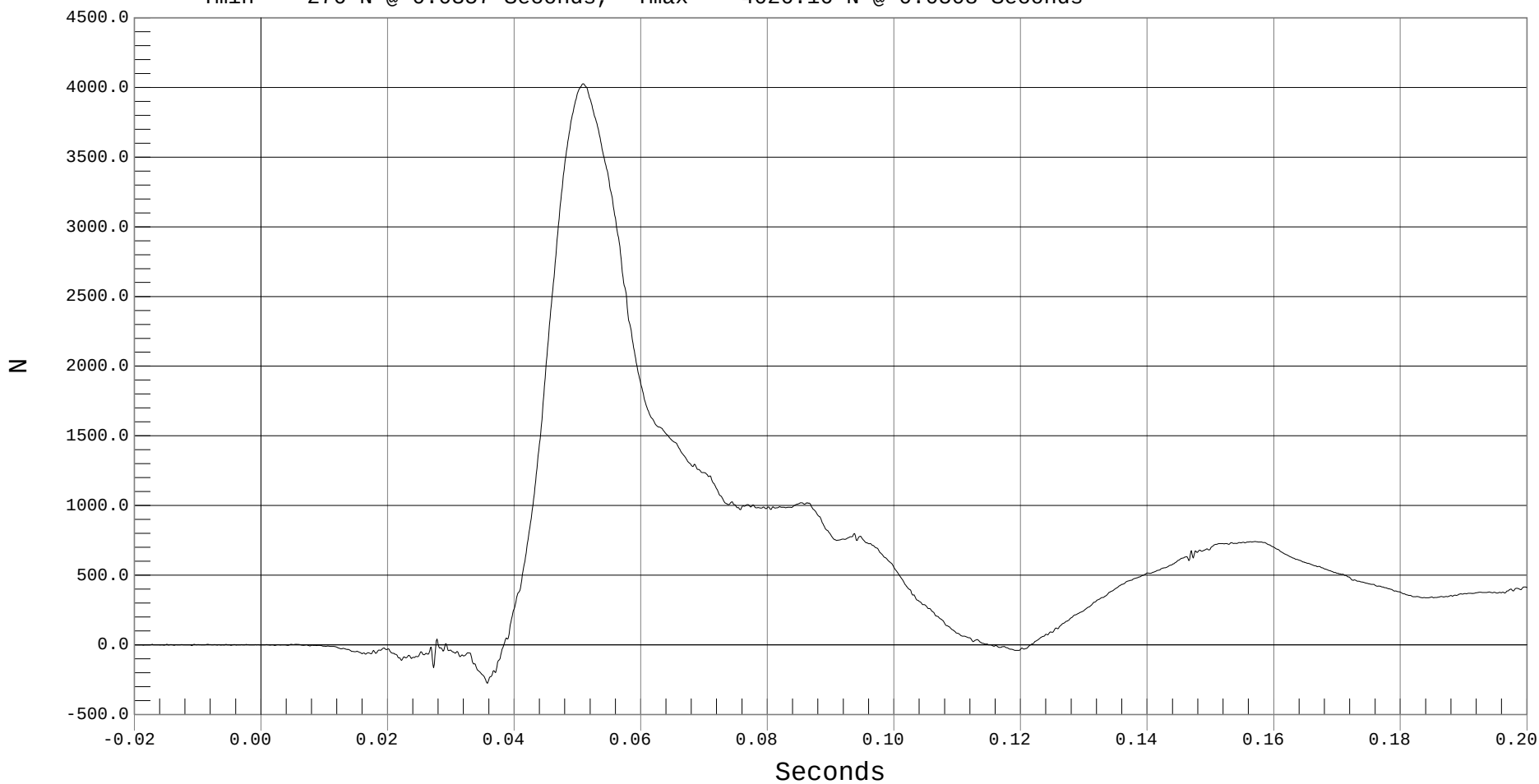
DRIVER LUMBAR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER LUMBAR FORCE Y, B01105FT.F94

Ymin = -276 N @ 0.0357 Seconds, Ymax = 4026.16 N @ 0.0508 Seconds





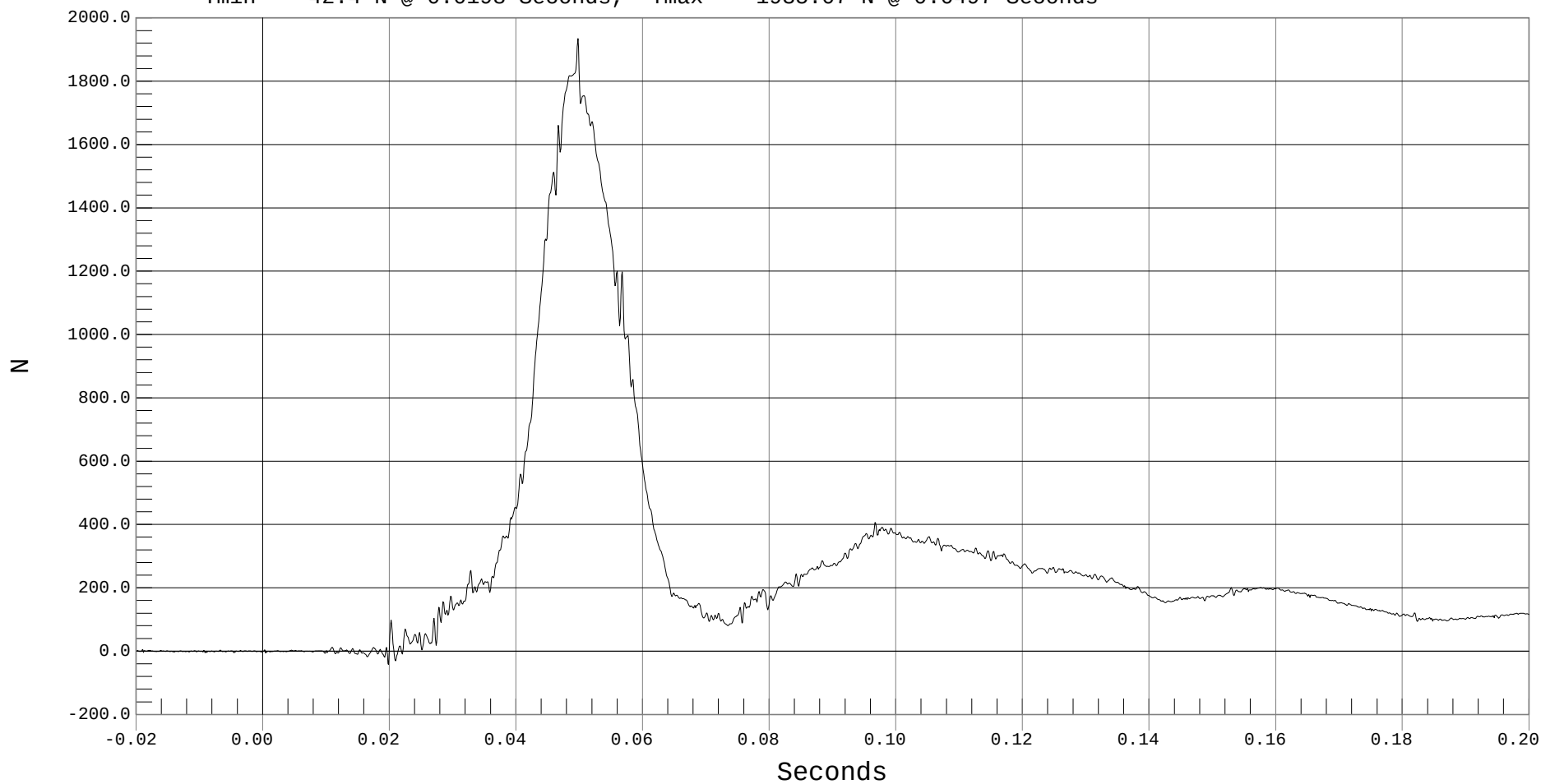
DRIVER LUMBAR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER LUMBAR FORCE Z, B01105FT.F95

Ymin = -42.4 N @ 0.0198 Seconds, Ymax = 1935.07 N @ 0.0497 Seconds





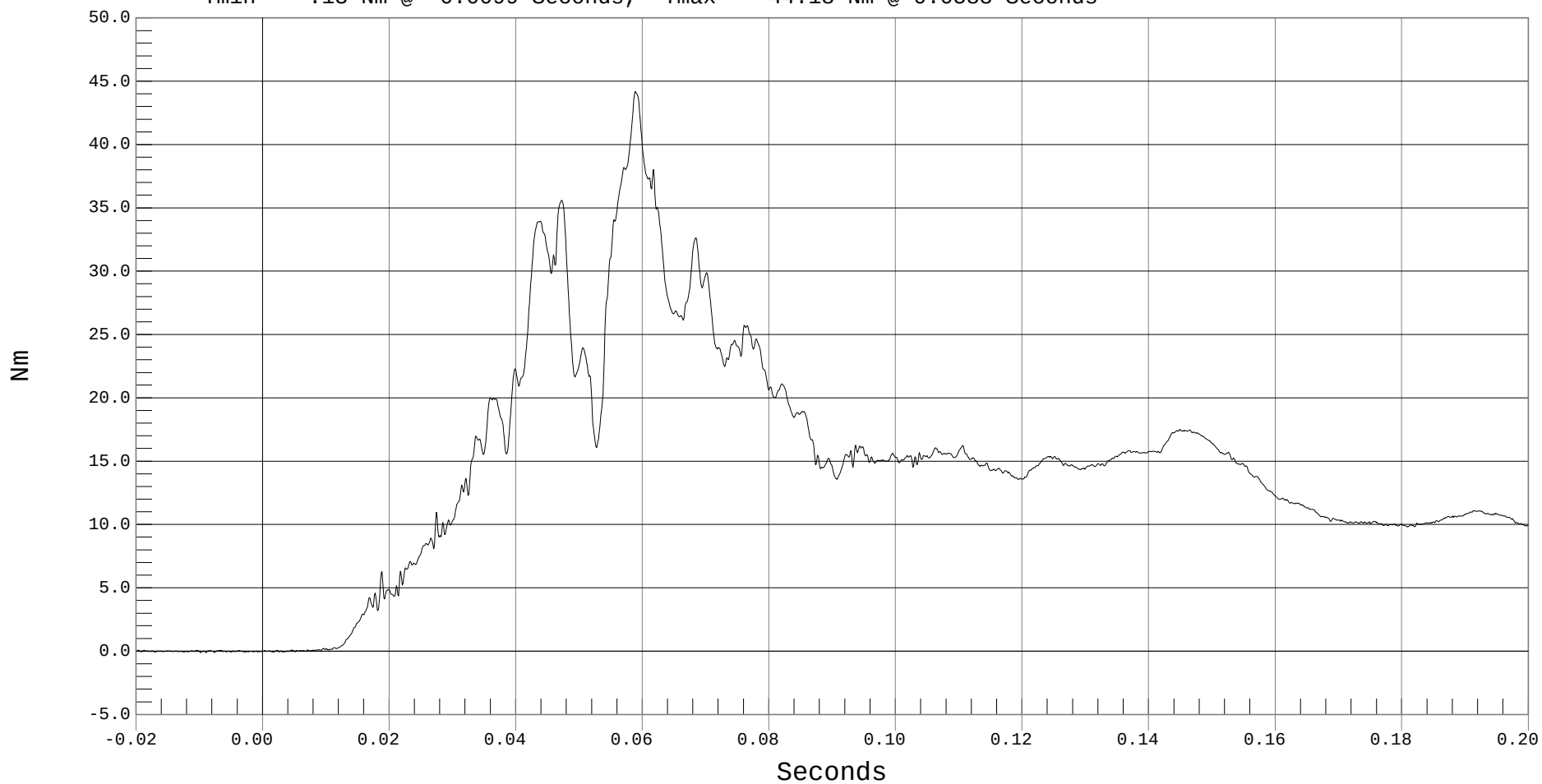
DRIVER LUMBAR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER LUMBAR MOMENT X, B01105MT.M96

Ymin = -.13 Nm @ -0.0099 Seconds, Ymax = 44.18 Nm @ 0.0588 Seconds





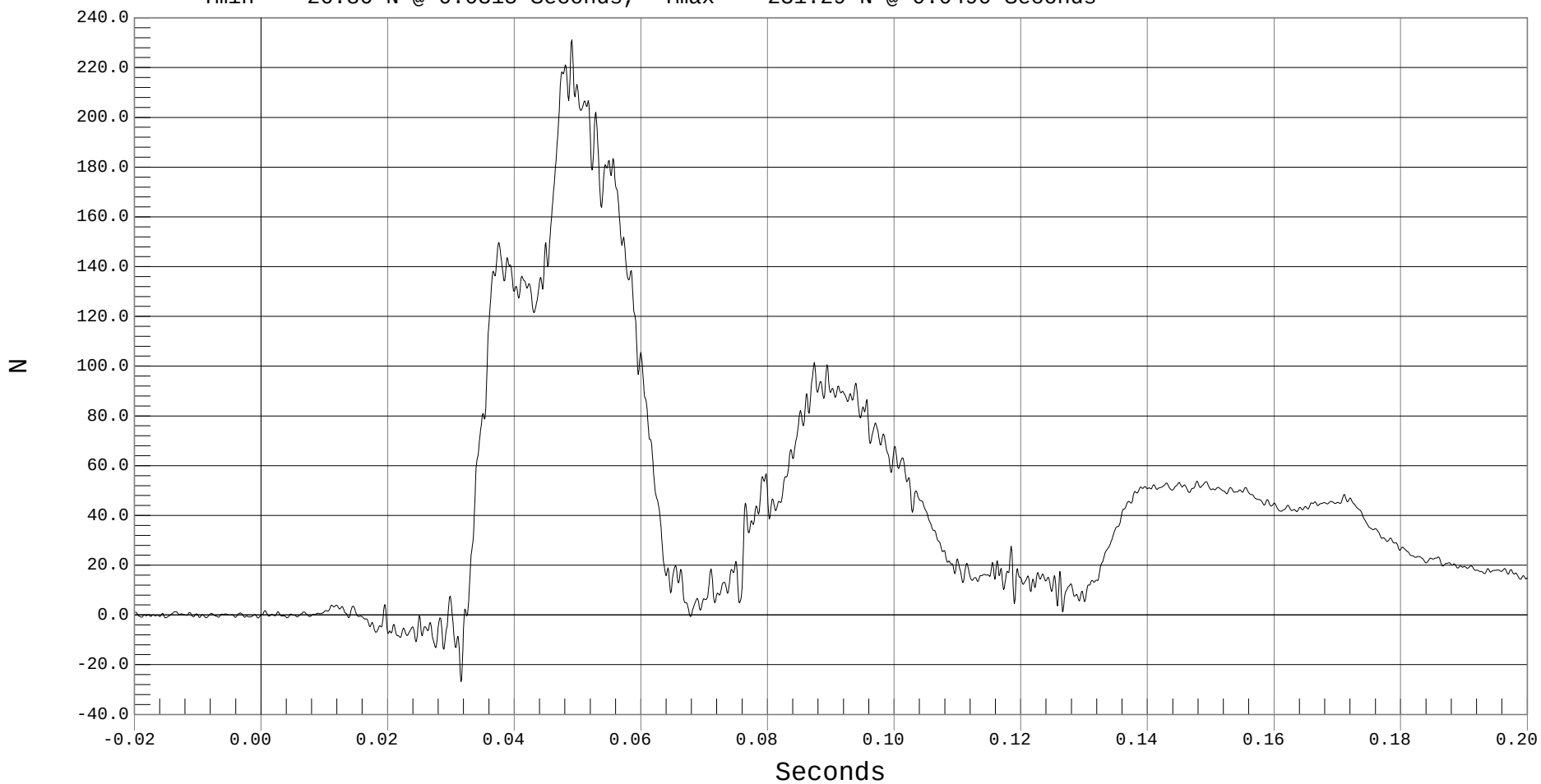
DRIVER ABDOMEN FRONT FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER FRONT ABDOMEN FORCE, B01105FF.F41

Ymin = -26.86 N @ 0.0315 Seconds, Ymax = 231.29 N @ 0.0490 Seconds





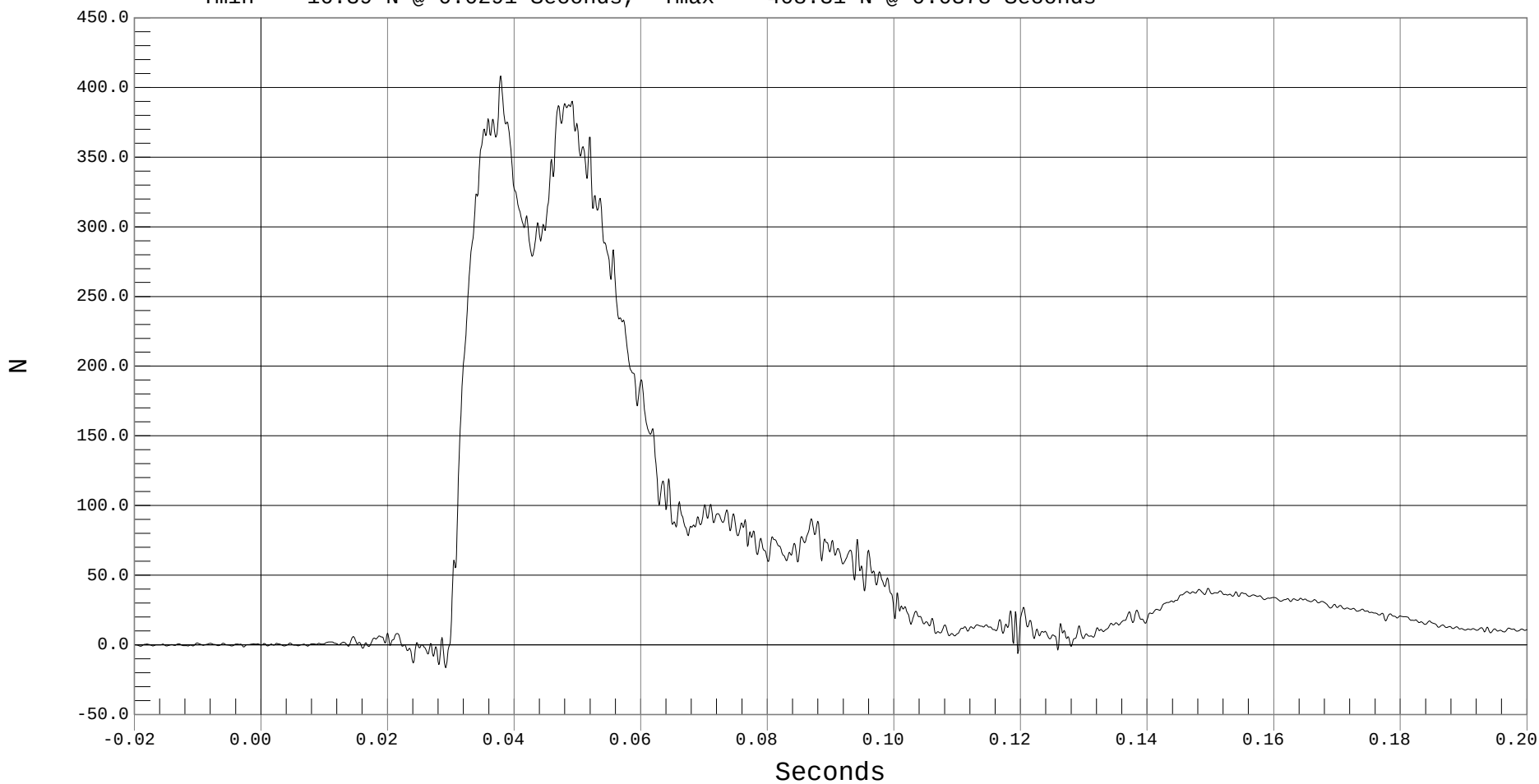
DRIVER ABDOMEN MID FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER MID ABDOMEN FORCE, B01105FF.F42

Ymin = -16.39 N @ 0.0291 Seconds, Ymax = 408.31 N @ 0.0378 Seconds





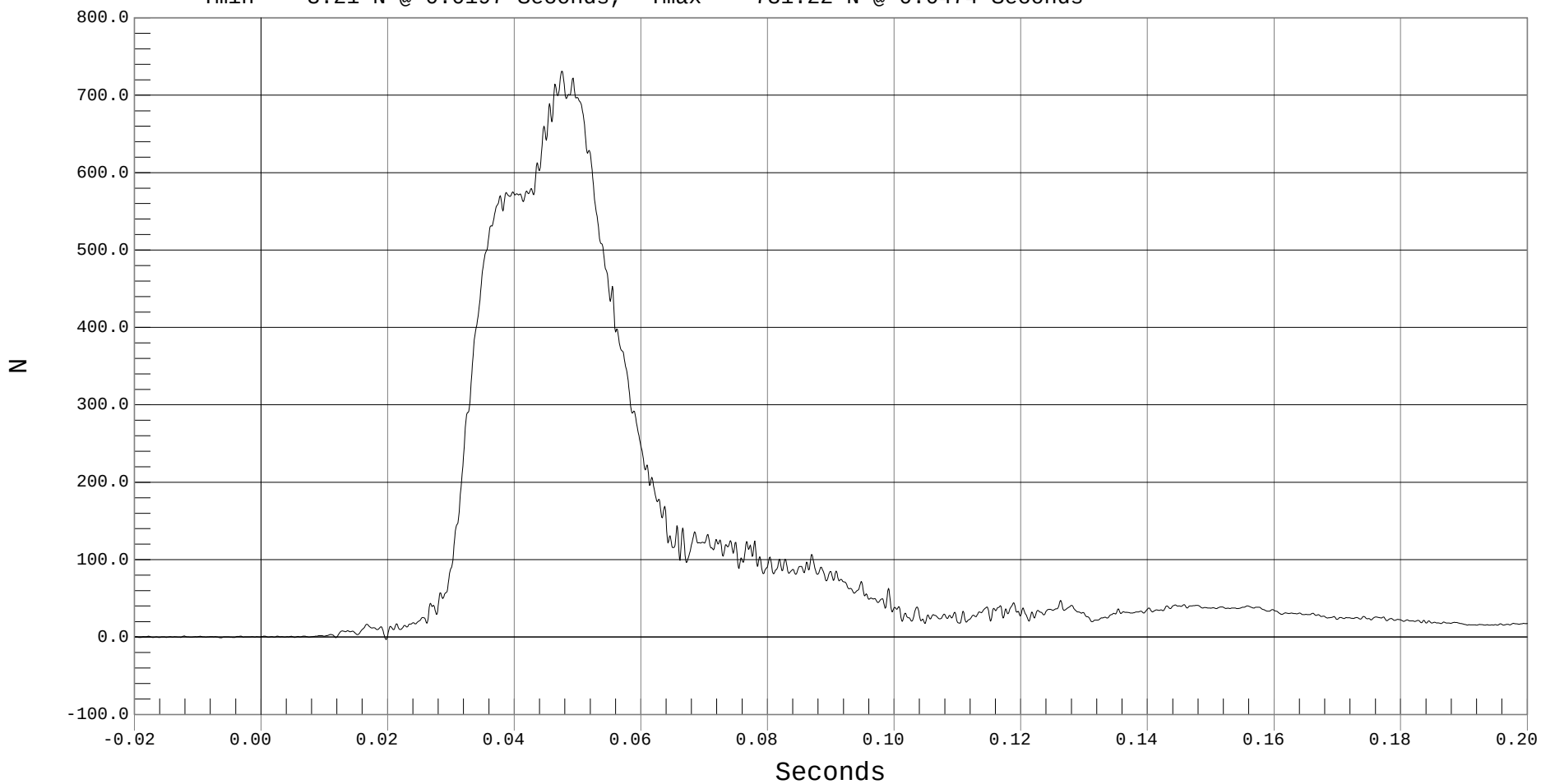
DRIVER ABDOMEN REAR FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER REAR ABDOMEN FORCE, B01105FF.F43

Ymin = -3.21 N @ 0.0197 Seconds, Ymax = 731.22 N @ 0.0474 Seconds





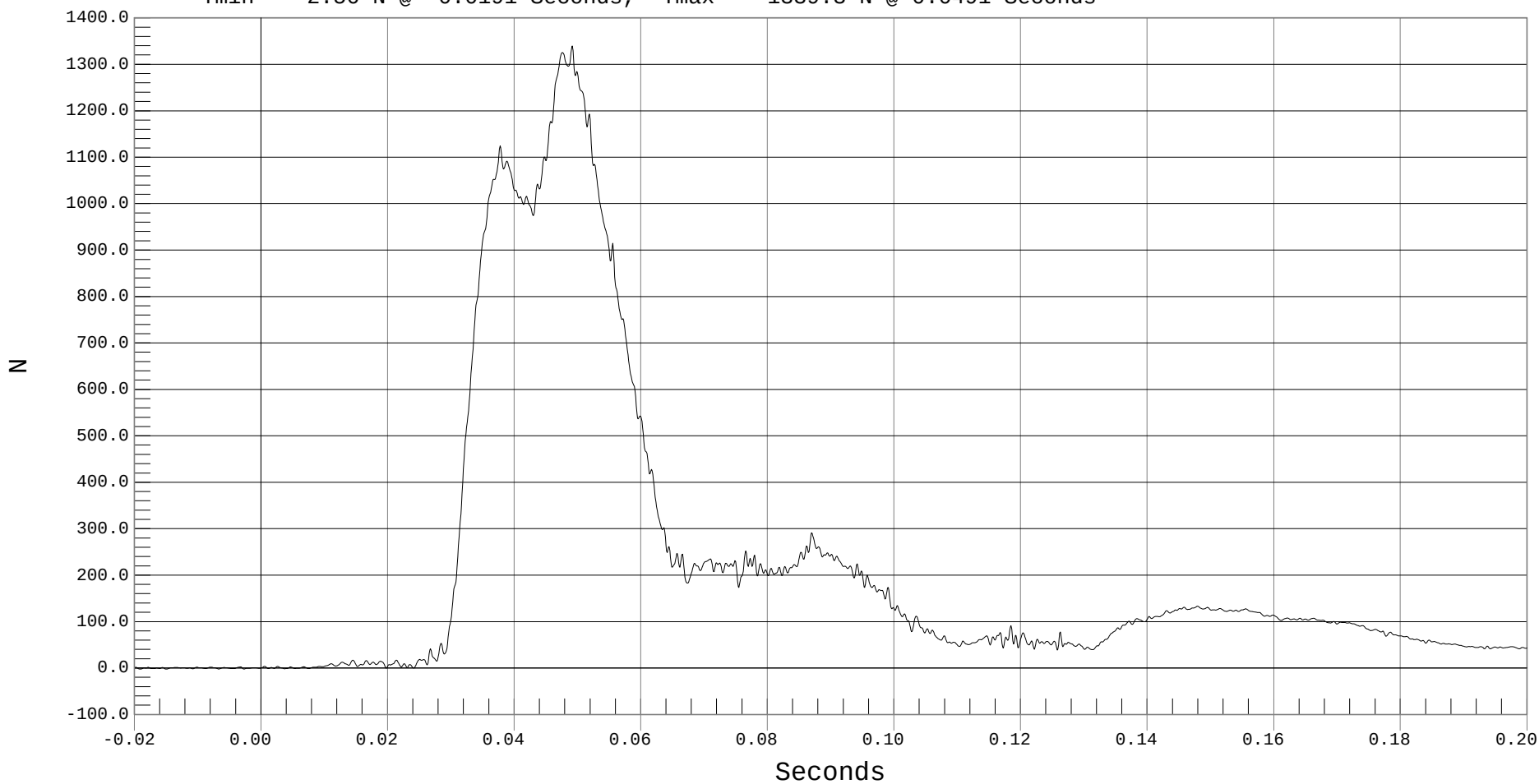
DRIVER SUMMED ABDOMEN FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER SUMMED ABDOMEN FORCE, B01105FU.F41

Ymin = -2.56 N @ -0.0191 Seconds, Ymax = 1339.3 N @ 0.0491 Seconds





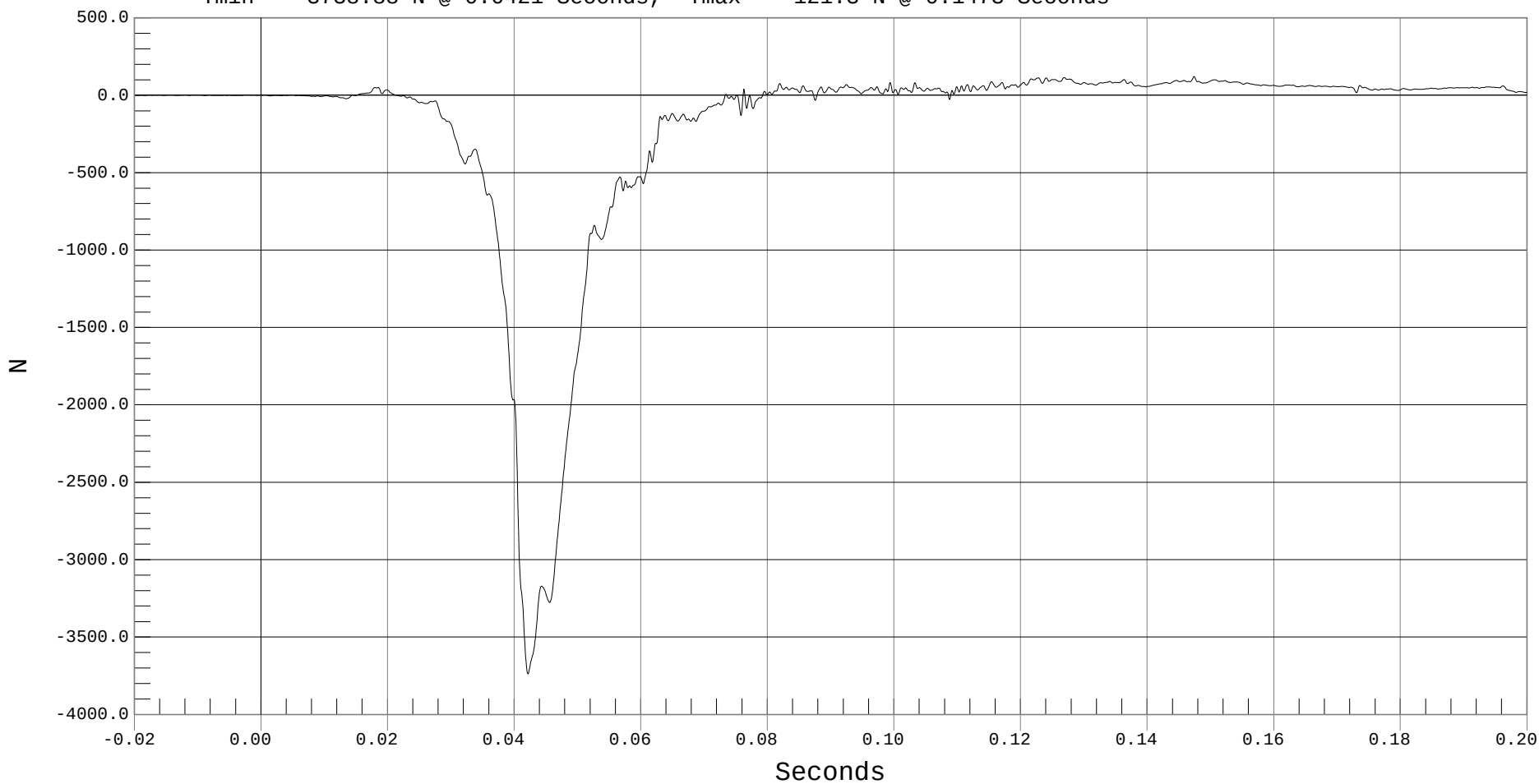
DRIVER PUBIC SYMPHYSIS FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER PUBIC SYMPHYSIS FORCE, B01105FF.F44

Ymin = -3738.88 N @ 0.0421 Seconds, Ymax = 121.3 N @ 0.1473 Seconds





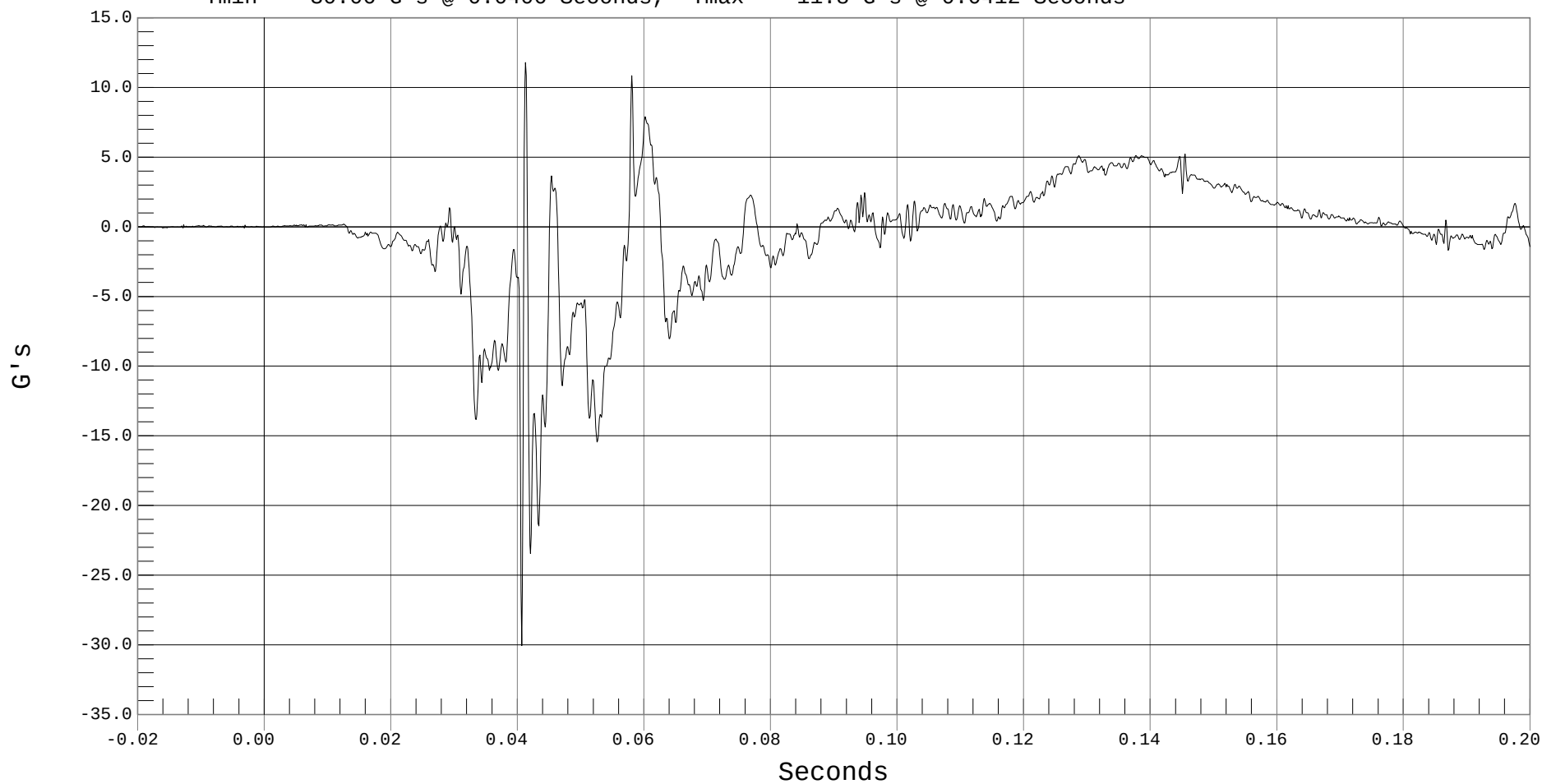
DRIVER PELVIS X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 DRIVER PELVIS X, B01105AT.A45

Ymin = -30.06 G's @ 0.0406 Seconds, Ymax = 11.8 G's @ 0.0412 Seconds





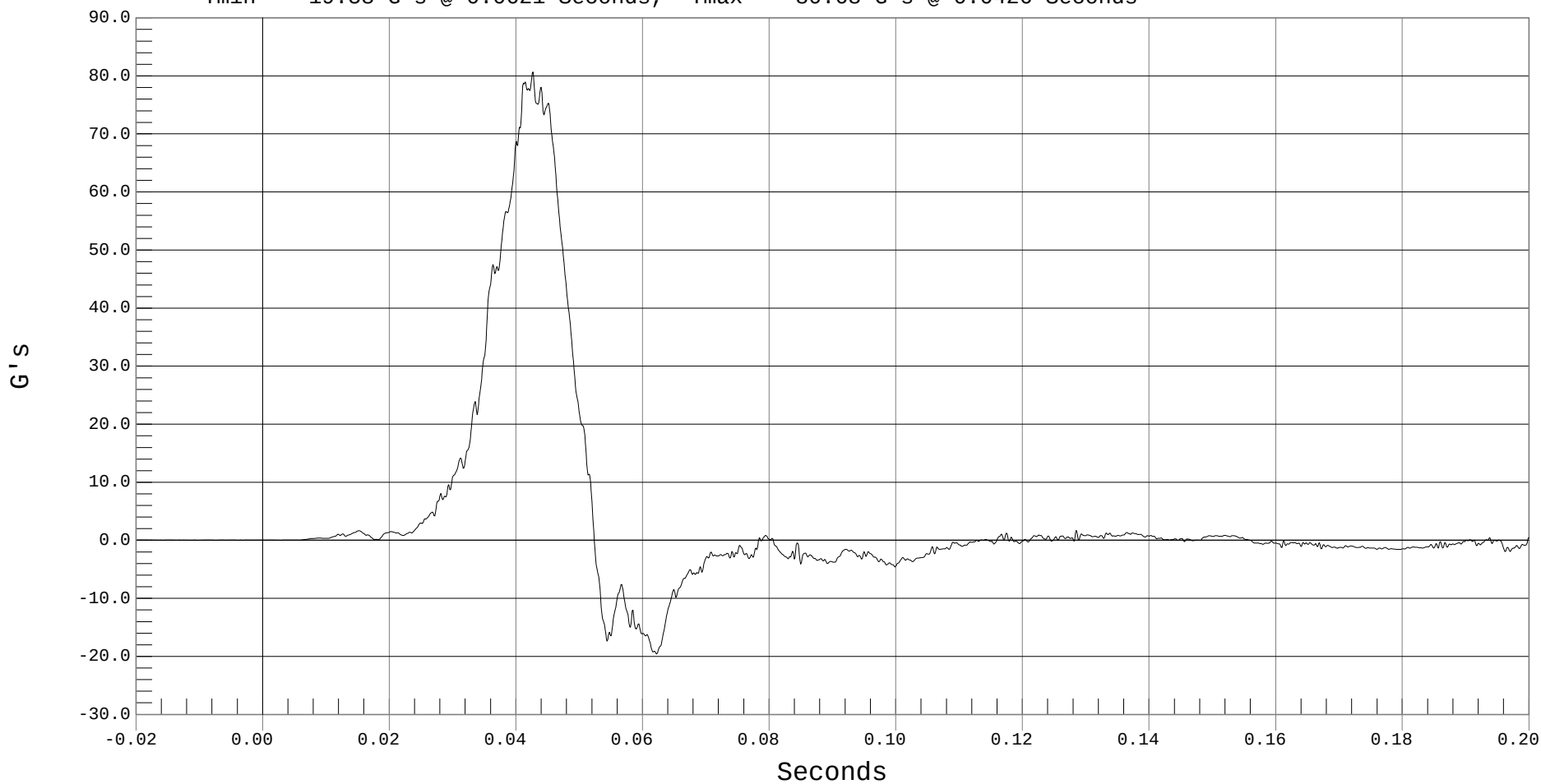
DRIVER PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER PELVIS Y, B01105AT.A46

Ymin = -19.58 G's @ 0.0621 Seconds, Ymax = 80.68 G's @ 0.0426 Seconds





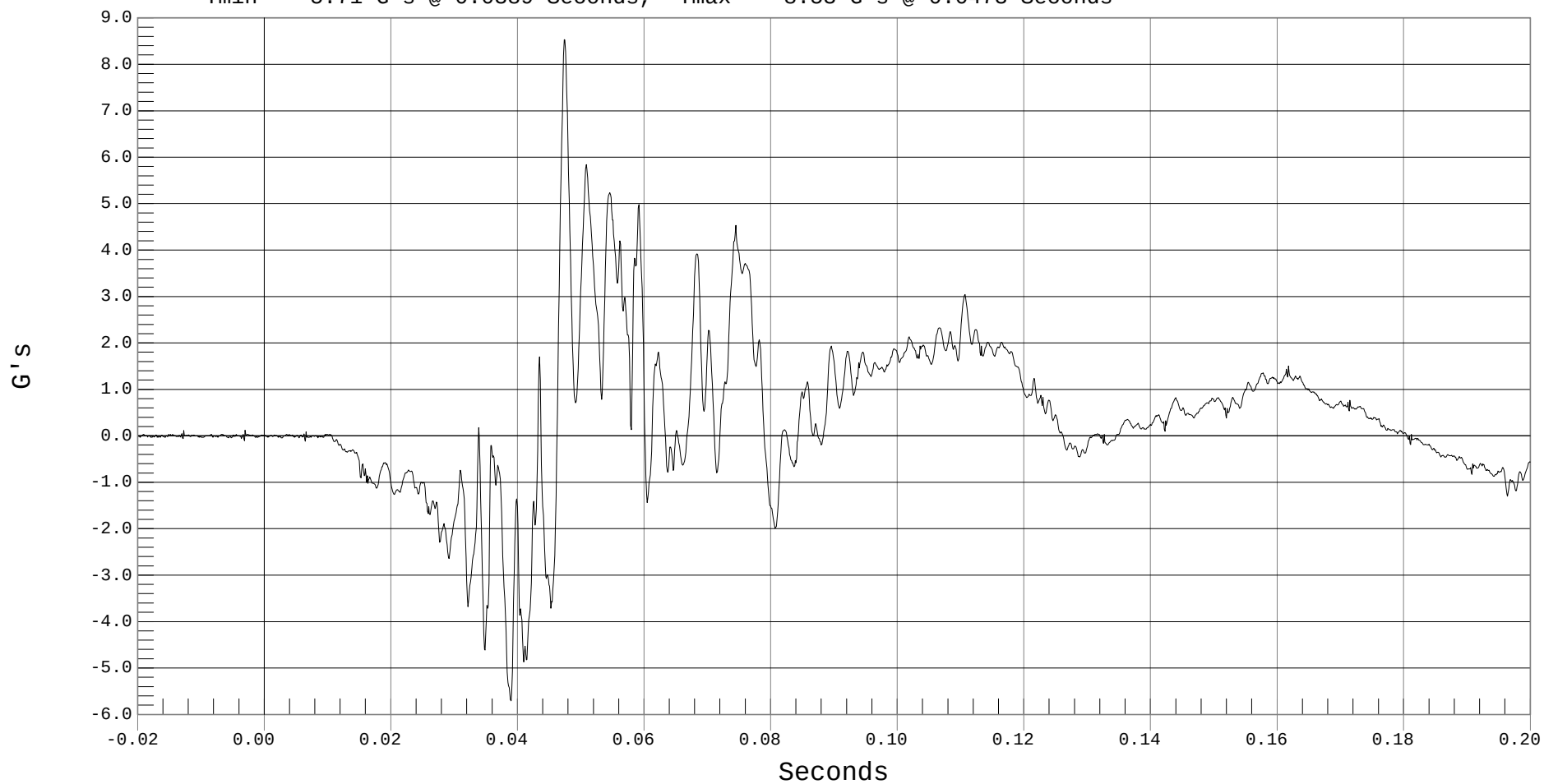
DRIVER PELVIS Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER PELVIS Z, B01105AT.A47

Ymin = -5.71 G's @ 0.0389 Seconds, Ymax = 8.53 G's @ 0.0473 Seconds





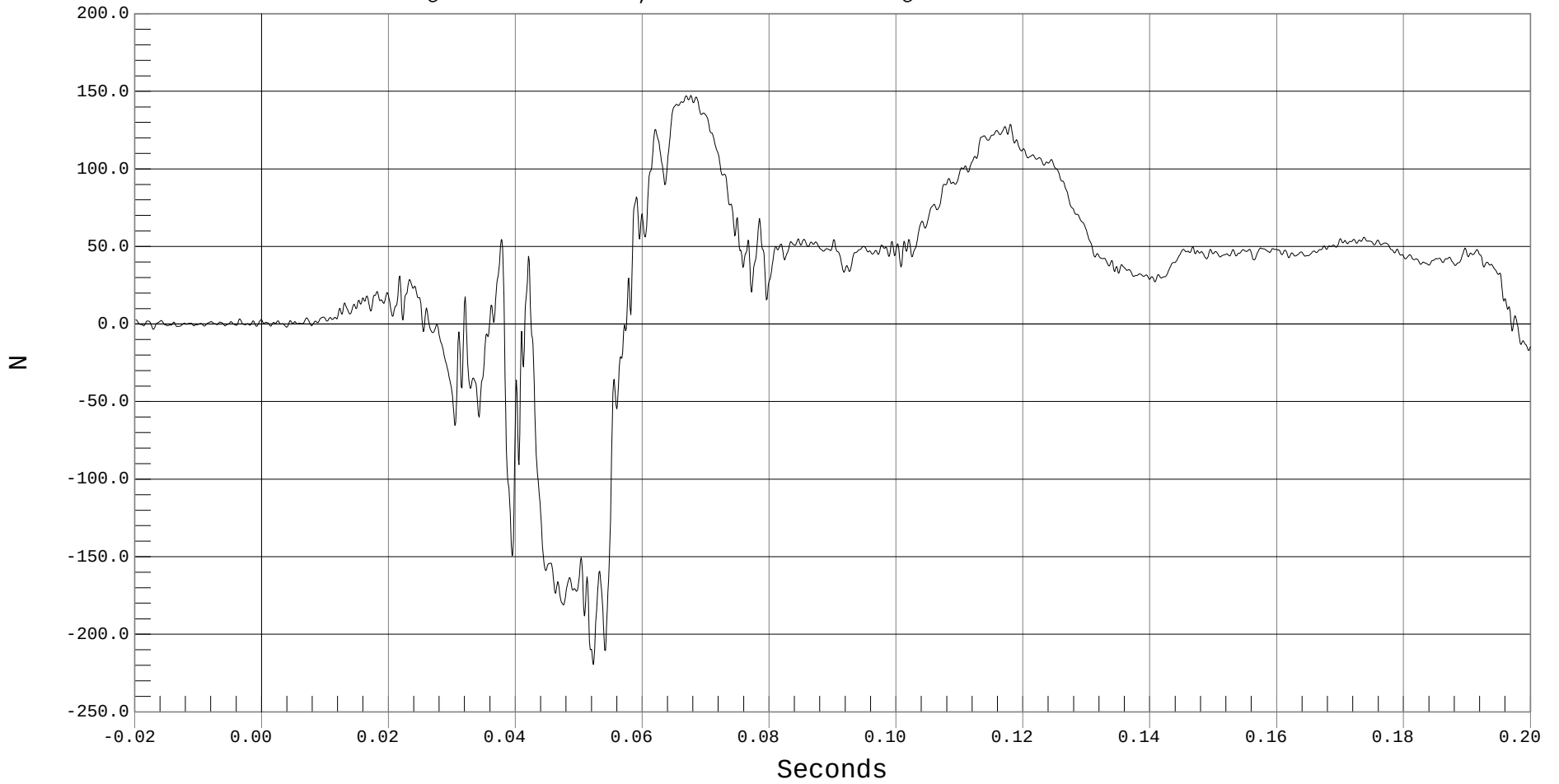
DRIVER LEFT FEMUR FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER LEFT FEMUR FORCE X, B01105FF.F54

Ymin = -219.52 N @ 0.0522 Seconds, Ymax = 147.38 N @ 0.0676 Seconds





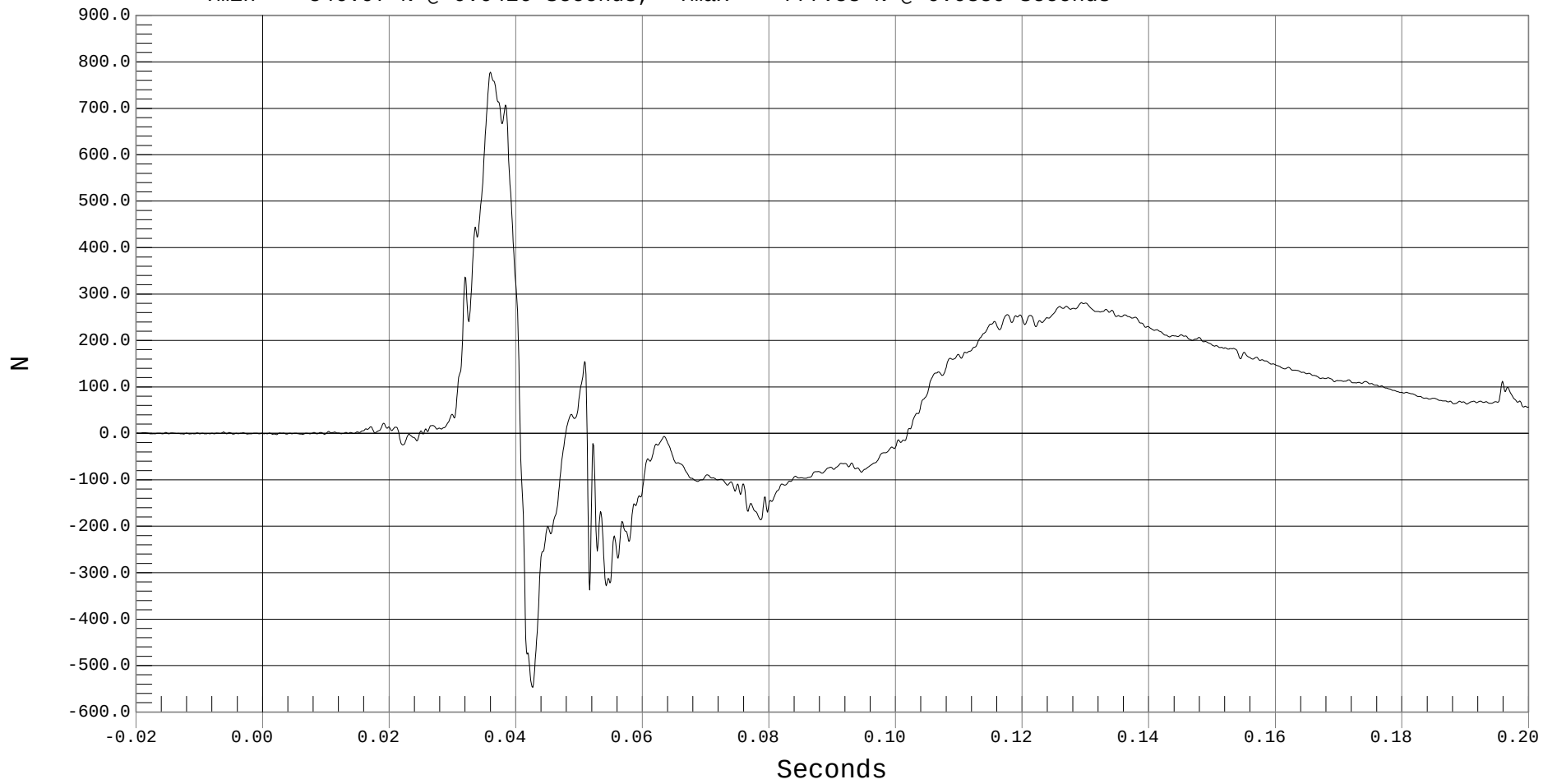
DRIVER LEFT FEMUR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER LEFT FEMUR FORCE Y, B01105FF.F55

Ymin = -546.97 N @ 0.0426 Seconds, Ymax = 777.58 N @ 0.0359 Seconds





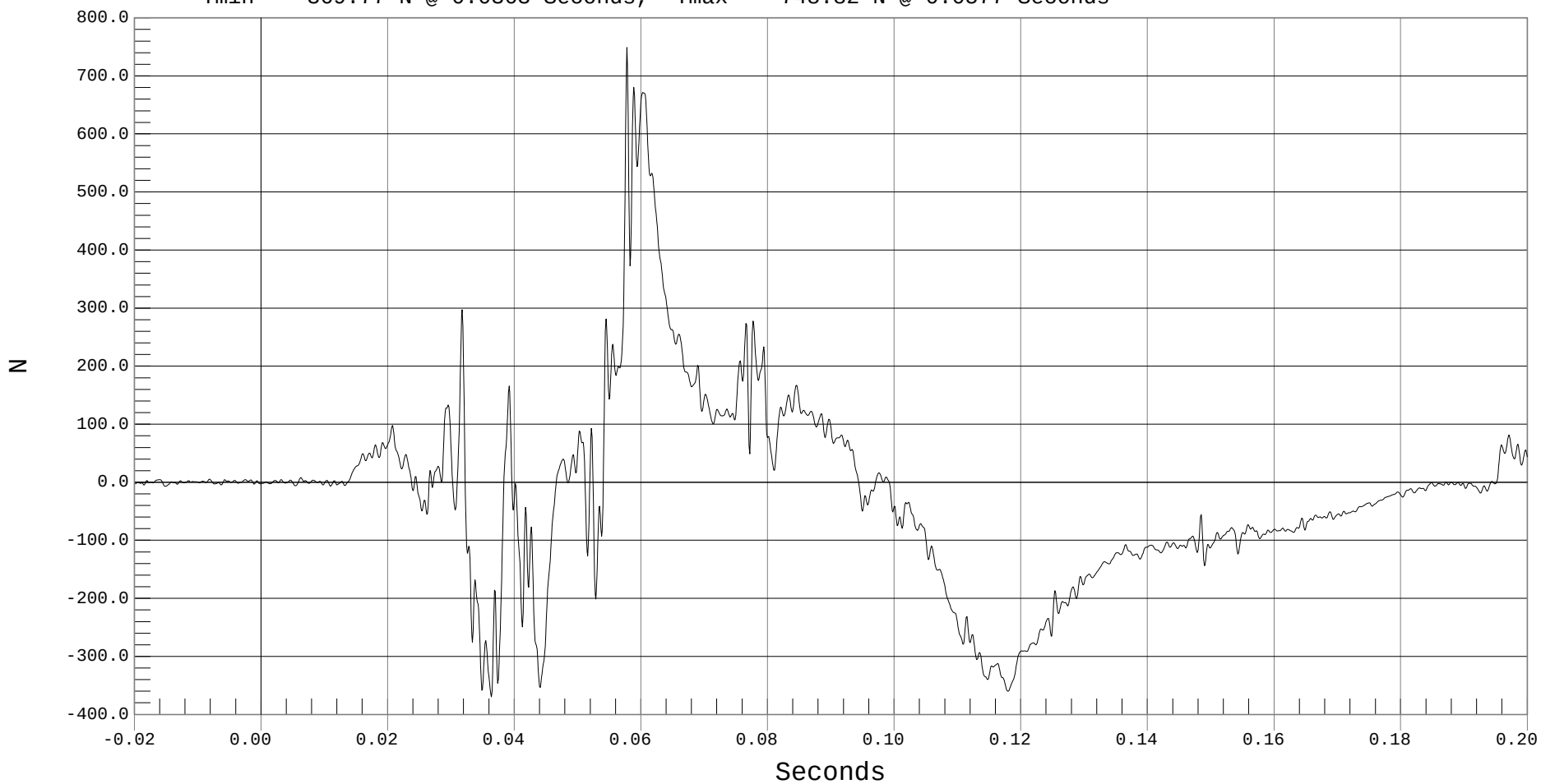
DRIVER LEFT FEMUR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LEFT FEMUR FORCE Z, B01105FF.F56

Ymin = -369.77 N @ 0.0363 Seconds, Ymax = 748.82 N @ 0.0577 Seconds





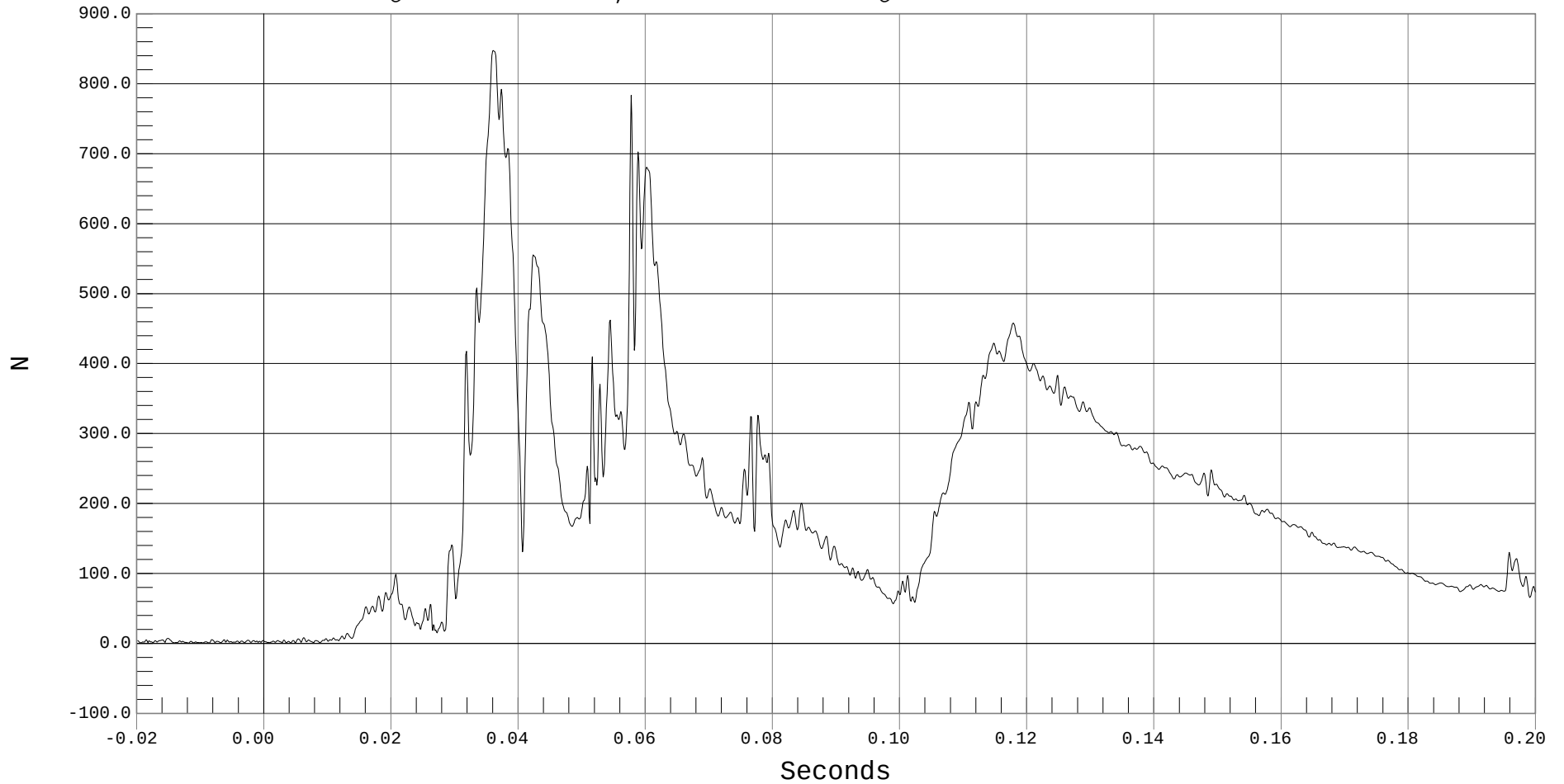
DRIVER LEFT FEMUR FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LEFT FEMUR FORCE RESULTANT, B01105FV.F54

Ymin = .29 N @ -0.0119 Seconds, Ymax = 847.75 N @ 0.0360 Seconds





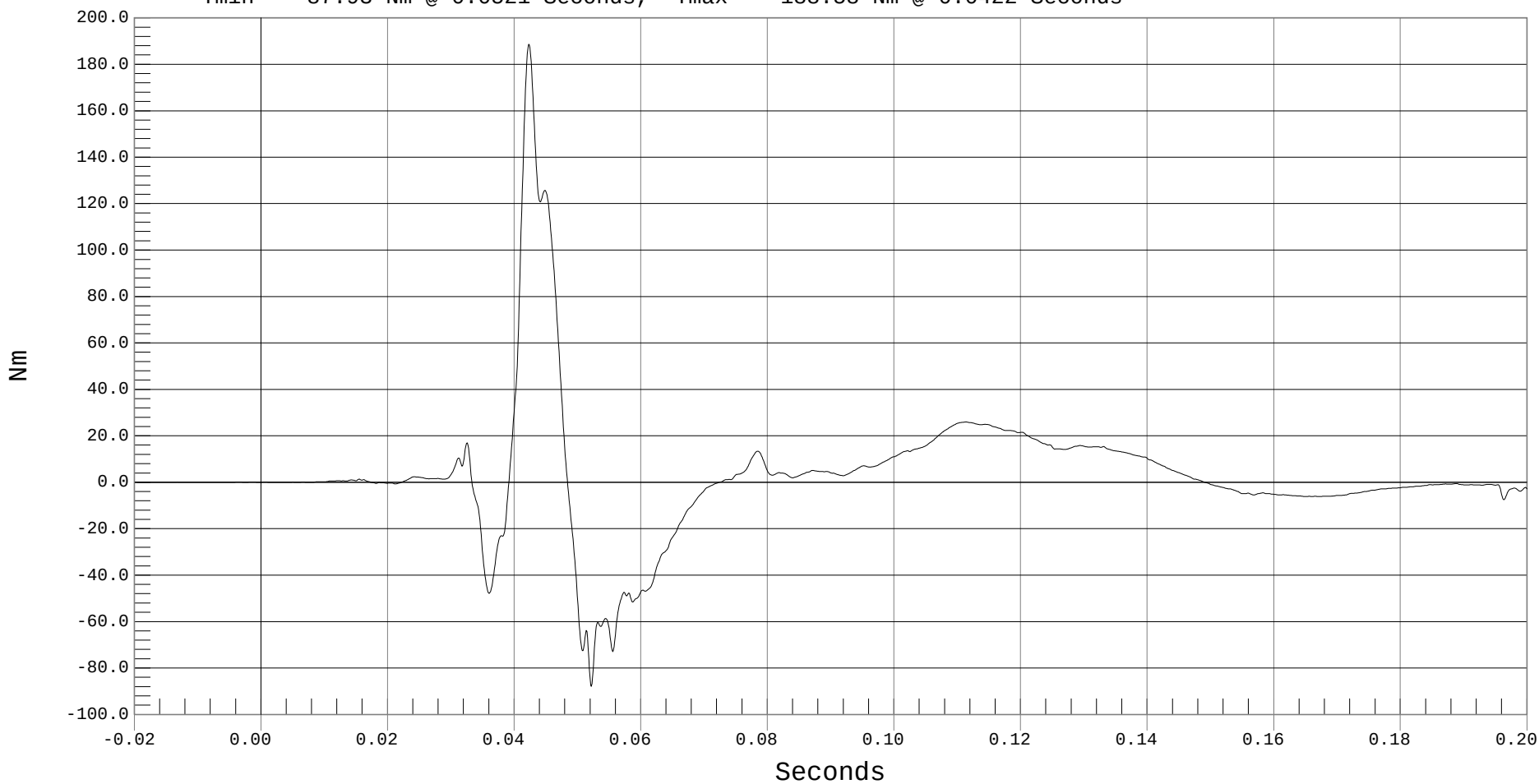
DRIVER LEFT FEMUR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER LEFT FEMUR MOMENT X, B01105MF.M57

Ymin = -87.93 Nm @ 0.0521 Seconds, Ymax = 188.58 Nm @ 0.0422 Seconds





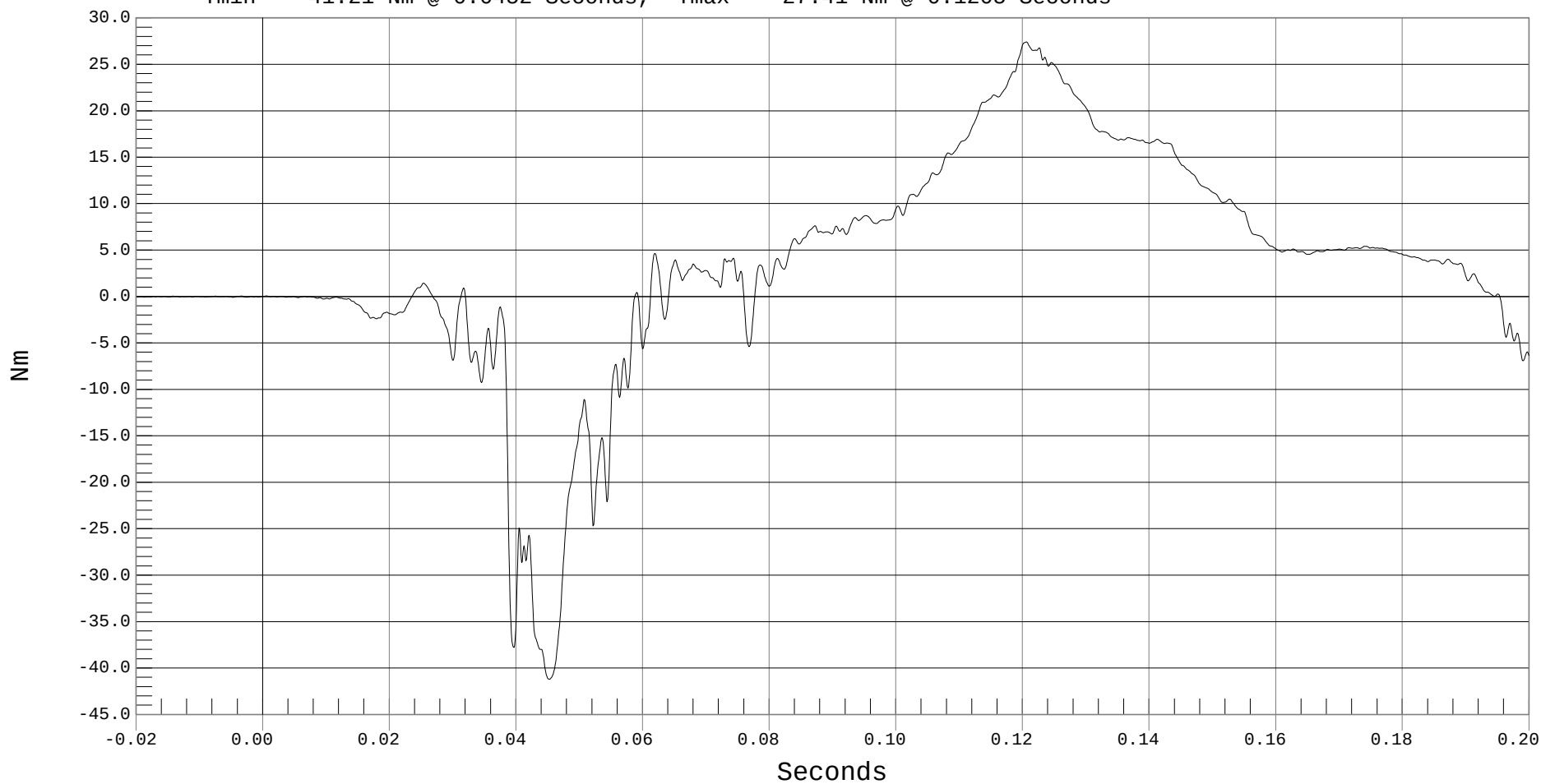
DRIVER LEFT FEMUR MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LEFT FEMUR MOMENT Y, B01105MF.M58

Ymin = -41.21 Nm @ 0.0452 Seconds, Ymax = 27.41 Nm @ 0.1205 Seconds





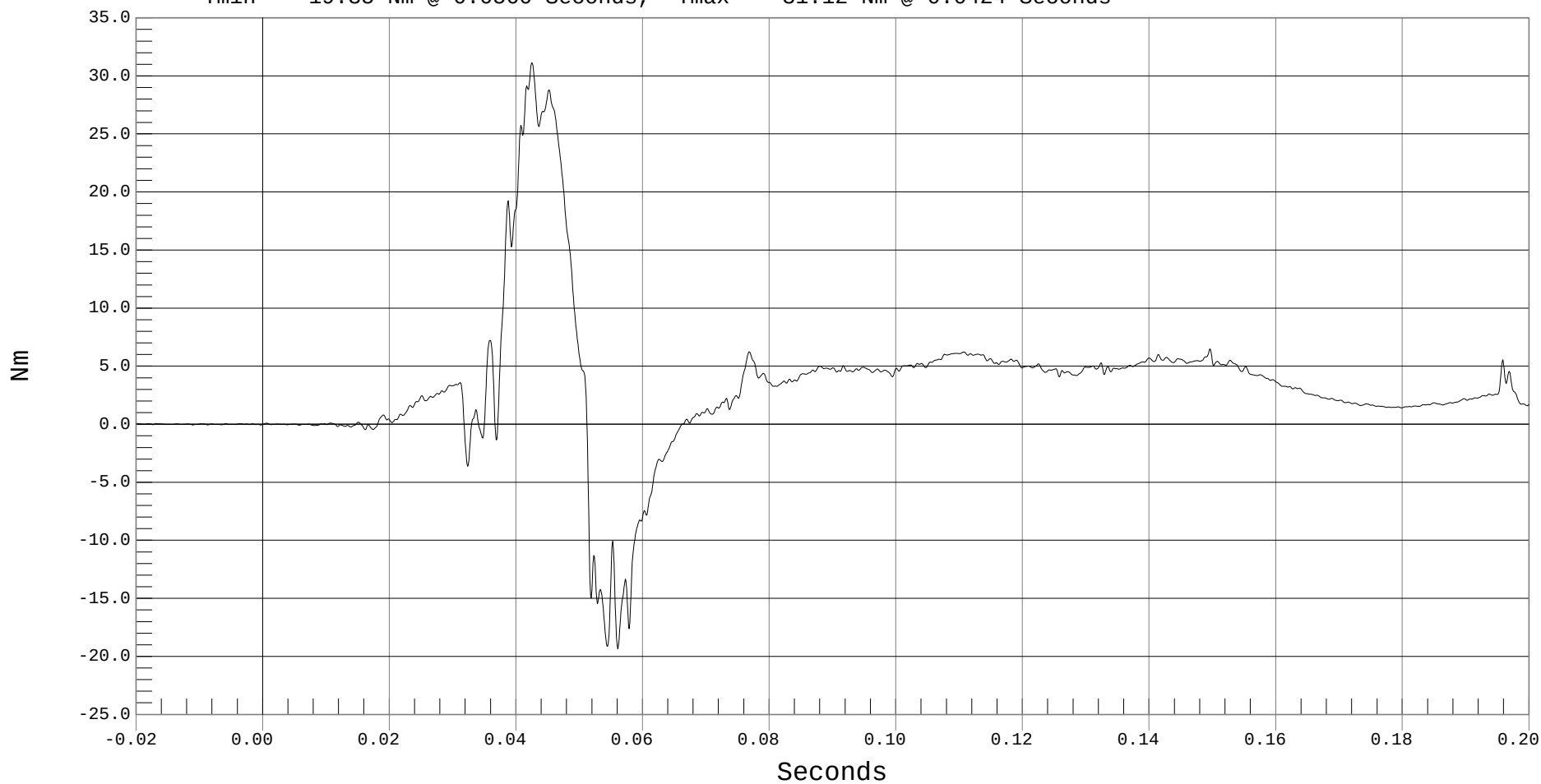
DRIVER LEFT FEMUR MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LEFT FEMUR MOMENT Z, B01105MF.M59

Ymin = -19.35 Nm @ 0.0560 Seconds, Ymax = 31.12 Nm @ 0.0424 Seconds





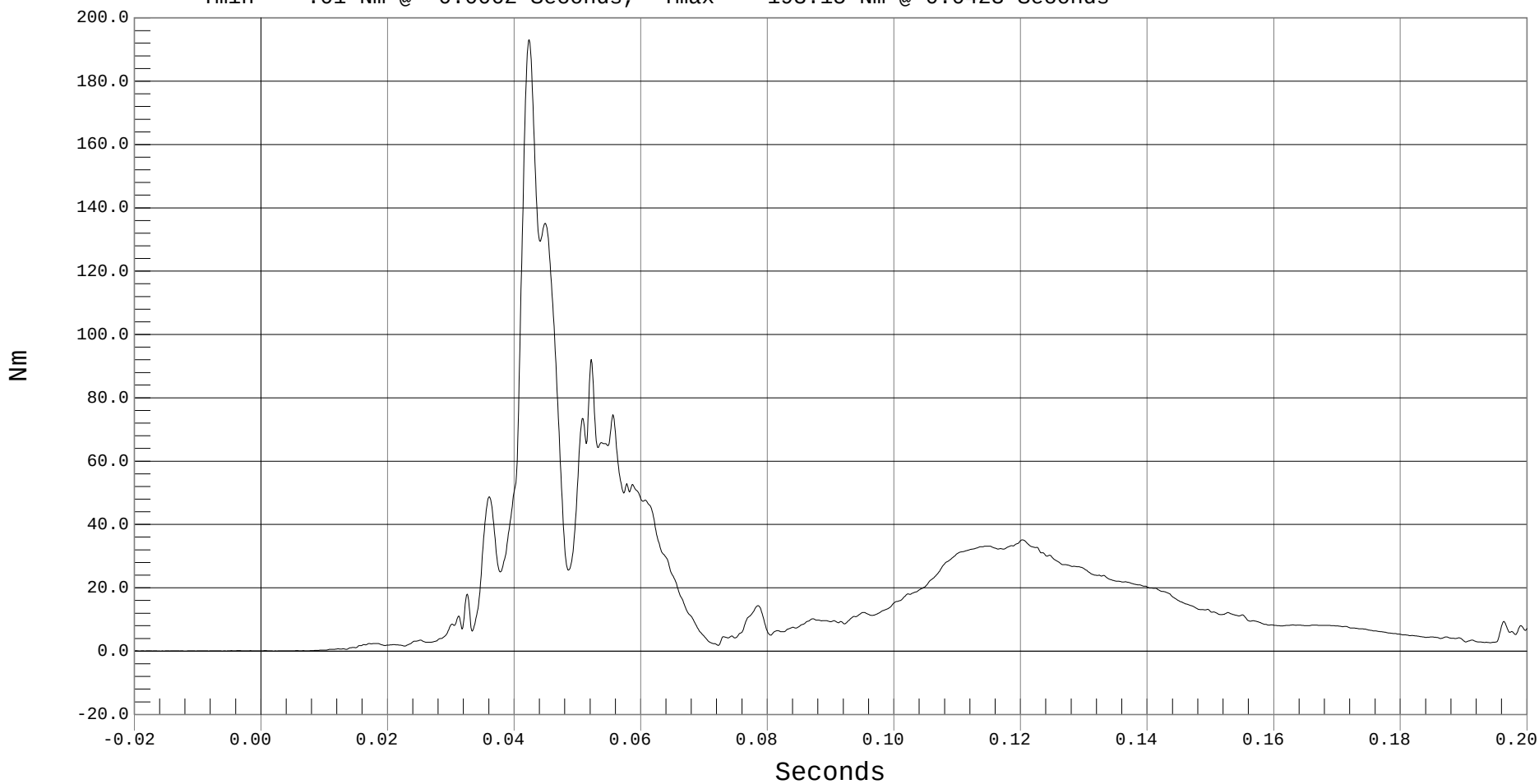
DRIVER LEFT FEMUR MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER LEFT FEMUR MOMENT RESULTANT, B01105MV.M57

Ymin = .01 Nm @ -0.0062 Seconds, Ymax = 193.15 Nm @ 0.0423 Seconds





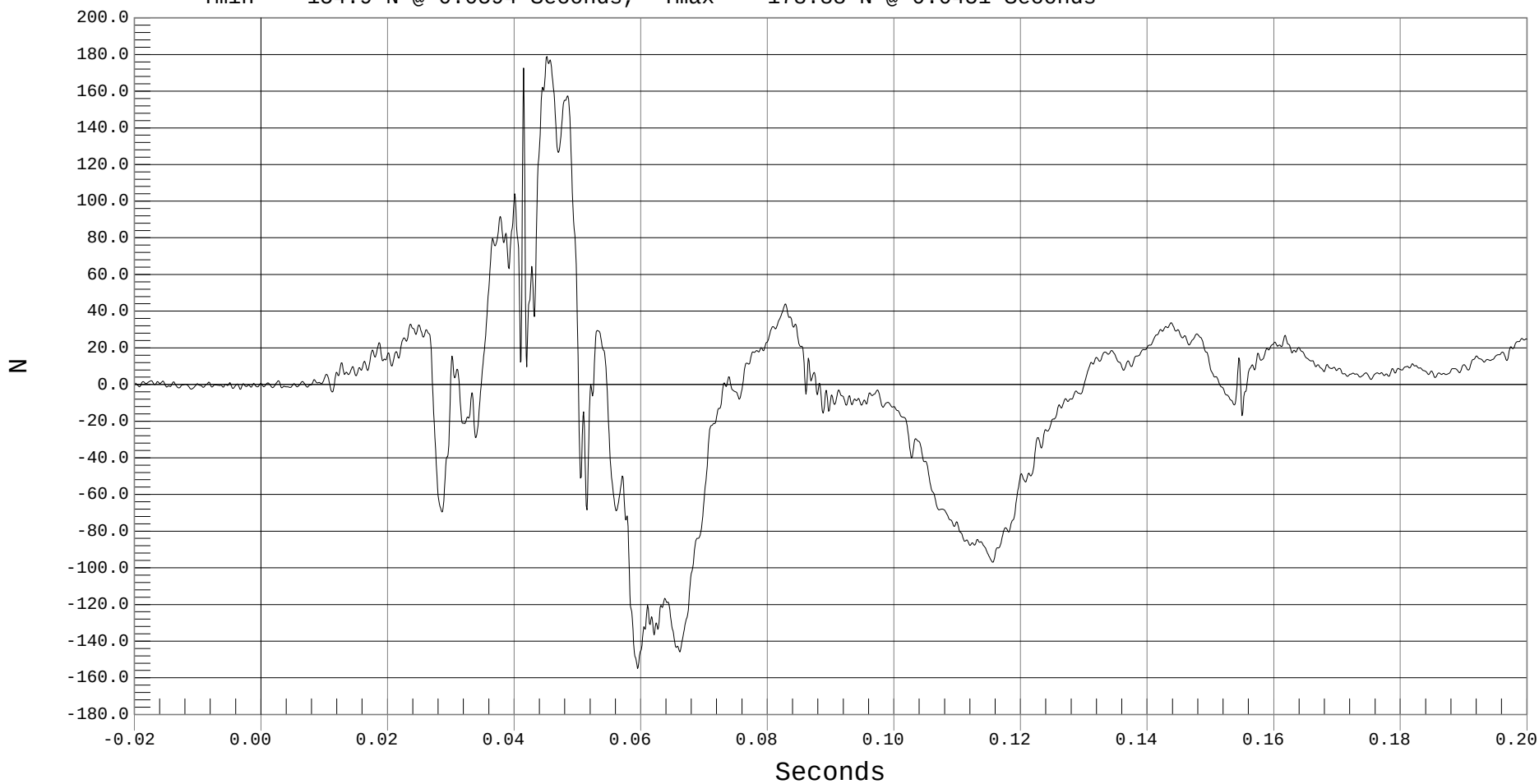
DRIVER RIGHT FEMUR FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR FORCE X, B01105FF.F48

Ymin = -154.9 N @ 0.0594 Seconds, Ymax = 178.88 N @ 0.0451 Seconds





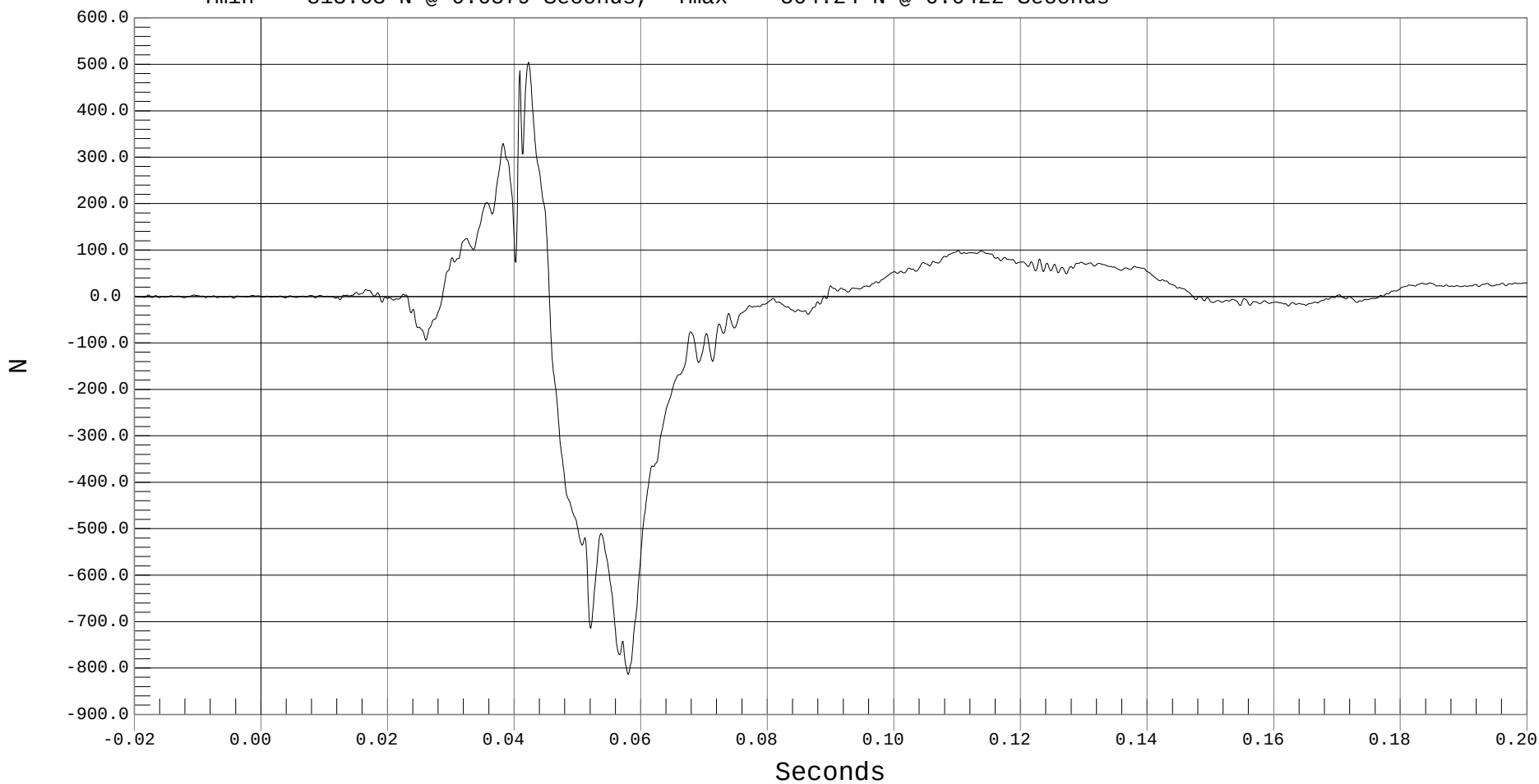
DRIVER RIGHT FEMUR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR FORCE Y, B01105FF.F49

Ymin = -813.63 N @ 0.0579 Seconds, Ymax = 504.24 N @ 0.0422 Seconds





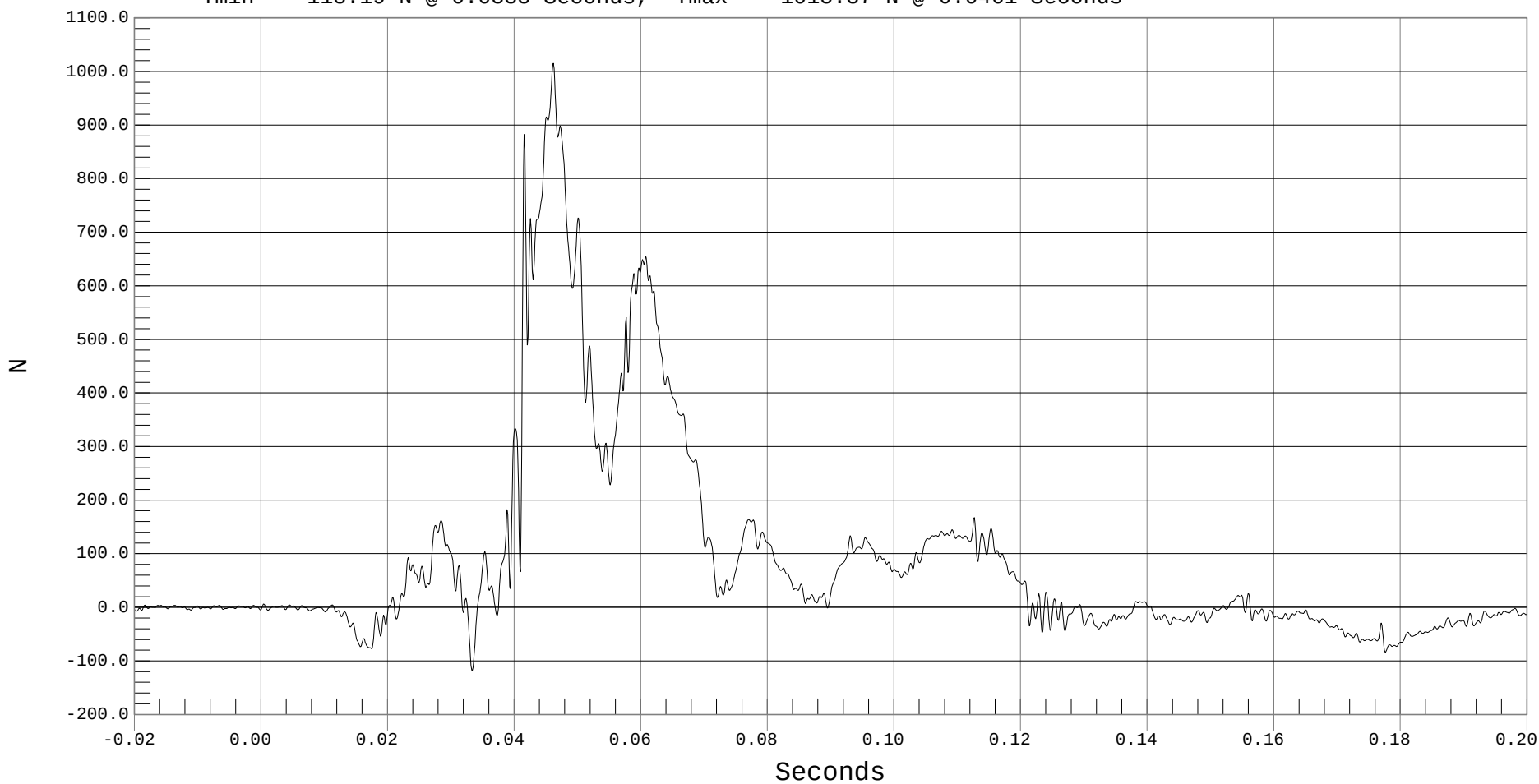
DRIVER RIGHT FEMUR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR FORCE Z, B01105FF.F50

Ymin = -118.19 N @ 0.0333 Seconds, Ymax = 1015.37 N @ 0.0461 Seconds





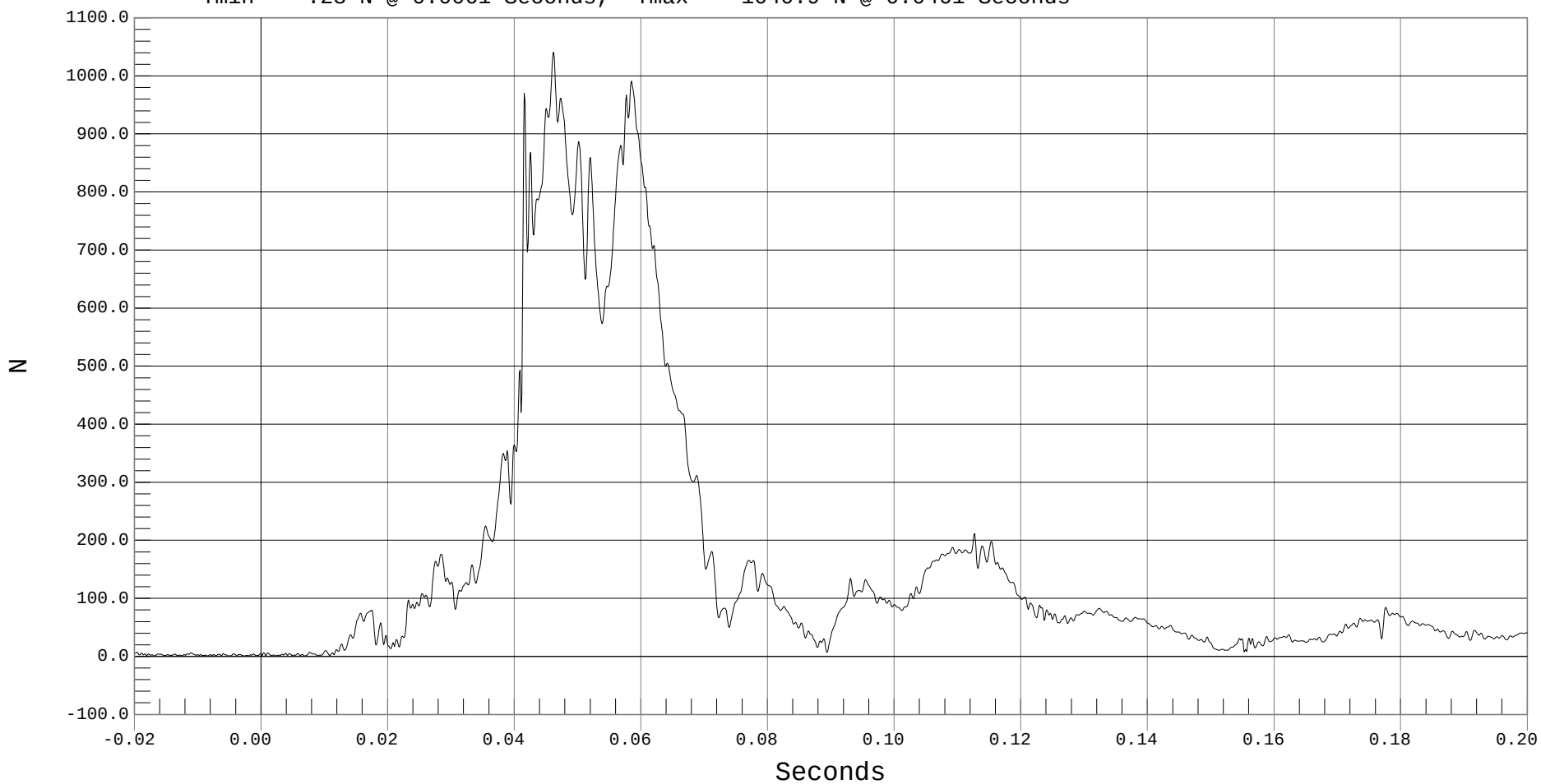
DRIVER RIGHT FEMUR FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR FORCE RESULTANT, B01105FV.F48

Ymin = .28 N @ 0.0061 Seconds, Ymax = 1040.9 N @ 0.0461 Seconds





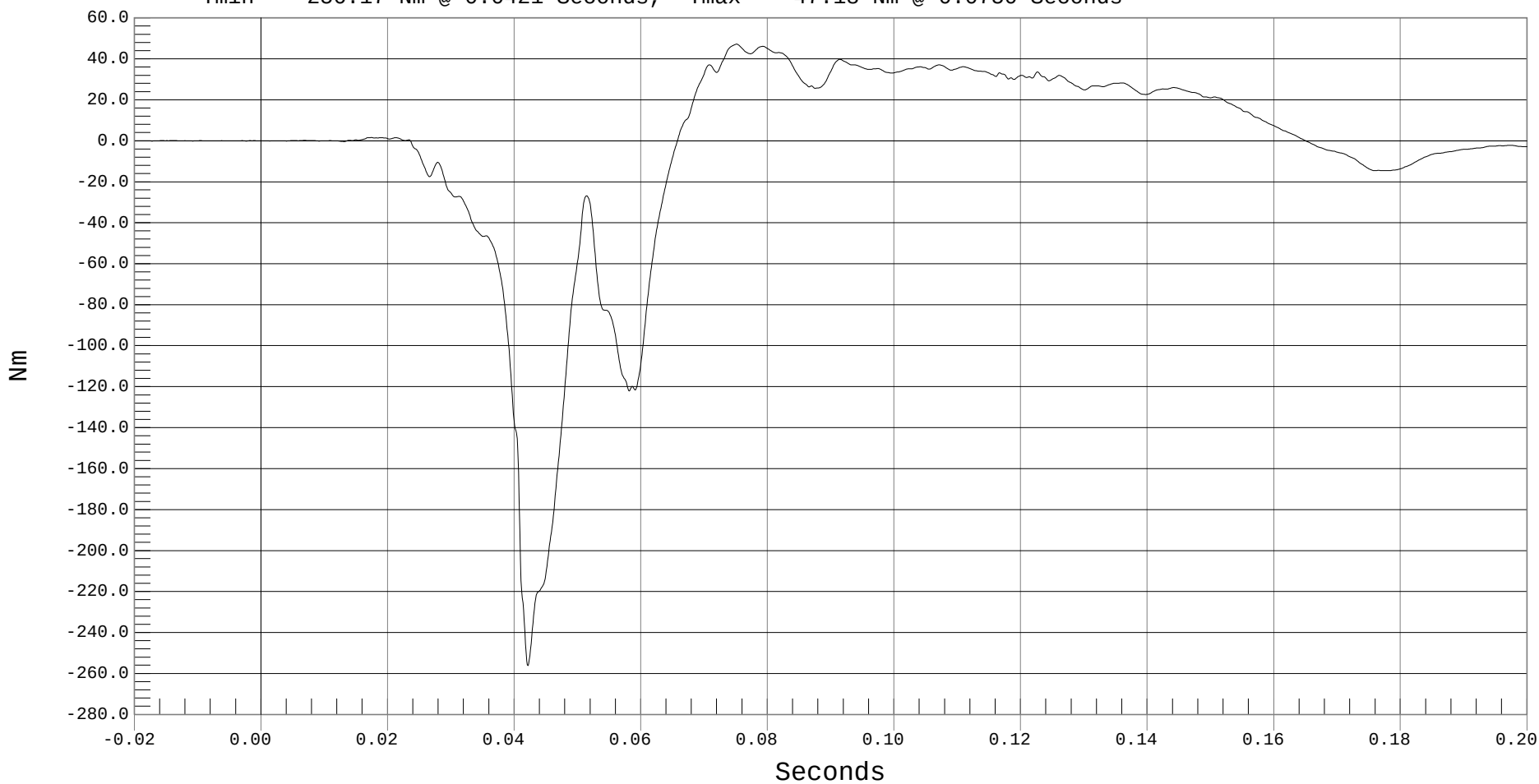
DRIVER RIGHT FEMUR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 DRIVER RIGHT FEMUR MOMENT X, B01105MF.M51

Ymin = -256.17 Nm @ 0.0421 Seconds, Ymax = 47.18 Nm @ 0.0750 Seconds





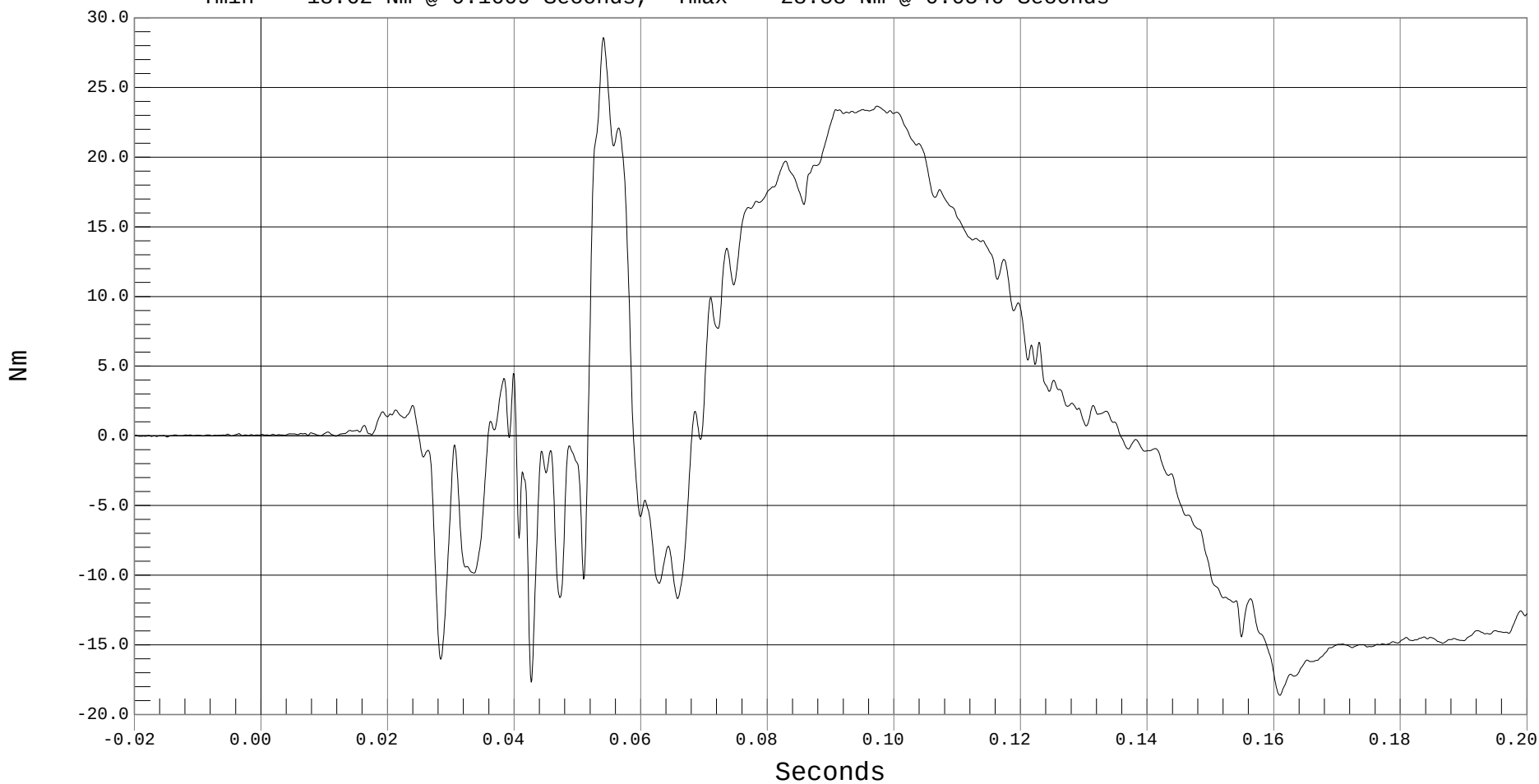
DRIVER RIGHT FEMUR MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR MOMENT Y, B01105MF.M52

Ymin = -18.62 Nm @ 0.1609 Seconds, Ymax = 28.58 Nm @ 0.0540 Seconds





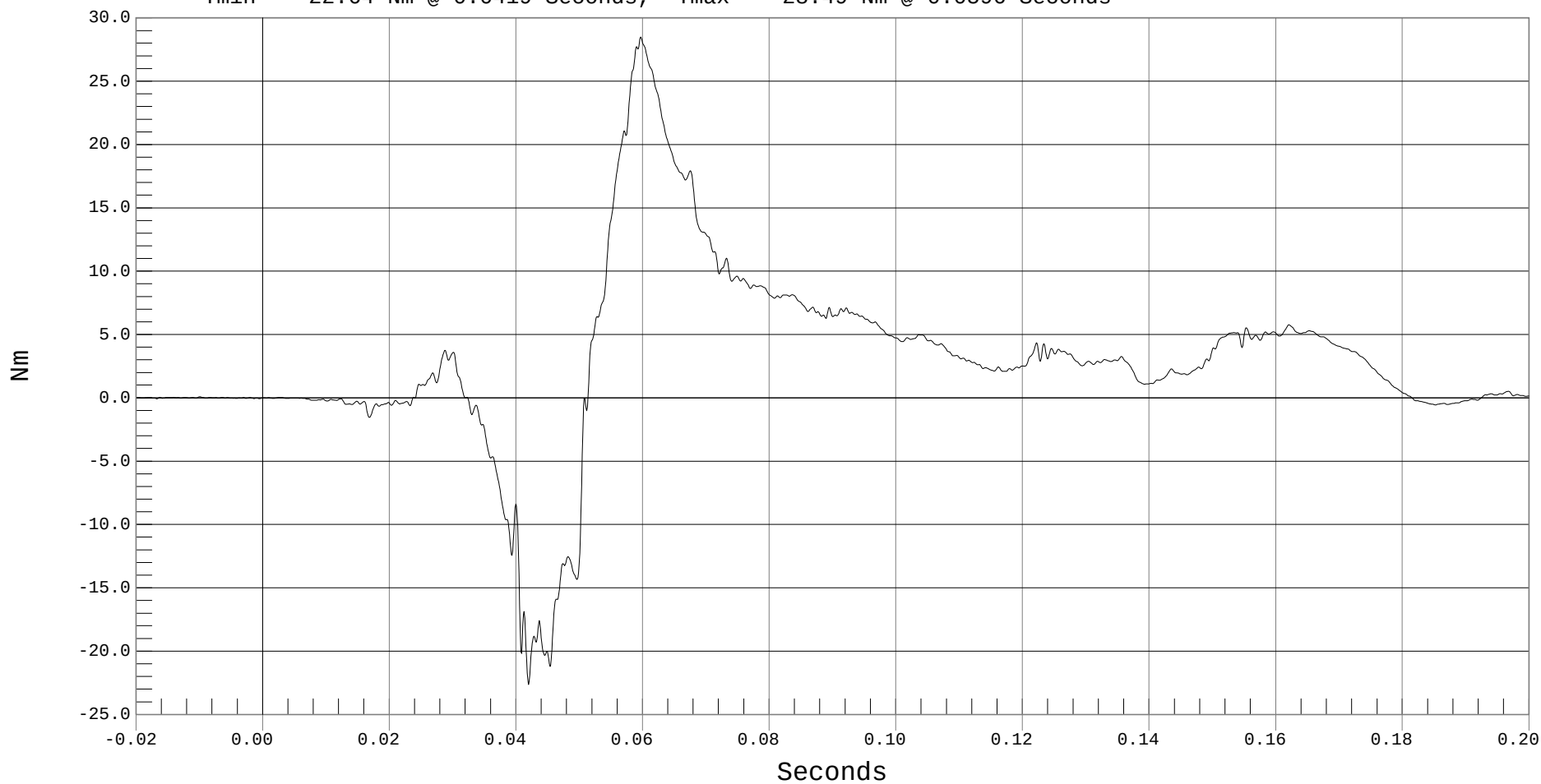
DRIVER RIGHT FEMUR MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR MOMENT Z, B01105MF.M53

Ymin = -22.64 Nm @ 0.0419 Seconds, Ymax = 28.49 Nm @ 0.0596 Seconds





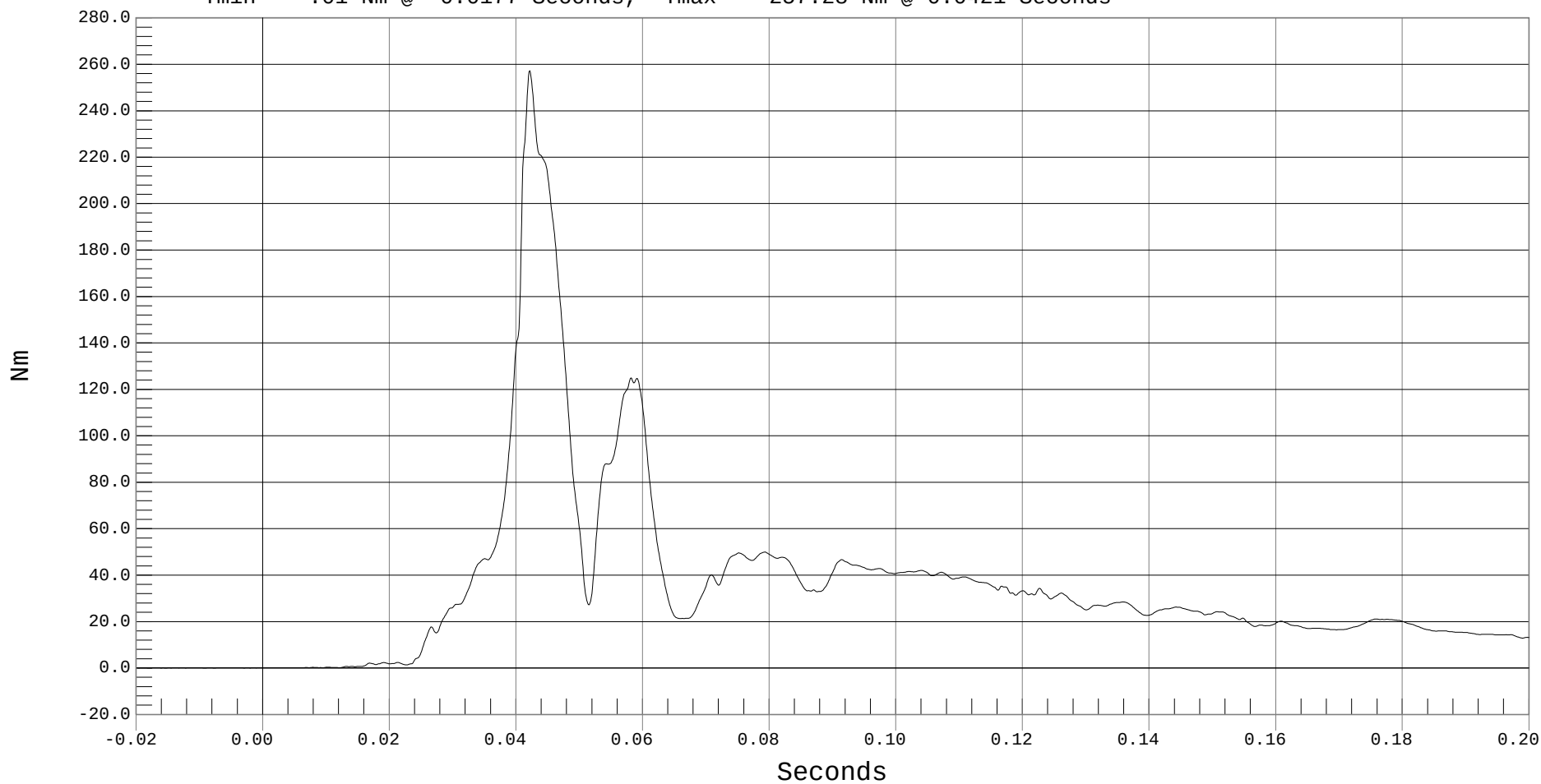
DRIVER RIGHT FEMUR MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 DRIVER RIGHT FEMUR MOMENT RESULTANT, B01105MV.M51

Ymin = .01 Nm @ -0.0177 Seconds, Ymax = 257.28 Nm @ 0.0421 Seconds





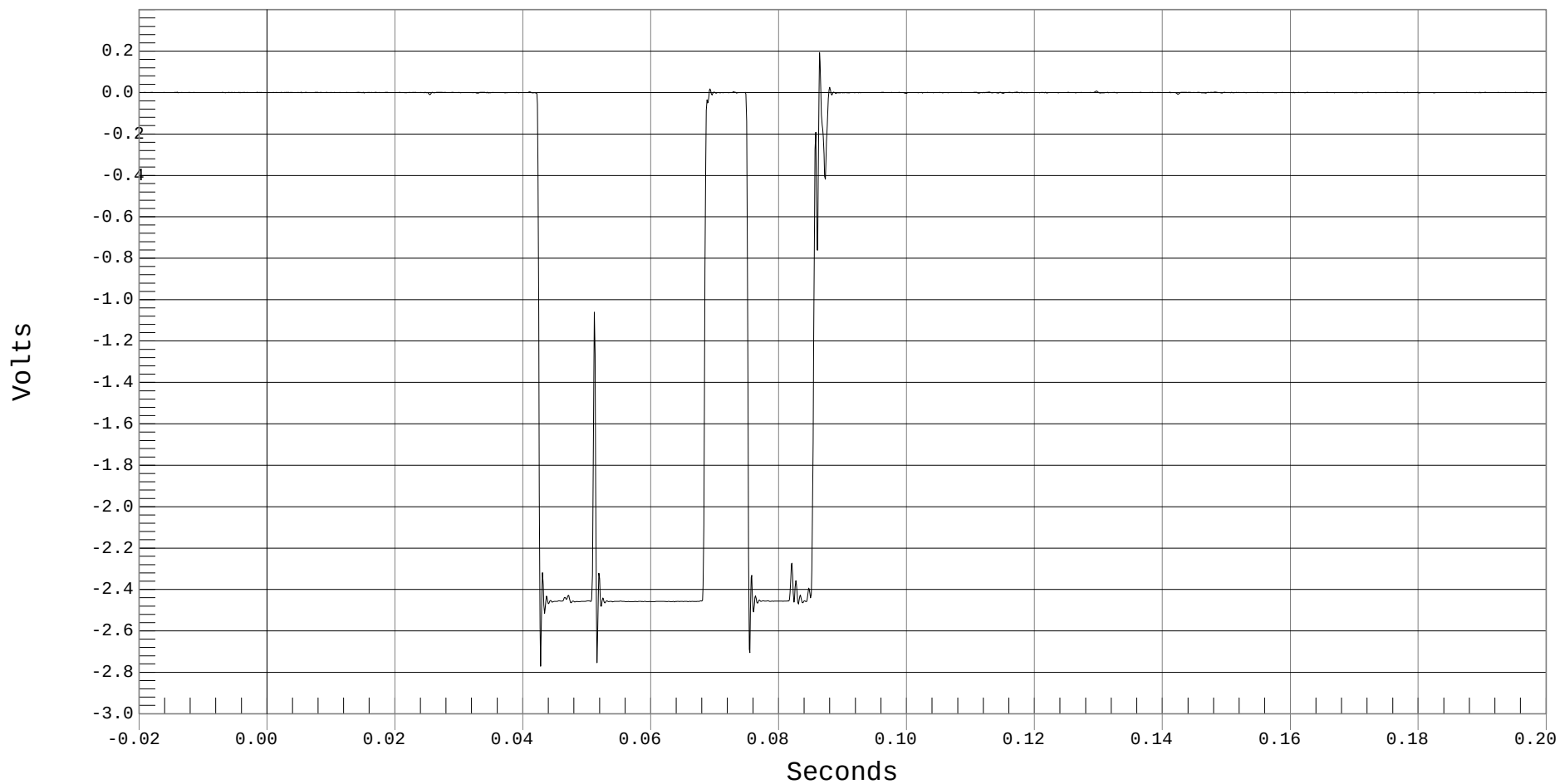
DRIVER HEAD CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER HEAD CONTACT, B011050T.071

Ymin = -2.77 Volts @ 0.0427 Seconds, Ymax = .19 Volts @ 0.0863 Seconds





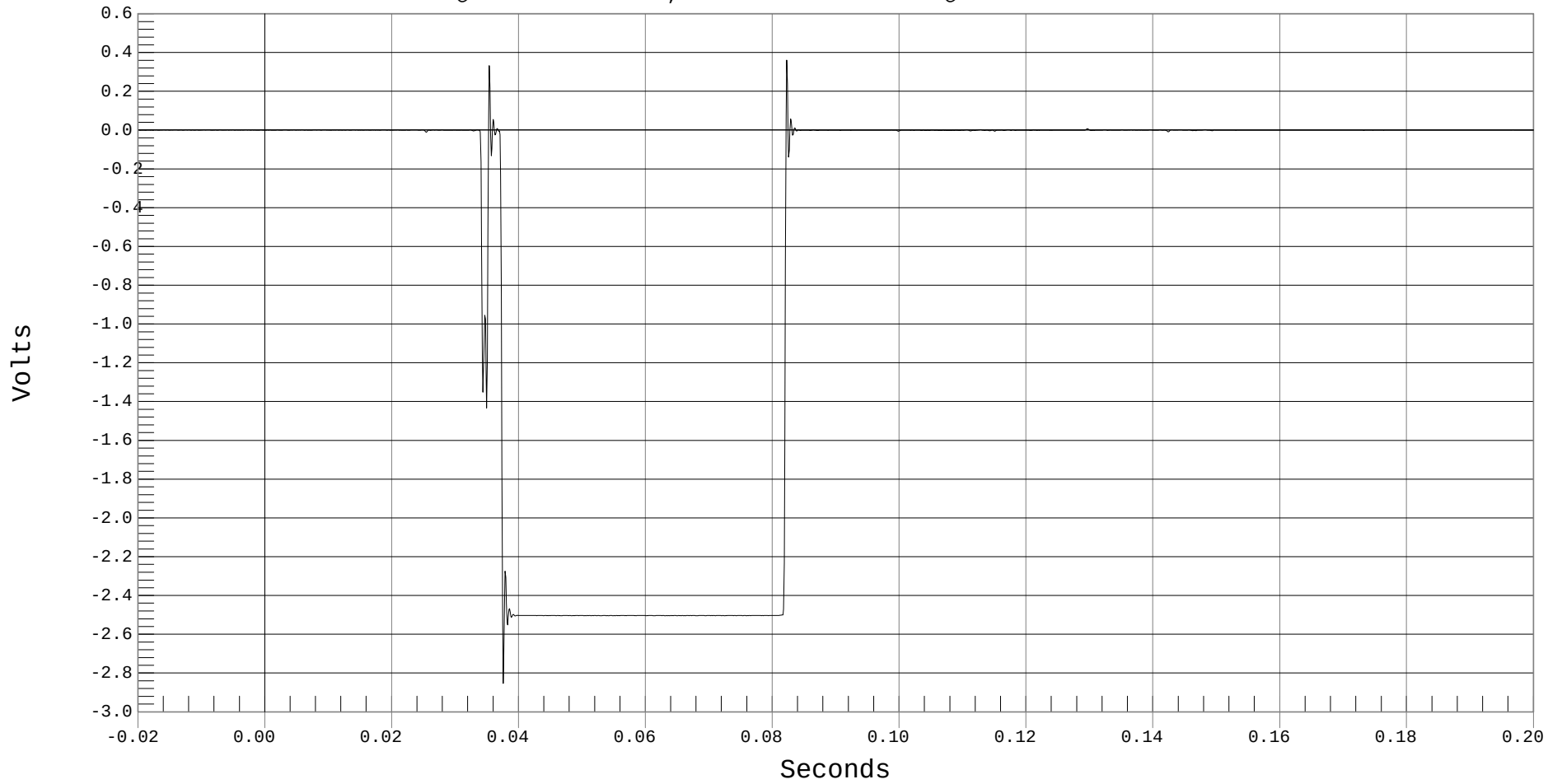
DRIVER RIB CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER RIB CONTACT, B011050T.073

Ymin = -2.85 Volts @ 0.0375 Seconds, Ymax = .36 Volts @ 0.0822 Seconds





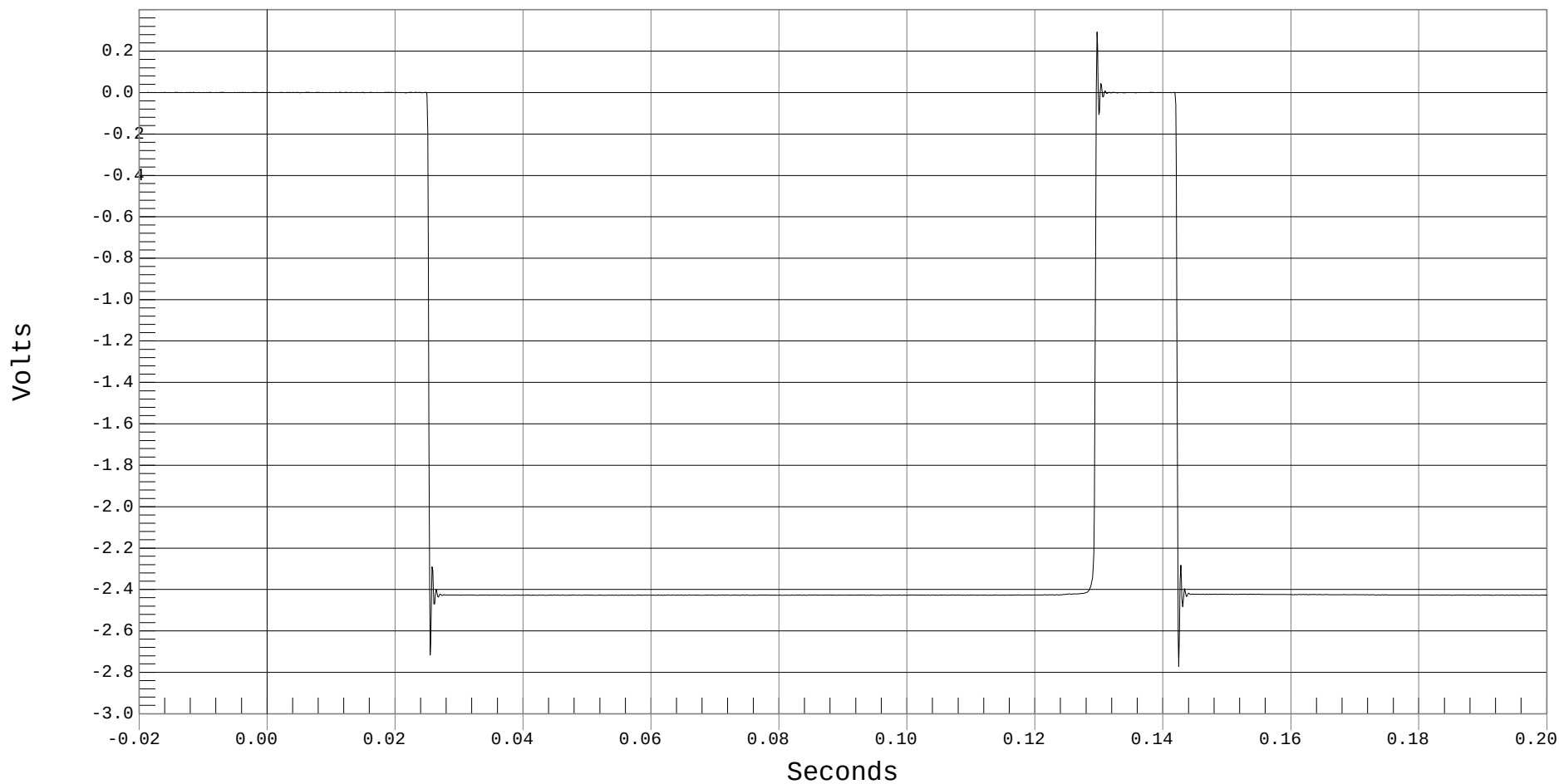
DRIVER PELVIS CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 DRIVER PELVIS CONTACT, B011050T.074

Ymin = -2.77 Volts @ 0.1424 Seconds, Ymax = .29 Volts @ 0.1296 Seconds





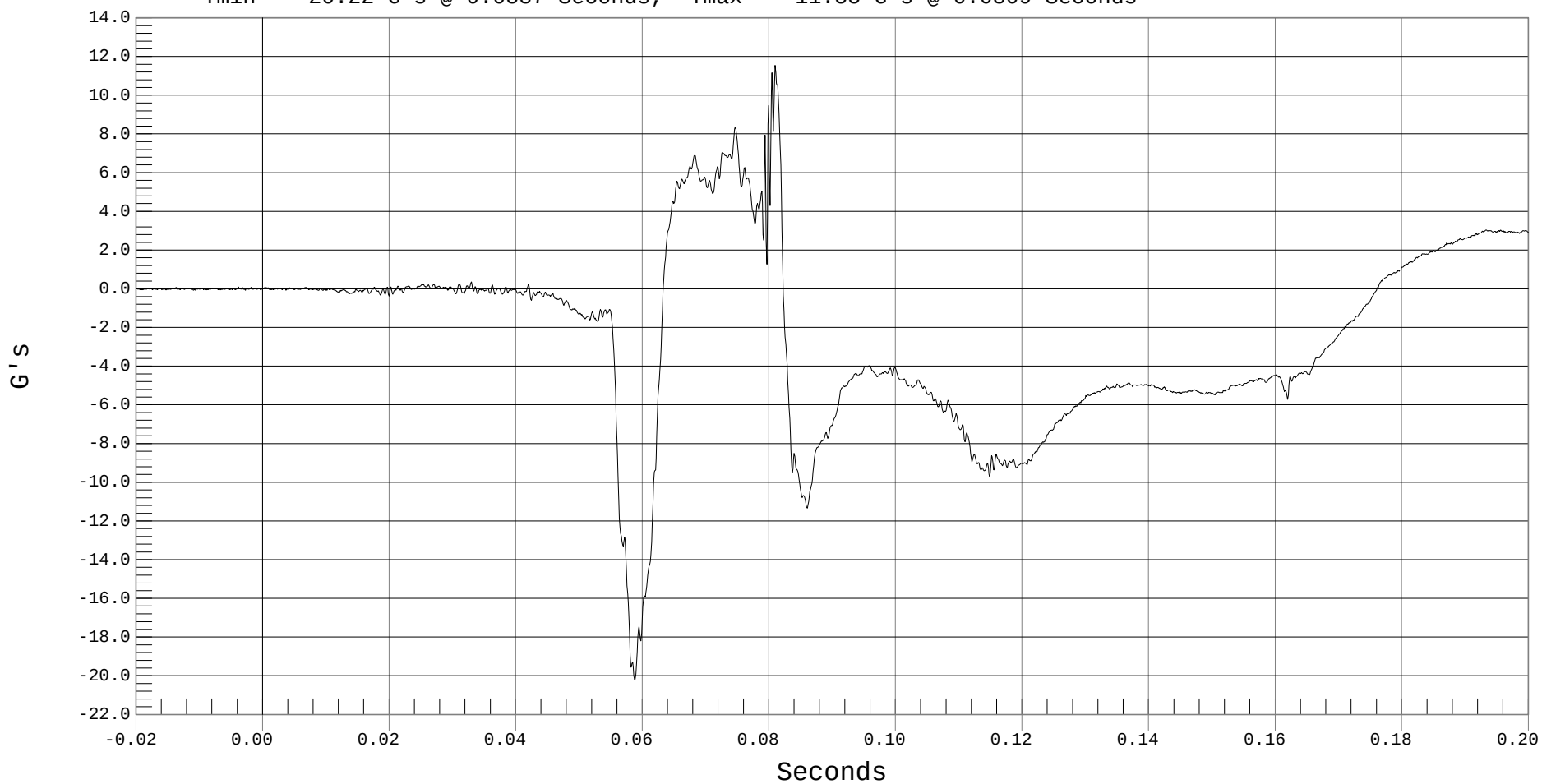
PASSENGER HEAD CG X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD CG X, B01105AT.A60

Ymin = -20.22 G's @ 0.0587 Seconds, Ymax = 11.55 G's @ 0.0809 Seconds





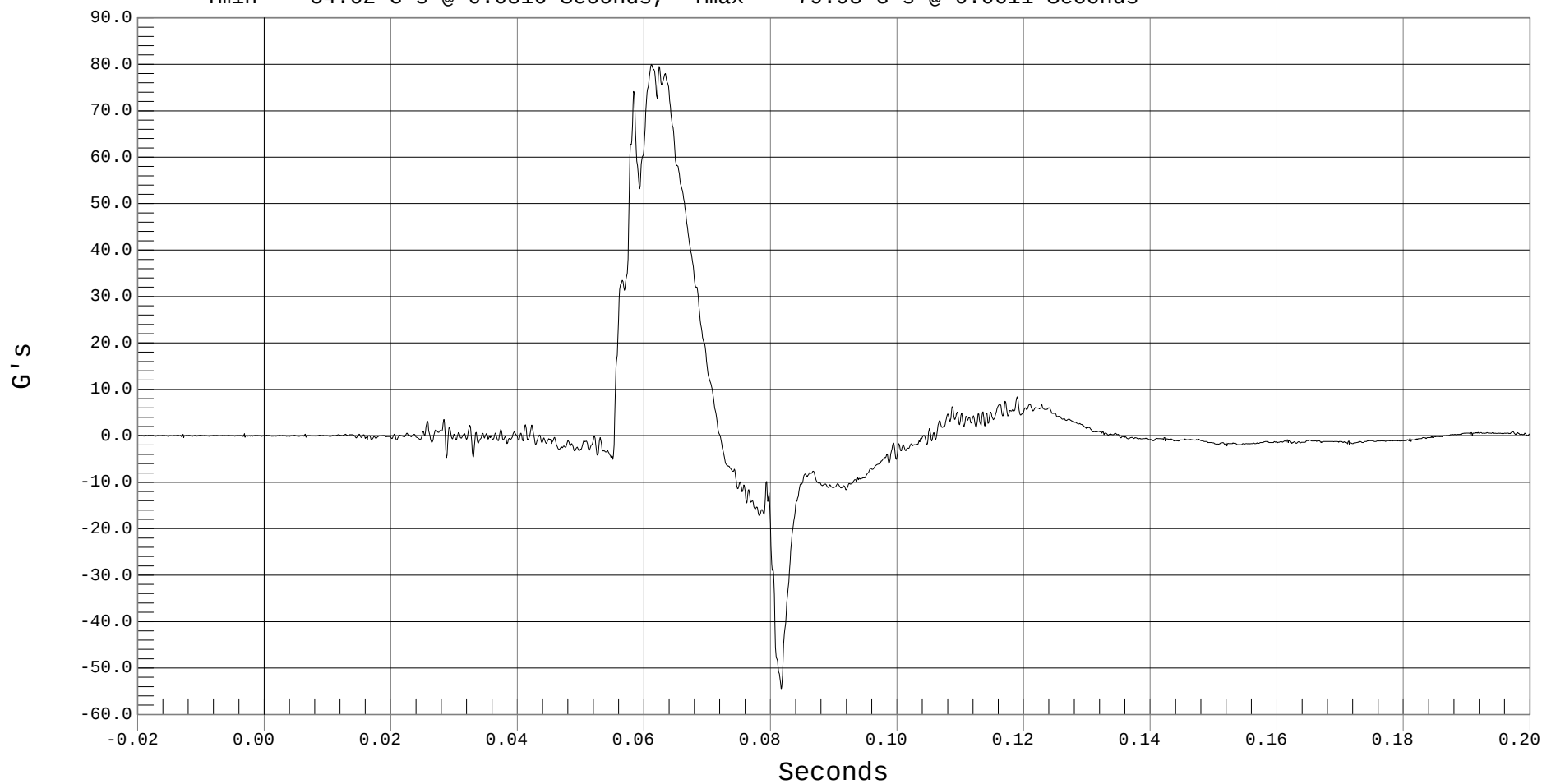
PASSENGER HEAD CG Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD CG Y, B01105AT.A61

Ymin = -54.62 G's @ 0.0816 Seconds, Ymax = 79.98 G's @ 0.0611 Seconds





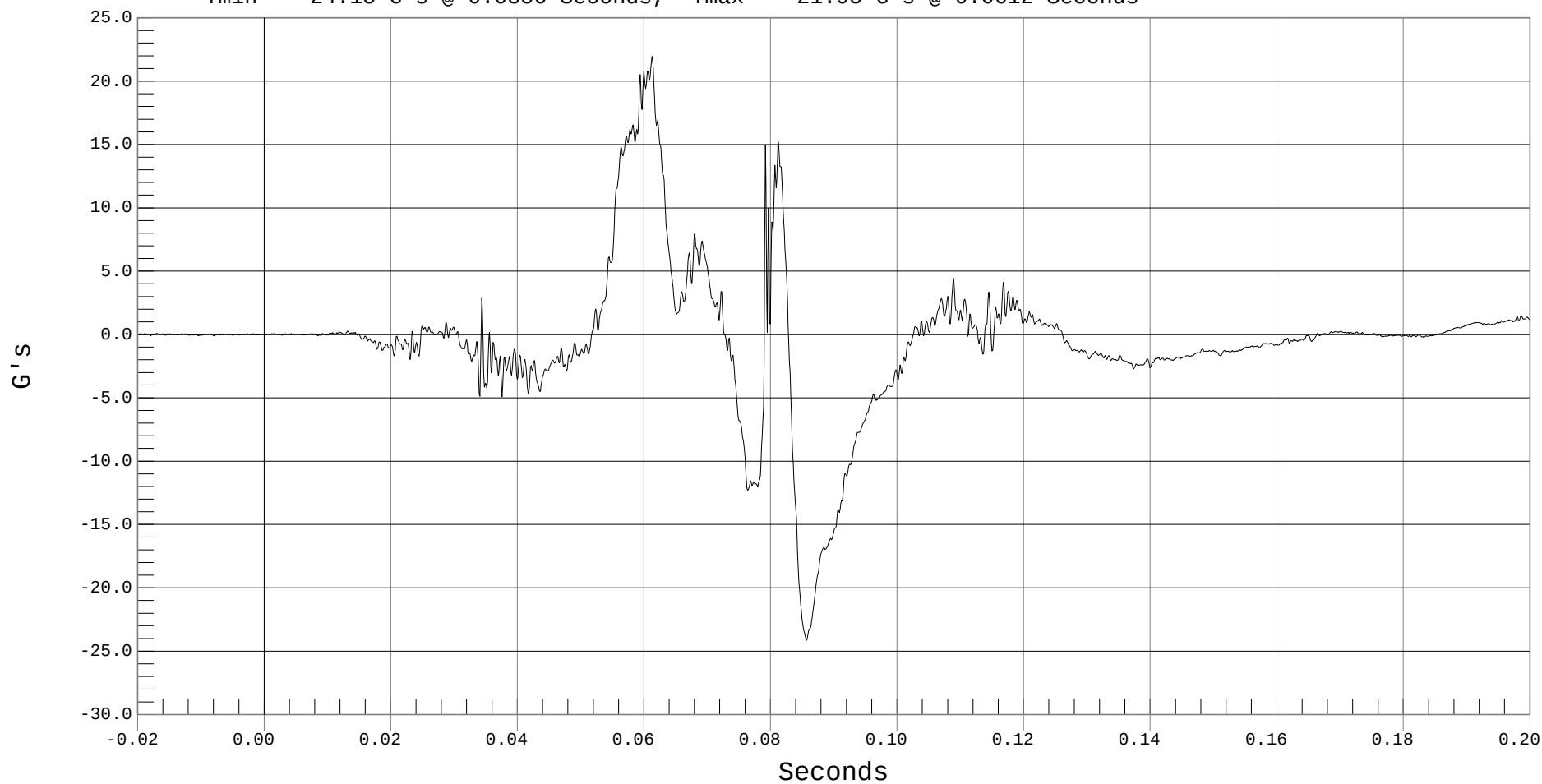
PASSENGER HEAD CG Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD CG Z, B01105AT.A62

Ymin = -24.15 G's @ 0.0856 Seconds, Ymax = 21.95 G's @ 0.0612 Seconds





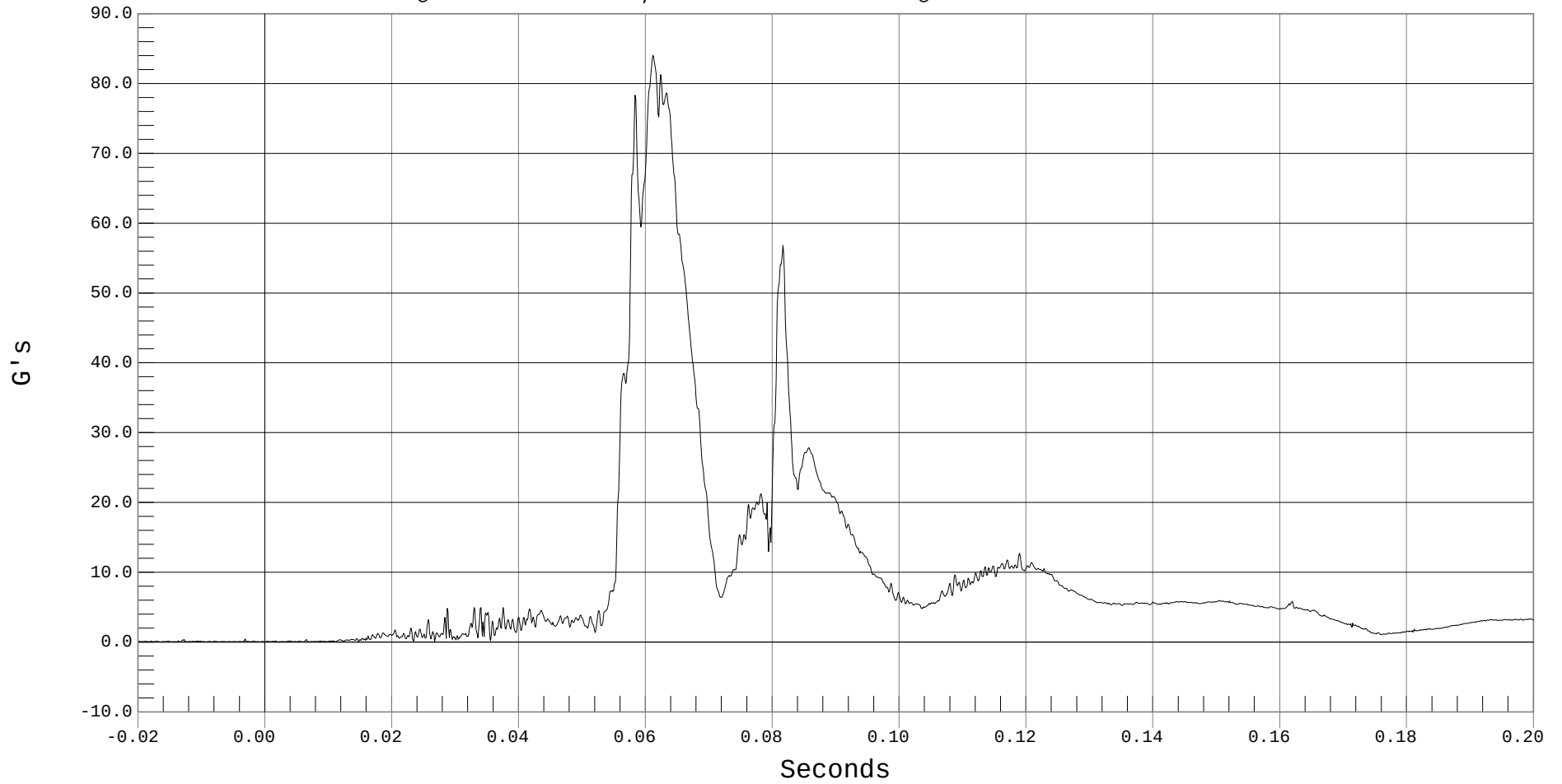
PASSENGER HEAD CG RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 PASSENGER HEAD RESULTANT, B01105AV.A60

Ymin = .01 G's @ -0.0095 Seconds, Ymax = 84.05 G's @ 0.0611 Seconds





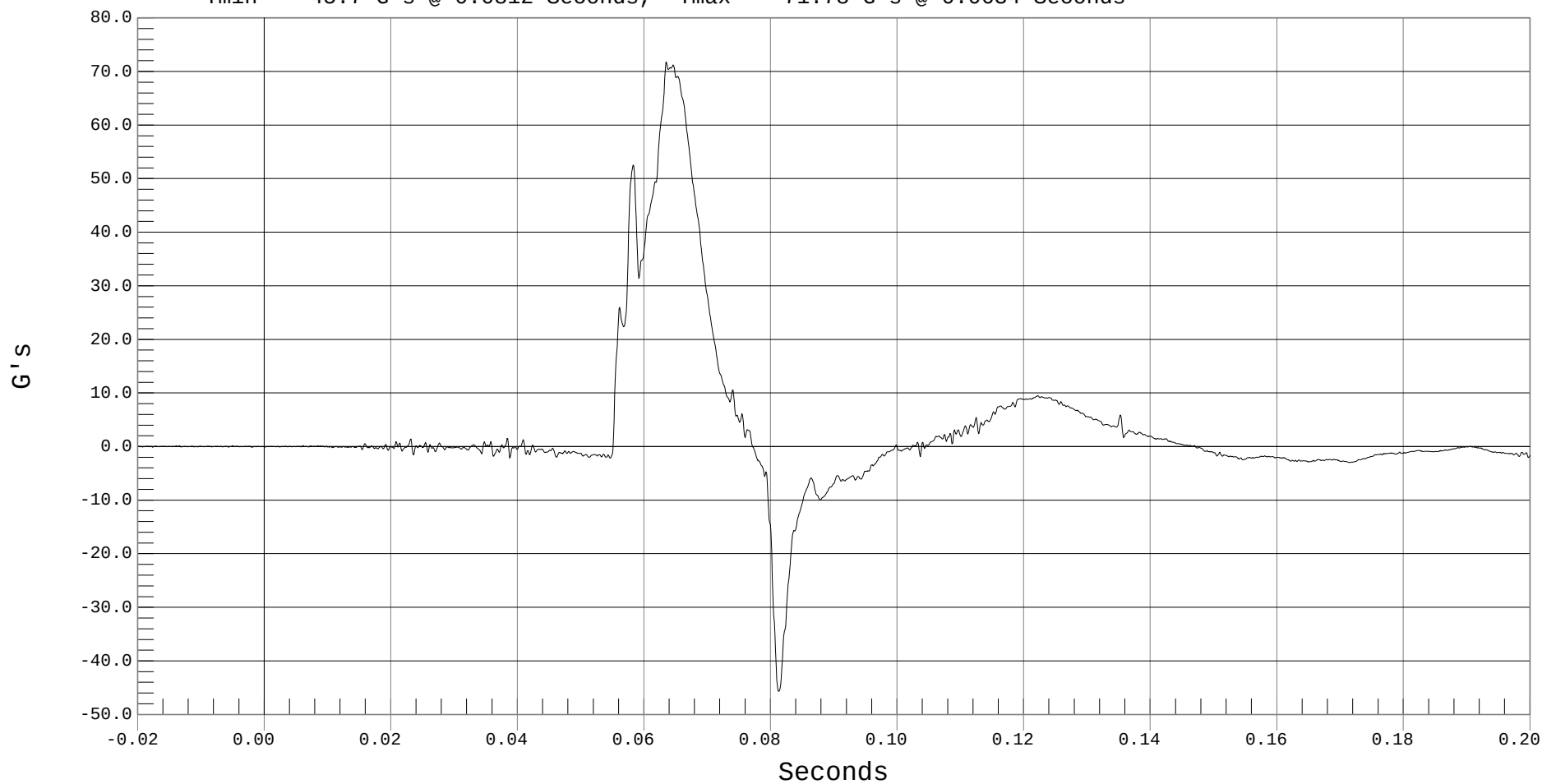
PASSENGER HEAD FRONT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 REAR PASSENGER HEAD FRONT Y, B01105AT.A65

Ymin = -45.7 G's @ 0.0812 Seconds, Ymax = 71.78 G's @ 0.0634 Seconds





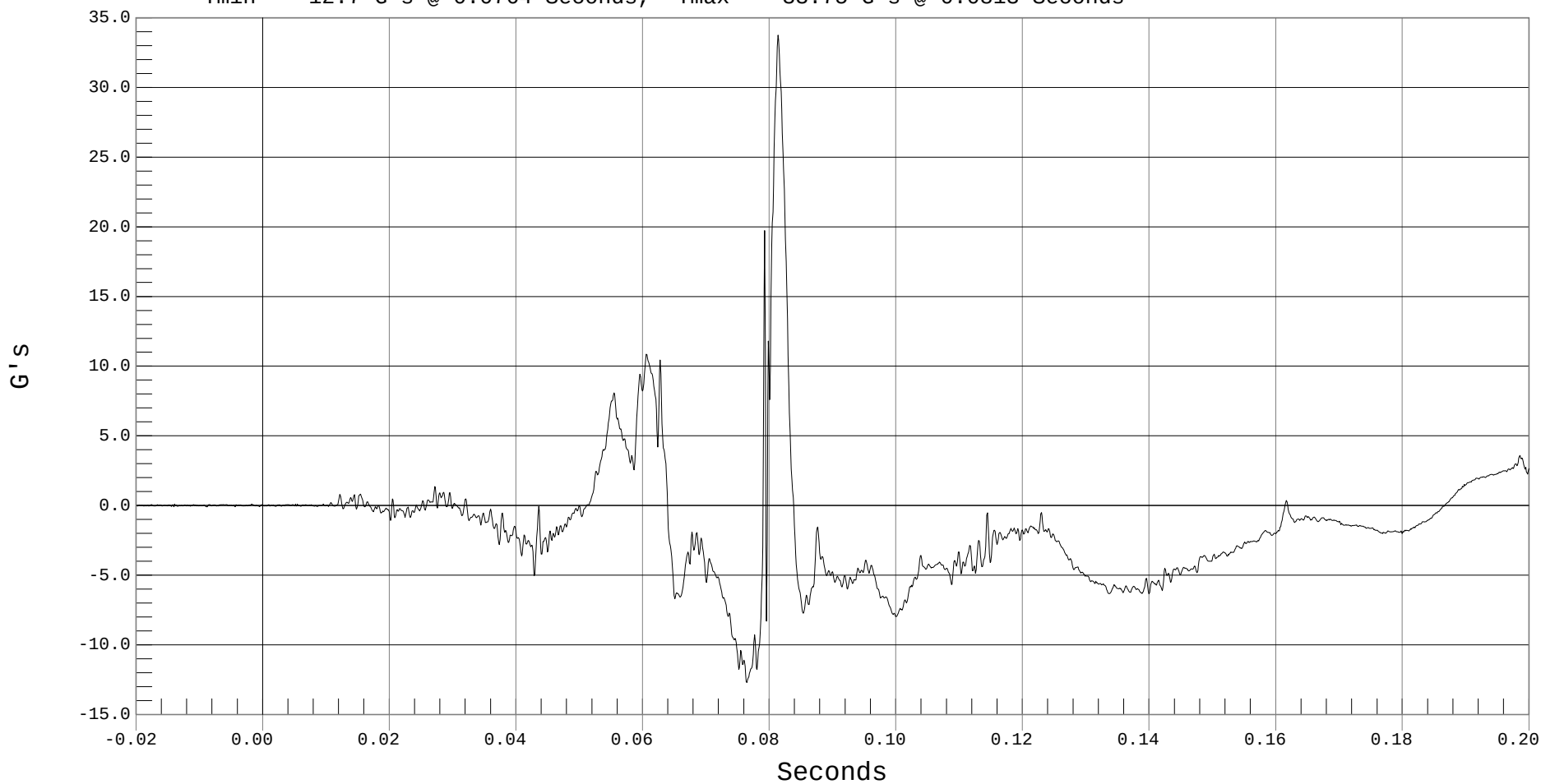
PASSENGER HEAD FRONT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD FRONT Z, B01105AT.A66

Ymin = -12.7 G's @ 0.0764 Seconds, Ymax = 33.75 G's @ 0.0813 Seconds





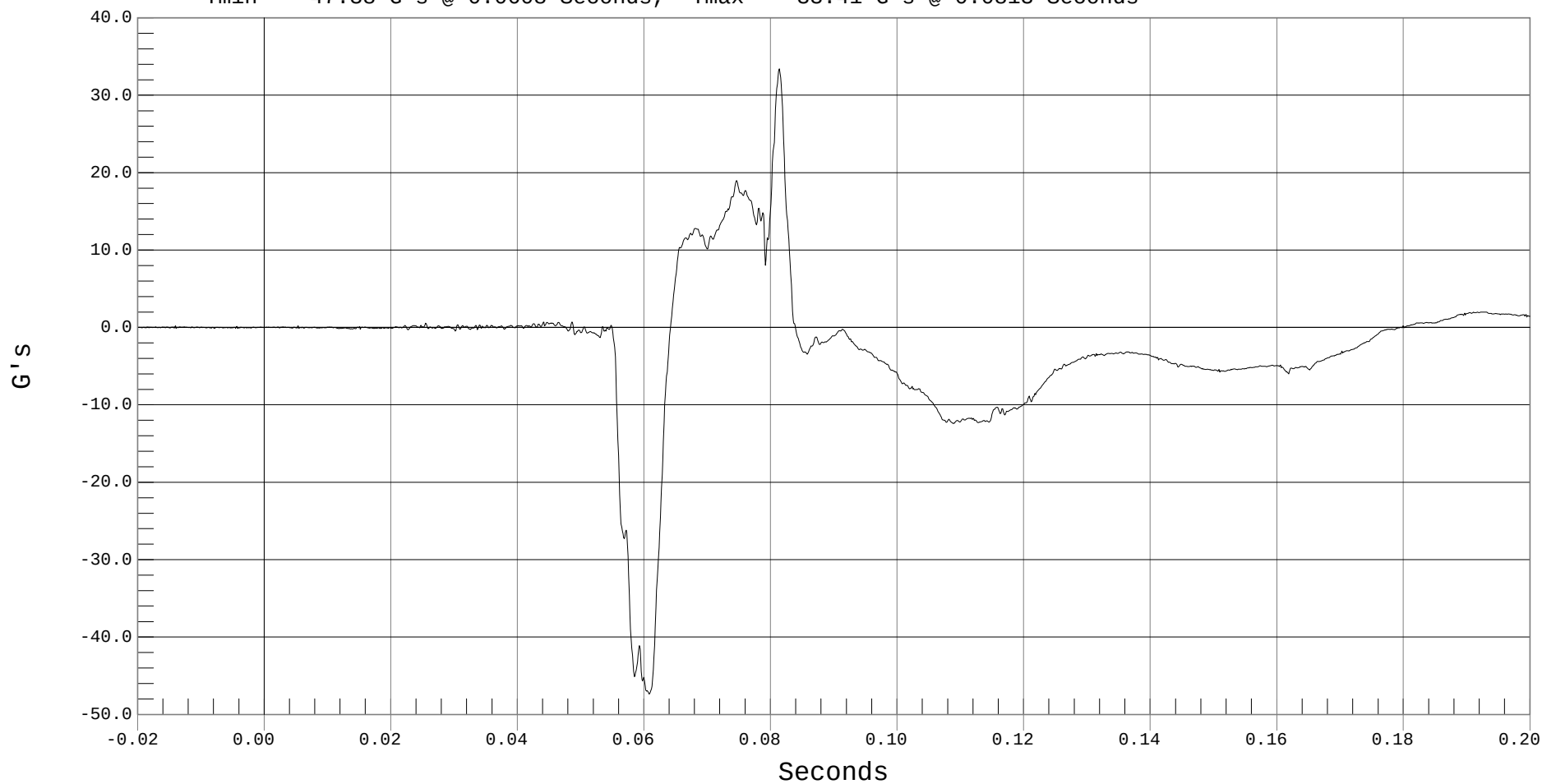
PASSENGER HEAD LEFT X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD LEFT X, B01105AT.A67

Ymin = -47.38 G's @ 0.0608 Seconds, Ymax = 33.41 G's @ 0.0813 Seconds





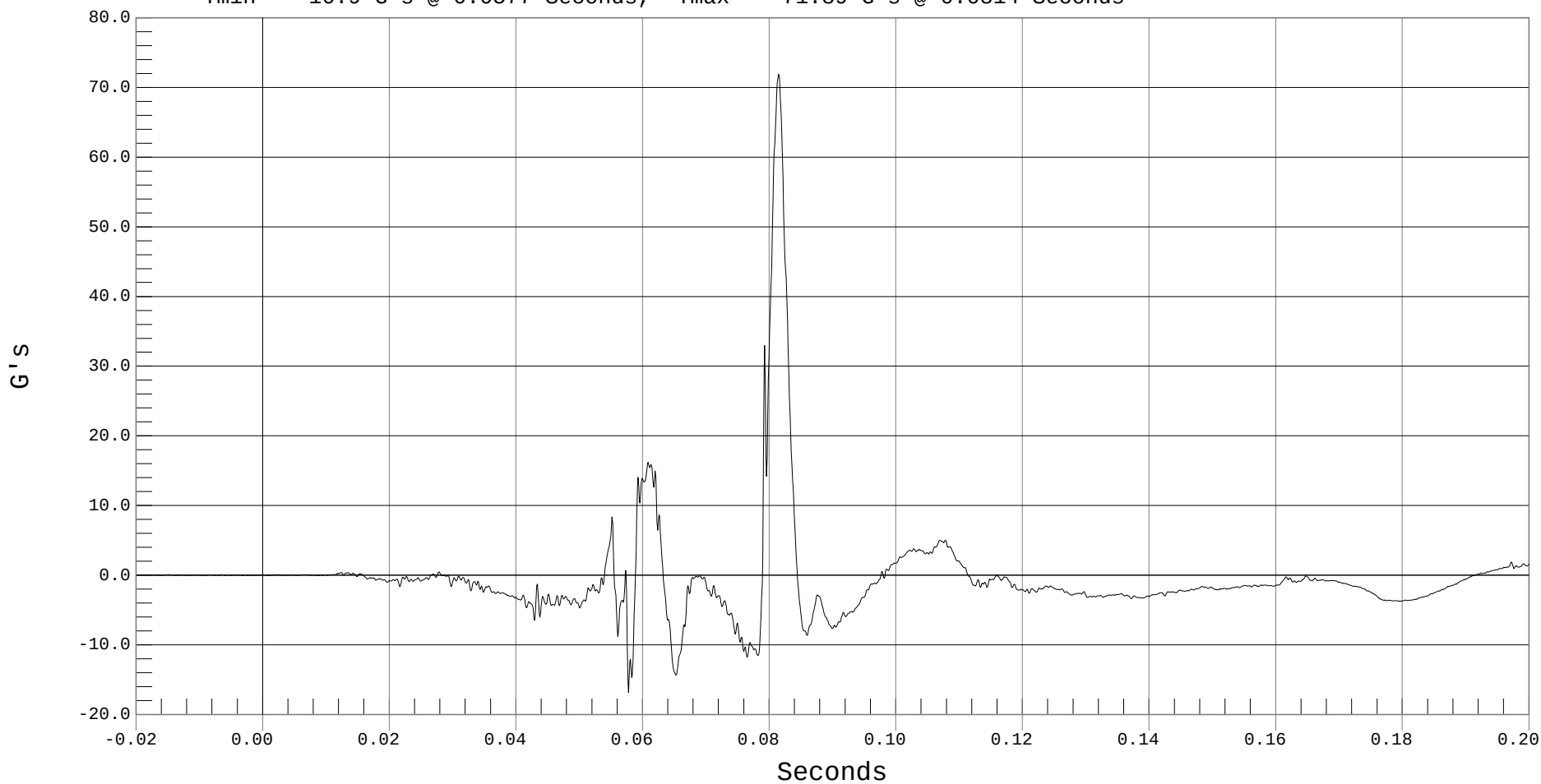
PASSENGER HEAD LEFT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD LEFT Z, B01105AT.A68

Ymin = -16.9 G's @ 0.0577 Seconds, Ymax = 71.89 G's @ 0.0814 Seconds





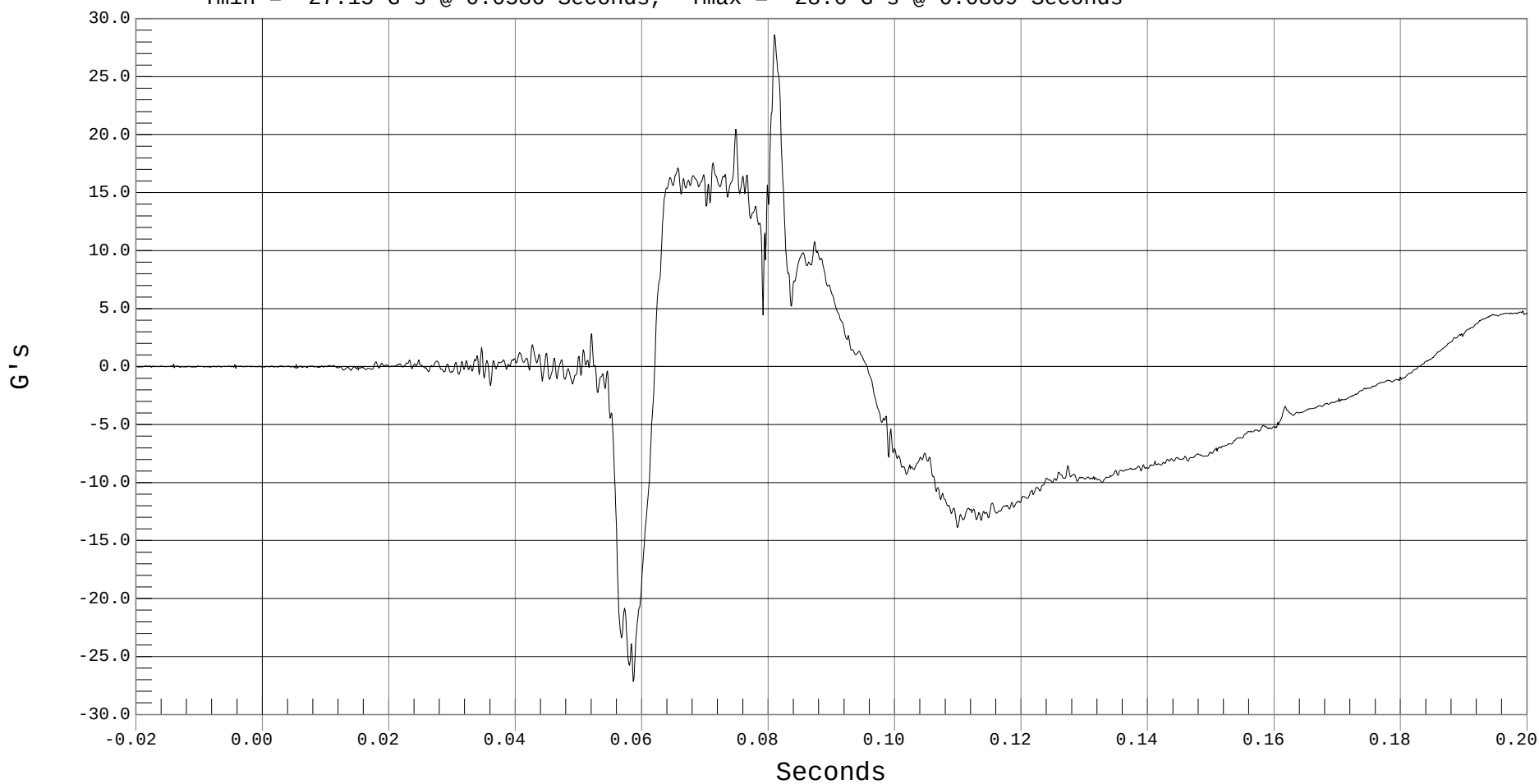
PASSENGER HEAD TOP X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD TOP X, B01105AT.A69

Ymin = -27.15 G's @ 0.0586 Seconds, Ymax = 28.6 G's @ 0.0809 Seconds





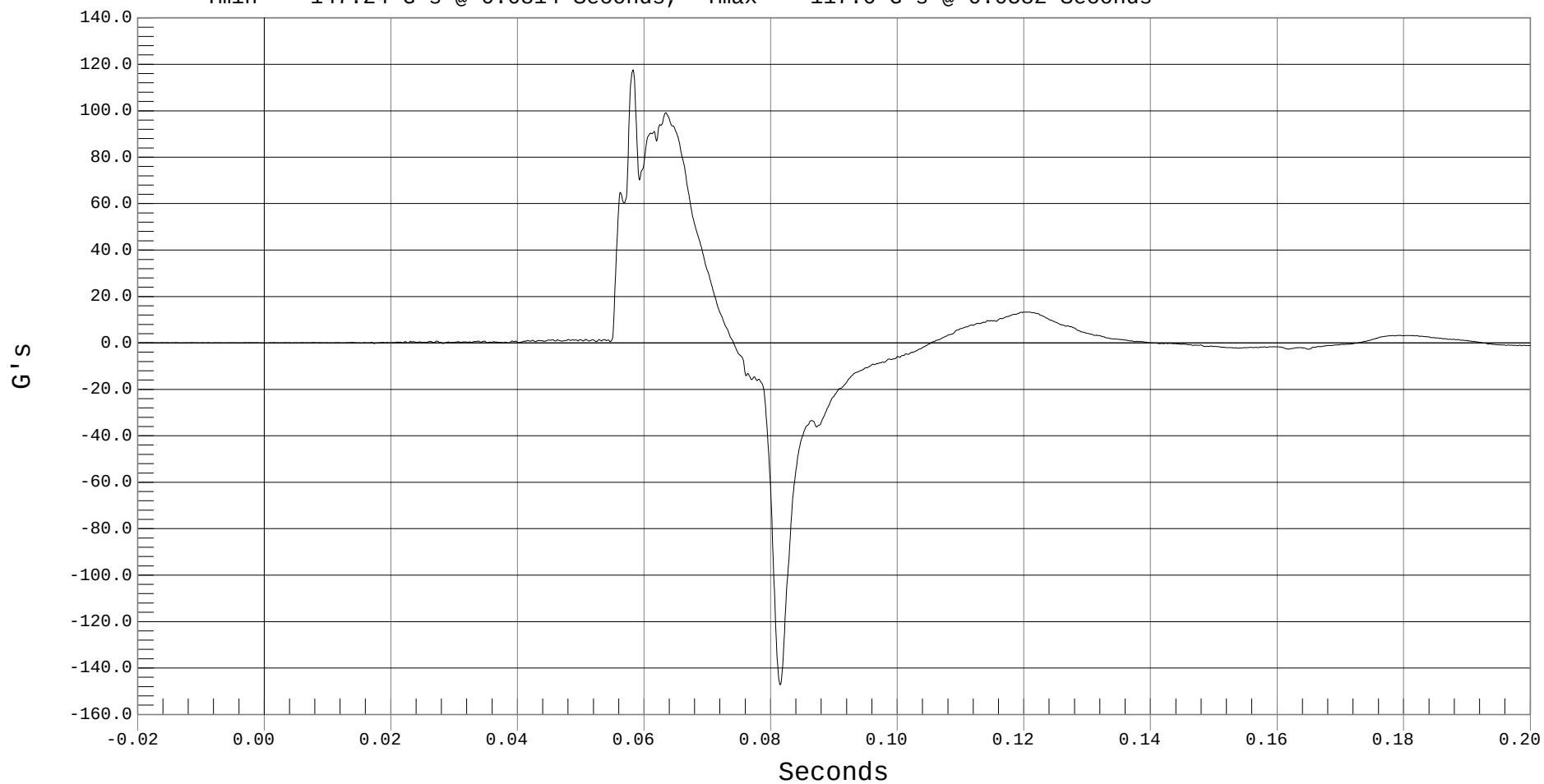
PASSENGER HEAD TOP Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 REAR PASSENGER HEAD TOP Y, B01105AT.A70

Ymin = -147.24 G's @ 0.0814 Seconds, Ymax = 117.6 G's @ 0.0582 Seconds





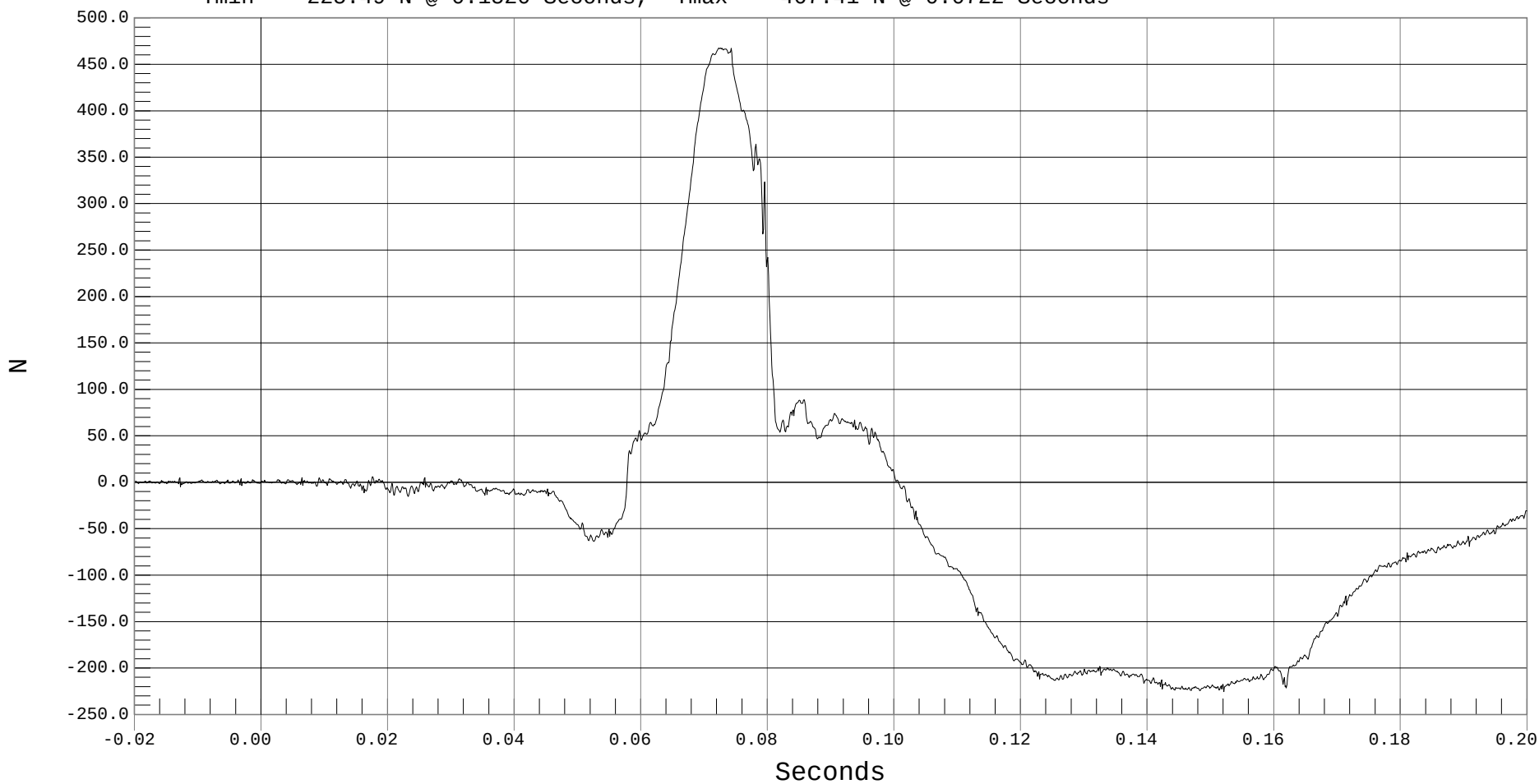
PASSENGER UPPER NECK FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER UPPER NECK FORCE X, B01105FT.F63

Ymin = -225.49 N @ 0.1520 Seconds, Ymax = 467.41 N @ 0.0722 Seconds





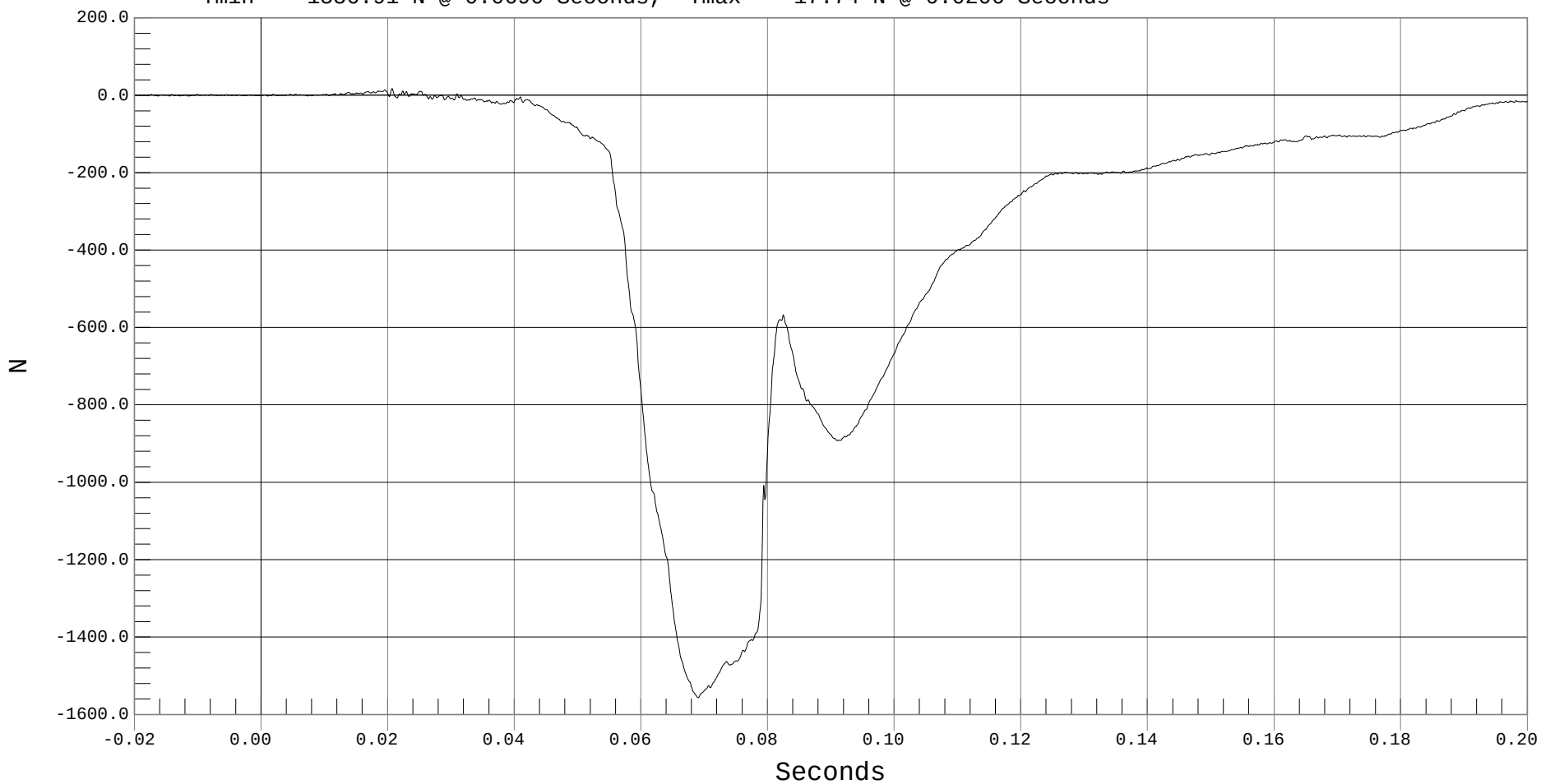
PASSENGER UPPER NECK FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

1 REAR PASSENGER UPPER NECK FORCE Y, B01105FT.F65

Ymin = -1556.91 N @ 0.0690 Seconds, Ymax = 17.74 N @ 0.0206 Seconds





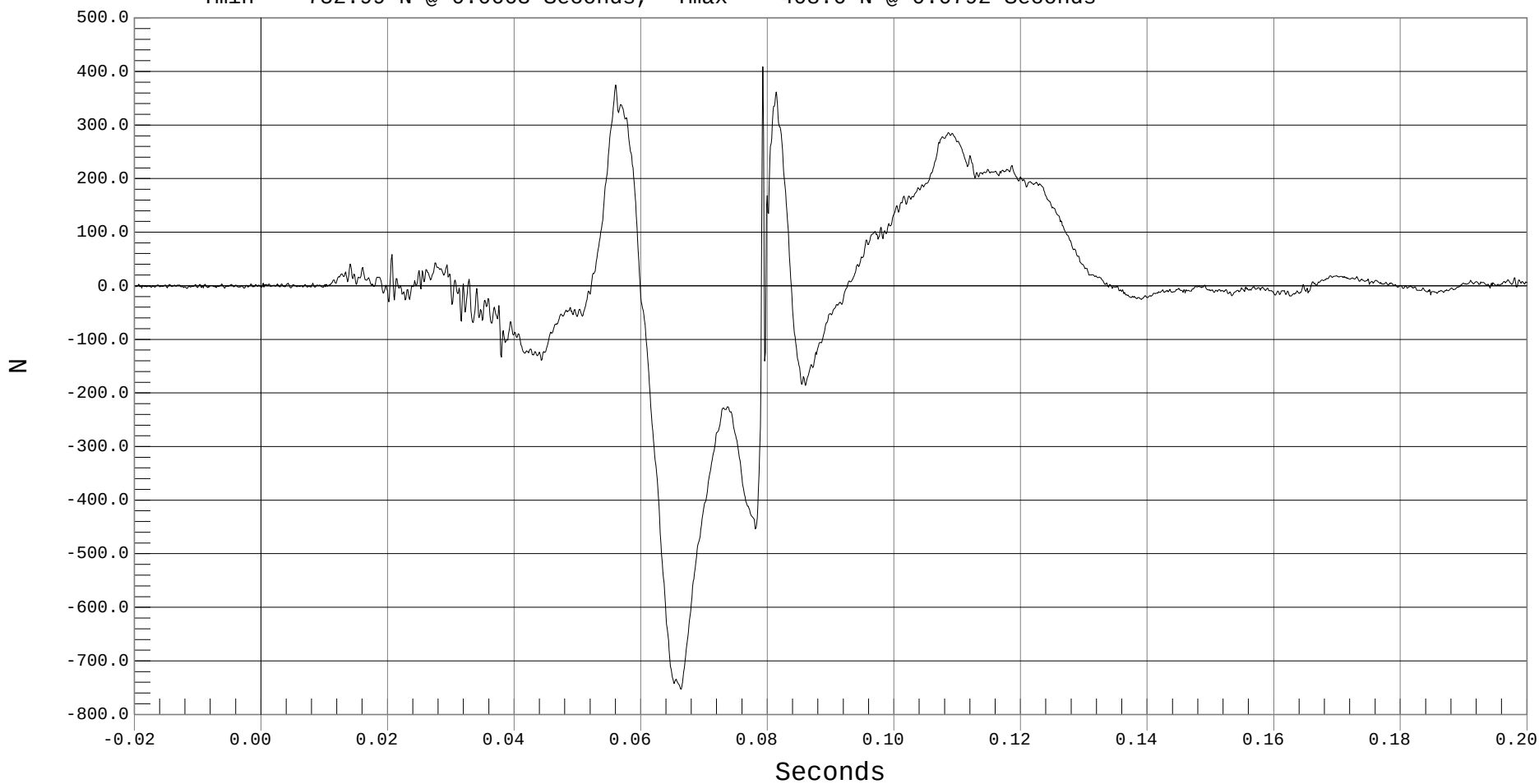
PASSENGER UPPER NECK FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER UPPER NECK FORCE Z, B01105FT.F66

Ymin = -752.99 N @ 0.0663 Seconds, Ymax = 408.6 N @ 0.0792 Seconds





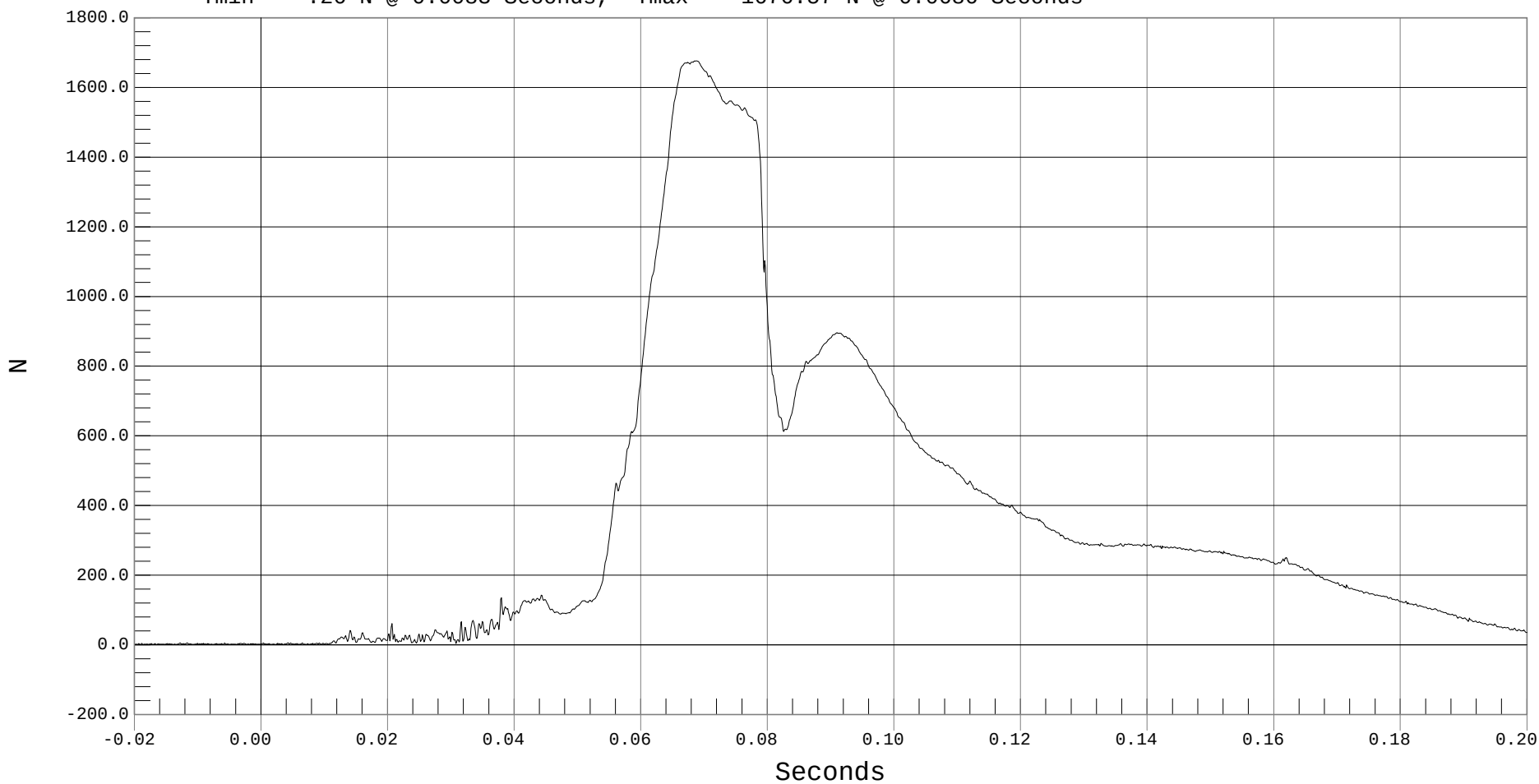
PASSENGER UPPER NECK FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 PASSENGER UPPER NECK FORCE RESULTANT, B01105FV.F63

Ymin = .26 N @ 0.0083 Seconds, Ymax = 1676.57 N @ 0.0686 Seconds





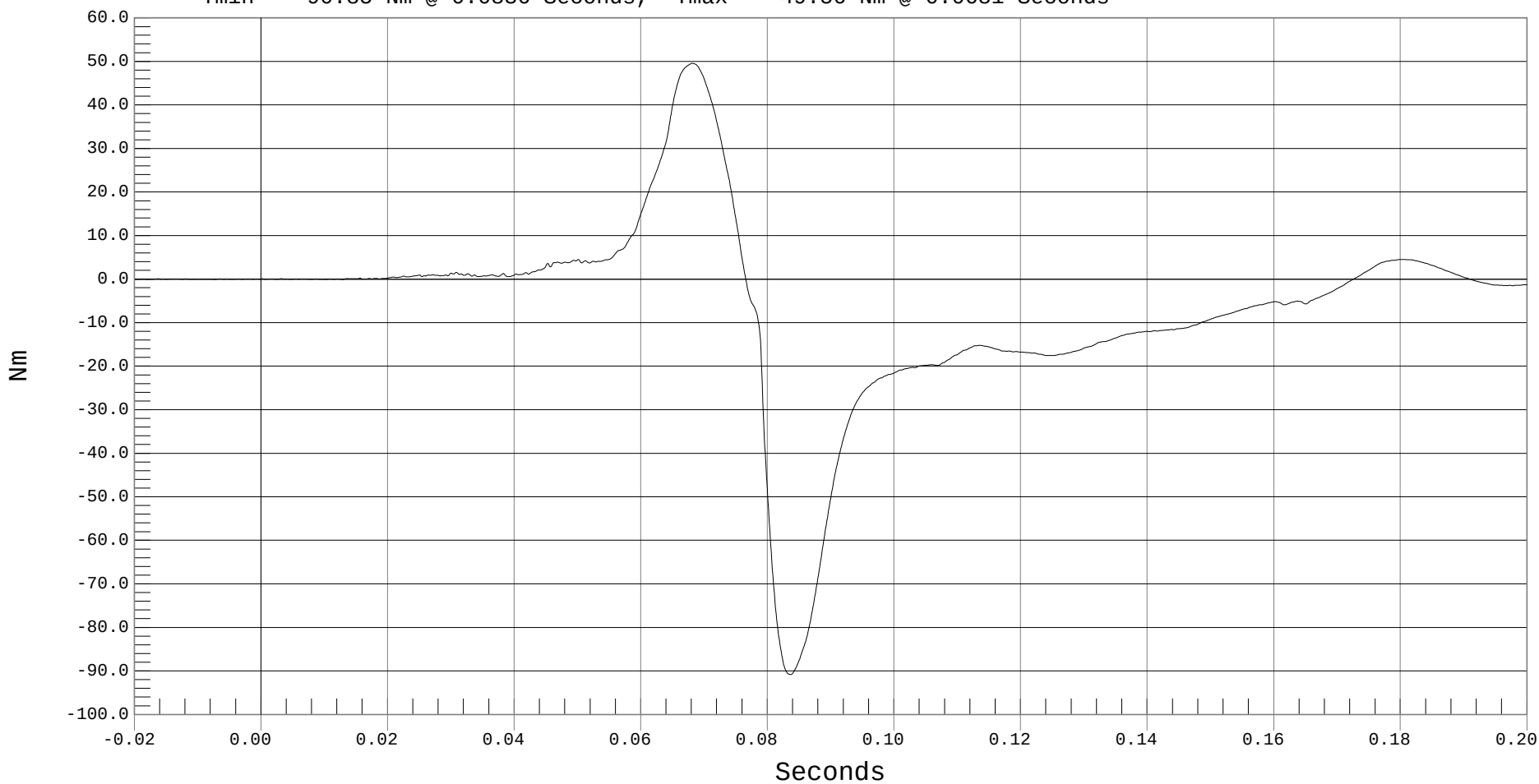
PASSENGER UPPER NECK MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER UPPER NECK MOMENT X, B01105MF.M67

Ymin = -90.85 Nm @ 0.0836 Seconds, Ymax = 49.56 Nm @ 0.0681 Seconds





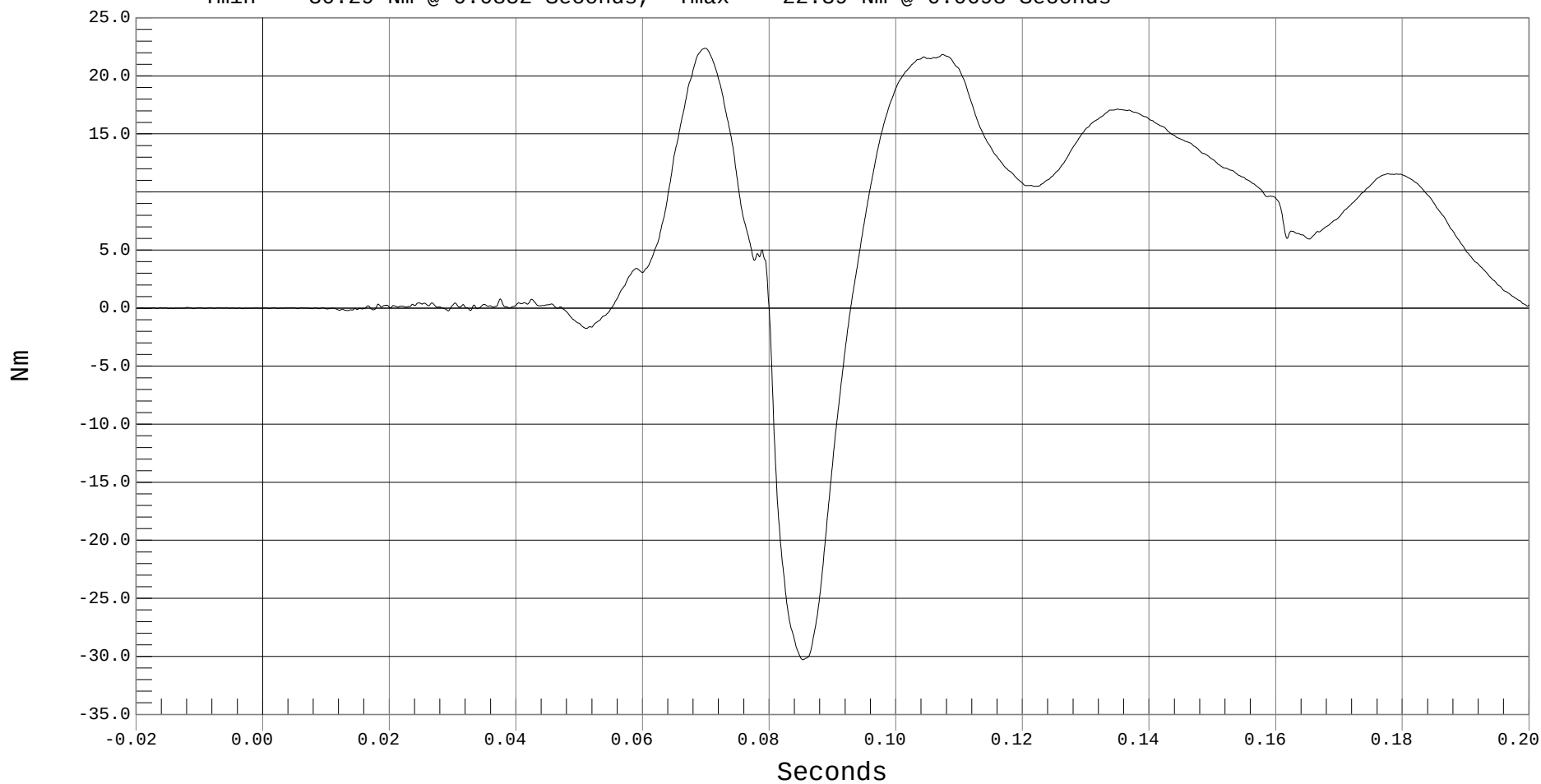
PASSENGER UPPER NECK MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER UPPER NECK MOMENT Y, B01105MF.M68

Ymin = -30.29 Nm @ 0.0852 Seconds, Ymax = 22.39 Nm @ 0.0698 Seconds





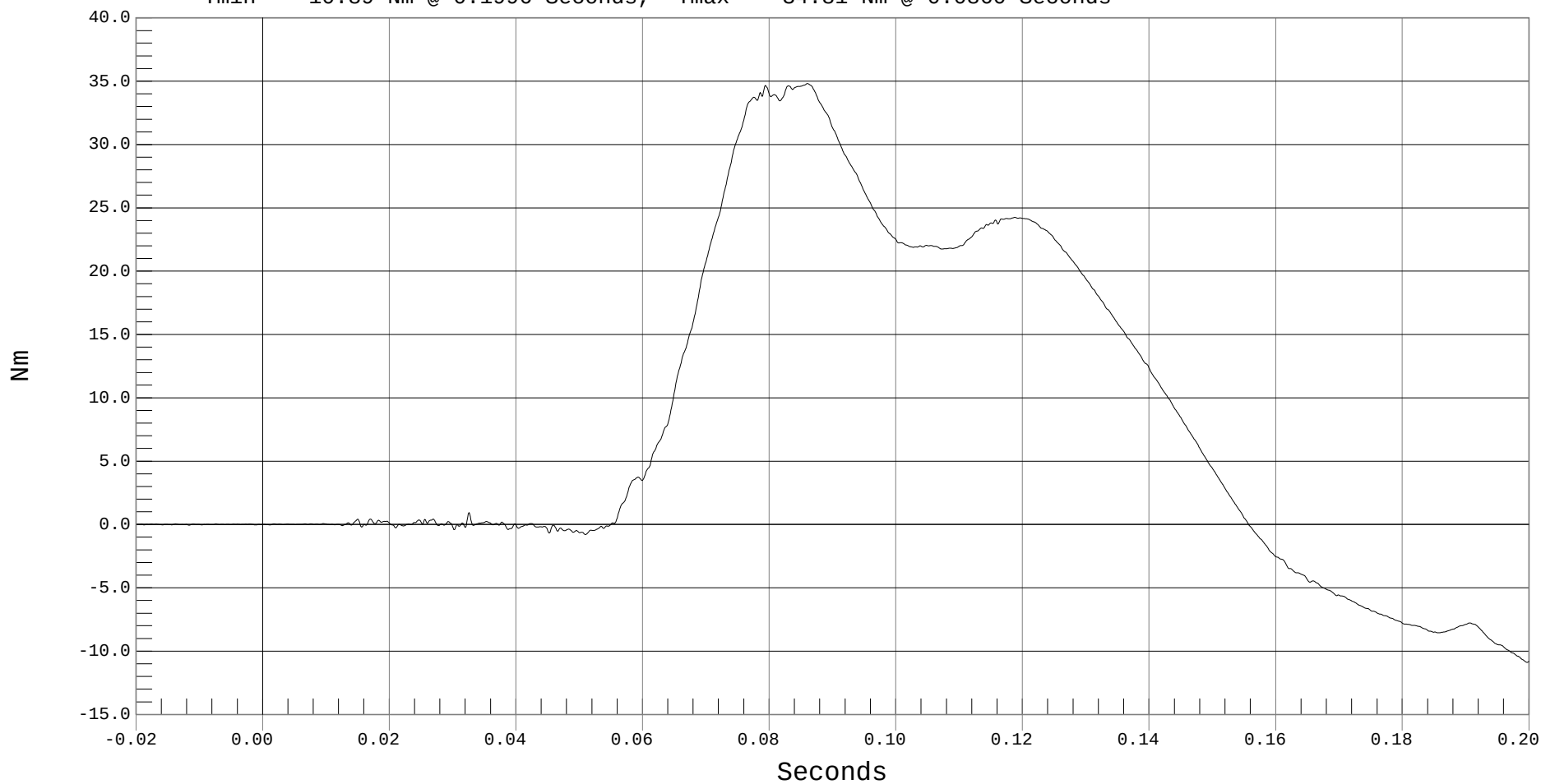
PASSENGER UPPER NECK MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER UPPER NECK MOMENT Z, B01105MF.M69

Ymin = -10.89 Nm @ 0.1996 Seconds, Ymax = 34.81 Nm @ 0.0860 Seconds





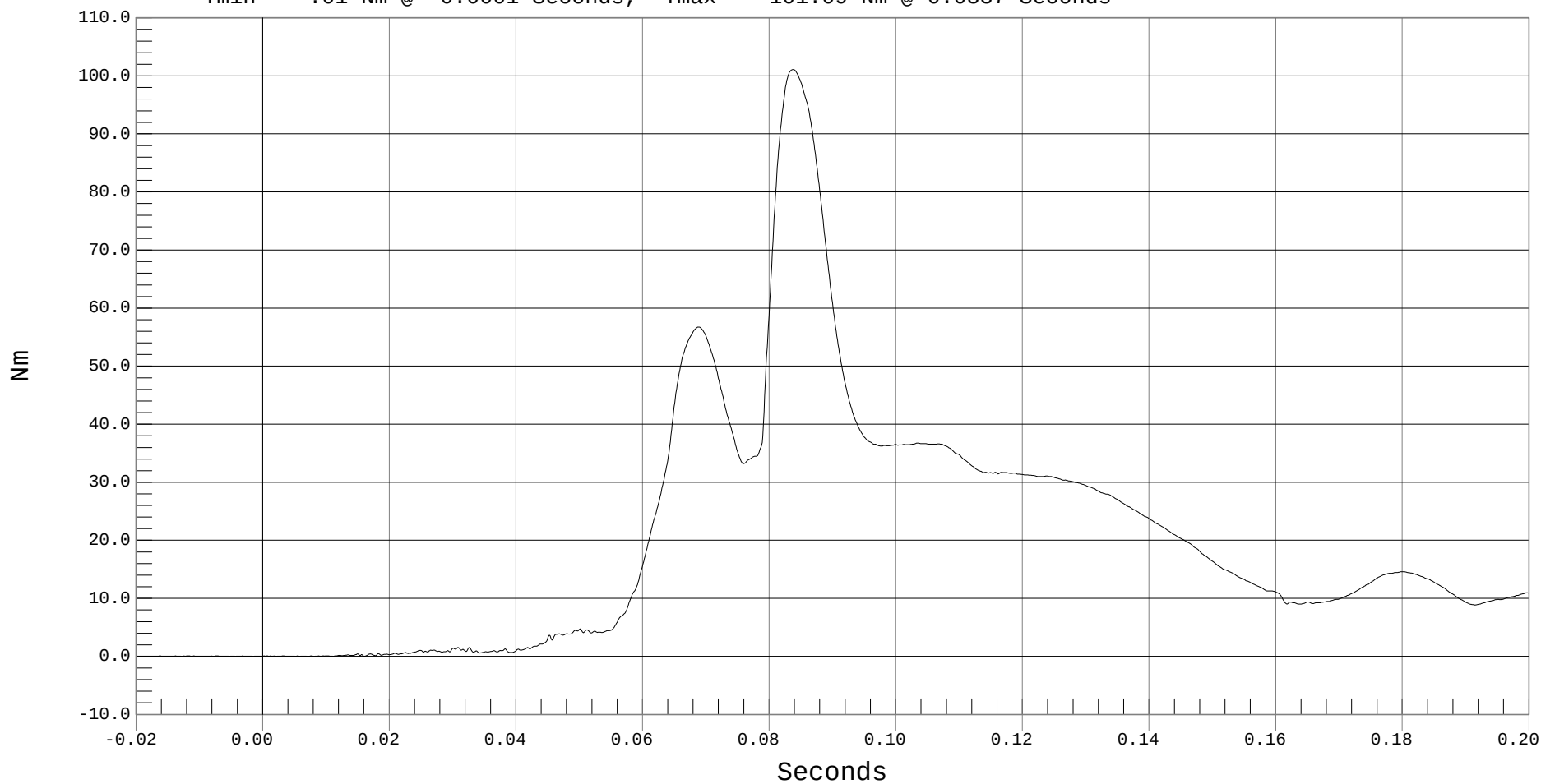
PASSENGER UPPER NECK MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER UPPER NECK MOMENT RESULTANT, B01105MV.M67

Ymin = .01 Nm @ -0.0001 Seconds, Ymax = 101.09 Nm @ 0.0837 Seconds





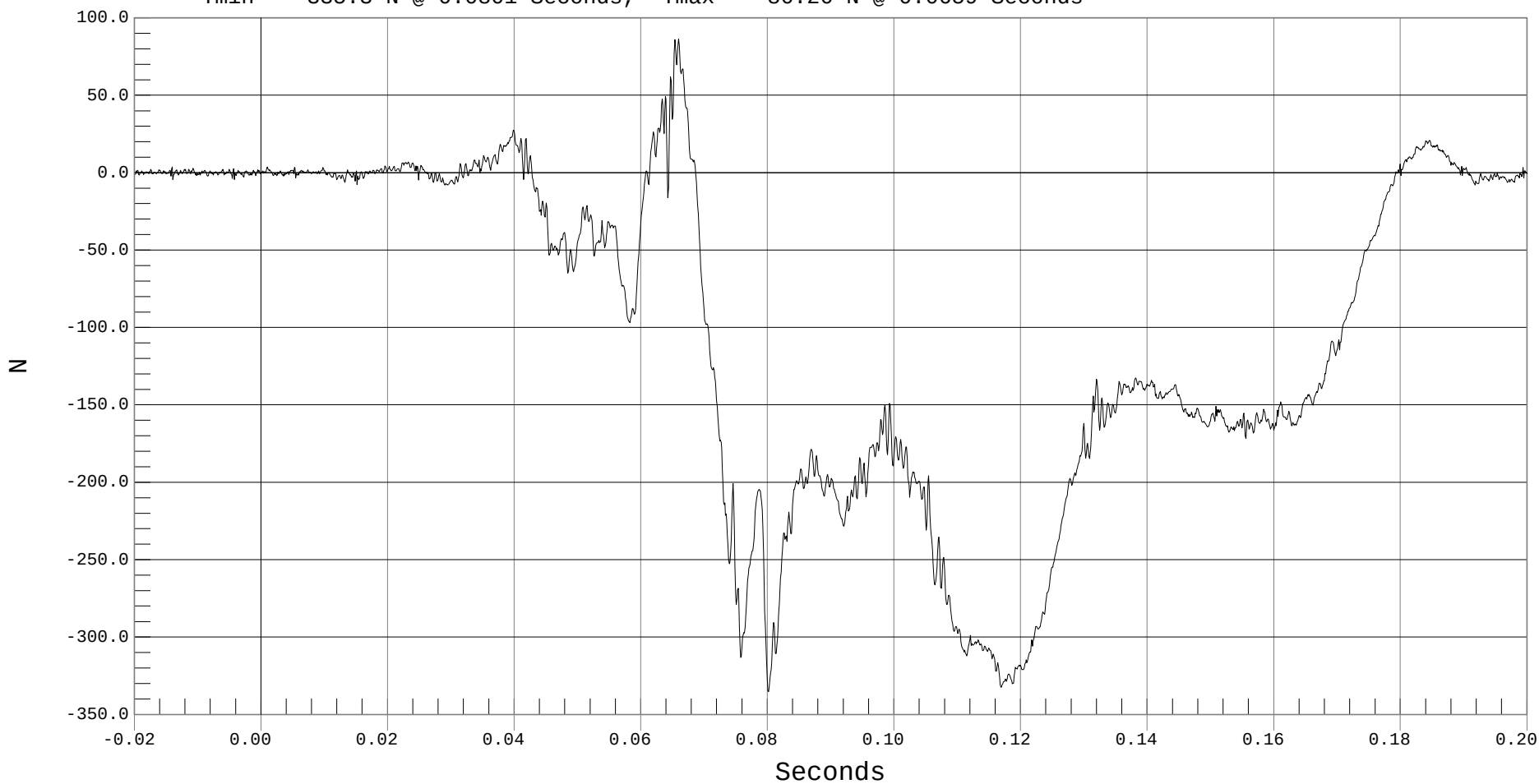
PASSENGER LOWER NECK FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LOWER NECK FORCE X, B01105FT.F79

Ymin = -335.3 N @ 0.0801 Seconds, Ymax = 86.26 N @ 0.0659 Seconds





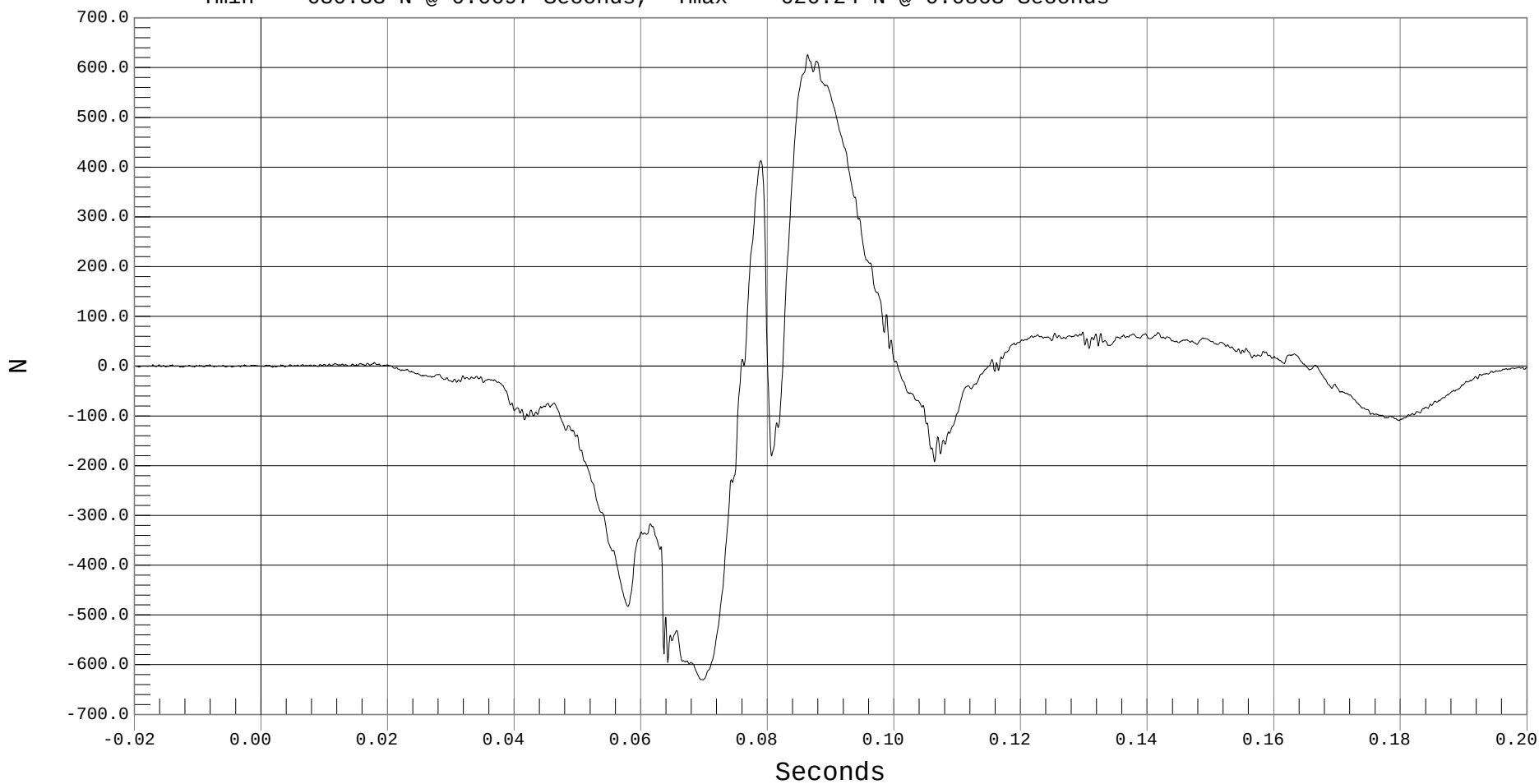
PASSENGER LOWER NECK FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LOWER NECK FORCE Y, B01105FT.F80

Ymin = -630.33 N @ 0.0697 Seconds, Ymax = 626.24 N @ 0.0863 Seconds





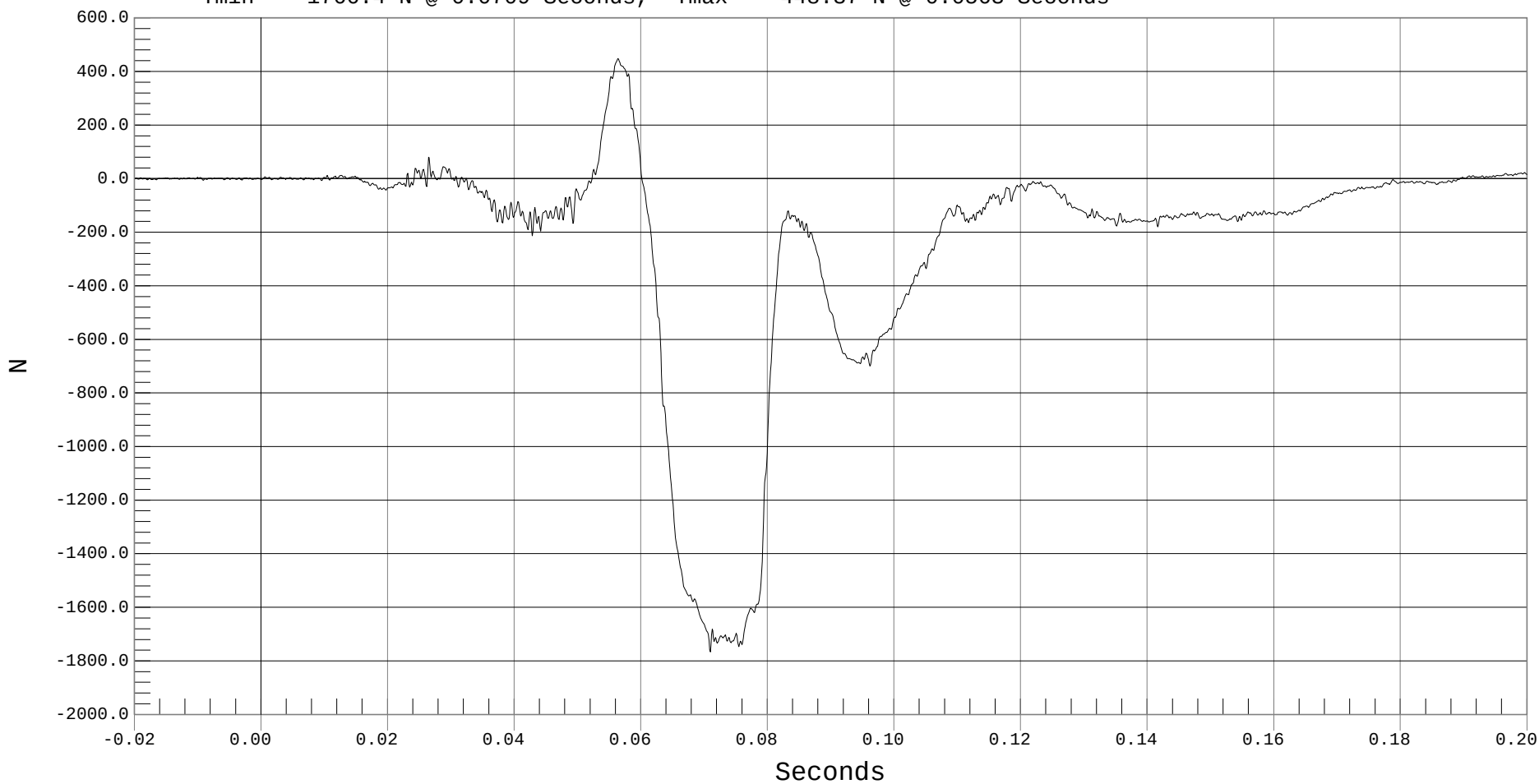
PASSENGER LOWER NECK FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LOWER NECK FORCE Z, B01105FT.F81

Ymin = -1766.4 N @ 0.0709 Seconds, Ymax = 448.37 N @ 0.0563 Seconds





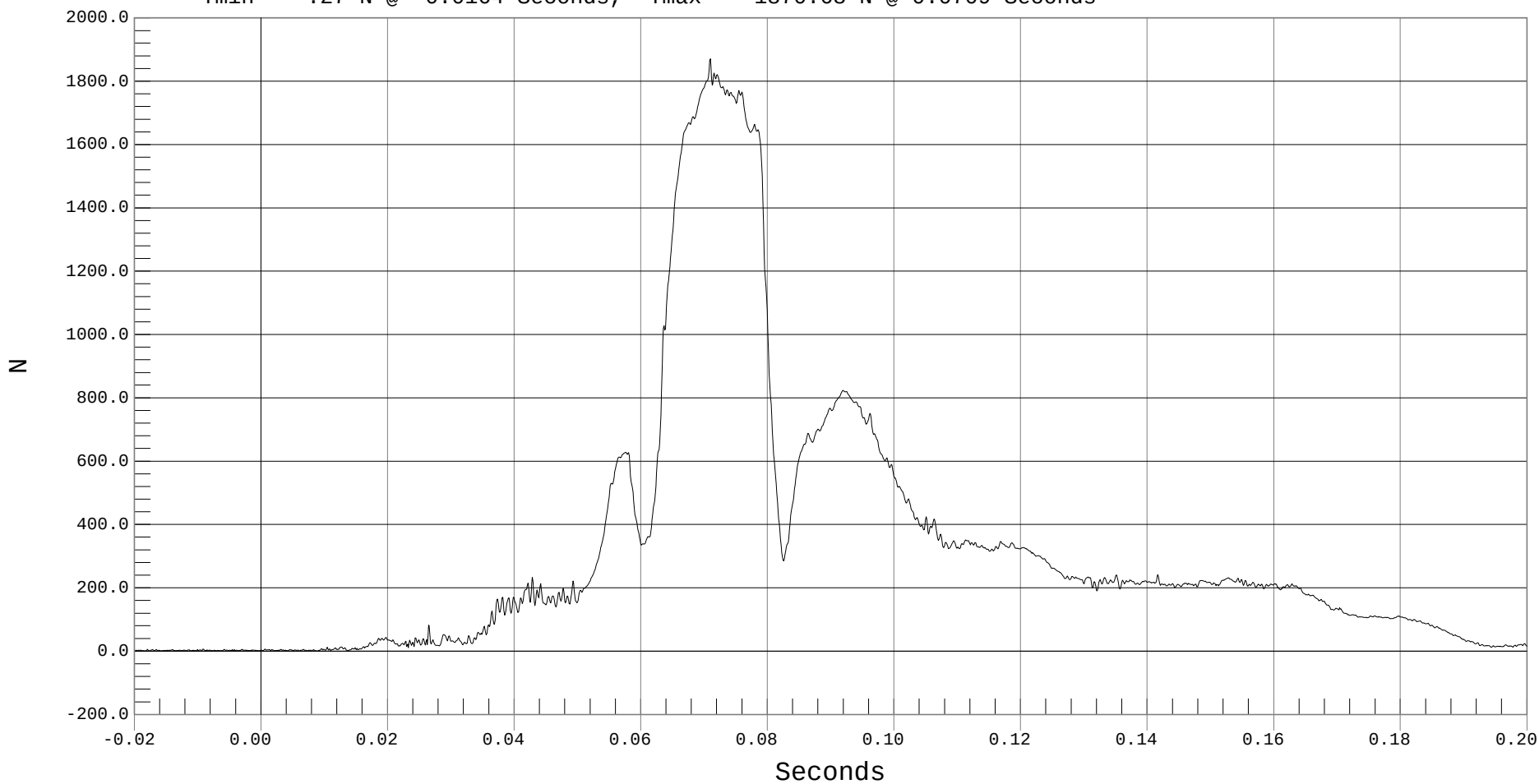
PASSENGER LOWER NECK FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 PASSENGER LOWER NECK FORCE RESULTANT, B01105FV.F79

Ymin = .27 N @ -0.0164 Seconds, Ymax = 1870.68 N @ 0.0709 Seconds





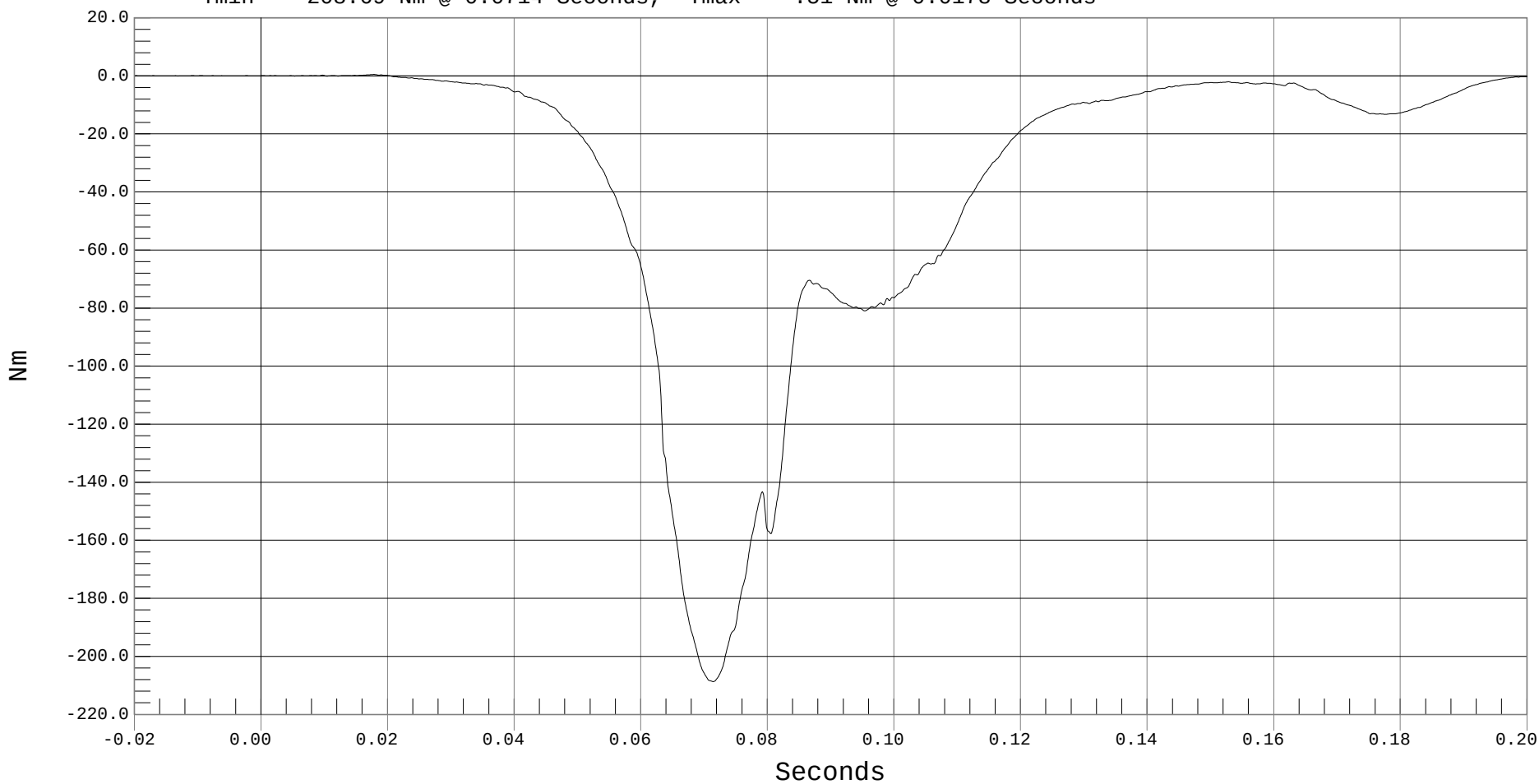
PASSENGER LOWER NECK MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER LOWER NECK MOMENT X, B01105MF.M82

Ymin = -208.69 Nm @ 0.0714 Seconds, Ymax = .51 Nm @ 0.0178 Seconds





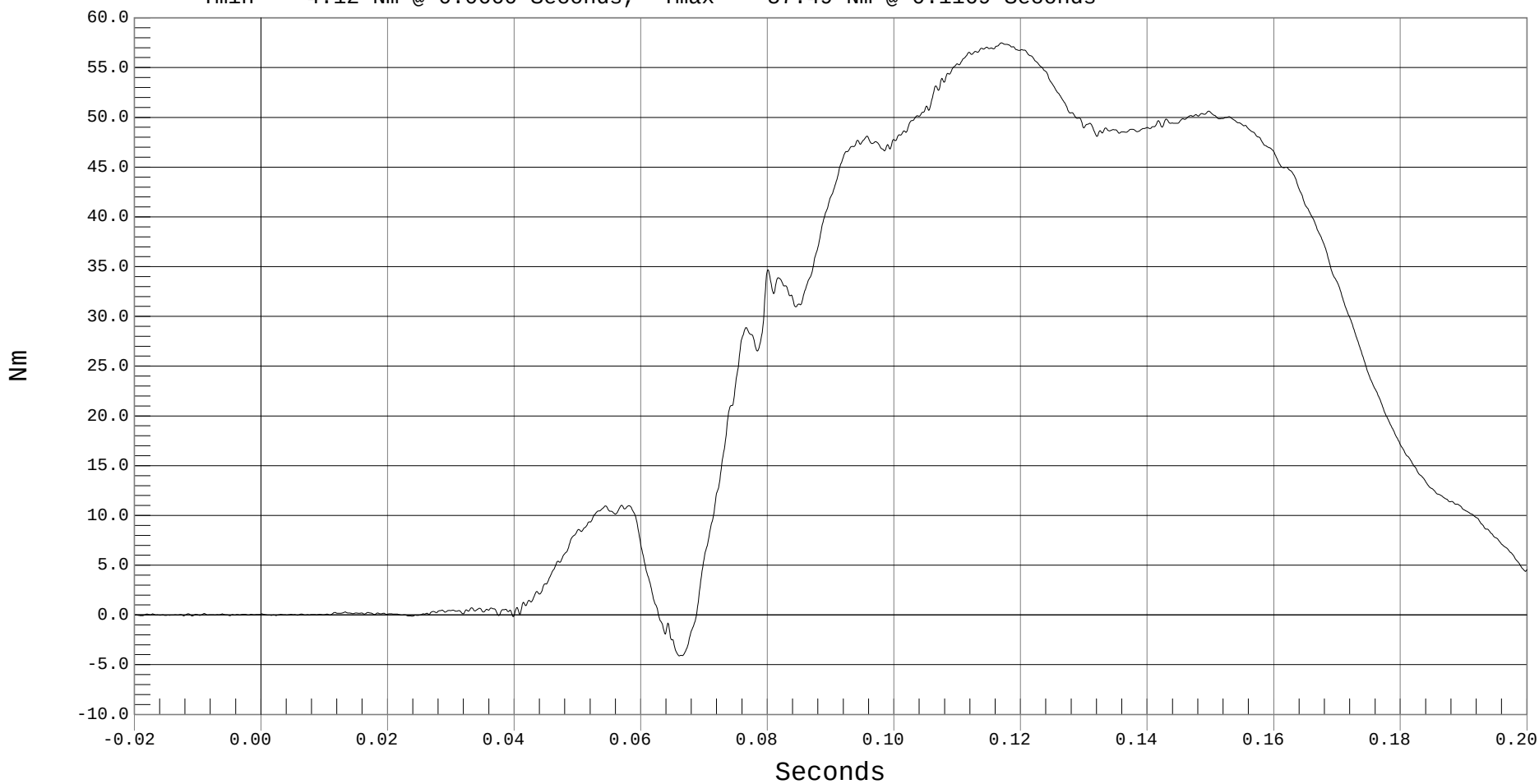
PASSENGER LOWER NECK MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER LOWER NECK MOMENT Y, B01105MF.M83

Ymin = -4.12 Nm @ 0.0660 Seconds, Ymax = 57.49 Nm @ 0.1169 Seconds





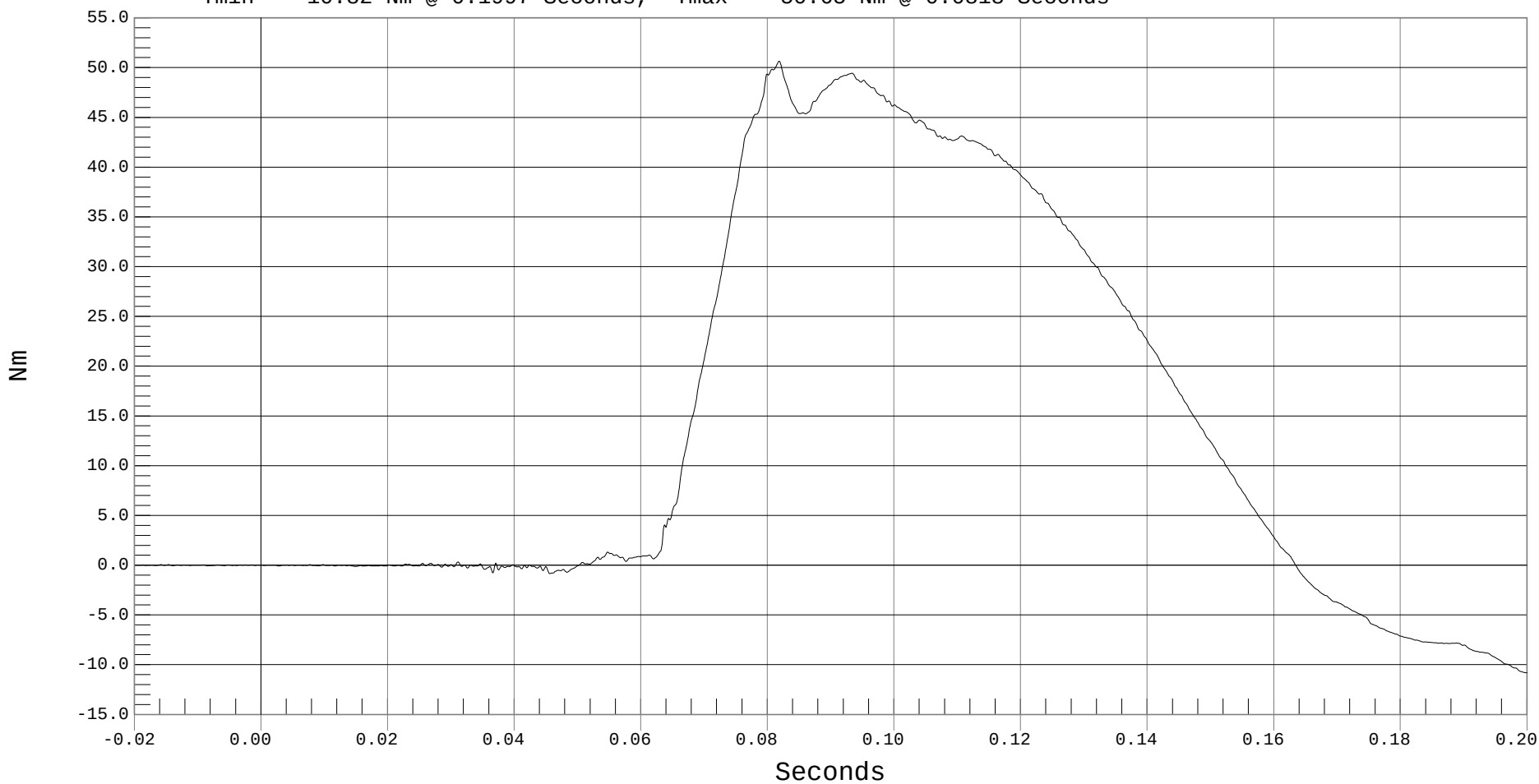
PASSENGER LOWER NECK MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER LOWER NECK MOMENT Z, B01105MF.M84

Ymin = -10.82 Nm @ 0.1997 Seconds, Ymax = 50.65 Nm @ 0.0818 Seconds





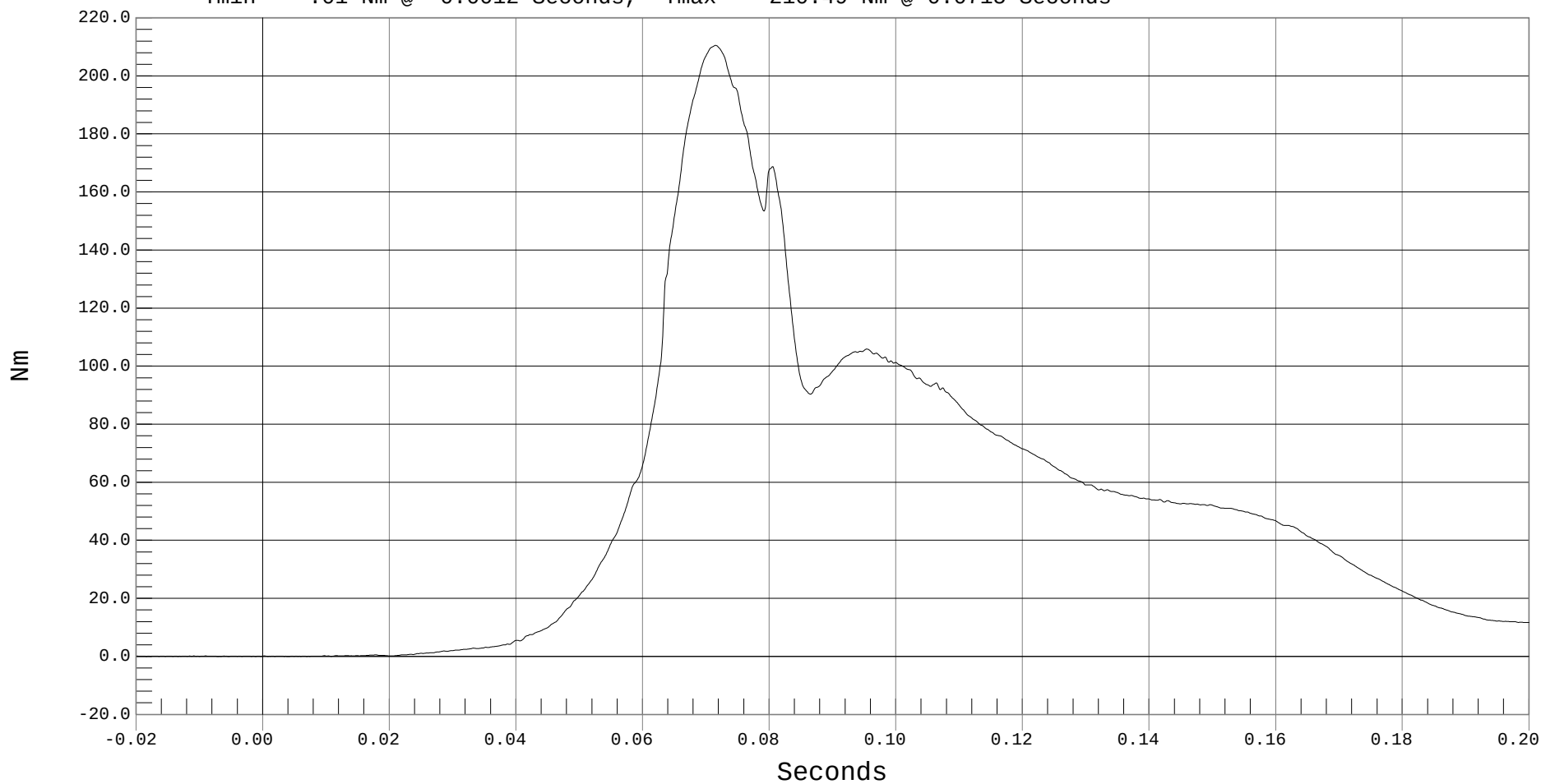
PASSENGER LOWER NECK MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER LOWER NECK MOMENT RESULTANT, B01105MV.M82

Ymin = .01 Nm @ -0.0012 Seconds, Ymax = 210.49 Nm @ 0.0715 Seconds





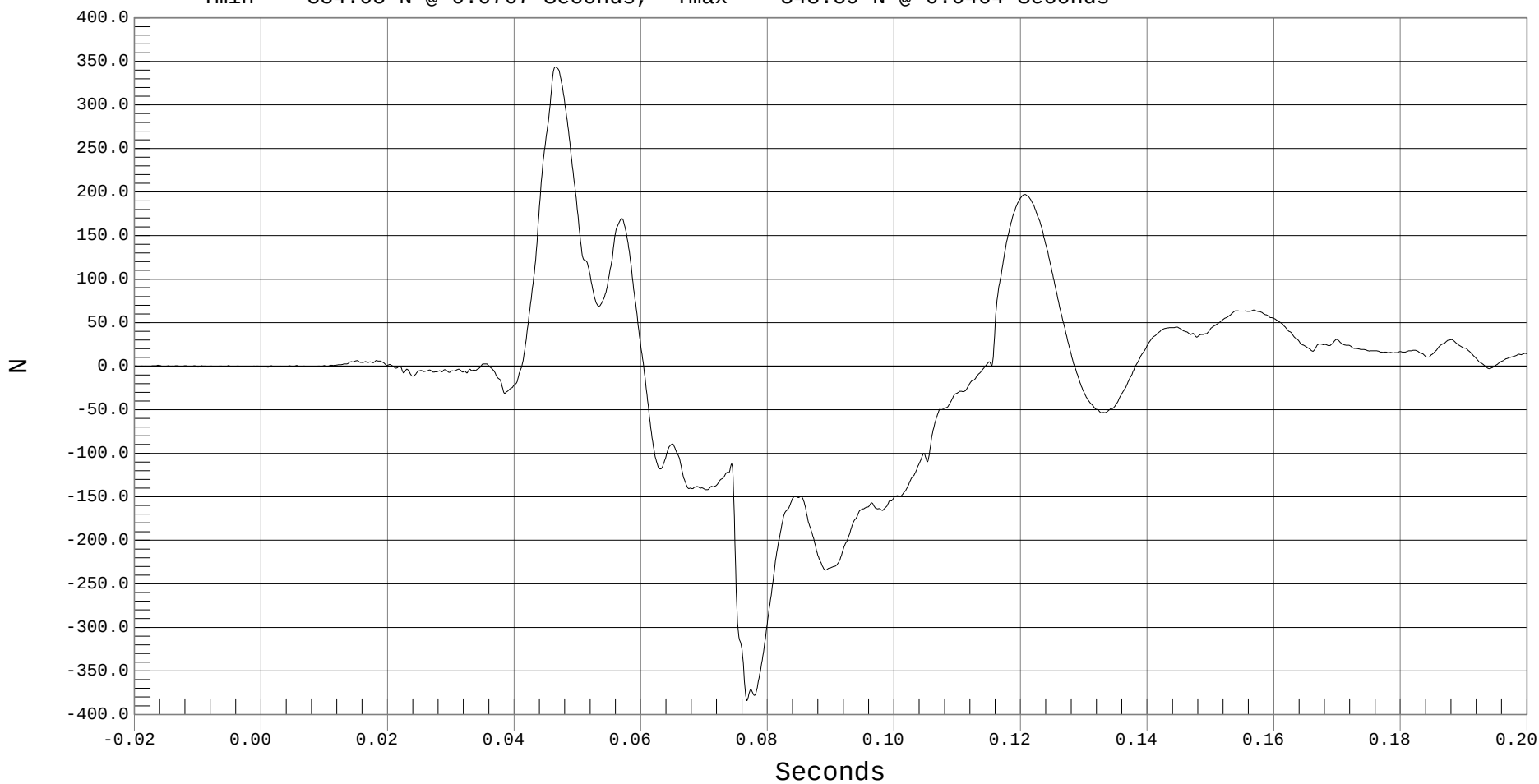
PASSENGER SHOULDER FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER SHOULDER FORCE X, B01105FF.F76

Ymin = -384.05 N @ 0.0767 Seconds, Ymax = 343.59 N @ 0.0464 Seconds



B-110



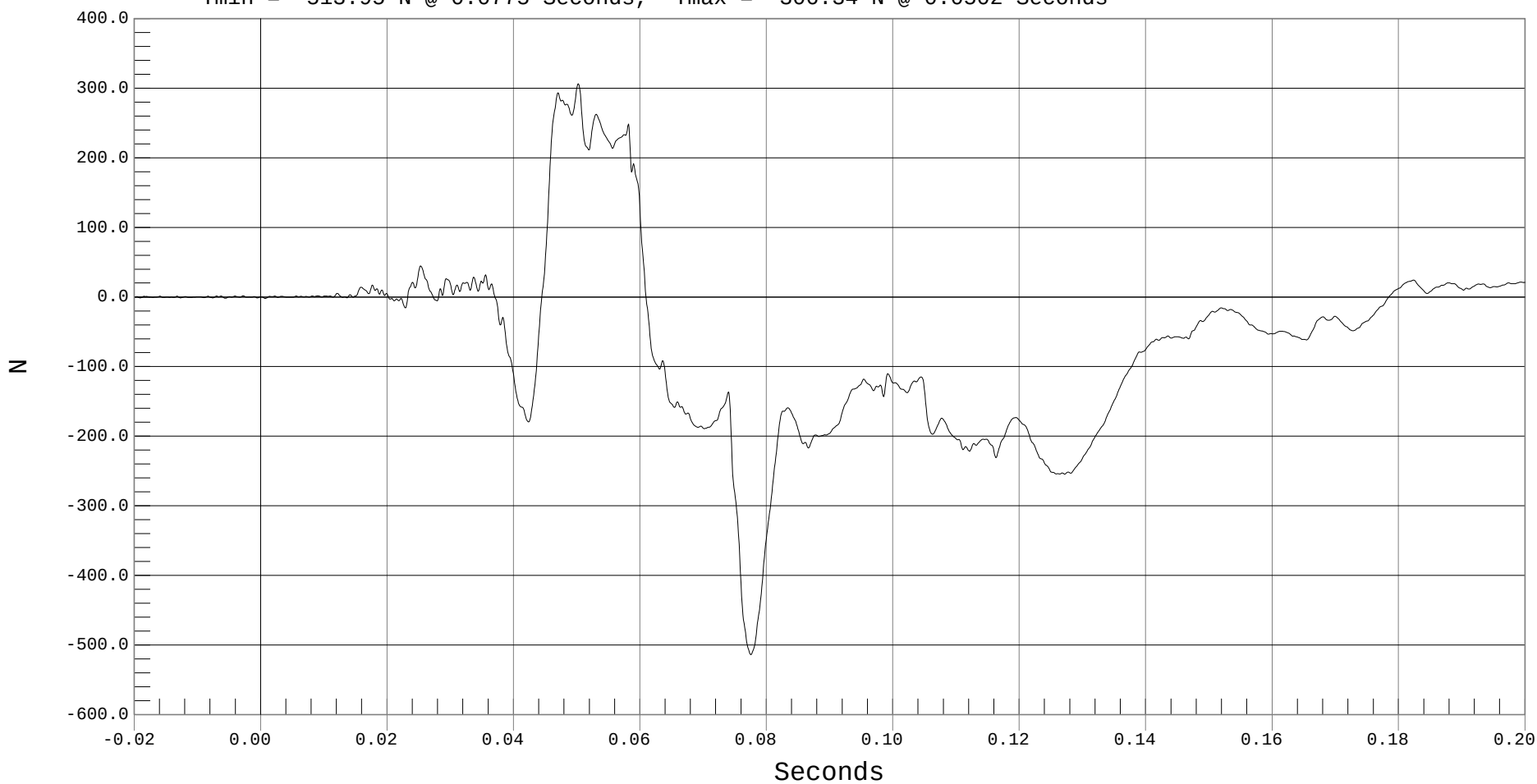
PASSENGER SHOULDER FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER SHOULDER FORCE Y, B01105FF.F77

Ymin = -513.95 N @ 0.0775 Seconds, Ymax = 306.34 N @ 0.0502 Seconds





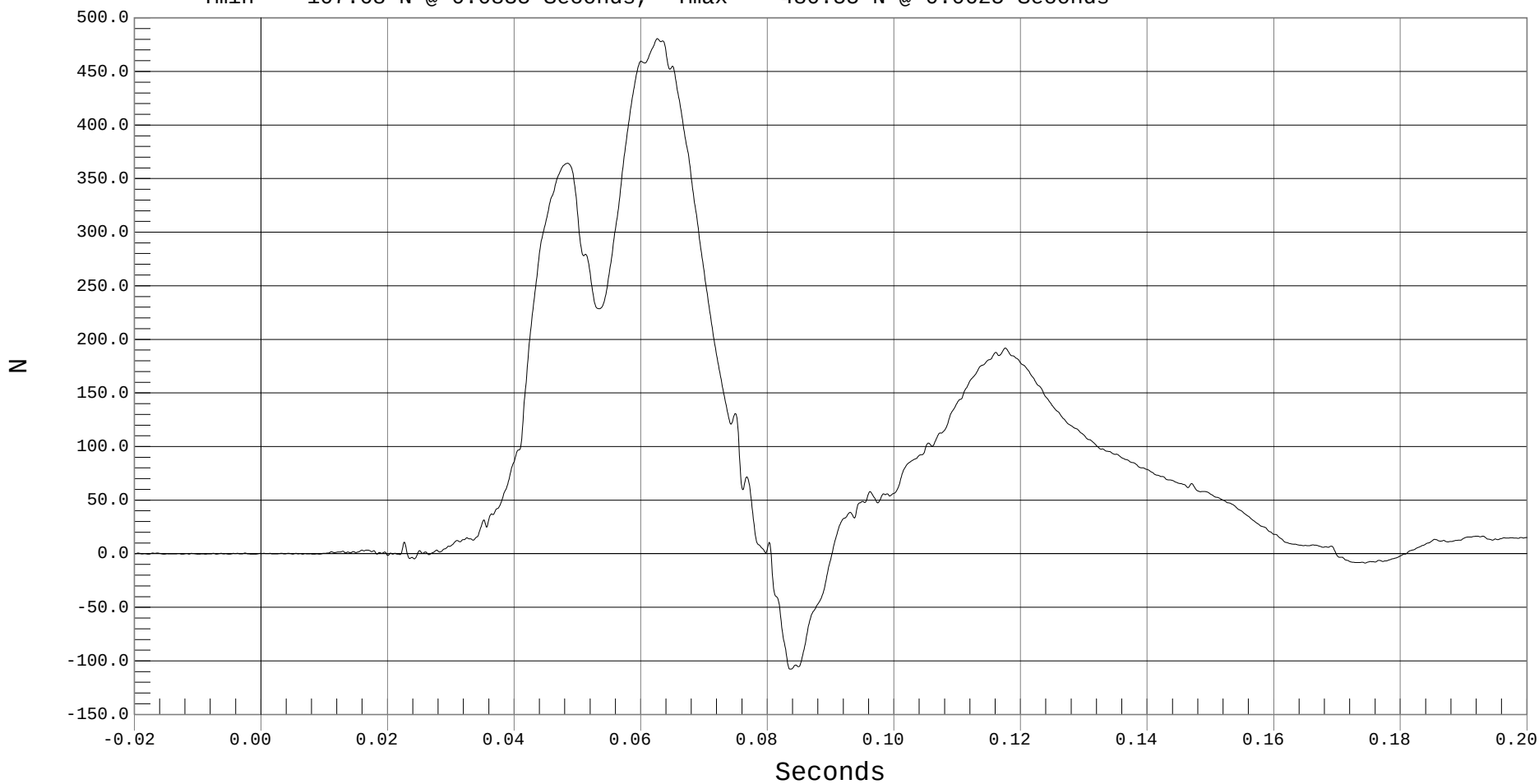
PASSENGER SHOULDER FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER SHOULDER FORCE Z, B01105FF.F78

Ymin = -107.68 N @ 0.0835 Seconds, Ymax = 480.55 N @ 0.0625 Seconds





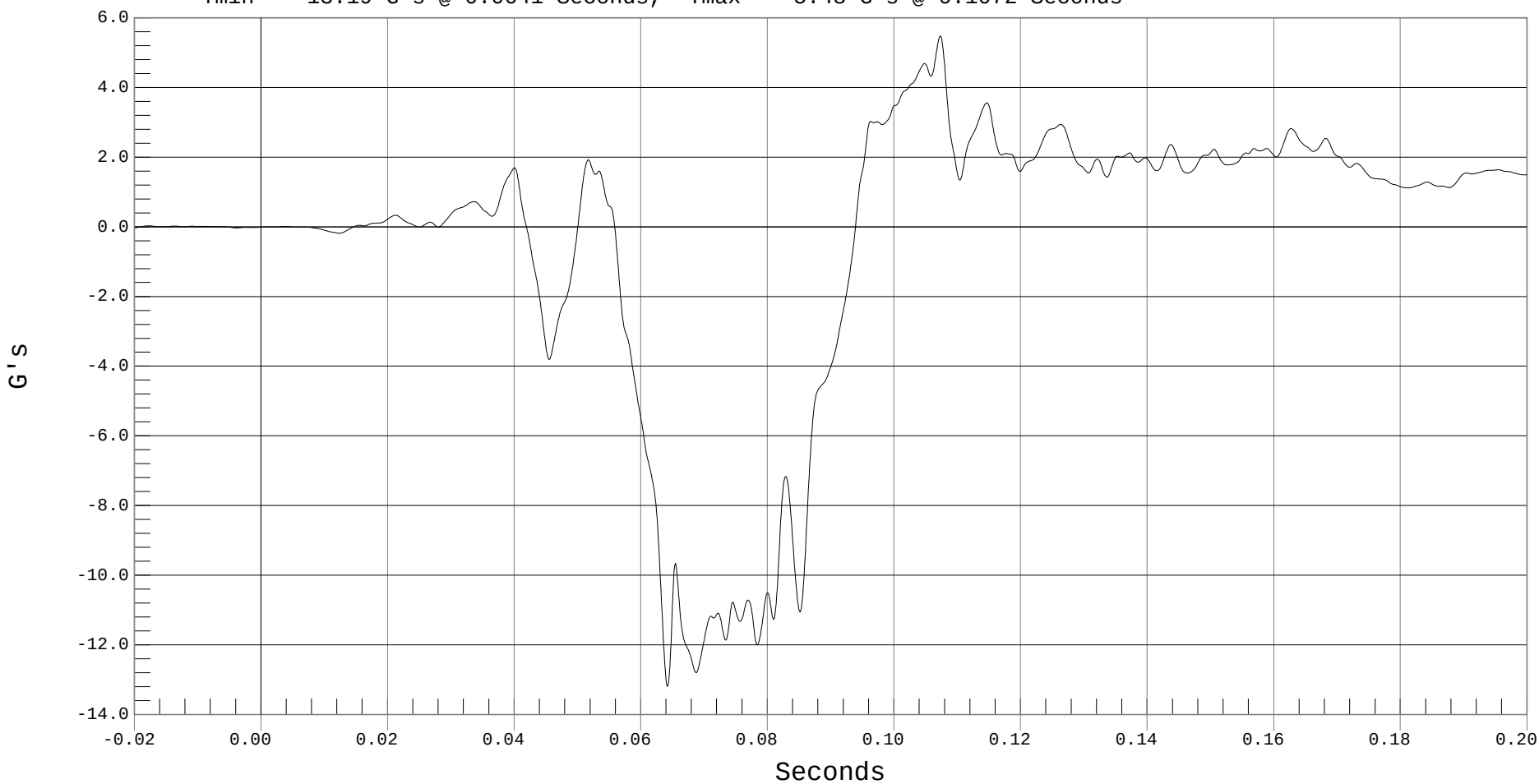
PASSENGER UPPER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER UPPER SPINE X, B01105AF.A80

Ymin = -13.19 G's @ 0.0641 Seconds, Ymax = 5.48 G's @ 0.1072 Seconds





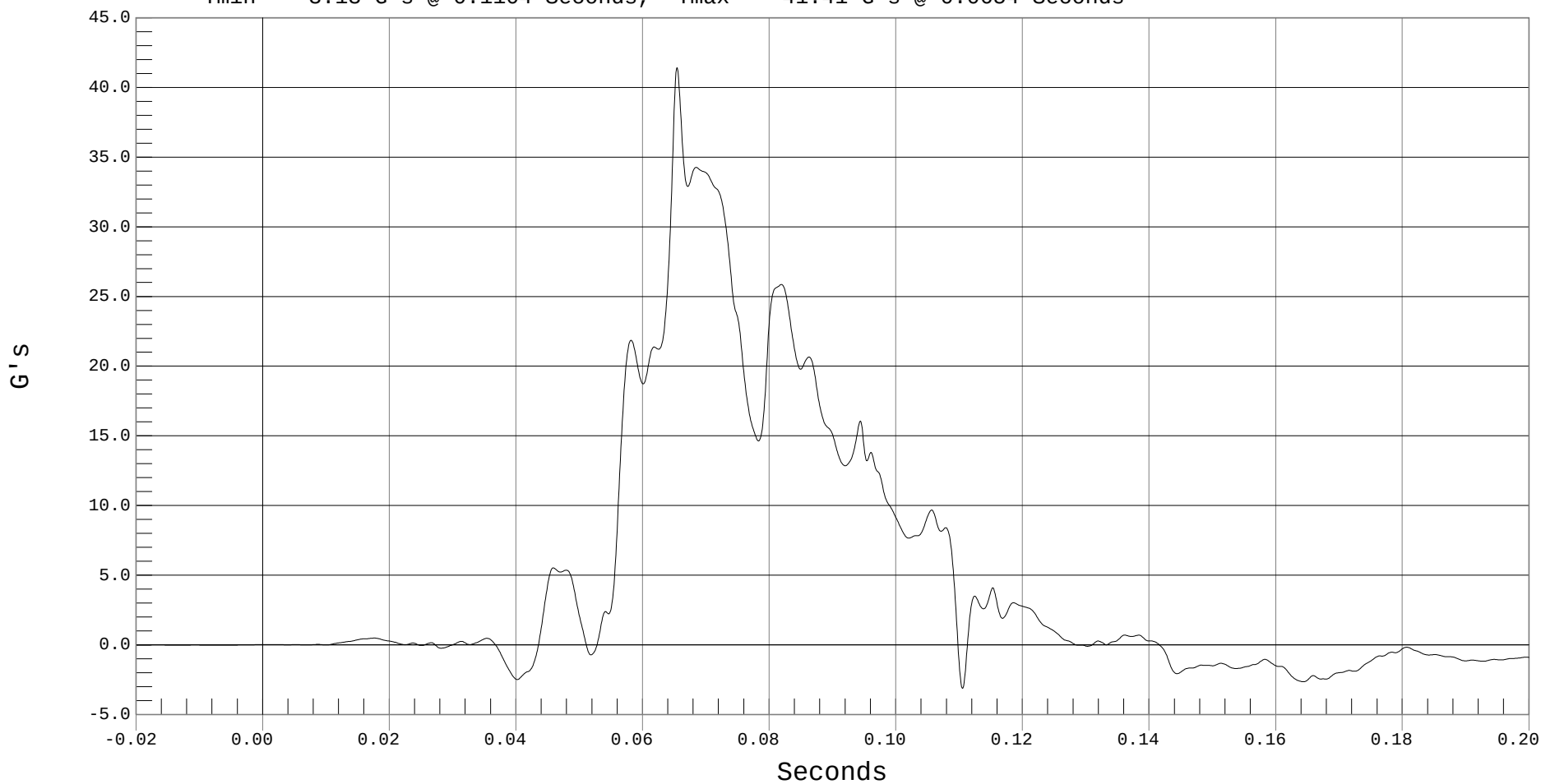
PASSENGER UPPER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER UPPER SPINE Y, B01105AF.A81

Ymin = -3.13 G's @ 0.1104 Seconds, Ymax = 41.41 G's @ 0.0654 Seconds





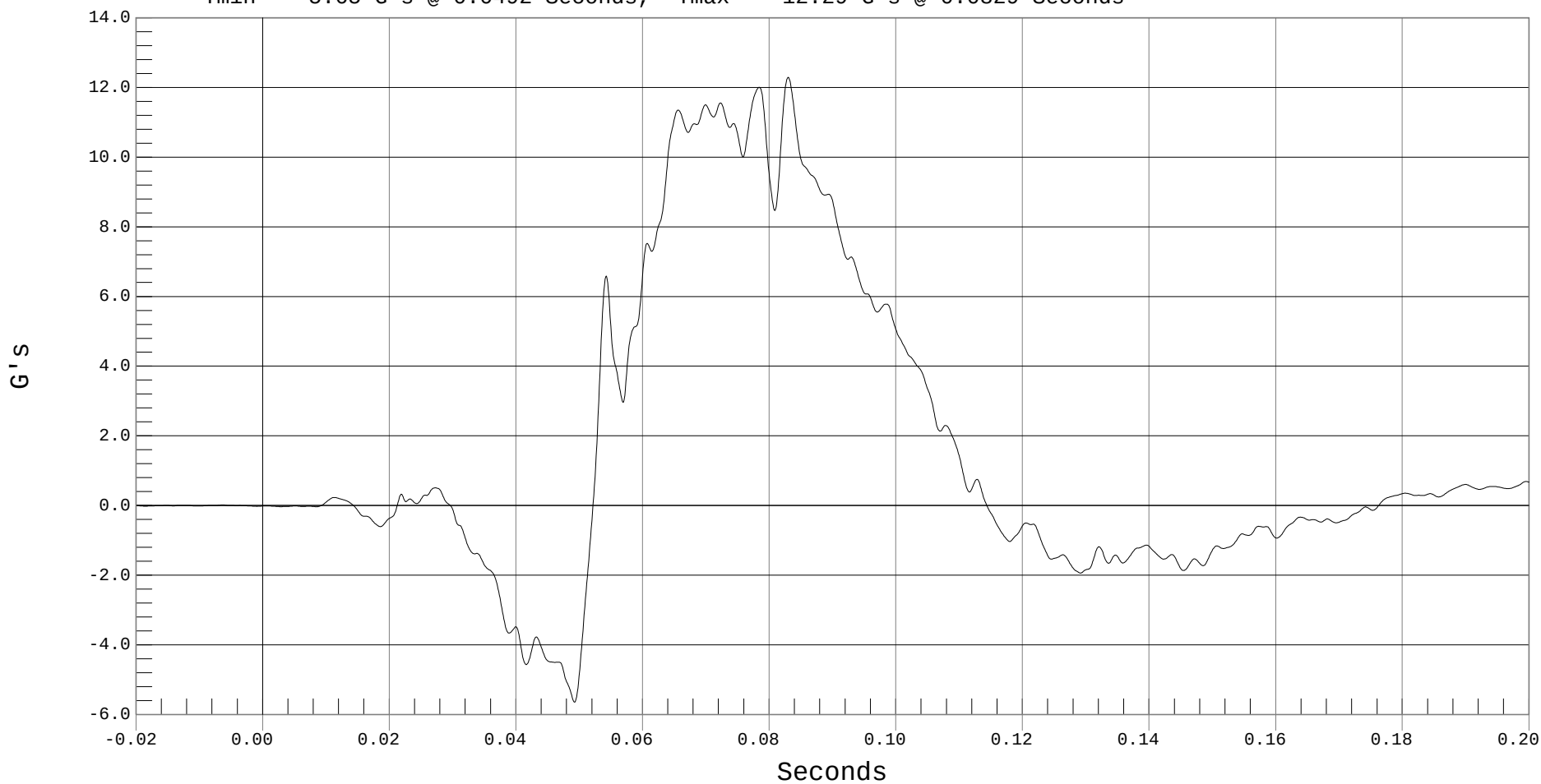
PASSENGER UPPER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER UPPER SPINE Z, B01105AF.A82

Ymin = -5.65 G's @ 0.0492 Seconds, Ymax = 12.29 G's @ 0.0829 Seconds





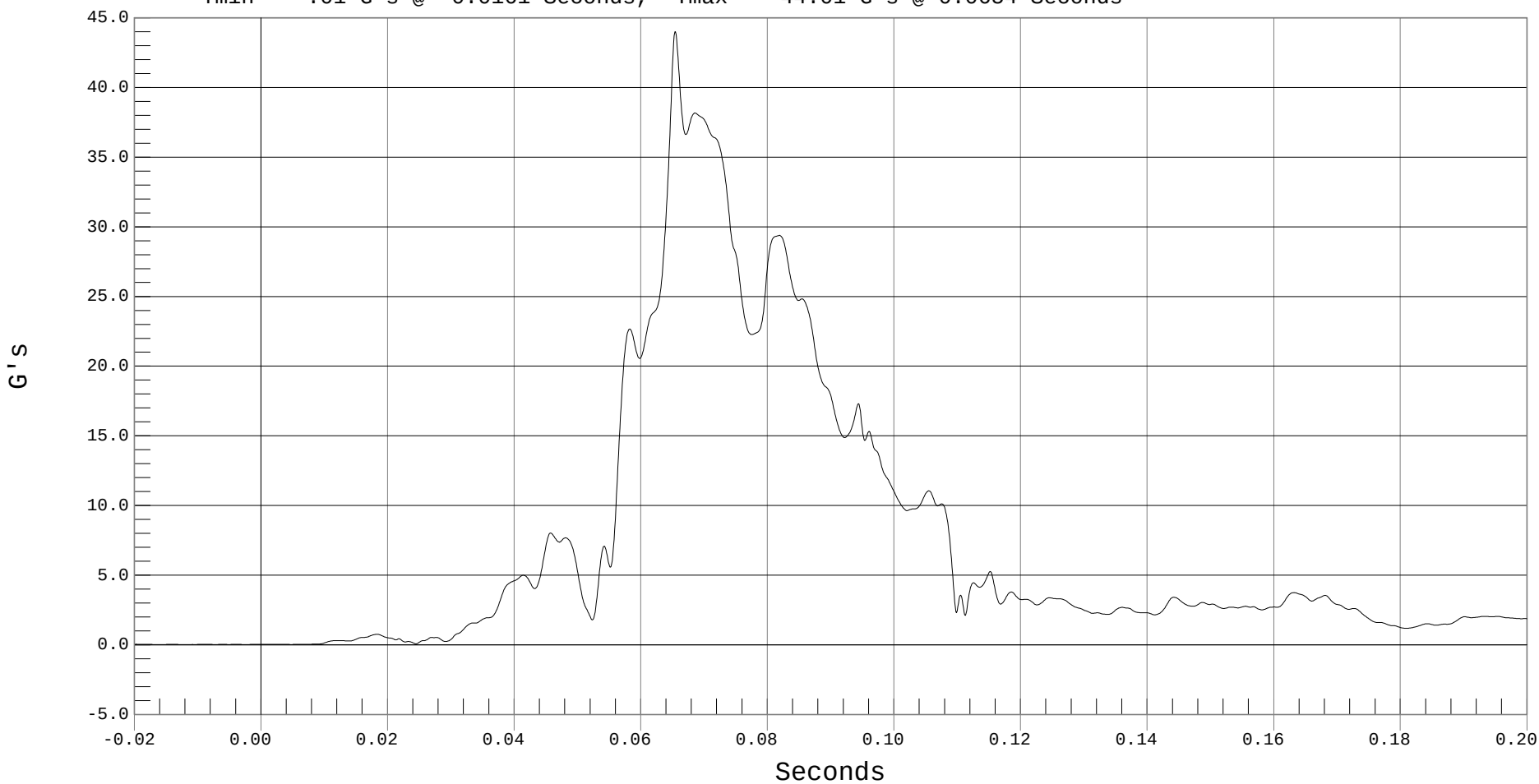
PASSENGER UPPER SPINE RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 PASSENGER UPPER SPINE RESULTANT, B01105AV.A80

Ymin = .01 G's @ -0.0161 Seconds, Ymax = 44.01 G's @ 0.0654 Seconds





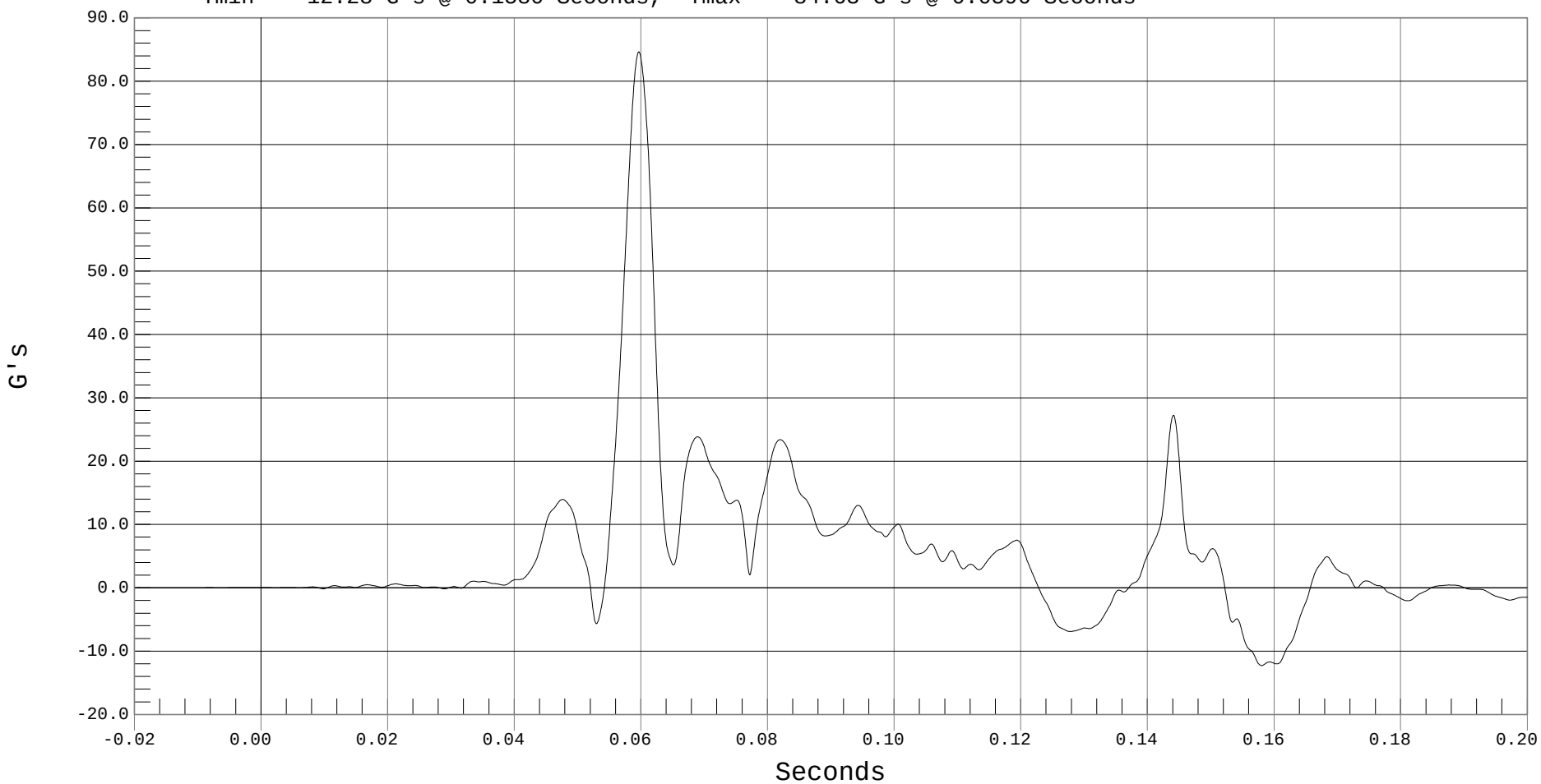
PASSENGER UPPER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER UPPER RIB Y, B01105AF.A83

Ymin = -12.28 G's @ 0.1580 Seconds, Ymax = 84.63 G's @ 0.0596 Seconds





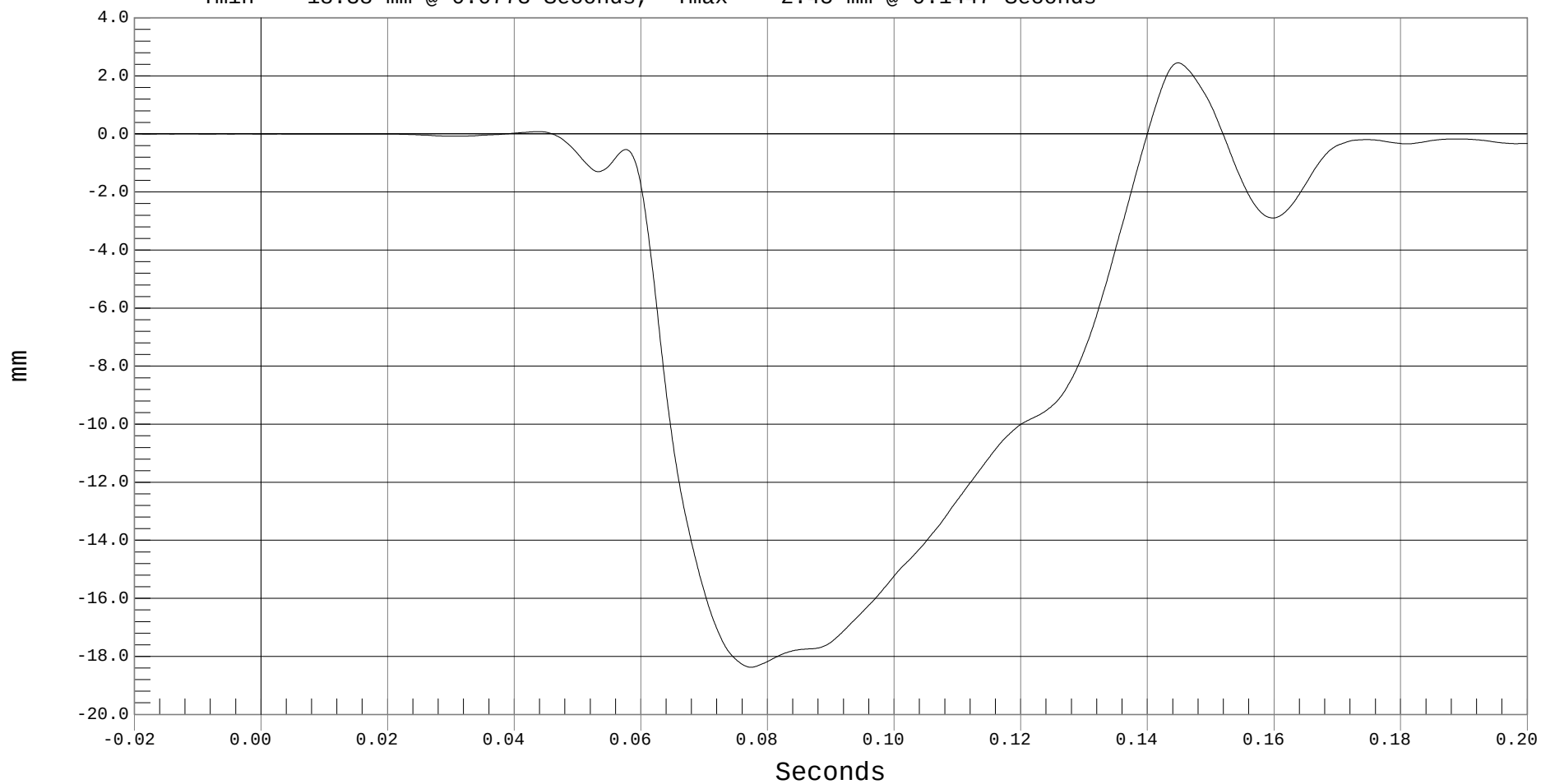
PASSENGER UPPER RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER UPPER RIB DISPLACEMENT, B01105DF.D86

Ymin = -18.38 mm @ 0.0773 Seconds, Ymax = 2.45 mm @ 0.1447 Seconds





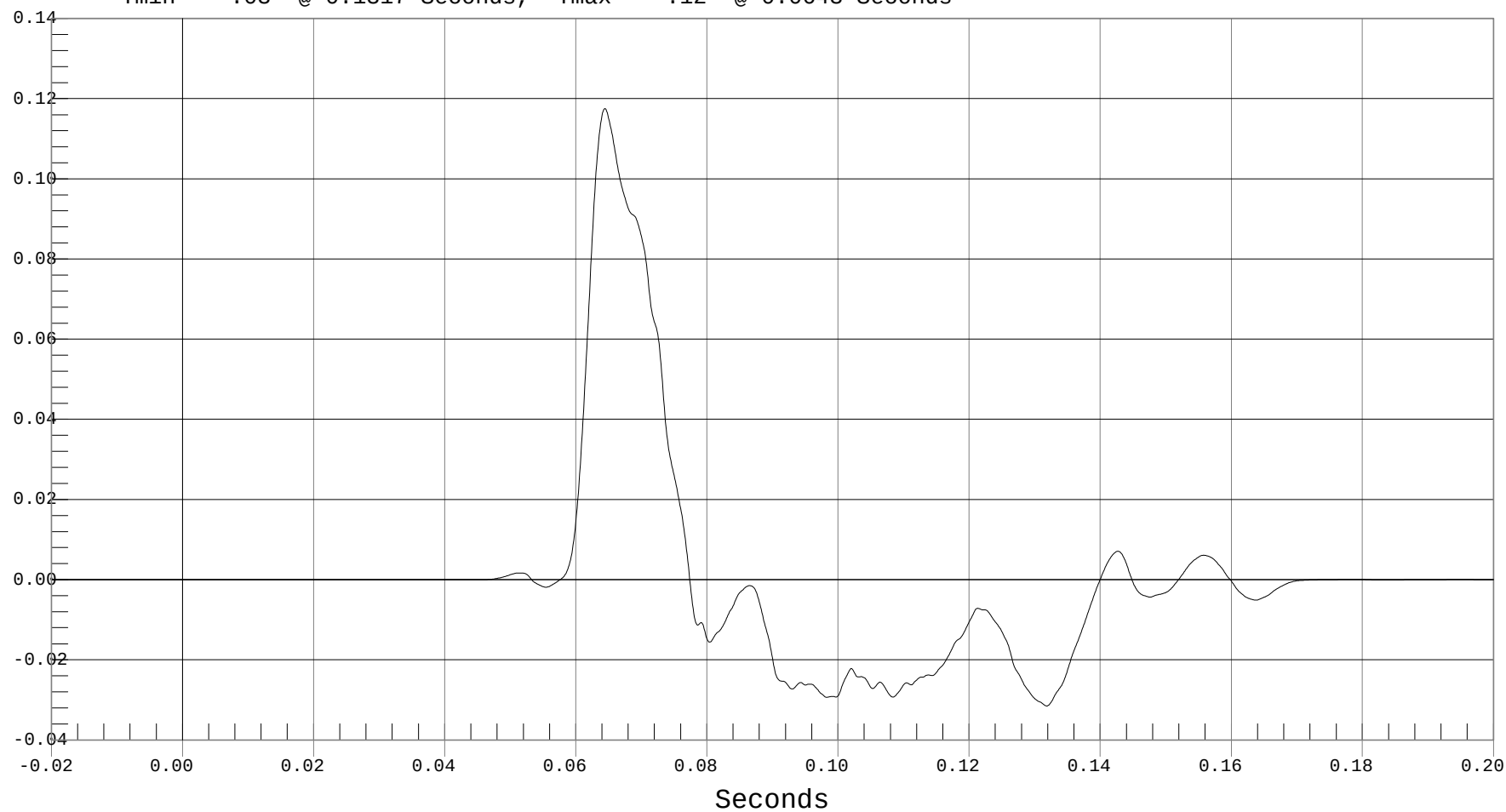
PASSENGER UPPER RIB VISCOUS CRITERIA

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 Viscous Criterion, B01105DV.C86

Ymin = -.03 @ 0.1317 Seconds, Ymax = .12 @ 0.0643 Seconds





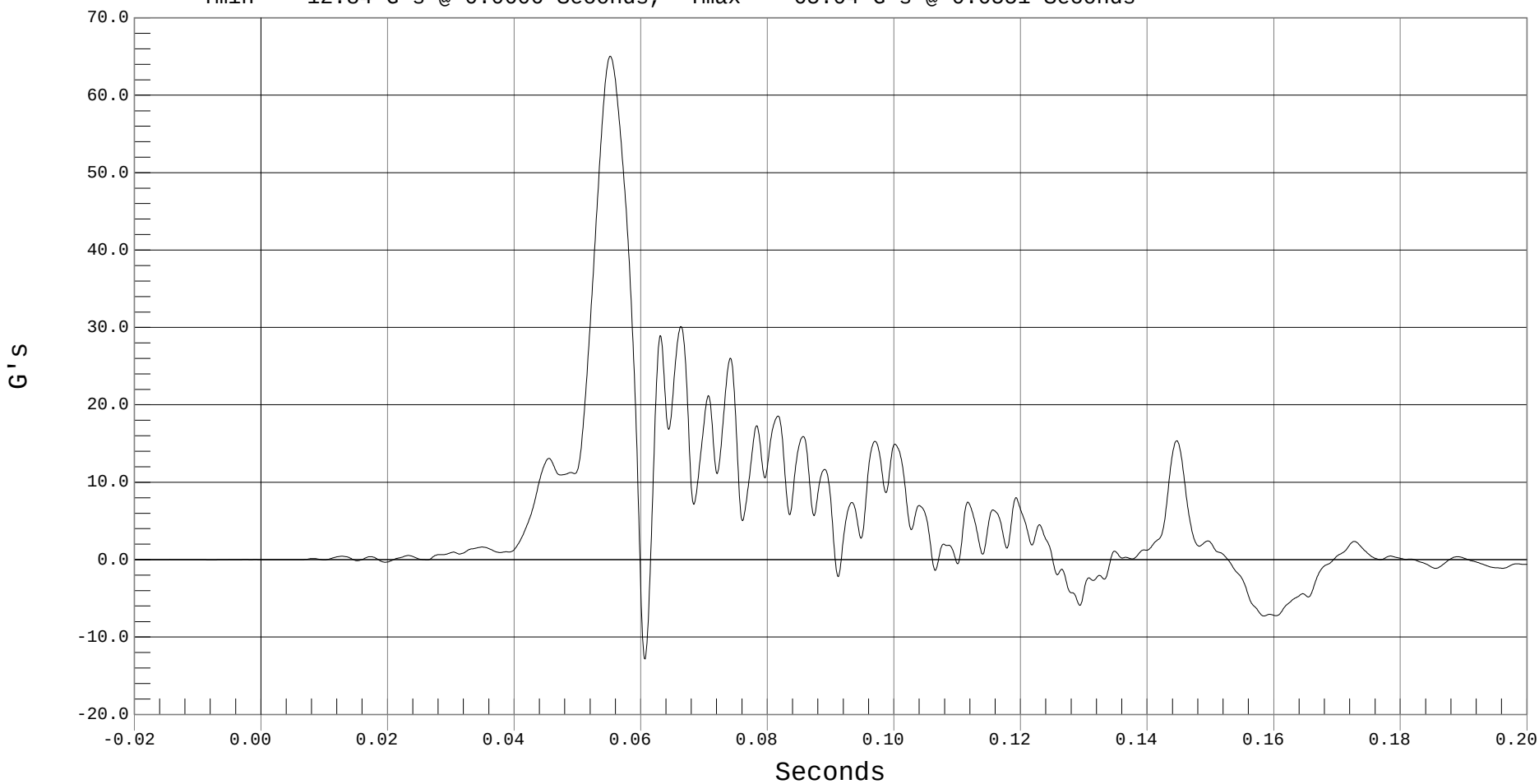
PASSENGER MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER MID RIB Y, B01105AF.A84

Ymin = -12.84 G's @ 0.0606 Seconds, Ymax = 65.04 G's @ 0.0551 Seconds





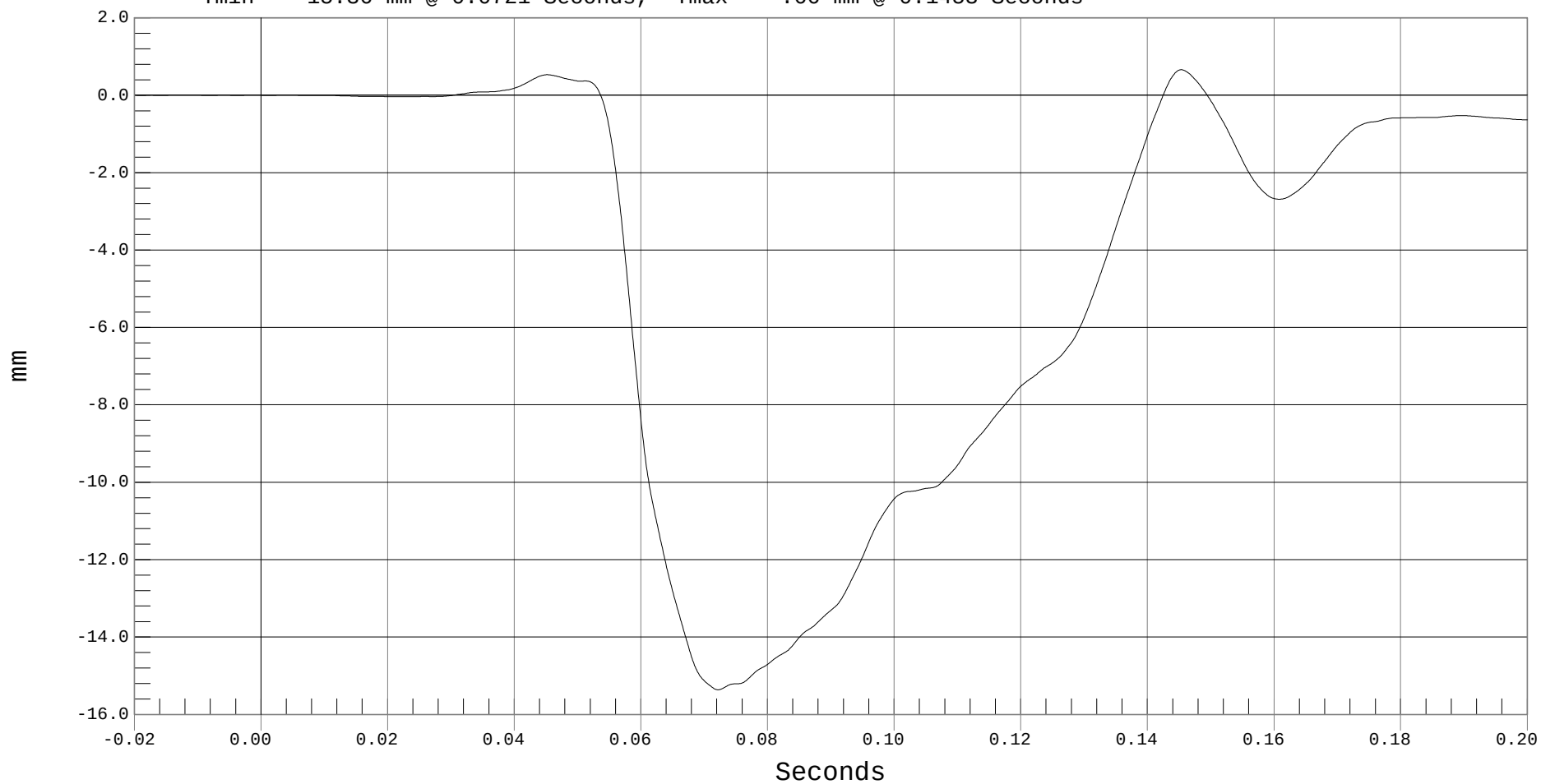
PASSENGER MID RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER MID RIB DISPLACEMENT, B01105DF.D87

Ymin = -15.36 mm @ 0.0721 Seconds, Ymax = .66 mm @ 0.1453 Seconds





PASSENGER MID RIB VISCOUS CRITERIA

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

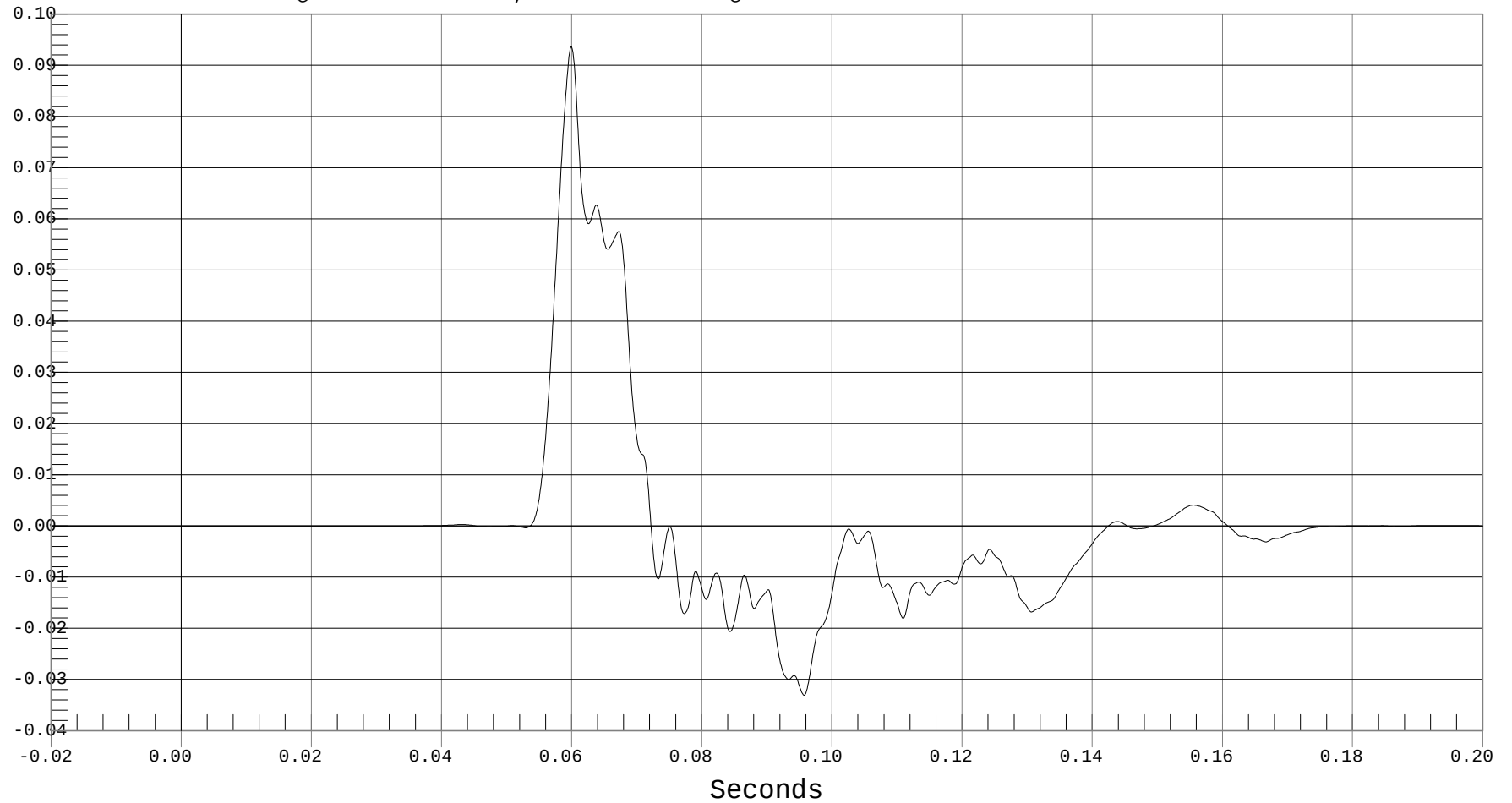
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 180

— 1 Viscous Criterion, B01105DV.C87

Ymin = -.03 @ 0.0956 Seconds, Ymax = .09 @ 0.0598 Seconds





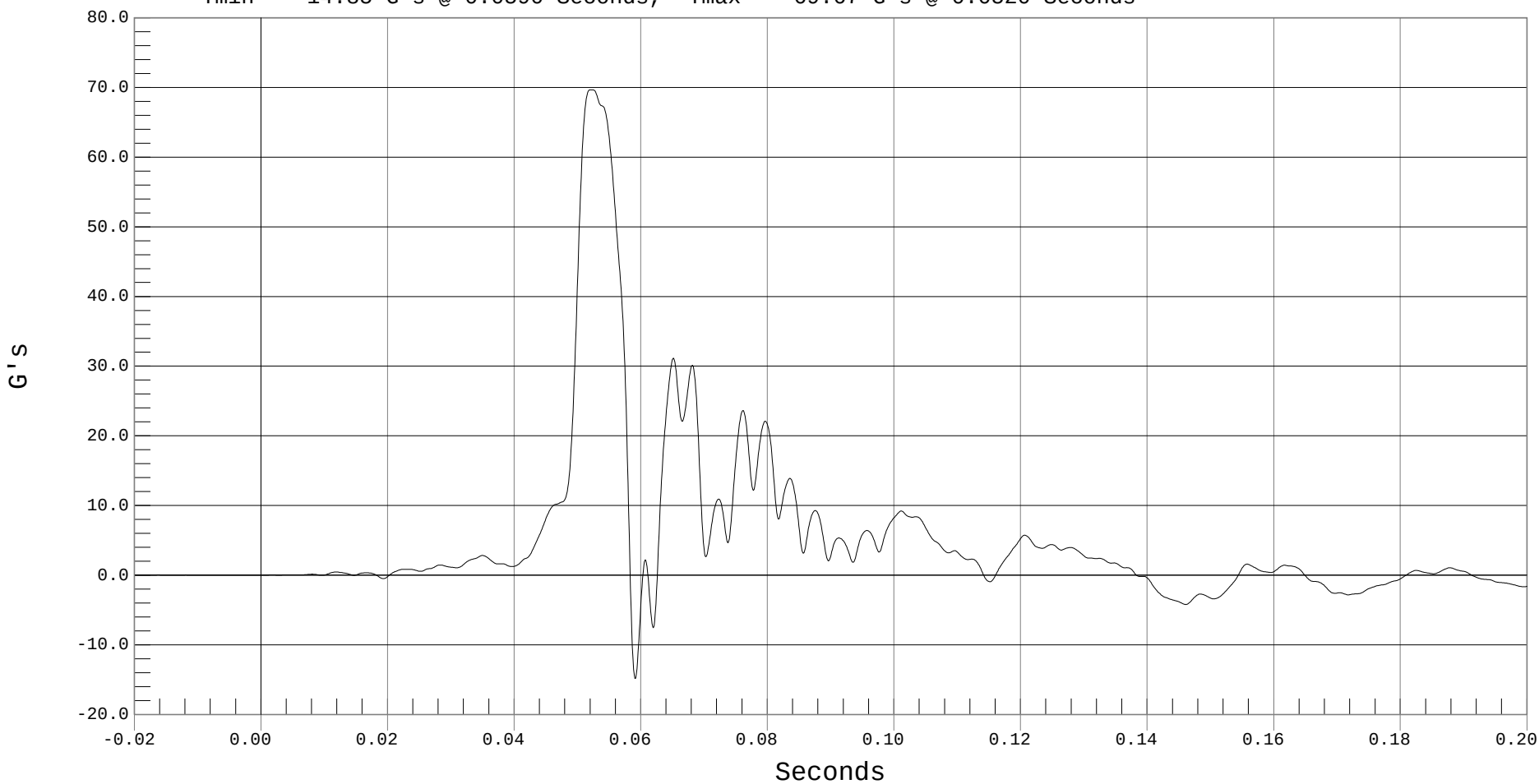
PASSENGER LOWER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER LOWER RIB Y, B01105AF.A85

Ymin = -14.85 G's @ 0.0590 Seconds, Ymax = 69.67 G's @ 0.0520 Seconds





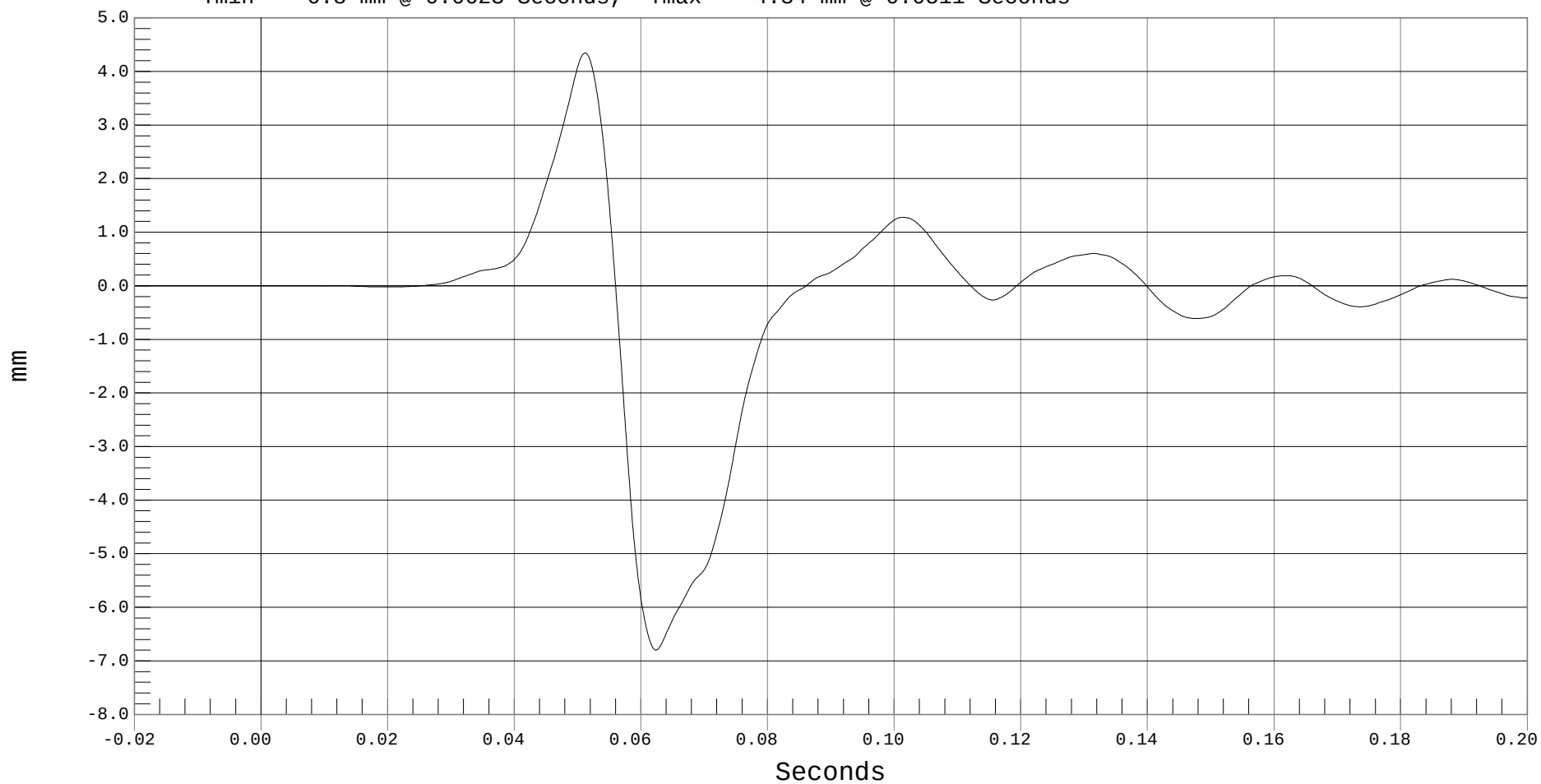
PASSENGER LOWER RIB DISPLACEMENT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER LOWER RIB DISPLACEMENT, B01105DF.D88

Ymin = -6.8 mm @ 0.0623 Seconds, Ymax = 4.34 mm @ 0.0511 Seconds





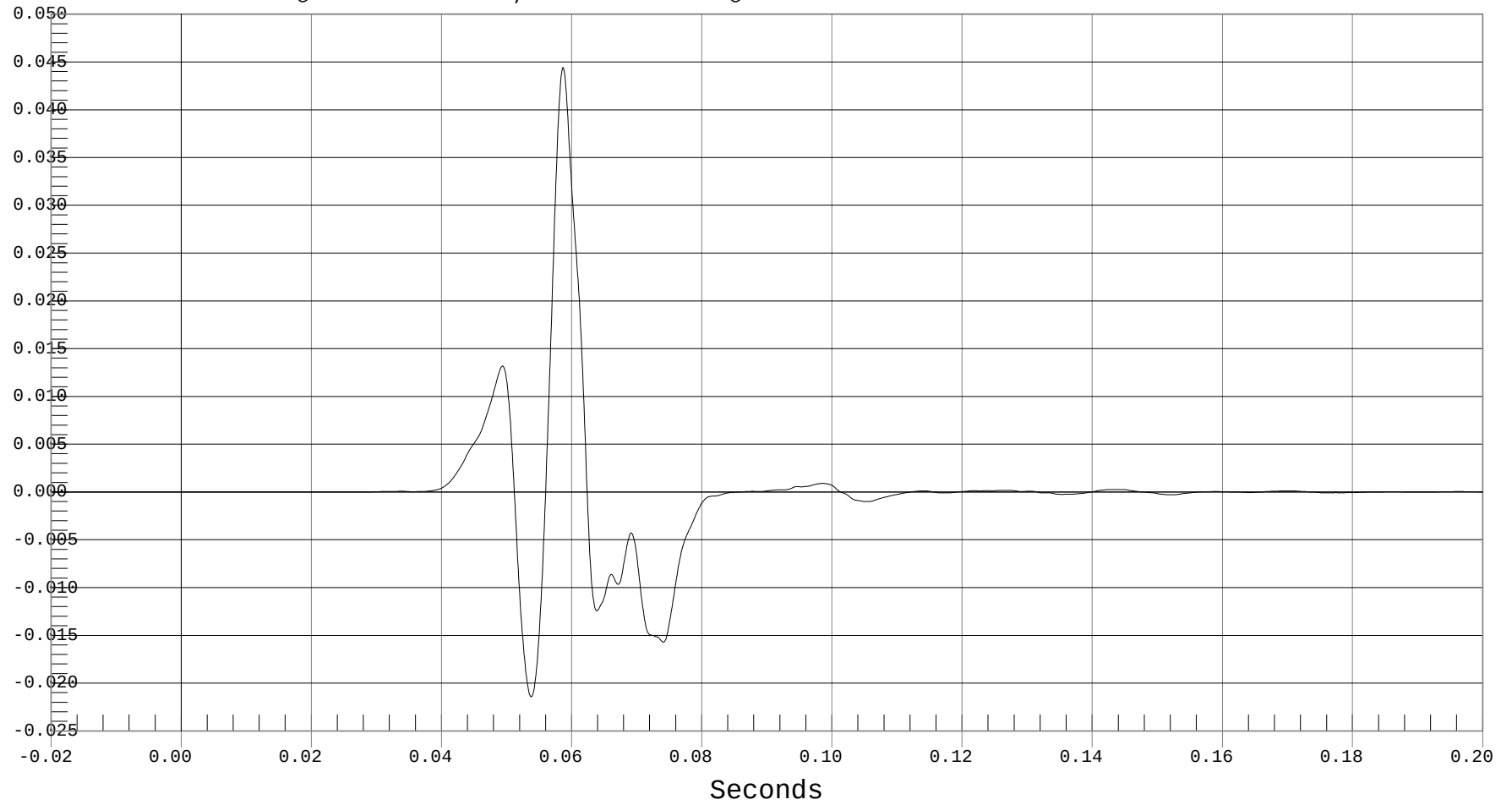
PASSENGER LOWER RIB VISCOUS CRITERION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 Viscous Criterion, B01105DV.C88

Ymin = -.02 @ 0.0537 Seconds, Ymax = .04 @ 0.0586 Seconds





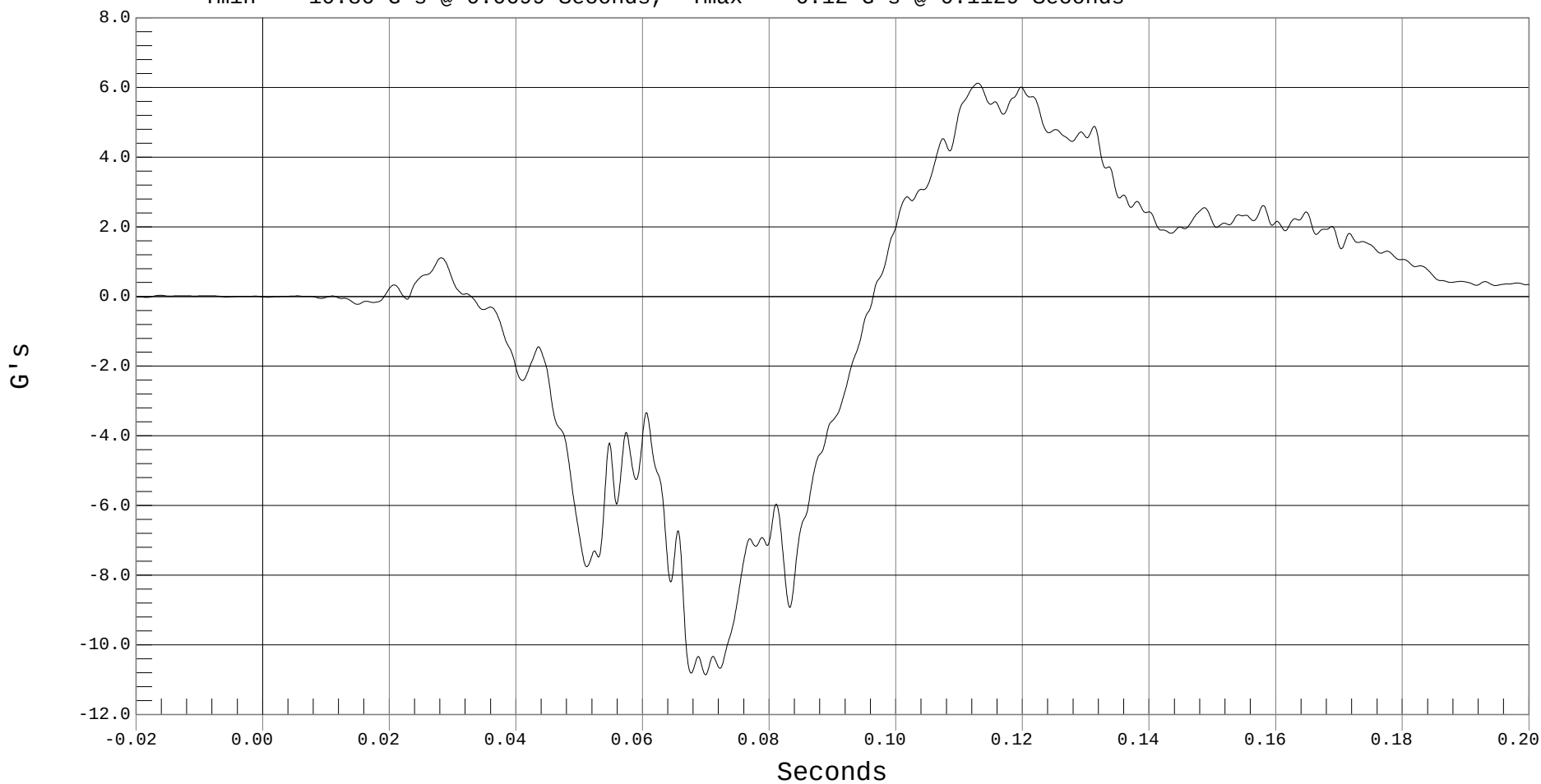
PASSENGER LOWER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER LOWER SPINE X, B01105AF.A89

Ymin = -10.86 G's @ 0.0699 Seconds, Ymax = 6.12 G's @ 0.1129 Seconds





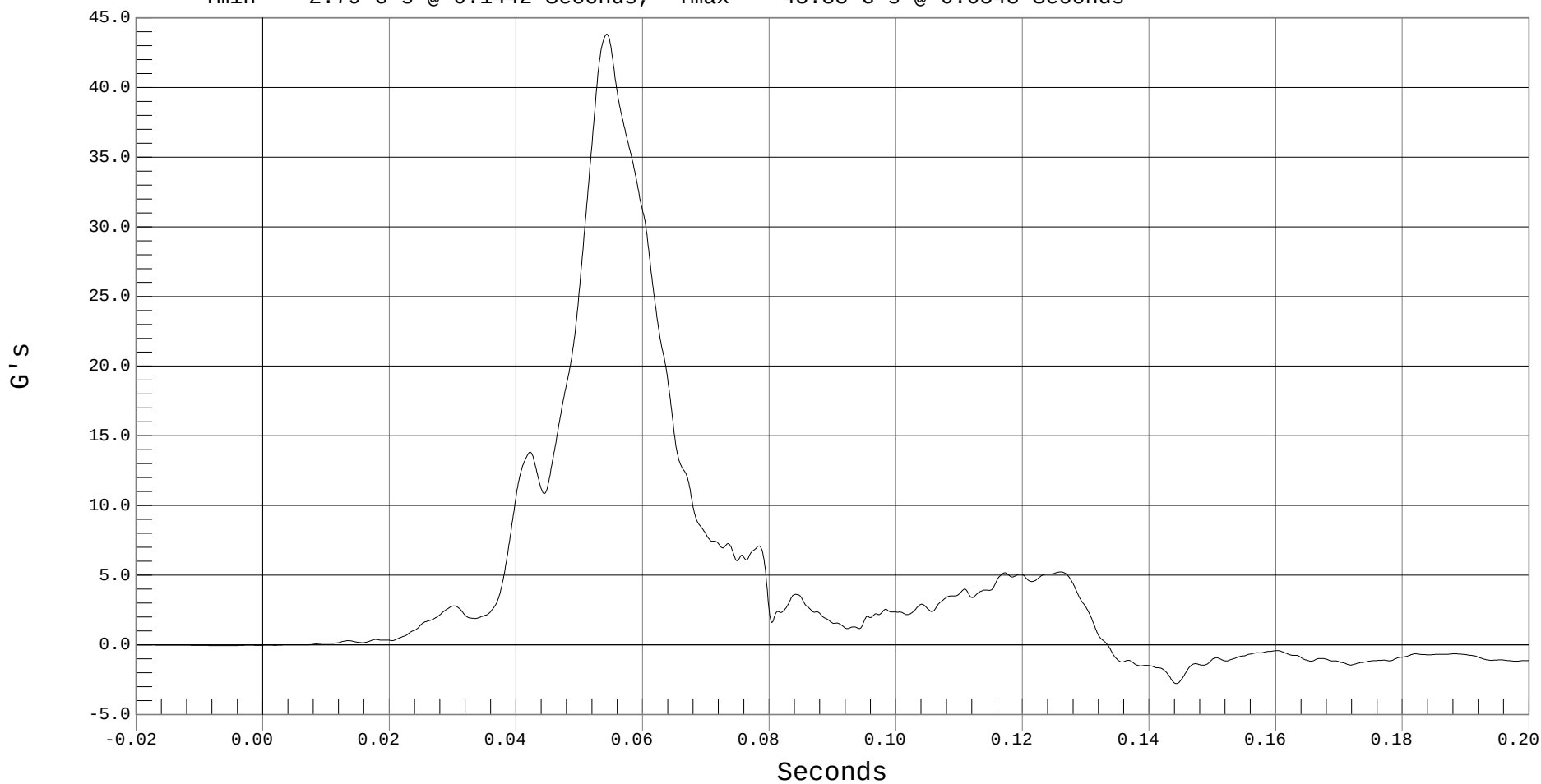
PASSENGER LOWER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER LOWER SPINE Y, B01105AF.A90

Ymin = -2.79 G's @ 0.1442 Seconds, Ymax = 43.83 G's @ 0.0543 Seconds





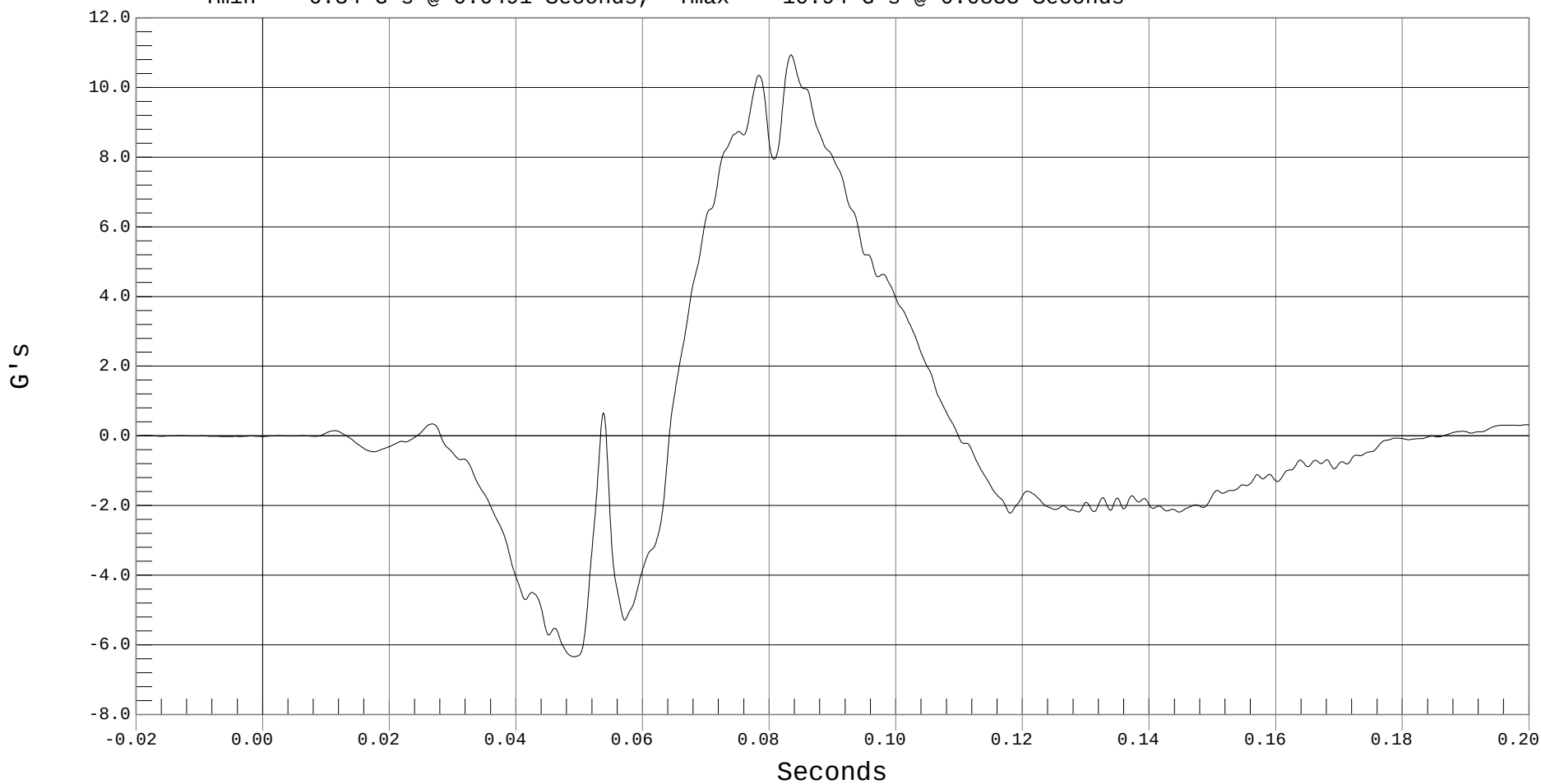
PASSENGER LOWER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 180

— 1 REAR PASSENGER LOWER SPINE Z, B01105AF.A91

Ymin = -6.34 G's @ 0.0491 Seconds, Ymax = 10.94 G's @ 0.0833 Seconds





PASSENGER LOWER SPINE RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

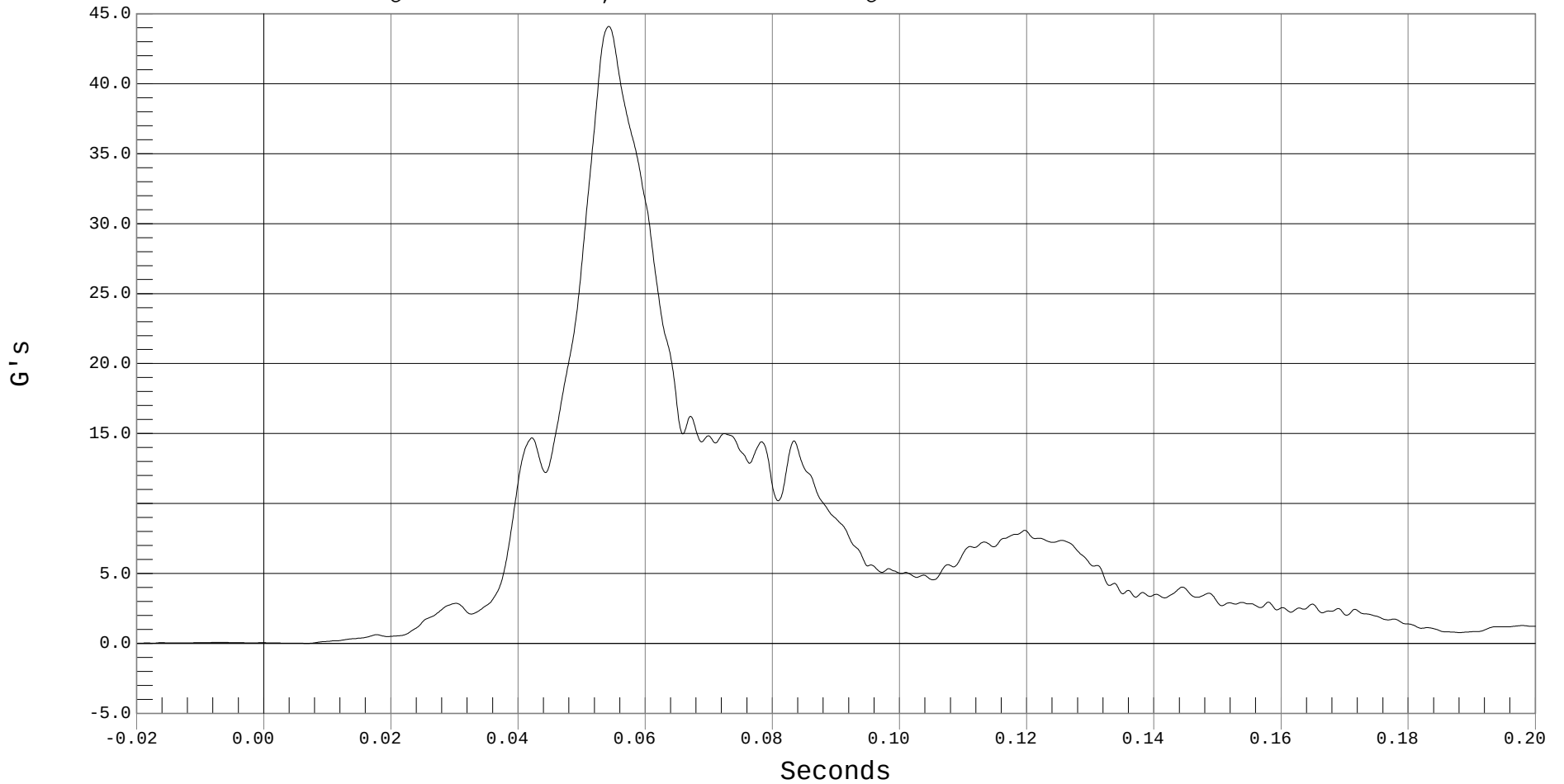
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 180

— 1 PASSENGER LOWER SPINE RESULTANT, B01105AV.A89

Ymin = 0 G's @ 0.0066 Seconds, Ymax = 44.1 G's @ 0.0542 Seconds





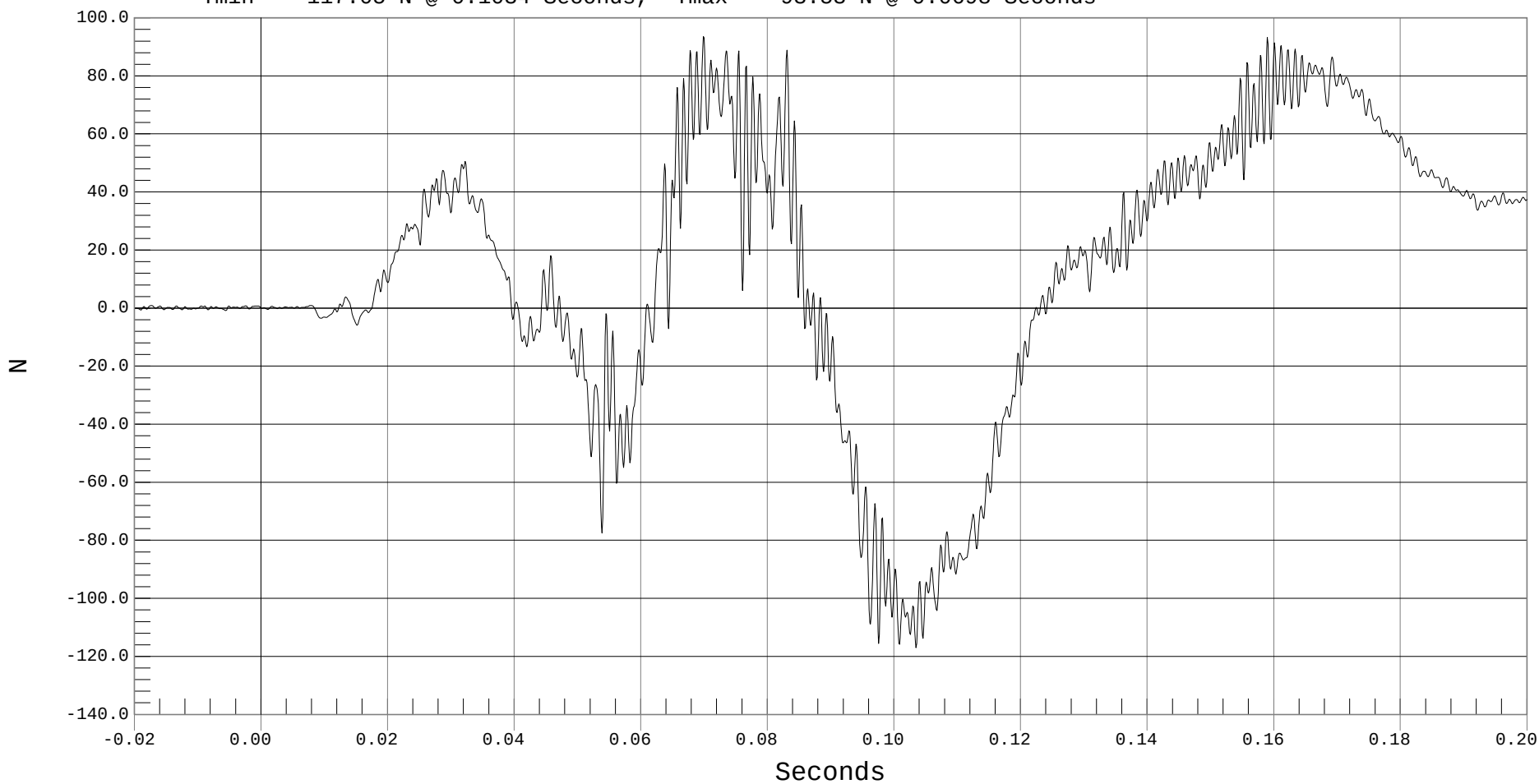
PASSENGER TORSO FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER TORSO FORCE X, B01105FF.F92

Ymin = -117.05 N @ 0.1034 Seconds, Ymax = 93.53 N @ 0.0698 Seconds





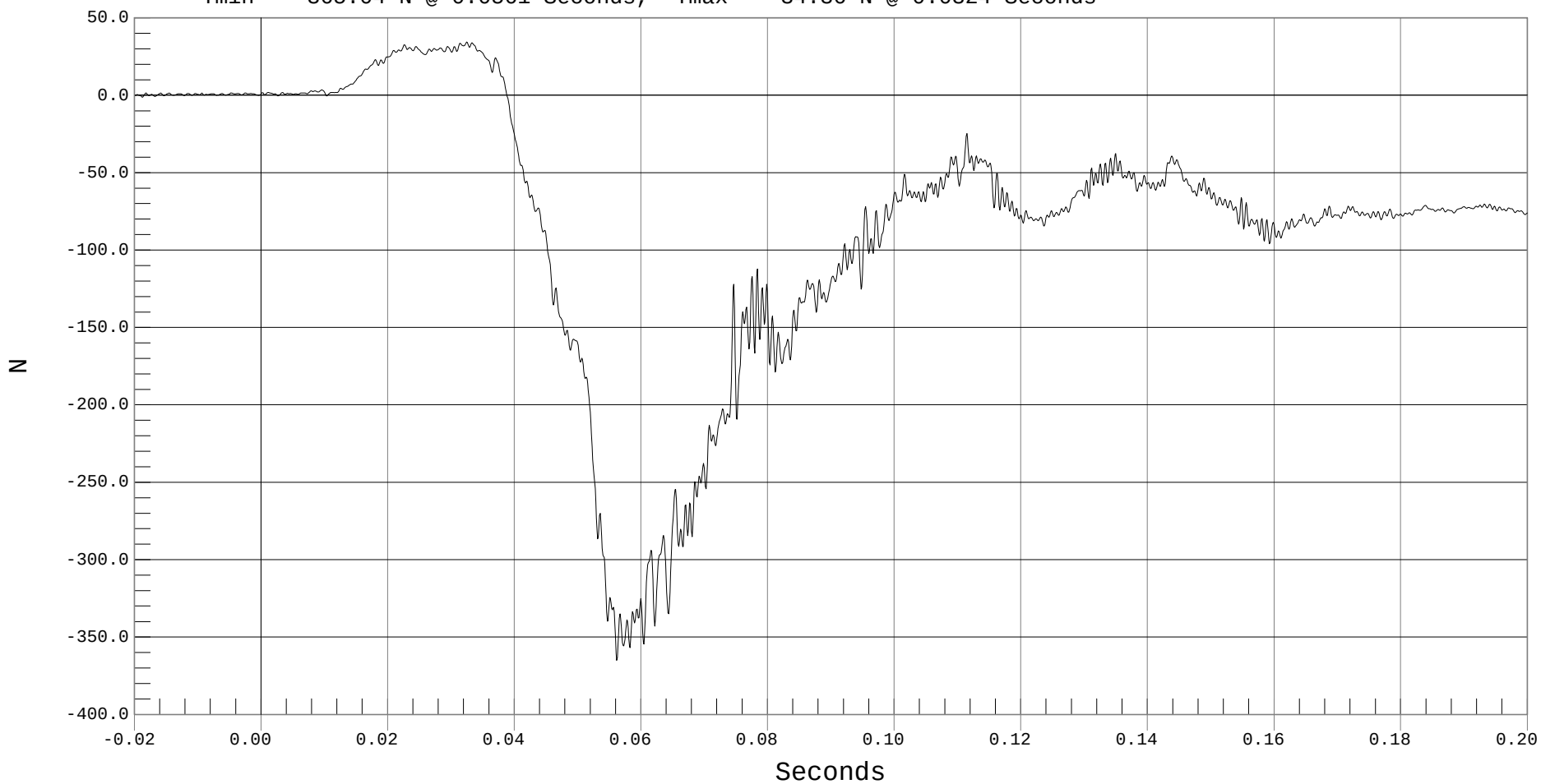
PASSENGER TORSO FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER TORSO FORCE Y, B01105FF.F93

Ymin = -365.04 N @ 0.0561 Seconds, Ymax = 34.36 N @ 0.0324 Seconds





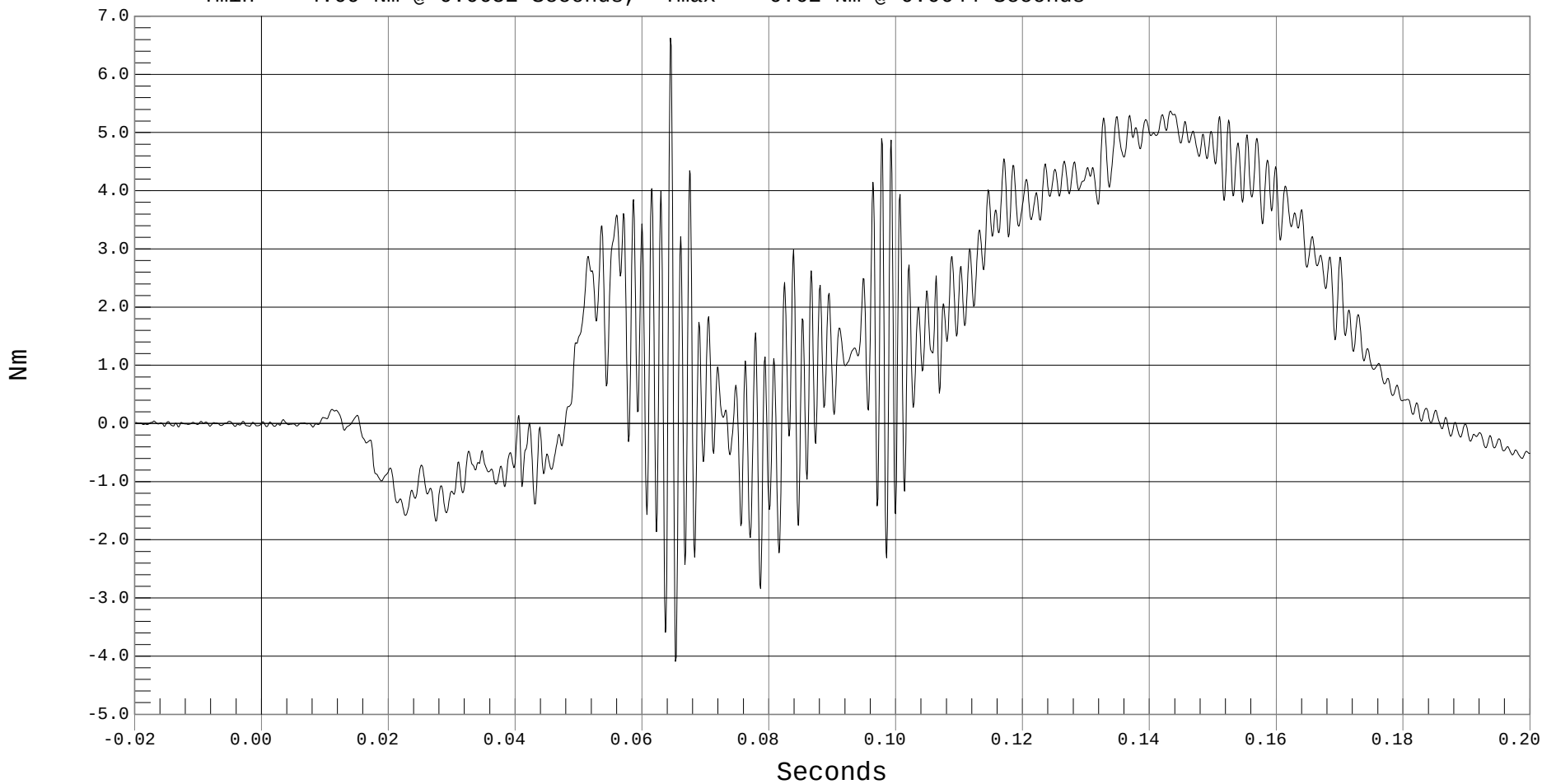
PASSENGER TORSO MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER TORSO MOMENT Y, B01105FF.F57

Ymin = -4.09 Nm @ 0.0652 Seconds, Ymax = 6.62 Nm @ 0.0644 Seconds





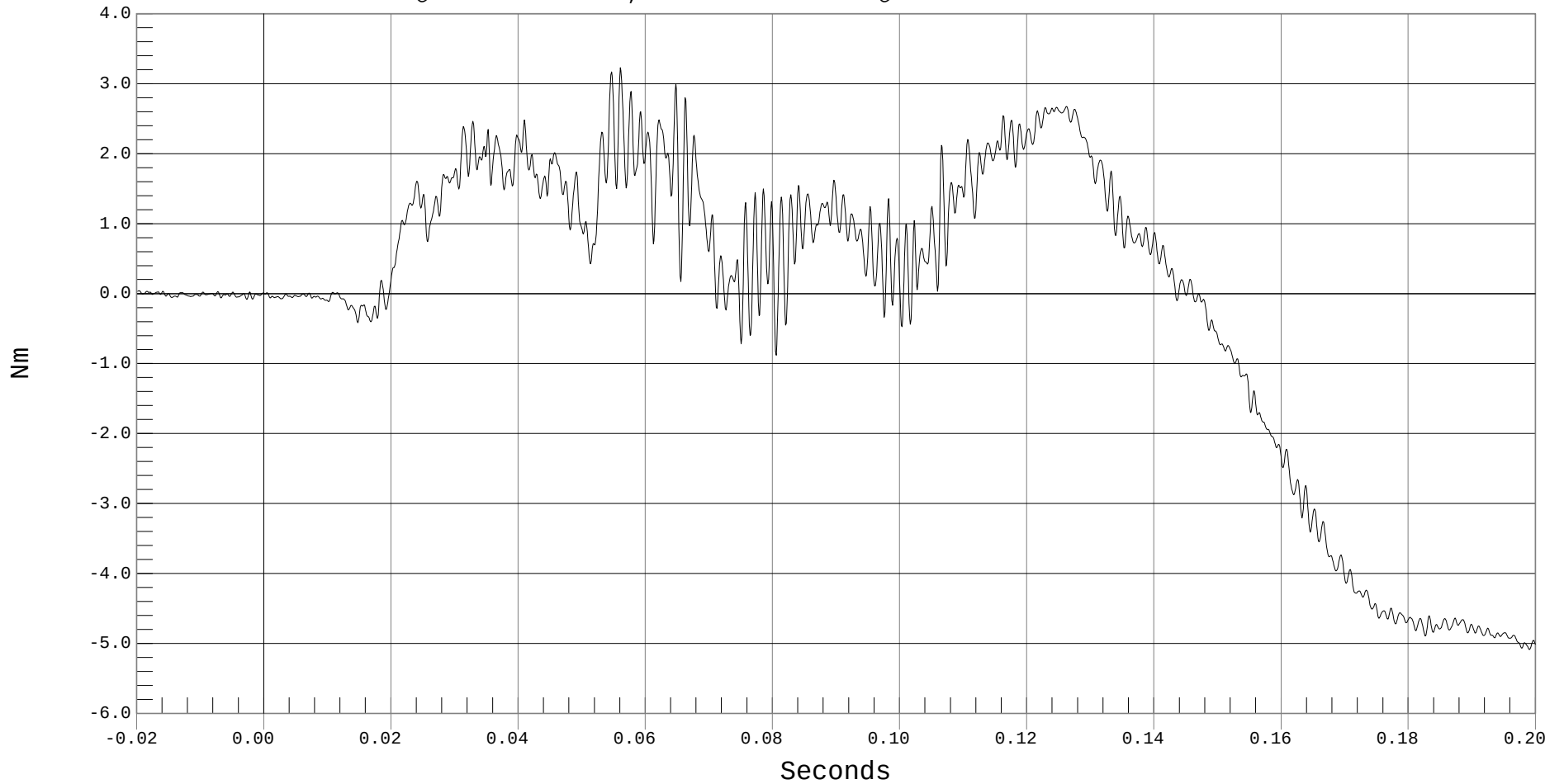
PASSENGER TORSO MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER TORSO MOMENT Z, B01105MF.M58

Ymin = -5.09 Nm @ 0.1990 Seconds, Ymax = 3.23 Nm @ 0.0560 Seconds





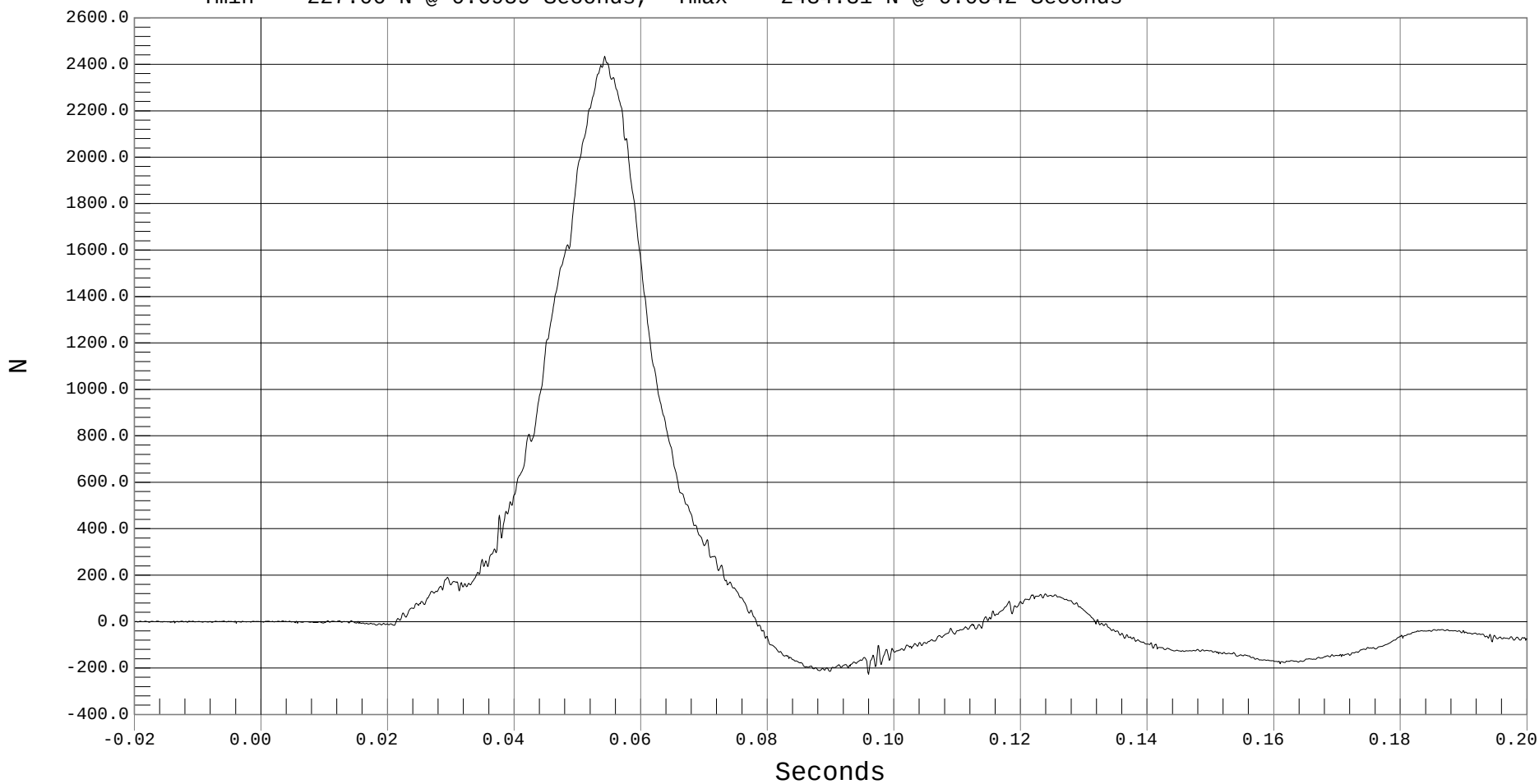
PASSENGER LUMBAR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LUMBAR FORCE Y, B01105FT.F59

Ymin = -227.06 N @ 0.0959 Seconds, Ymax = 2434.31 N @ 0.0542 Seconds





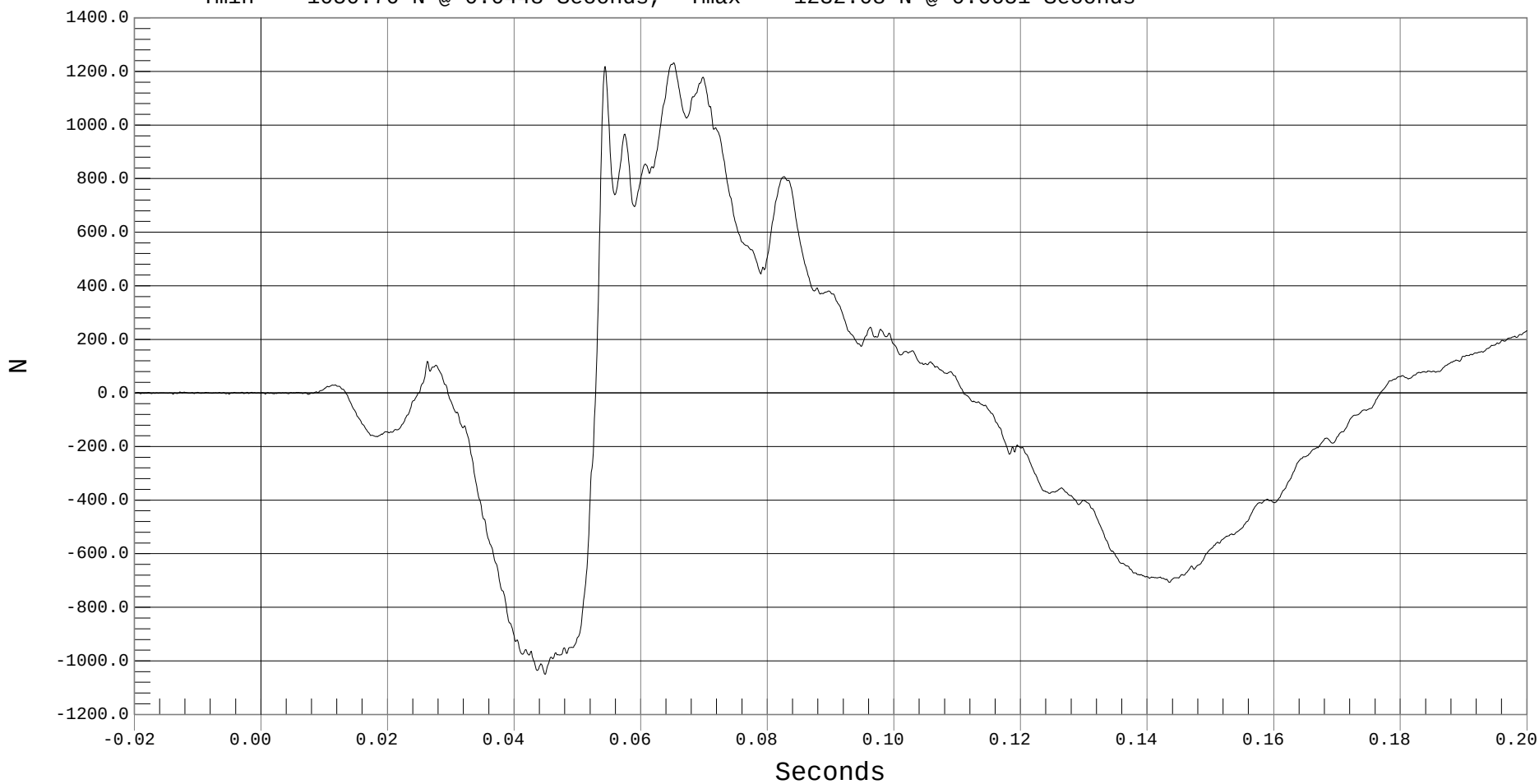
PASSENGER LUMBAR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LUMBAR FORCE Z, B01105FT.F60

Ymin = -1050.76 N @ 0.0448 Seconds, Ymax = 1232.08 N @ 0.0651 Seconds





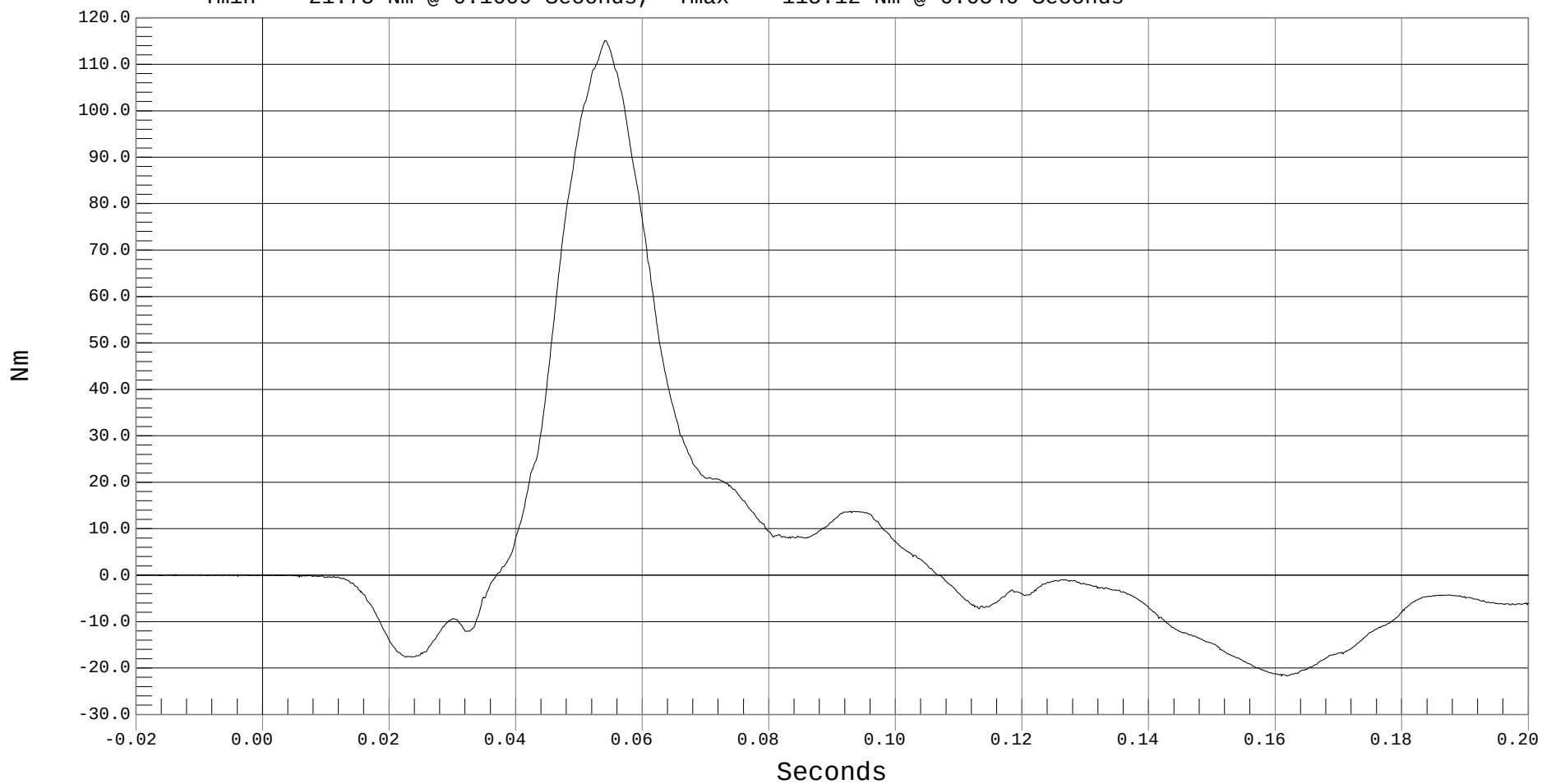
PASSENGER LUMBAR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER LUMBAR MOMENT X, B01105MT.M61

Ymin = -21.75 Nm @ 0.1609 Seconds, Ymax = 115.12 Nm @ 0.0540 Seconds





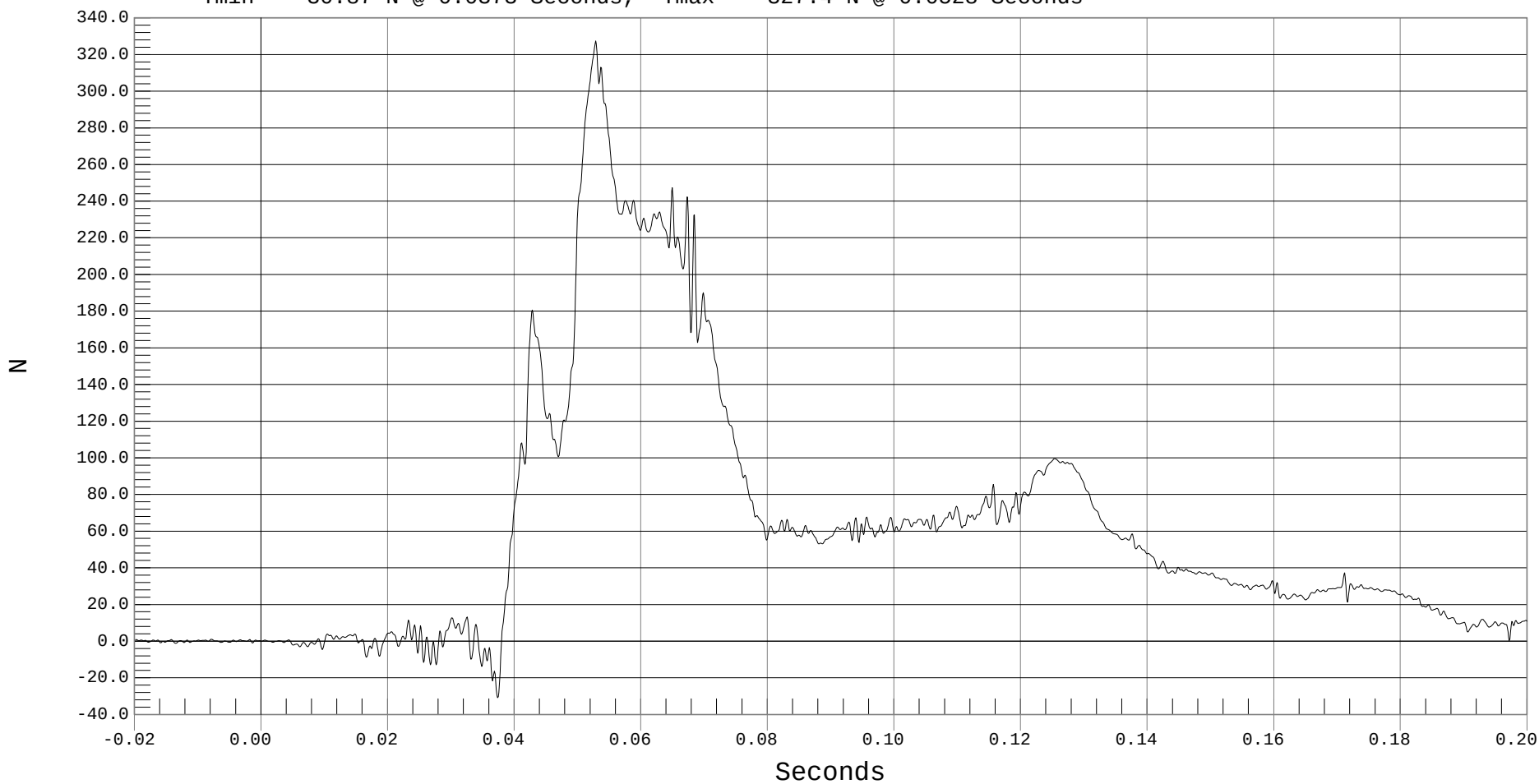
PASSENGER ABDOMEN FRONT FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER FRONT ABDOMEN FORCE, B01105FF.F06

Ymin = -30.87 N @ 0.0373 Seconds, Ymax = 327.4 N @ 0.0528 Seconds





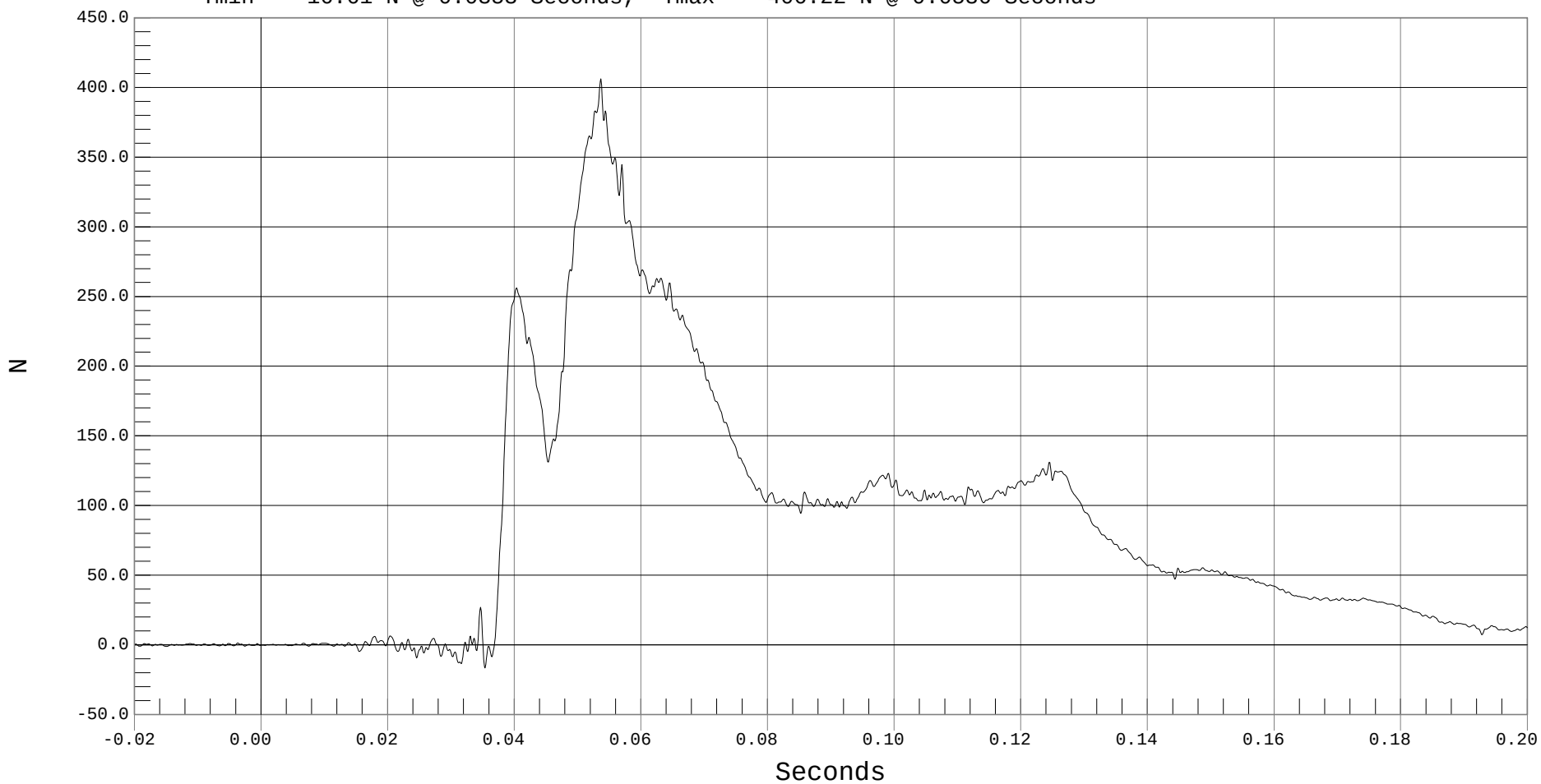
PASSENGER ABDOMEN MID FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER MID ABDOMEN FORCE, B01105FF.F07

Ymin = -16.61 N @ 0.0353 Seconds, Ymax = 406.22 N @ 0.0536 Seconds





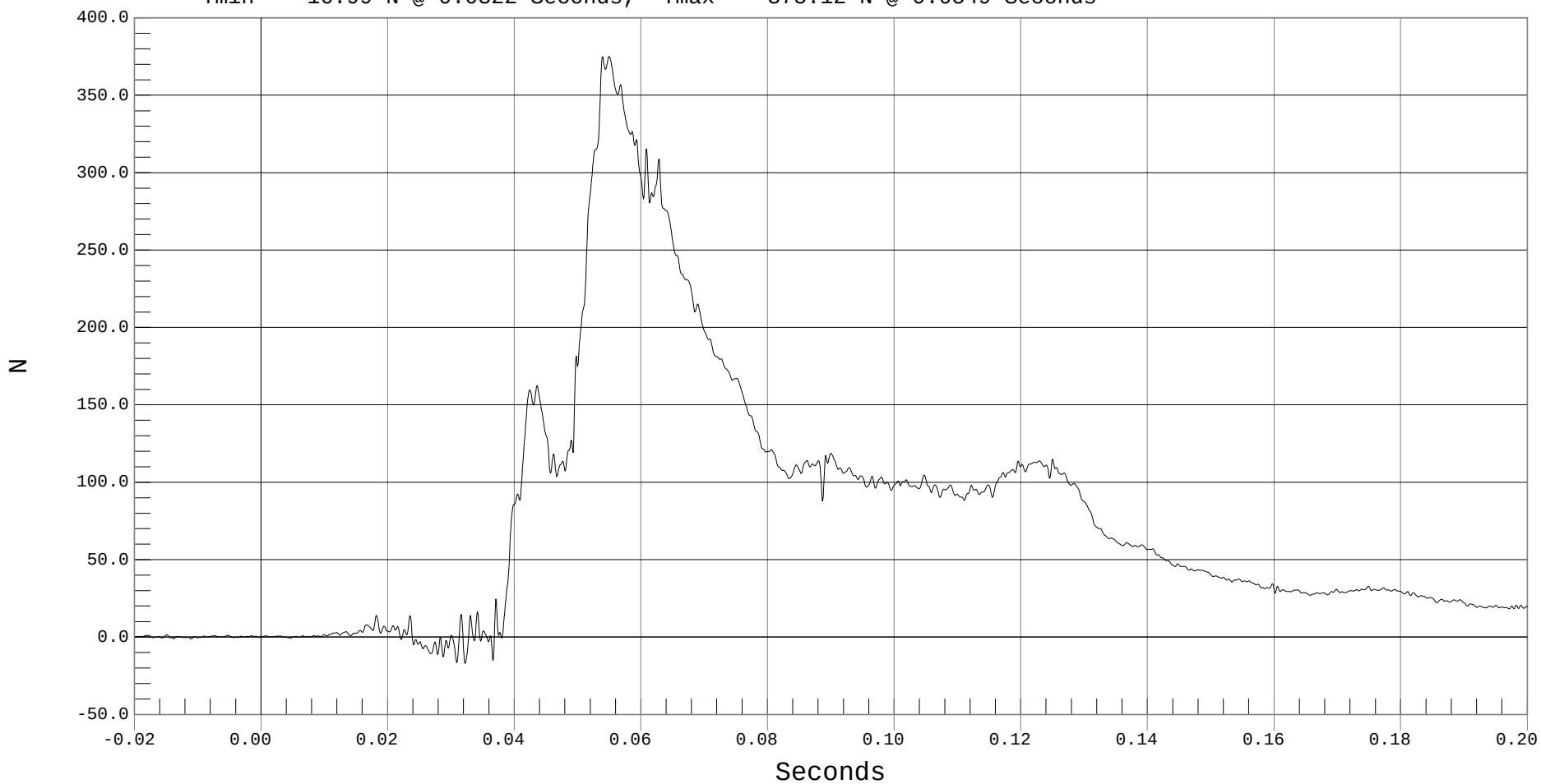
PASSENGER ABDOMEN REAR FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER REAR ABDOMEN FORCE, B01105FF.F08

Ymin = -16.99 N @ 0.0322 Seconds, Ymax = 375.12 N @ 0.0549 Seconds





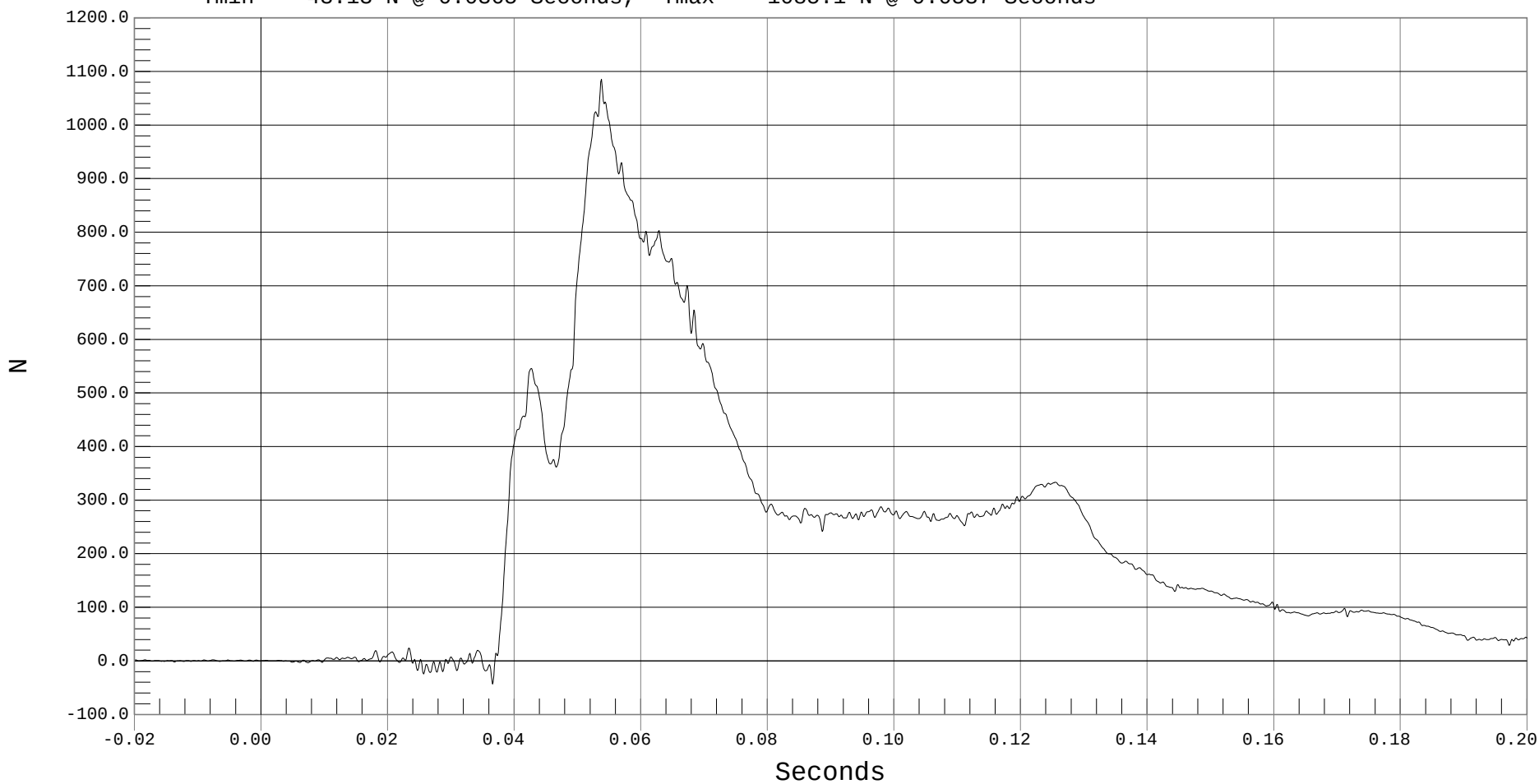
PASSENGER SUMMED ABDOMEN FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER SUMMED ABDOMEN FORCE, B01105FU.F06

Ymin = -43.13 N @ 0.0365 Seconds, Ymax = 1085.1 N @ 0.0537 Seconds





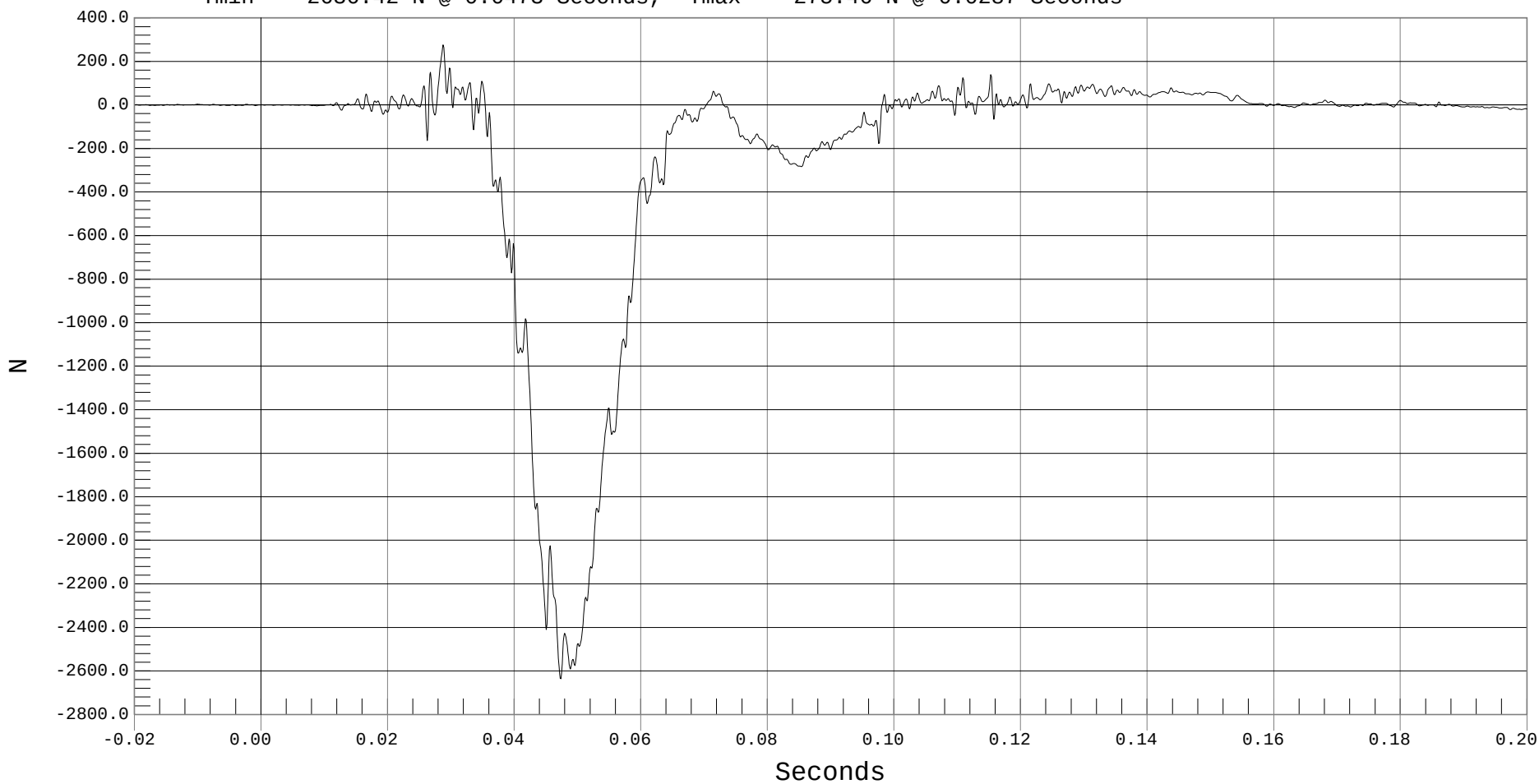
PASSENGER PUBIC SYMPHYSIS FORCE

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER PUBIC SYMPHYSIS FORC, B01105FF.F09

Ymin = -2636.42 N @ 0.0473 Seconds, Ymax = 275.46 N @ 0.0287 Seconds





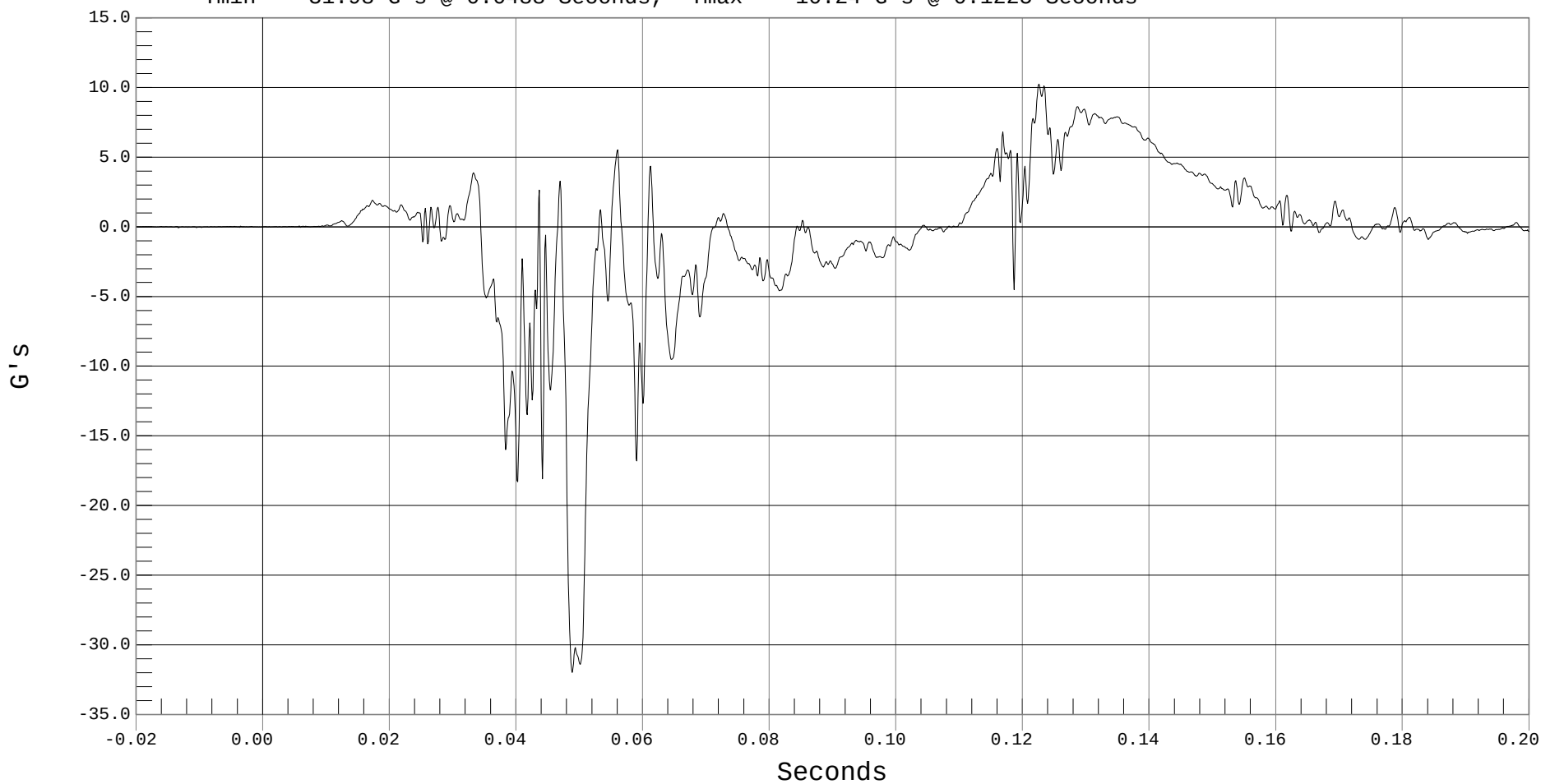
PASSENGER PELVIS X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER PELVIS X, B01105AT.A10

Ymin = -31.98 G's @ 0.0488 Seconds, Ymax = 10.24 G's @ 0.1225 Seconds





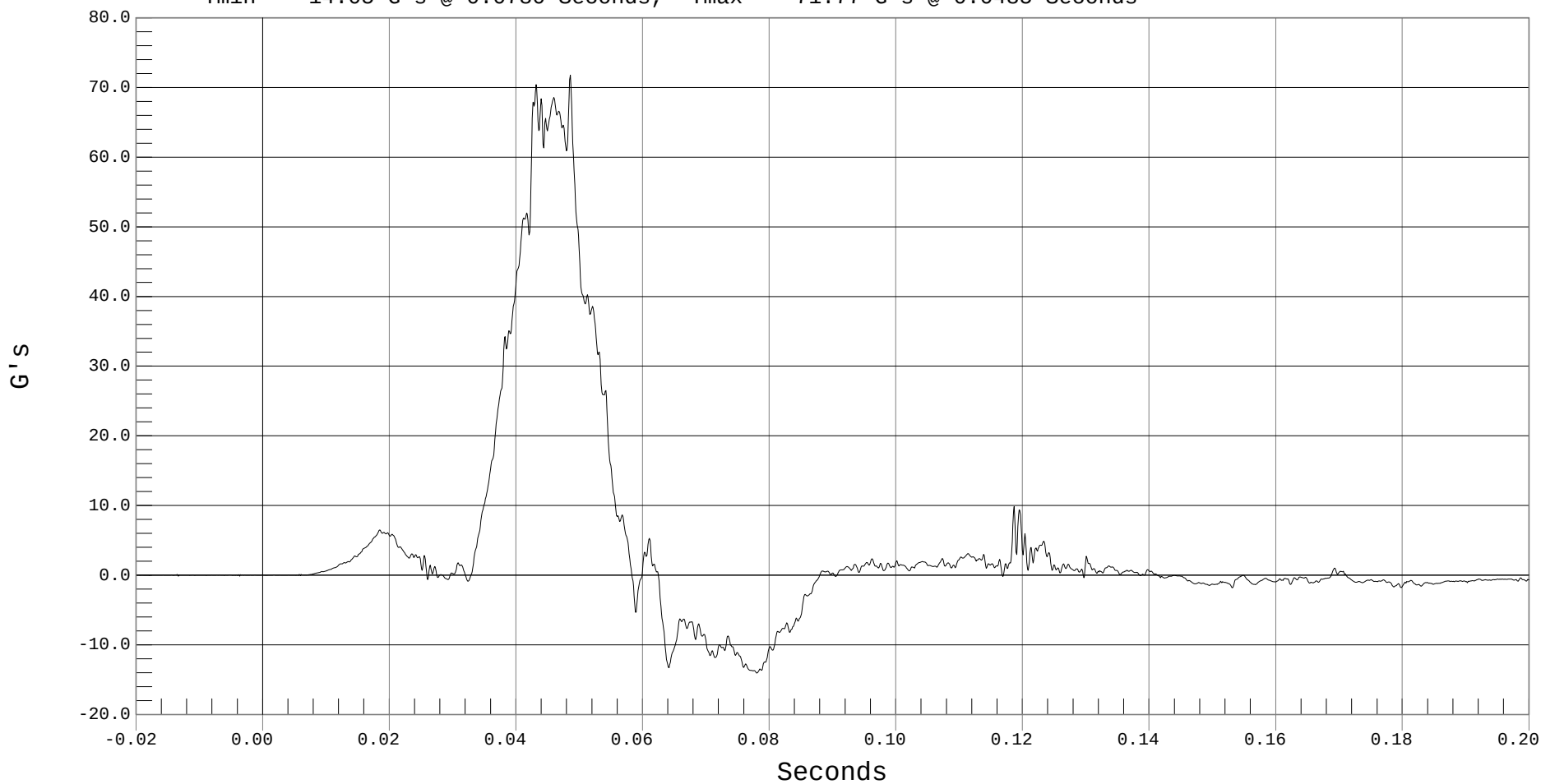
PASSENGER PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER PELVIS Y, B01105AT.A11

Ymin = -14.05 G's @ 0.0780 Seconds, Ymax = 71.77 G's @ 0.0485 Seconds





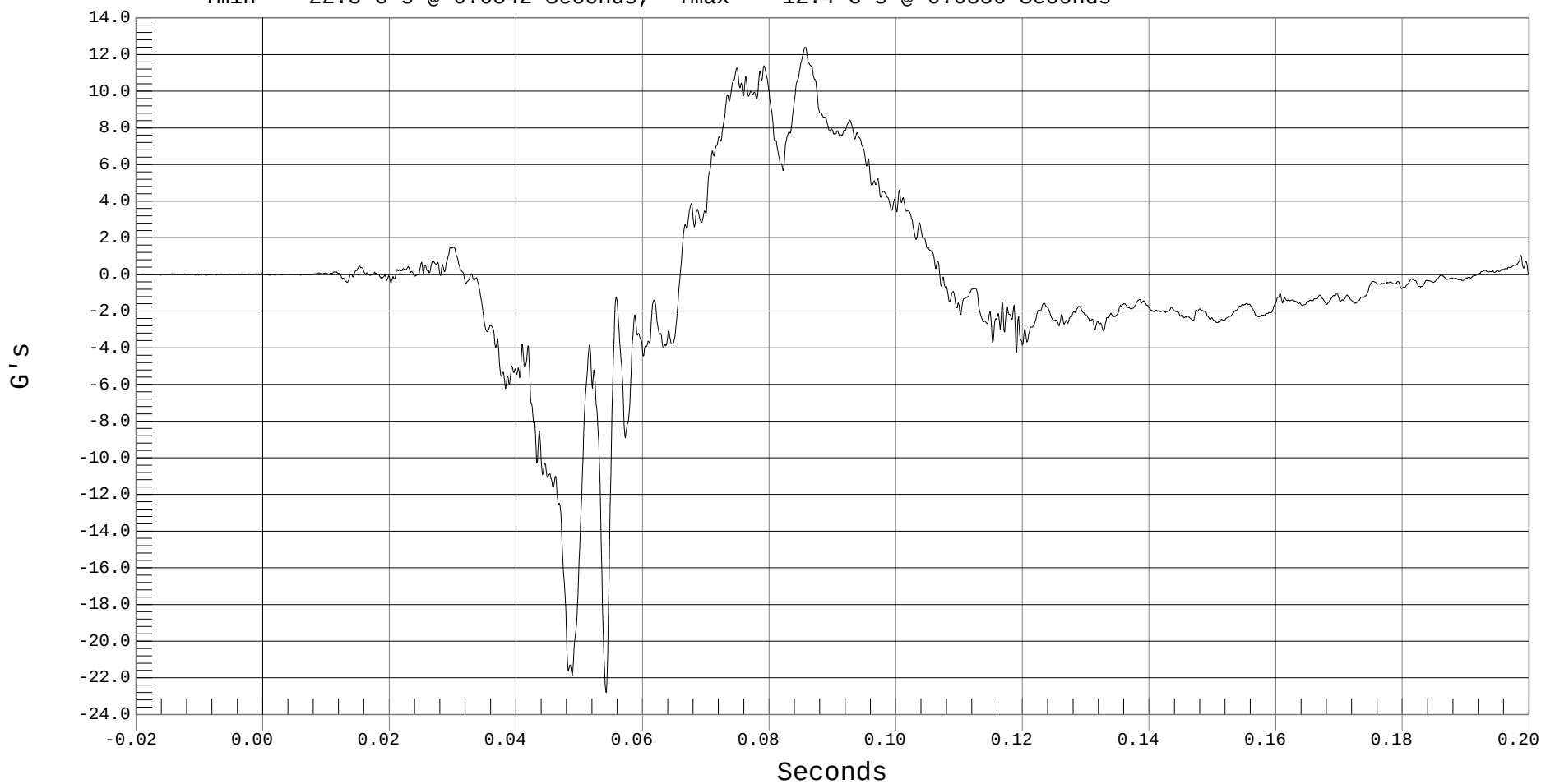
PASSENGER PELVIS Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER PELVIS Z, B01105AT.A12

Ymin = -22.8 G's @ 0.0542 Seconds, Ymax = 12.4 G's @ 0.0856 Seconds





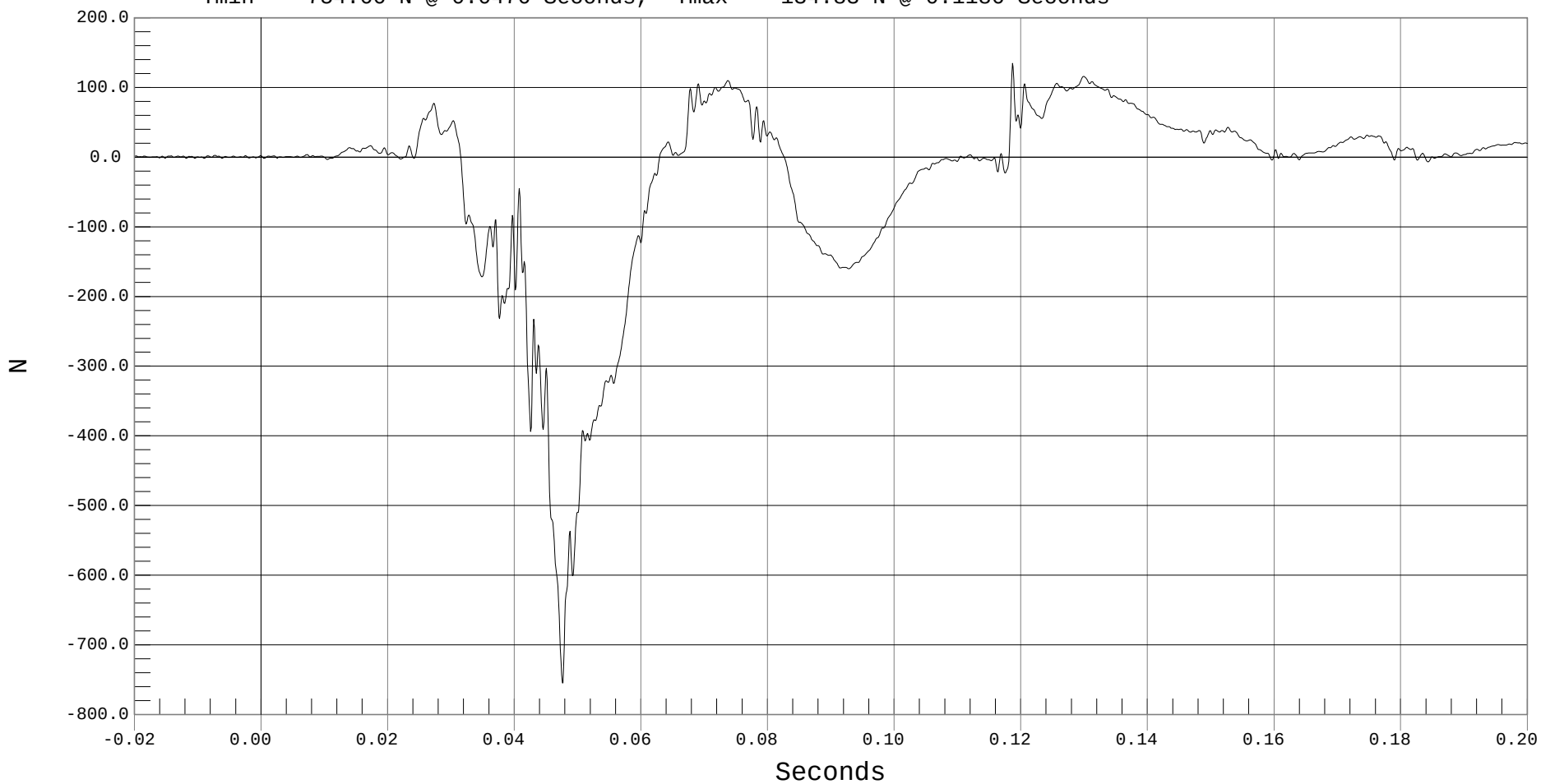
PASSENGER LEFT FEMUR FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER LEFT FEMUR FORCE X, B01105FF.F19

Ymin = -754.66 N @ 0.0476 Seconds, Ymax = 134.83 N @ 0.1186 Seconds





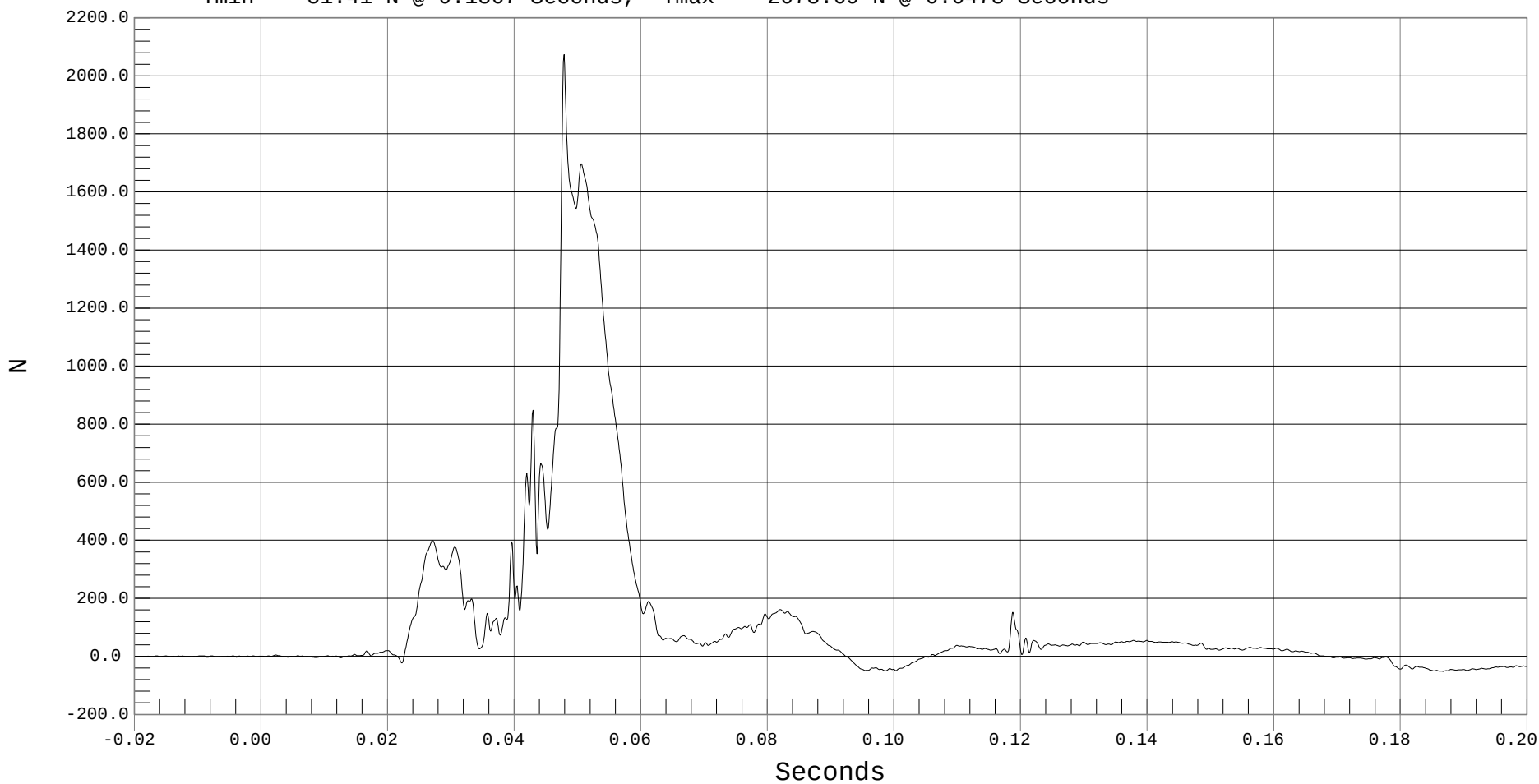
PASSENGER LEFT FEMUR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER LEFT FEMUR FORCE Y, B01105FF.F20

Ymin = -51.41 N @ 0.1867 Seconds, Ymax = 2073.69 N @ 0.0478 Seconds





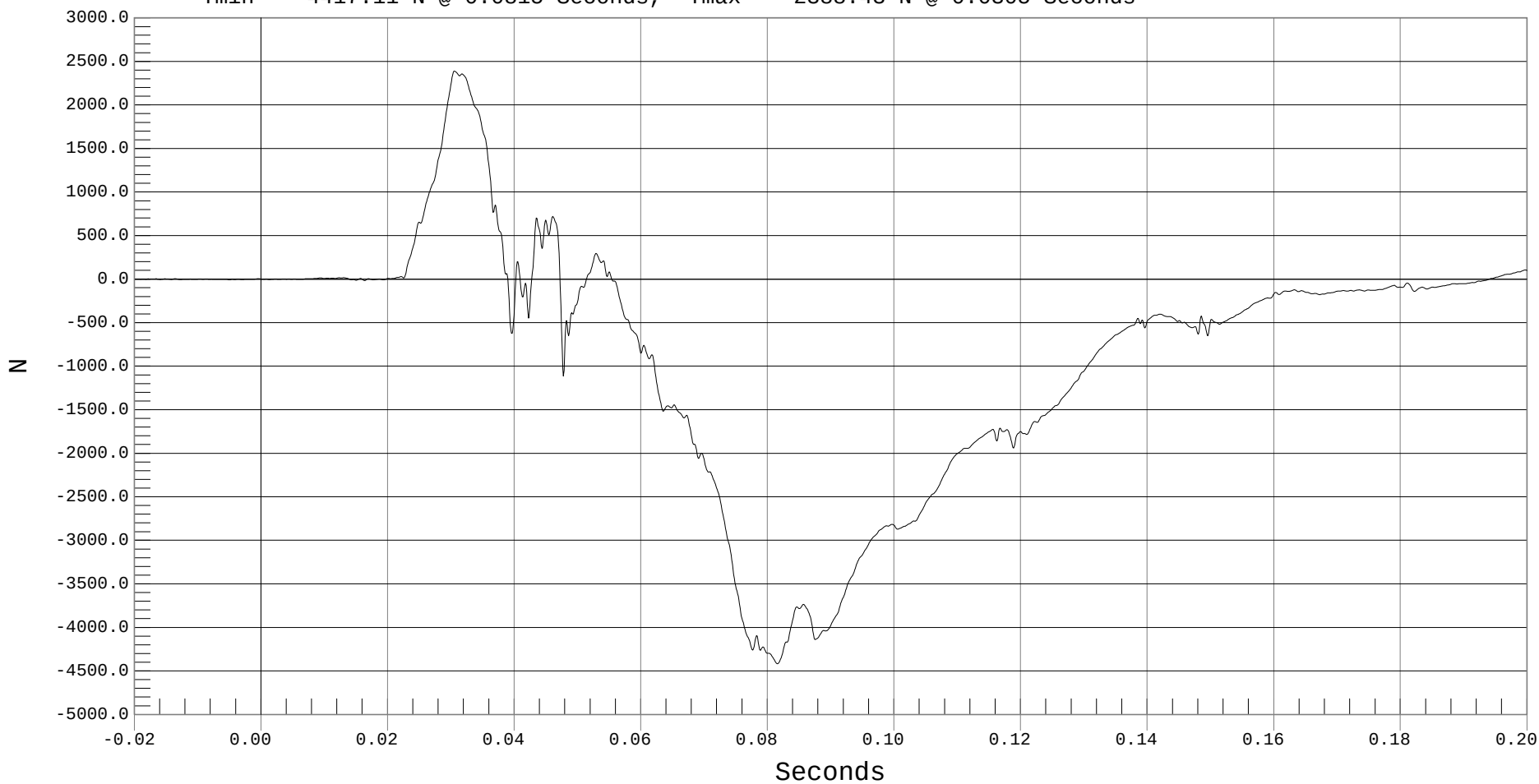
PASSENGER LEFT FEMUR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER LEFT FEMUR FORCE Z, B01105FF.F21

Ymin = -4417.11 N @ 0.0815 Seconds, Ymax = 2388.43 N @ 0.0305 Seconds





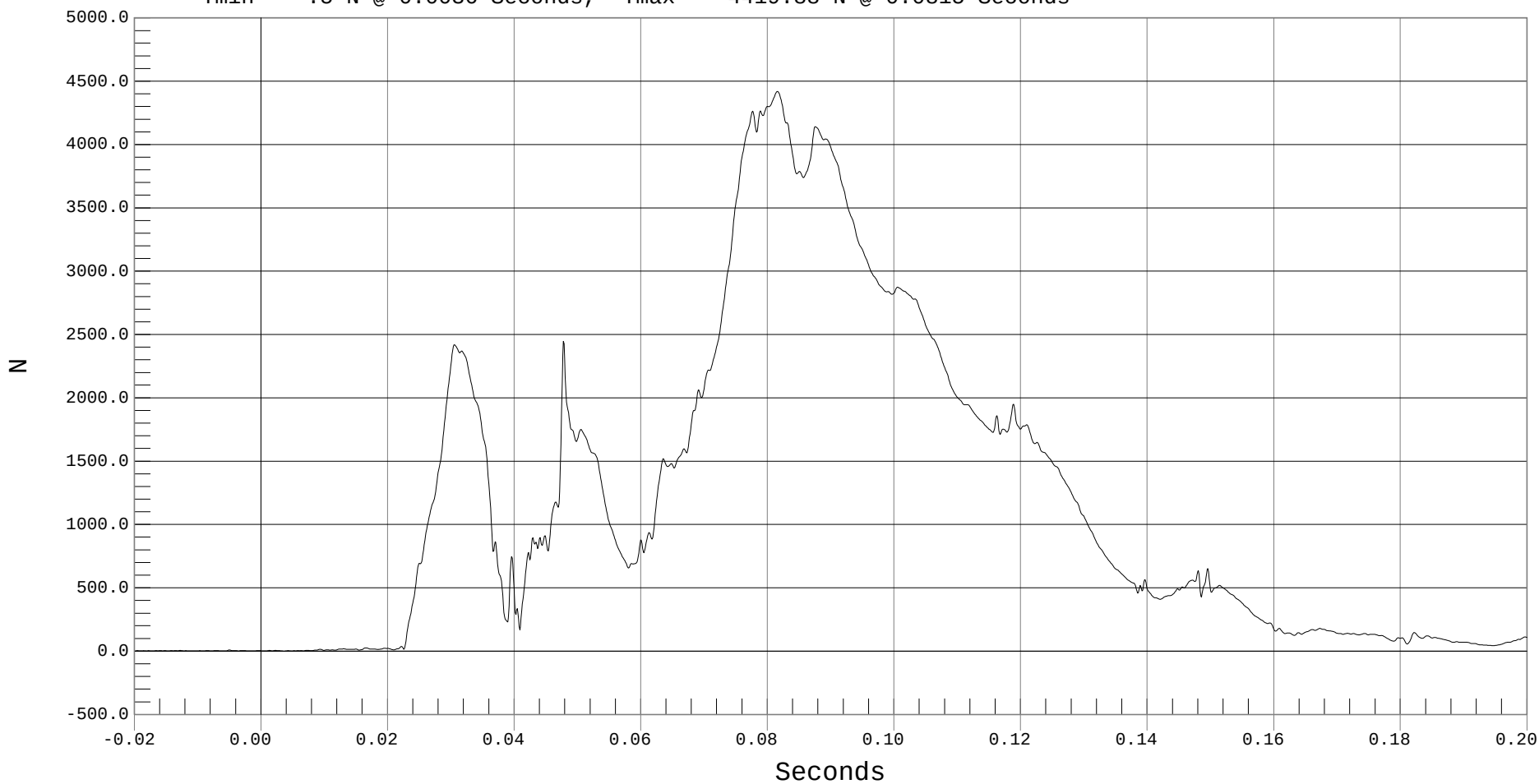
PASSENGER LEFT FEMUR FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER LEFT FEMUR FORCE RESULTANT, B01105FV.F19

Ymin = .5 N @ 0.0036 Seconds, Ymax = 4419.88 N @ 0.0815 Seconds





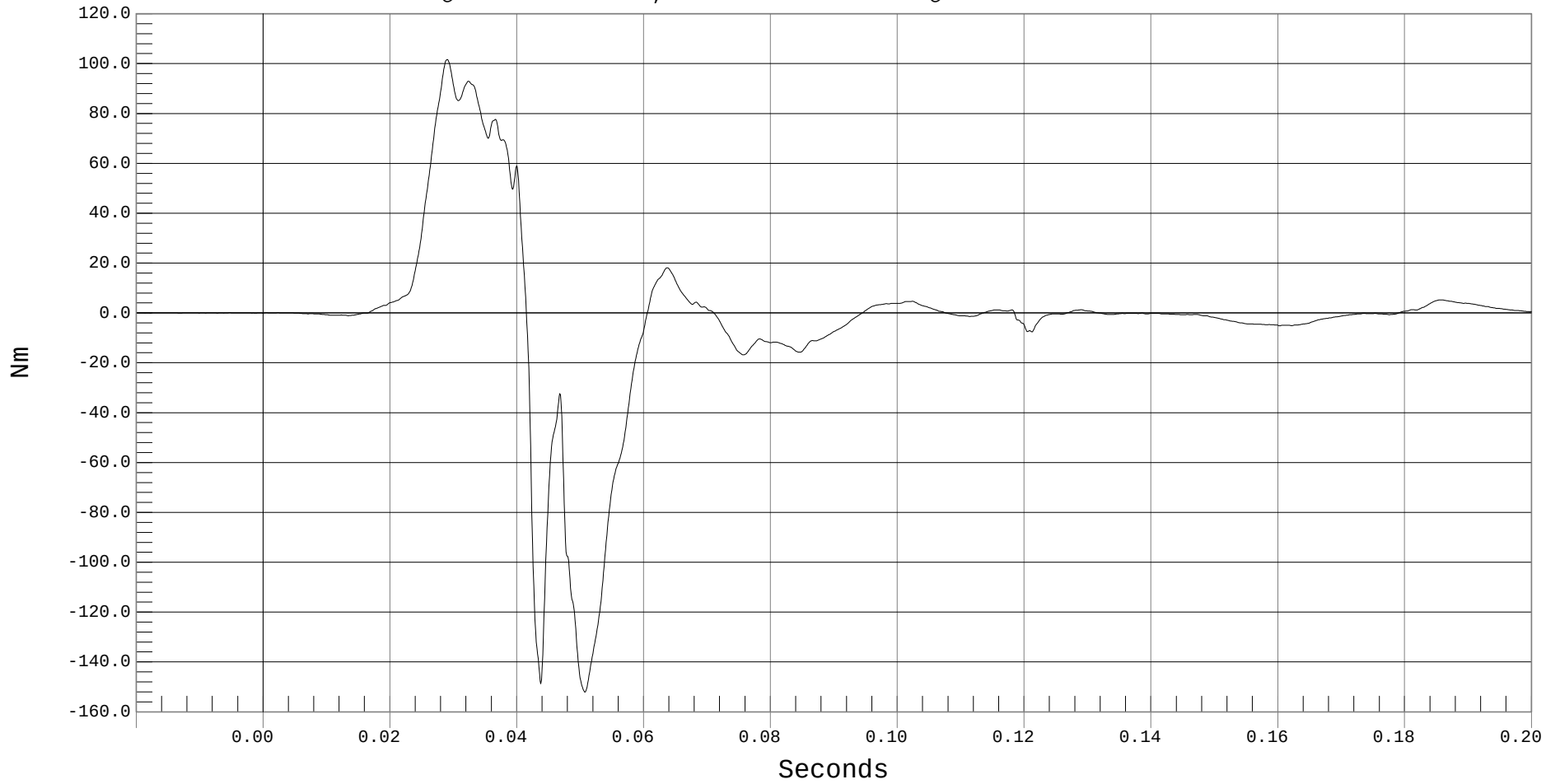
PASSENGER LEFT FEMUR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER LEFT FEMUR MOMENT X, B01105FF.F22

Ymin = -152.05 Nm @ 0.0507 Seconds, Ymax = 101.65 Nm @ 0.0289 Seconds





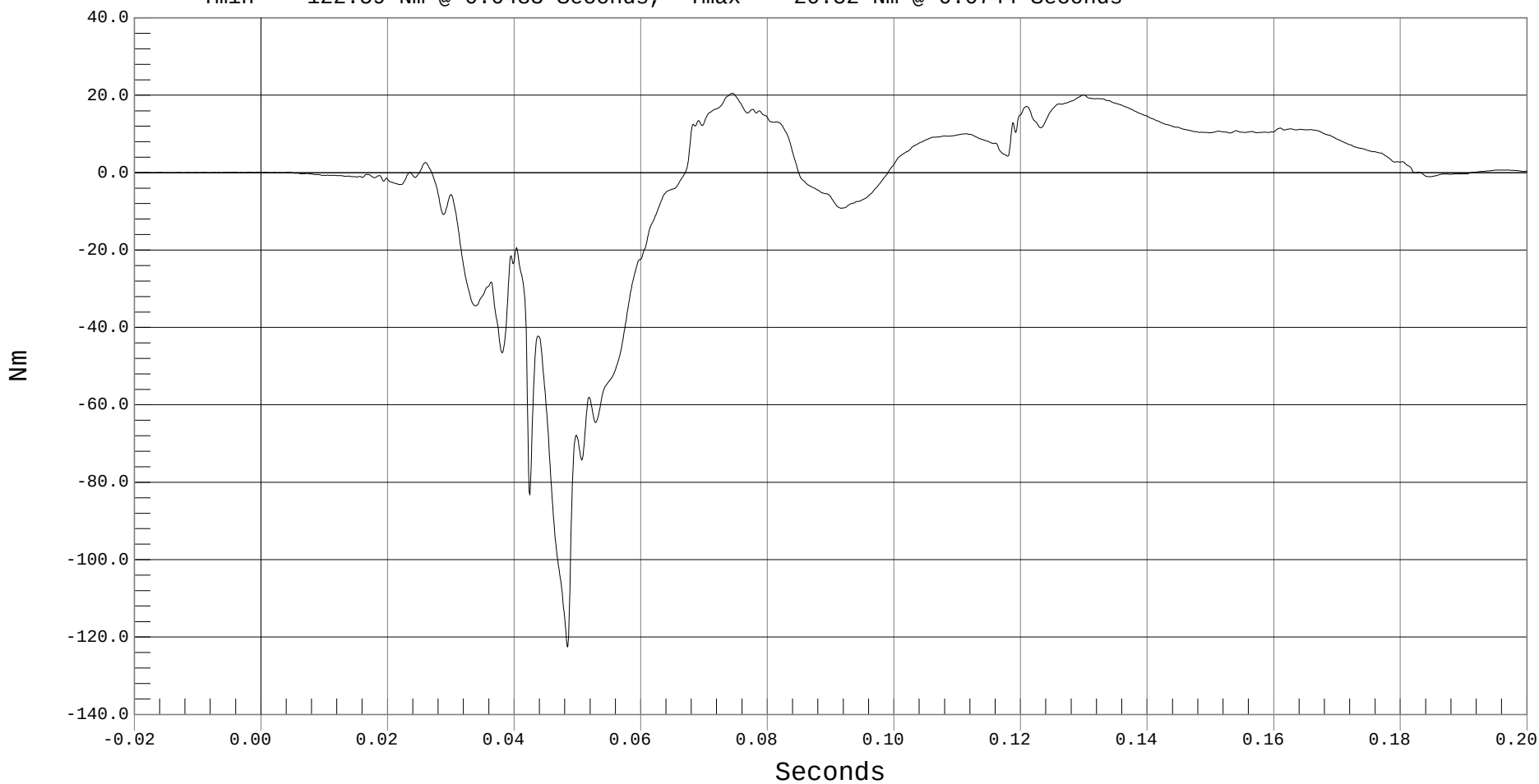
PASSENGER LEFT FEMUR MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER LEFT FEMUR MOMENT Y, B01105FF.F23

Ymin = -122.59 Nm @ 0.0483 Seconds, Ymax = 20.52 Nm @ 0.0744 Seconds





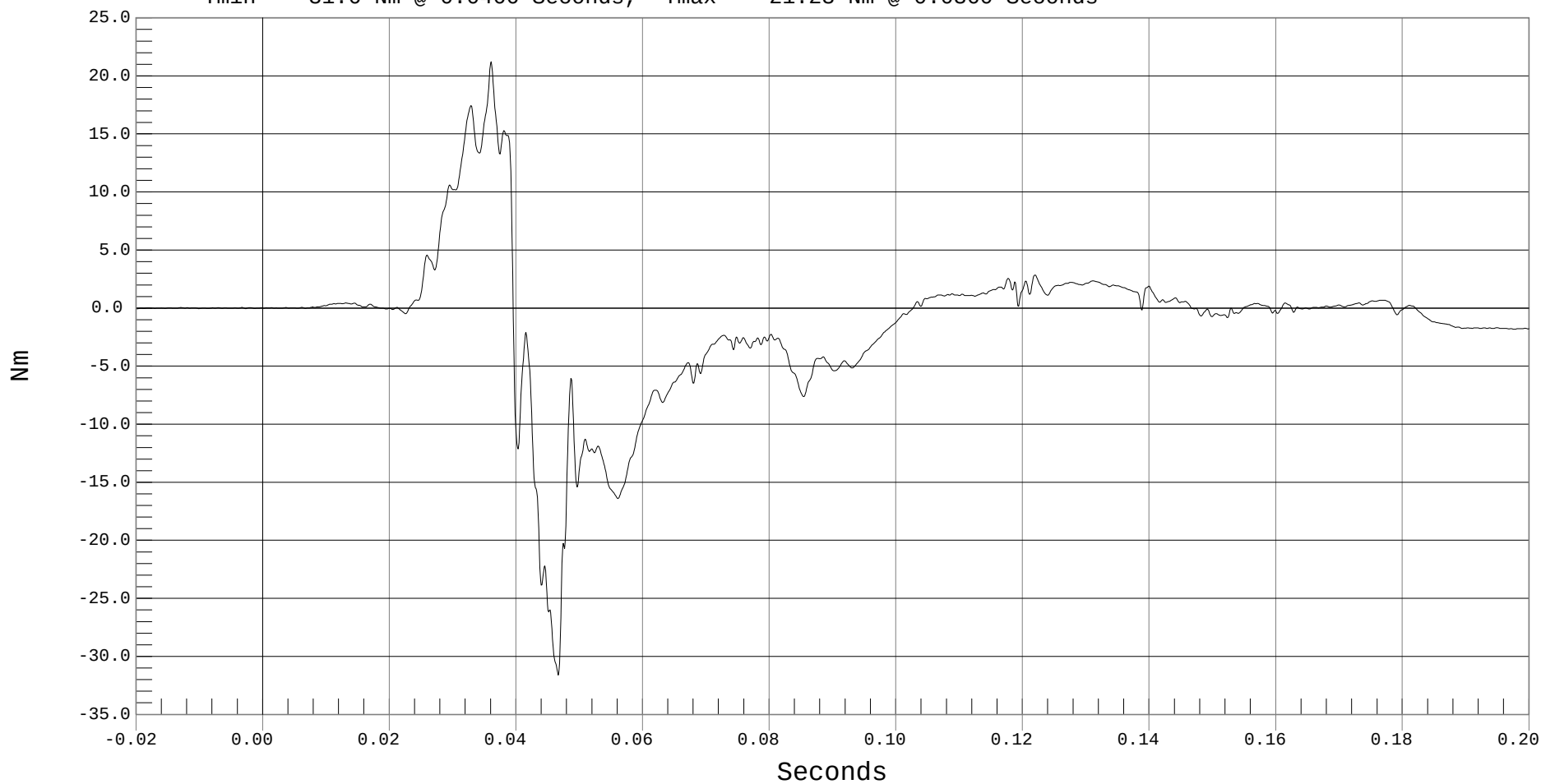
PASSENGER LEFT FEMUR MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER LEFT FEMUR MOMENT Z, B01105FF.F24

Ymin = -31.6 Nm @ 0.0466 Seconds, Ymax = 21.23 Nm @ 0.0360 Seconds





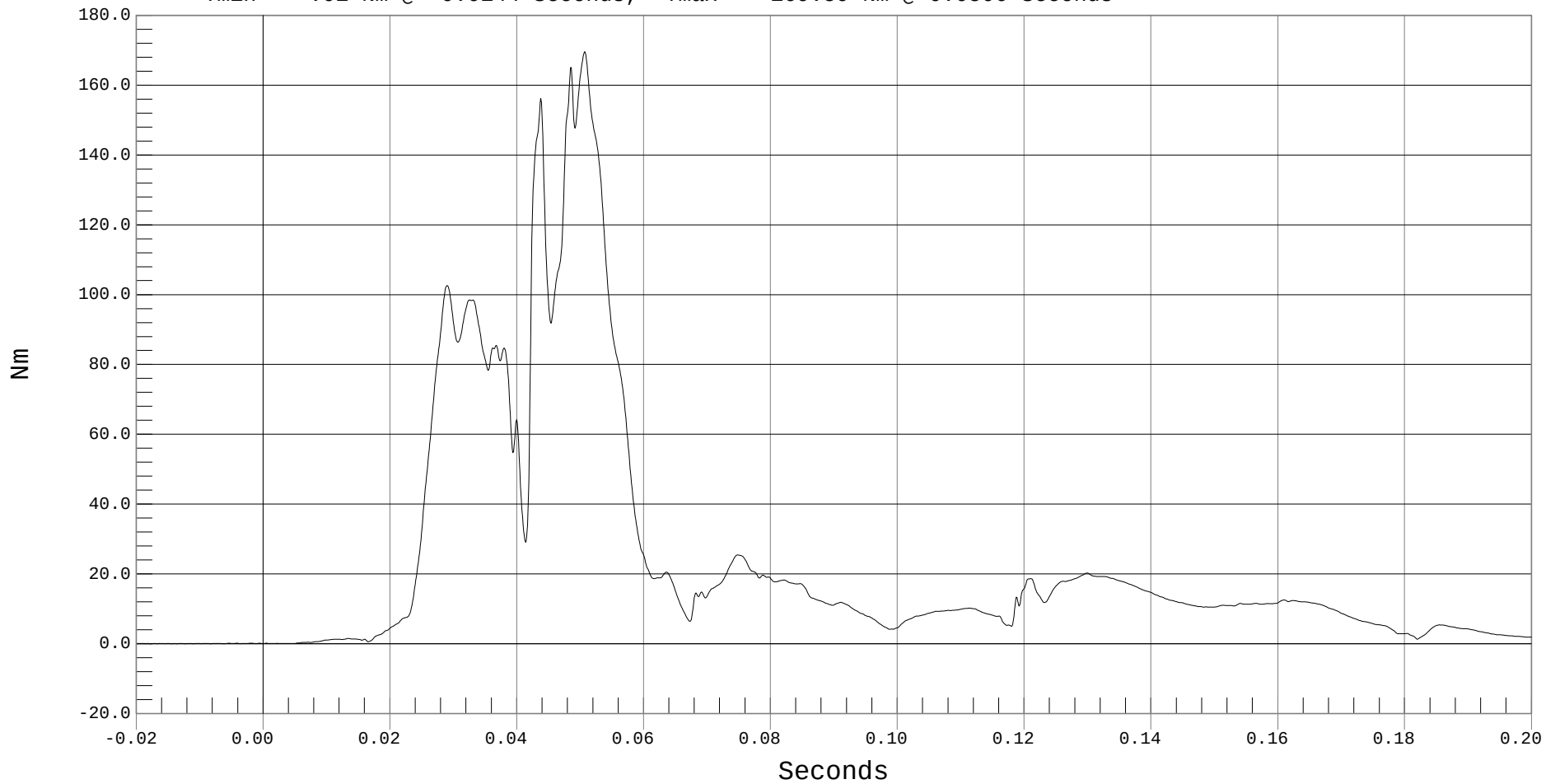
PASSENGER LEFT FEMUR MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER LEFT FEMUR MOMENT RESULTANT, B01105FV.F22

Ymin = .01 Nm @ -0.0144 Seconds, Ymax = 169.59 Nm @ 0.0506 Seconds





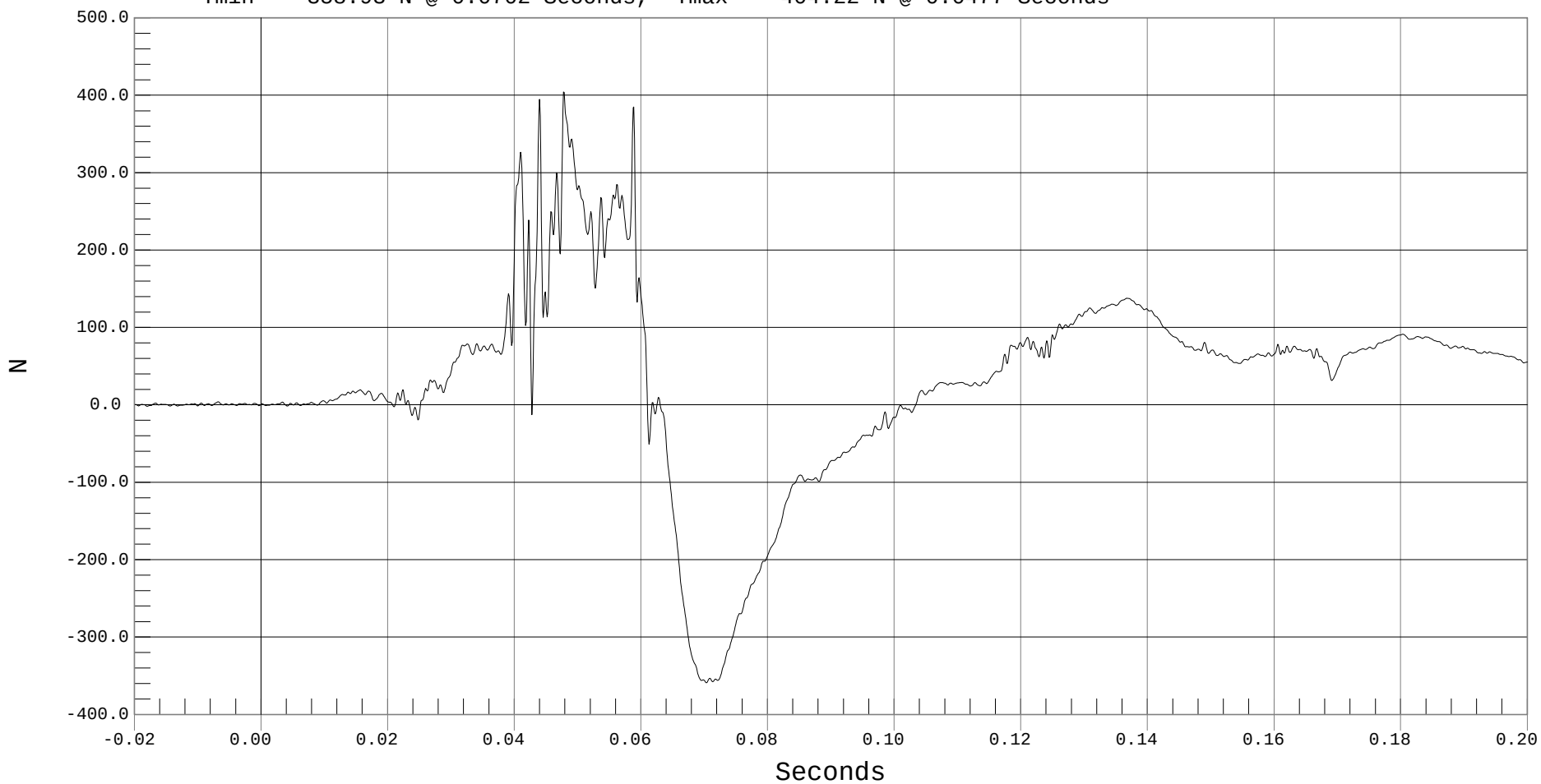
PASSENGER RIGHT FEMUR FORCE X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER RIGHT FEMUR FORCE X, B01105FF.F32

Ymin = -358.93 N @ 0.0702 Seconds, Ymax = 404.22 N @ 0.0477 Seconds





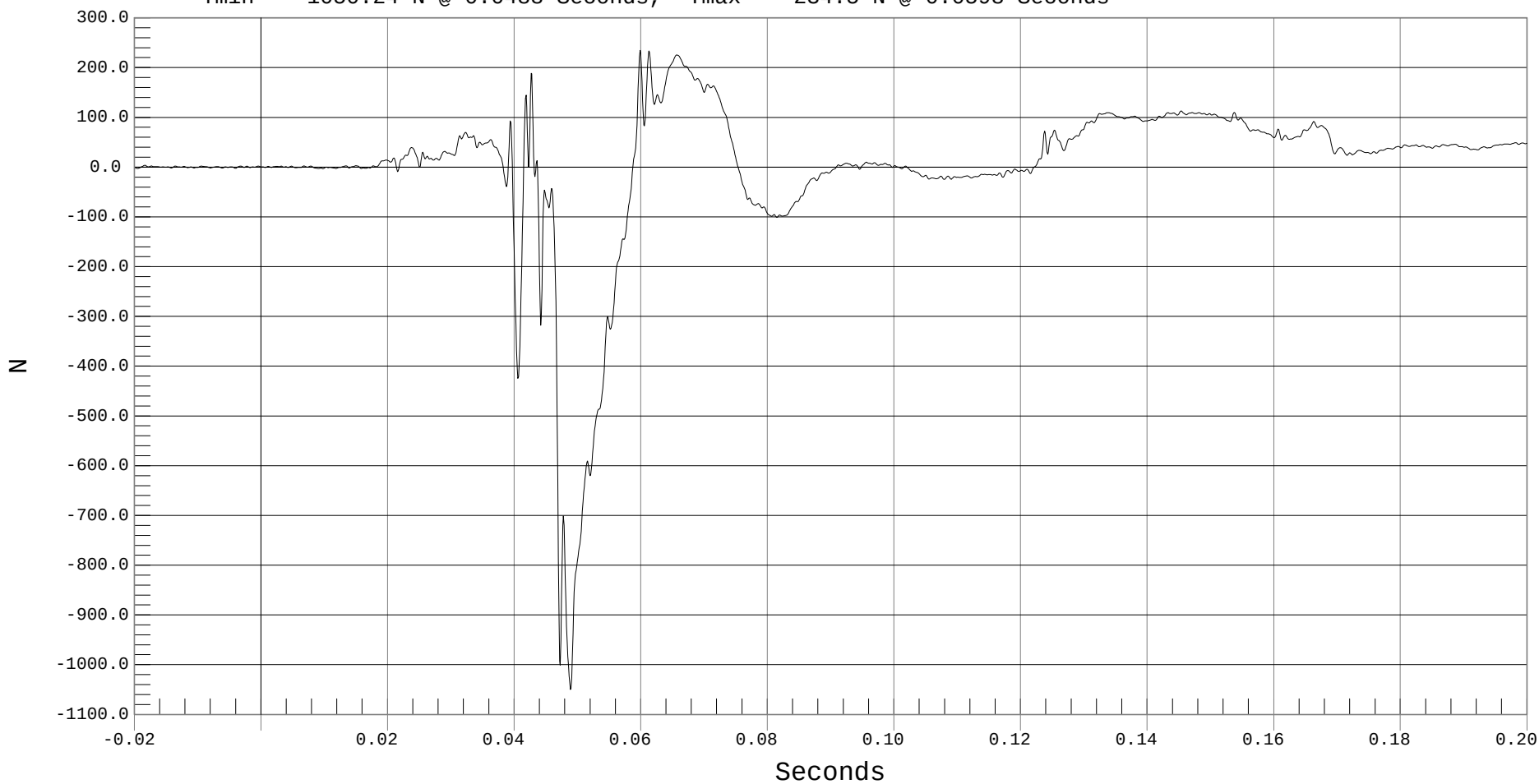
PASSENGER RIGHT FEMUR FORCE Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 REAR PASSENGER RIGHT FEMUR FORCE Y, B01105FF.F14

Ymin = -1050.24 N @ 0.0488 Seconds, Ymax = 234.5 N @ 0.0598 Seconds





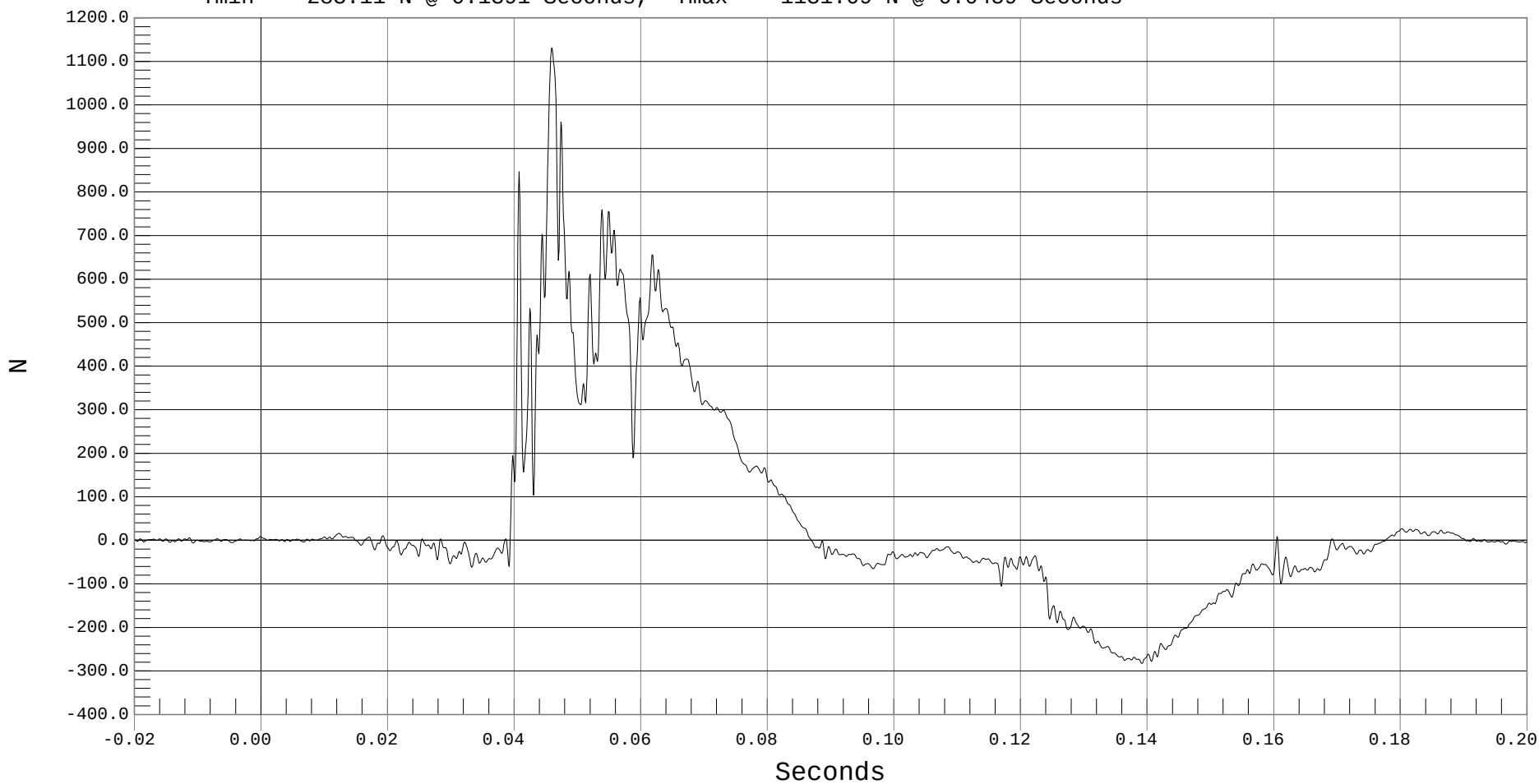
PASSENGER RIGHT FEMUR FORCE Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER RIGHT FEMUR FORCE Z, B01105FF.F15

Ymin = -283.11 N @ 0.1391 Seconds, Ymax = 1131.09 N @ 0.0459 Seconds





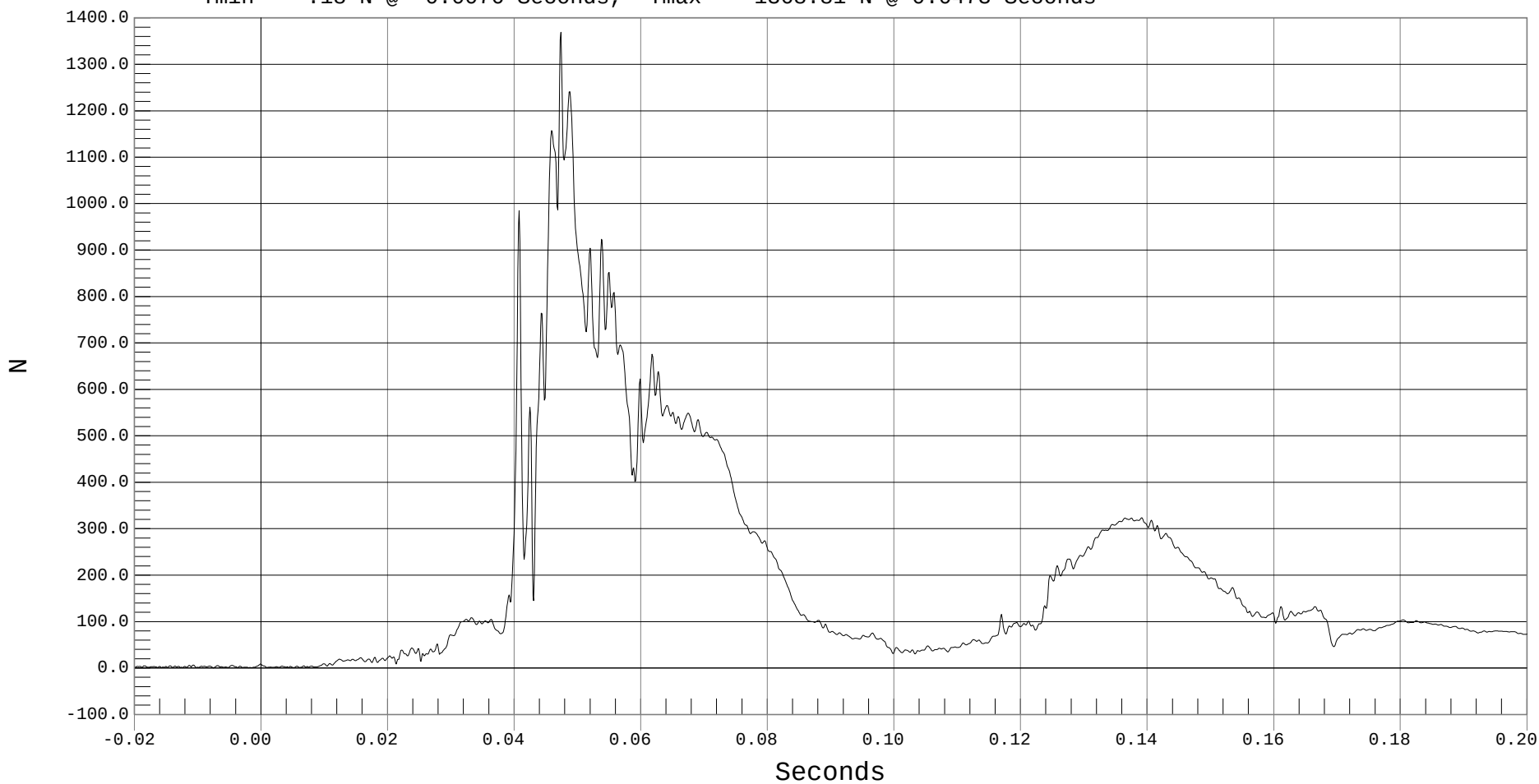
PASSENGER RIGHT FEMUR FORCE RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER RIGHT FEMUR FORCE RESULTANT, B01105FV.F14

Ymin = .18 N @ -0.0076 Seconds, Ymax = 1368.81 N @ 0.0473 Seconds





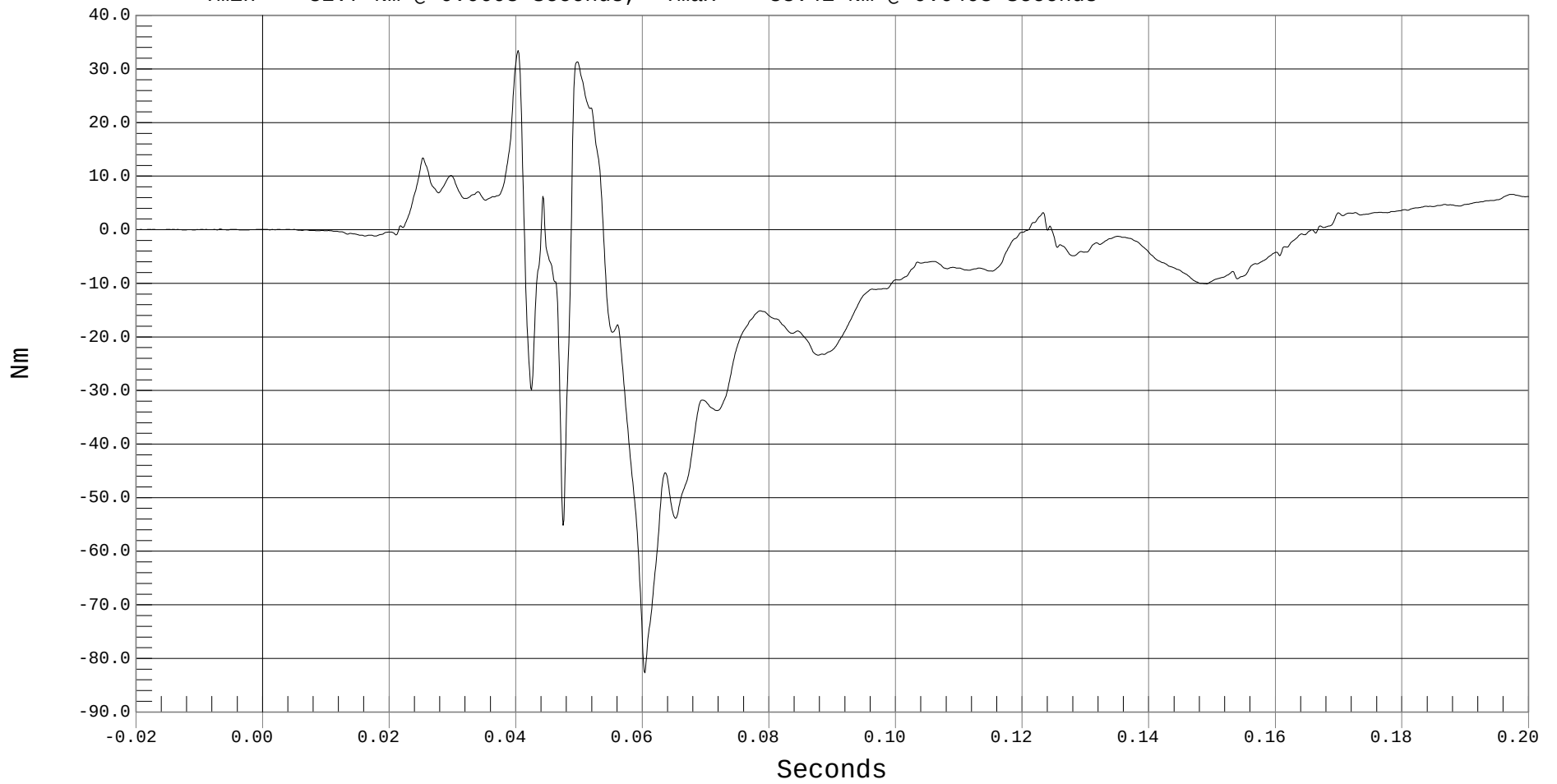
PASSENGER RIGHT FEMUR MOMENT X

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER RIGHT FEMUR MOMENT X, B01105FF.F16

Ymin = -82.7 Nm @ 0.0603 Seconds, Ymax = 33.41 Nm @ 0.0403 Seconds





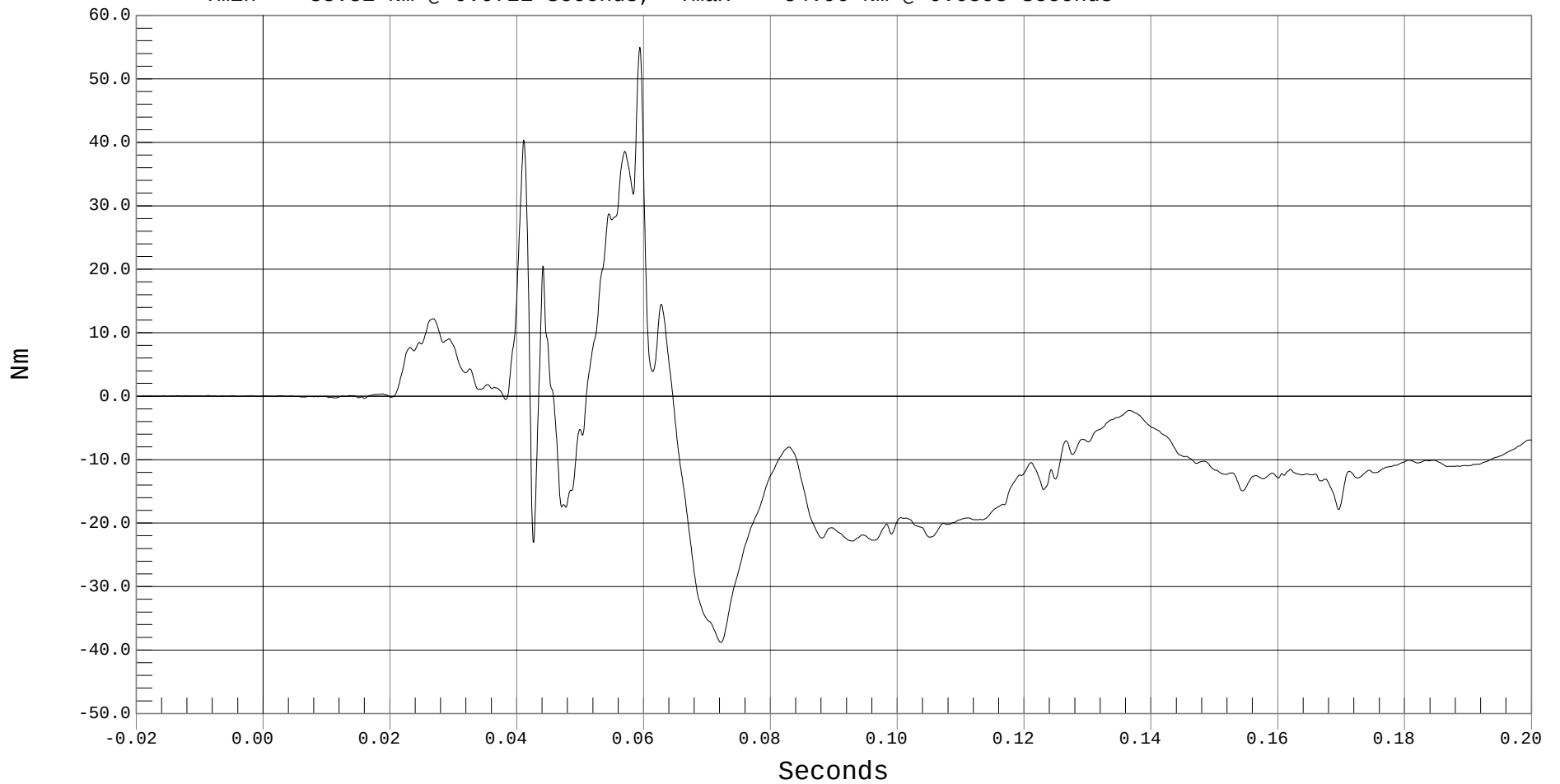
PASSENGER RIGHT FEMUR MOMENT Y

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER RIGHT FEMUR MOMENT Y, B01105FF.F17

Ymin = -38.81 Nm @ 0.0721 Seconds, Ymax = 54.96 Nm @ 0.0593 Seconds





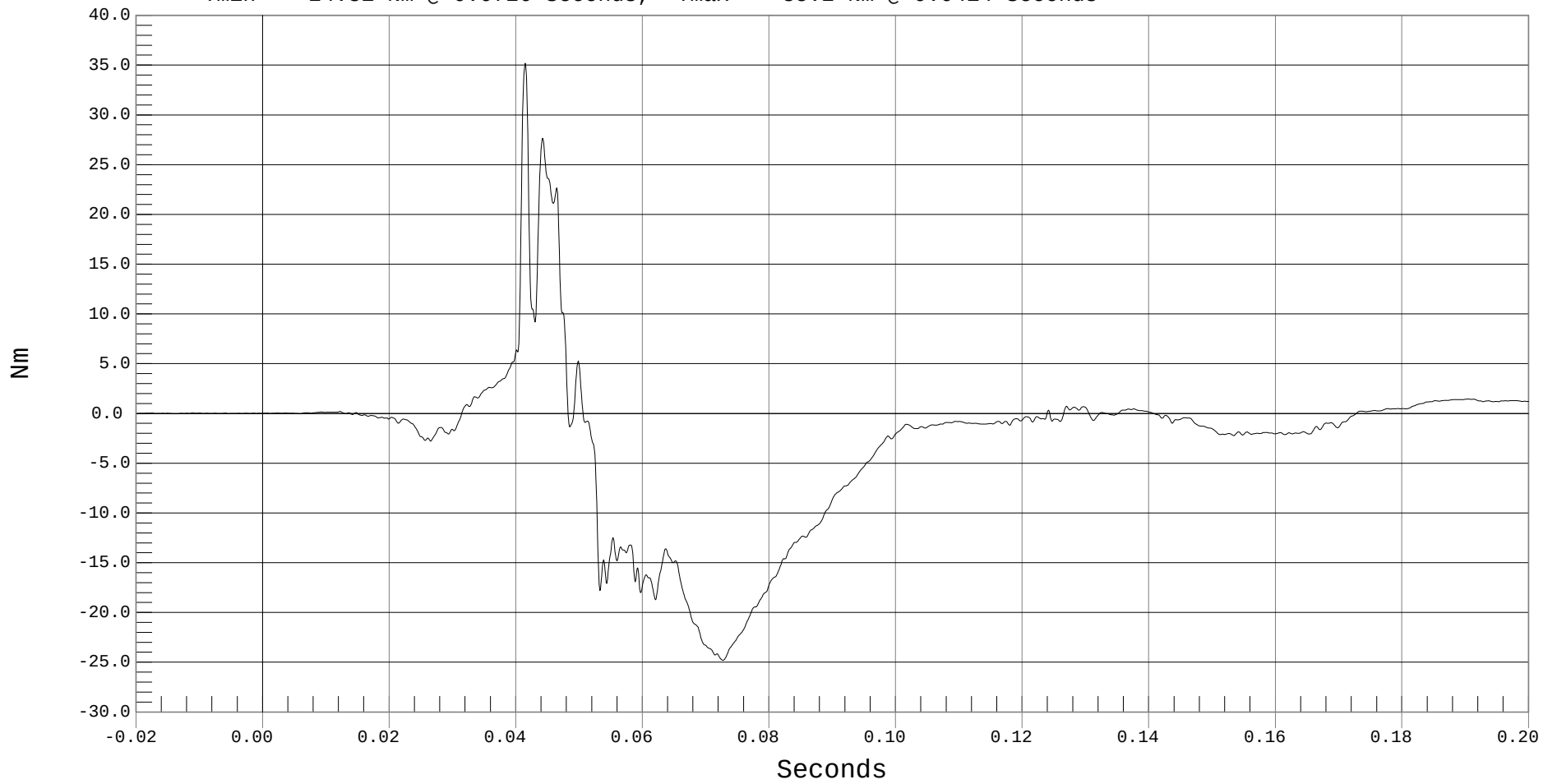
PASSENGER RIGHT FEMUR MOMENT Z

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

1 REAR PASSENGER RIGHT FEMUR MOMENT Z, B01105FF.F18

Ymin = -24.81 Nm @ 0.0726 Seconds, Ymax = 35.2 Nm @ 0.0414 Seconds





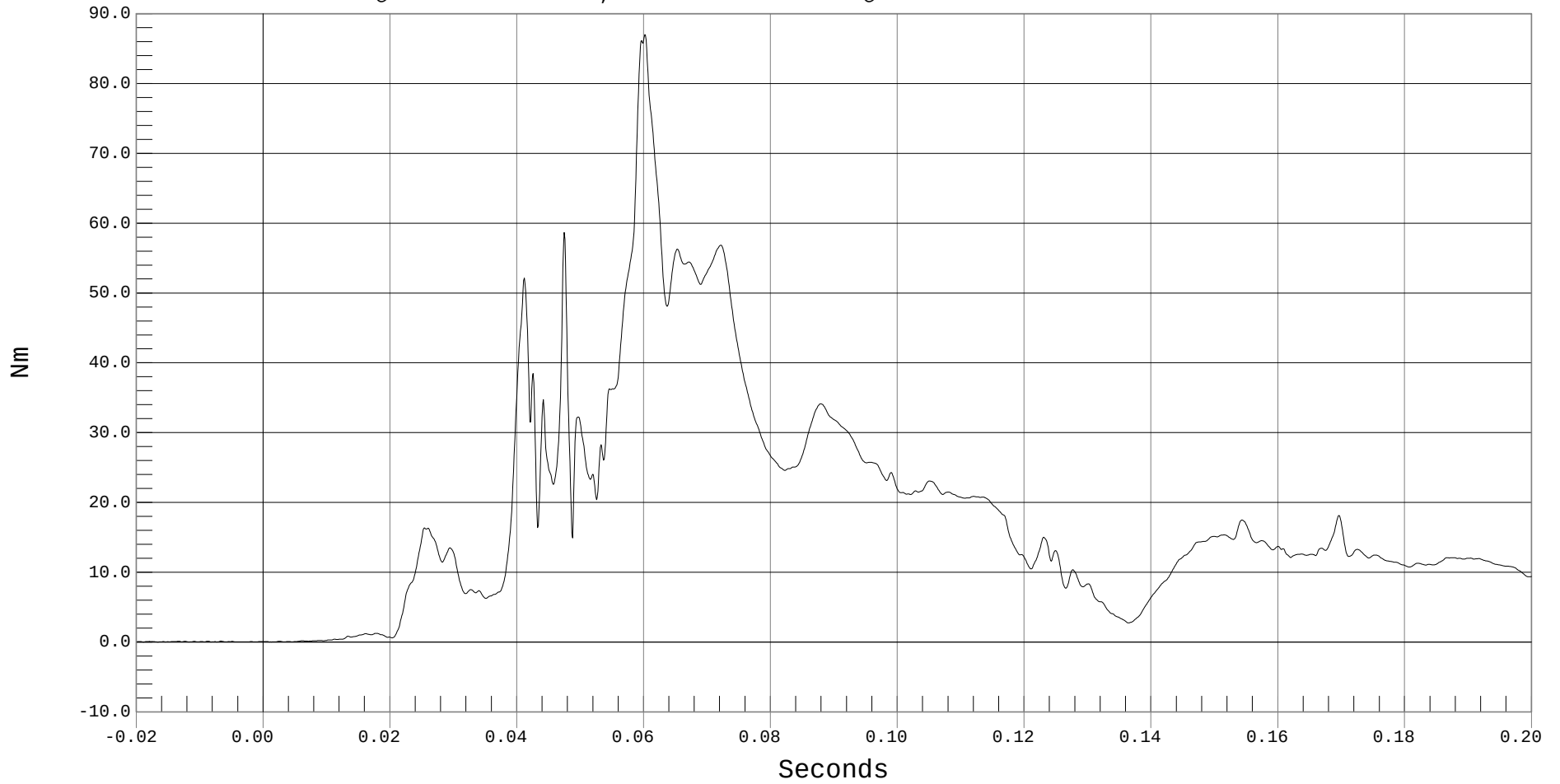
PASSENGER RIGHT FEMUR MOMENT RESULTANT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 600

— 1 PASSENGER RIGHT FEMUR MOMENT RESULTANT, B01105FV.F16

Ymin = 0 Nm @ -0.0118 Seconds, Ymax = 87.04 Nm @ 0.0601 Seconds





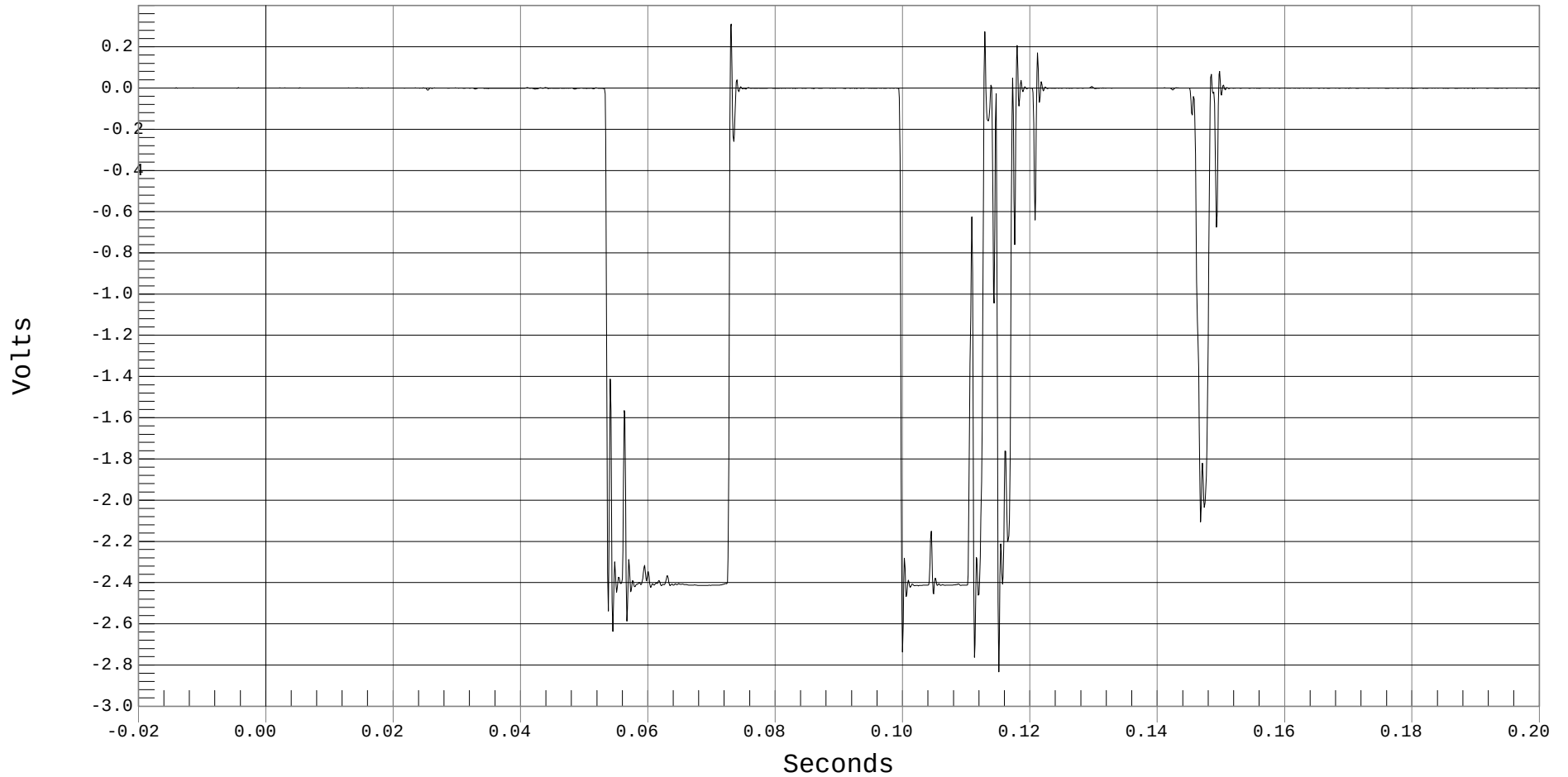
PASSENGER HEAD CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER HEAD CONTACT, B011050T.075

Ymin = -2.83 Volts @ 0.1150 Seconds, Ymax = .31 Volts @ 0.0730 Seconds





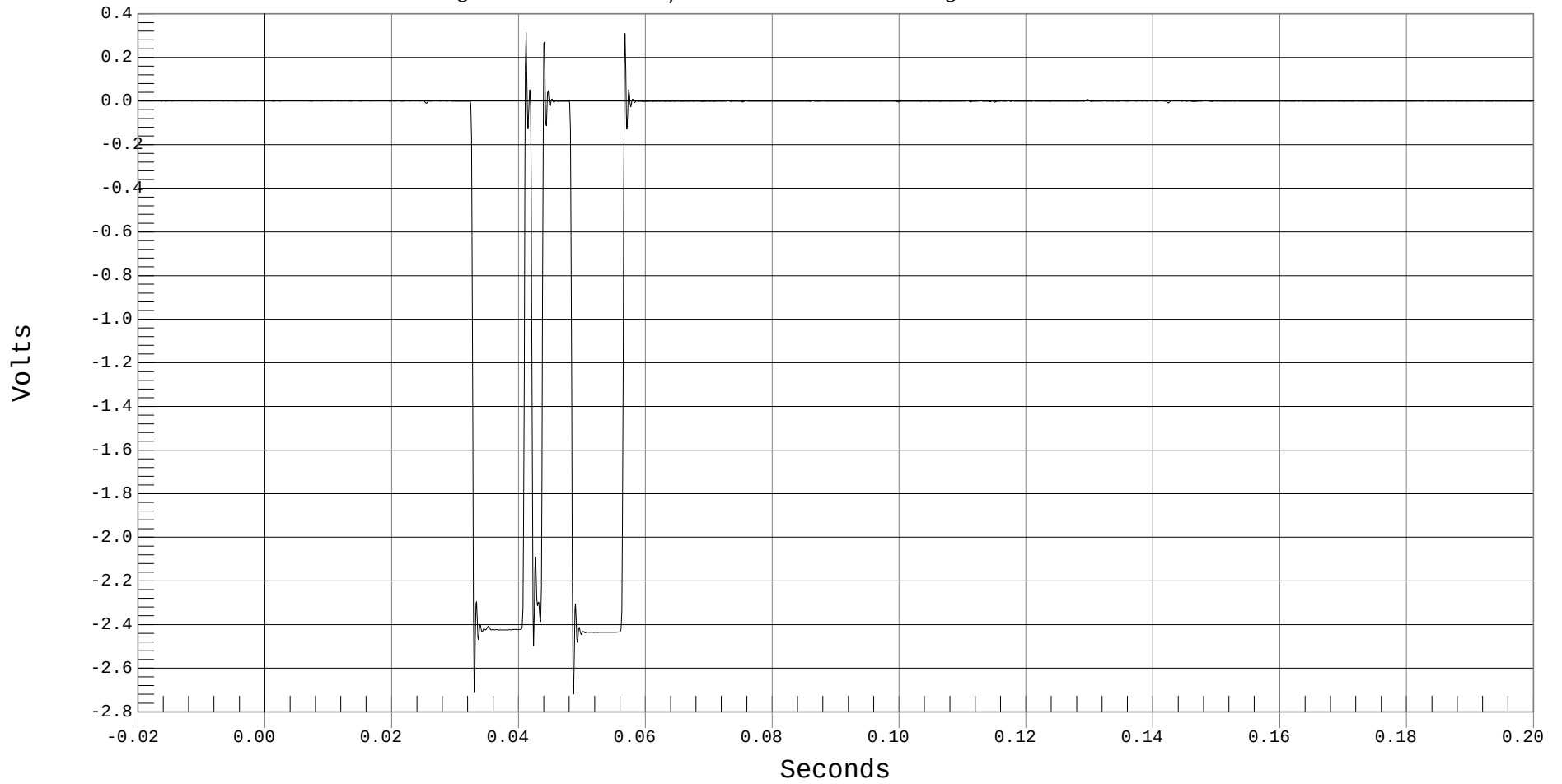
PASSENGER ARM CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER ARM CONTACT, B011050T.076

Ymin = -2.72 Volts @ 0.0486 Seconds, Ymax = .31 Volts @ 0.0411 Seconds





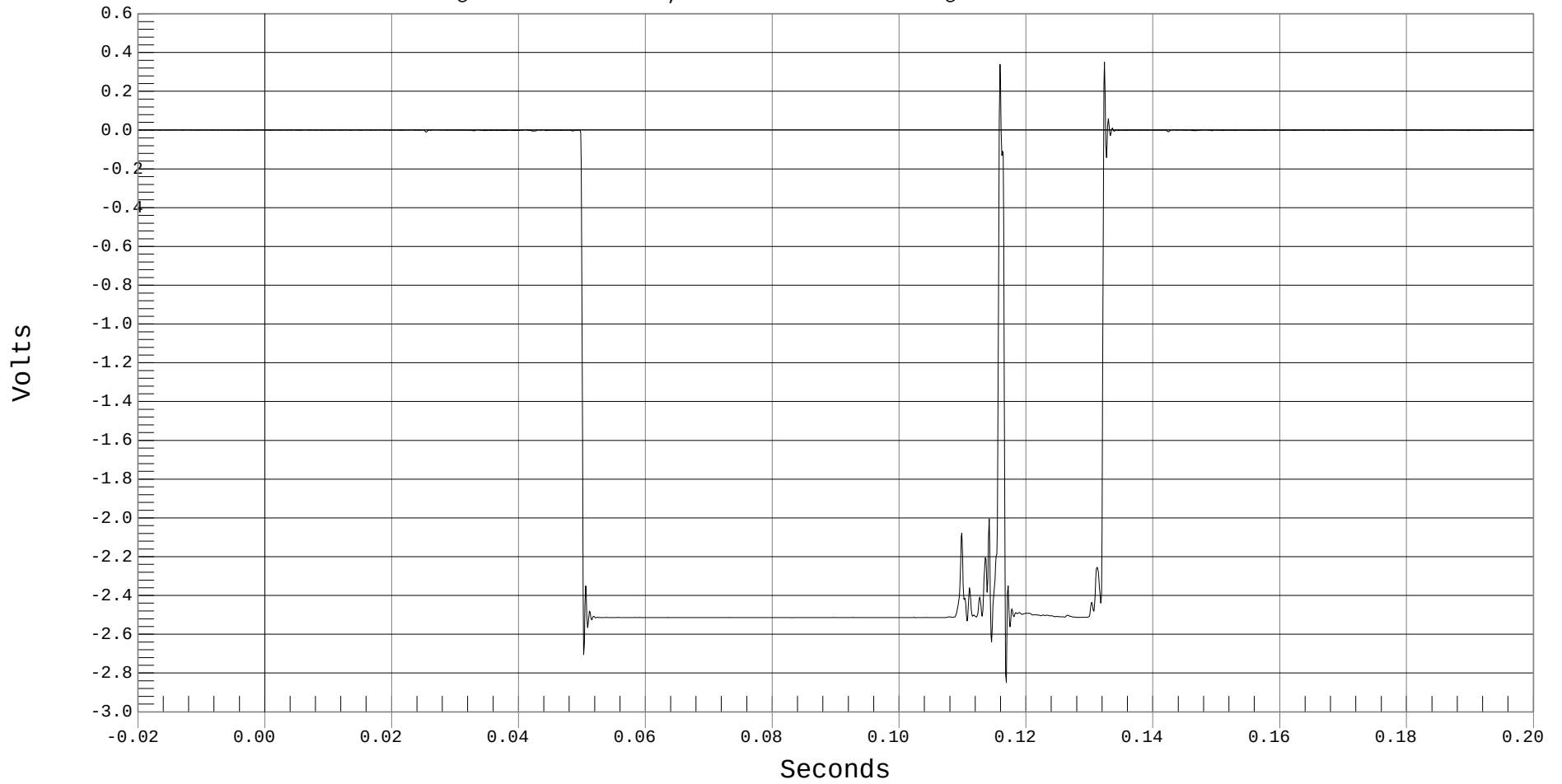
PASSENGER RIB CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER RIB CONTACT, B011050T.077

Ymin = -2.85 Volts @ 0.1168 Seconds, Ymax = .35 Volts @ 0.1323 Seconds





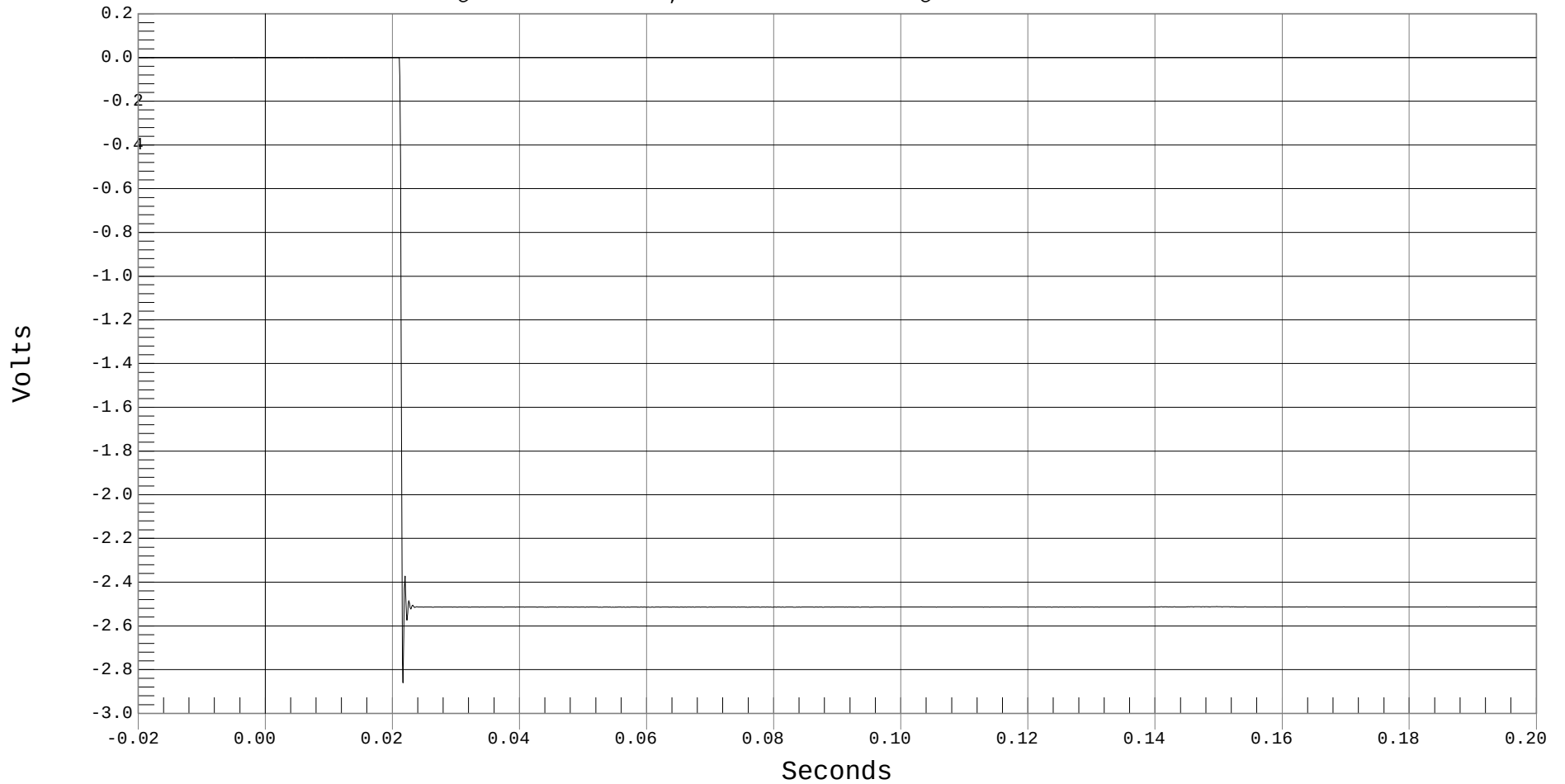
PASSENGER PELVIS CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 REAR PASSENGER PELVIS CONTACT, B011050T.078

Ymin = -2.86 Volts @ 0.0216 Seconds, Ymax = 0 Volts @ -0.0011 Seconds





RIGHT SIDE SILL AT FRONT SEAT X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

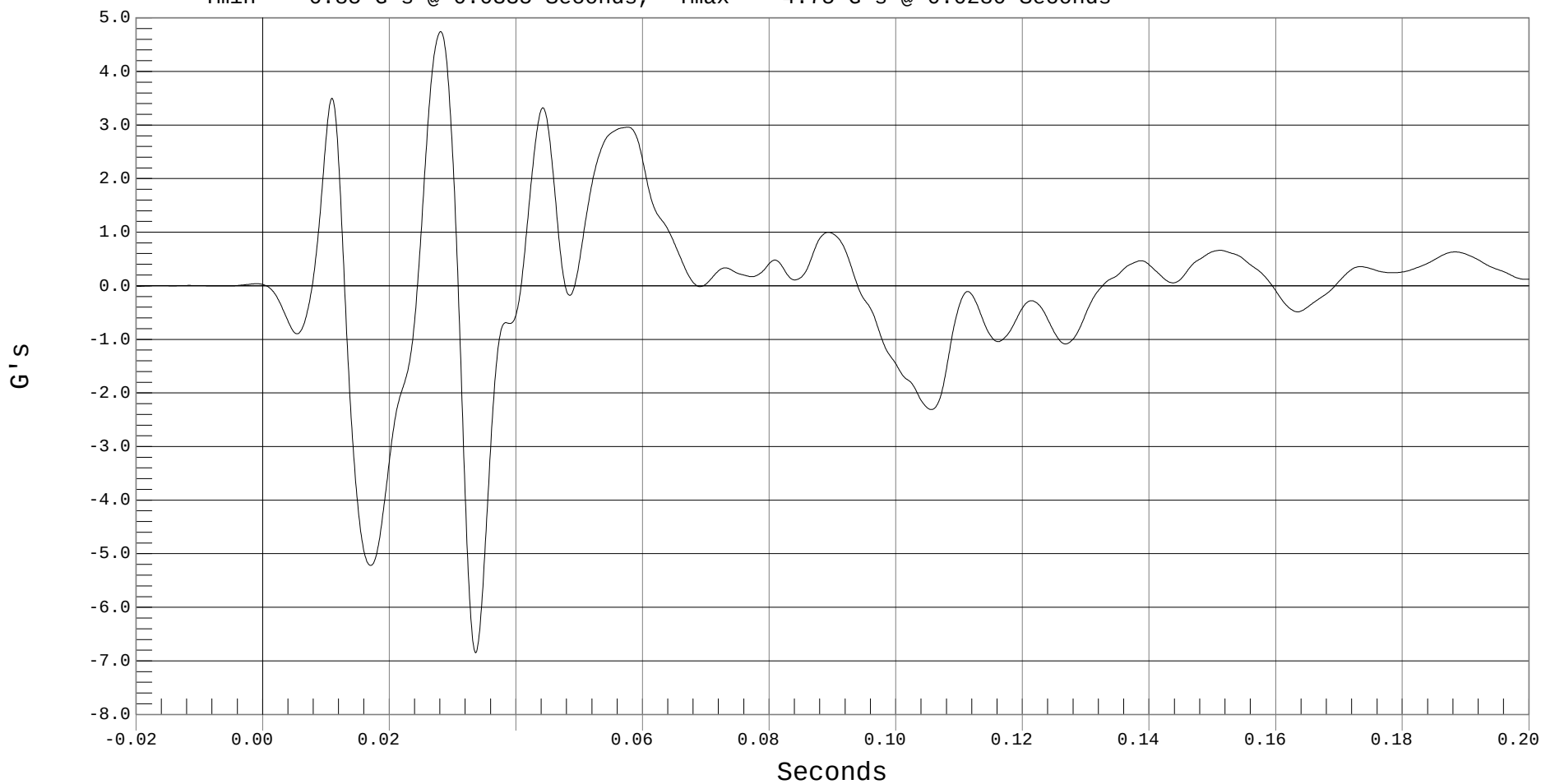
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 RIGHT FRONT SILL X, B01105AF.A25

Ymin = -6.85 G's @ 0.0335 Seconds, Ymax = 4.75 G's @ 0.0280 Seconds





RIGHT SIDE SILL AT FRONT SEAT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

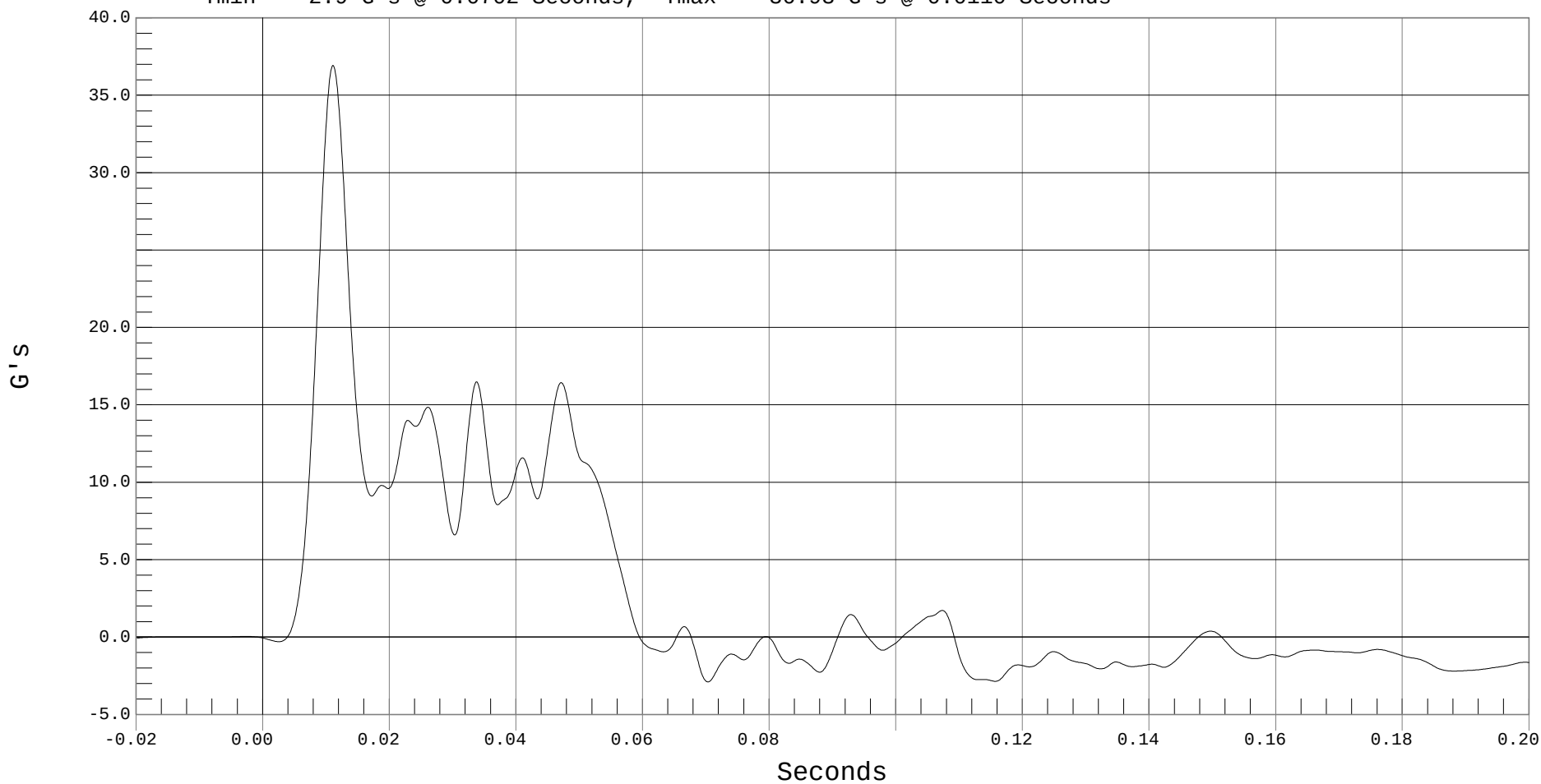
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 RIGHT FRONT SILL Y, B01105AF.A26

Ymin = -2.9 G's @ 0.0702 Seconds, Ymax = 36.93 G's @ 0.0110 Seconds





RIGHT SIDE SILL AT FRONT SEAT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

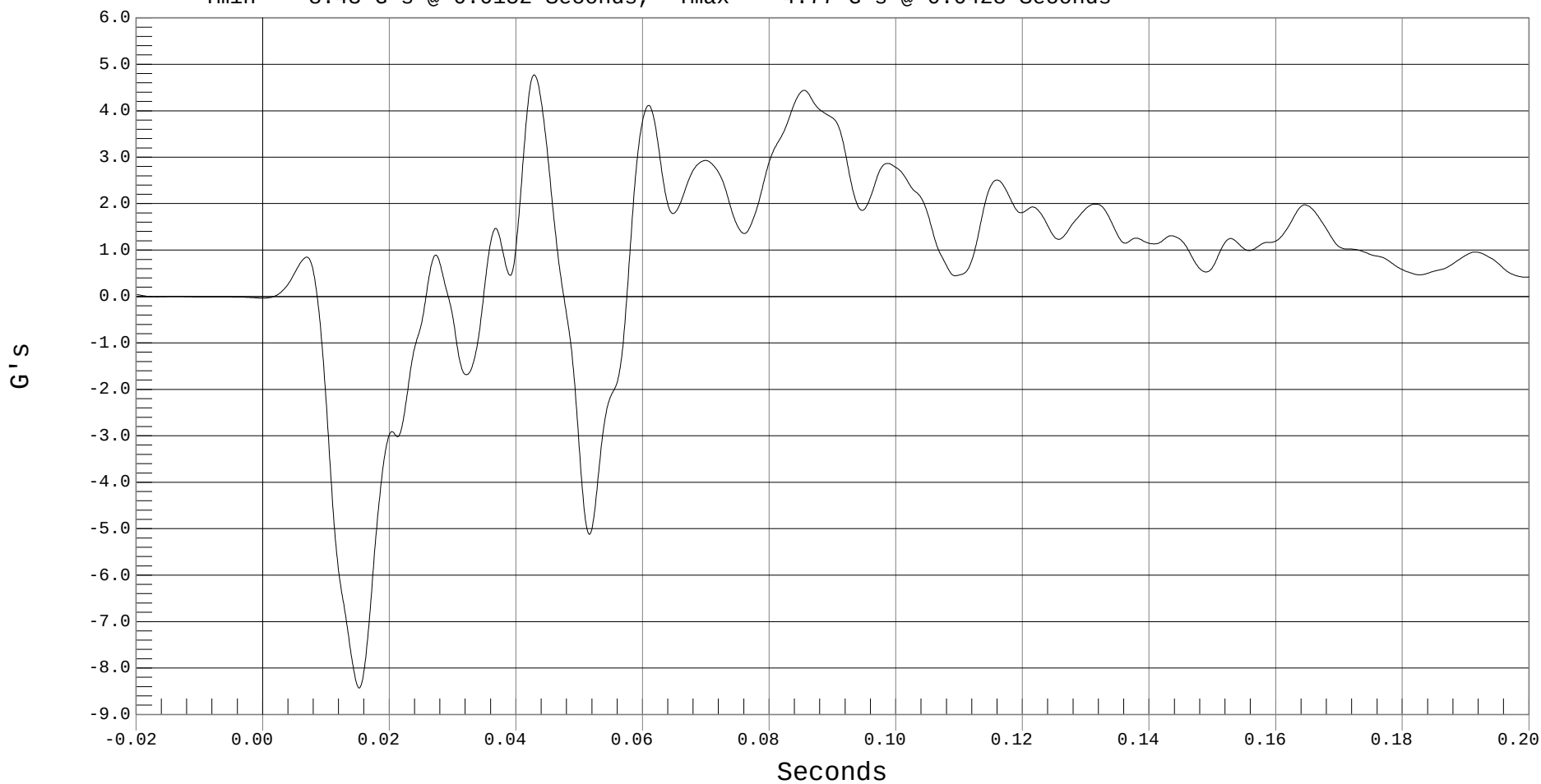
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 RIGHT FRONT SILL Z, B01105AF.A27

Ymin = -8.43 G's @ 0.0152 Seconds, Ymax = 4.77 G's @ 0.0428 Seconds





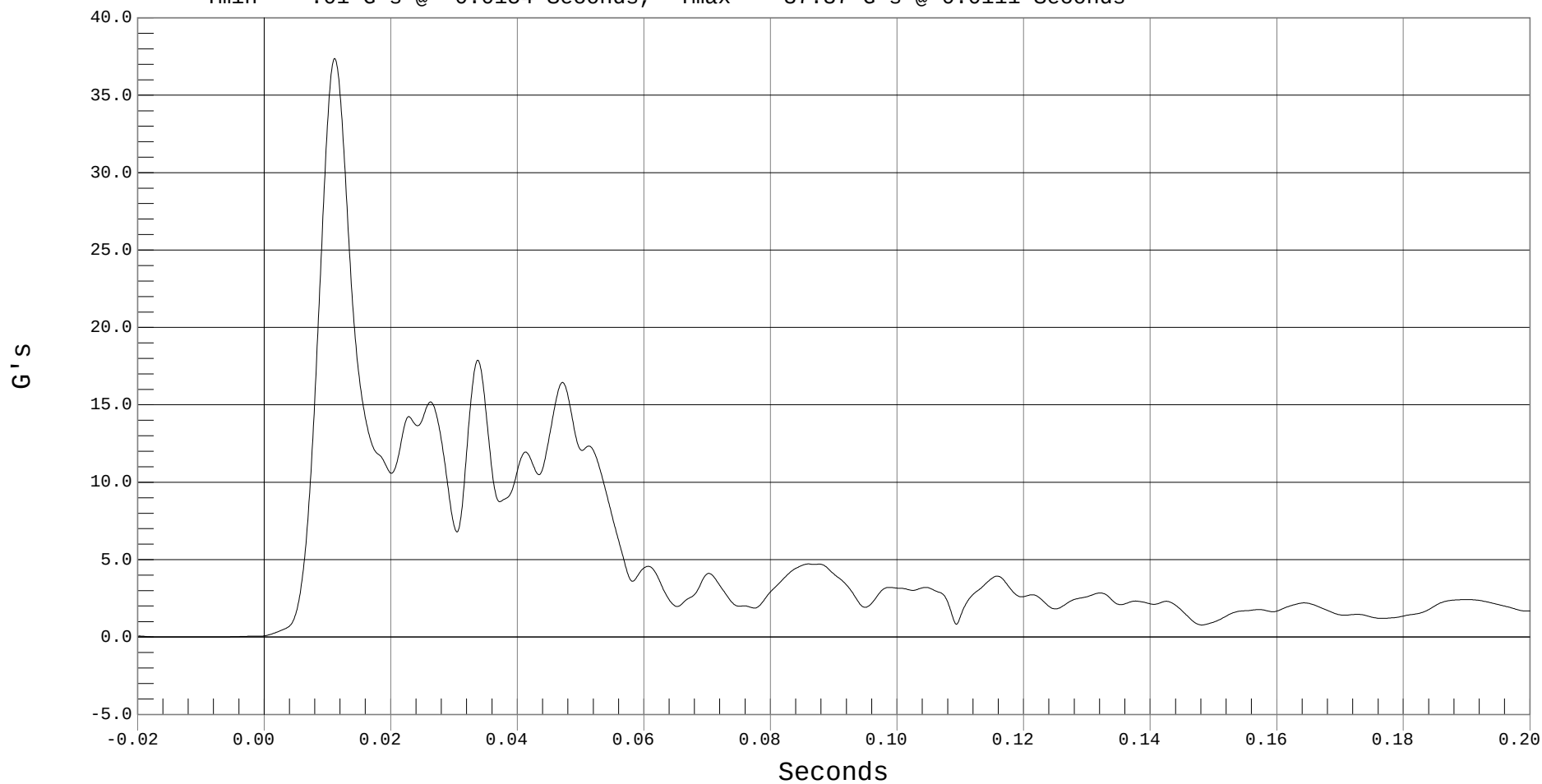
RIGHT SIDE SILL AT FRONT SEAT RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 RIGHT FRONT SILL RESULTANT ACCELERATION, B01105AV.A25

Ymin = .01 G's @ -0.0154 Seconds, Ymax = 37.37 G's @ 0.0111 Seconds





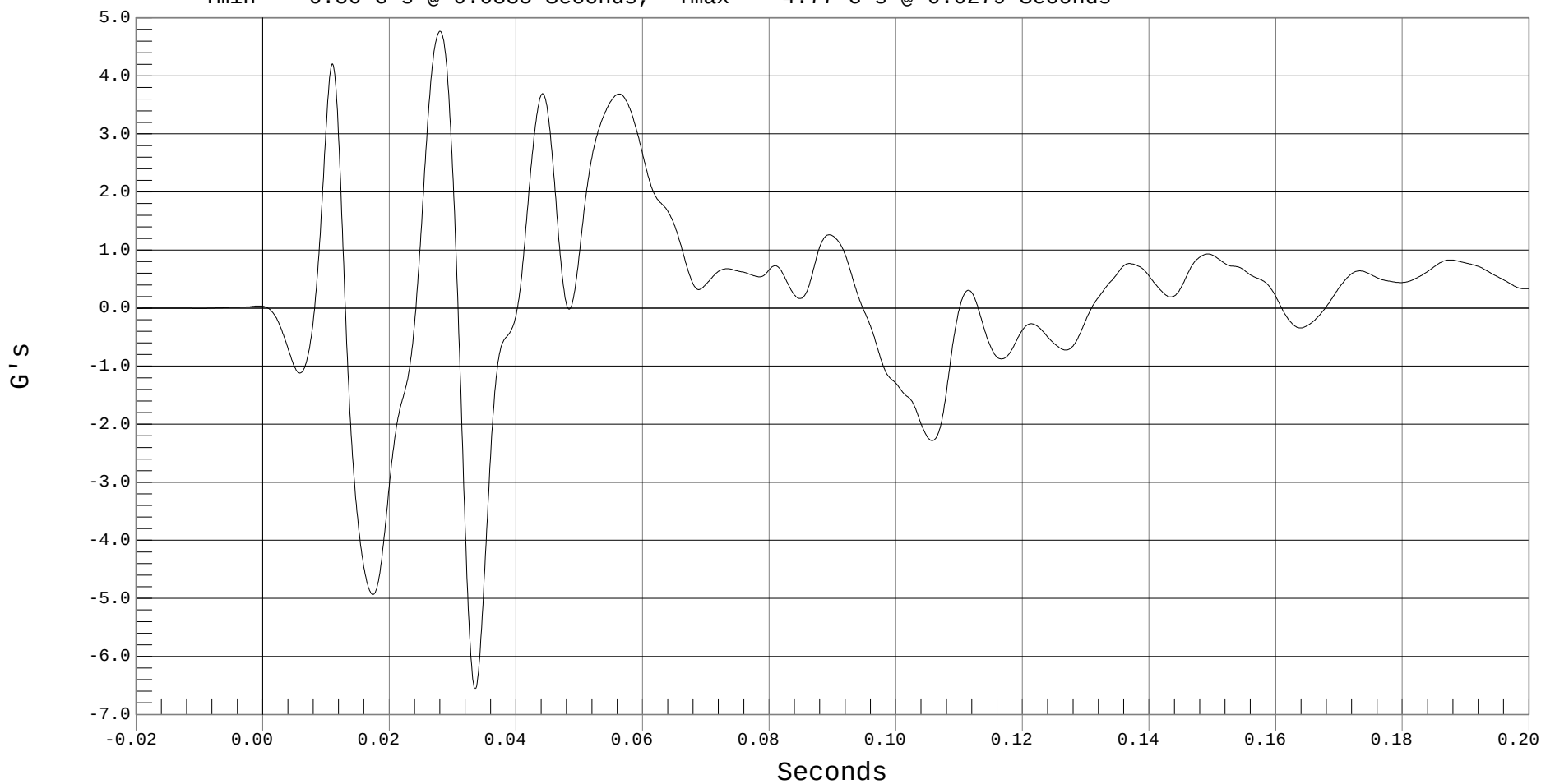
RIGHT SIDE SILL AT REAR SEAT X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 RIGHT REAR SILL X, B01105AF.A28

Ymin = -6.56 G's @ 0.0335 Seconds, Ymax = 4.77 G's @ 0.0279 Seconds





RIGHT SIDE SILL AT REAR SEAT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

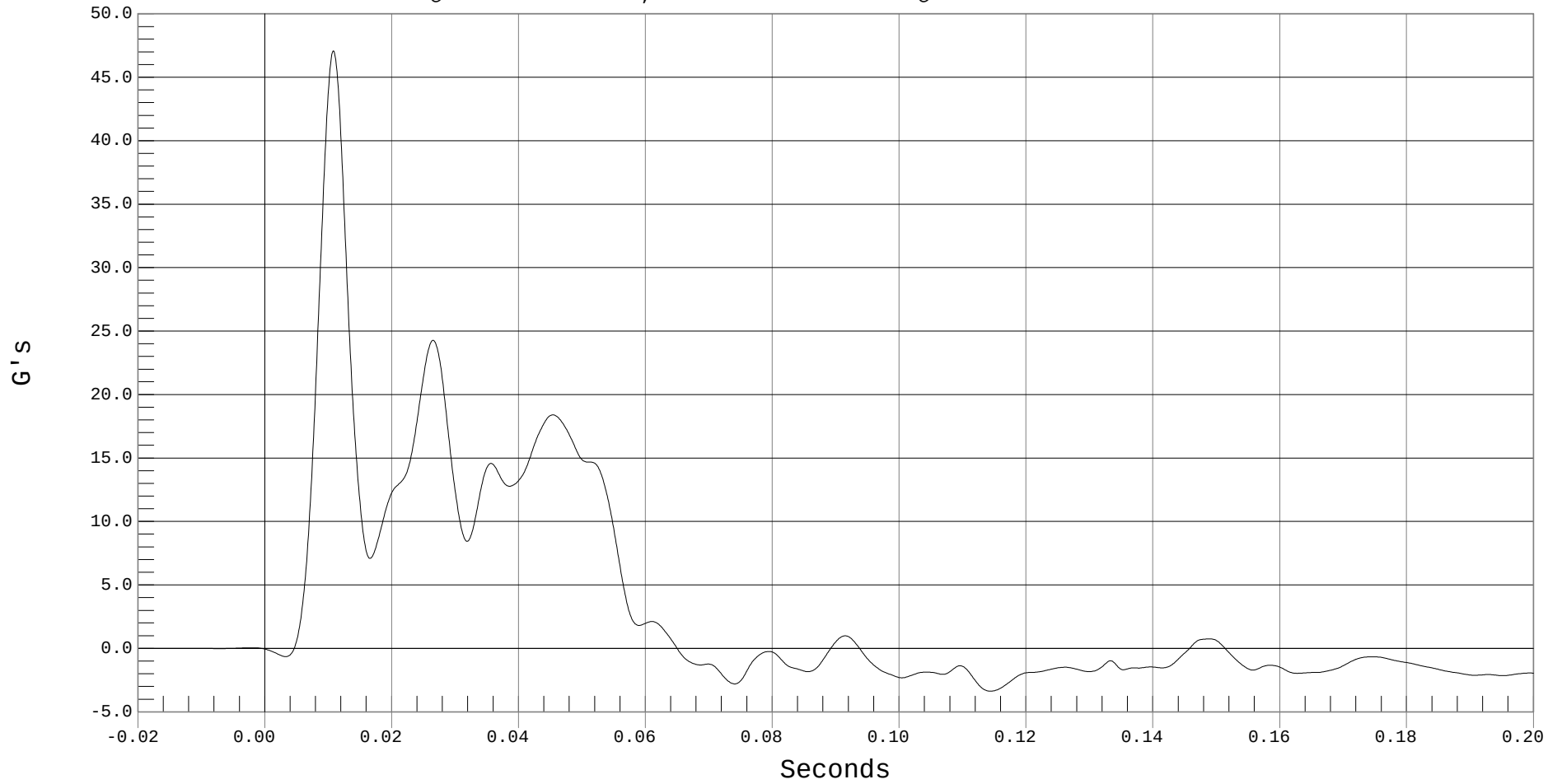
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 RIGHT REAR SILL Y, B01105AF.A29

Ymin = -3.37 G's @ 0.1143 Seconds, Ymax = 47.07 G's @ 0.0107 Seconds





RIGHT SIDE SILL AT REAR SEAT Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

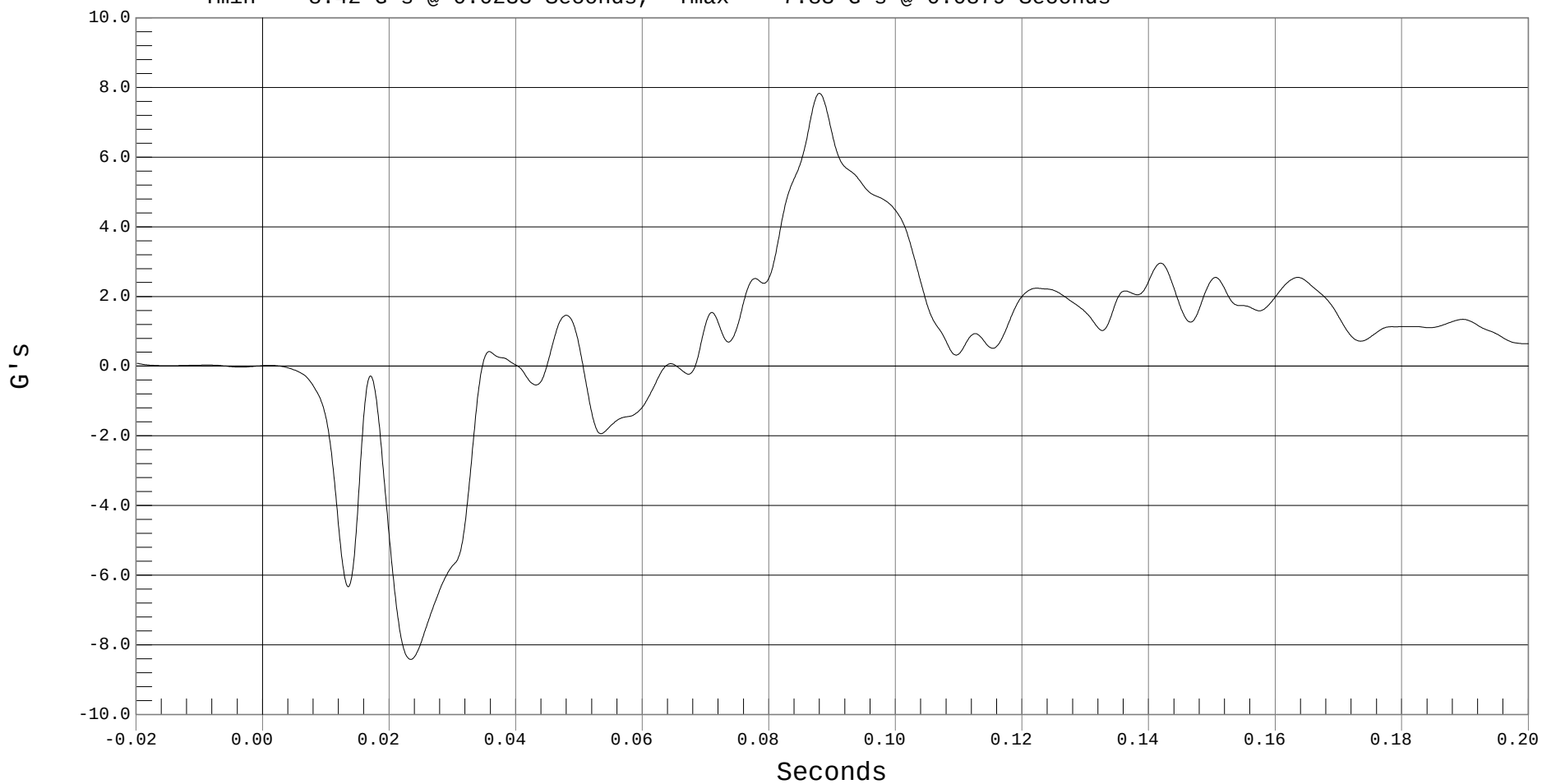
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 RIGHT REAR SILL Z, B01105AF.A30

Ymin = -8.42 G's @ 0.0233 Seconds, Ymax = 7.83 G's @ 0.0879 Seconds





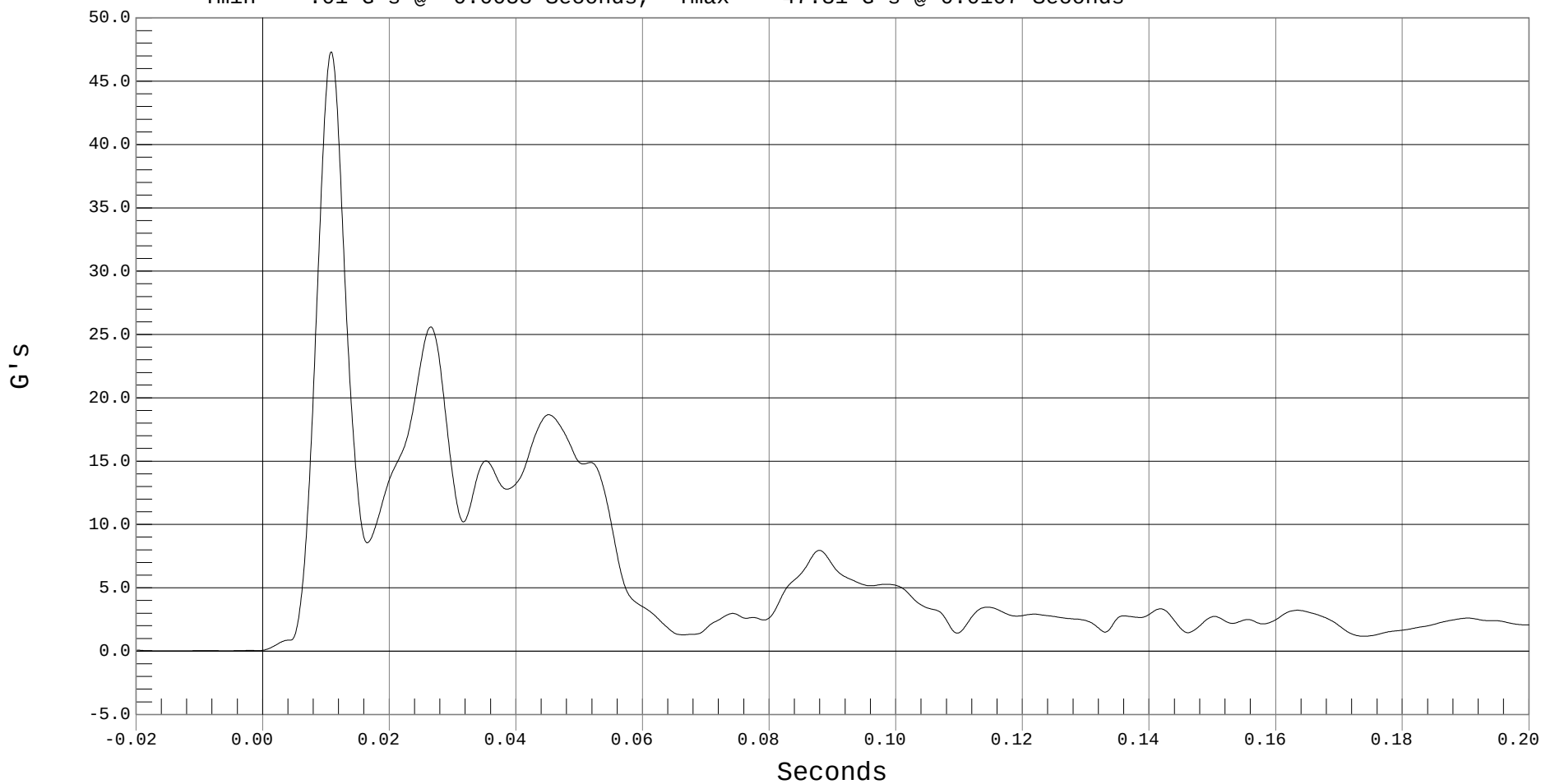
RIGHT SIDE SILL AT REAR SEAT RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 RIGHT REAR SILL RESULTANT ACCELERATION, B01105AV.A28

Ymin = .01 G's @ -0.0058 Seconds, Ymax = 47.31 G's @ 0.0107 Seconds





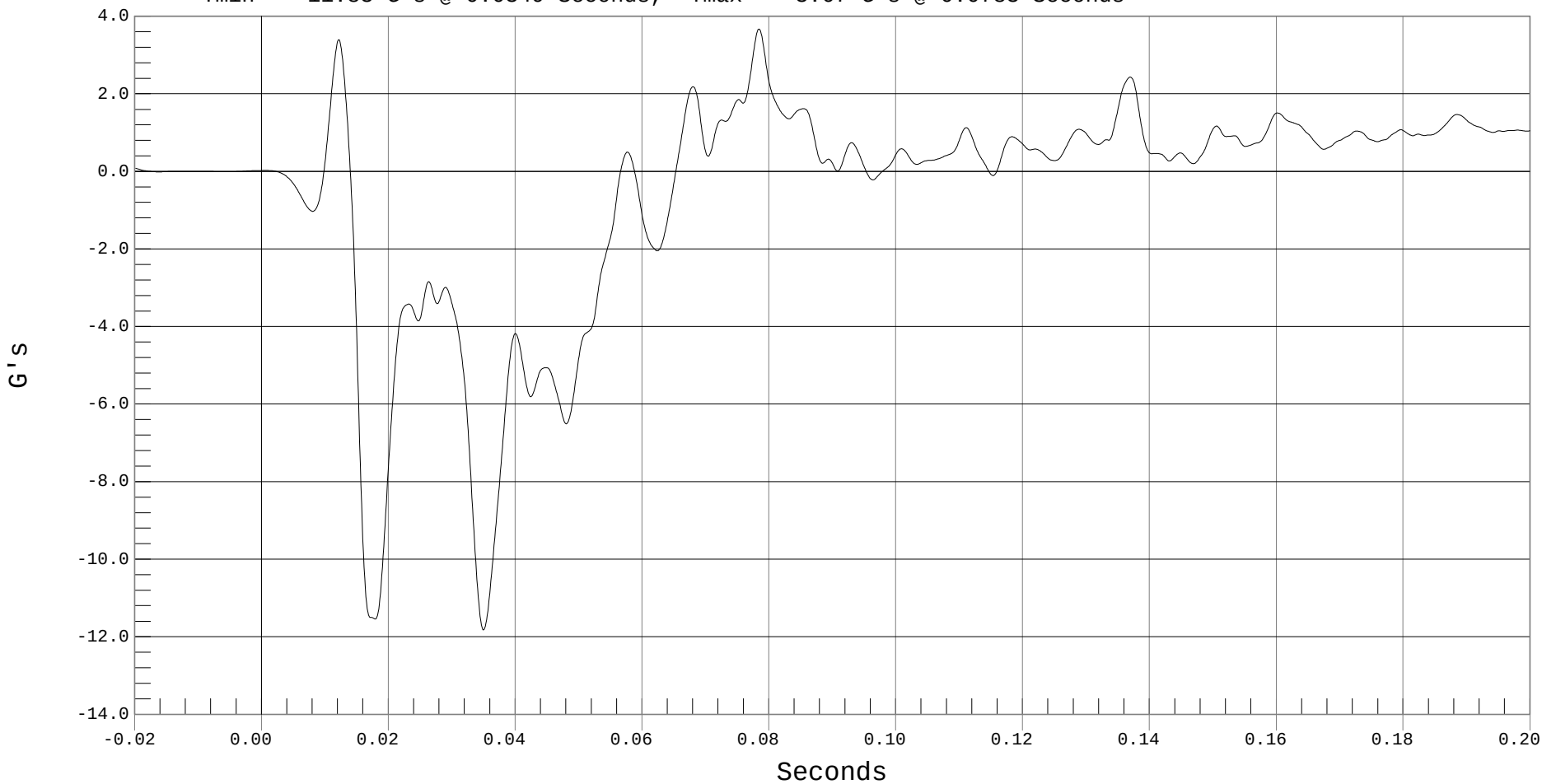
REAR FLOORPAN ABOVE AXLE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 FLOORPAN @ REAR AXLE X, B01105AF.A34

Ymin = -11.83 G's @ 0.0349 Seconds, Ymax = 3.67 G's @ 0.0783 Seconds





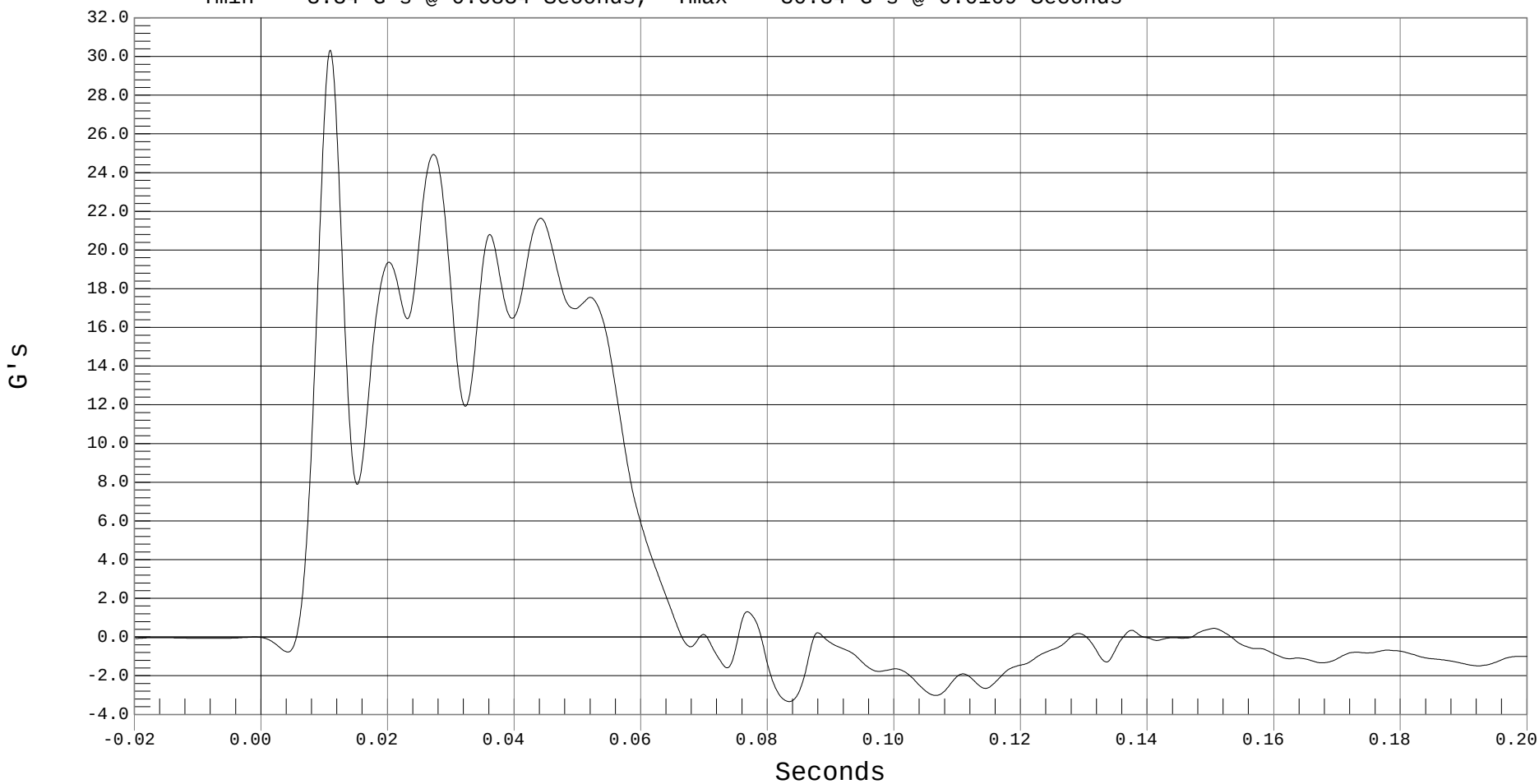
REAR FLOORPAN ABOVE AXLE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 FLOORPAN @ REAR AXLE Y, B01105AF.A35

Ymin = -3.34 G's @ 0.0834 Seconds, Ymax = 30.34 G's @ 0.0109 Seconds





REAR FLOORPAN ABOVE AXLE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

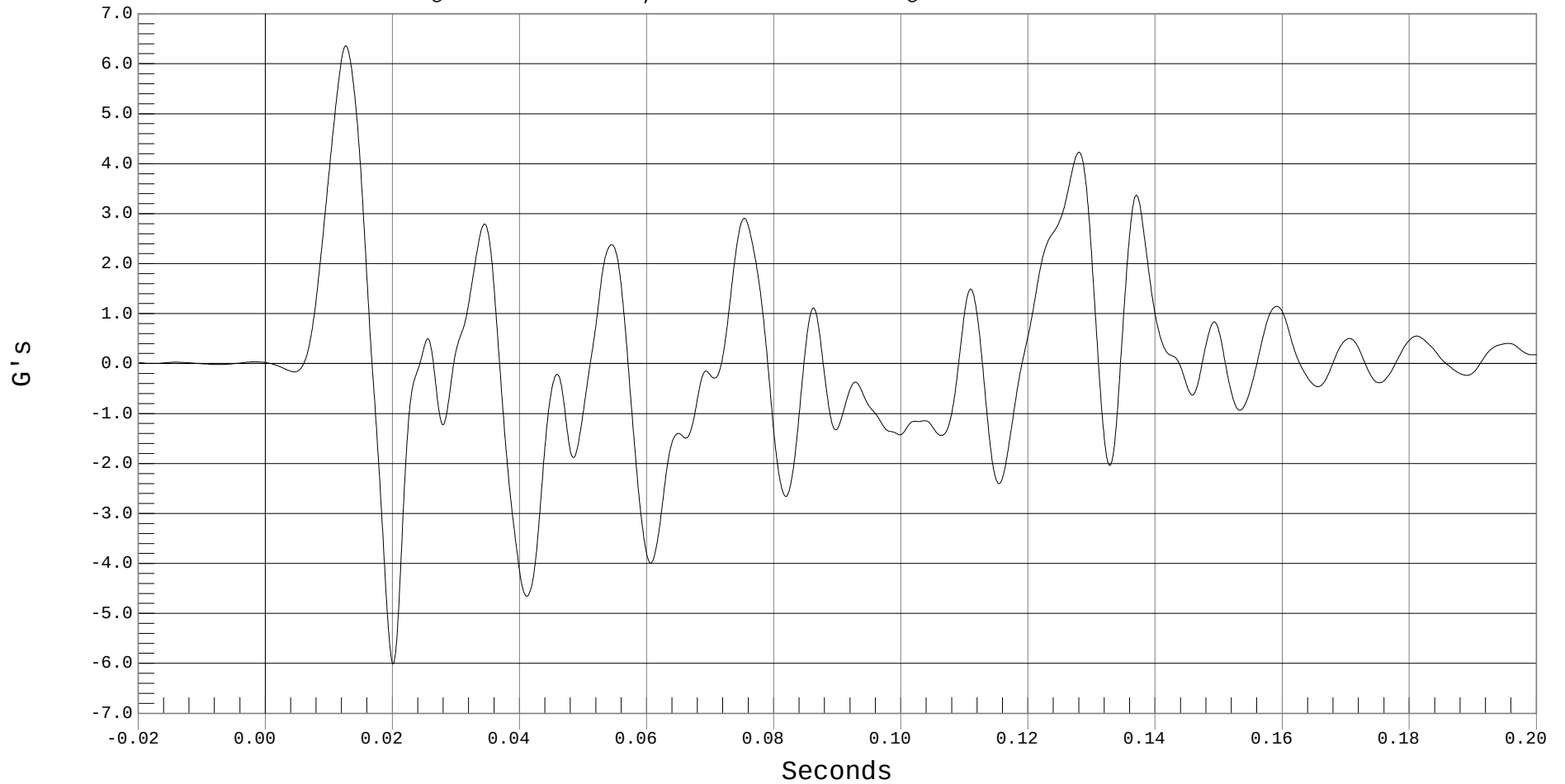
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 FLOORPAN @ REAR AXLE Z, B01105AF.A36

Ymin = -6.01 G's @ 0.0200 Seconds, Ymax = 6.36 G's @ 0.0126 Seconds





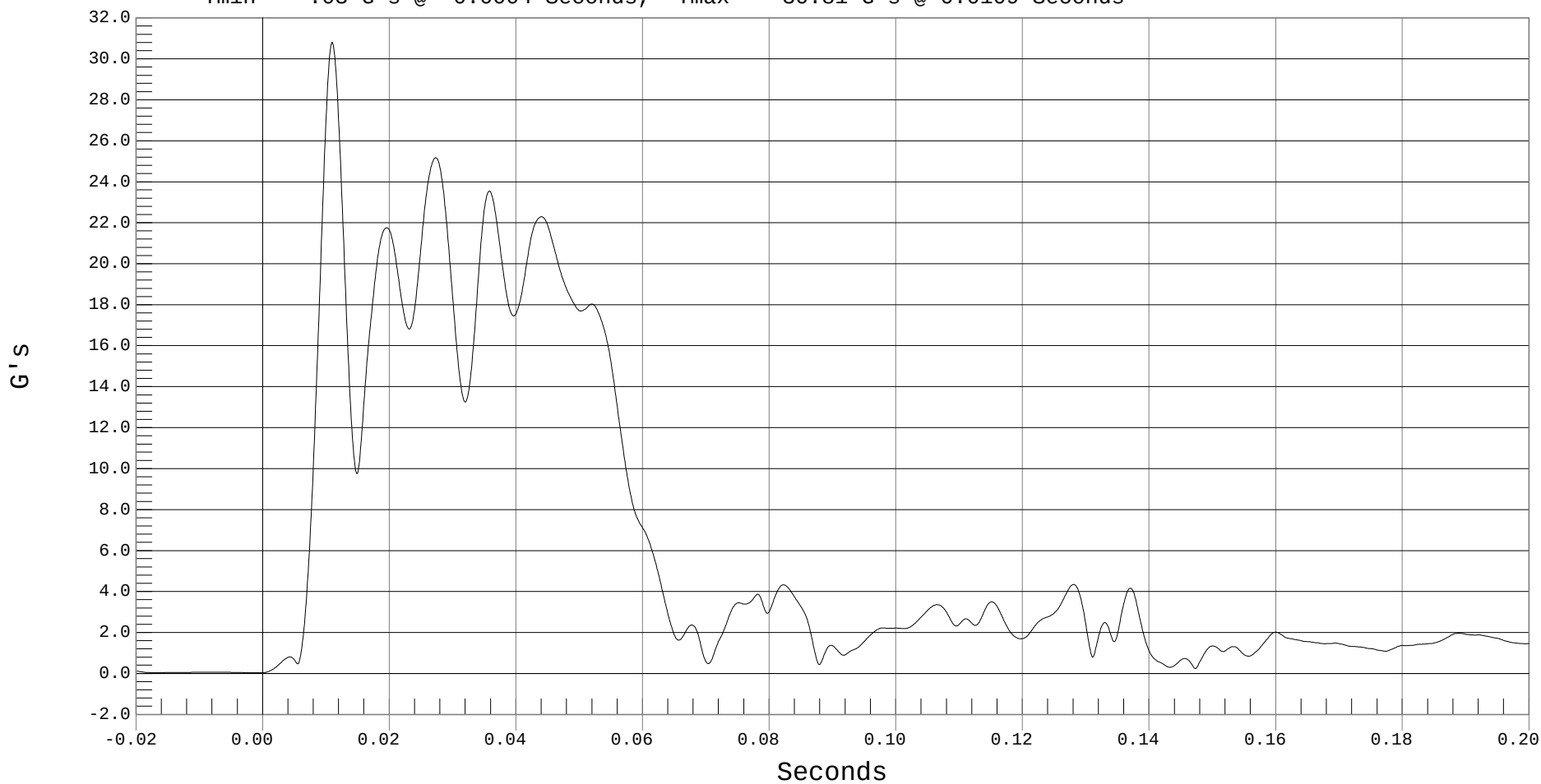
REAR FLOORPAN ABOVE AXLE RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 FLOORPAN @ REAR AXLE ACCELERATION, B01105AV.A34

Ymin = .03 G's @ -0.0004 Seconds, Ymax = 30.81 G's @ 0.0109 Seconds





LEFT SIDE SILL AT FRONT SEAT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

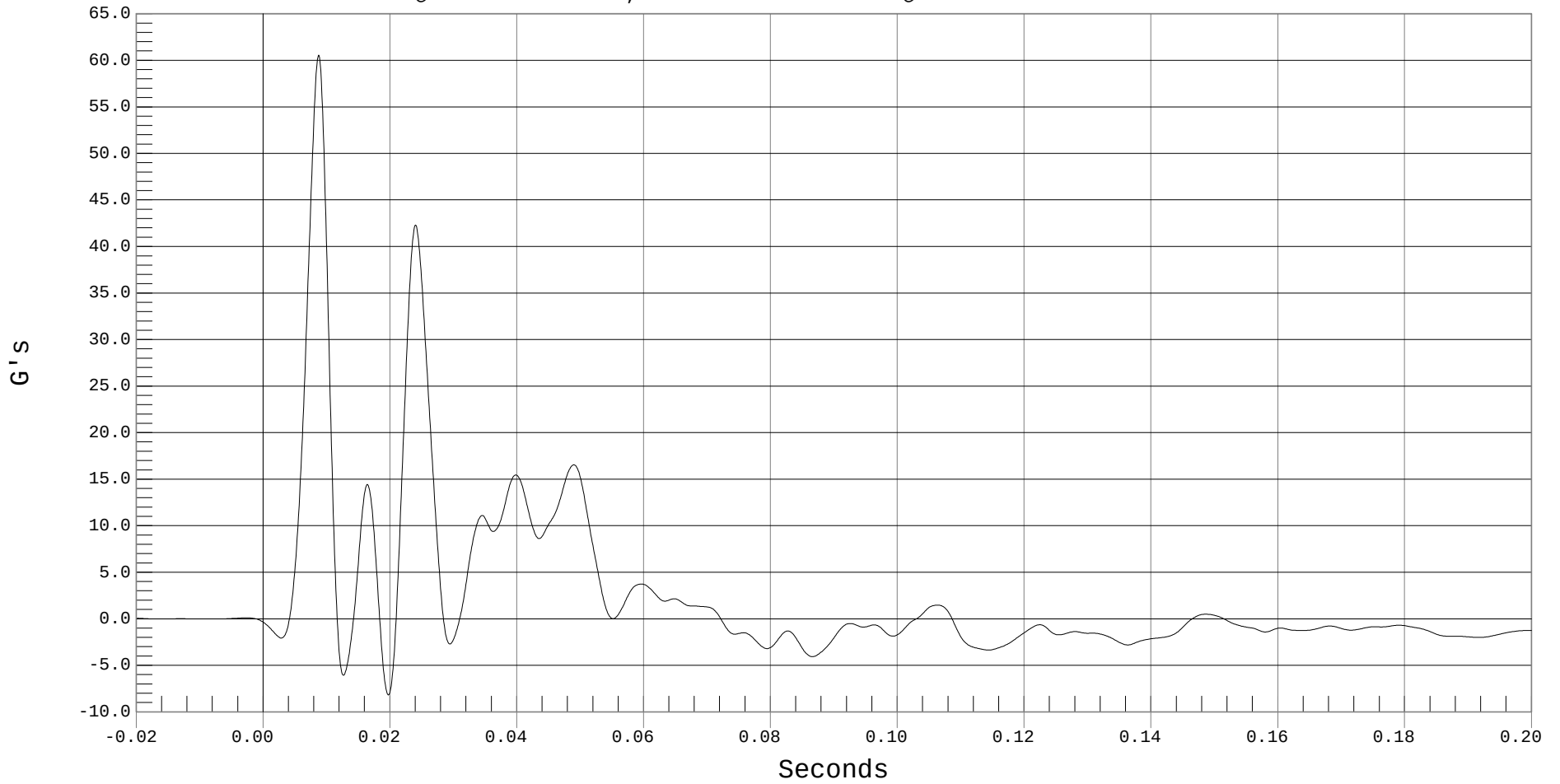
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 LEFT FRONT SILL Y, B01105AF.A31

Ymin = -8.2 G's @ 0.0197 Seconds, Ymax = 60.55 G's @ 0.0087 Seconds





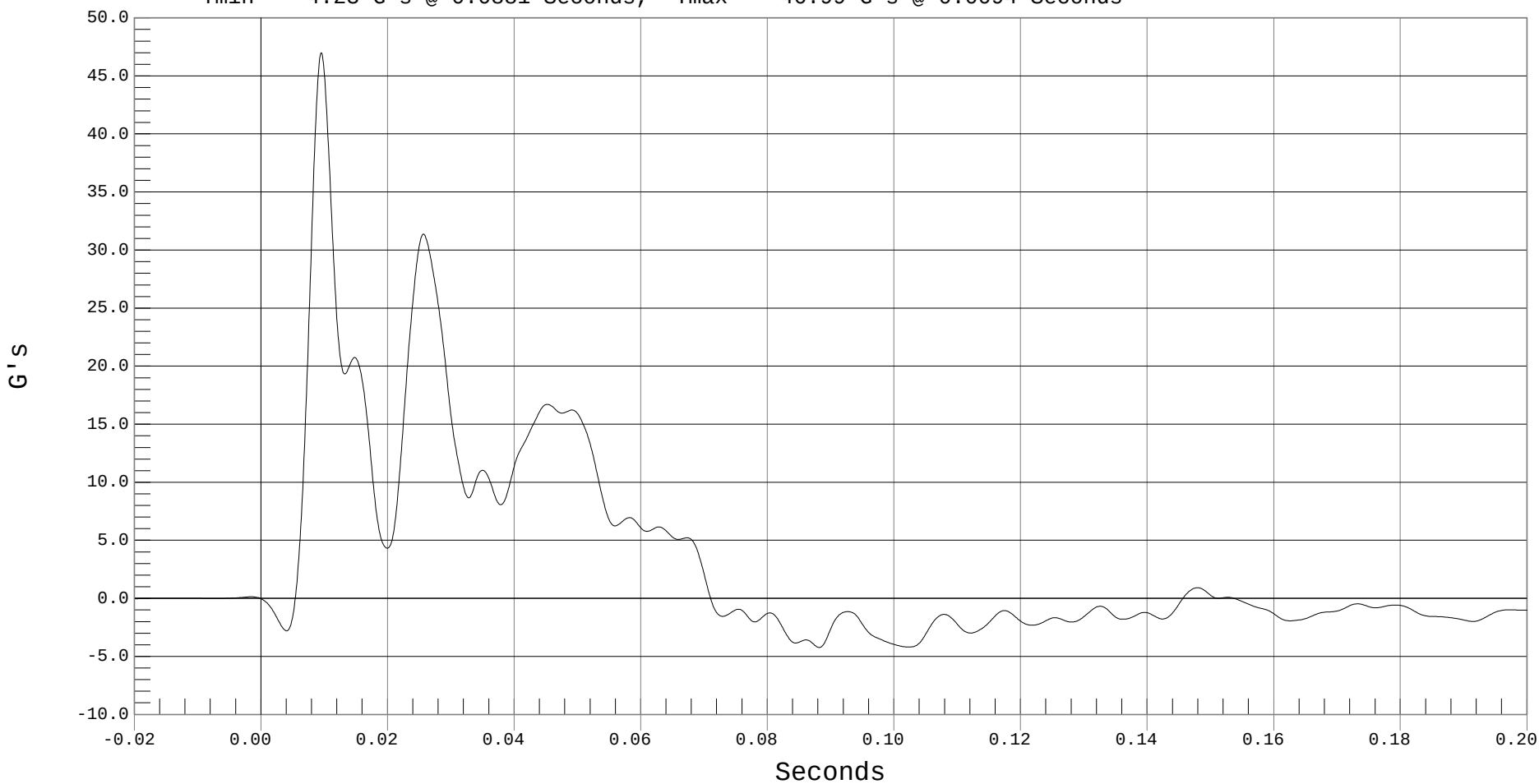
LEFT SIDE SILL AT REAR SEAT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT REAR SILL Y, B01105AF.A33

Ymin = -4.23 G's @ 0.0881 Seconds, Ymax = 46.99 G's @ 0.0094 Seconds





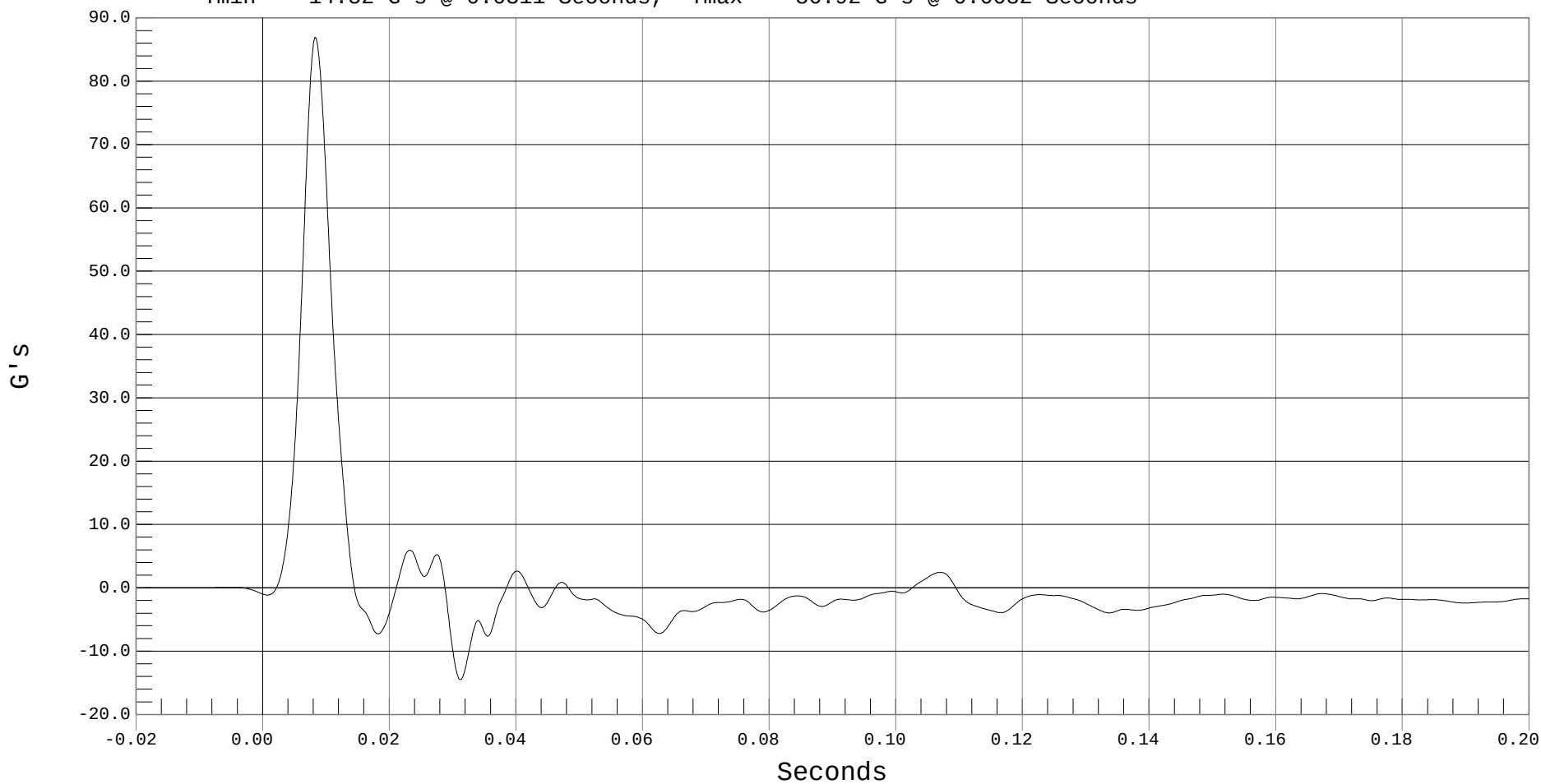
LEFT LOWER A-POST Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT LOWER A-POST Y, B01105AF.A38

Ymin = -14.52 G's @ 0.0311 Seconds, Ymax = 86.92 G's @ 0.0082 Seconds





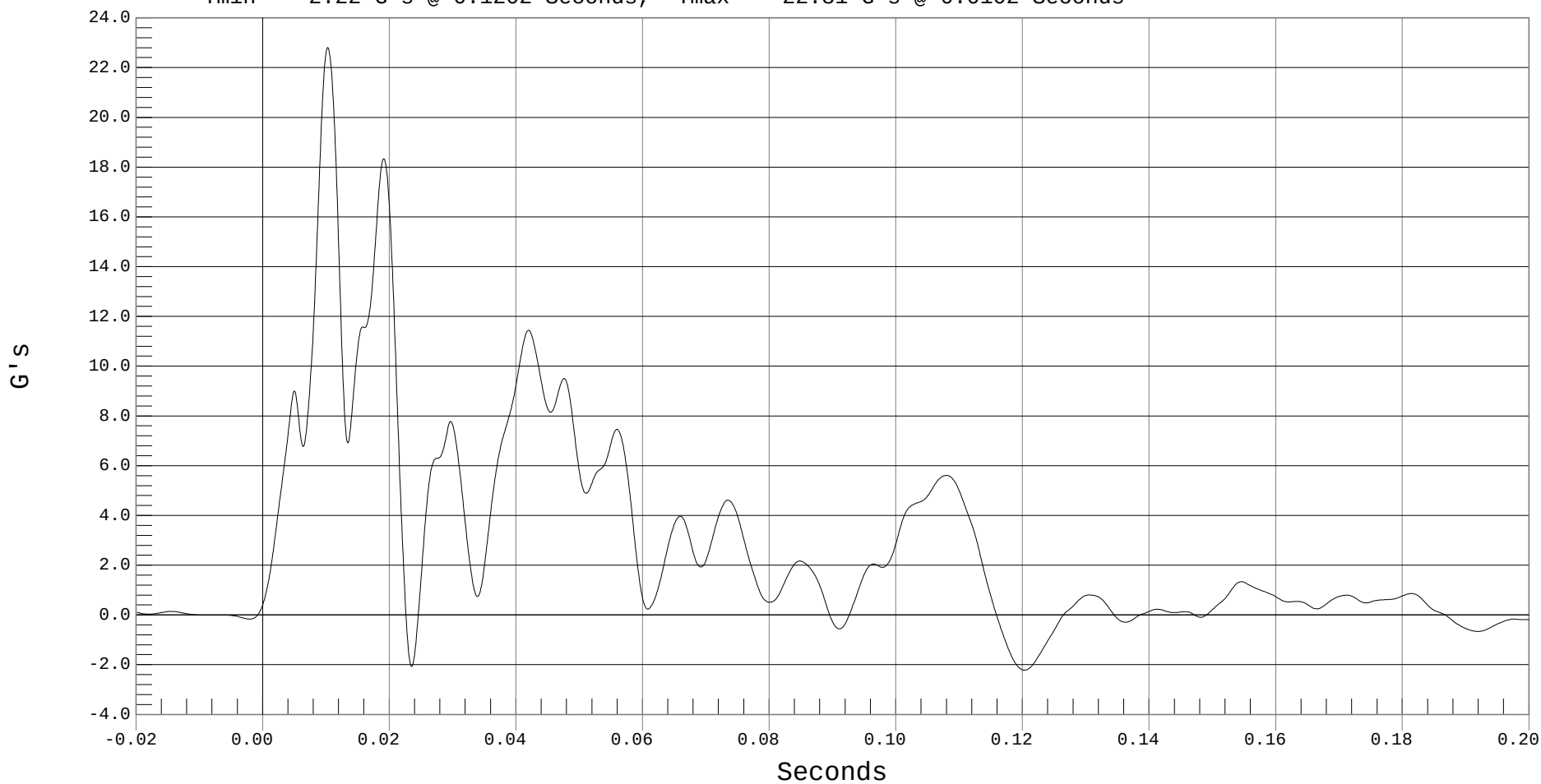
LEFT MID A-POST Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT MID A-POST Y, B01105AF.A37

Ymin = -2.22 G's @ 0.1202 Seconds, Ymax = 22.81 G's @ 0.0102 Seconds





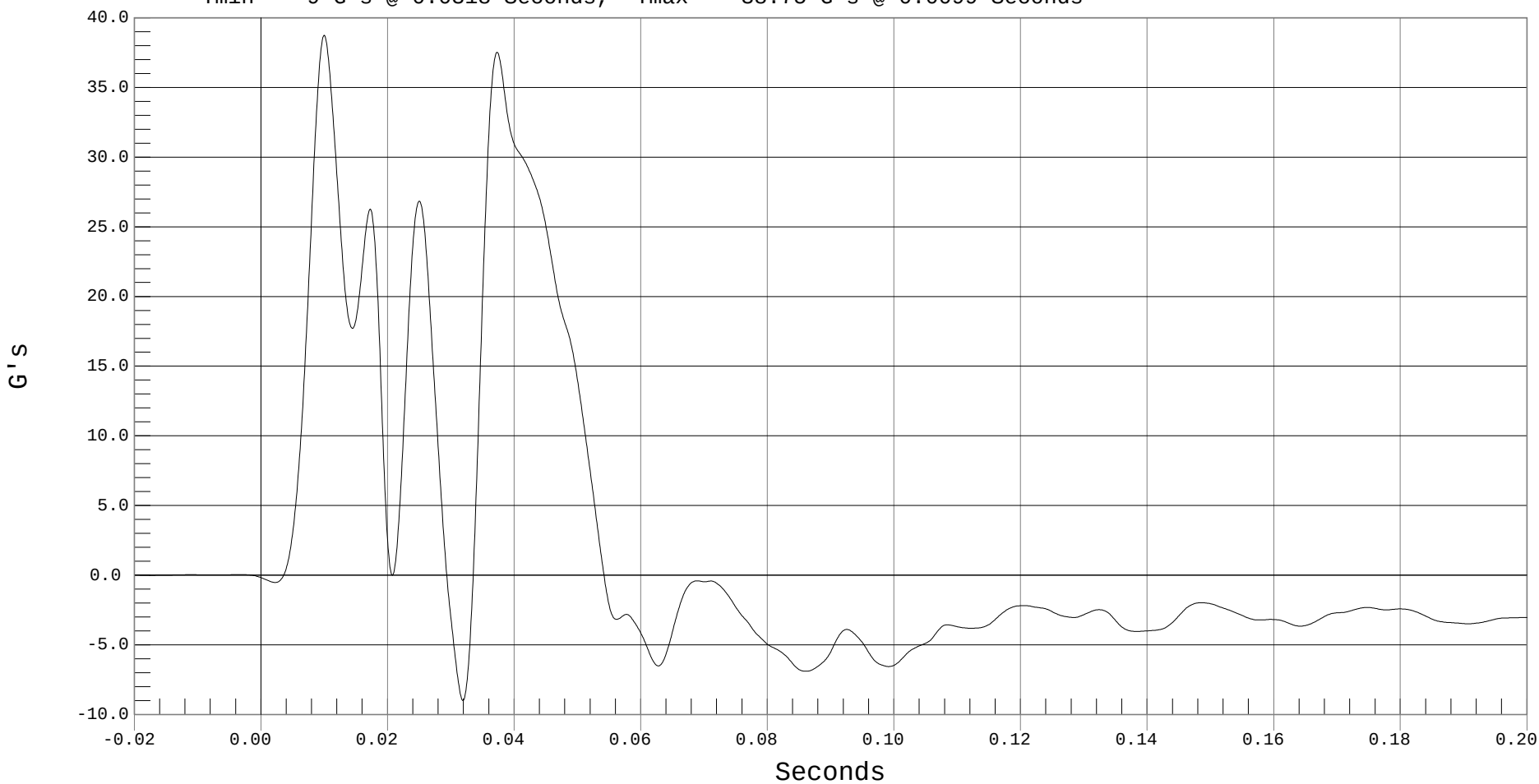
LEFT LOWER B-POST Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT LOWER B-POST Y, B01105AF.A41

Ymin = -9 G's @ 0.0318 Seconds, Ymax = 38.75 G's @ 0.0099 Seconds





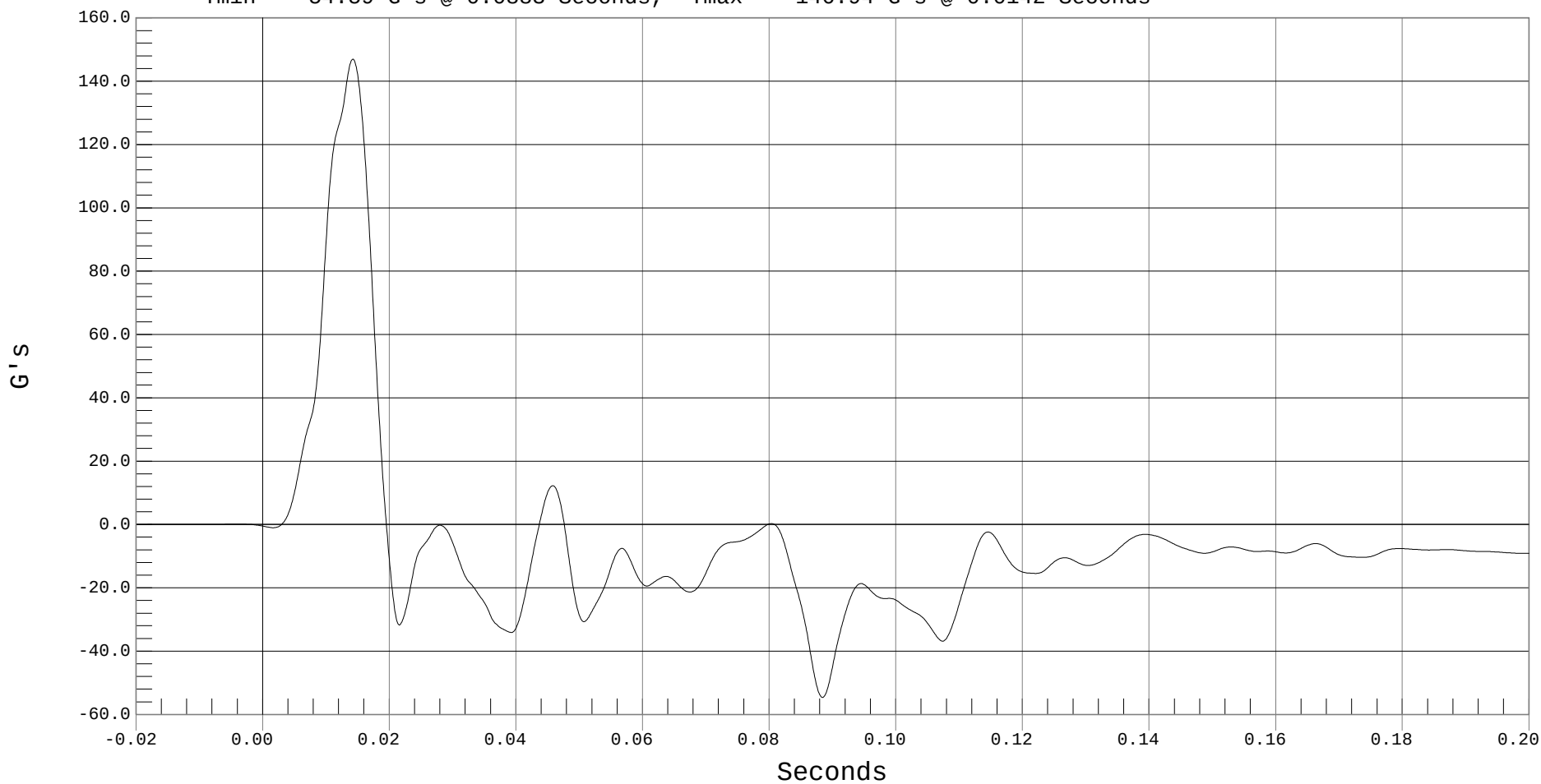
LEFT MID B-POST Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT MID B-POST Y, B01105AF.A40

Ymin = -54.59 G's @ 0.0883 Seconds, Ymax = 146.94 G's @ 0.0142 Seconds





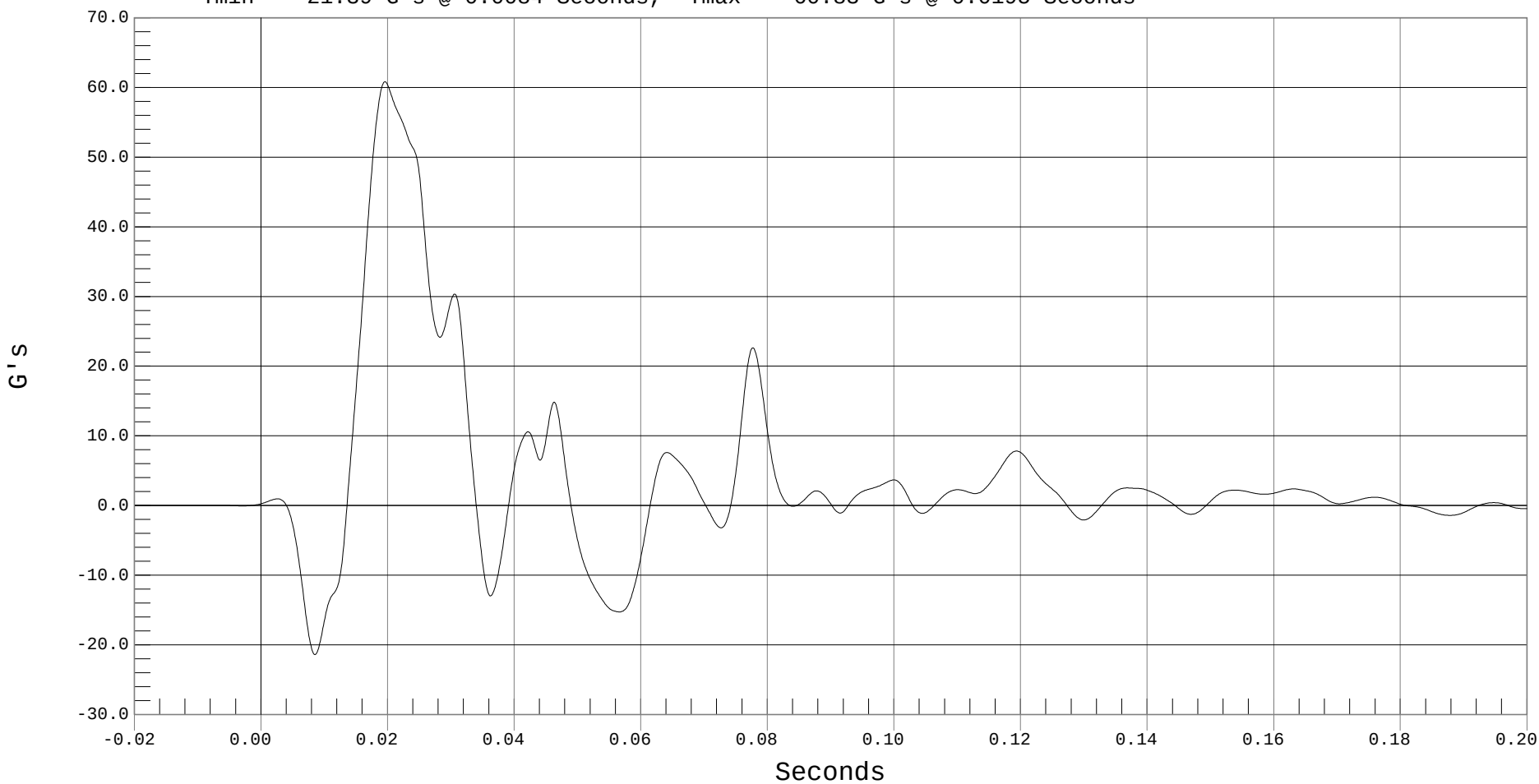
LEFT UPPER B-POST Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT UPPER B-POST Y, B01105AF.A39

Ymin = -21.39 G's @ 0.0084 Seconds, Ymax = 60.83 G's @ 0.0195 Seconds





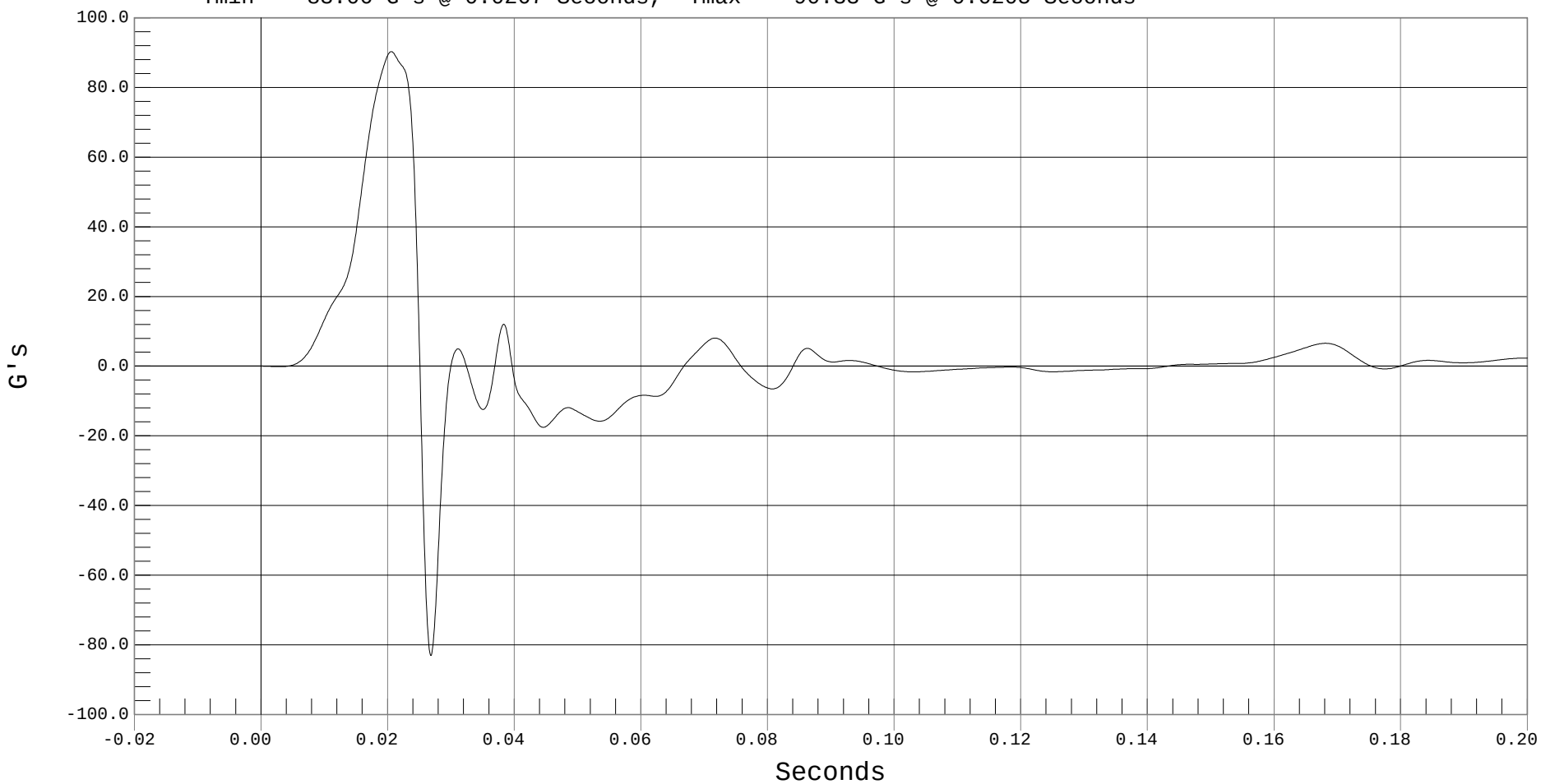
LEFT DRIVER SEAT TRACK Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 DRIVER LEFT SEAT TRACK Y, B01105AF.A42

Ymin = -83.06 G's @ 0.0267 Seconds, Ymax = 90.33 G's @ 0.0205 Seconds





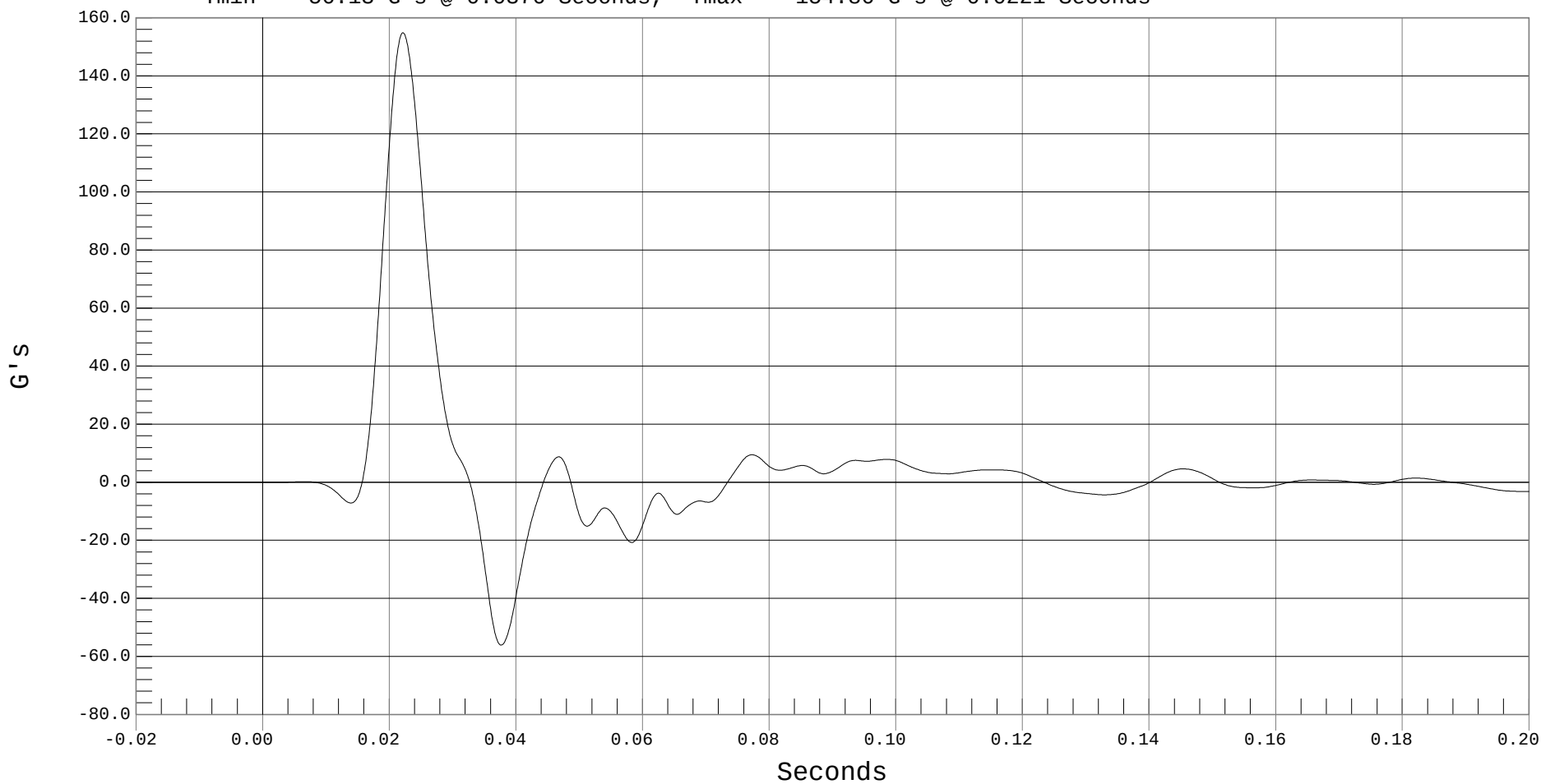
DRIVER LEFT SEAT FRAME Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 DRIVER LEFT SEAT FRAME Y, B01105AF.A55

Ymin = -56.13 G's @ 0.0376 Seconds, Ymax = 154.86 G's @ 0.0221 Seconds





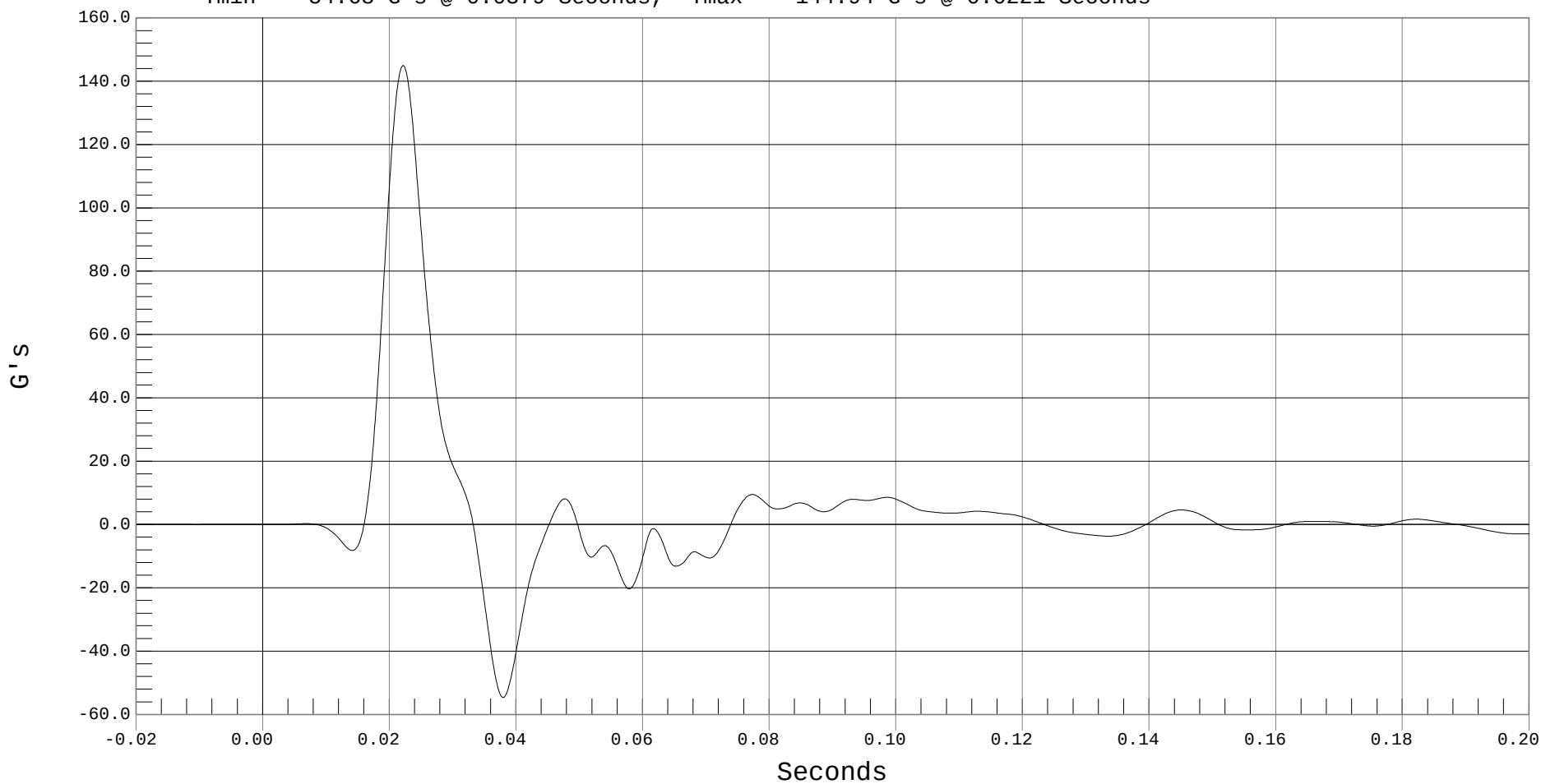
DRIVER RIGHT SEAT FRAME Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 DRIVER RIGHT SEAT FRAME Y, B01105AF.A43

Ymin = -54.68 G's @ 0.0379 Seconds, Ymax = 144.94 G's @ 0.0221 Seconds





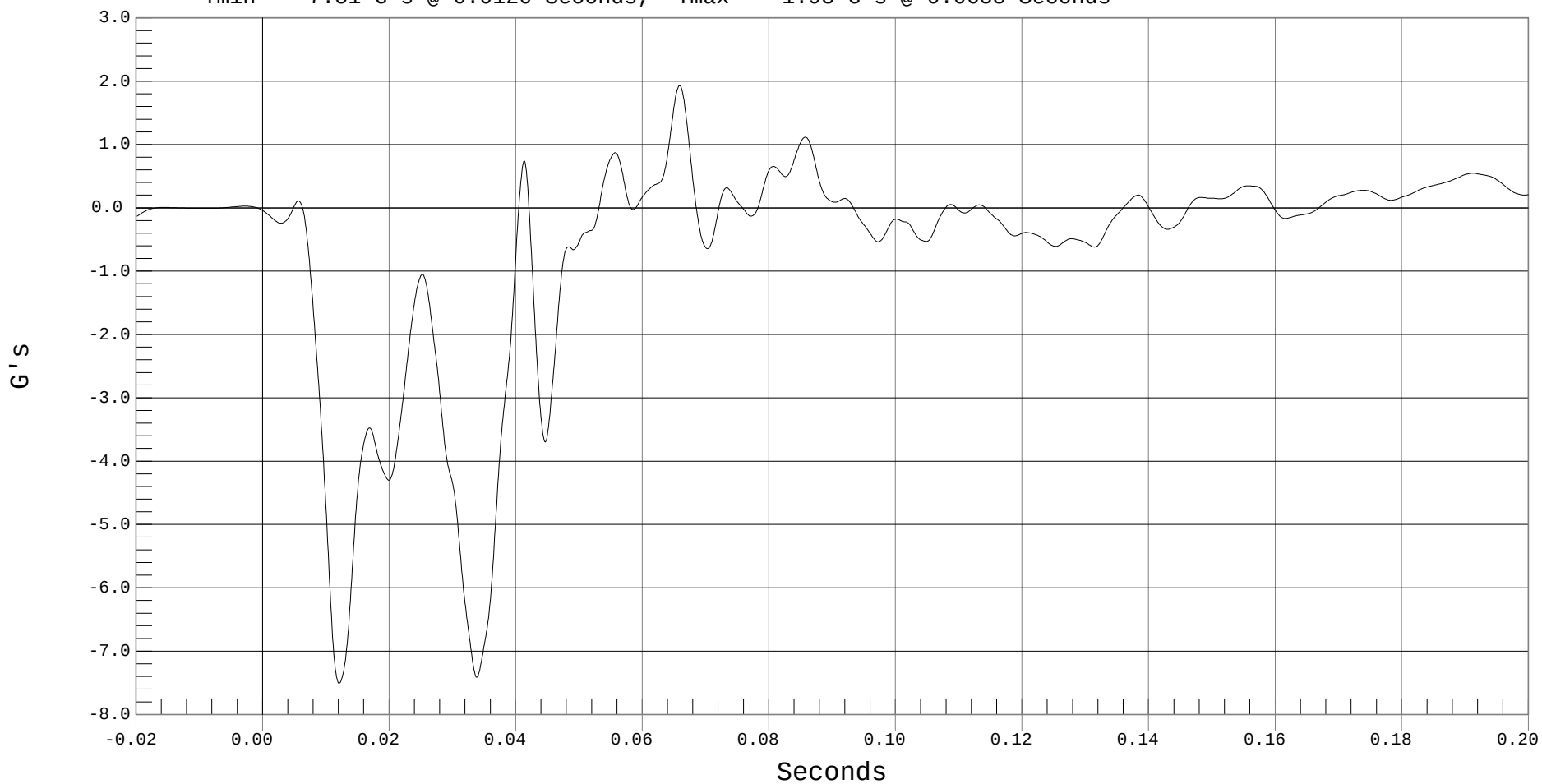
VEHICLE CG X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 VEHICLE CG X, B01105AF.A44

Ymin = -7.51 G's @ 0.0120 Seconds, Ymax = 1.93 G's @ 0.0658 Seconds





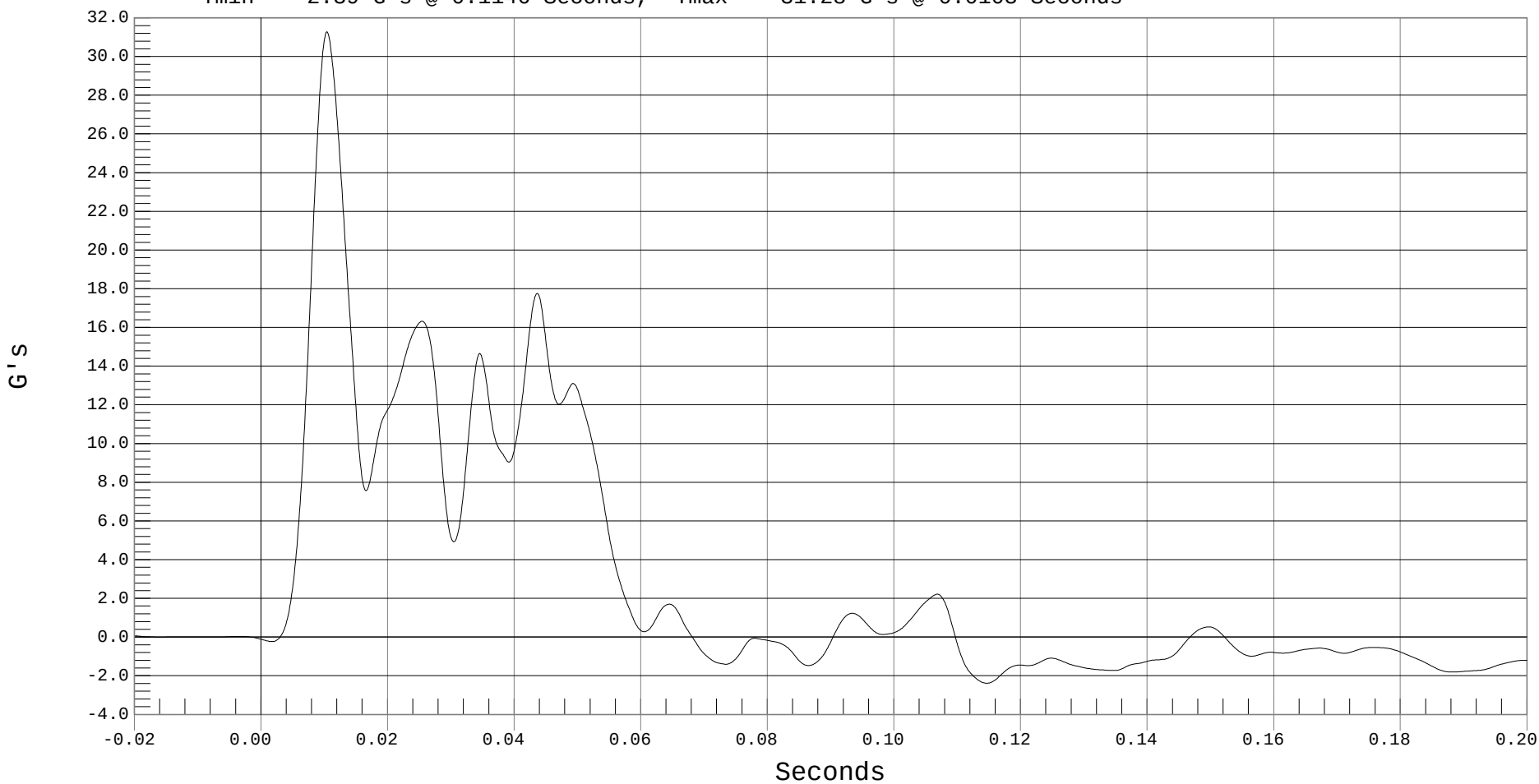
VEHICLE CG Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 VEHICLE CG Y, B01105AF.A45

Ymin = -2.39 G's @ 0.1146 Seconds, Ymax = 31.28 G's @ 0.0103 Seconds





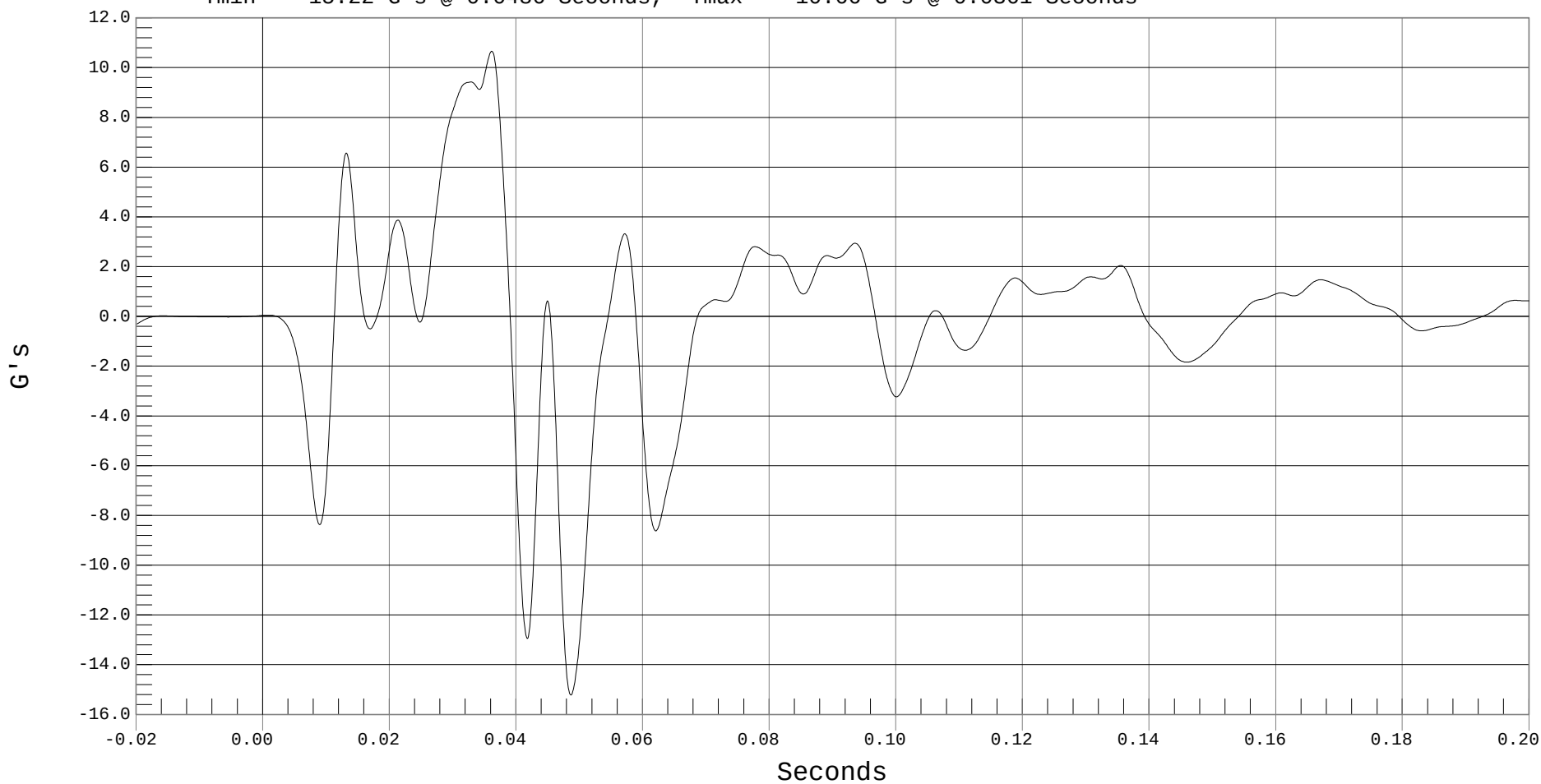
VEHICLE CG Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 VEHICLE CG Z, B01105AF.A46

Ymin = -15.22 G's @ 0.0486 Seconds, Ymax = 10.66 G's @ 0.0361 Seconds





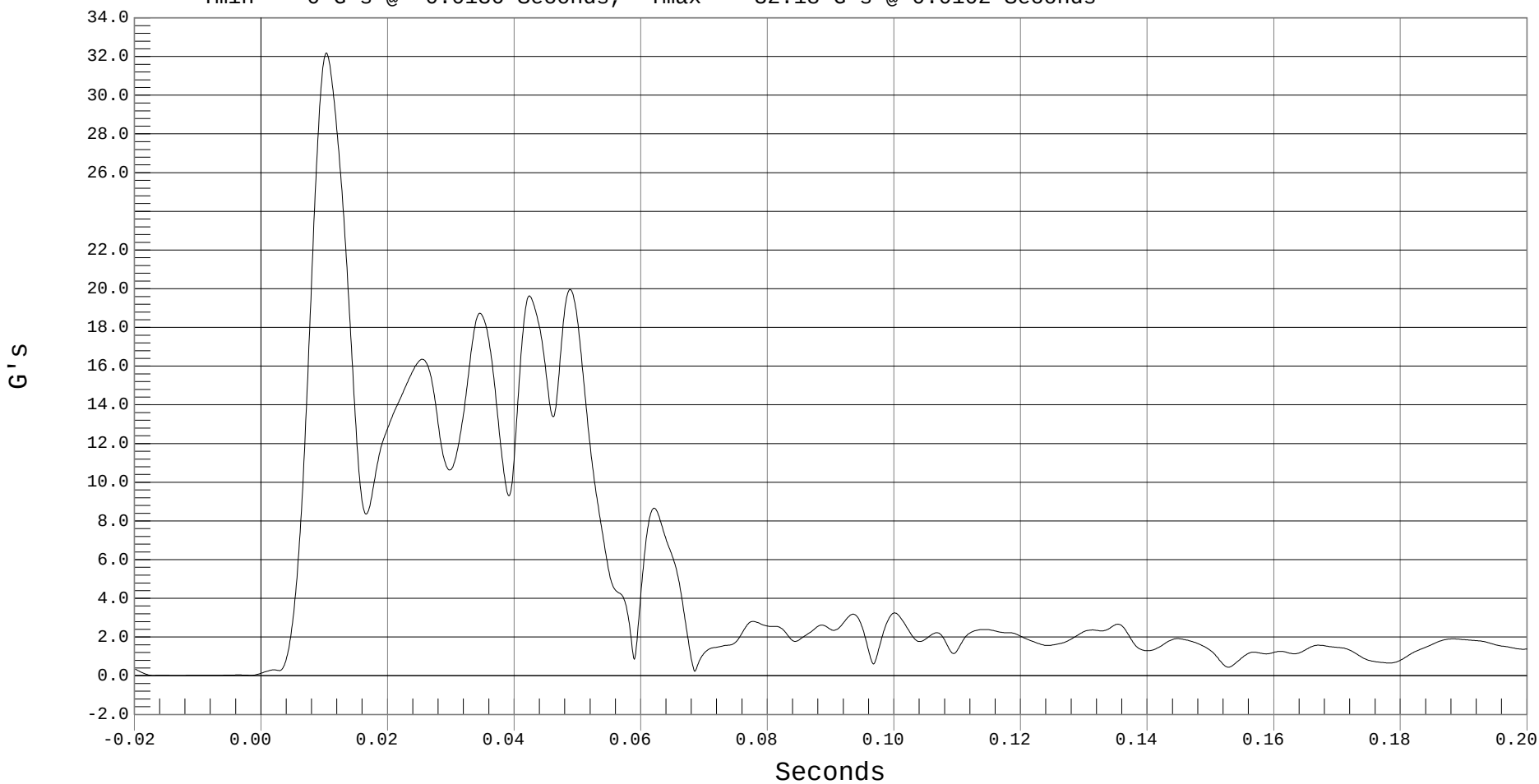
VEHICLE CG RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 VEHICLE CG RESULTANT ACCELERATION, B01105AV.A44

Ymin = 0 G's @ -0.0136 Seconds, Ymax = 32.18 G's @ 0.0102 Seconds





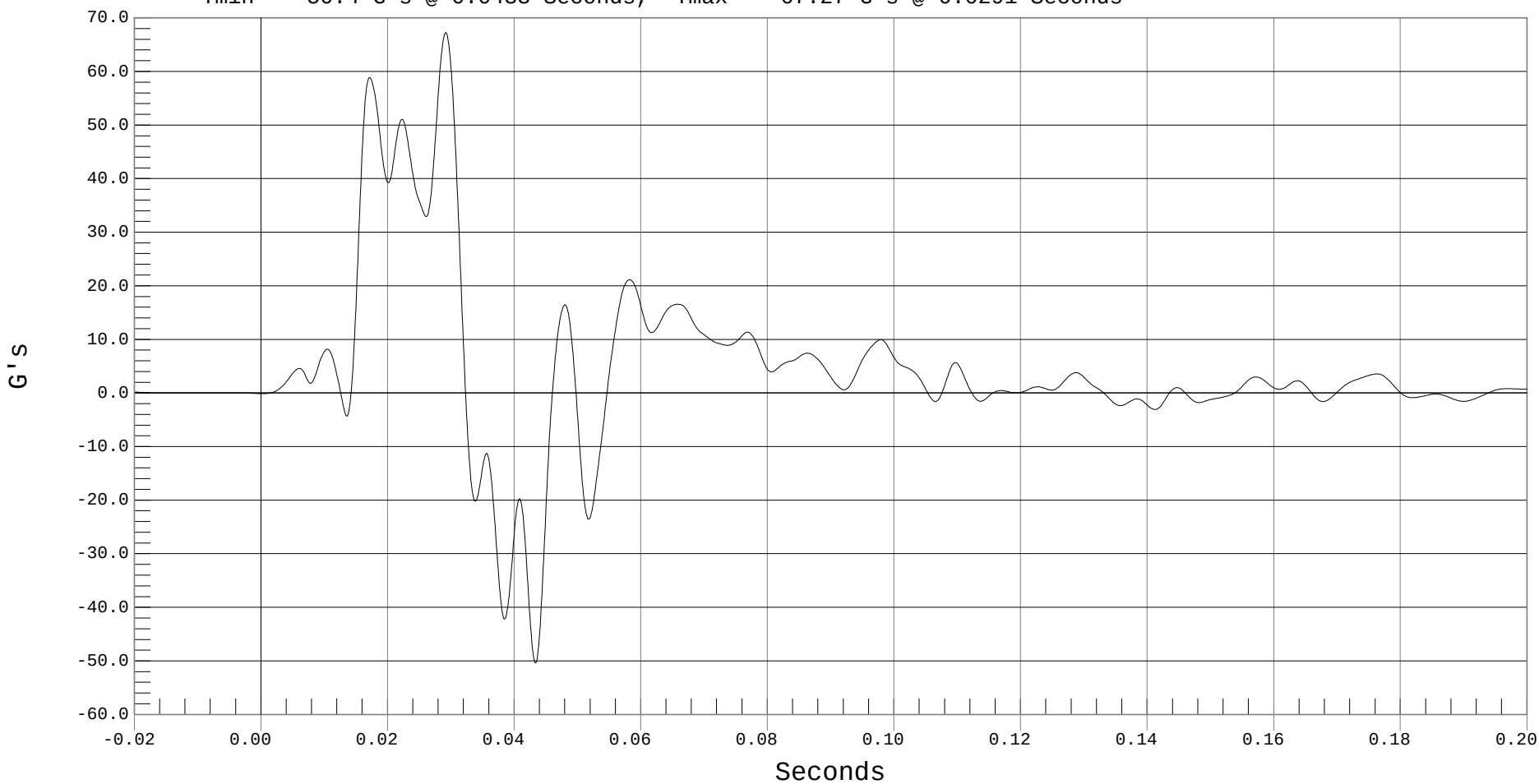
LEFT REAR DOOR @ MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT REAR DOOR @ MID RIB Y, B01105AF.A47

Ymin = -50.4 G's @ 0.0433 Seconds, Ymax = 67.27 G's @ 0.0291 Seconds





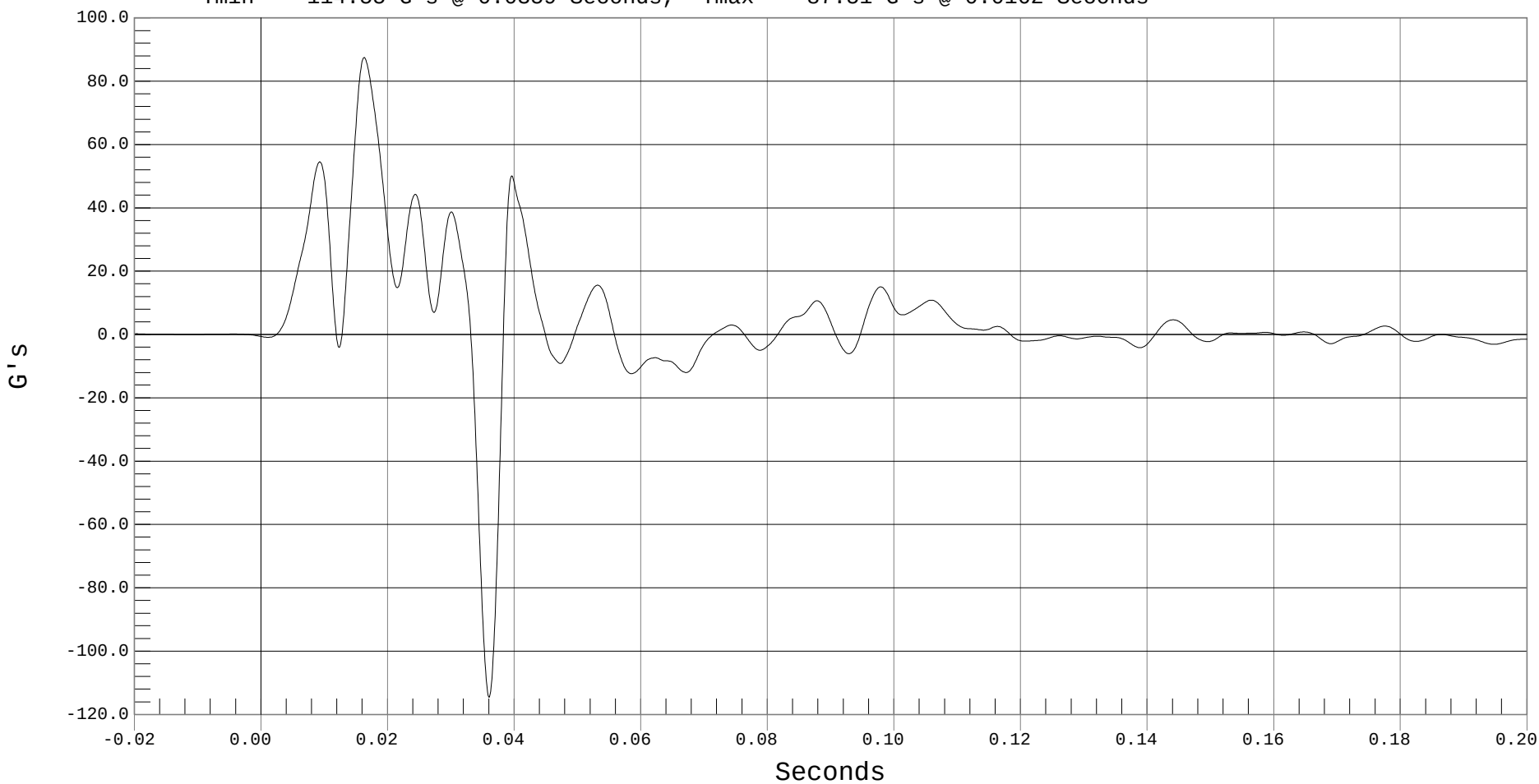
LEFT REAR DOOR @ PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT REAR DOOR @ PELVIS Y, B01105AF.A48

Ymin = -114.55 G's @ 0.0359 Seconds, Ymax = 87.51 G's @ 0.0162 Seconds





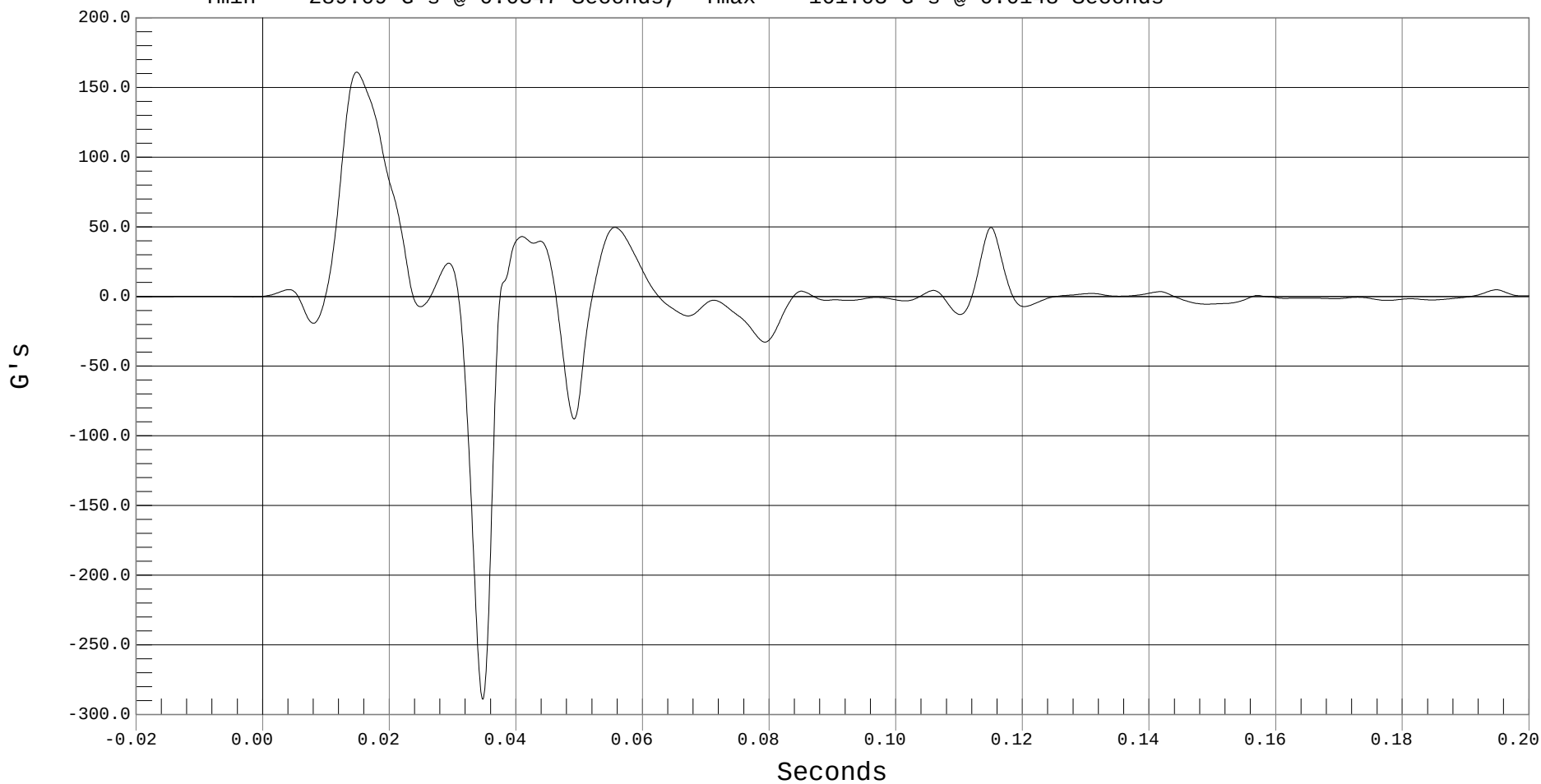
LEFT REAR DOOR @ KNEE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT REAR DOOR @ KNEE Y, B01105AF.A49

Ymin = -289.09 G's @ 0.0347 Seconds, Ymax = 161.03 G's @ 0.0148 Seconds





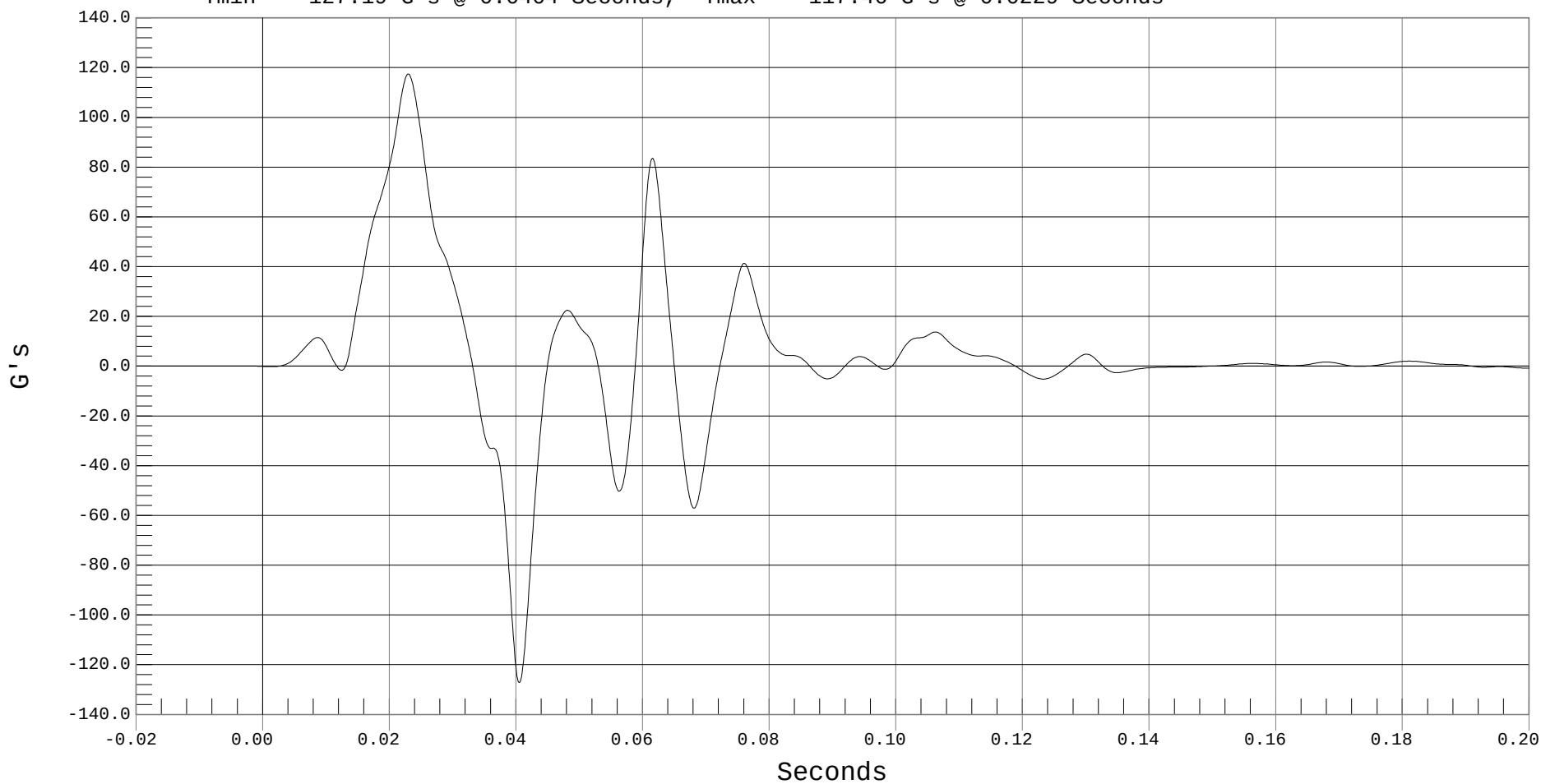
LEFT REAR DOOR @ ARM Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT REAR DOOR @ ARM Y, B01105AF.A50

Ymin = -127.19 G's @ 0.0404 Seconds, Ymax = 117.46 G's @ 0.0229 Seconds





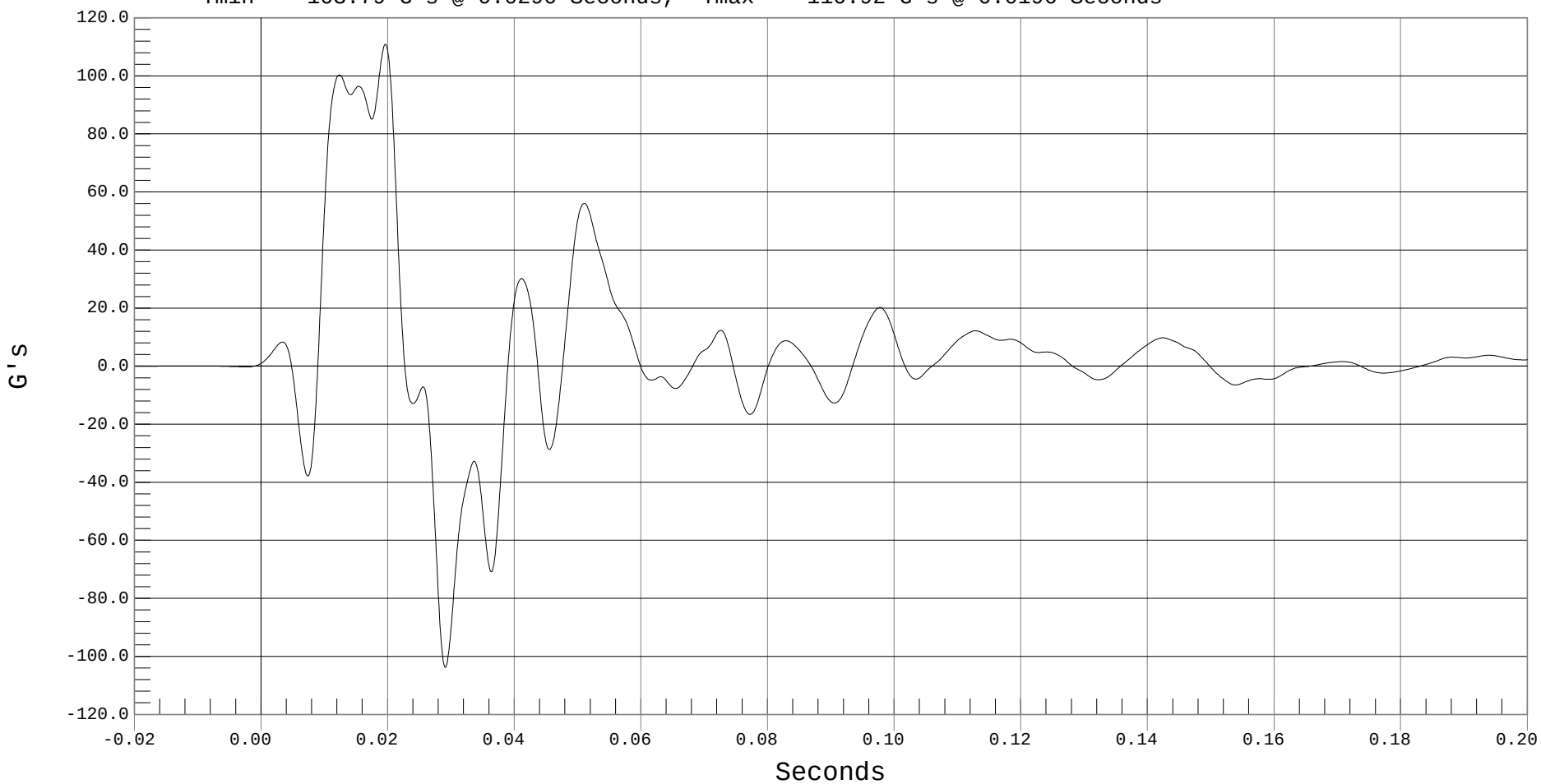
LEFT FRONT DOOR @ MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT FRONT DOOR @ MID RIB, B01105AF.A51

Ymin = -103.79 G's @ 0.0290 Seconds, Ymax = 110.92 G's @ 0.0196 Seconds





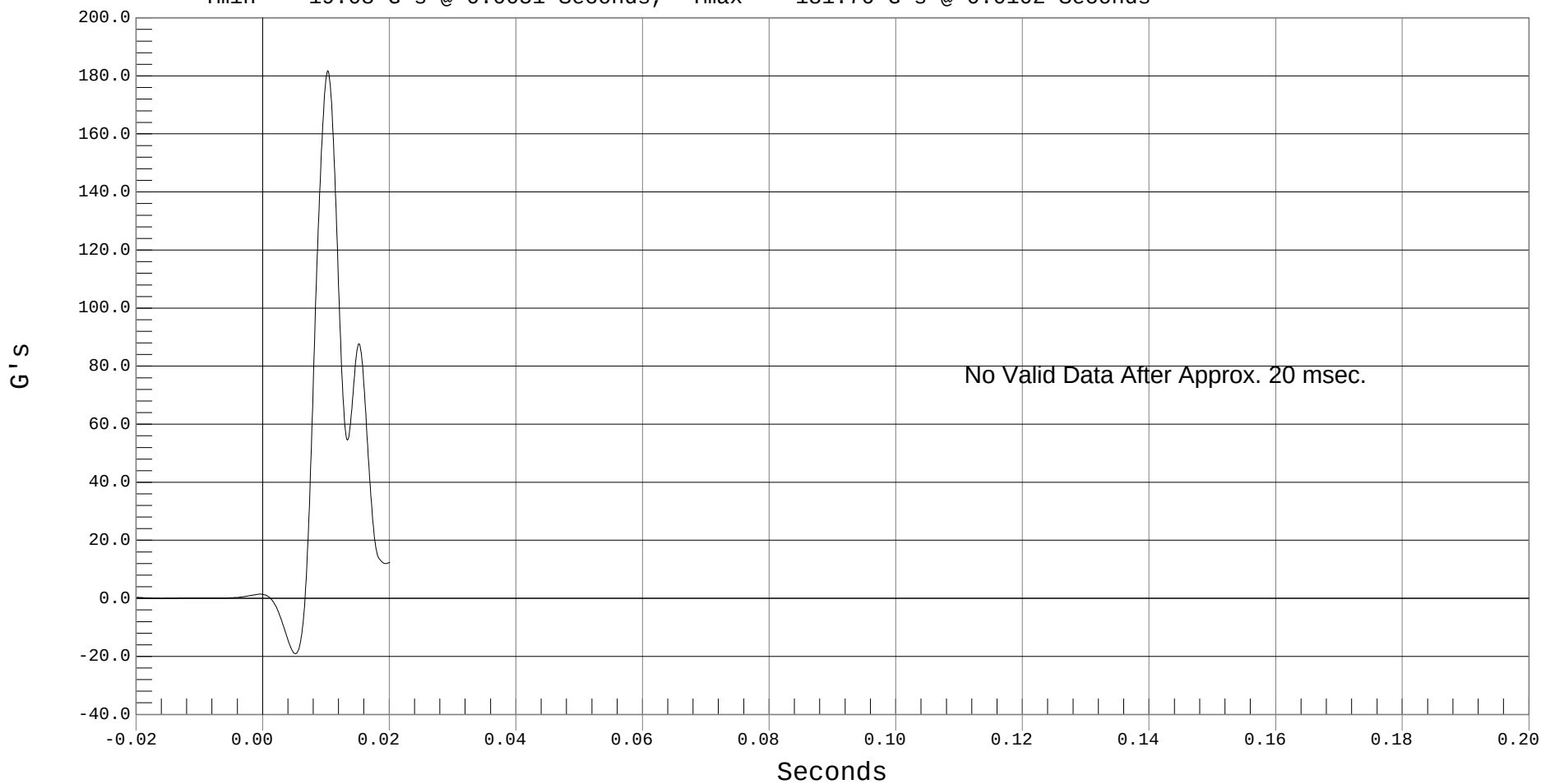
LEFT FRONT DOOR @ PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 LEFT FRONT DOOR @ PELVIS, B01105AF.A52

Ymin = -19.08 G's @ 0.0051 Seconds, Ymax = 181.76 G's @ 0.0102 Seconds





LEFT FRONT DOOR @ KNEE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

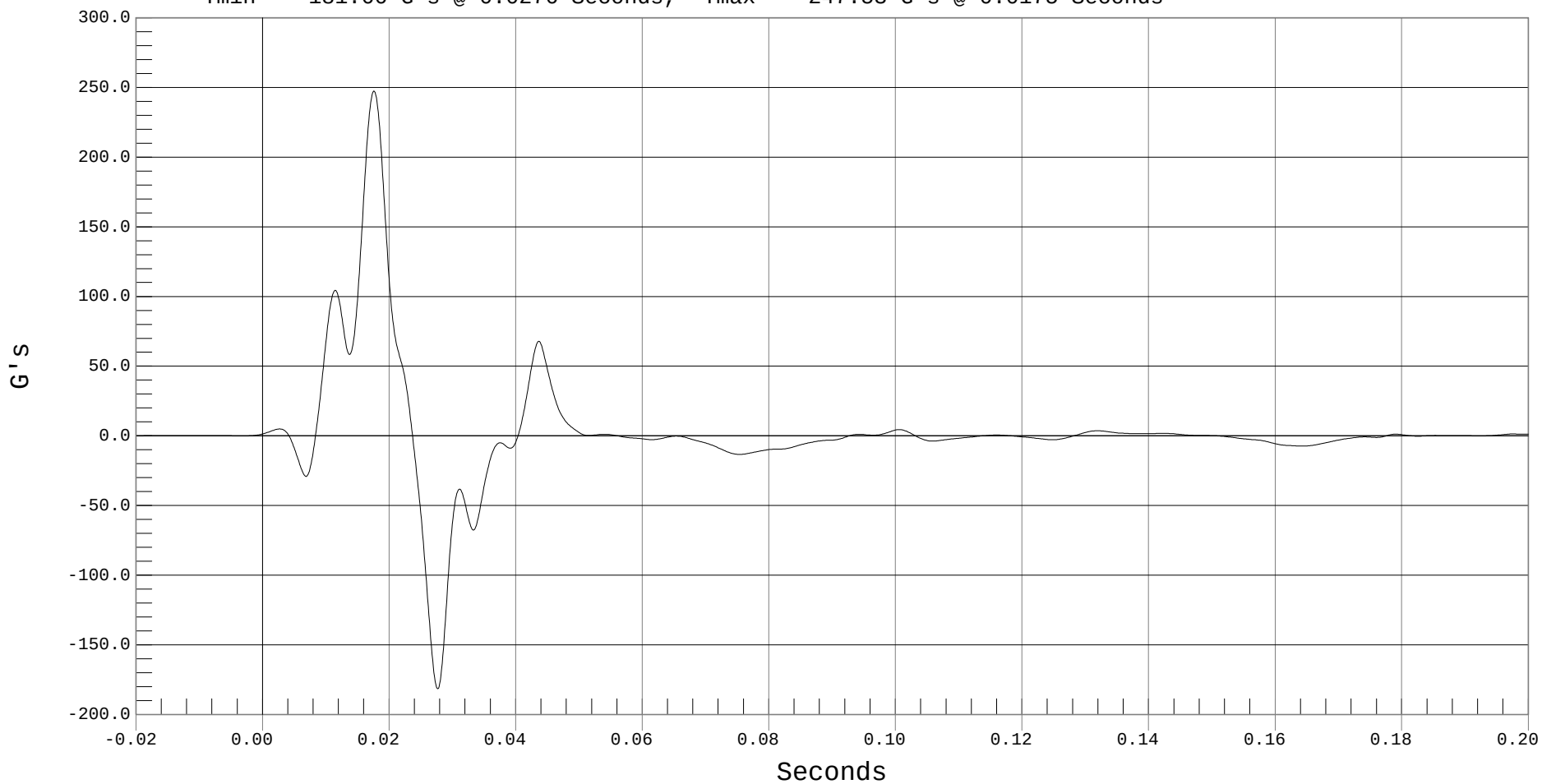
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 LEFT FRONT DOOR @ KNEE, B01105AF.A53

Ymin = -181.66 G's @ 0.0276 Seconds, Ymax = 247.53 G's @ 0.0175 Seconds





LEFT FRONT DOOR @ ARM Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

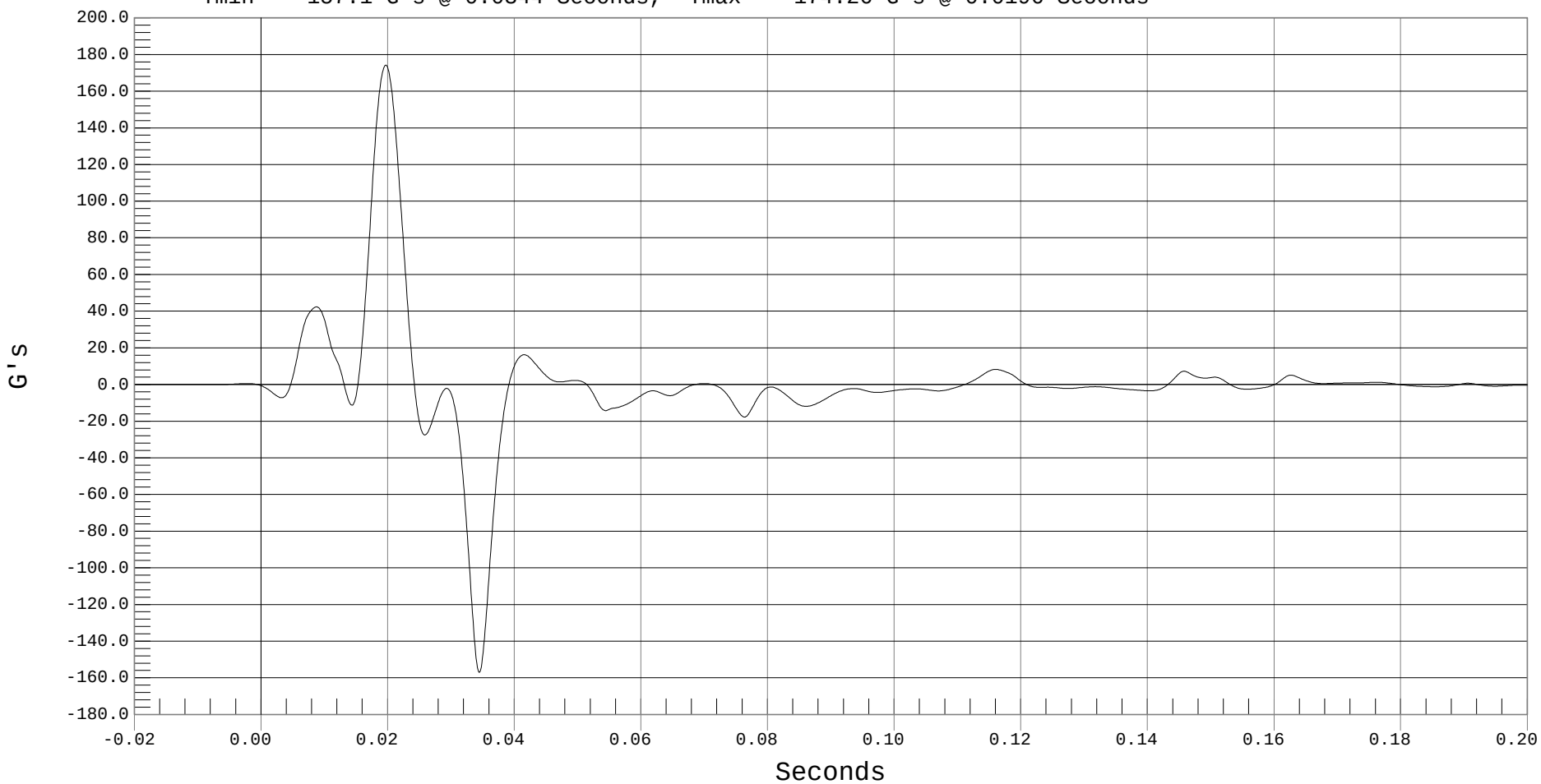
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Filter Class: 60

— 1 LEFT FRONT DOOR @ ARM, B01105AF.A54

Ymin = -157.1 G's @ 0.0344 Seconds, Ymax = 174.26 G's @ 0.0196 Seconds





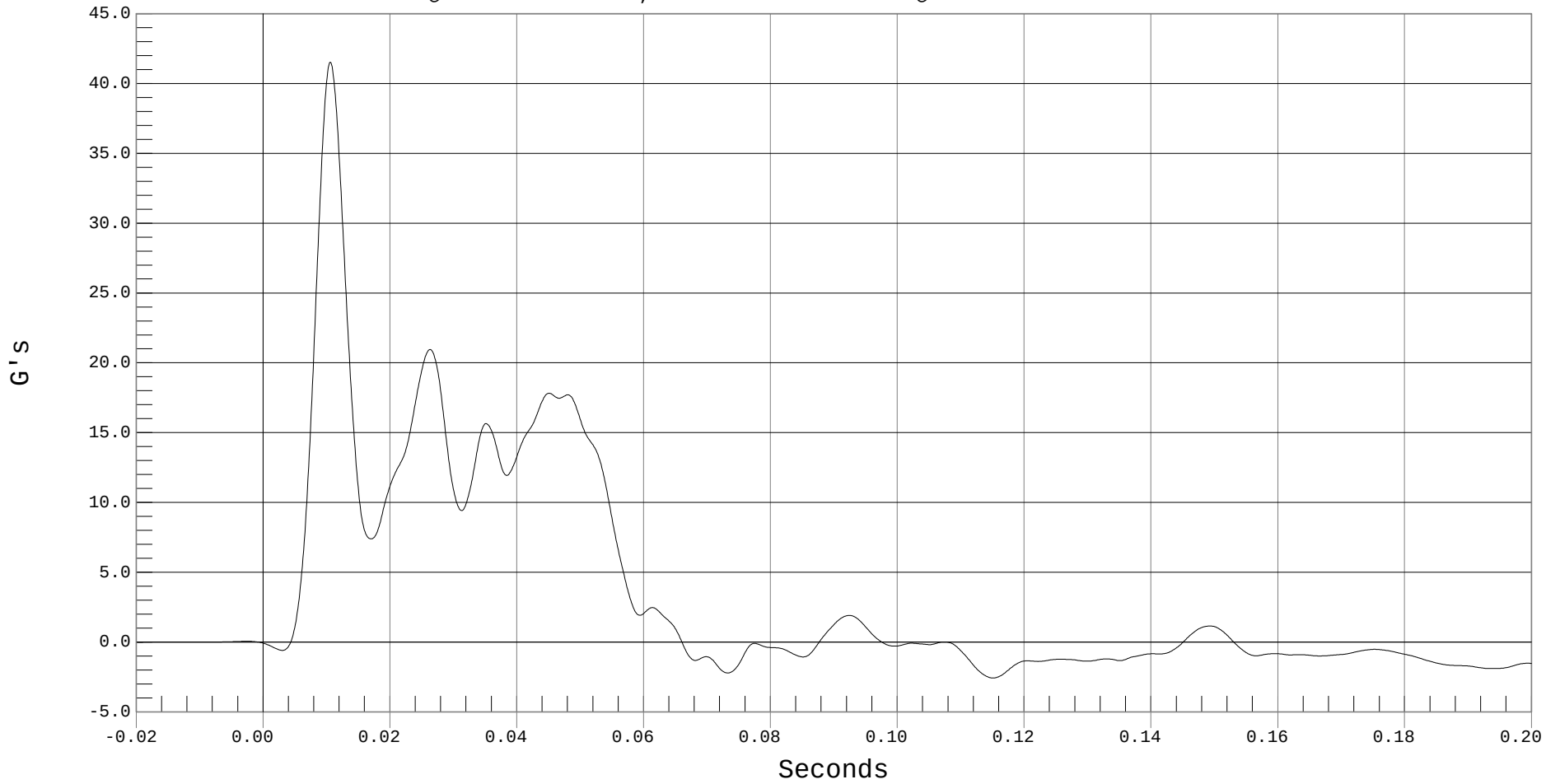
RIGHT REAR OCCUPANT COMPARTMENT Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 RIGHT REAR OCC. COMPARTMENT Y, B01105AF.A62

Ymin = -2.57 G's @ 0.1150 Seconds, Ymax = 41.54 G's @ 0.0105 Seconds





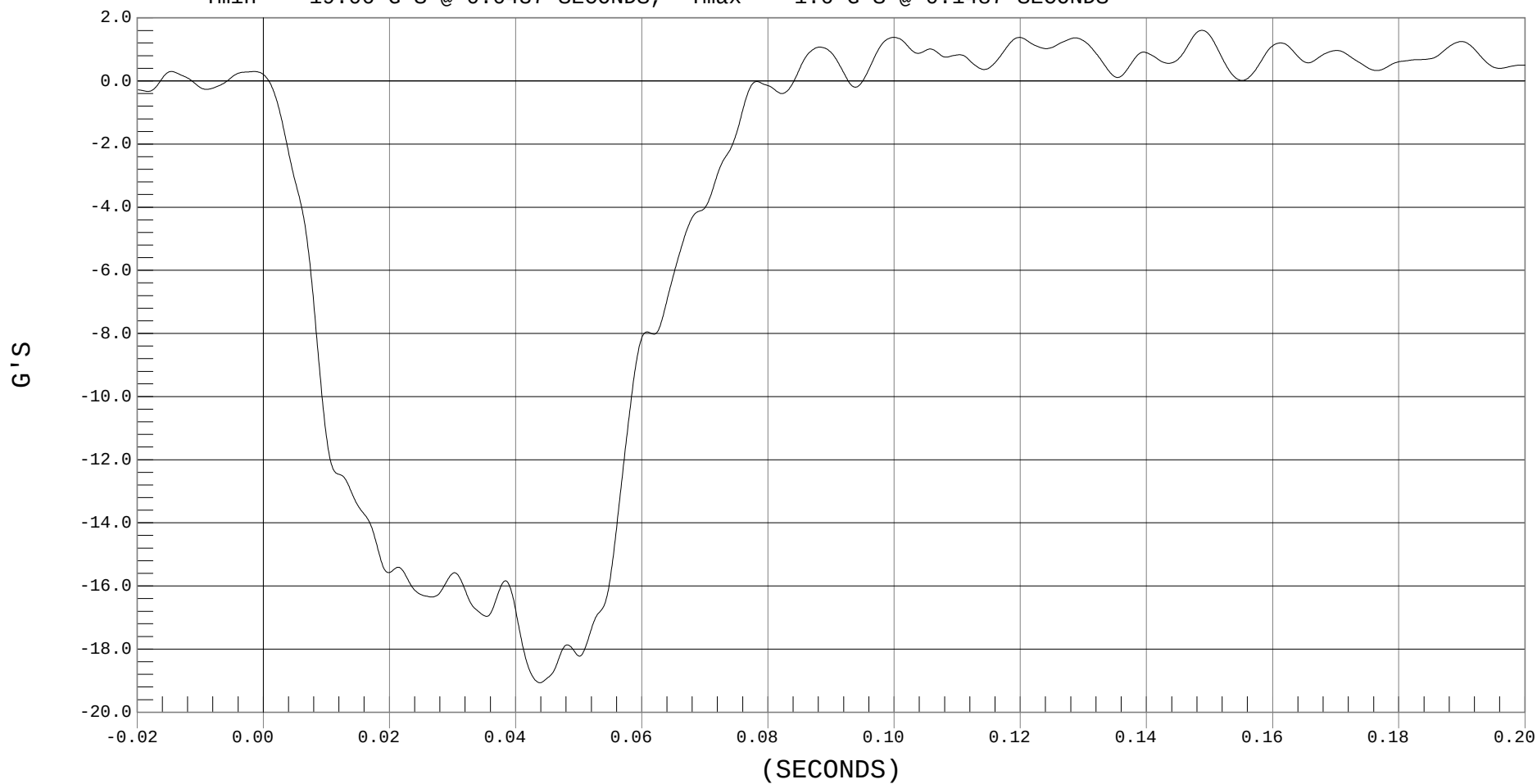
MOVING BARRIER CG X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 CART CG X ACCELERATION, B01105AF.A07

Ymin = -19.06 G'S @ 0.0437 SECONDS, Ymax = 1.6 G'S @ 0.1487 SECONDS





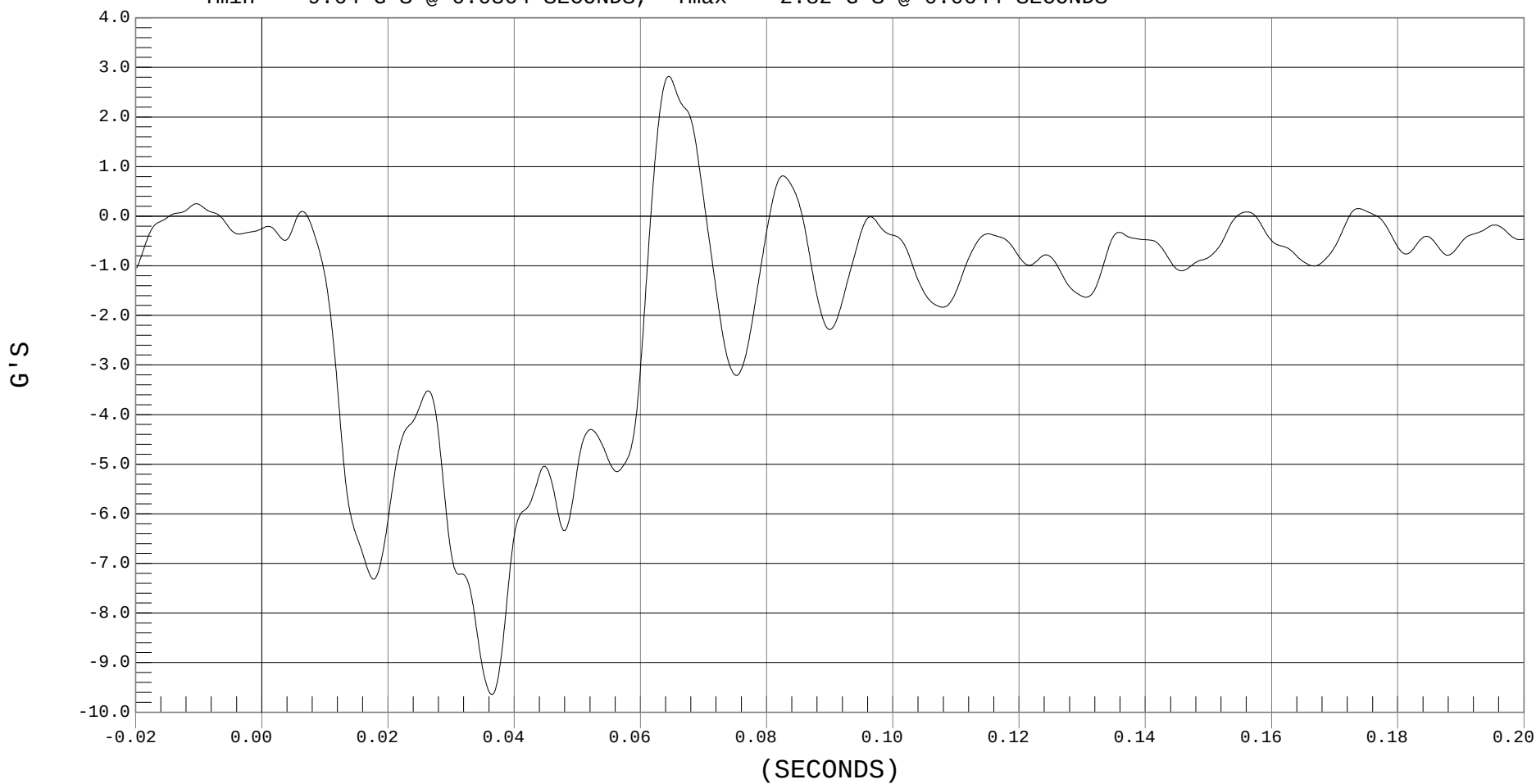
MOVING BARRIER CG Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 CART CG Y ACCELERATION, B01105AF.A03

Ymin = -9.64 G'S @ 0.0364 SECONDS, Ymax = 2.82 G'S @ 0.0644 SECONDS





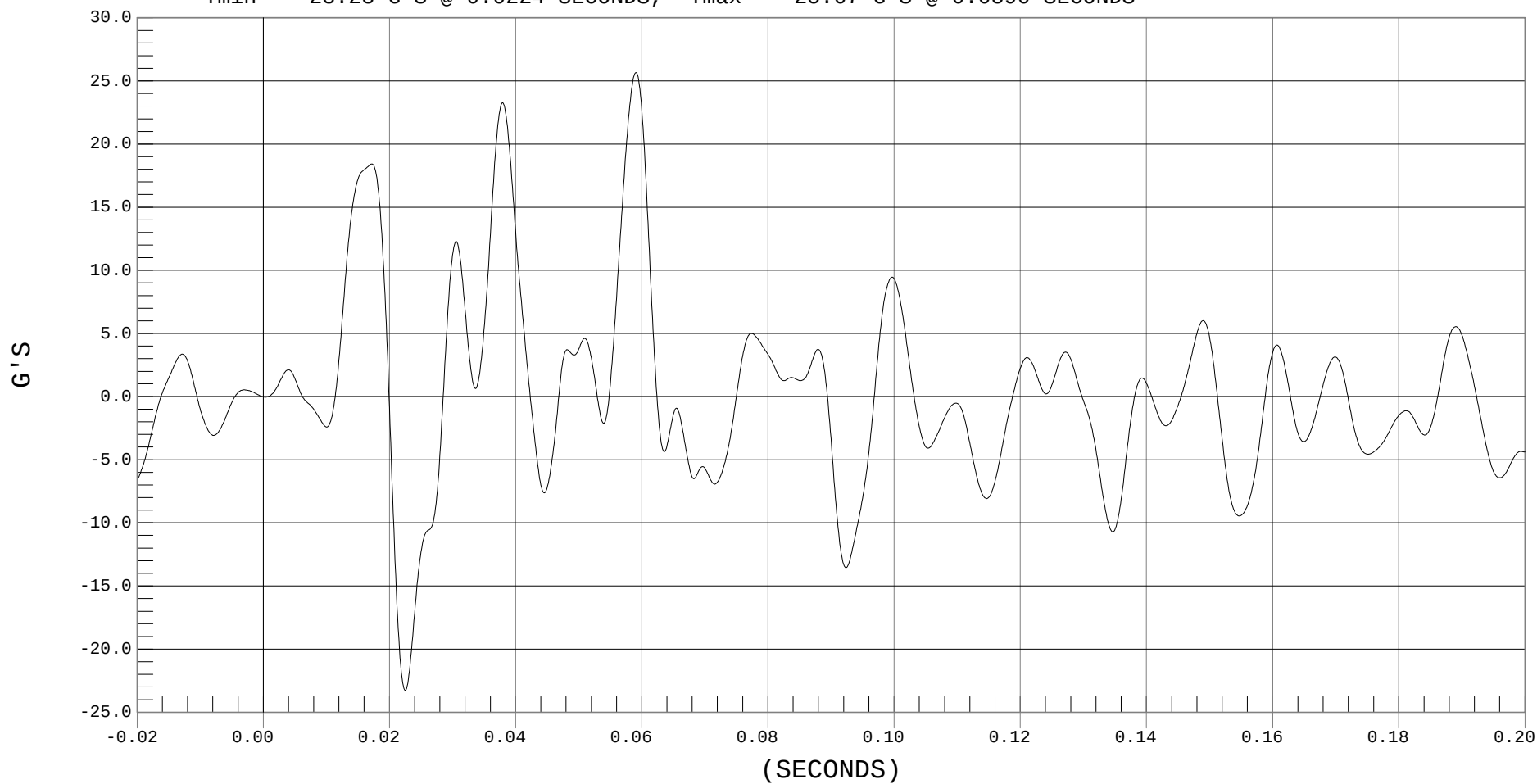
MOVING BARRIER CG Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 CART CG Z ACCELERATION, B01105AF.A04

Ymin = -23.28 G'S @ 0.0224 SECONDS, Ymax = 25.67 G'S @ 0.0590 SECONDS





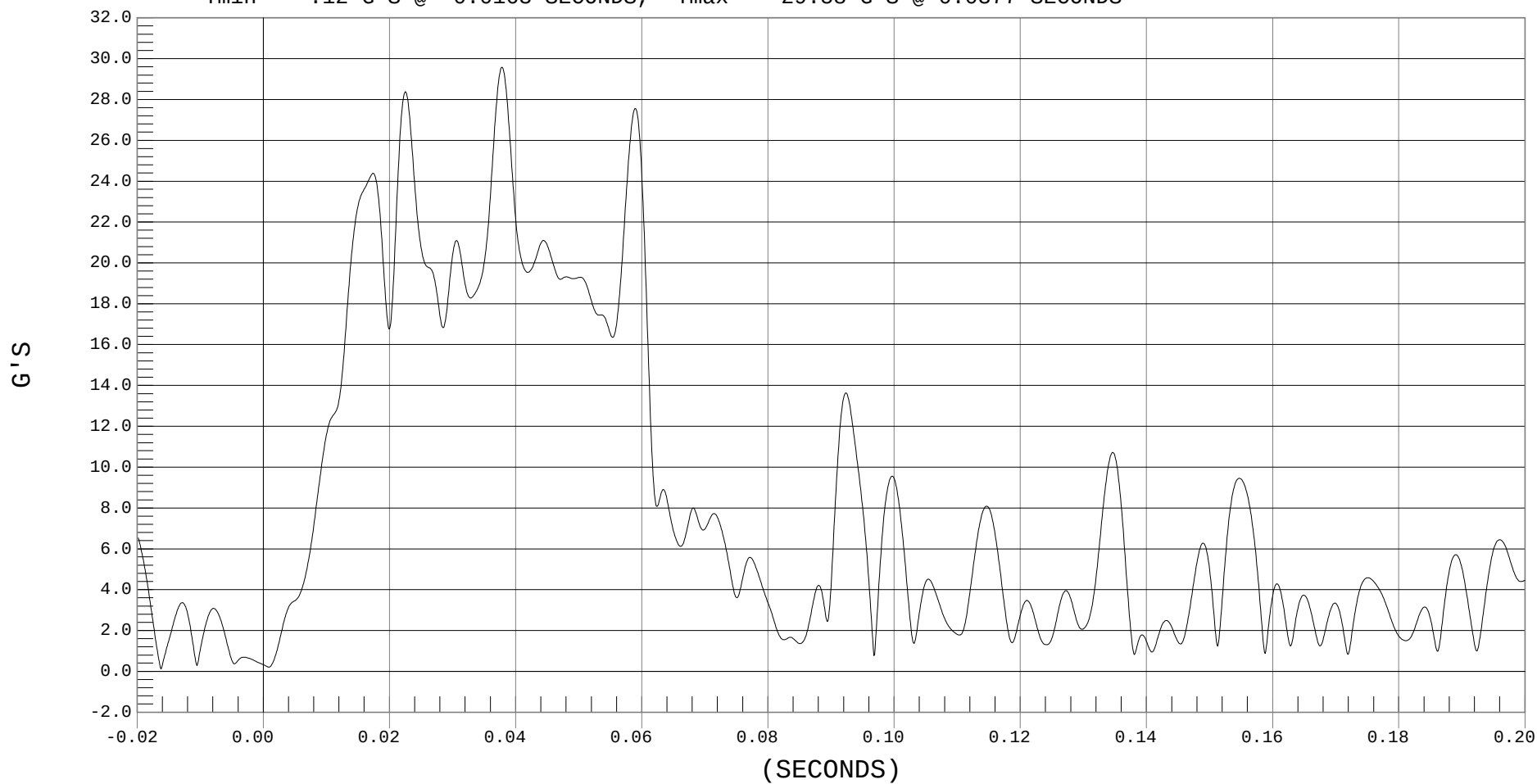
MOVING BARRIER CG RESULTANT ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 MOVING BARRIER CG RESULTANT ACCELERATION, B01105AV.A03

Ymin = .12 G'S @ -0.0163 SECONDS, Ymax = 29.58 G'S @ 0.0377 SECONDS





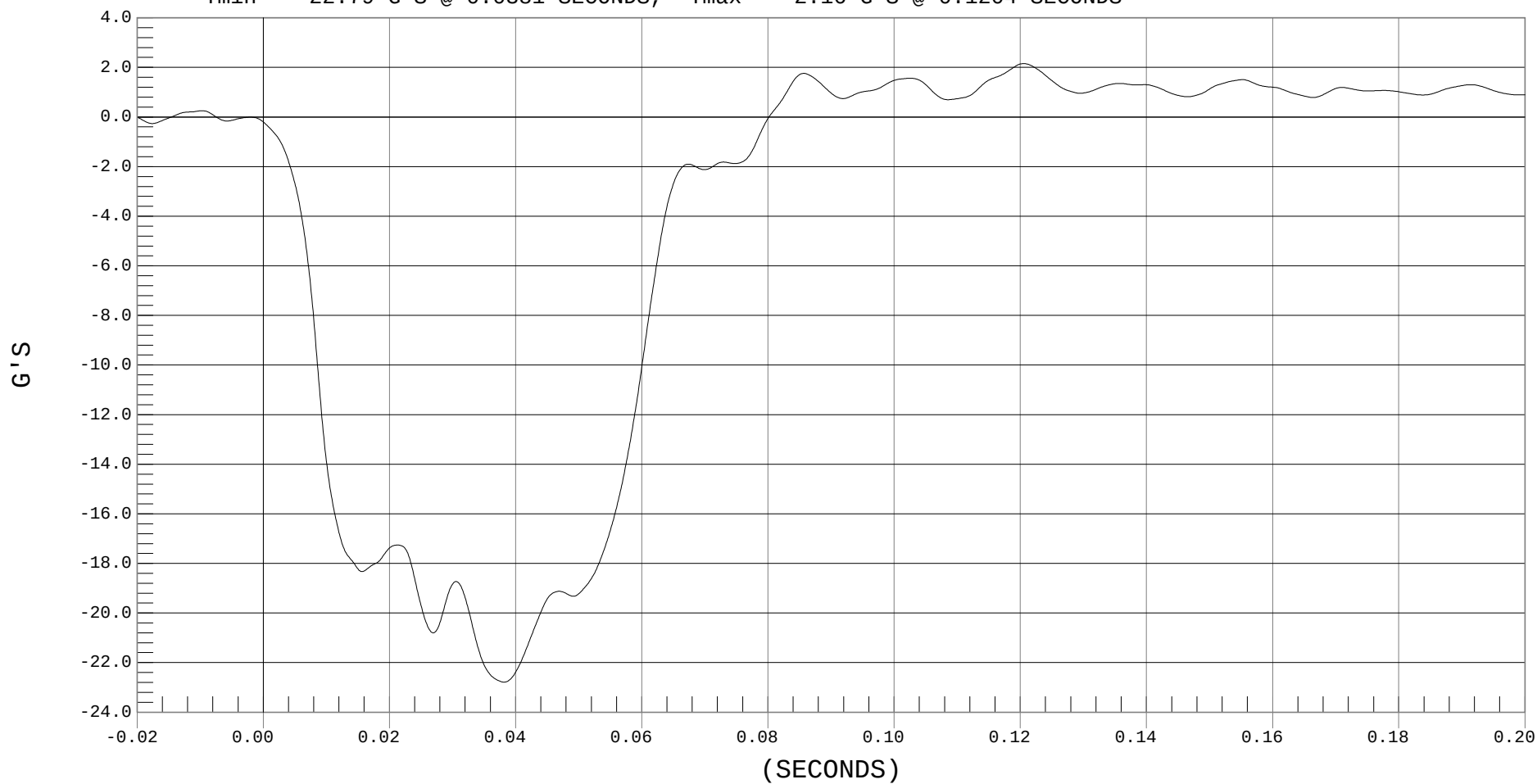
MOVING BARRIER REAR AXLE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 CART REAR AXLE X ACCELERATION, B01105AF.A05

Ymin = -22.79 G'S @ 0.0381 SECONDS, Ymax = 2.16 G'S @ 0.1204 SECONDS





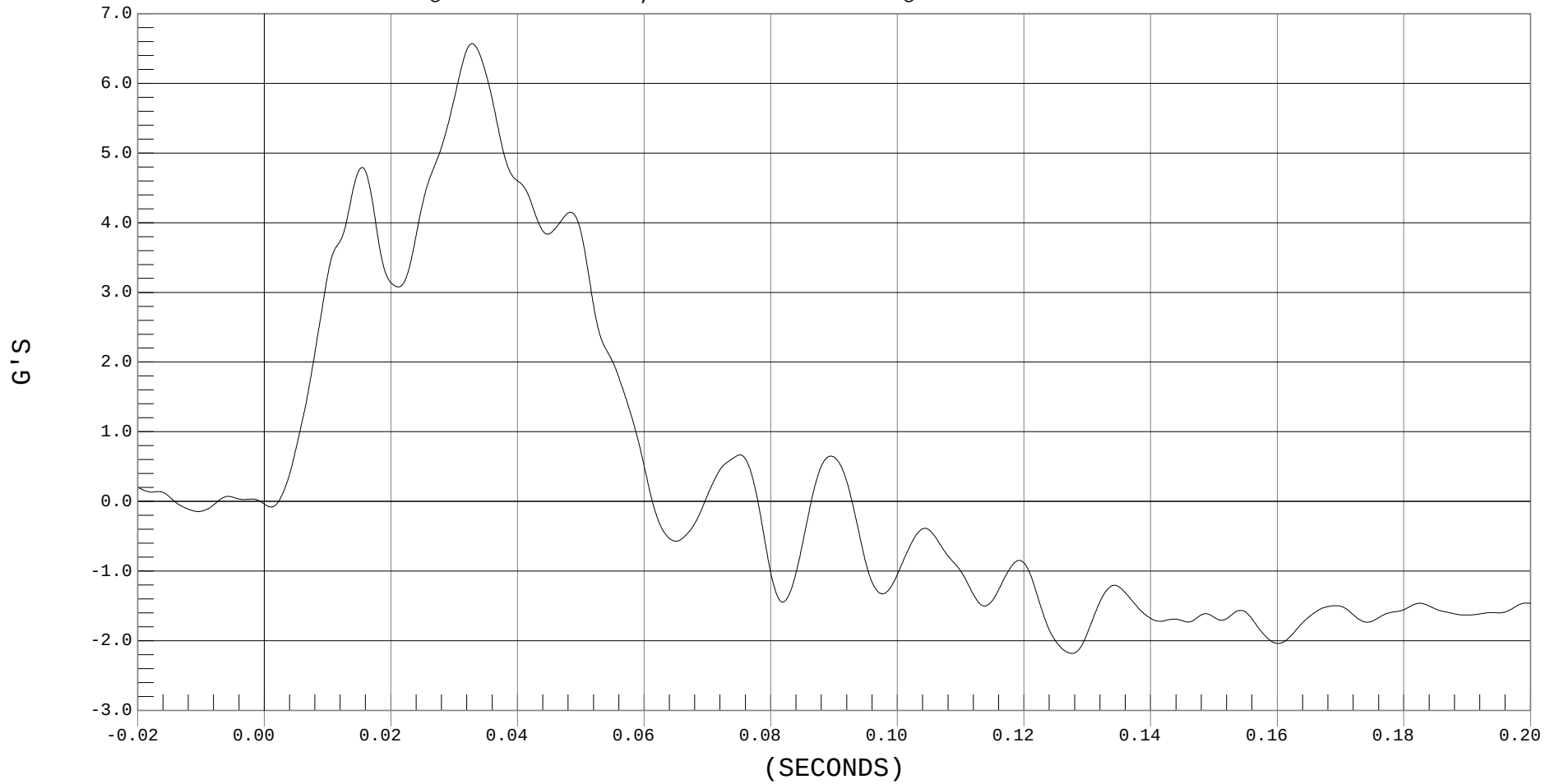
MOVING BARRIER REAR AXLE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 60

— 1 CART REAR AXLE Y ACCELERATION, B01105AF.A06

Ymin = -2.18 G'S @ 0.1275 SECONDS, Ymax = 6.57 G'S @ 0.0327 SECONDS





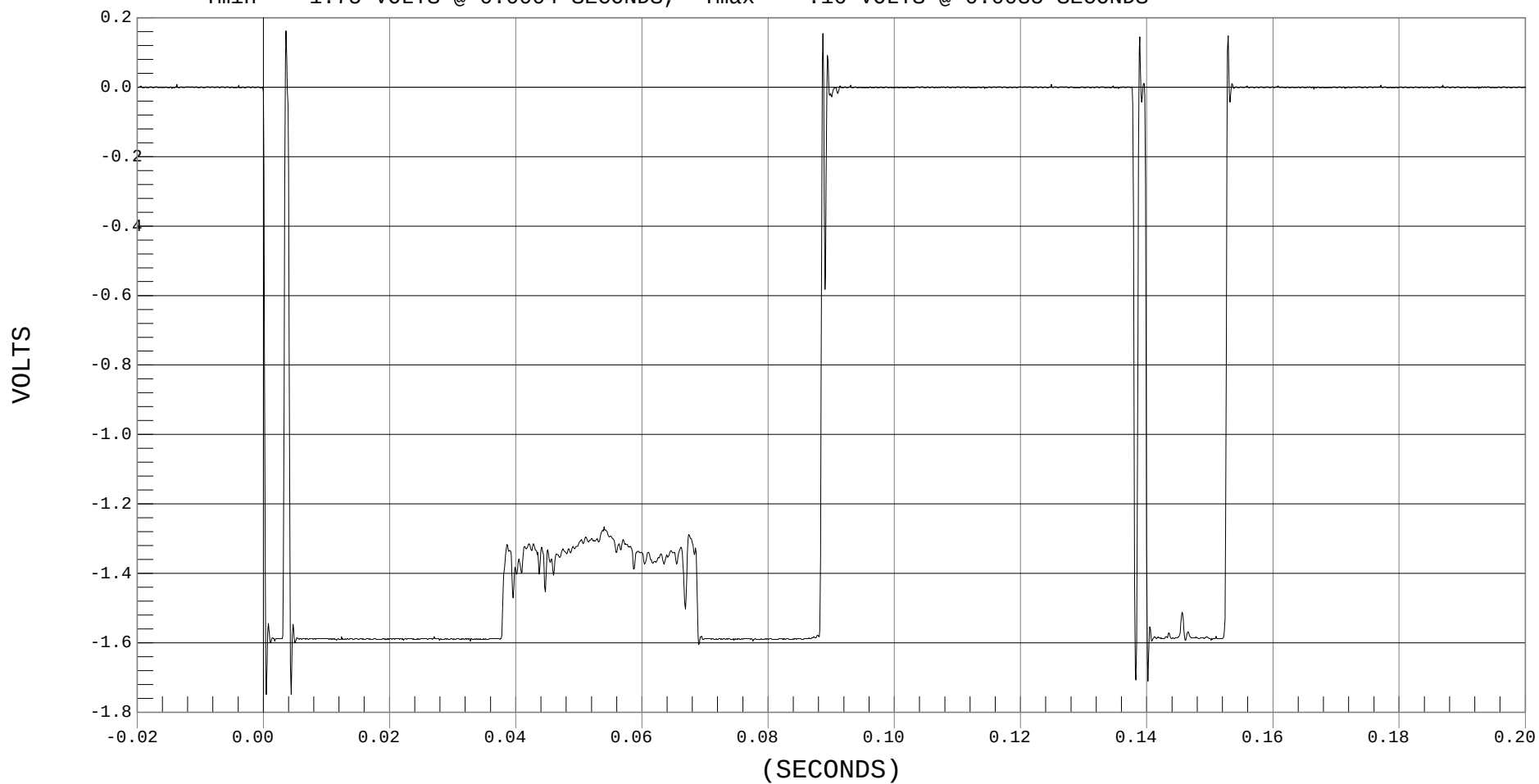
LEFT BARRIER CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 LEFT CONTACT, B011050T.010

Ymin = -1.75 VOLTS @ 0.0004 SECONDS, Ymax = .16 VOLTS @ 0.0035 SECONDS





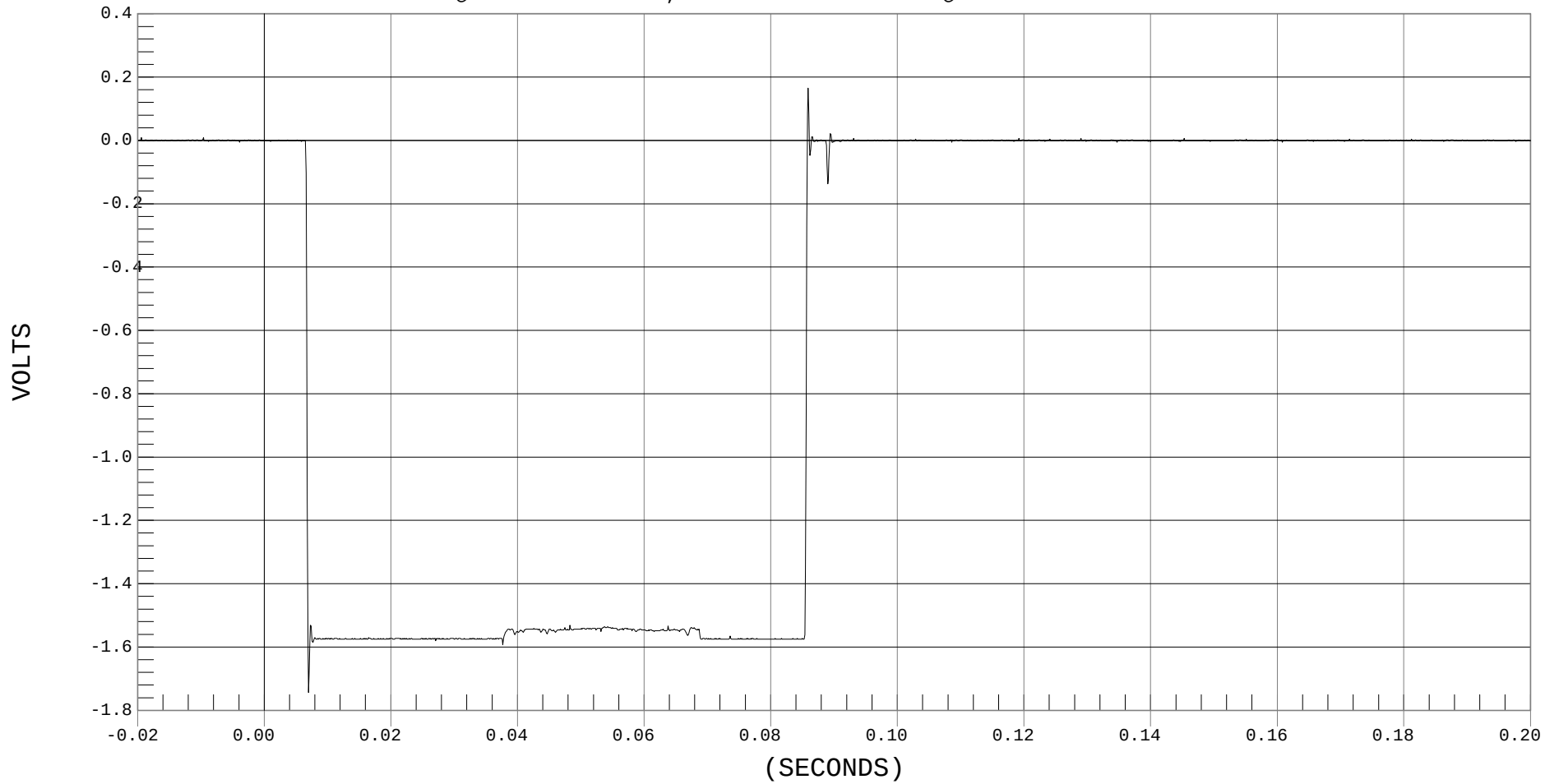
RIGHT BARRIER CONTACT

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Filter Class: 1000

— 1 RIGHT CONTACT, B011050T.009

Ymin = -1.74 VOLTS @ 0.0069 SECONDS, Ymax = .17 VOLTS @ 0.0858 SECONDS





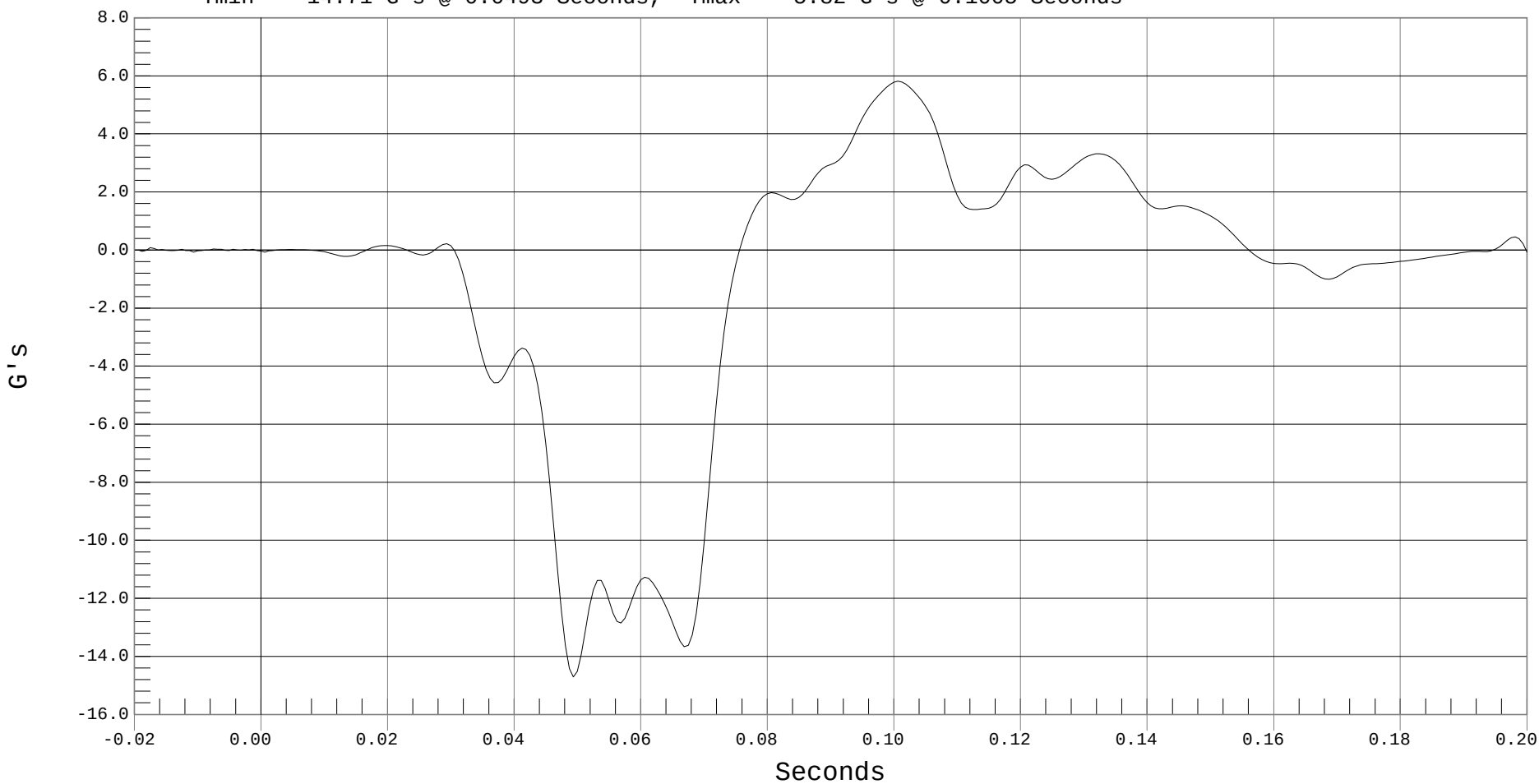
DRIVER UPPER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER UPPER SPINE X, B01105FI.R20

Ymin = -14.71 G's @ 0.0493 Seconds, Ymax = 5.82 G's @ 0.1005 Seconds





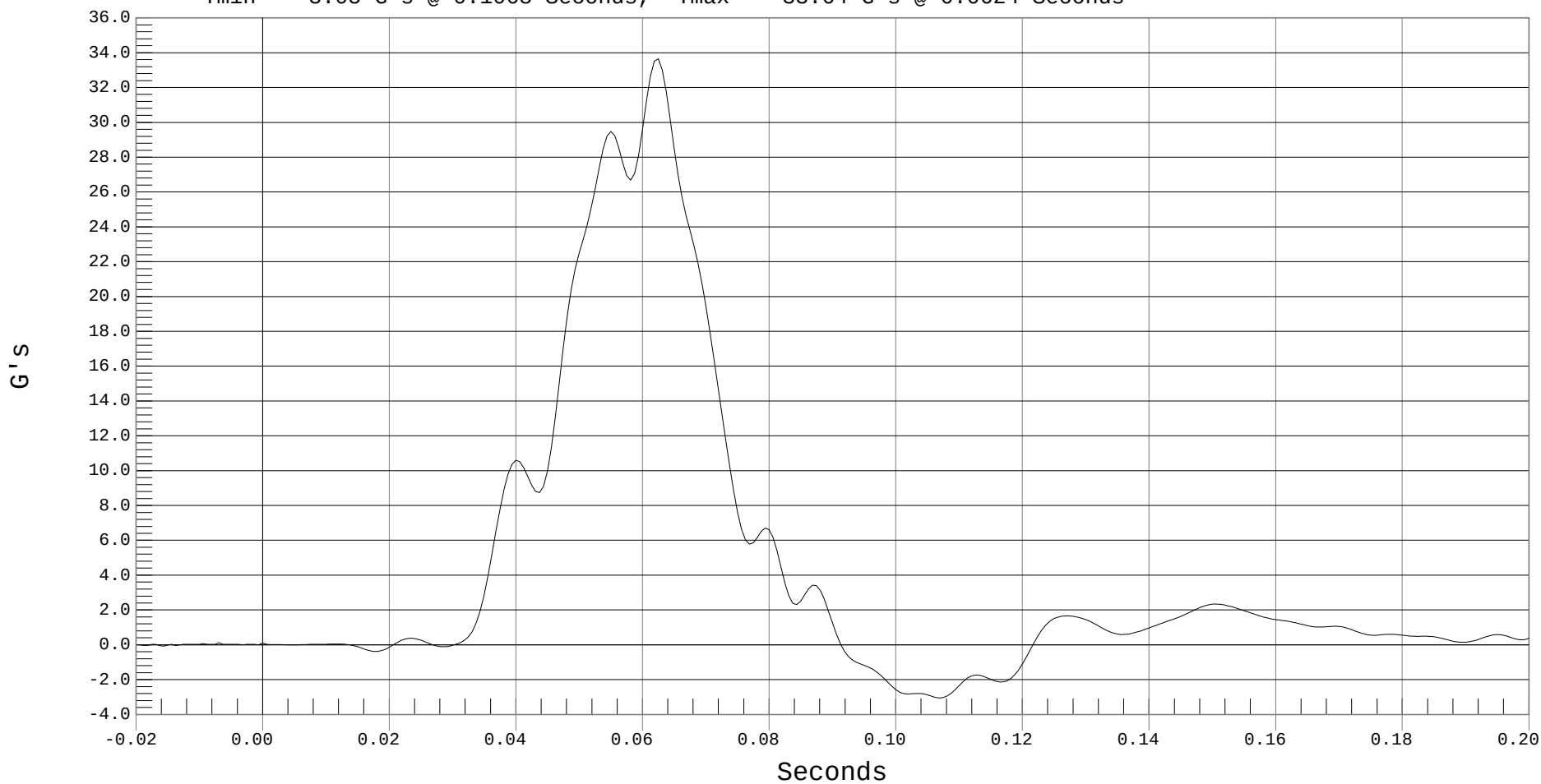
DRIVER UPPER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER UPPER SPINE Y, B01105FI.R21

Ymin = -3.05 G's @ 0.1068 Seconds, Ymax = 33.64 G's @ 0.0624 Seconds





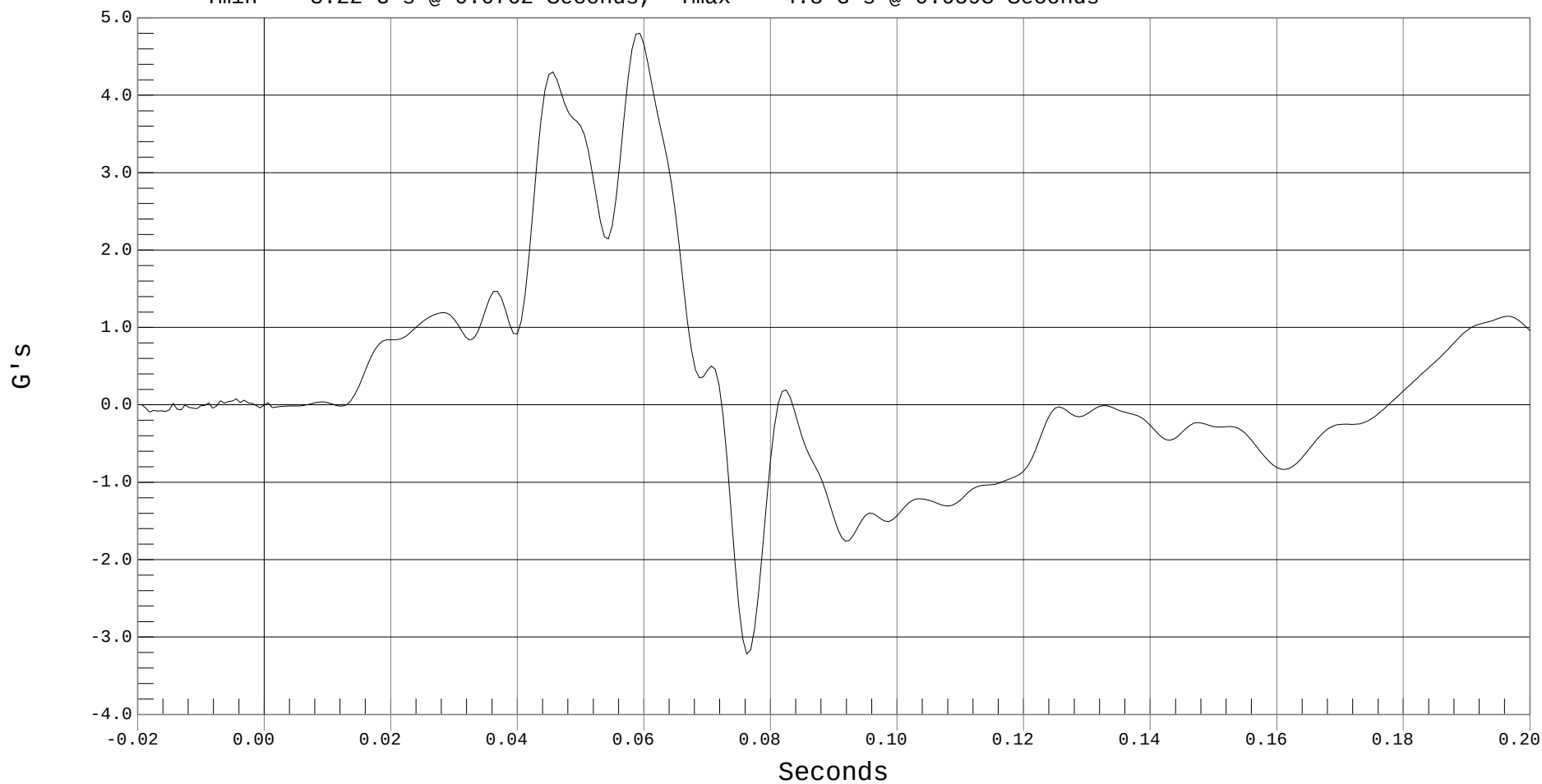
DRIVER UPPER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER UPPER SPINE Z, B01105FI.R22

Ymin = -3.22 G's @ 0.0762 Seconds, Ymax = 4.8 G's @ 0.0593 Seconds





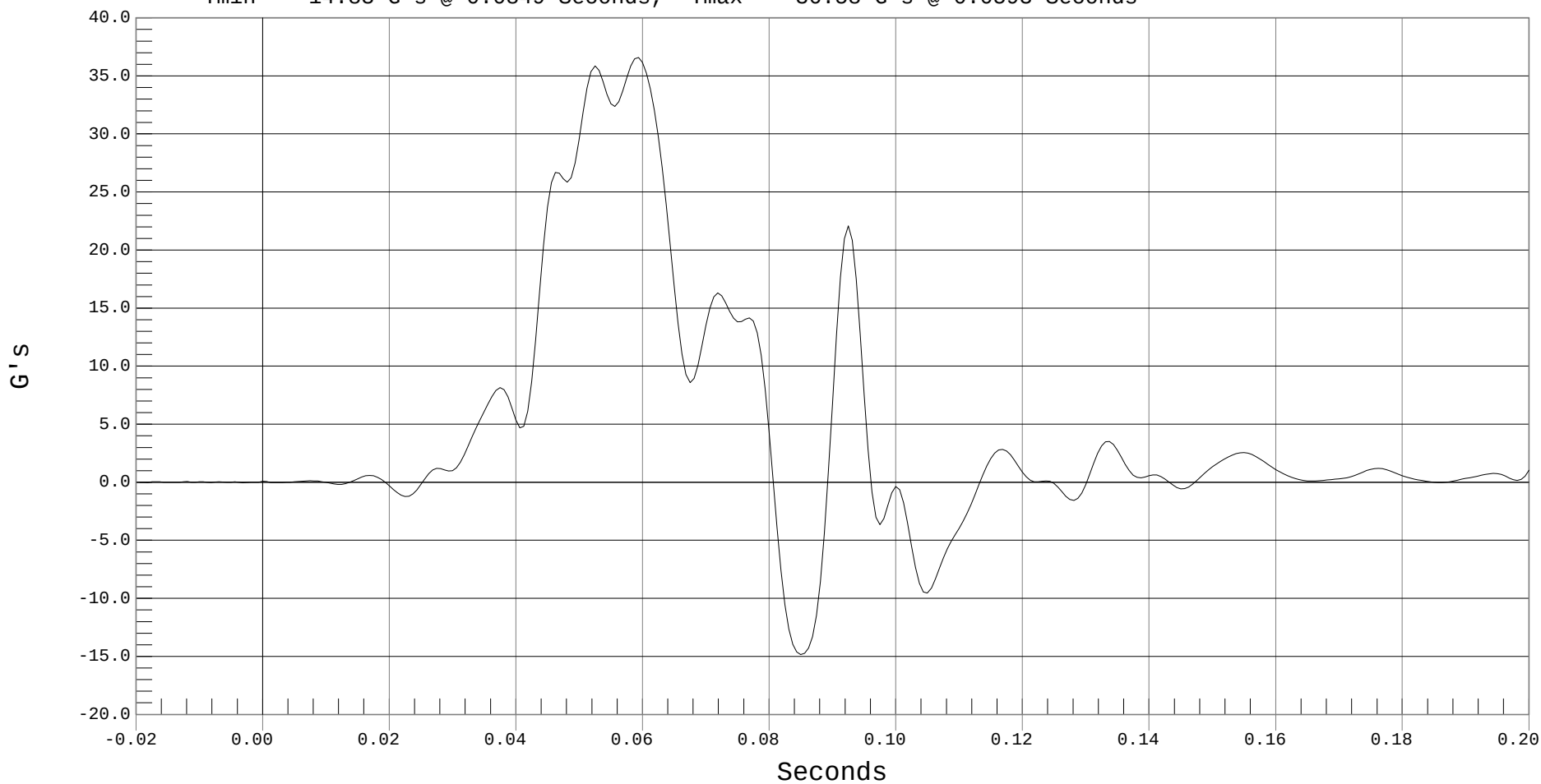
DRIVER UPPER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER UPPER RIB Y, B01105FI.R23

Ymin = -14.83 G's @ 0.0849 Seconds, Ymax = 36.58 G's @ 0.0593 Seconds





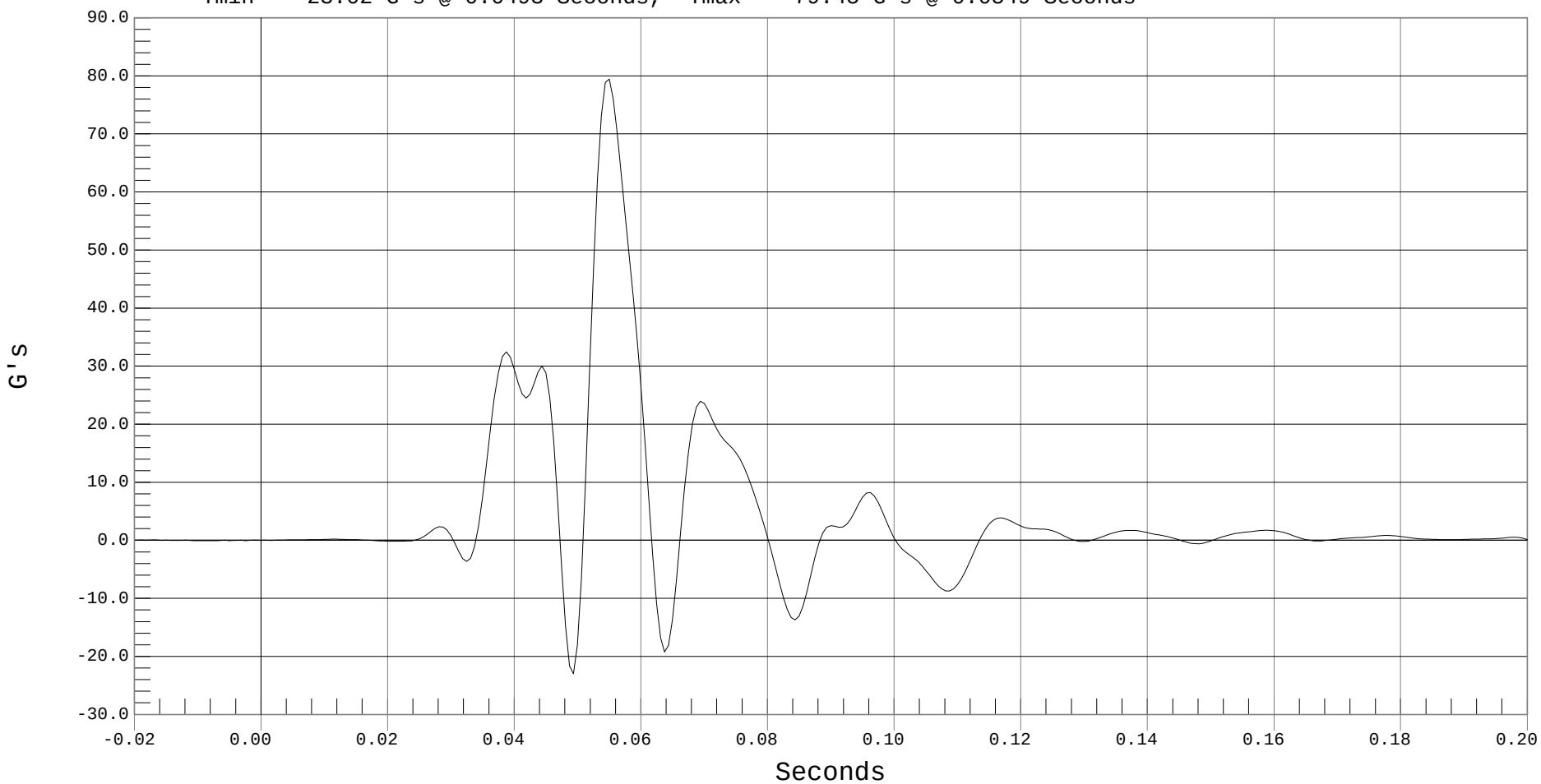
DRIVER MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER MID RIB Y, B01105FI.R24

Ymin = -23.02 G's @ 0.0493 Seconds, Ymax = 79.45 G's @ 0.0549 Seconds





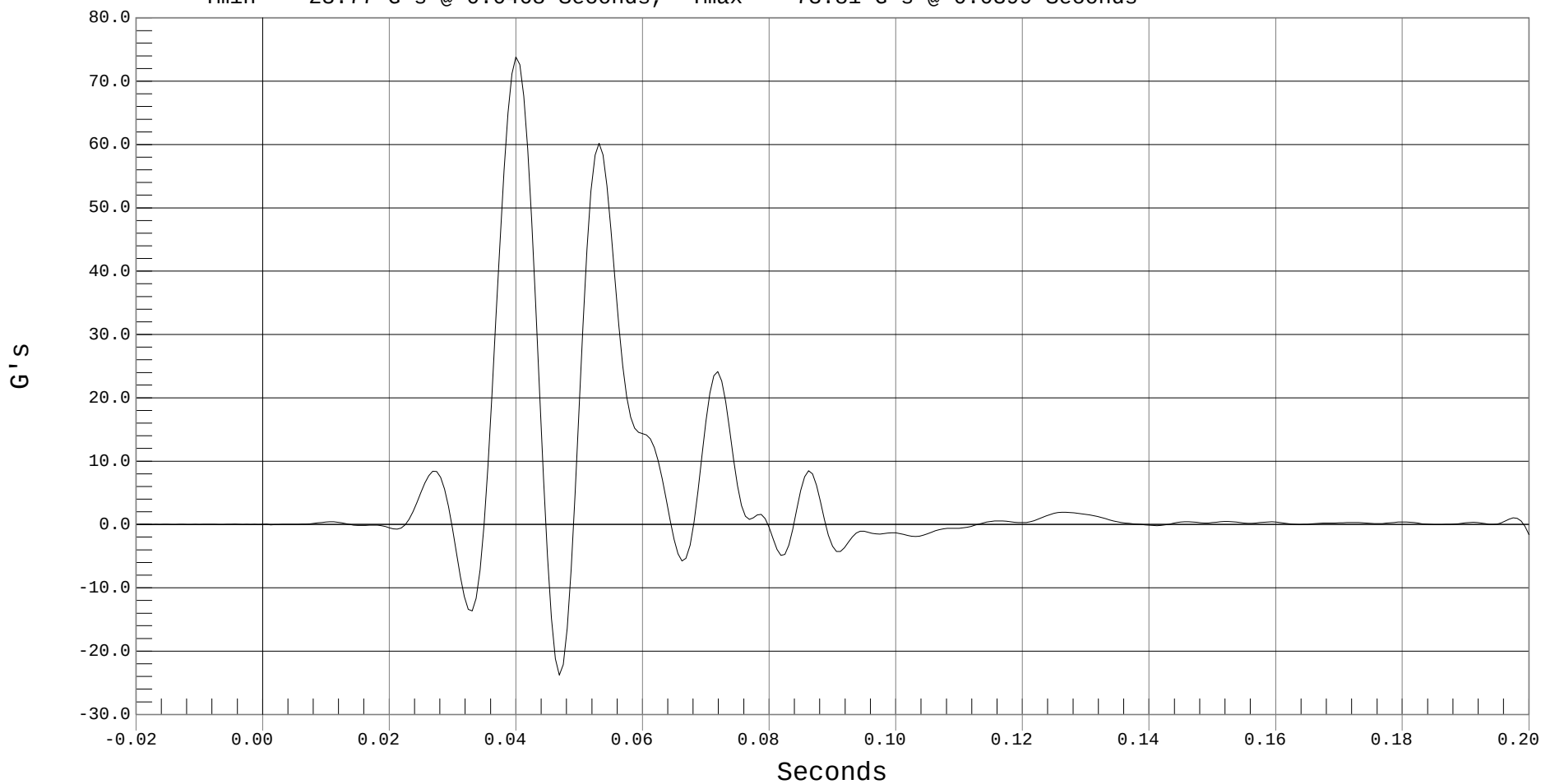
DRIVER LOWER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER LOWER RIB Y, B01105FI.R25

Ymin = -23.77 G's @ 0.0468 Seconds, Ymax = 73.81 G's @ 0.0399 Seconds





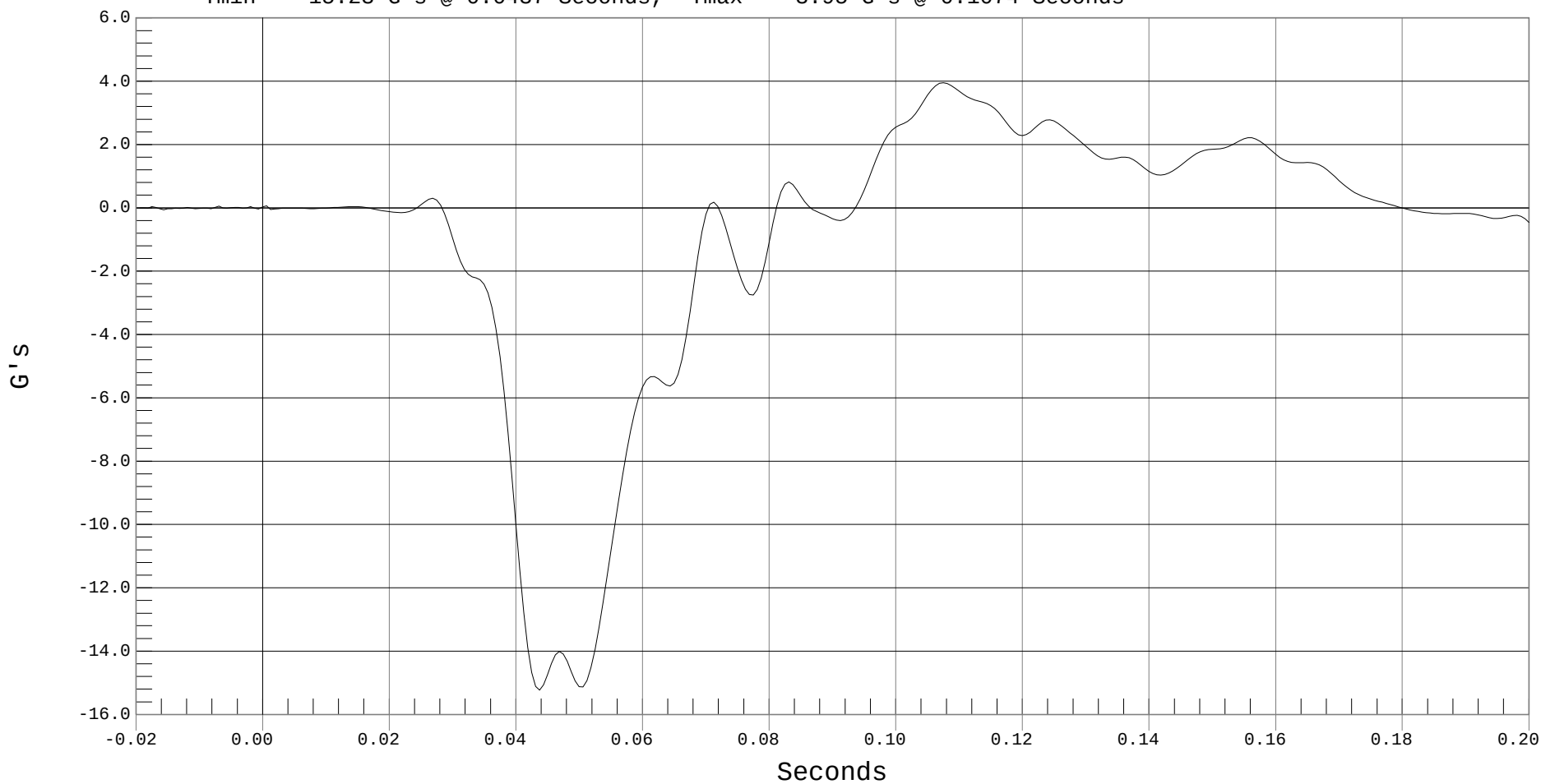
DRIVER LOWER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER LOWER SPINE X, B01105FI.R29

Ymin = -15.23 G's @ 0.0437 Seconds, Ymax = 3.95 G's @ 0.1074 Seconds





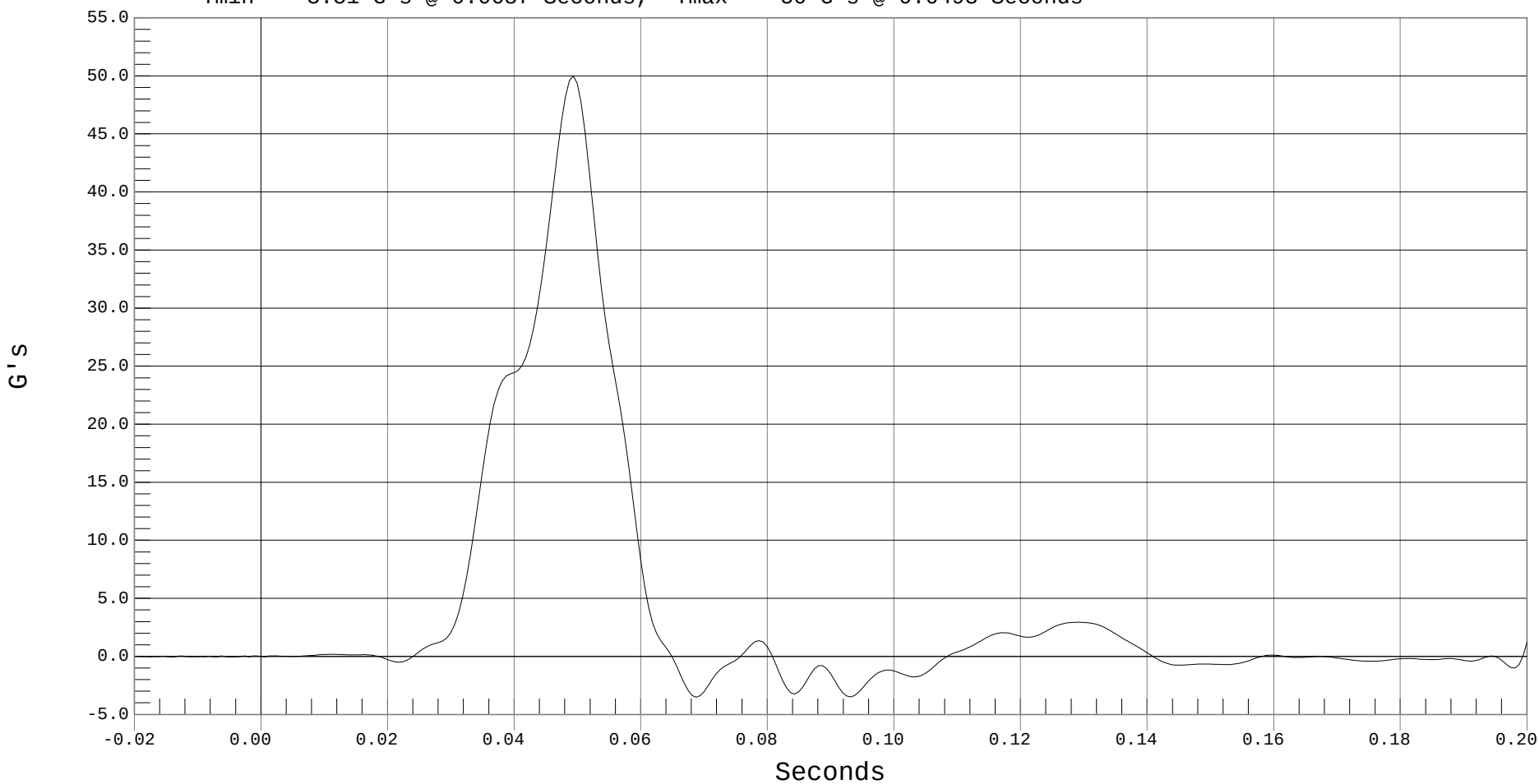
DRIVER LOWER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER LOWER SPINE Y, B01105FI.R30

Ymin = -3.51 G's @ 0.0687 Seconds, Ymax = 50 G's @ 0.0493 Seconds





DRIVER LOWER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT

Component: 2002 FORD ESCAPE 4WD

Other Info:

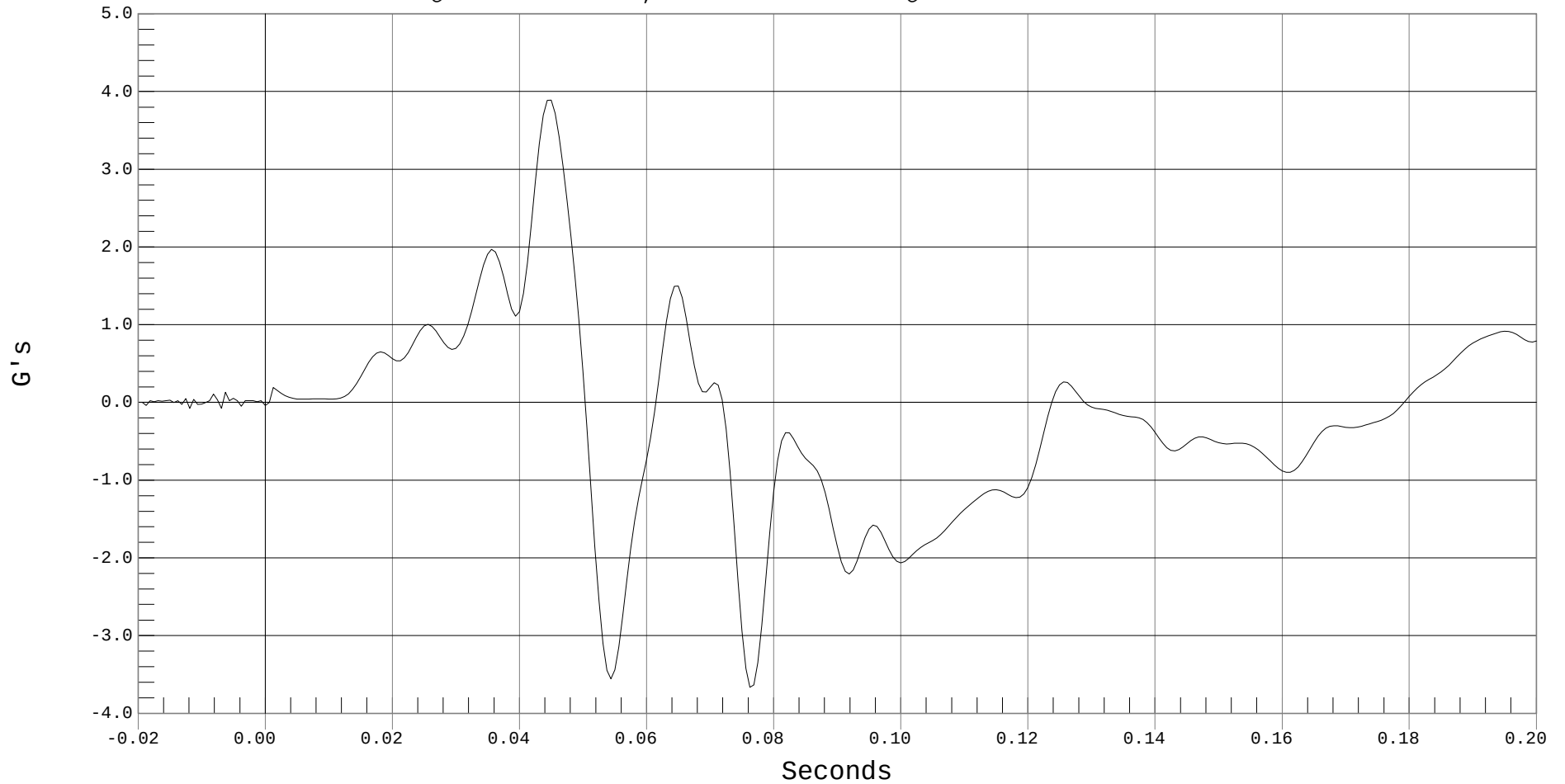
Test Date: 10-12-01

Speed: 38.5 MPH, 62.0 KPH

Fir Filtered

— 1 DRIVER LOWER SPINE Z, B01105FI.R31

Ymin = -3.67 G's @ 0.0762 Seconds, Ymax = 3.89 G's @ 0.0449 Seconds





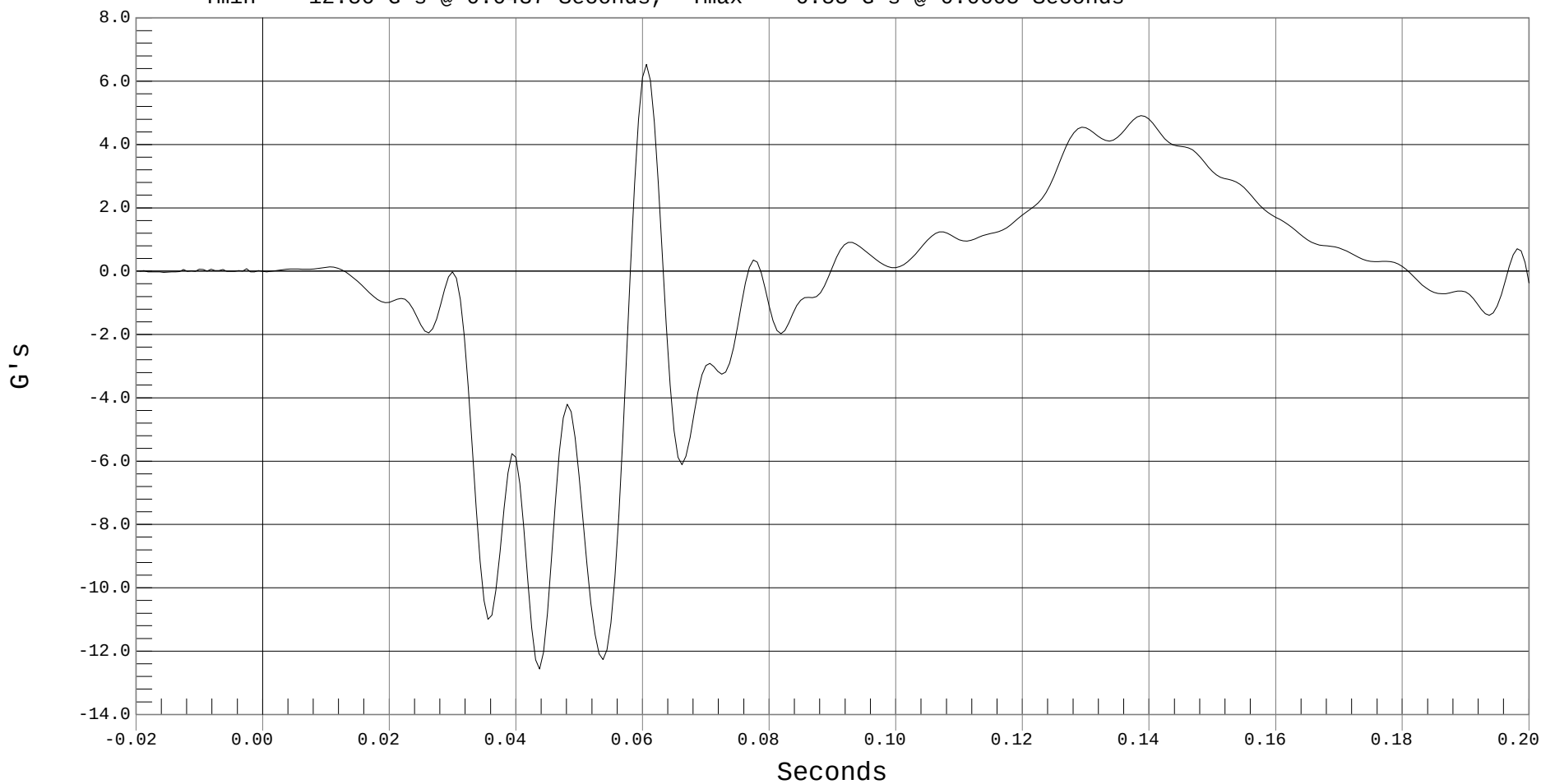
DRIVER PELVIS X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER PELVIS X, B01105FI.R45

Ymin = -12.56 G's @ 0.0437 Seconds, Ymax = 6.53 G's @ 0.0605 Seconds





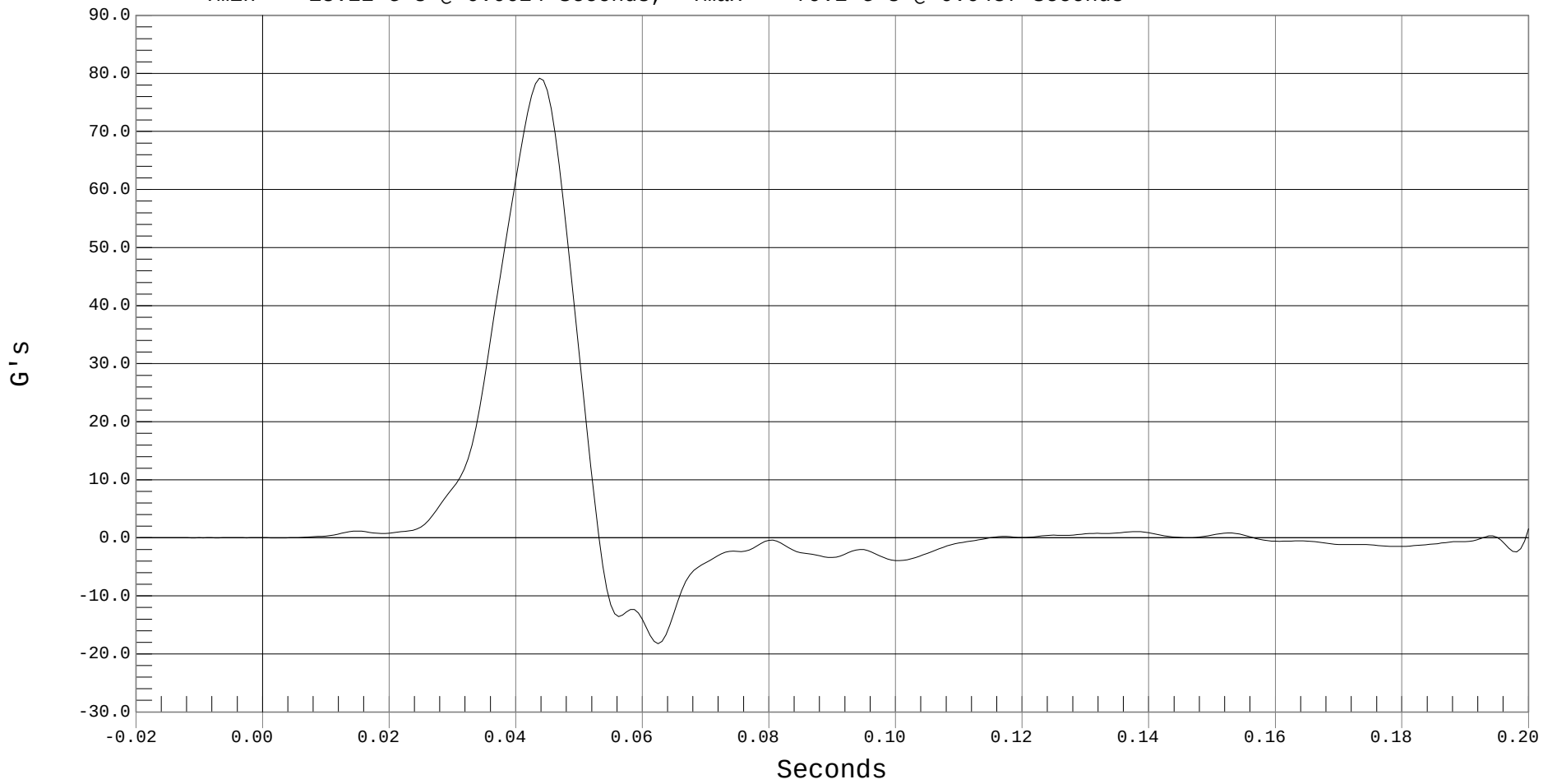
DRIVER PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER PELVIS Y, B01105FI.R46

Ymin = -18.22 G's @ 0.0624 Seconds, Ymax = 79.2 G's @ 0.0437 Seconds





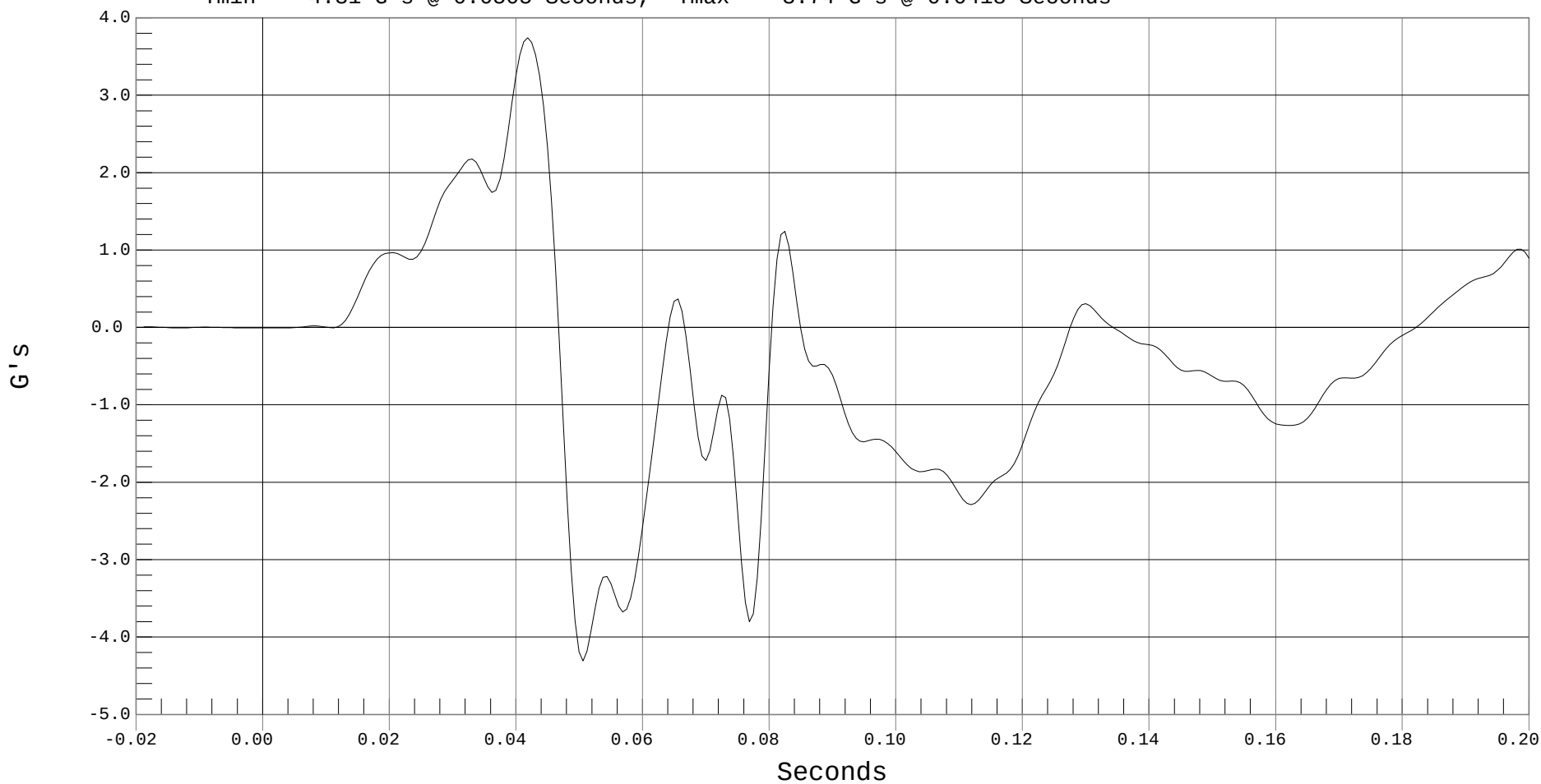
DRIVER PELVIS Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 DRIVER PELVIS Z, B01105FI.R47

Ymin = -4.31 G's @ 0.0505 Seconds, Ymax = 3.74 G's @ 0.0418 Seconds





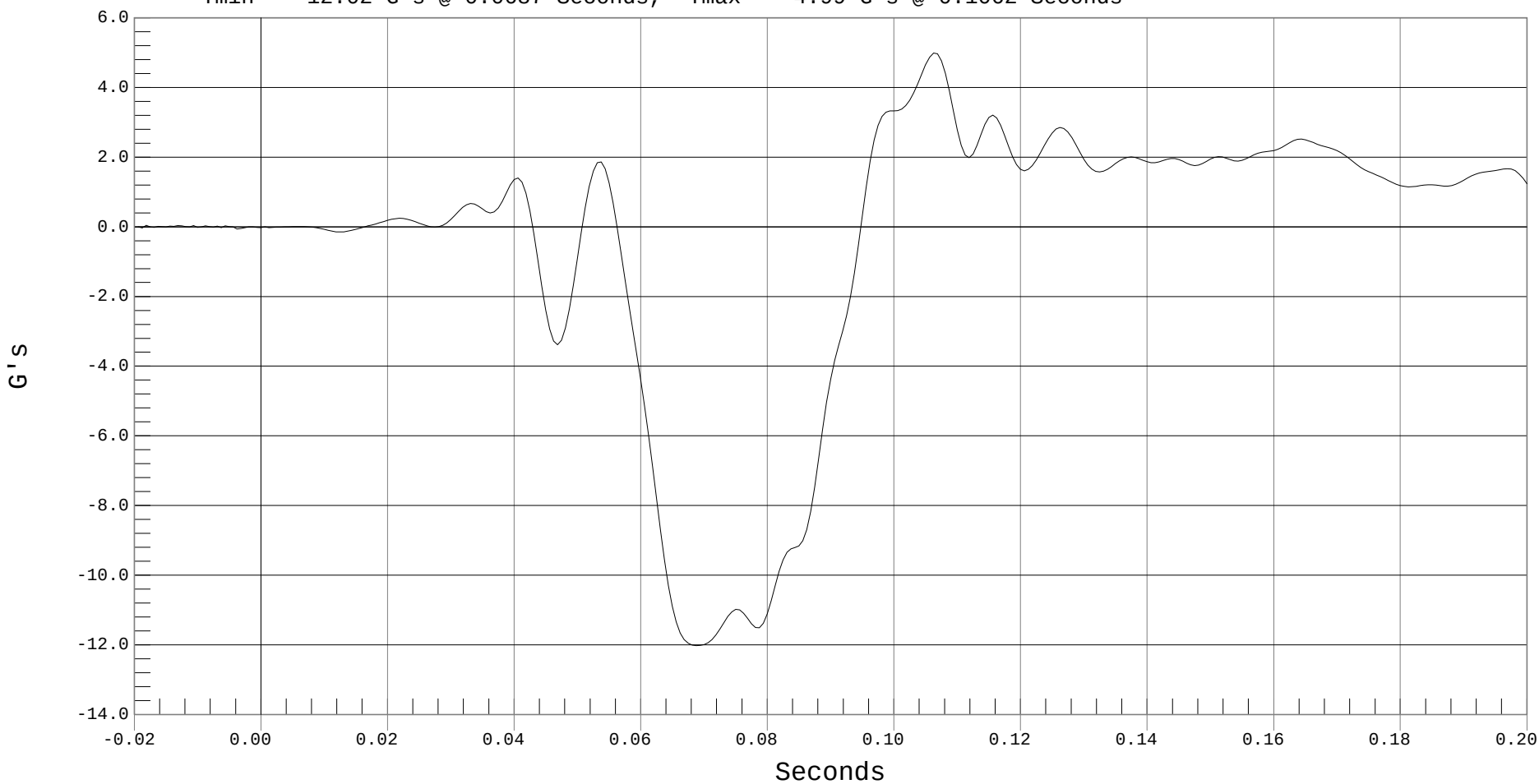
PASSENGER UPPER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

1 REAR PASSENGER UPPER SPINE X, B01105FI.R80

Ymin = -12.02 G's @ 0.0687 Seconds, Ymax = 4.99 G's @ 0.1062 Seconds





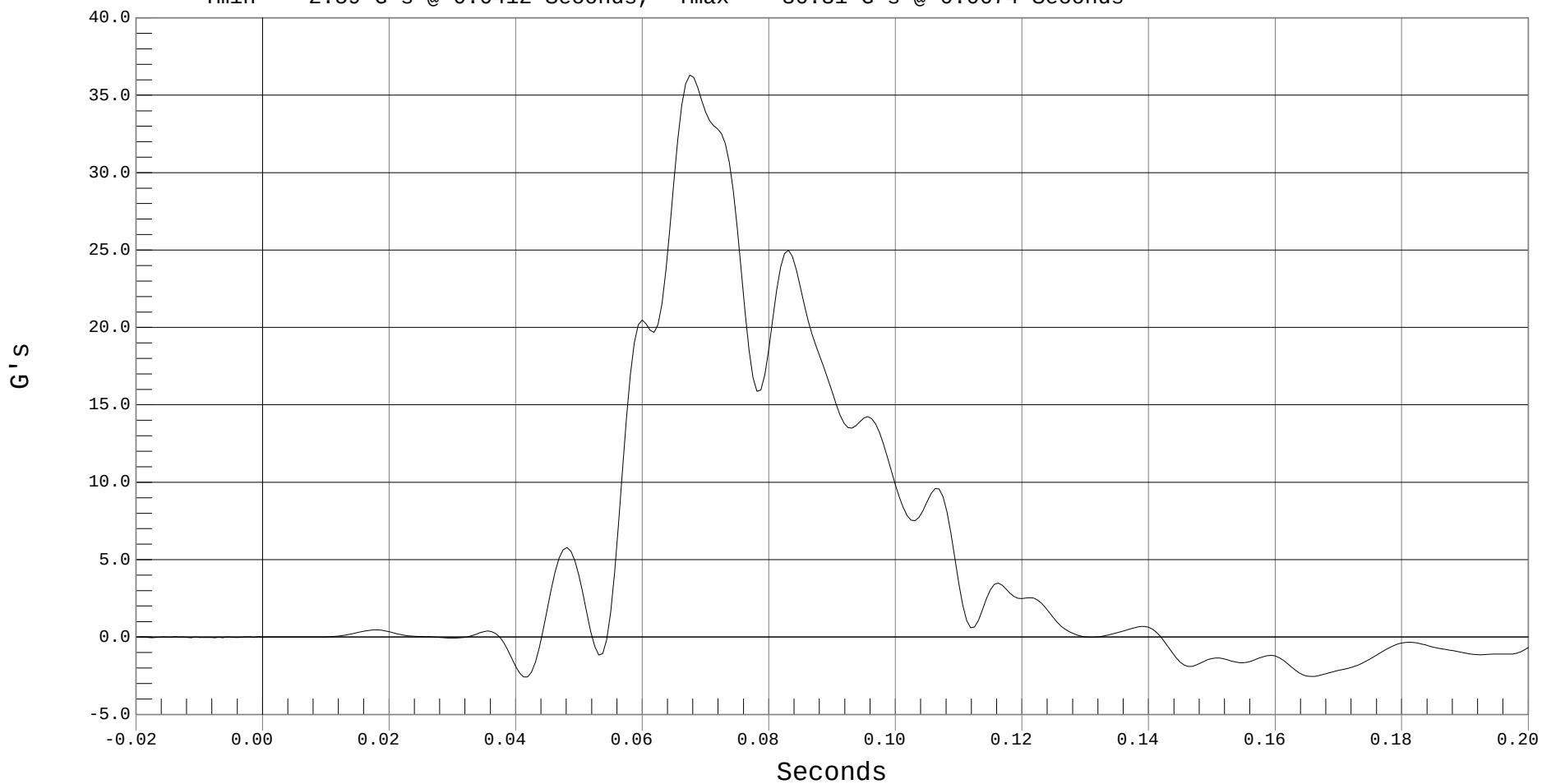
PASSENGER UPPER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER UPPER SPINE Y, B01105FI.R81

Ymin = -2.59 G's @ 0.0412 Seconds, Ymax = 36.31 G's @ 0.0674 Seconds





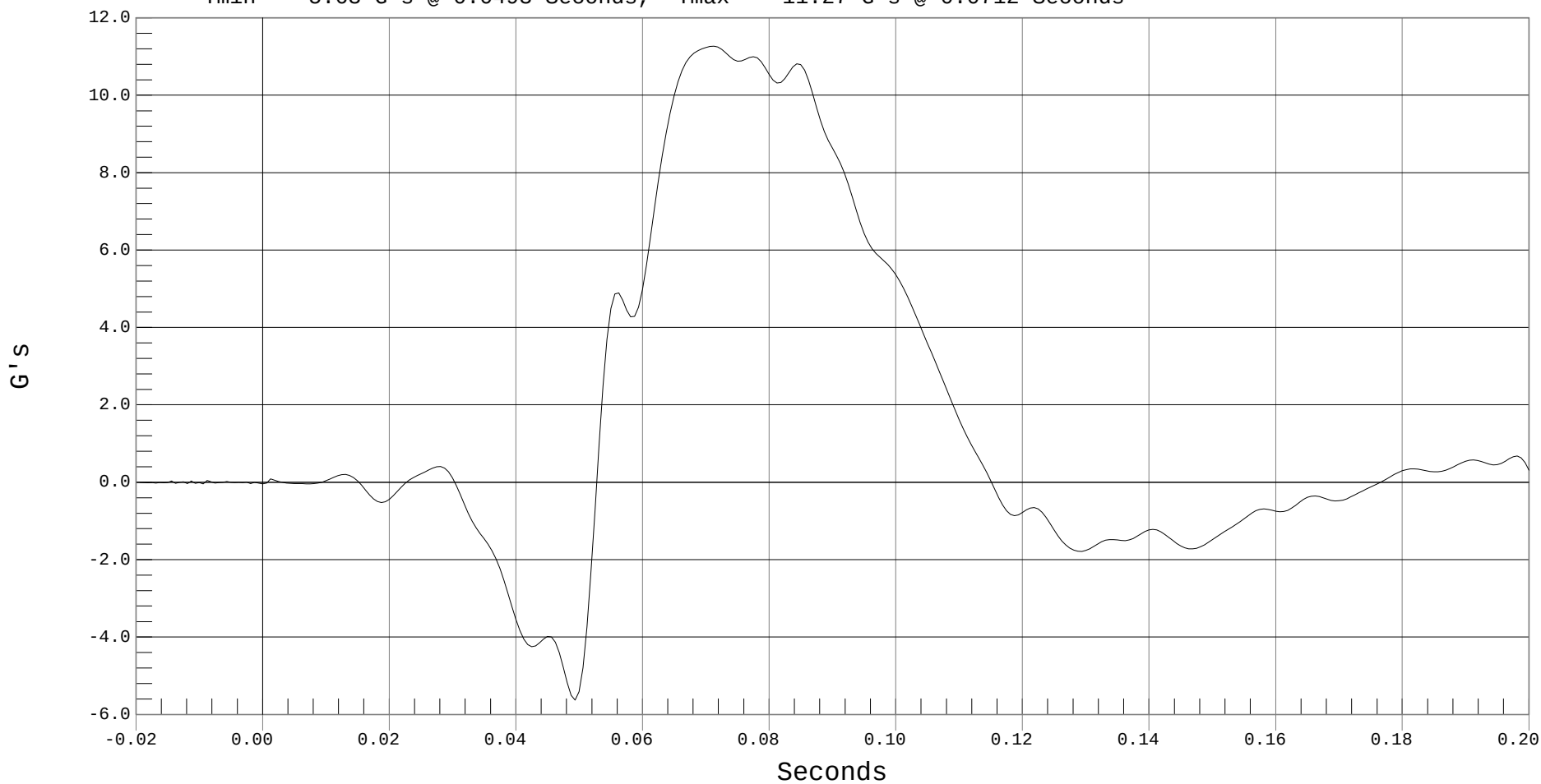
PASSENGER UPPER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER UPPER SPINE Z, B01105FI.R82

Ymin = -5.63 G's @ 0.0493 Seconds, Ymax = 11.27 G's @ 0.0712 Seconds





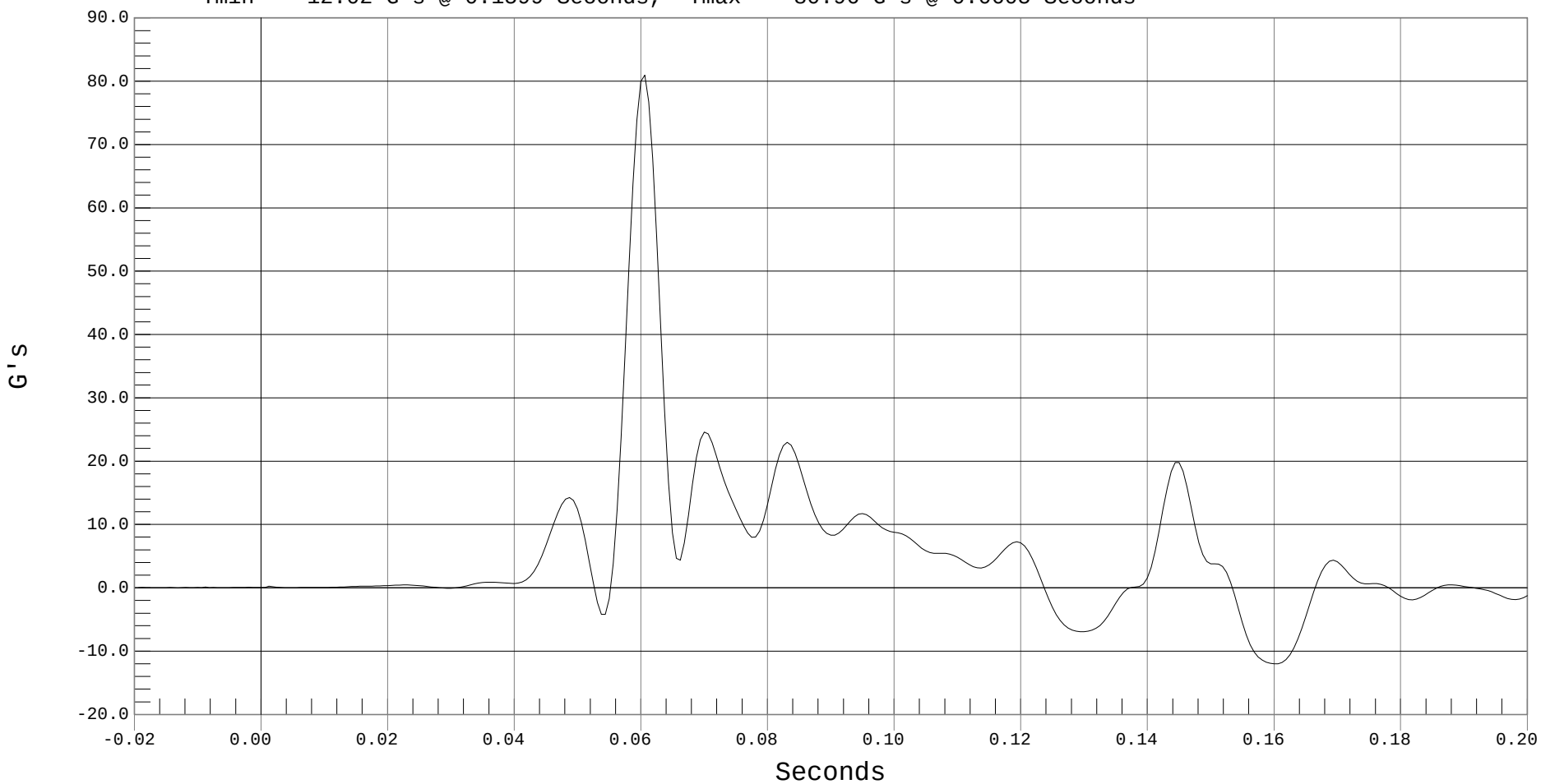
PASSENGER UPPER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER UPPER RIB Y, B01105FI.R83

Ymin = -12.02 G's @ 0.1599 Seconds, Ymax = 80.96 G's @ 0.0605 Seconds





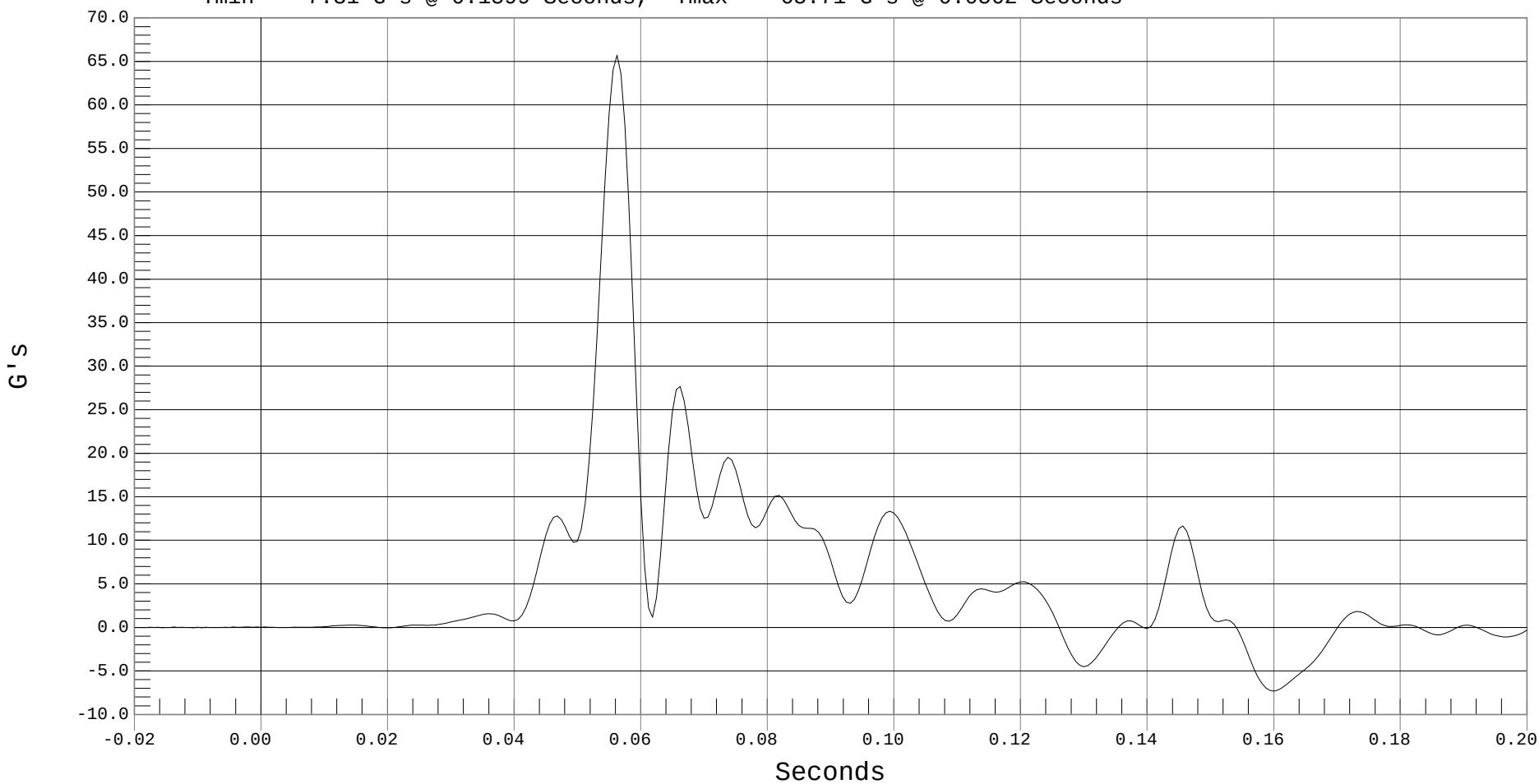
PASSENGER MID RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER MID RIB Y, B01105FI.R84

Ymin = -7.31 G's @ 0.1599 Seconds, Ymax = 65.71 G's @ 0.0562 Seconds





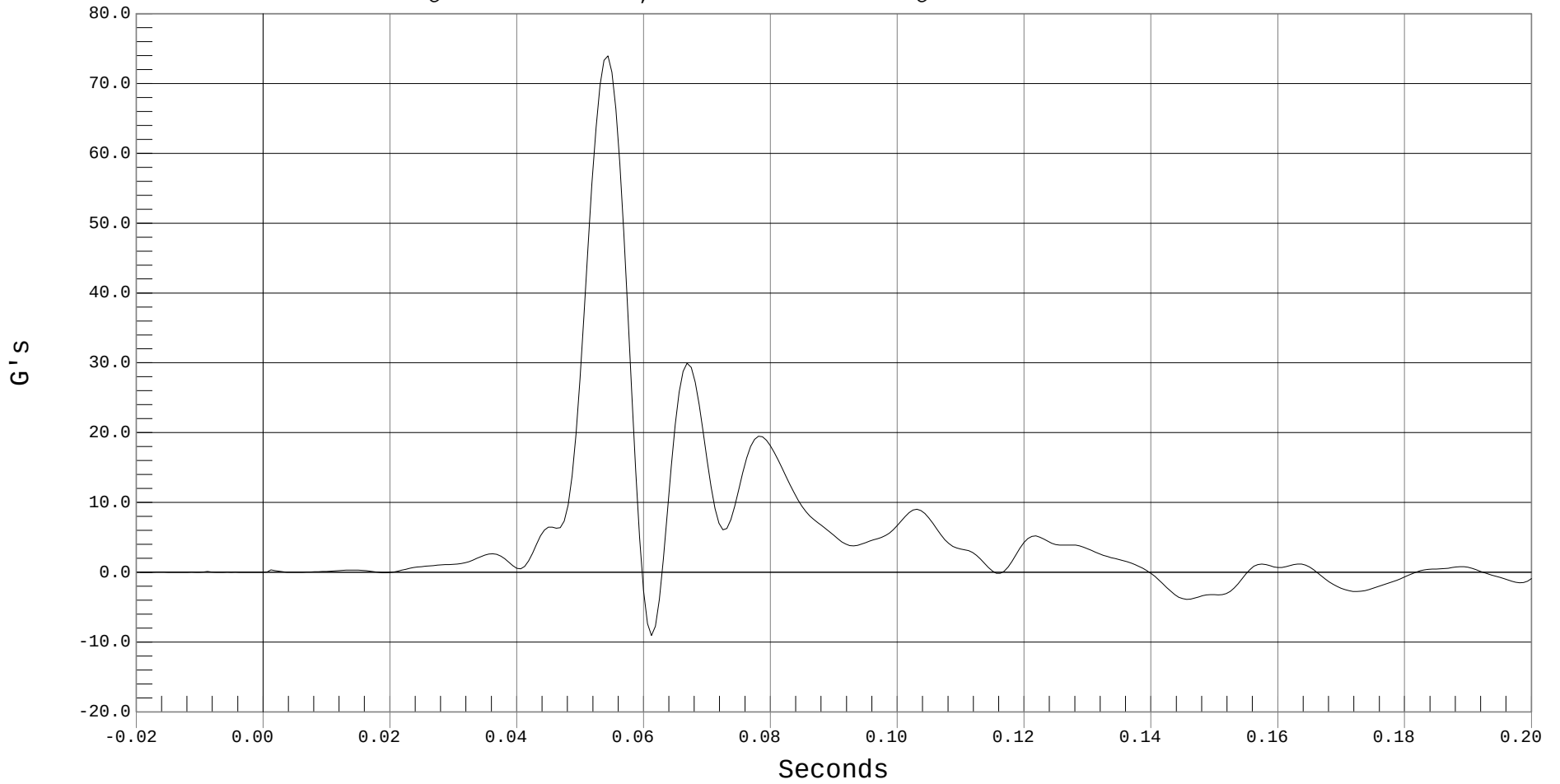
PASSENGER LOWER RIB Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER LOWER RIB Y, B01105FI.R85

Ymin = -9.04 G's @ 0.0612 Seconds, Ymax = 73.98 G's @ 0.0543 Seconds





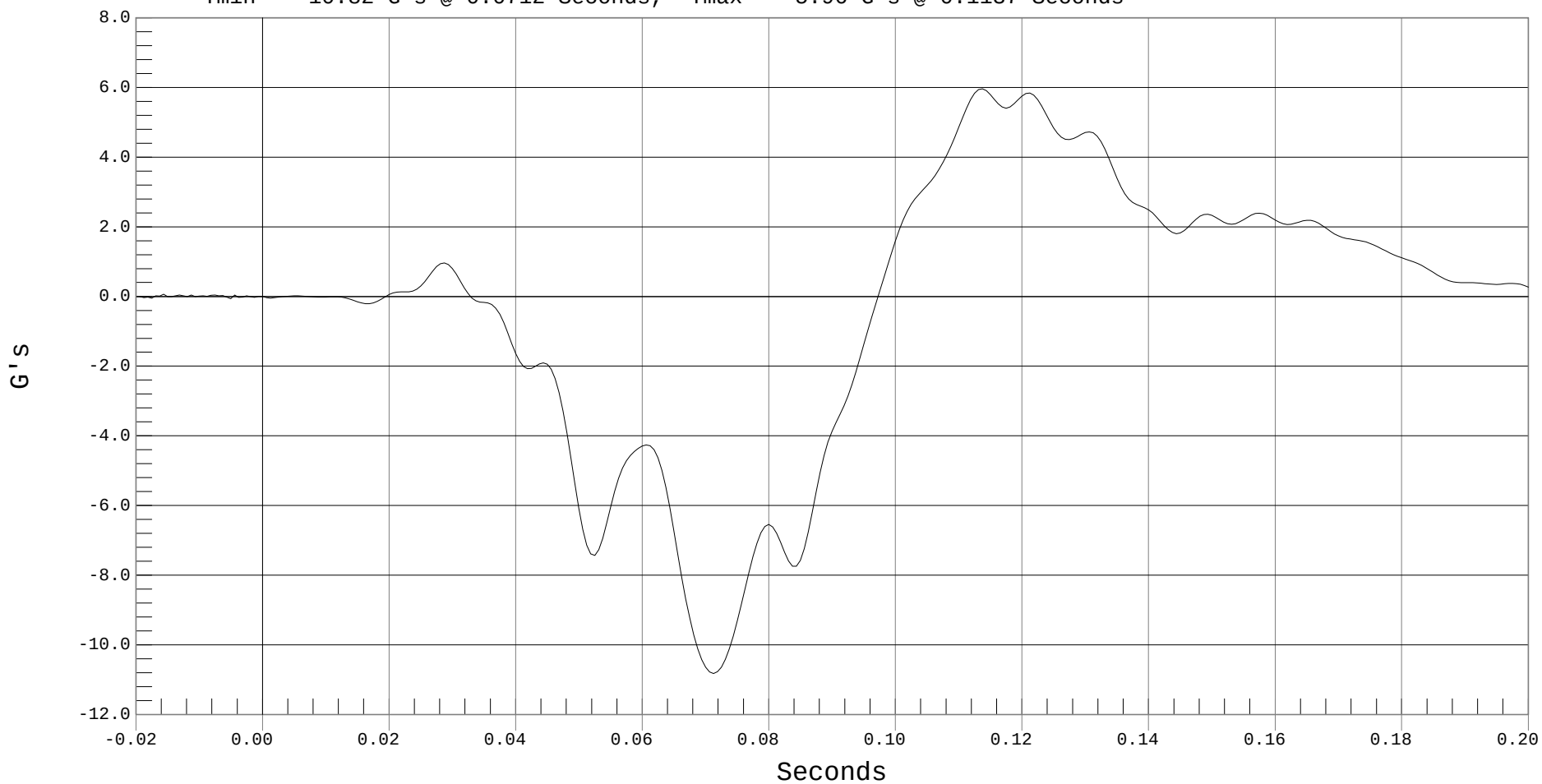
PASSENGER LOWER SPINE X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER LOWER SPINE X, B01105FI.R89

Ymin = -10.82 G's @ 0.0712 Seconds, Ymax = 5.96 G's @ 0.1137 Seconds





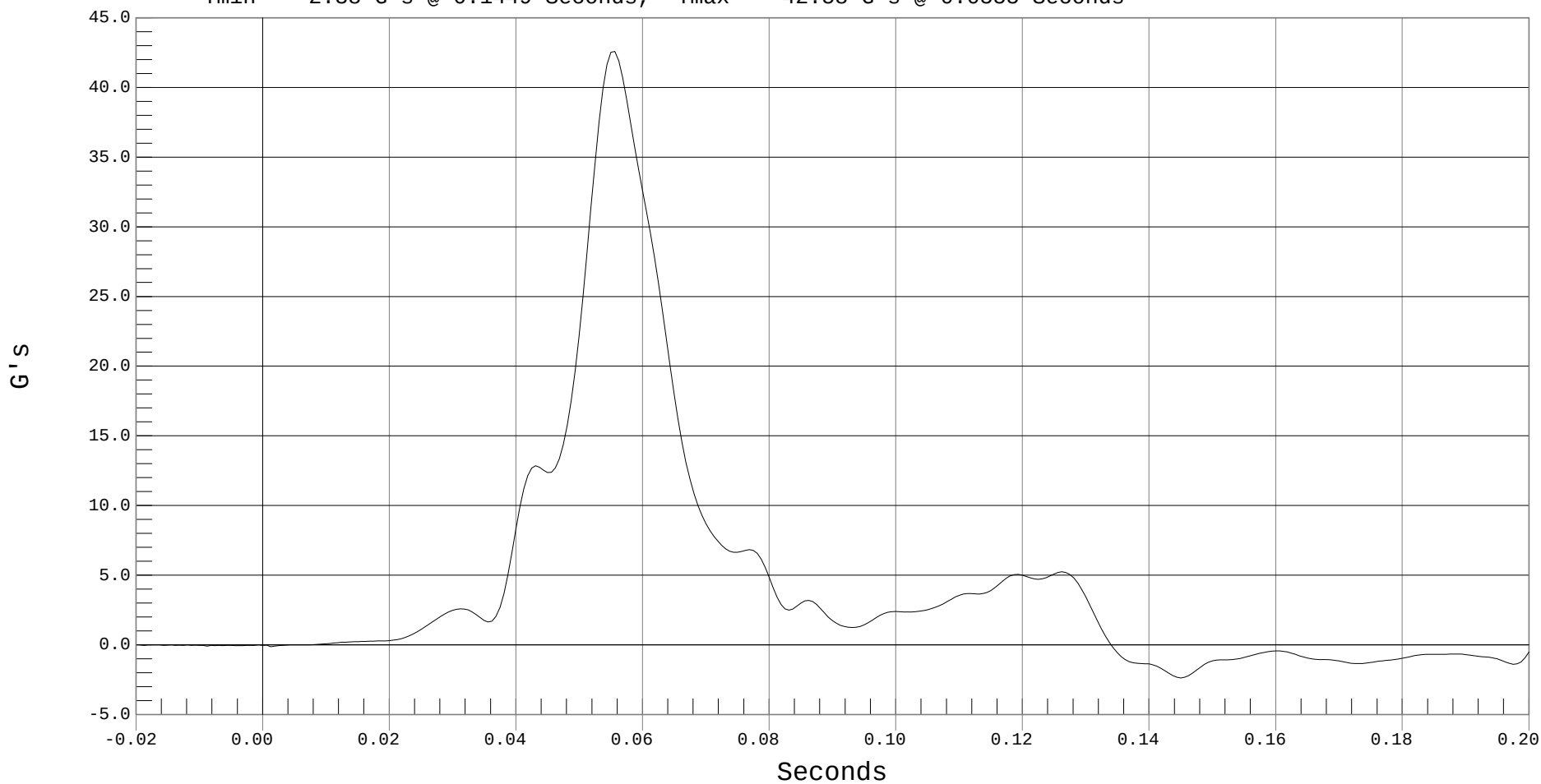
PASSENGER LOWER SPINE Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER LOWER SPINE Y, B01105FI.R90

Ymin = -2.38 G's @ 0.1449 Seconds, Ymax = 42.58 G's @ 0.0555 Seconds





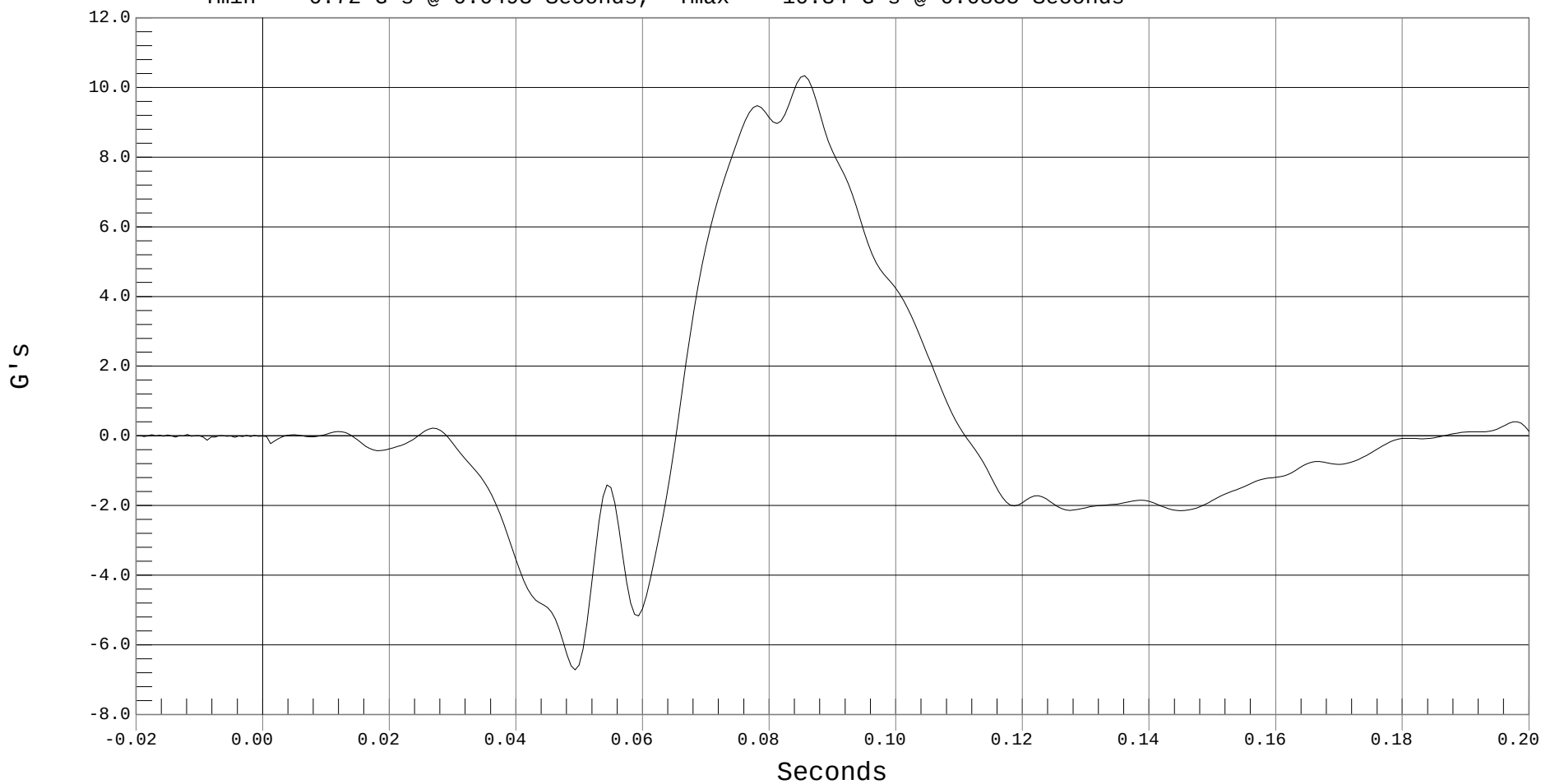
PASSENGER LOWER SPINE Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER LOWER SPINE Z, B01105FI.R91

Ymin = -6.72 G's @ 0.0493 Seconds, Ymax = 10.34 G's @ 0.0855 Seconds





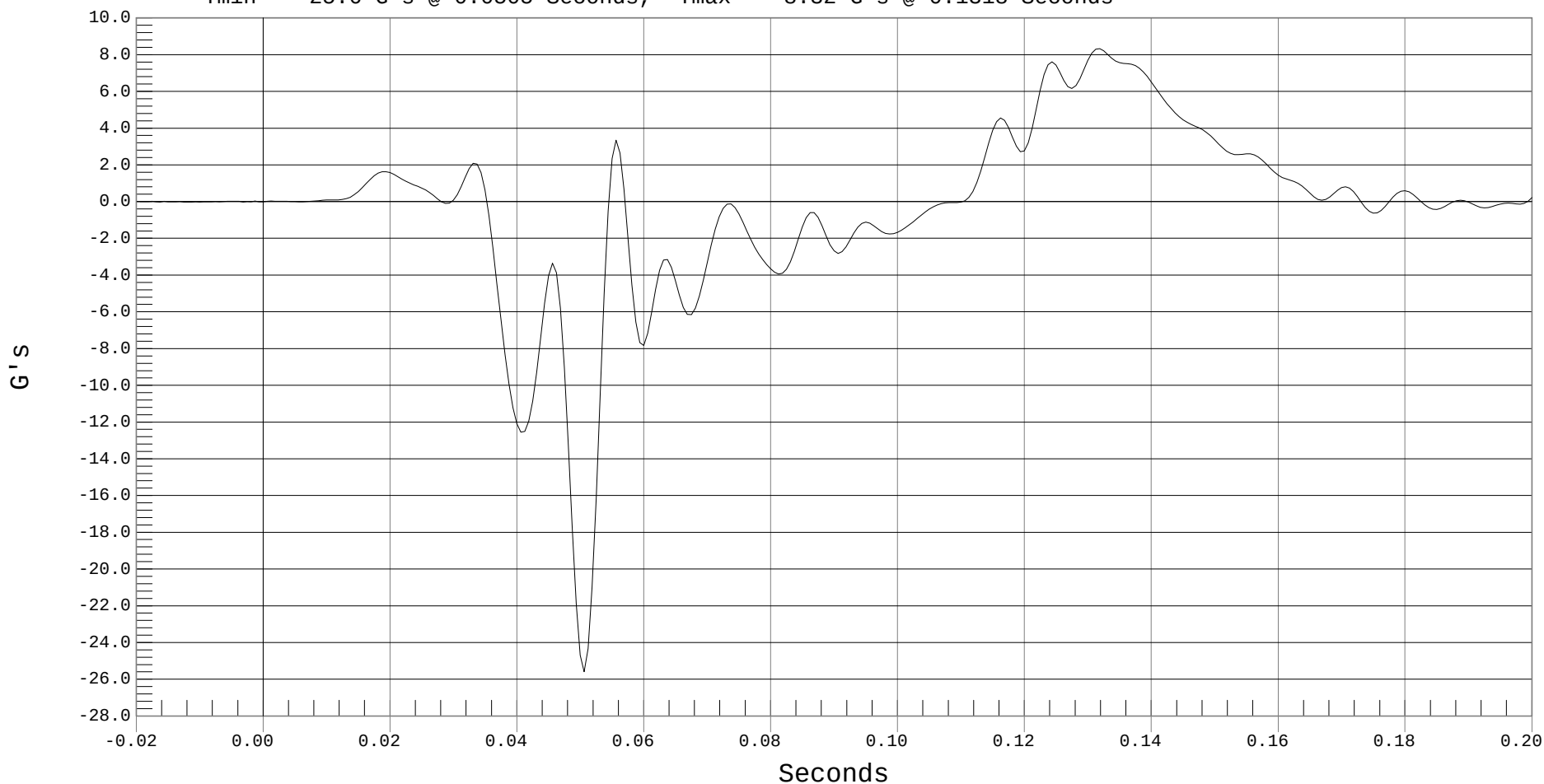
PASSENGER PELVIS X ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER PELVIS X, B01105FI.R10

Ymin = -25.6 G's @ 0.0505 Seconds, Ymax = 8.32 G's @ 0.1318 Seconds





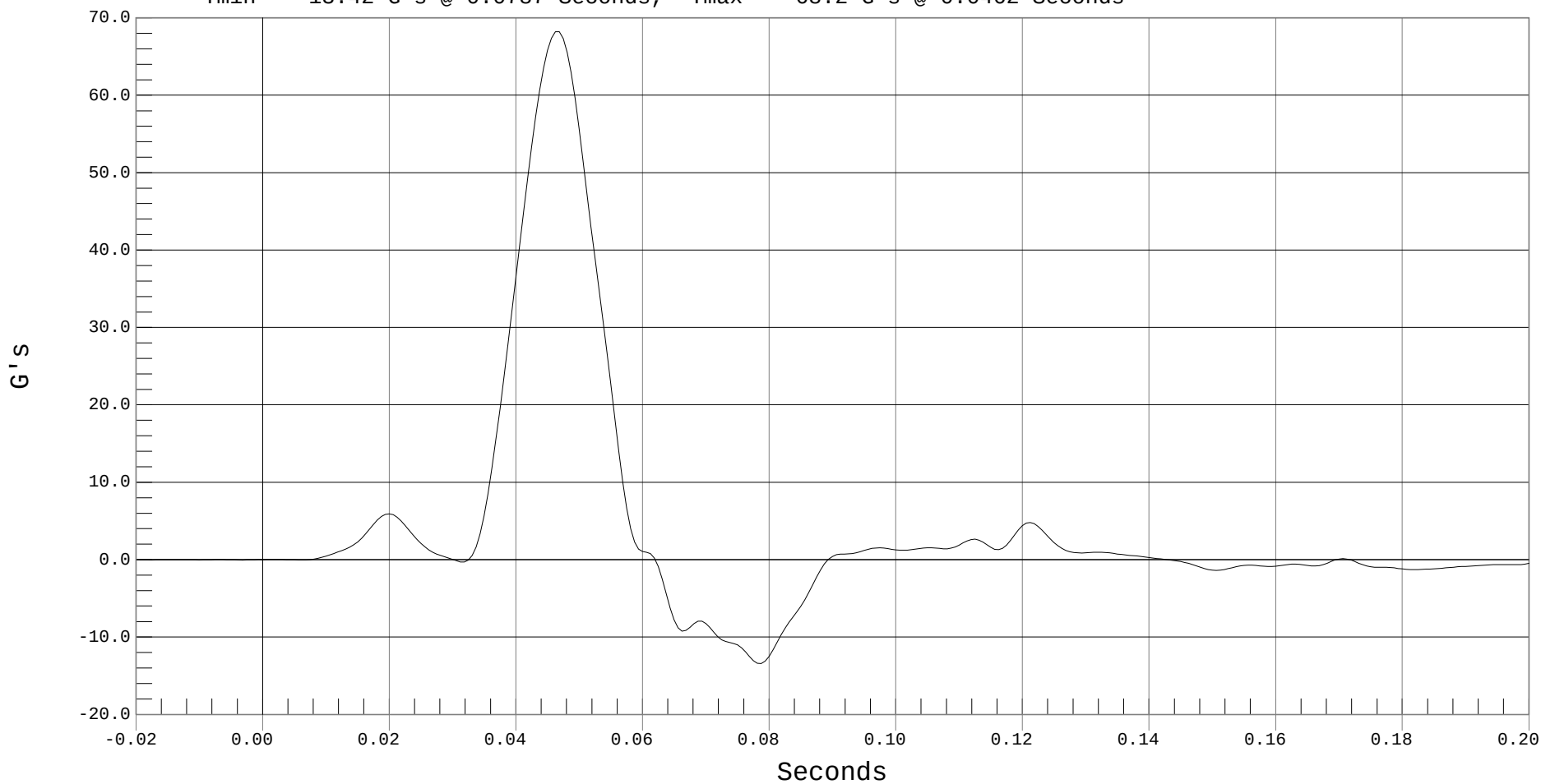
PASSENGER PELVIS Y ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER PELVIS Y, B01105FI.R11

Ymin = -13.42 G's @ 0.0787 Seconds, Ymax = 68.2 G's @ 0.0462 Seconds





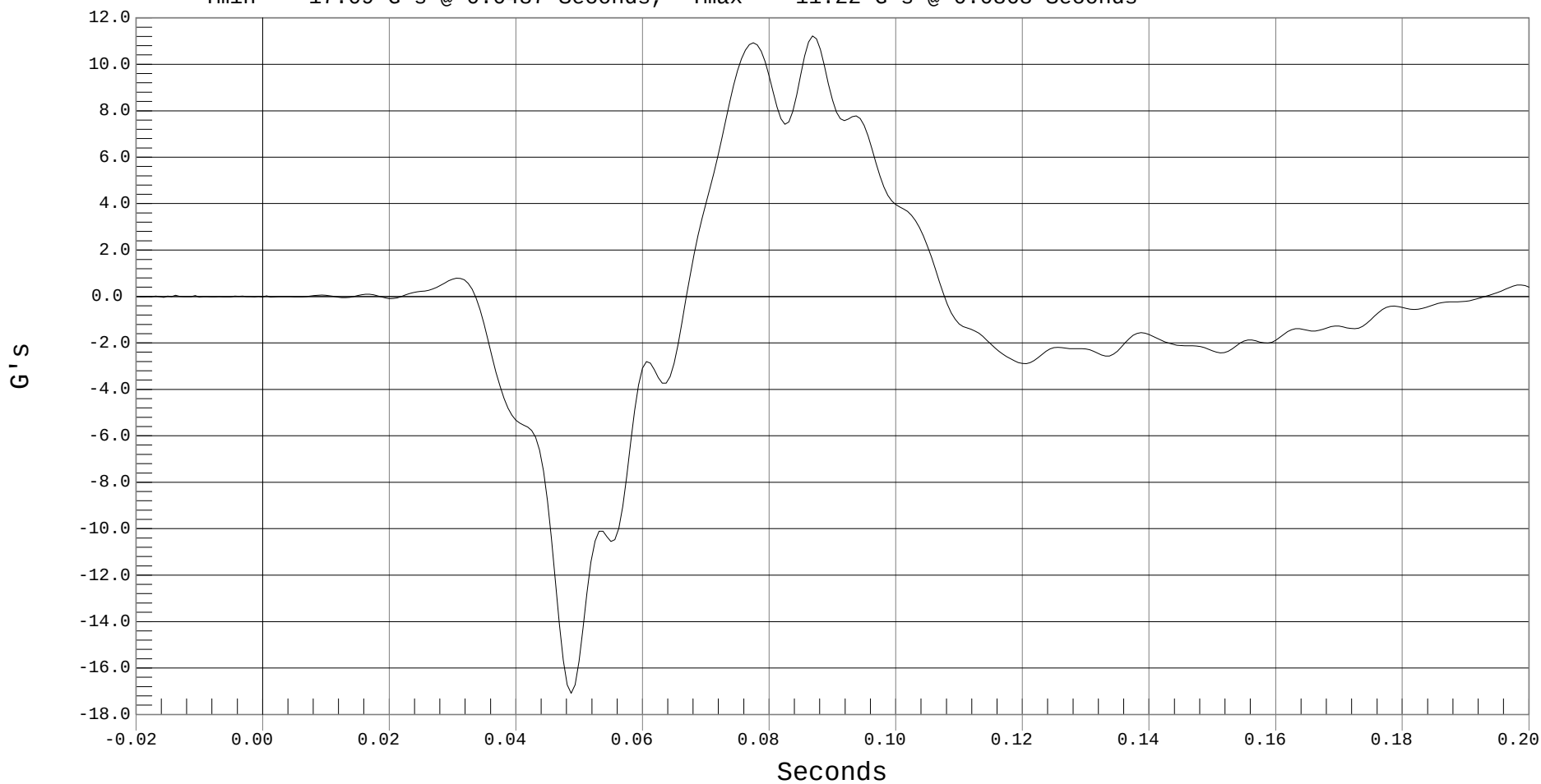
PASSENGER PELVIS Z ACCELERATION

Test Desc.: NCAP LEFT SIDE IMPACT
Component: 2002 FORD ESCAPE 4WD
Other Info:

Test Date: 10-12-01
Speed: 38.5 MPH, 62.0 KPH
Fir Filtered

— 1 REAR PASSENGER PELVIS Z, B01105FI.R12

Ymin = -17.09 G's @ 0.0487 Seconds, Ymax = 11.22 G's @ 0.0868 Seconds



APPENDIX C

ES-2 CONFIGURATION AND PERFORMANCE VERIFICATION DATA

CERTIFICATION DATA

Dummy Serial Number: 009

Calibration Test Results Summary

Dummy Serial Number: 009

Pre-Test Calibration

Head Drop Test:	The head passed all drop test requirements.
Neck Pendulum Test:	The neck passed all impact test requirements.
Shoulder Impact Test:	The shoulder passed all impact test requirements.
Rib Tests:	All ribs passed all impact test requirements.
Abdomen Test:	The abdomen passed all impact test requirements.
Lumbar Spine Test:	The lumbar spine passed all impact test requirements.
Pelvis Test:	The pelvis passed all impact test requirements.

MGA RESEARCH CORPORATION
HEAD DROP TEST
EUROSID 2 DUMMY

Date: 10/09/01

Dummy Serial Number: 009

Test Number: D011441

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	46
Peak Resultant Acceleration	100 – 150 g's	145
Time of Max. Res. Acceleration		28.3 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



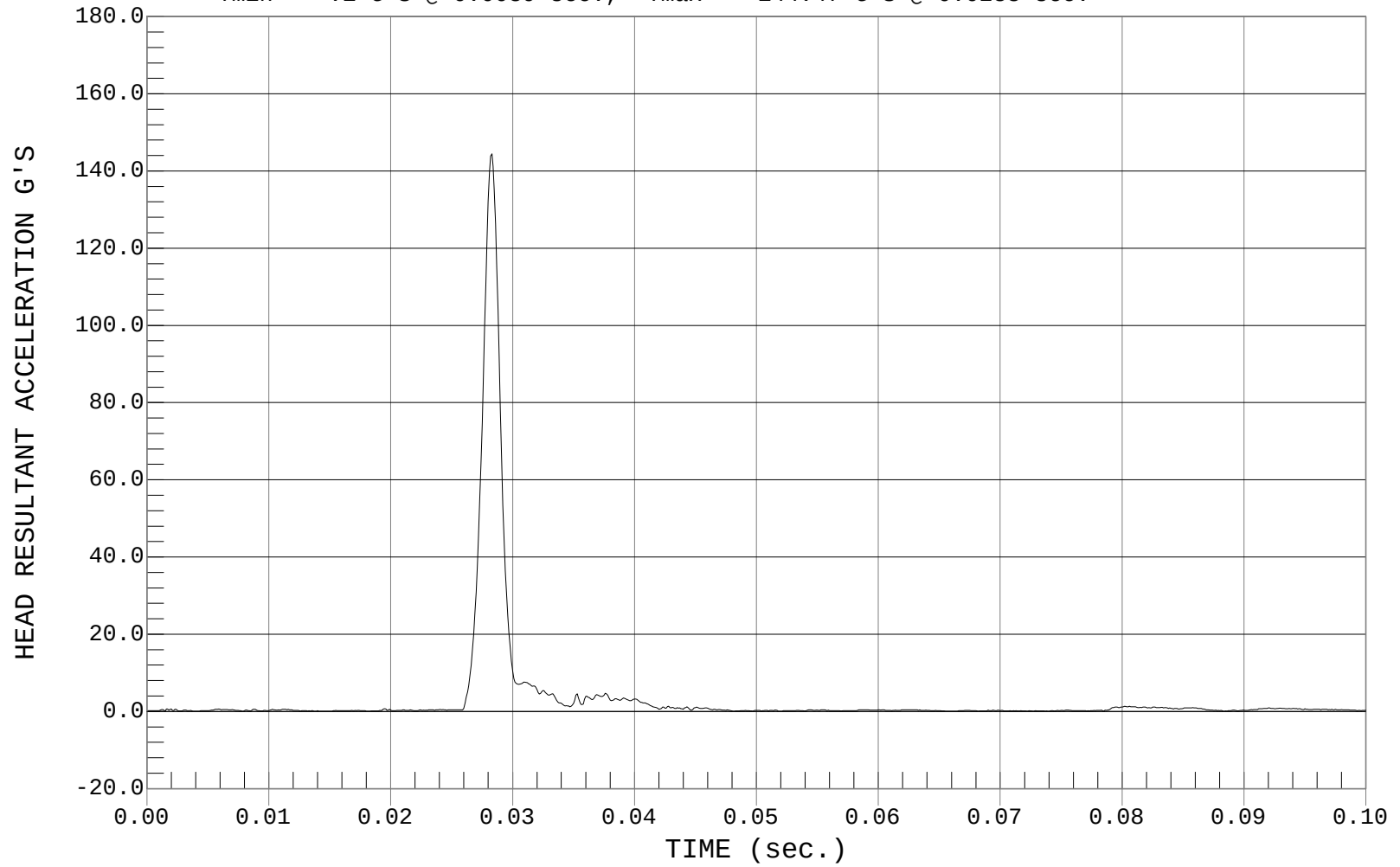
PEAK RESULTANT ACCELERATION

Test Desc.: Dummy Calibration - Head Drop
Component: Dummy #009

Test Date: 10-09-01
Speed: 0.00 FT/SEC, 0.00 M/SEC

— 1 HEAD RESULTANT ACCELERATION, D01441AV.A01

Ymin = .1 G'S @ 0.0039 sec., Ymax = 144.47 G'S @ 0.0283 sec.



MGA RESEARCH CORPORATION
NECK PENDULUM TEST
EUROSID 2 DUMMY

Date: 10/10/01

Dummy Serial Number: 009

Test Number: D011442

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.3
Relative Humidity (%)		10 – 70	54
Pendulum Speed		3.3 - 3.5	3.4
Pendulum Deceleration	3 msec	ˆ.25 - ˆ.53 m/sec	-.33
	8 msec	ˆ1.59 - ˆ2.04 m/sec	-1.73
	14 msec	ˆ3.20 - ˆ3.85 m/sec	-3.39
Maximum Flexion Angle		49.0 – 59.0 deg	55.6
Time of Max. Flexion Angle		54.0 – 66.0 ms	57.1
Maximum Angle Theta (A)		32.0 – 37.0 deg	34.1
Time of Max. Theta (A)		53.0 – 63.0 ms	56.6
Maximum Angle Theta (B)		29.37 – 31.87 deg	30.07
Time of Max. Theta (B)		54.0 – 64.0 ms	56.5

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____

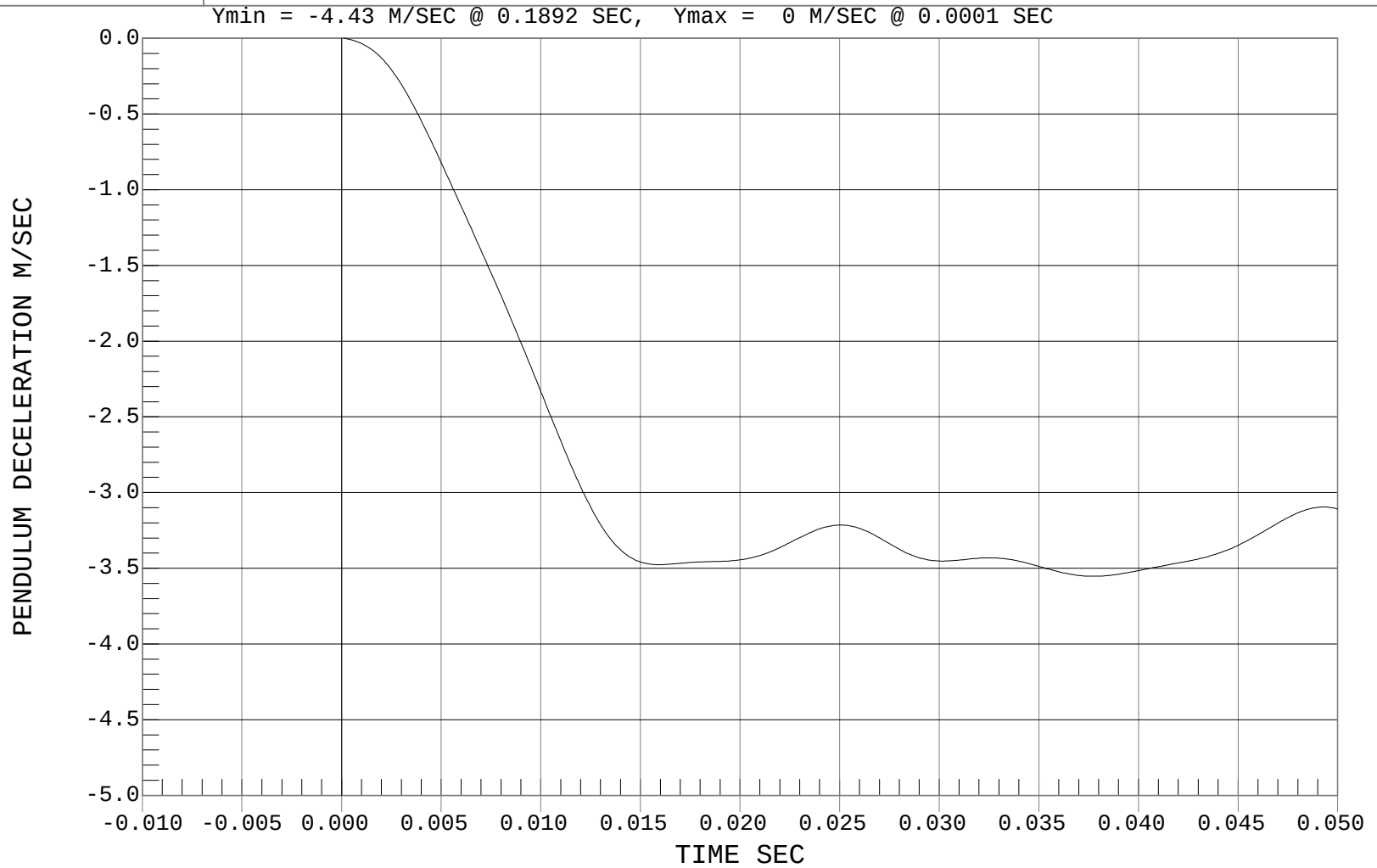


PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-10-01
Speed: 11.10 FT/SEC, 3.38 M/SEC

— 1 PENDULUM DECELERATION, D01442AI.V04





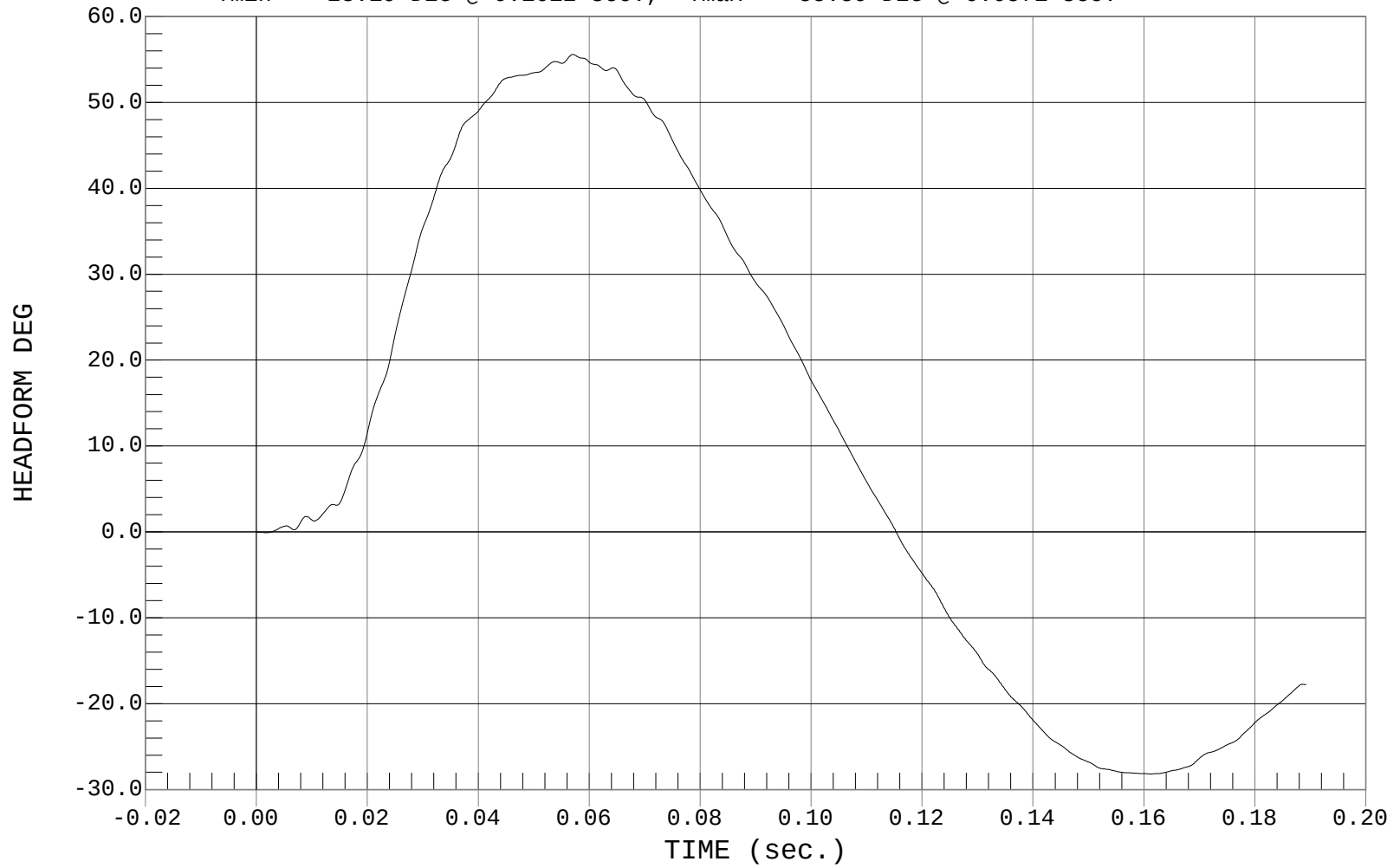
FLEXION ANGLE

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-10-01
Speed: 11.10 FT/SEC, 3.38 M/SEC

— 1 HEADFORM, D01442DT.D08

Ymin = -28.19 DEG @ 0.1612 sec., Ymax = 55.59 DEG @ 0.0571 sec.





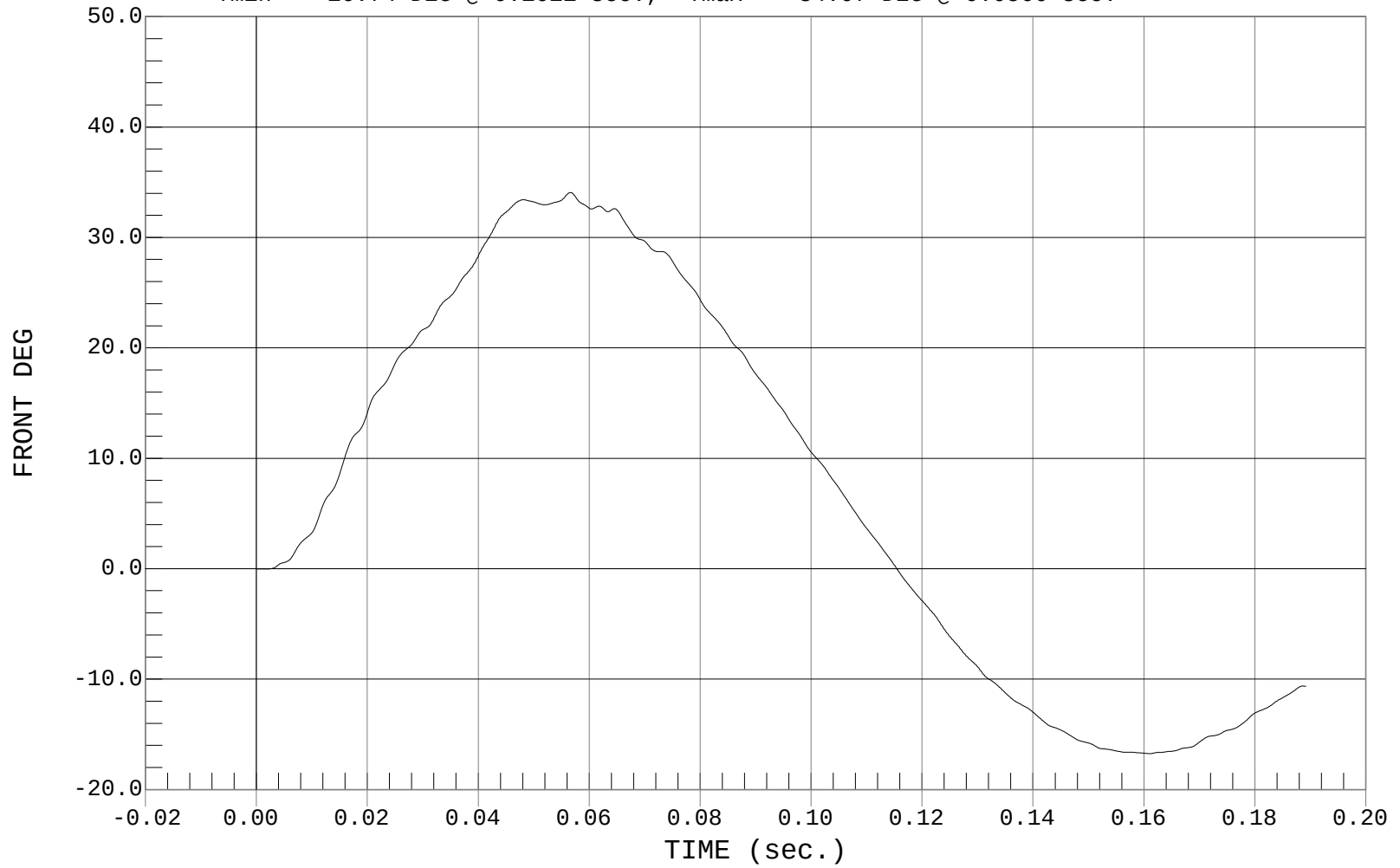
THETA A

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-10-01
Speed: 11.10 FT/SEC, 3.38 M/SEC

— 1 FRONT, D01442DT.D05

Ymin = -16.74 DEG @ 0.1611 sec., Ymax = 34.07 DEG @ 0.0566 sec.



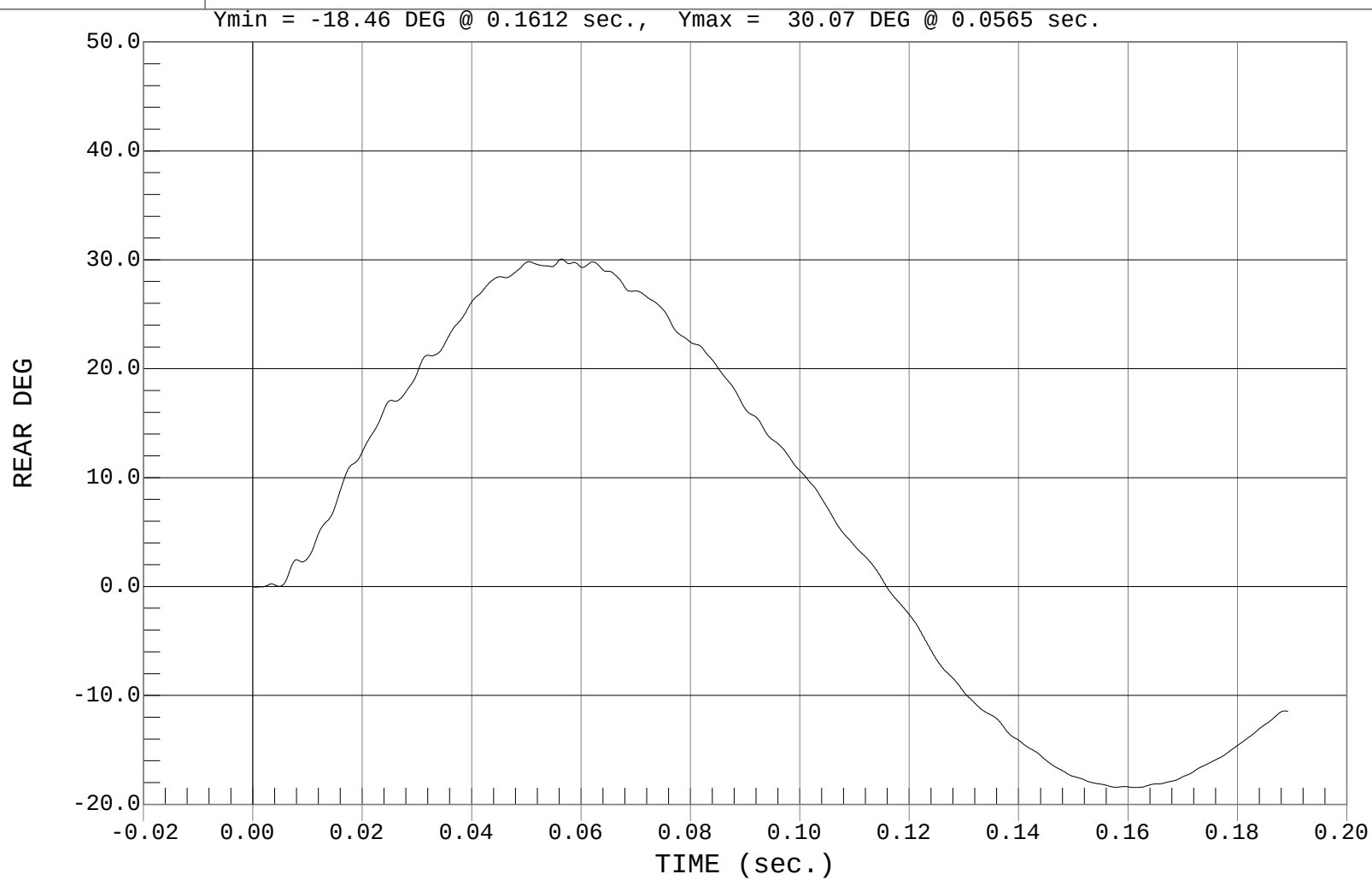


THETA B

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-10-01
Speed: 11.10 FT/SEC, 3.38 M/SEC

— 1 REAR, D01442DT.D06



MGA RESEARCH CORPORATION
SHOULDER IMPACT TEST
EUROSID 2 DUMMY

Date: 10/08/01

Dummy Serial Number: 009

Test Number: D011443

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	33
Pendulum Speed	4.2 – 4.4 m/s	4.3
Max. Resultant Acceleration	7.5 – 10.5 g's	9.7
Time of Max. Pendulum Acceleration		26.5 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



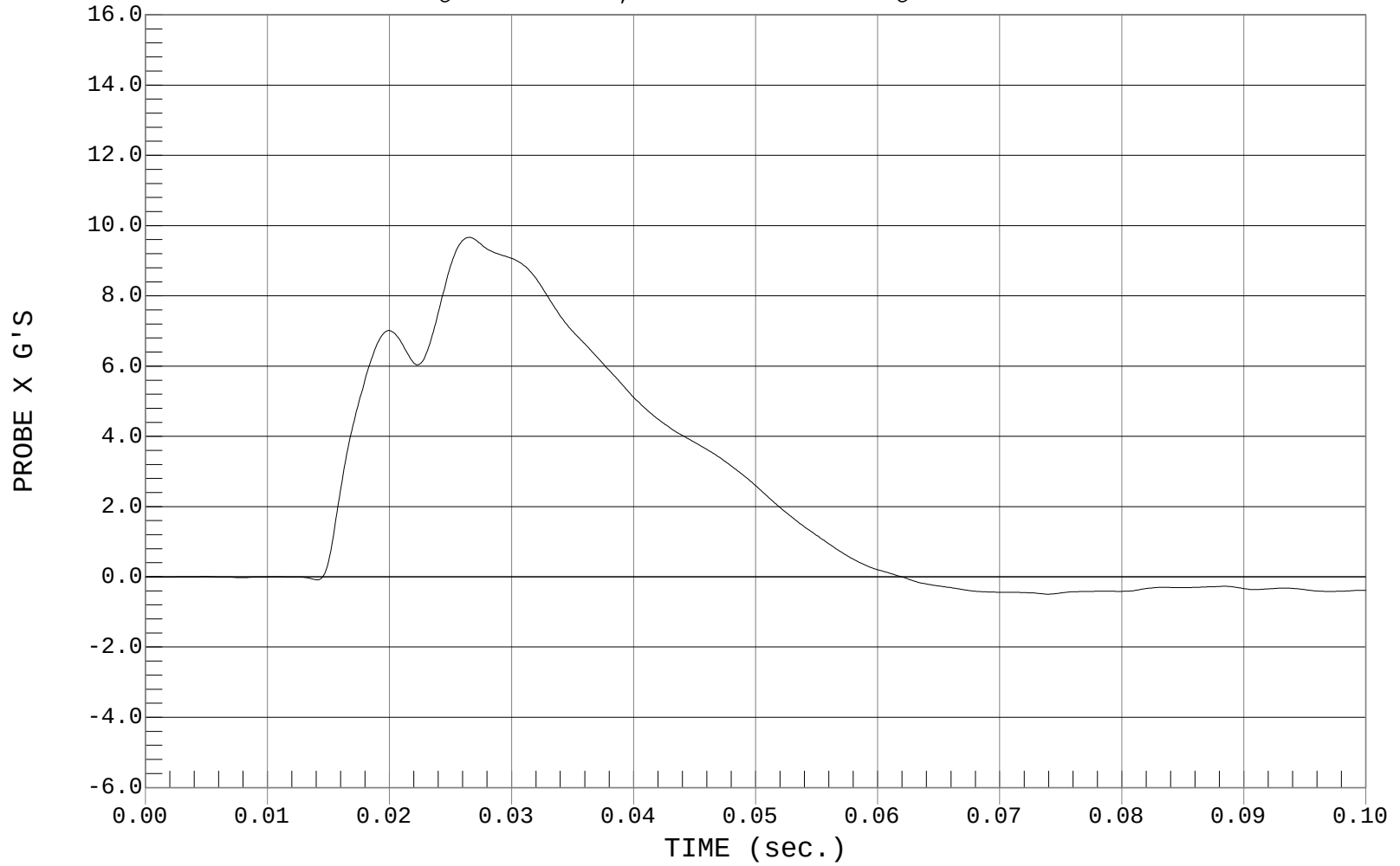
SHOULDER ACCELERATION

Test Desc.: Dummy Calibration - Shoulder Impact
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.96 FT/SEC, 4.25 M/SEC

— 1 PROBE X, D01443AF.A01

Ymin = -.54 G'S @ 0.1141 sec., Ymax = 9.67 G'S @ 0.0265 sec.



MGA RESEARCH CORPORATION
UPPER/MIDDLE/LOWER RIB TESTS
SIDE IMPACT DUMMY (SID)

Date: 10/08/01
Dummy Serial Number: 009
Test Number: D011444/5/6

UPPER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.8
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	27.2
Displacement at 3 m/s	36.0 – 40.0 mm	38.8
Displacement at 4 m/s	46.0 – 51.0 mm	49.9

MIDDLE RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.8
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	26.4
Displacement at 3 m/s	36.0 – 40.0 mm	39.8
Displacement at 4 m/s	46.0 – 51.0 mm	49.7

LOWER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.8
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	25.8
Displacement at 3 m/s	36.0 – 40.0 mm	38.4
Displacement at 4 m/s	46.0 – 51.0 mm	50.6

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



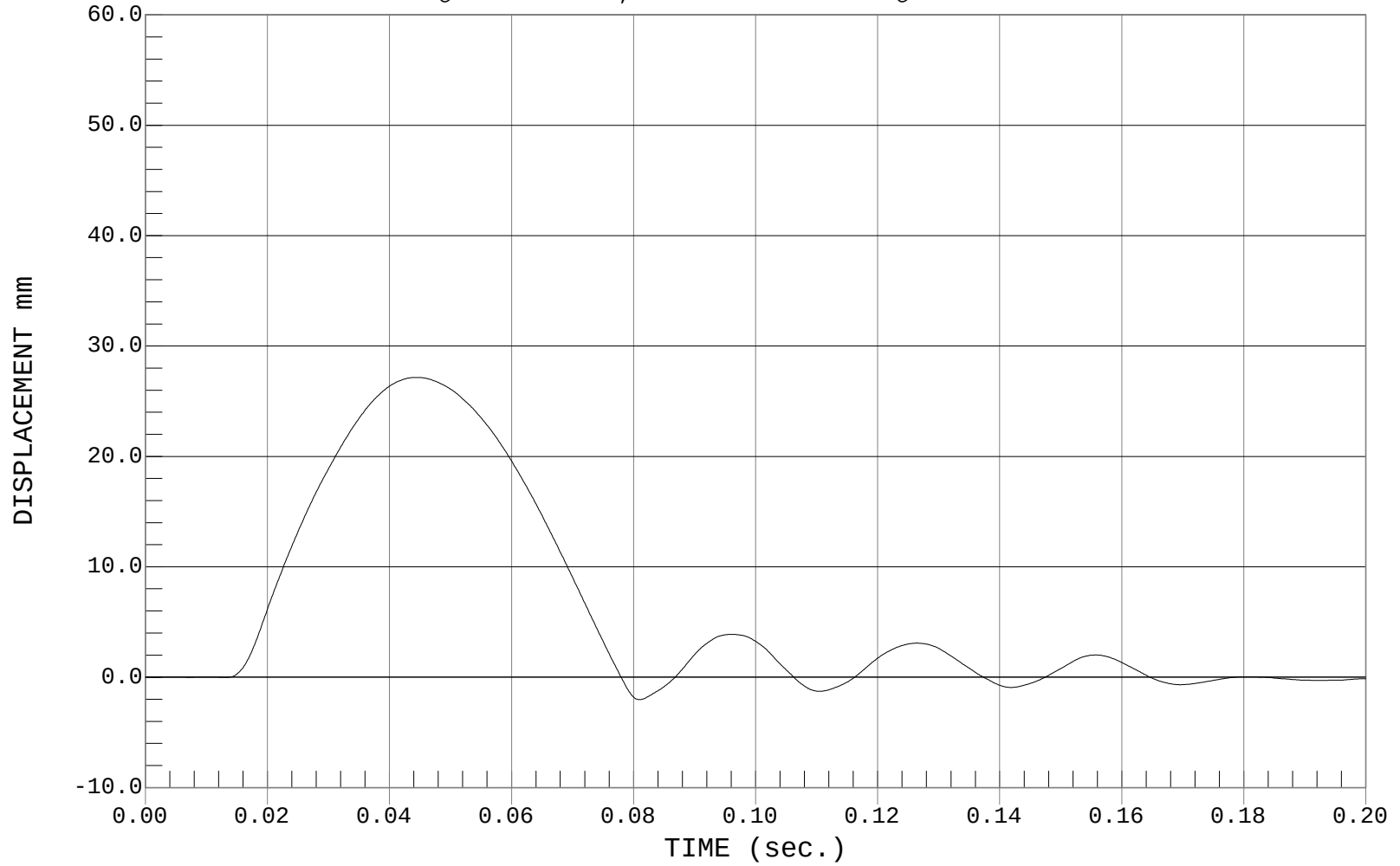
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01444DF.D05

Ymin = -2.04 mm @ 0.0809 sec., Ymax = 27.16 mm @ 0.0444 sec.





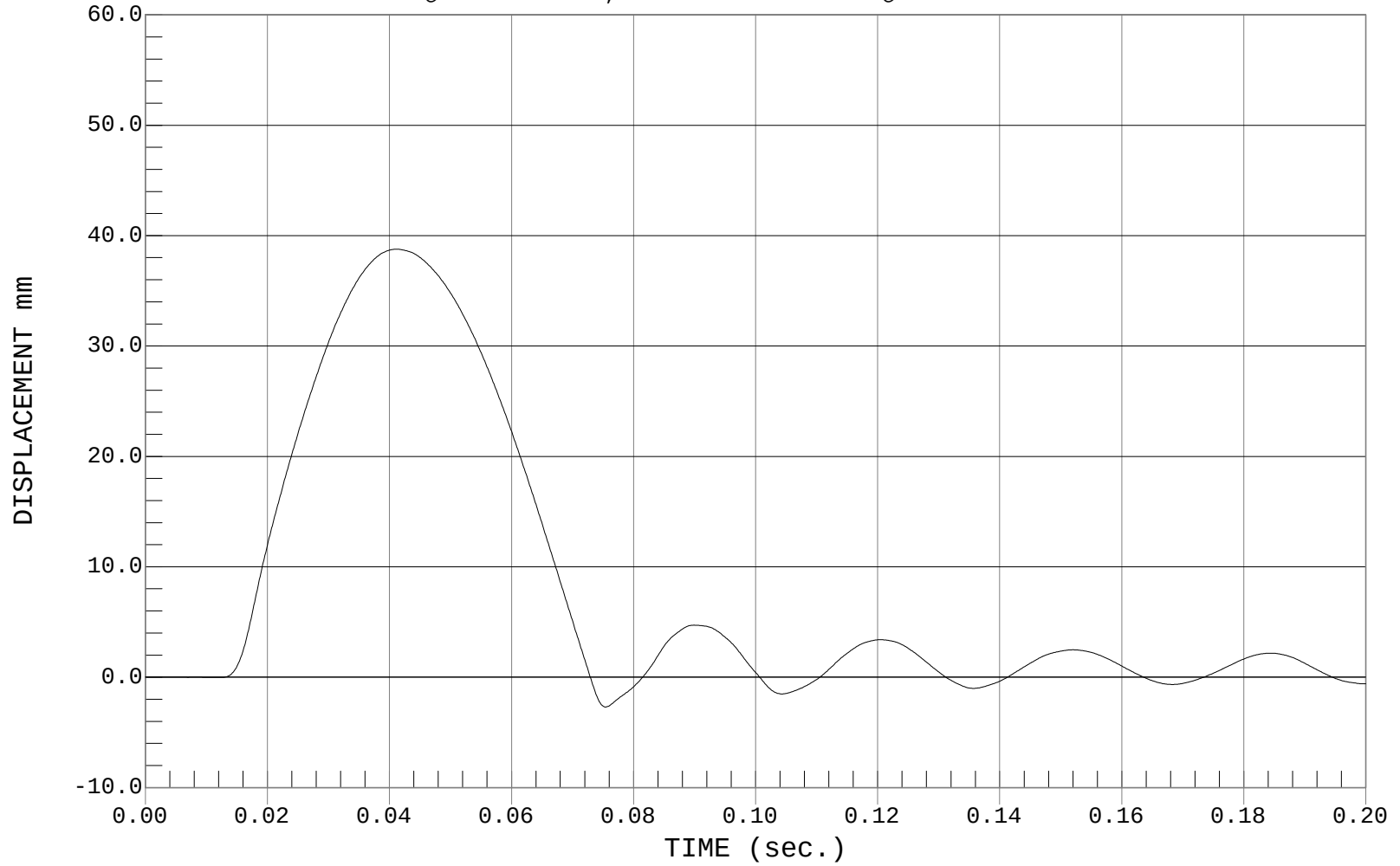
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01444DF.D06

Ymin = -2.7 mm @ 0.0754 sec., Ymax = 38.77 mm @ 0.0411 sec.





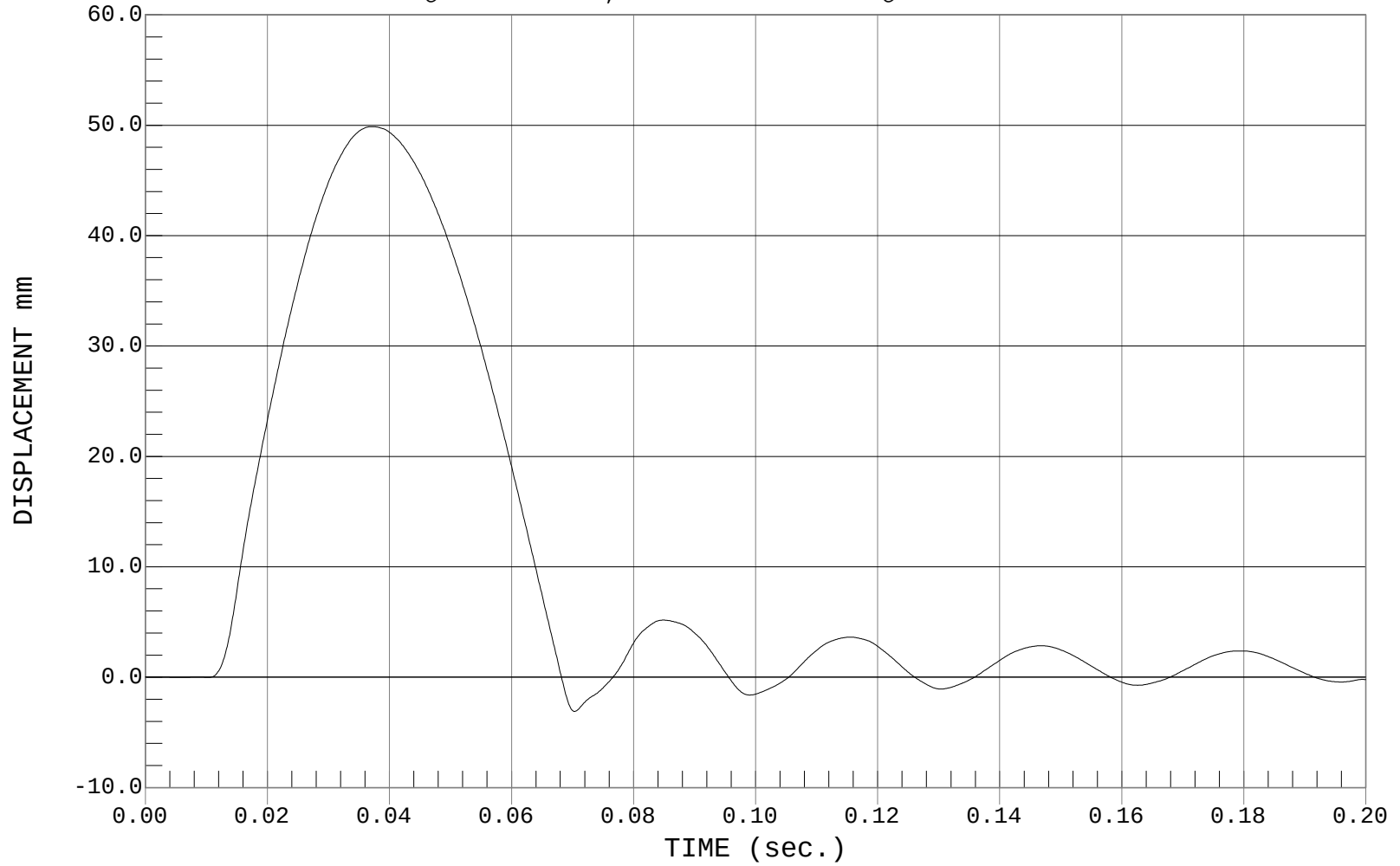
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01444DF.D07

Ymin = -3.1 mm @ 0.0703 sec., Ymax = 49.88 mm @ 0.0371 sec.





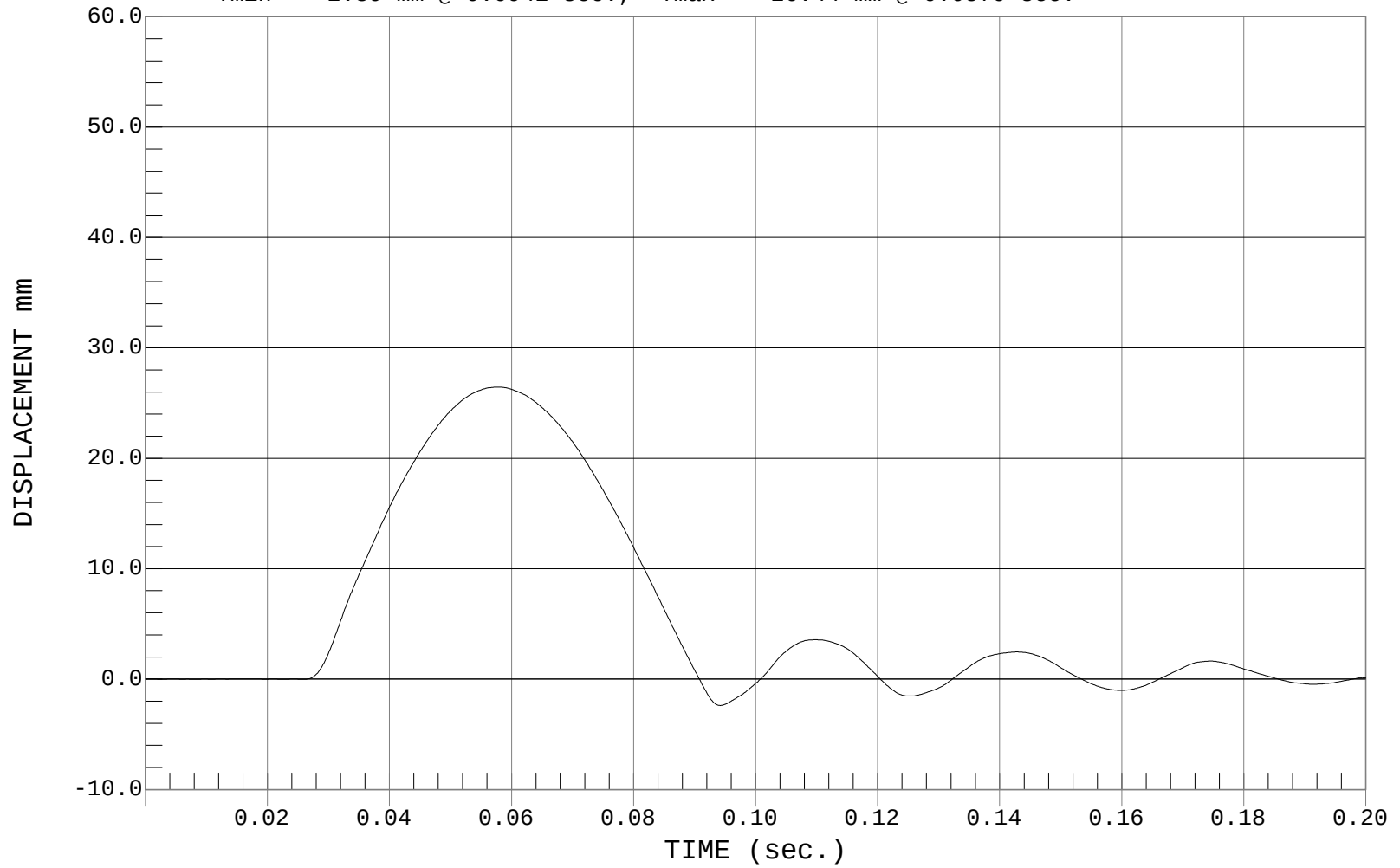
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01445DF.D05

Ymin = -2.39 mm @ 0.0942 sec., Ymax = 26.44 mm @ 0.0579 sec.





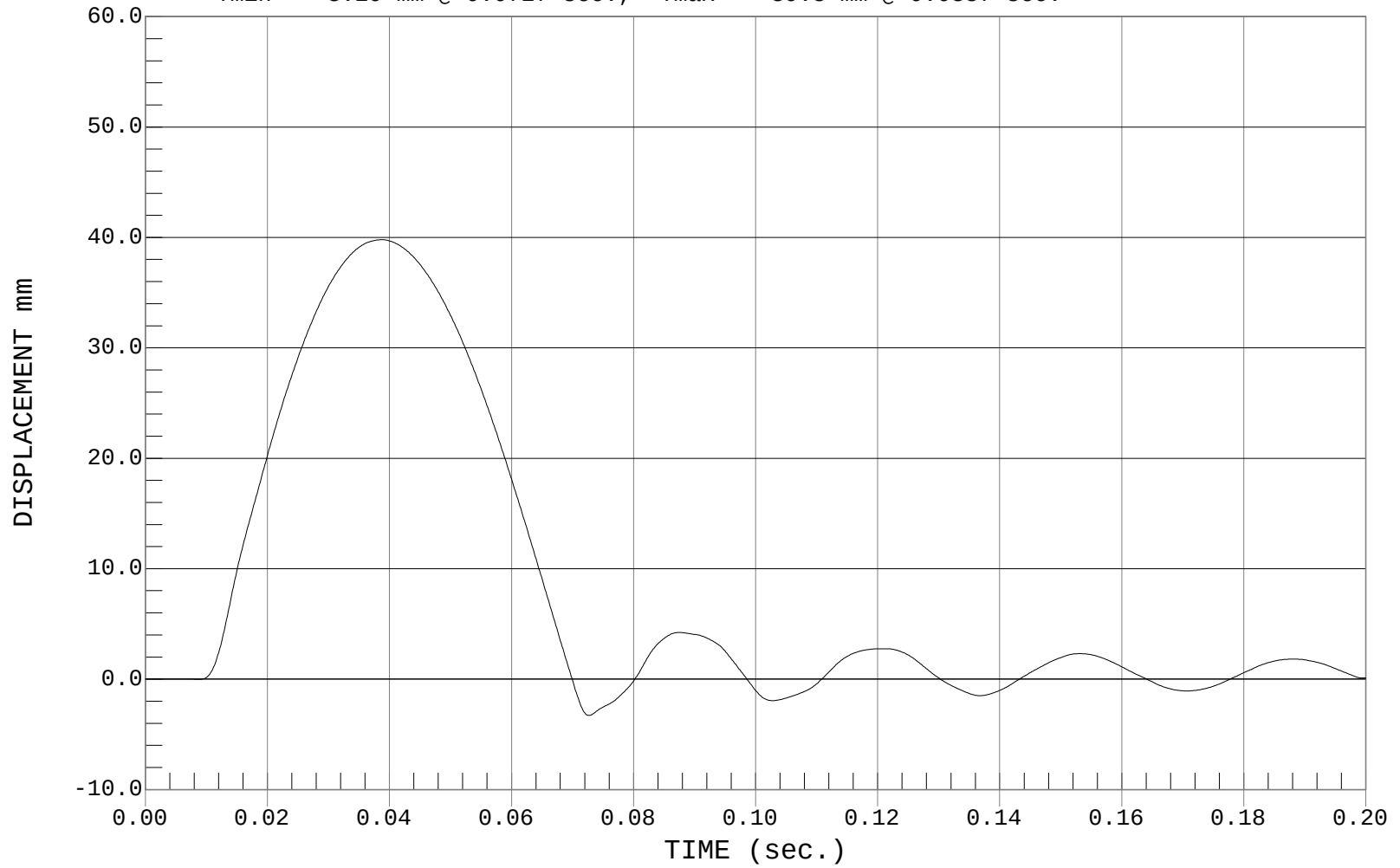
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01445DF.D06

Ymin = -3.29 mm @ 0.0727 sec., Ymax = 39.8 mm @ 0.0387 sec.





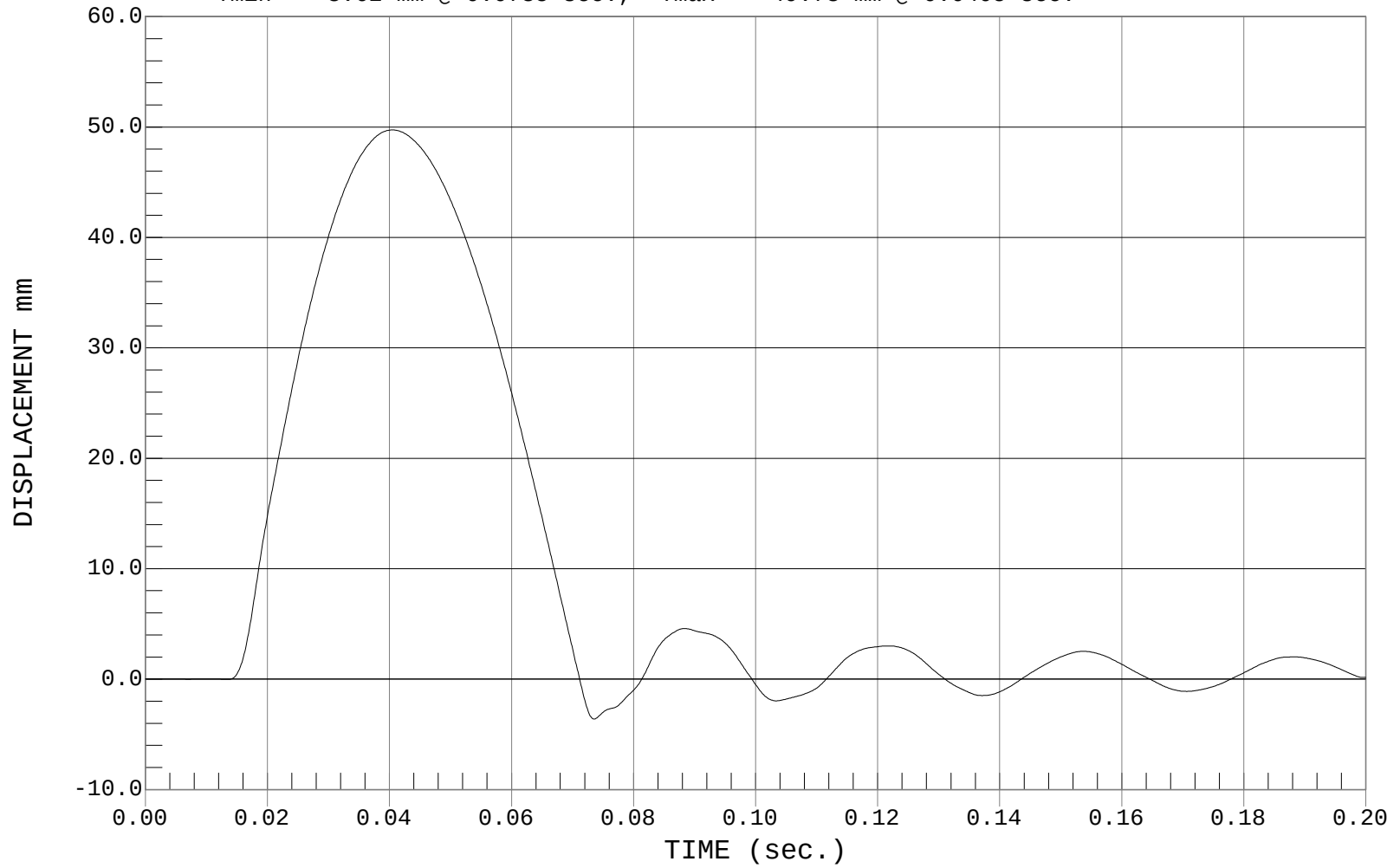
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01445DF.D07

Ymin = -3.62 mm @ 0.0735 sec., Ymax = 49.73 mm @ 0.0405 sec.





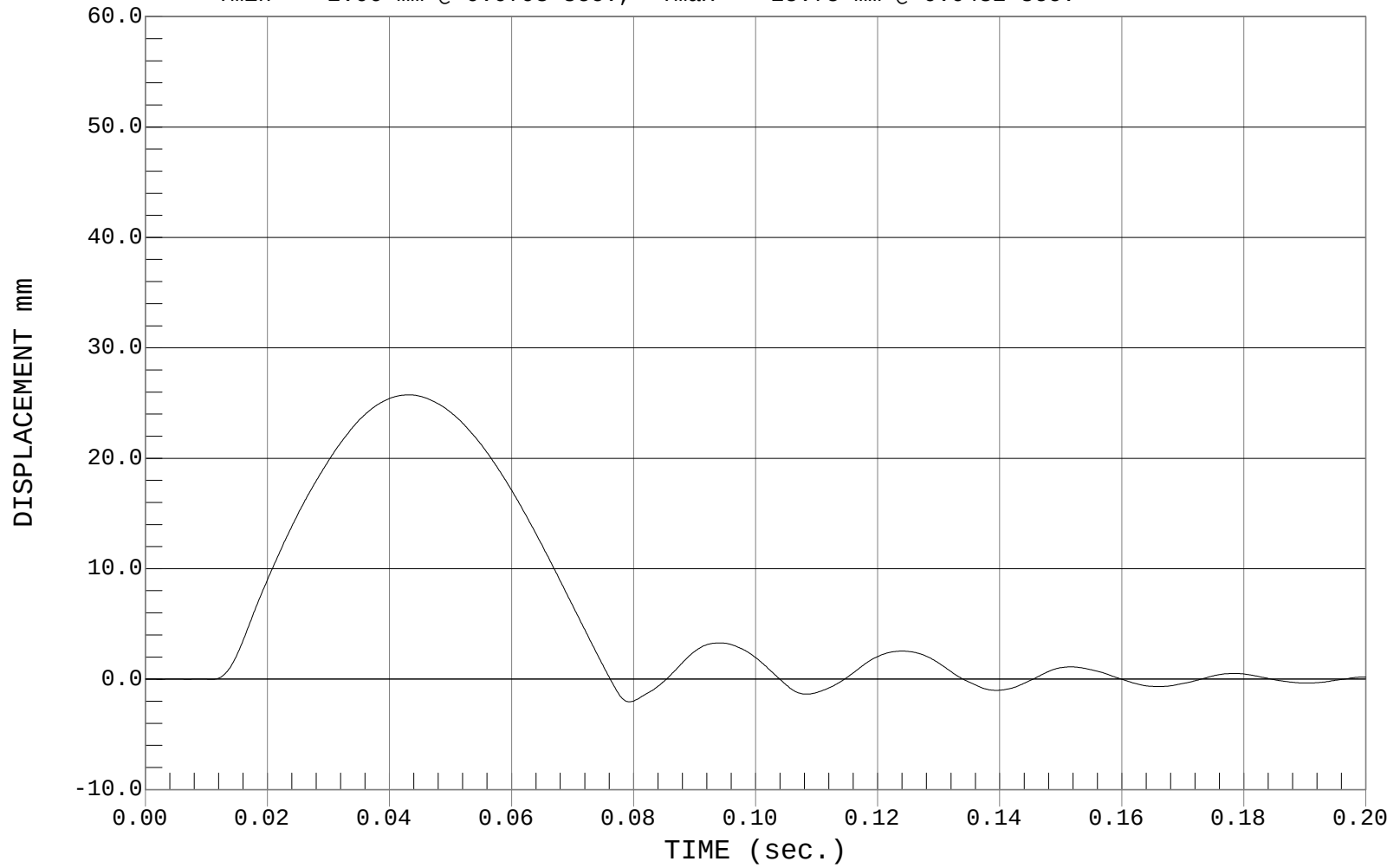
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01446DF.D05

Ymin = -2.06 mm @ 0.0793 sec., Ymax = 25.75 mm @ 0.0432 sec.





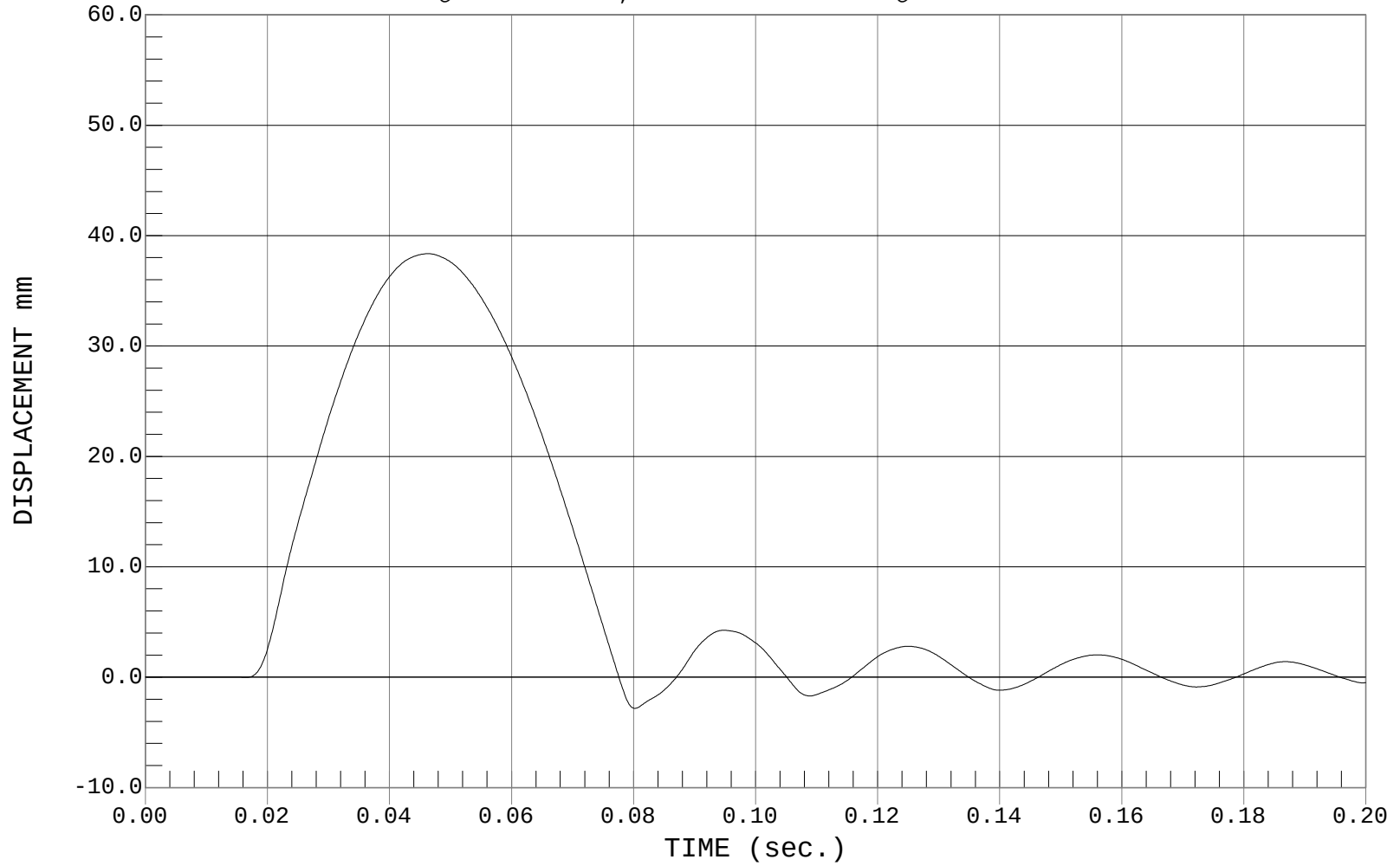
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01446DF.D06

Ymin = -2.83 mm @ 0.0802 sec., Ymax = 38.36 mm @ 0.0463 sec.





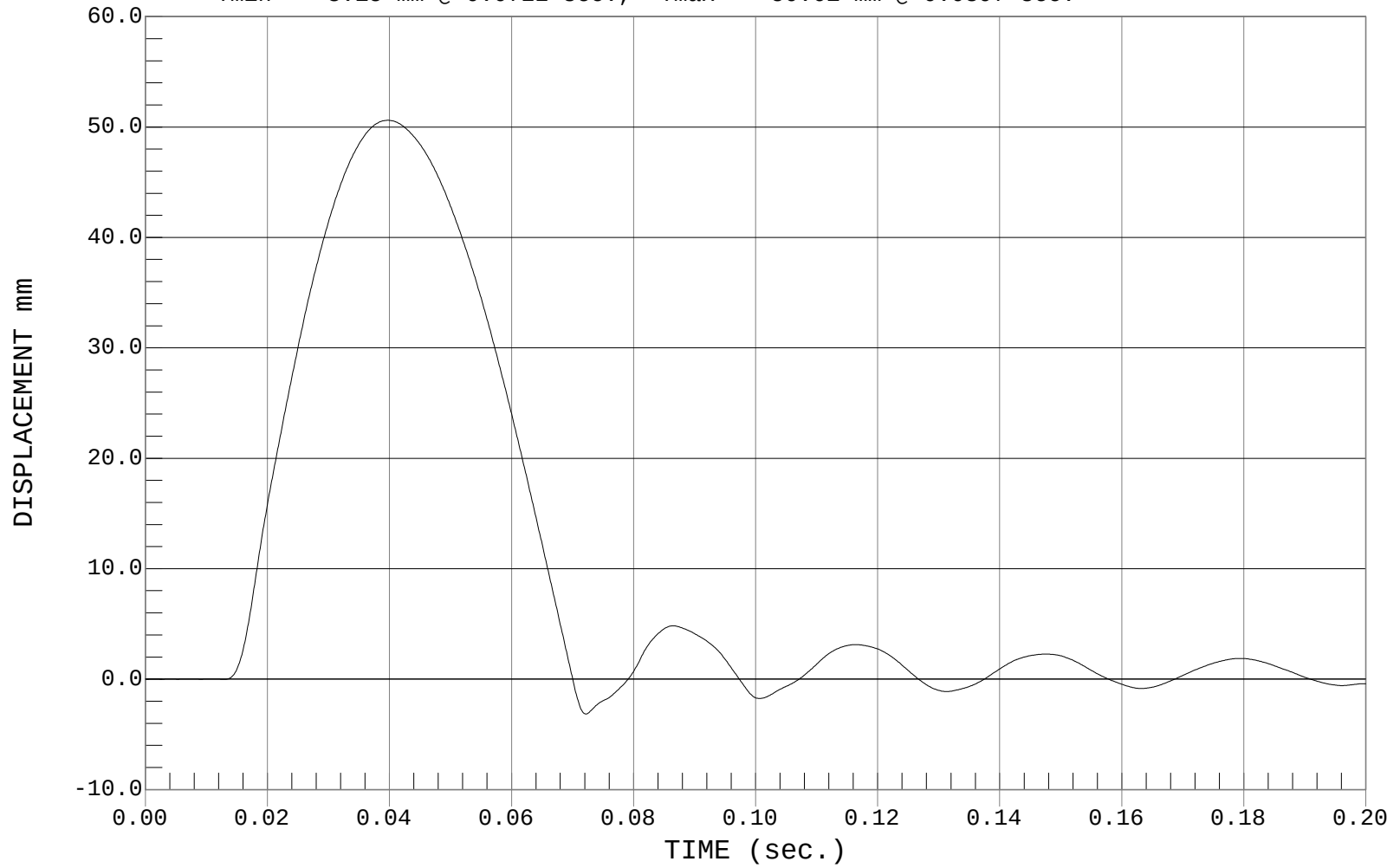
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01446DF.D07

Ymin = -3.15 mm @ 0.0722 sec., Ymax = 50.61 mm @ 0.0397 sec.



MGA RESEARCH CORPORATION
ABDOMEN TEST
EUROSID 2 DUMMY

Date: 10/08/01

Dummy Serial Number: 009

Test Number: D011447

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	32
Probe Speed (m/s)	3.90 – 4.10	4.03
Maximum Impact Force	4.00 – 4.80 kN	4.67
Time of Maximum Force	10.60 – 13.00 ms	11.50
Maximum Total Abdomen Force	2.20 – 2.70 kN	2.25
Time of Max. Total Force	10.00 – 12.30 ms	11.10

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



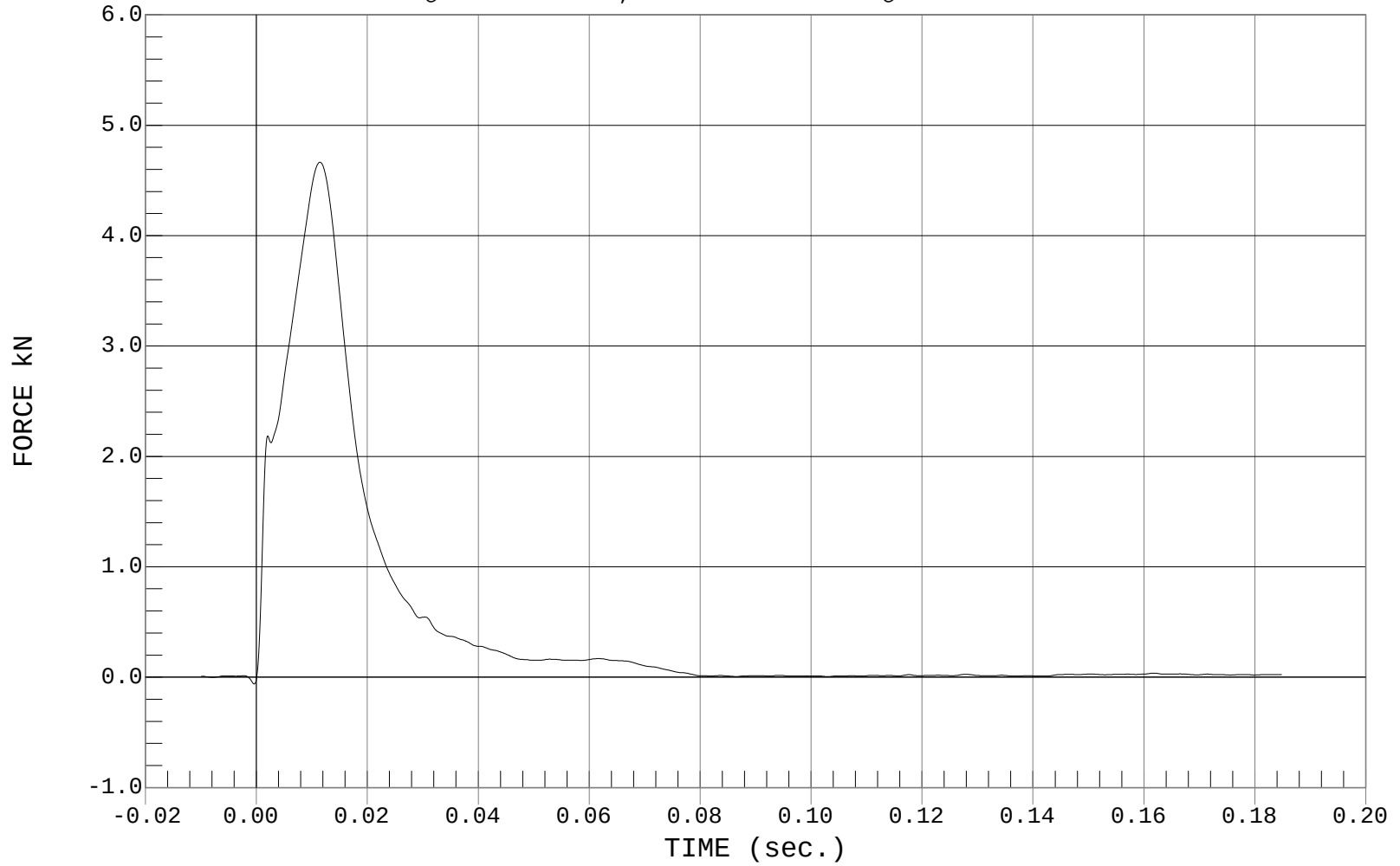
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.23 FT/SEC, 4.03 M/SEC

— 1 FORCE, D01447FT.F01

Ymin = -.06 kN @ -0.0004 sec., Ymax = 4.67 kN @ 0.0115 sec.





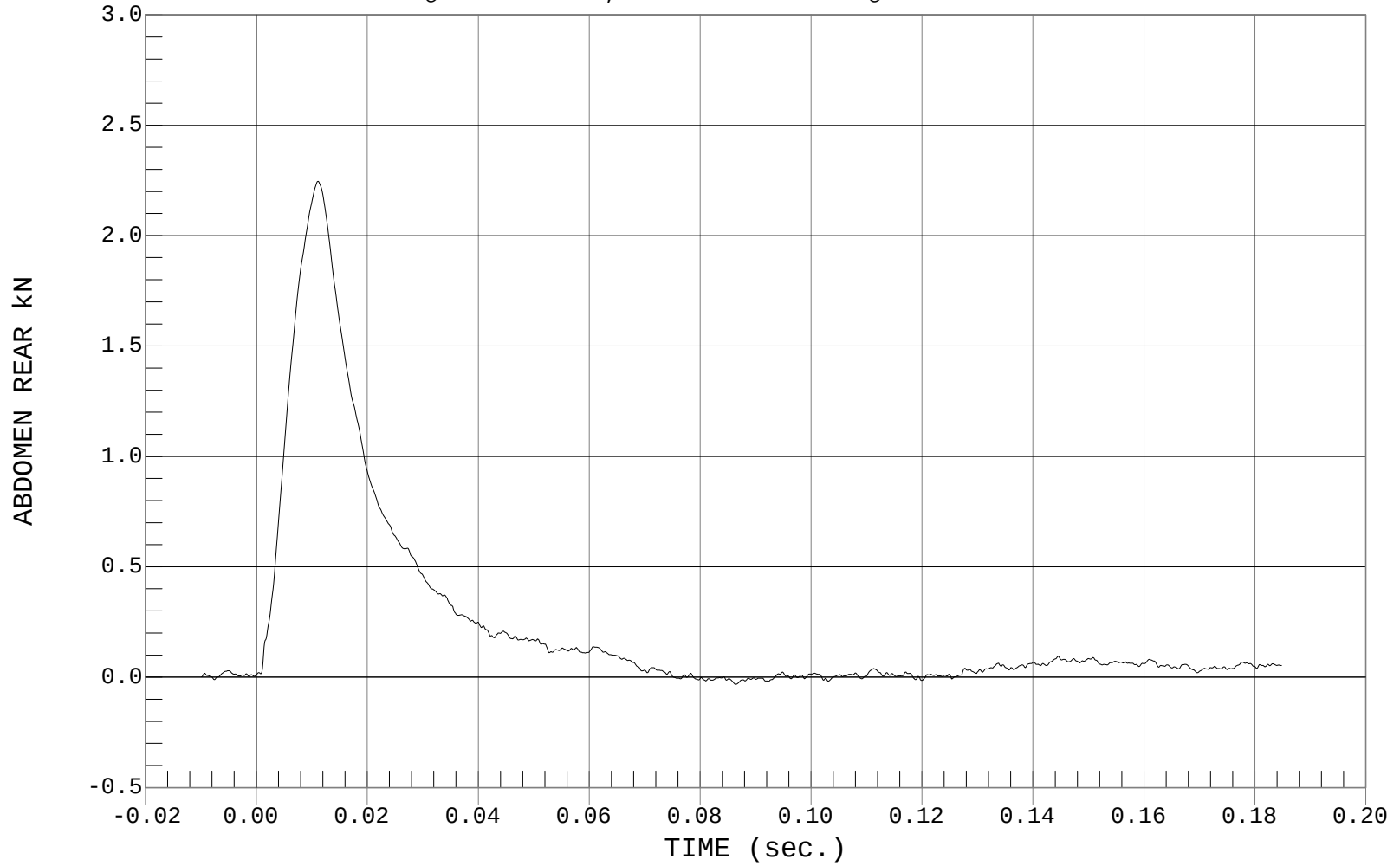
ABDOMEN FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #009

Test Date: 10-08-01
Speed: 13.23 FT/SEC, 4.03 M/SEC

— 1 ABDOMEN REAR, D01447FT.F02

Ymin = -.03 kN @ 0.0864 sec., Ymax = 2.25 kN @ 0.0111 sec.



MGA RESEARCH CORPORATION
LUMBAR SPINE TEST
EUROSID 2 DUMMY

Date: 10/11/01

Dummy Serial Number: 009

Test Number: D011448

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.8
Relative Humidity (%)		10 – 70	46
Pendulum Speed		5.95 – 6.15	6.07
Pendulum Deceleration	10 msec	2.46 - 1.59 m/sec	-1.86
	20 msec	5.25 - 4.07 m/sec	-4.26
	25 msec	6.64 - 5.3 m/sec	-5.35
	30 msec	≥ -6.5 m/sec	-6.22
Maximum Flexion Angle		45.0 – 55.0 deg	50.3
Time of Max. Flexion Angle		39.0 – 53.0 ms	46.3
Maximum Angle Theta (A)		31.0 – 35.0 deg	31.9
Time of Max. Theta (A)		44.0 – 52.0 ms	46.2
Maximum Angle Theta (B)		27.52– 30.02 deg	28.01
Time of Max. Theta (B)		44.0 – 52.0 ms	45.5

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



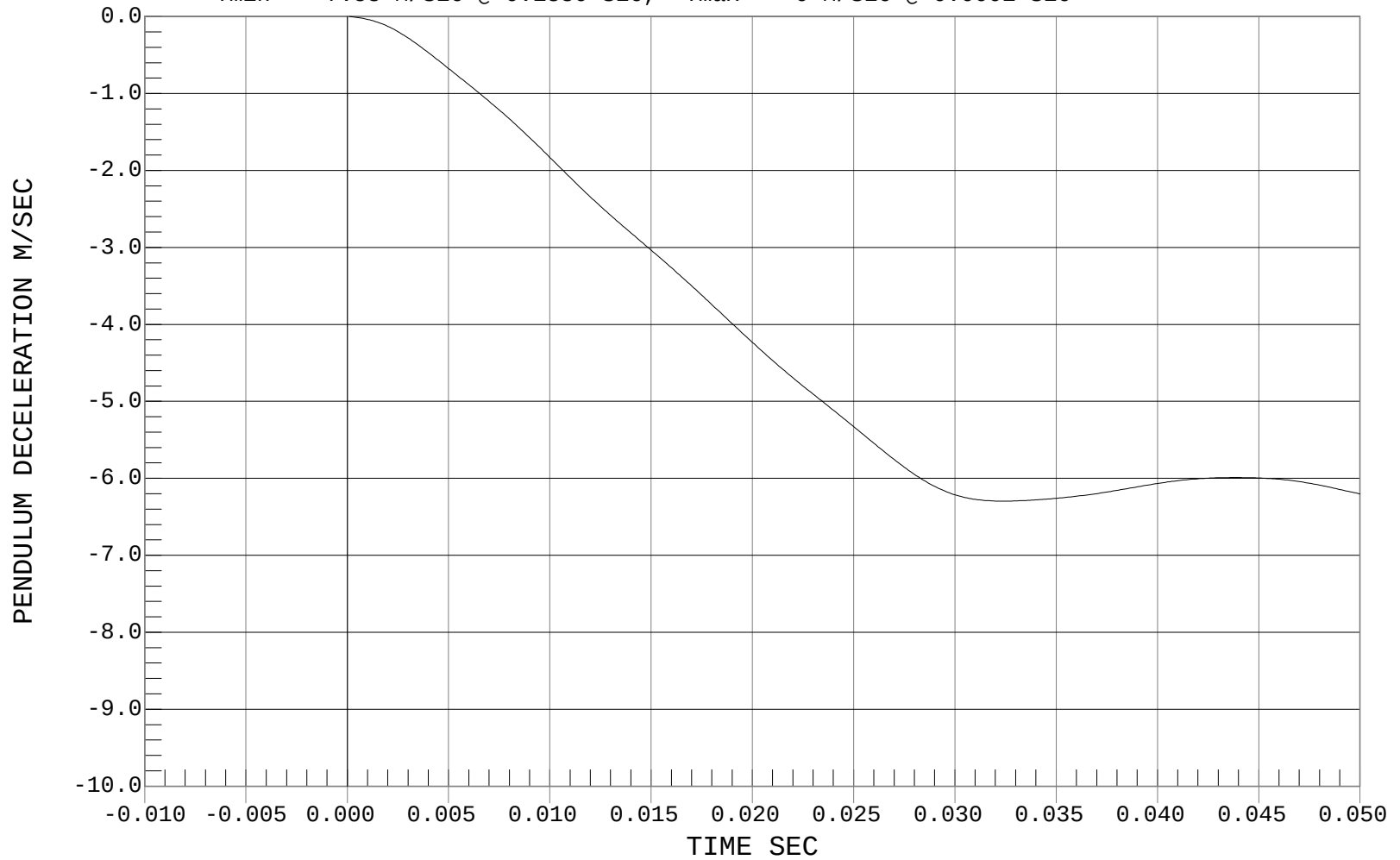
PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-11-01
Speed: 19.90 FT/SEC, 6.07 M/SEC

— 1 PENDULUM DECELERATION, D01448AI.V04

Ymin = -7.58 M/SEC @ 0.1380 SEC, Ymax = 0 M/SEC @ 0.0001 SEC





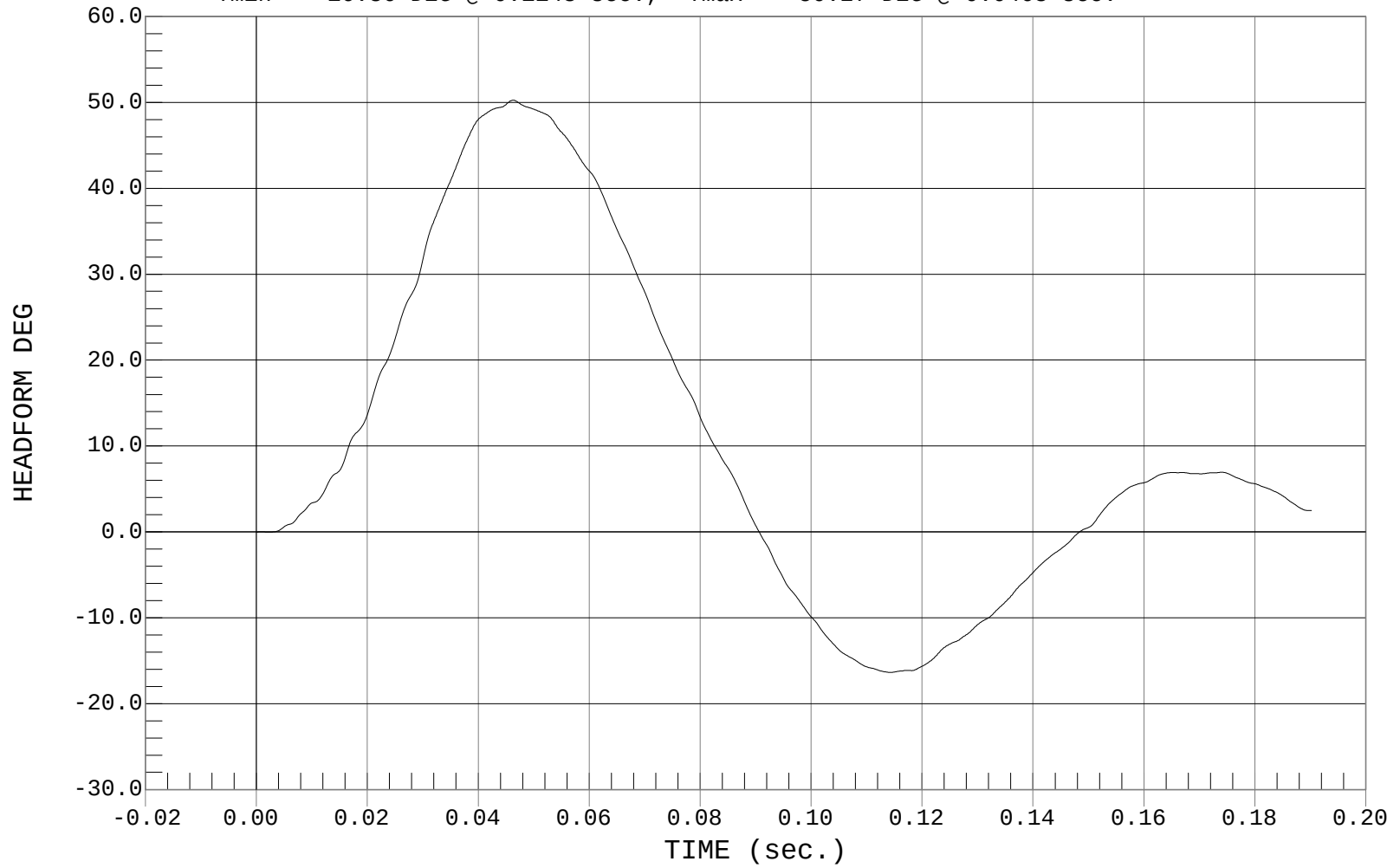
FLEXION ANGLE

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-11-01
Speed: 19.90 FT/SEC, 6.07 M/SEC

— 1 HEADFORM, D01448DT.D08

Ymin = -16.36 DEG @ 0.1143 sec., Ymax = 50.27 DEG @ 0.0463 sec.





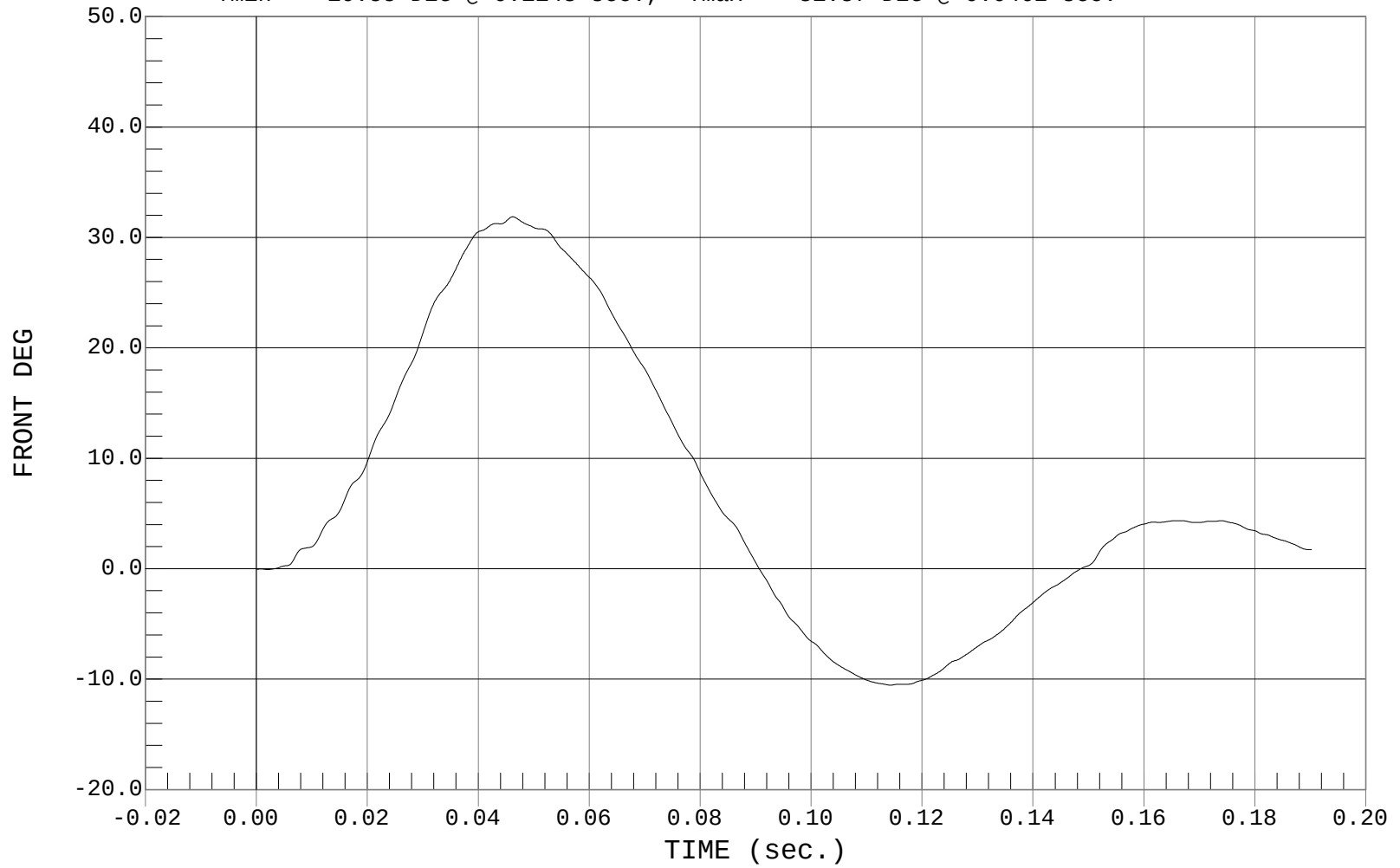
THETA A

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-11-01
Speed: 19.90 FT/SEC, 6.07 M/SEC

— 1 FRONT, D01448DT.D05

Ymin = -10.55 DEG @ 0.1143 sec., Ymax = 31.87 DEG @ 0.0462 sec.





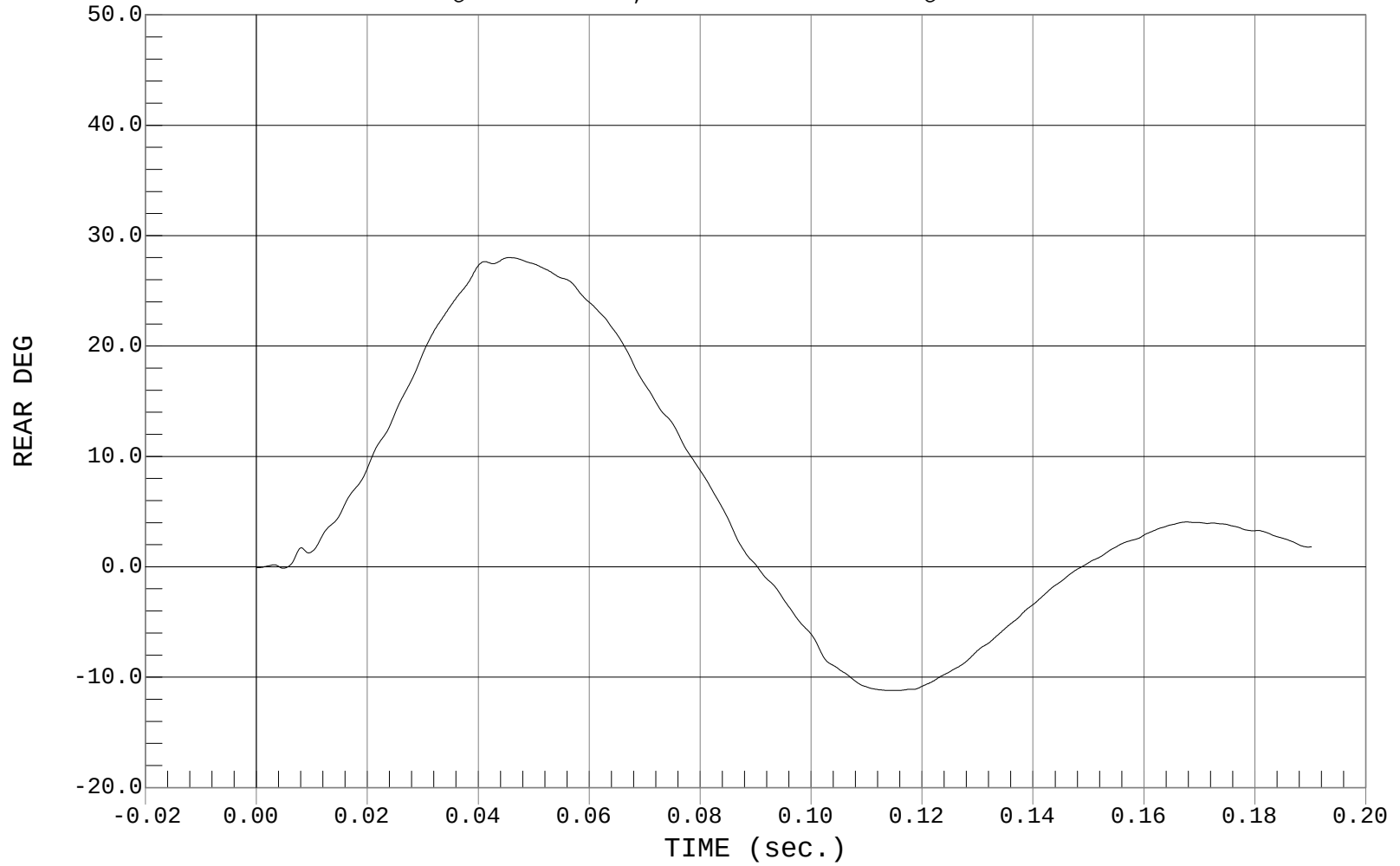
THETA B

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-11-01
Speed: 19.90 FT/SEC, 6.07 M/SEC

— 1 REAR, D01448DT.D06

Ymin = -11.2 DEG @ 0.1156 sec., Ymax = 28.01 DEG @ 0.0455 sec.



MGA RESEARCH CORPORATION
PELVIS TEST
EUROSID 2 DUMMY

Date: 10/08/01

Dummy Serial Number: 009

Test Number: D011449

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	32
Pendulum Speed	6.20 – 6.30 m/s	6.22
Maximum Impactor Force	9.80 – 12.20 kN	10.74
Time of Max. Impactor Force	9.50 – 12.50 ms	11.20
Maximum Pubic Force	2.65 – 3.35 kN	3.30
Time of Max. Pubic Force	10.00 – 13.00 ms	11.70

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



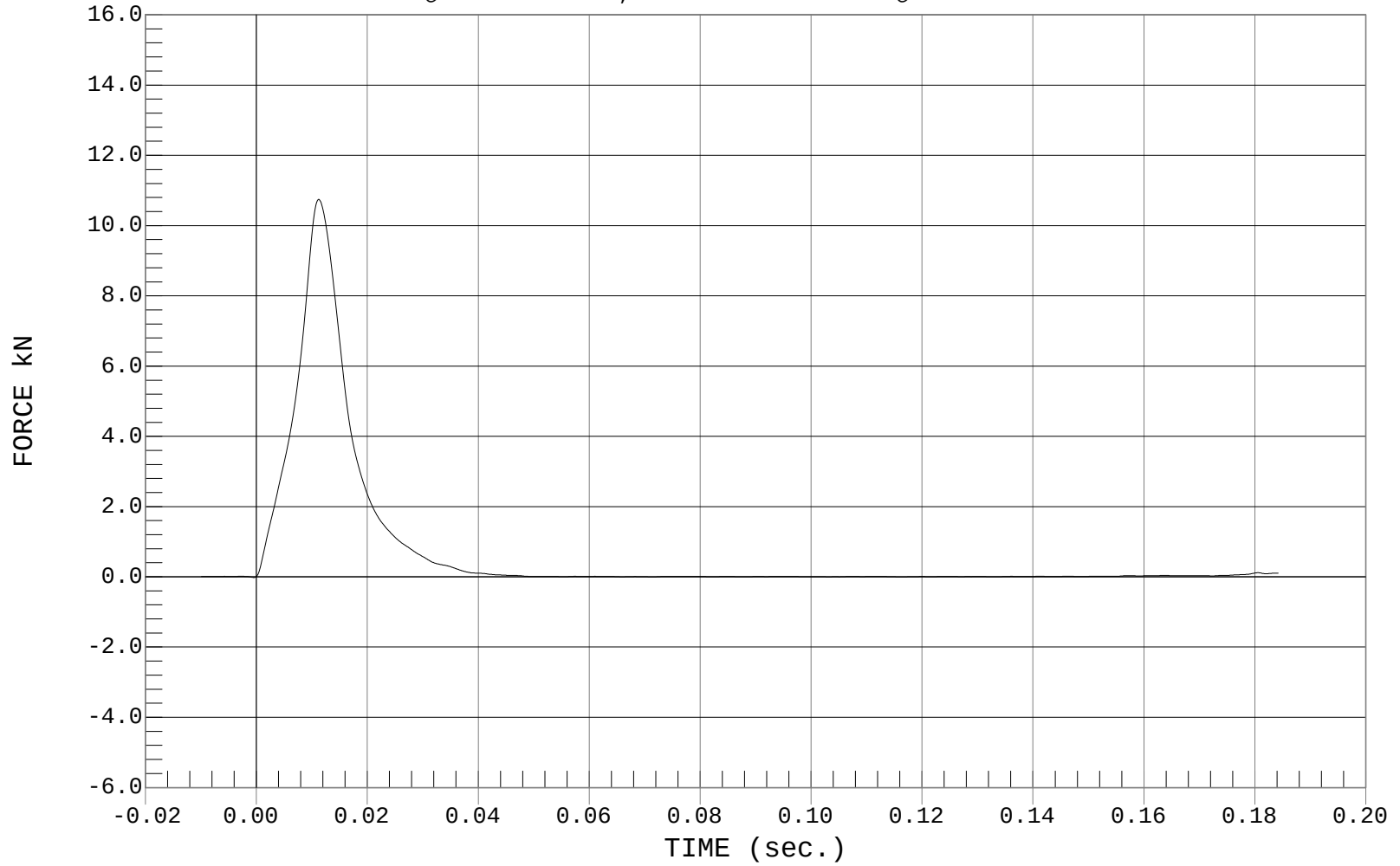
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #009

Test Date: 10-08-01
Speed: 20.42 FT/SEC, 6.22 M/SEC

— 1 FORCE, D01449FT.F01

Ymin = -.02 kN @ -0.0005 sec., Ymax = 10.74 kN @ 0.0112 sec.





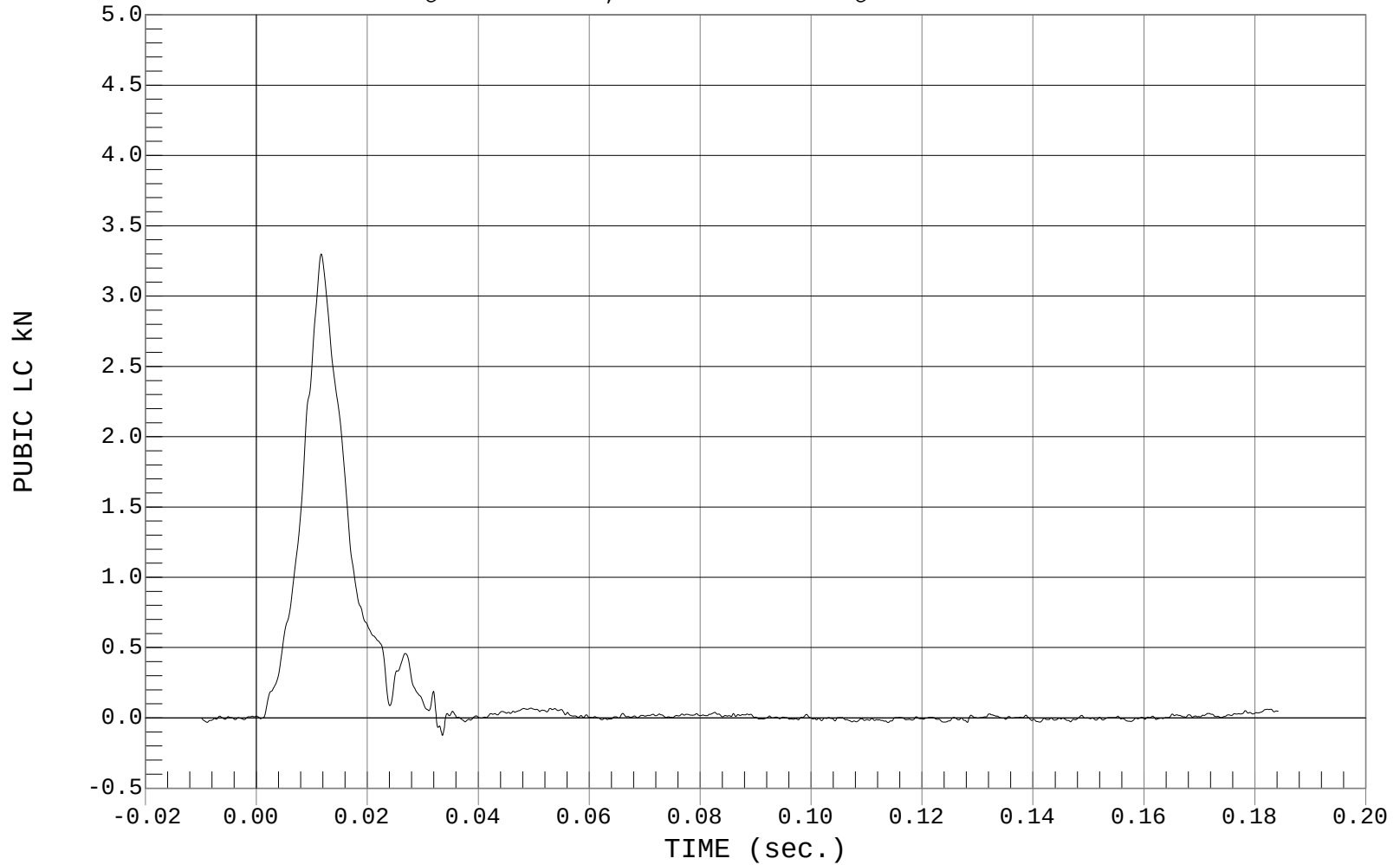
PUBIC FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #009

Test Date: 10-08-01
Speed: 20.42 FT/SEC, 6.22 M/SEC

— 1 PUBIC LC, D01449FT.F02

Ymin = -.12 kN @ 0.0336 sec., Ymax = 3.3 kN @ 0.0117 sec.



CERTIFICATION DATA

Dummy Serial Number: 010

Calibration Test Results Summary

Dummy Serial Number: 010

Pre-Test Calibration

Head Drop Test:	The head passed all drop test requirements.
Neck Pendulum Test:	The neck passed all impact test requirements.
Shoulder Impact Test:	The shoulder passed all impact test requirements.
Rib Tests:	All ribs passed all impact test requirements.
Abdomen Test:	The abdomen passed all impact test requirements.
Lumbar Spine Test:	The lumbar spine passed all impact test requirements.
Pelvis Test:	The pelvis passed all impact test requirements.

MGA RESEARCH CORPORATION
HEAD DROP TEST
EUROSID 2 DUMMY

Date: 10/09/01

Dummy Serial Number: 010

Test Number: D011451

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	45
Peak Resultant Acceleration	100 – 150 g's	136
Time of Max. Res. Acceleration		28.3 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



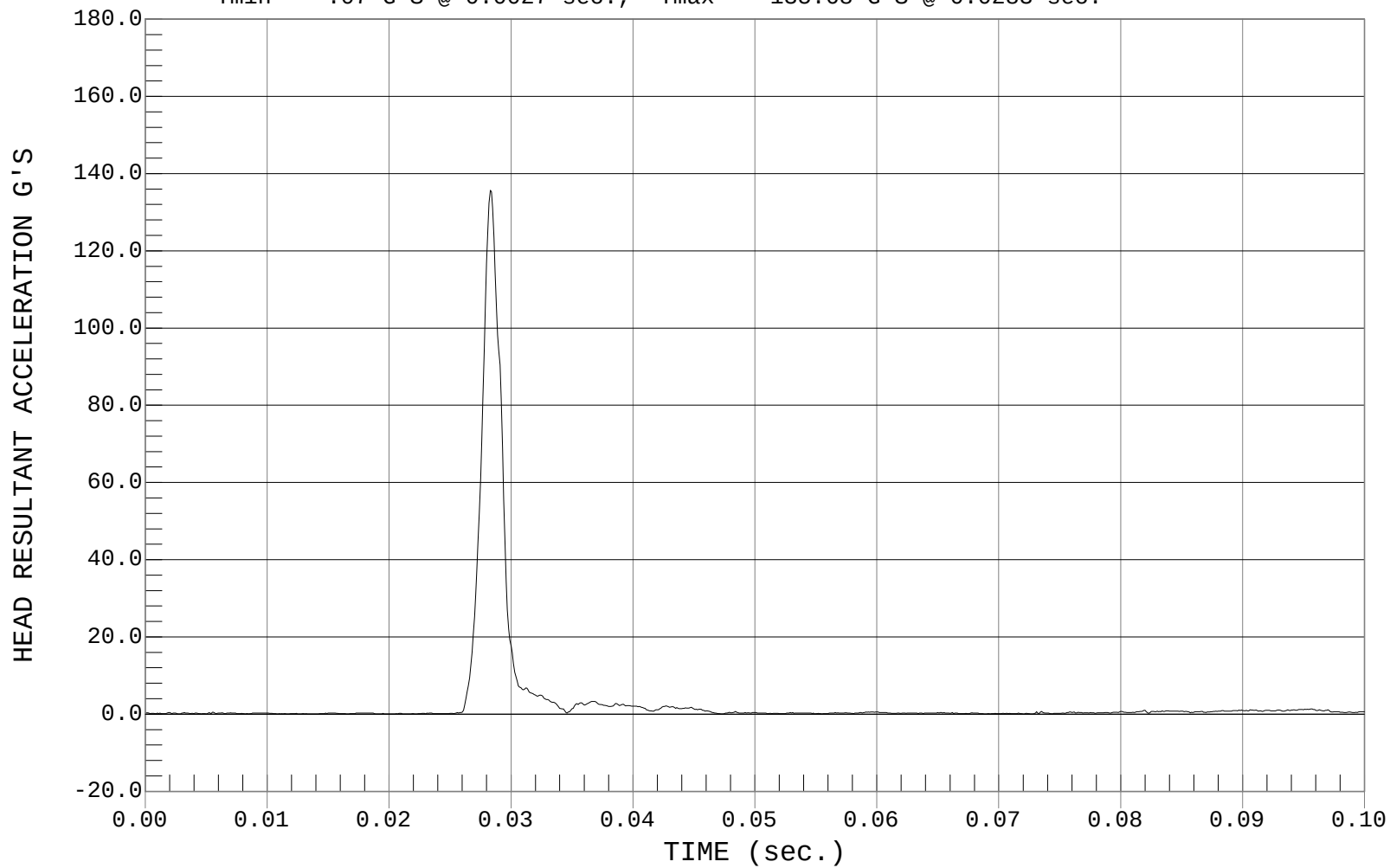
PEAK RESULTANT ACCELERATION

Test Desc.: Dummy Calibration - Head Drop
Component: Dummy #010

Test Date: 10-09-01
Speed: 0.00 FT/SEC, 0.00 M/SEC

— 1 HEAD RESULTANT ACCELERATION, D01451AV.A01

Ymin = .07 G'S @ 0.0027 sec., Ymax = 135.68 G'S @ 0.0283 sec.



MGA RESEARCH CORPORATION
NECK PENDULUM TEST
EUROSID 2 DUMMY

Date: 10/10/01

Dummy Serial Number: 010

Test Number: D011452

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.3
Relative Humidity (%)		10 – 70	54
Pendulum Speed		3.3 - 3.5	3.4
Pendulum Deceleration	3 msec	1.25 - 1.53 m/sec	-.35
	8 msec	1.59 - 2.04 m/sec	-1.73
	14 msec	3.20 - 3.85 m/sec	-3.38
Maximum Flexion Angle		49.0 – 59.0 deg	58.7
Time of Max. Flexion Angle		54.0 – 66.0 ms	59.0
Maximum Angle Theta (A)		32.0 – 37.0 deg	35.2
Time of Max. Theta (A)		53.0 – 63.0 ms	59.0
Maximum Angle Theta (B)		30.26 – 32.76 deg	31.13
Time of Max. Theta (B)		54.0 – 64.0 ms	60.4

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____

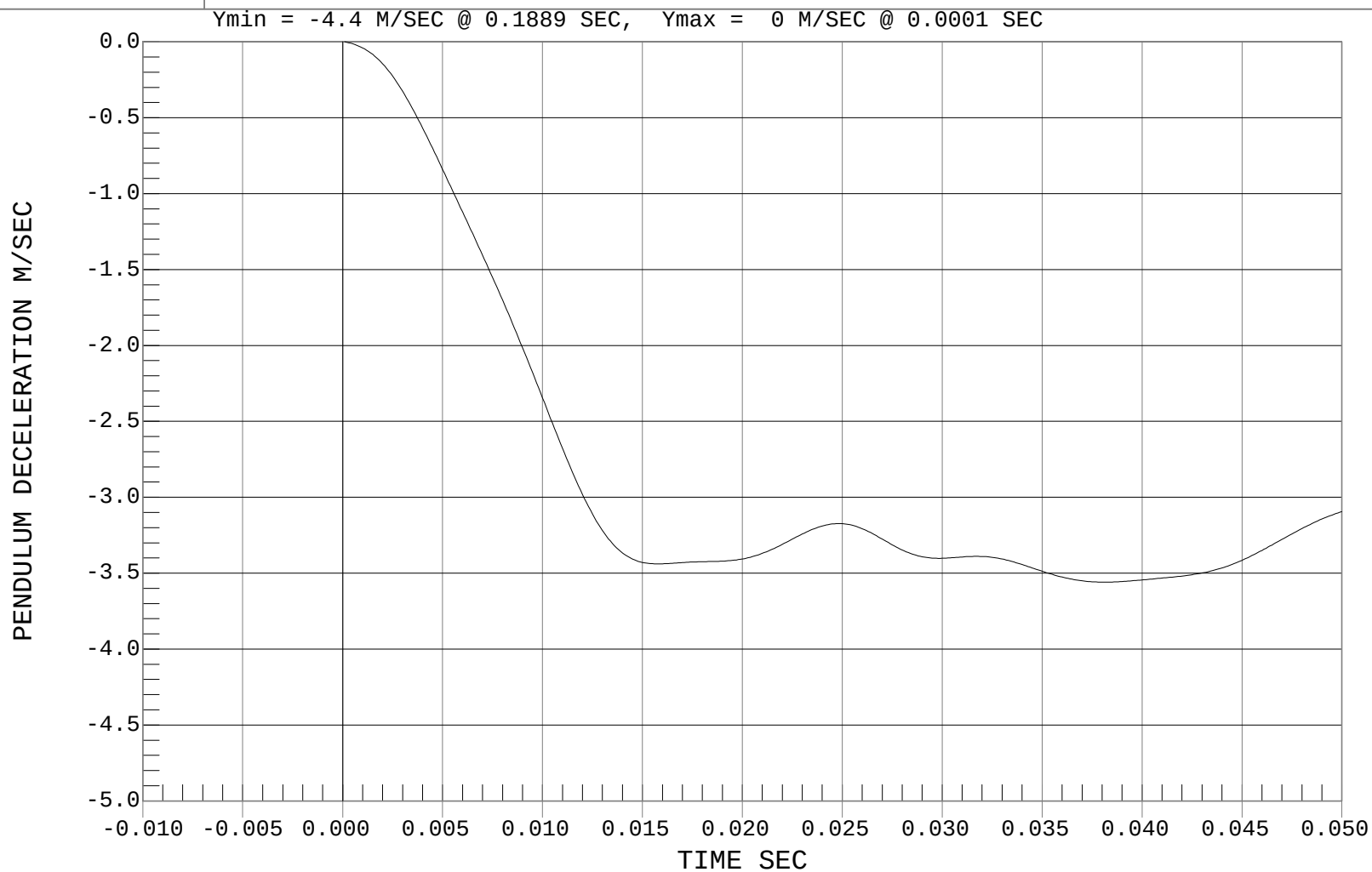


PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #010

Test Date: 10-10-01
Speed: 11.08 FT/SEC, 3.38 M/SEC

— 1 PENDULUM DECELERATION, D01452AI.V04



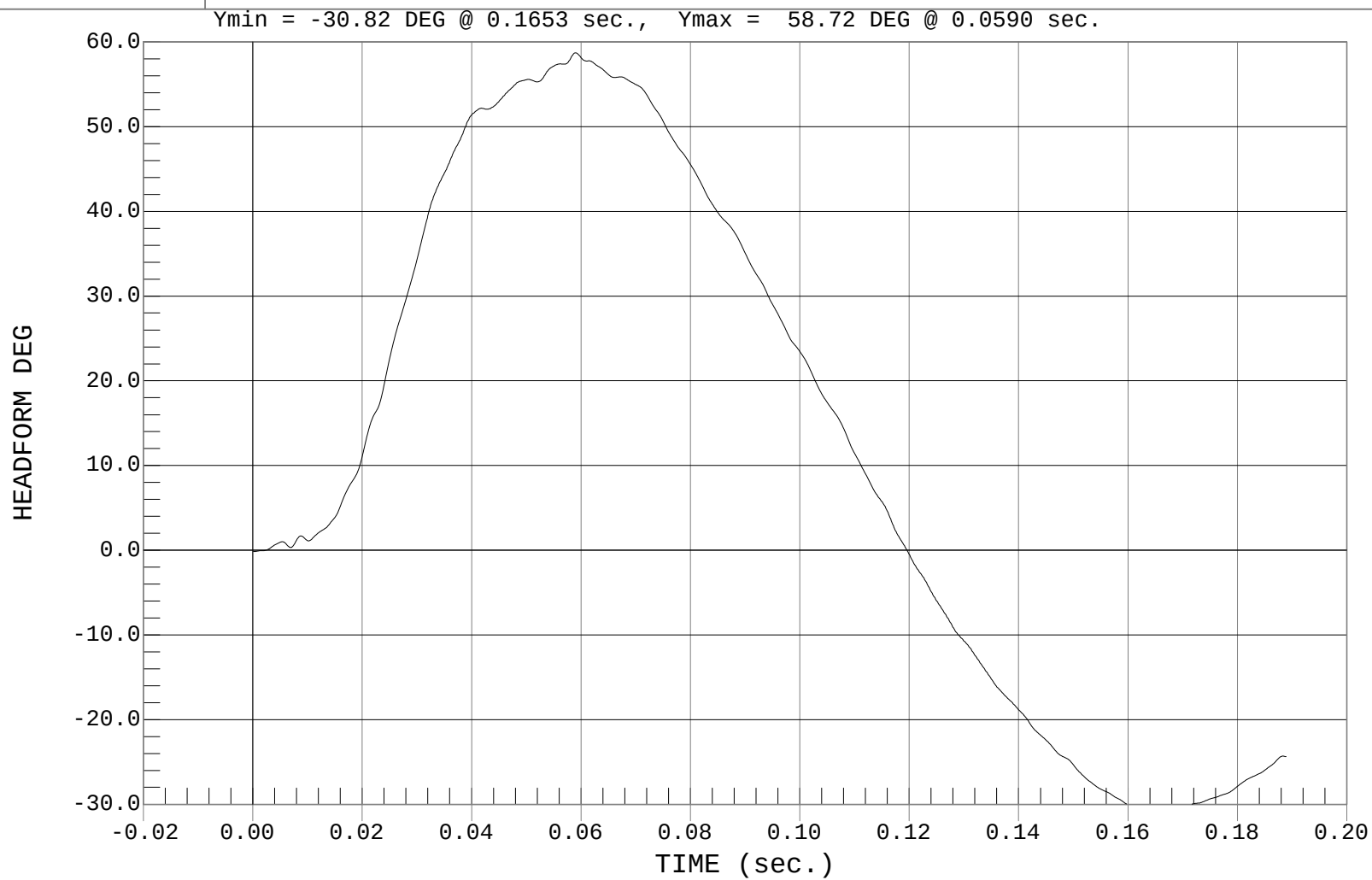


FLEXION ANGLE

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #010

Test Date: 10-10-01
Speed: 11.08 FT/SEC, 3.38 M/SEC

— 1 HEADFORM, D01452DT.D08





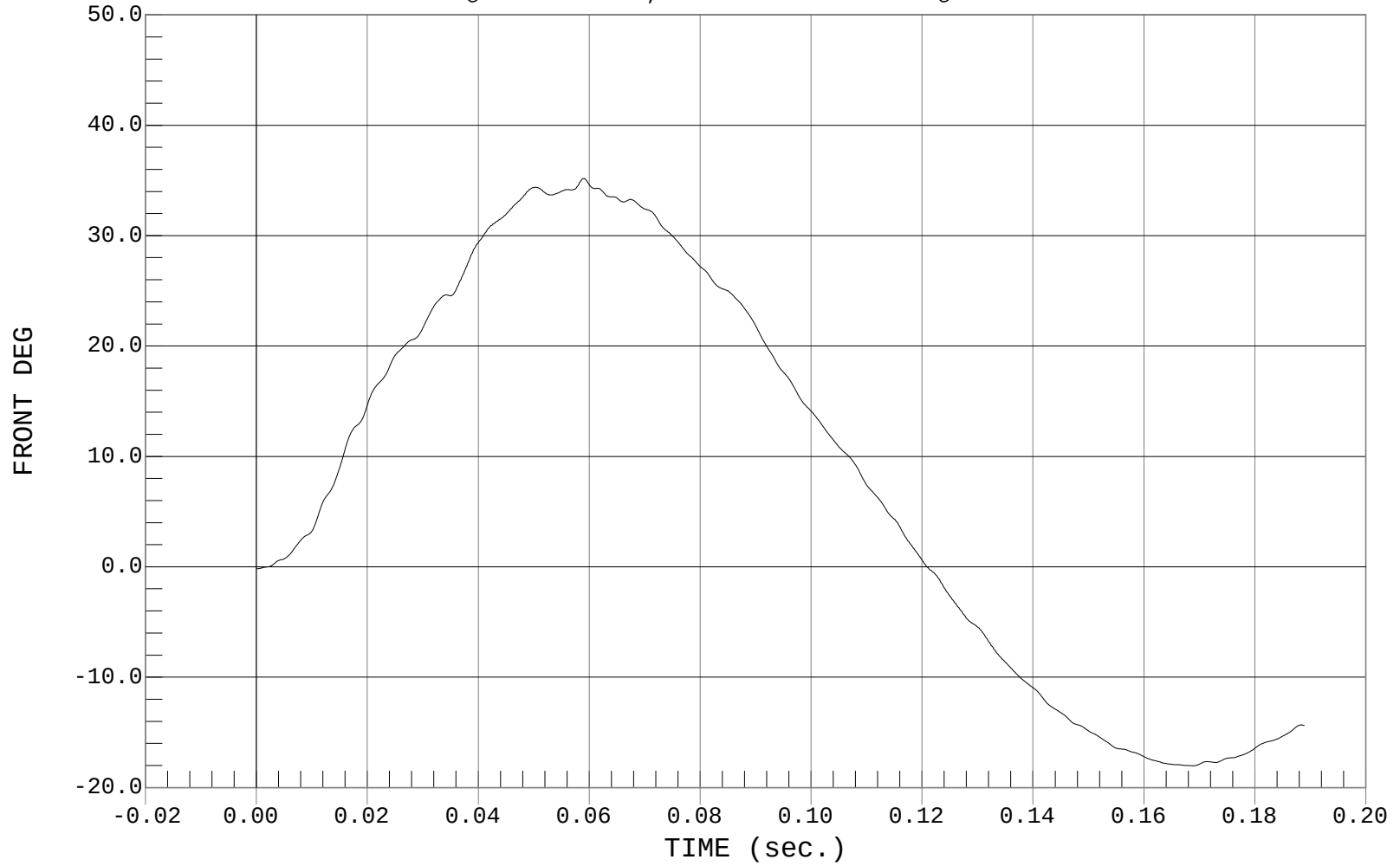
THETA A

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #010

Test Date: 10-10-01
Speed: 11.08 FT/SEC, 3.38 M/SEC

— 1 FRONT, D01452DT.D05

Ymin = -18.03 DEG @ 0.1688 sec., Ymax = 35.18 DEG @ 0.0590 sec.





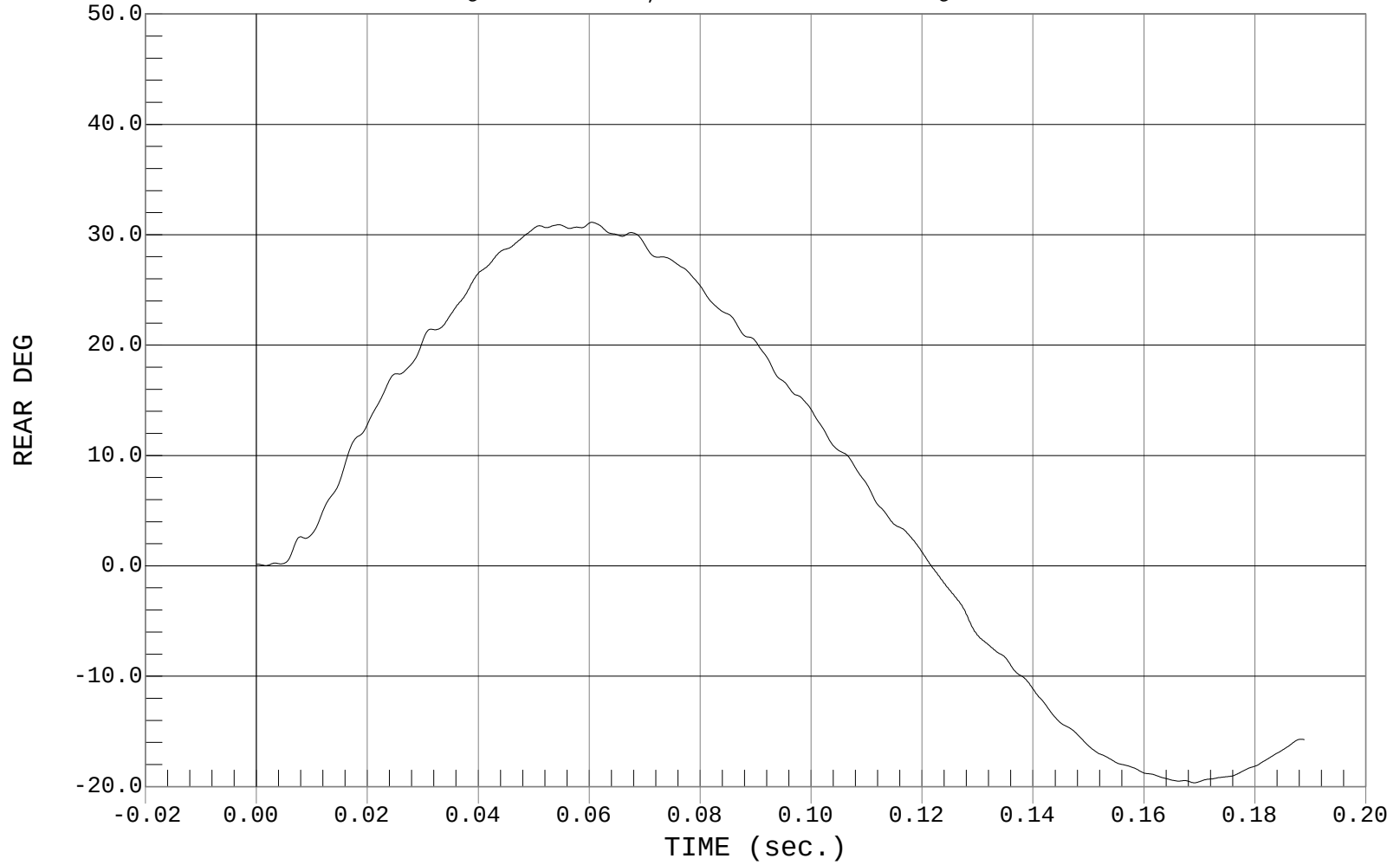
THETA B

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #010

Test Date: 10-10-01
Speed: 11.08 FT/SEC, 3.38 M/SEC

1 REAR, D01452DT.D06

Ymin = -19.66 DEG @ 0.1691 sec., Ymax = 31.13 DEG @ 0.0604 sec.



MGA RESEARCH CORPORATION
SHOULDER IMPACT TEST
EUROSID 2 DUMMY

Date: 10/11/01

Dummy Serial Number: 010

Test Number: D011453

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	44
Pendulum Speed	4.2 – 4.4 m/s	4.3
Max. Resultant Acceleration	7.5 – 10.5 g's	10.0
Time of Max. Pendulum Acceleration		28.3 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



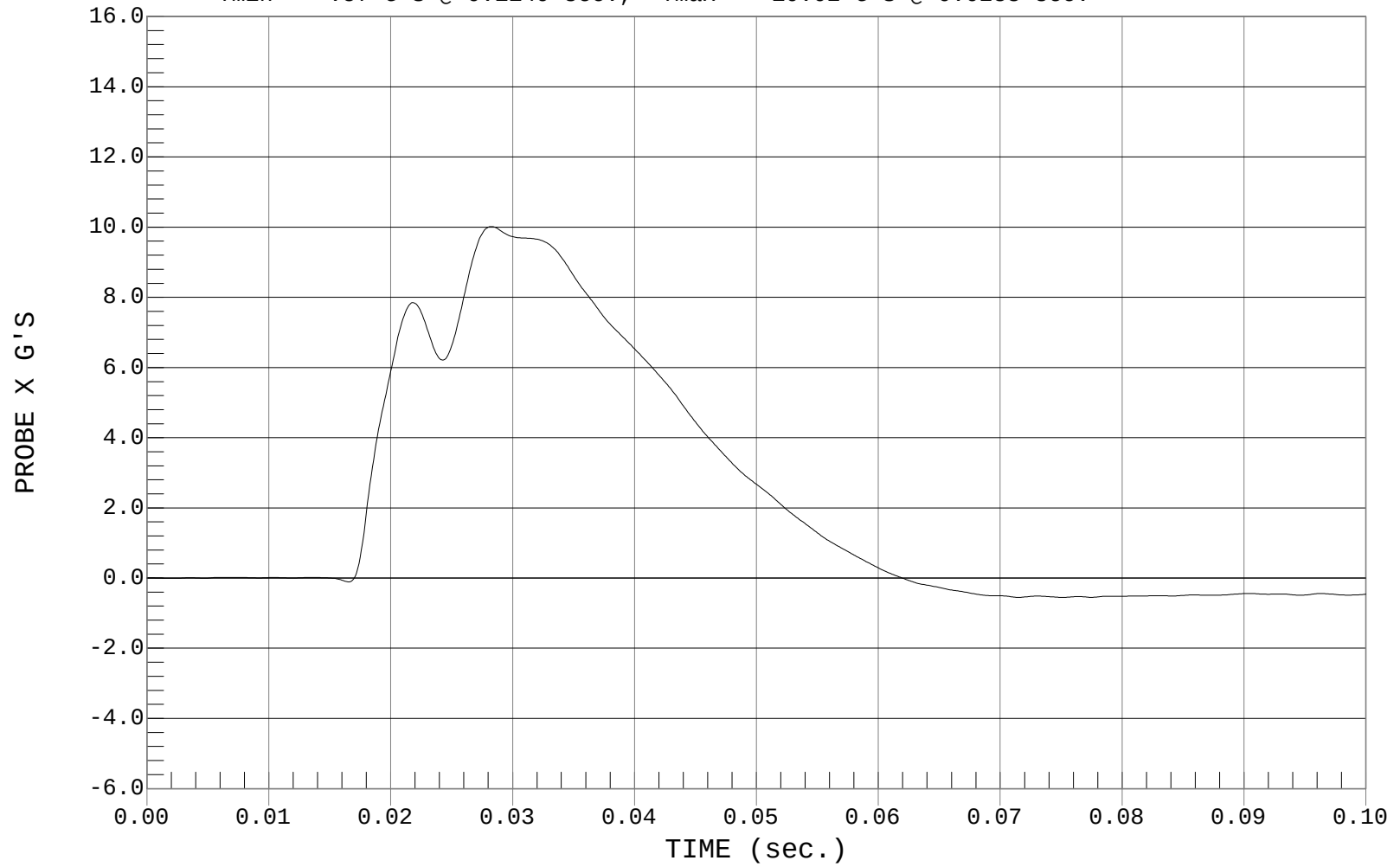
SHOULDER ACCELERATION

Test Desc.: Dummy Calibration - Shoulder Impact
Component: Dummy #010

Test Date: 10-11-01
Speed: 13.97 FT/SEC, 4.26 M/SEC

— 1 PROBE X, D01453AF.A01

Ymin = -.57 G'S @ 0.1149 sec., Ymax = 10.02 G'S @ 0.0283 sec.



MGA RESEARCH CORPORATION
UPPER/MIDDLE/LOWER RIB TESTS
SIDE IMPACT DUMMY (SID)

Date: 10/08/01 & 10/09/01

Dummy Serial Number: 010

Test Number: D011454/5/6

UPPER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.9
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	27.3
Displacement at 3 m/s	36.0 – 40.0 mm	39.6
Displacement at 4 m/s	46.0 – 51.0 mm	50.7

MIDDLE RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.5
Relative Humidity (%)	10 – 70	38
Displacement at 2 m/s	23.5 – 27.5 mm	25.9
Displacement at 3 m/s	36.0 – 40.0 mm	37.8
Displacement at 4 m/s	46.0 – 51.0 mm	49.7

LOWER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.8
Relative Humidity (%)	10 – 70	38
Displacement at 2 m/s	23.5 – 27.5 mm	24.2
Displacement at 3 m/s	36.0 – 40.0 mm	37.7
Displacement at 4 m/s	46.0 – 51.0 mm	49.1

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



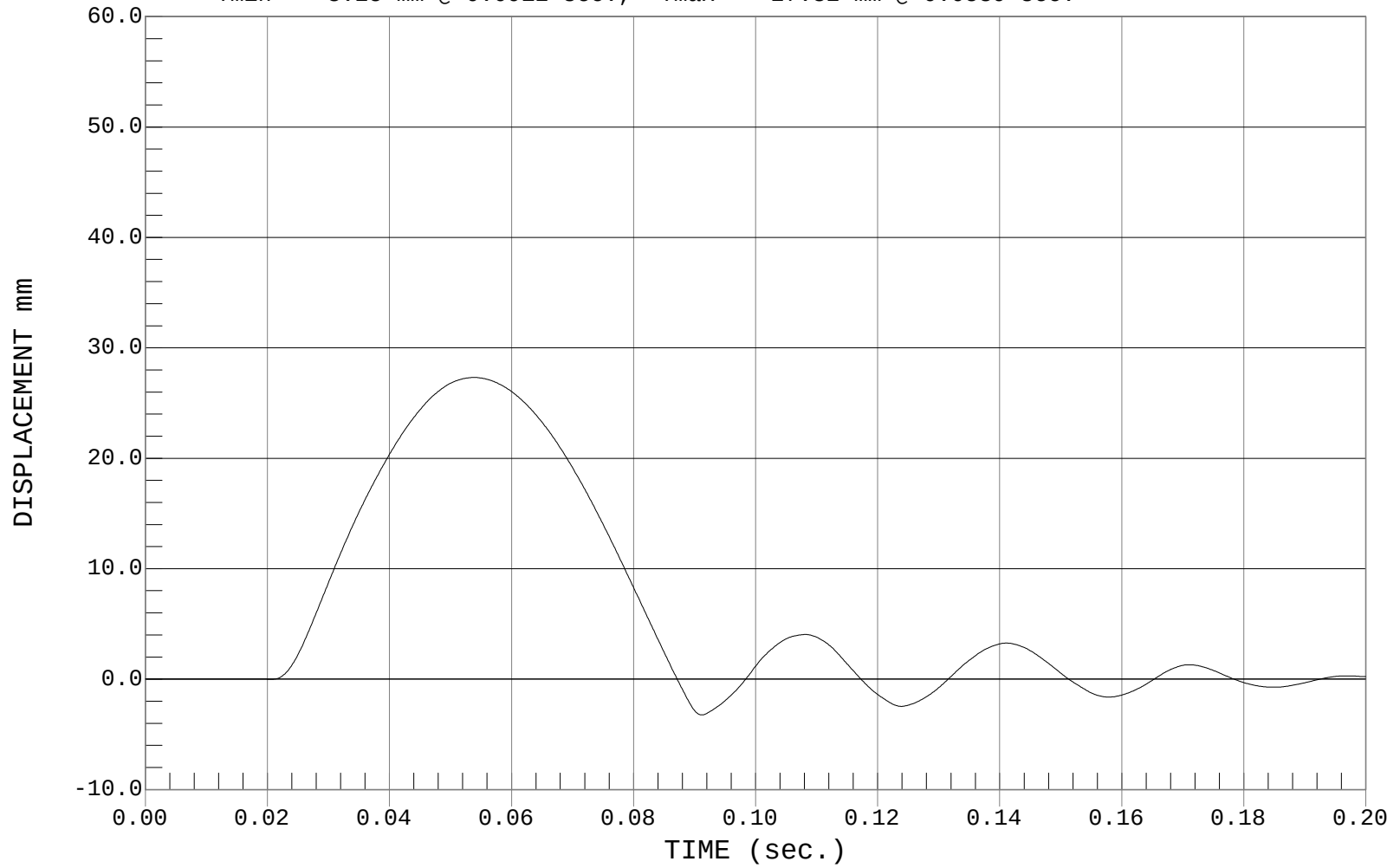
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-08-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

1 DISPLACEMENT, D01454DF.D05

Ymin = -3.25 mm @ 0.0912 sec., Ymax = 27.32 mm @ 0.0539 sec.





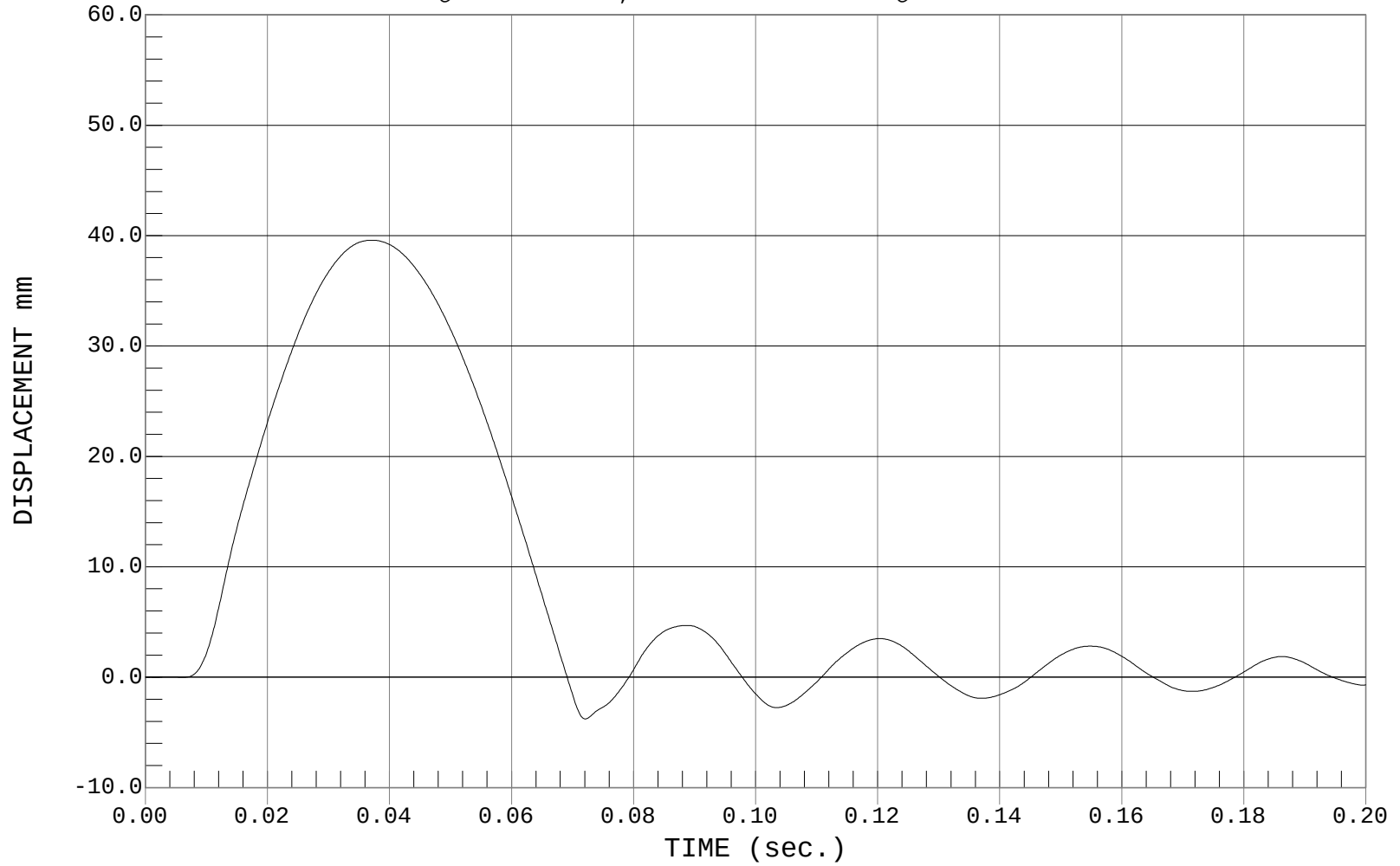
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-08-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01454DF.D06

Ymin = -3.78 mm @ 0.0721 sec., Ymax = 39.58 mm @ 0.0371 sec.





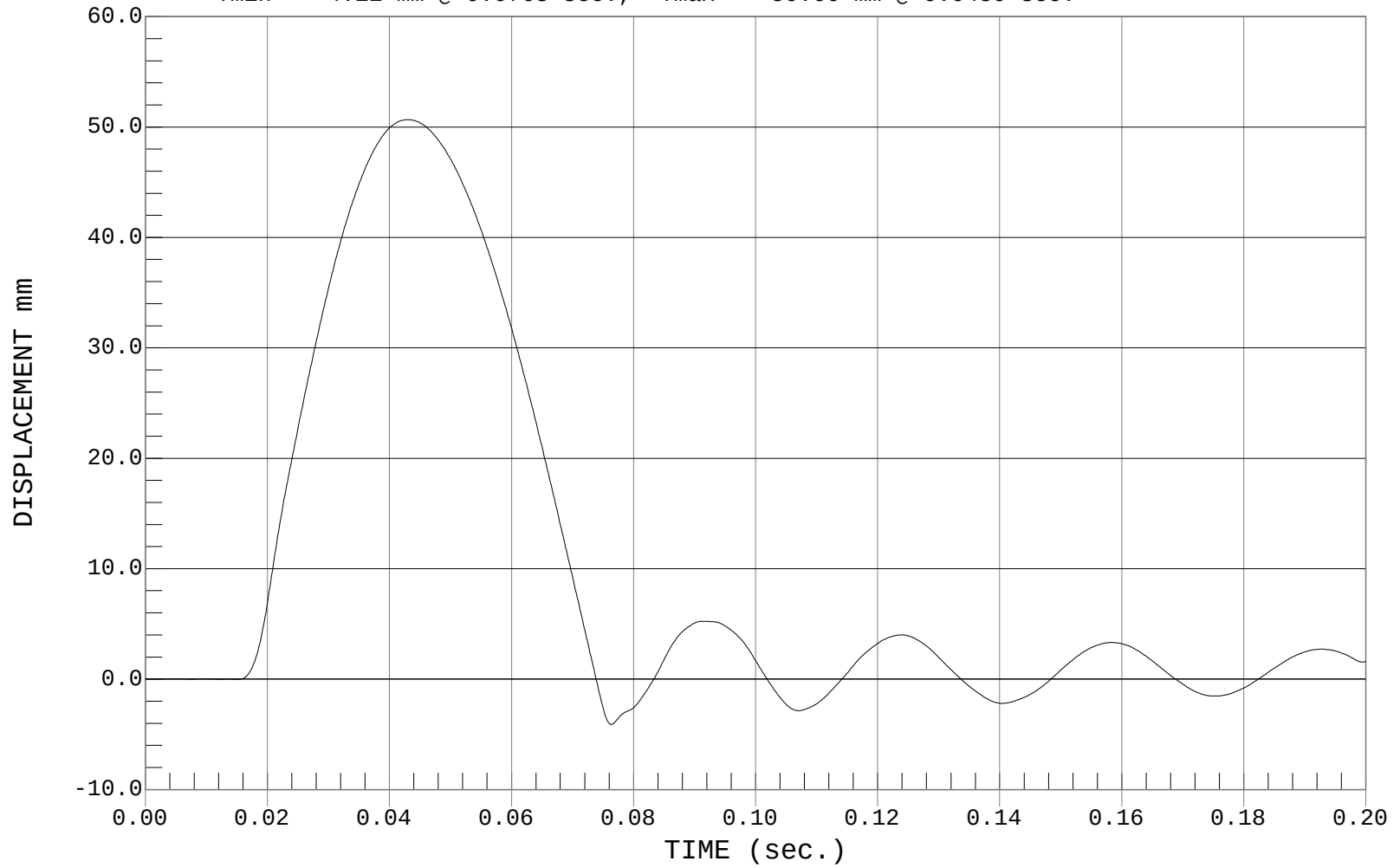
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-08-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01454DF.D07

Ymin = -4.11 mm @ 0.0763 sec., Ymax = 50.66 mm @ 0.0430 sec.





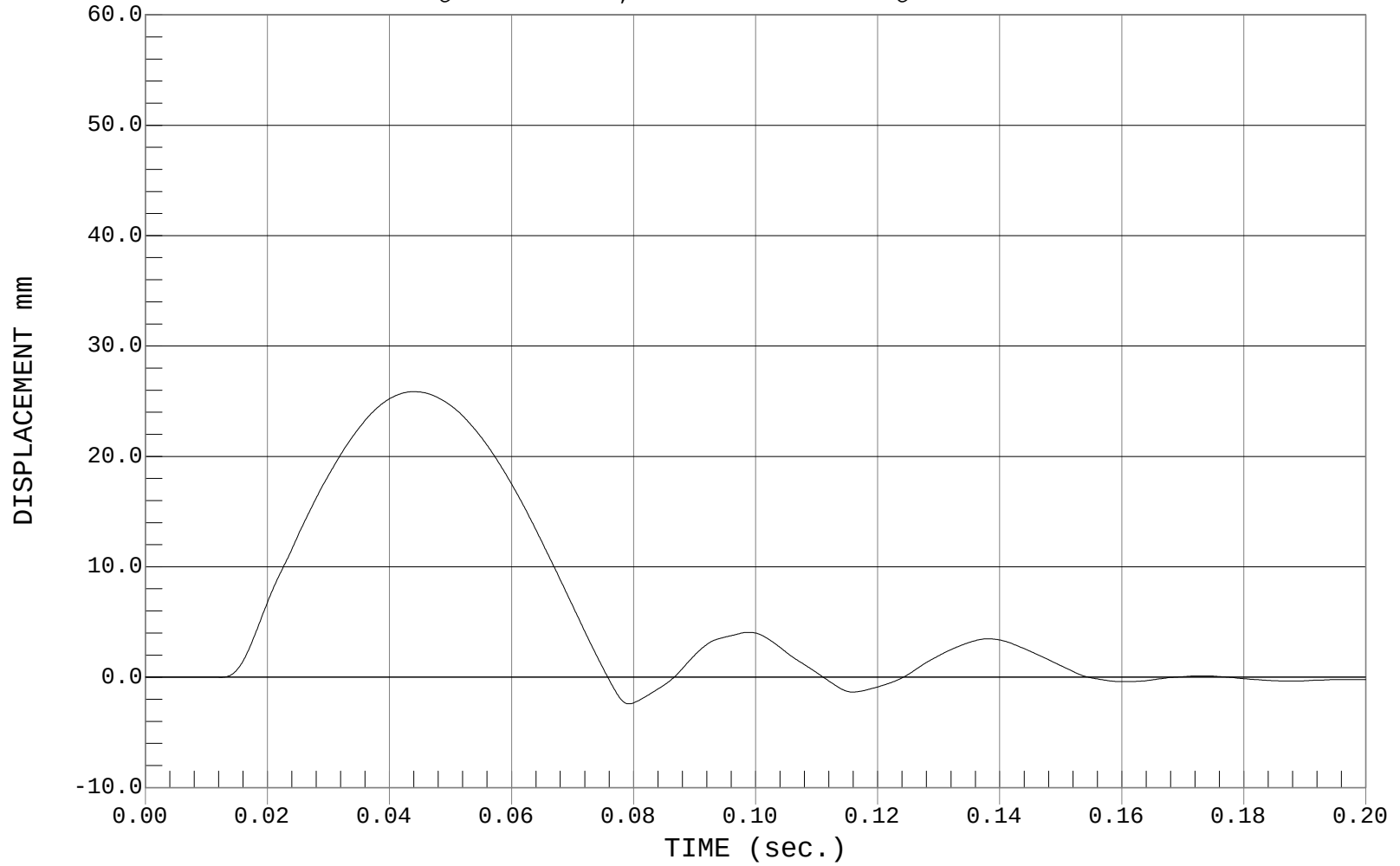
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01455DF.D05

Ymin = -2.42 mm @ 0.0792 sec., Ymax = 25.87 mm @ 0.0439 sec.





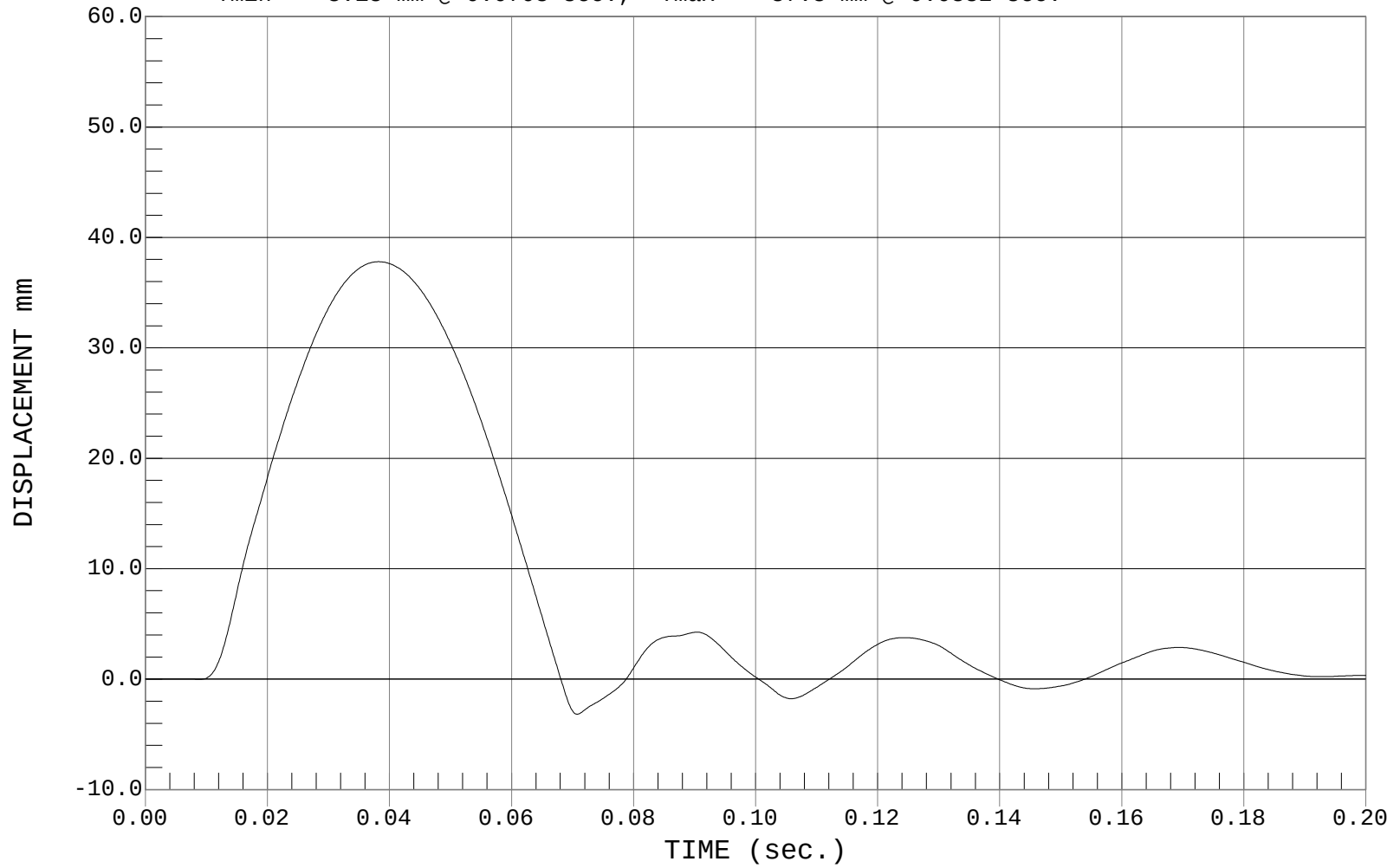
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01455DF.D06

Ymin = -3.18 mm @ 0.0708 sec., Ymax = 37.8 mm @ 0.0382 sec.





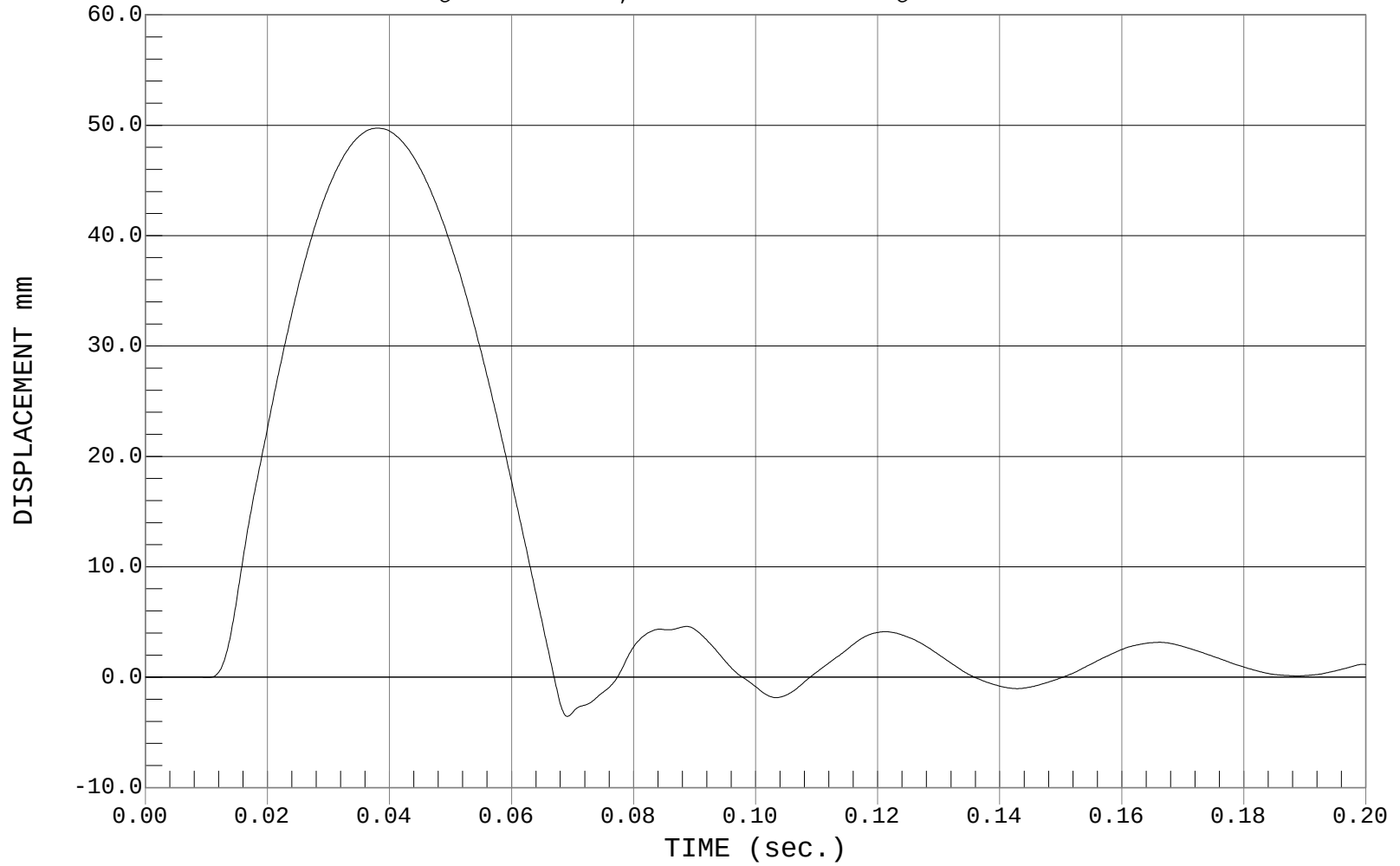
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01455DF.D07

Ymin = -3.56 mm @ 0.0691 sec., Ymax = 49.73 mm @ 0.0381 sec.





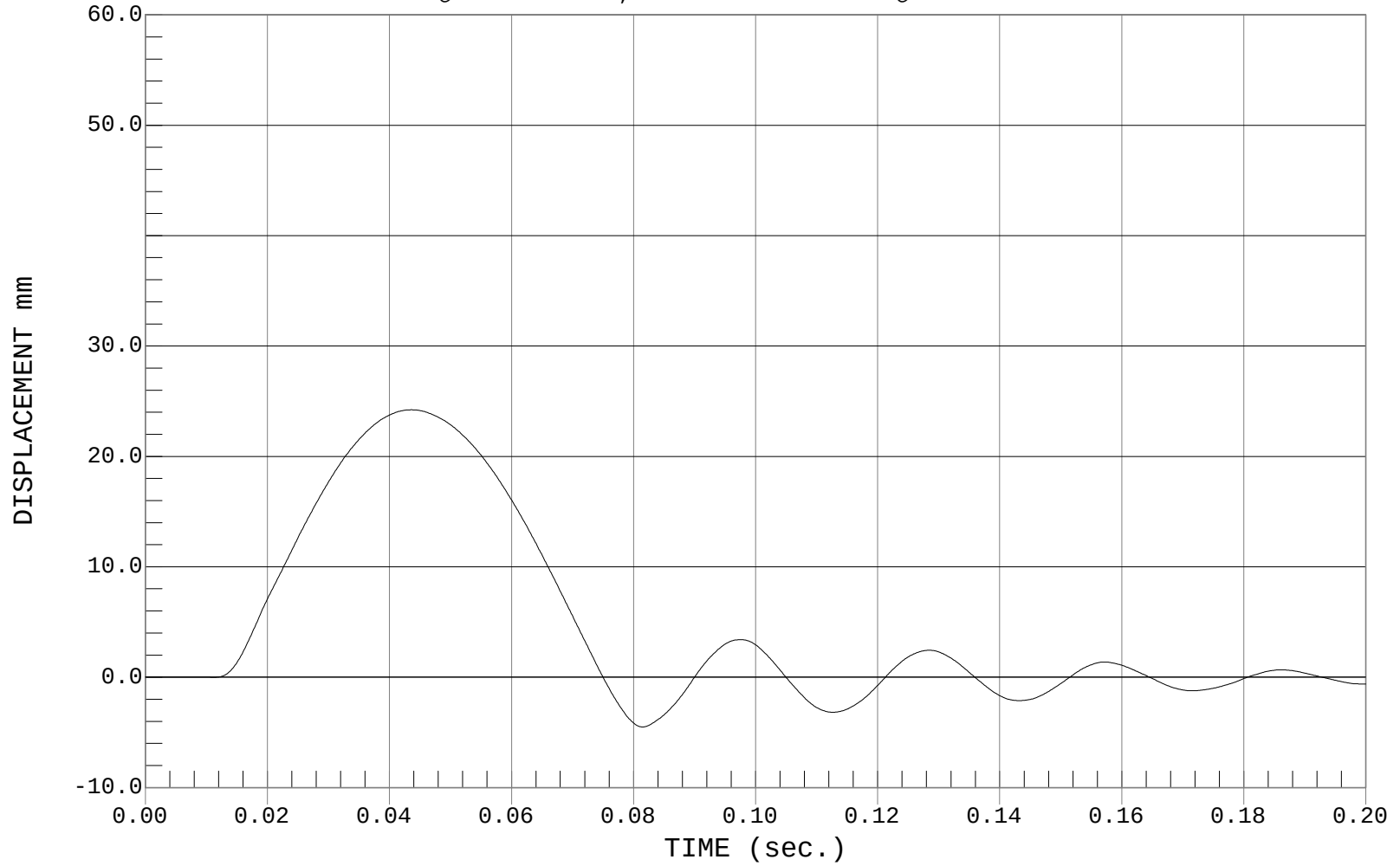
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01456DF.D05

Ymin = -4.51 mm @ 0.0815 sec., Ymax = 24.22 mm @ 0.0436 sec.





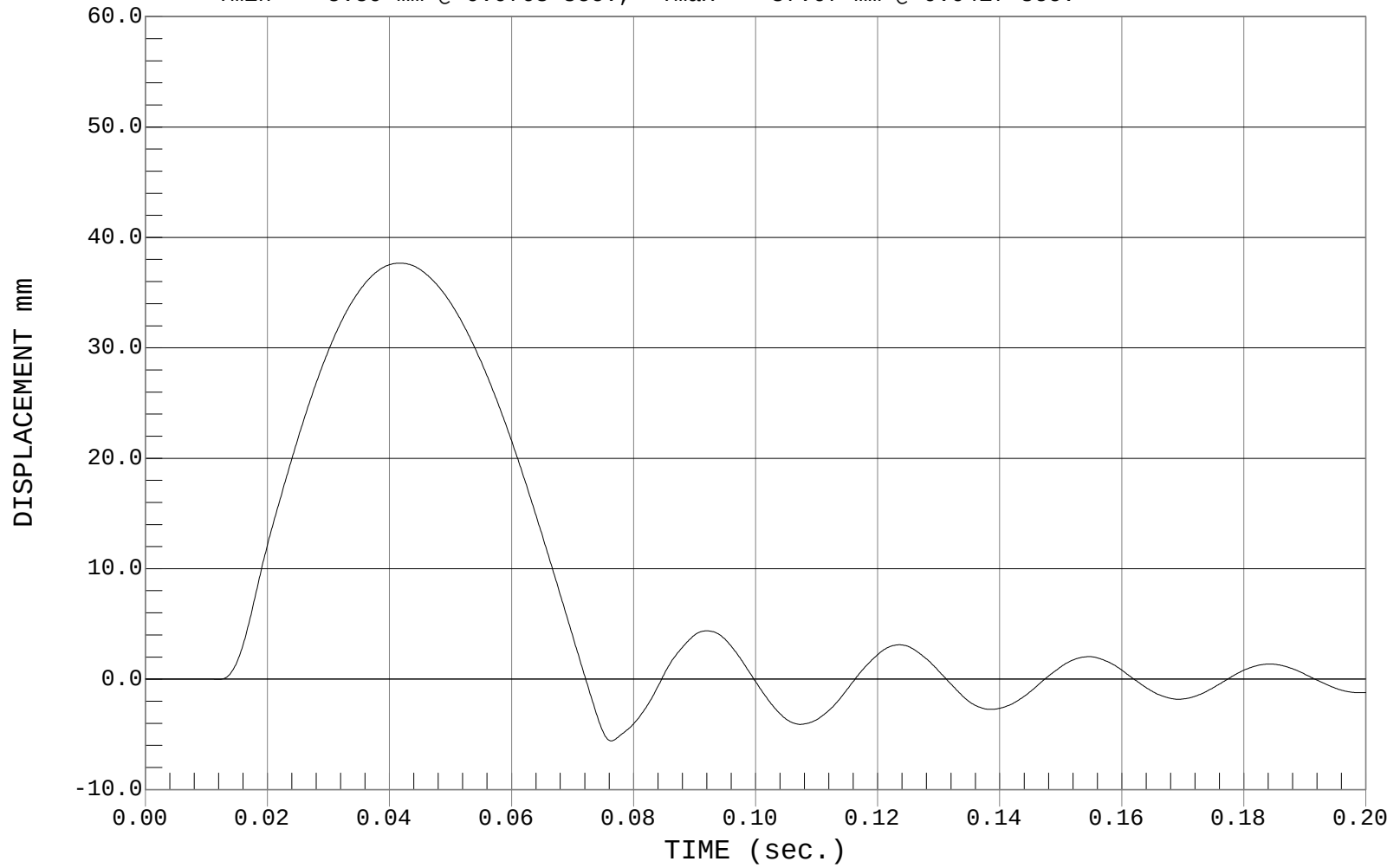
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01456DF.D06

Ymin = -5.59 mm @ 0.0763 sec., Ymax = 37.67 mm @ 0.0417 sec.





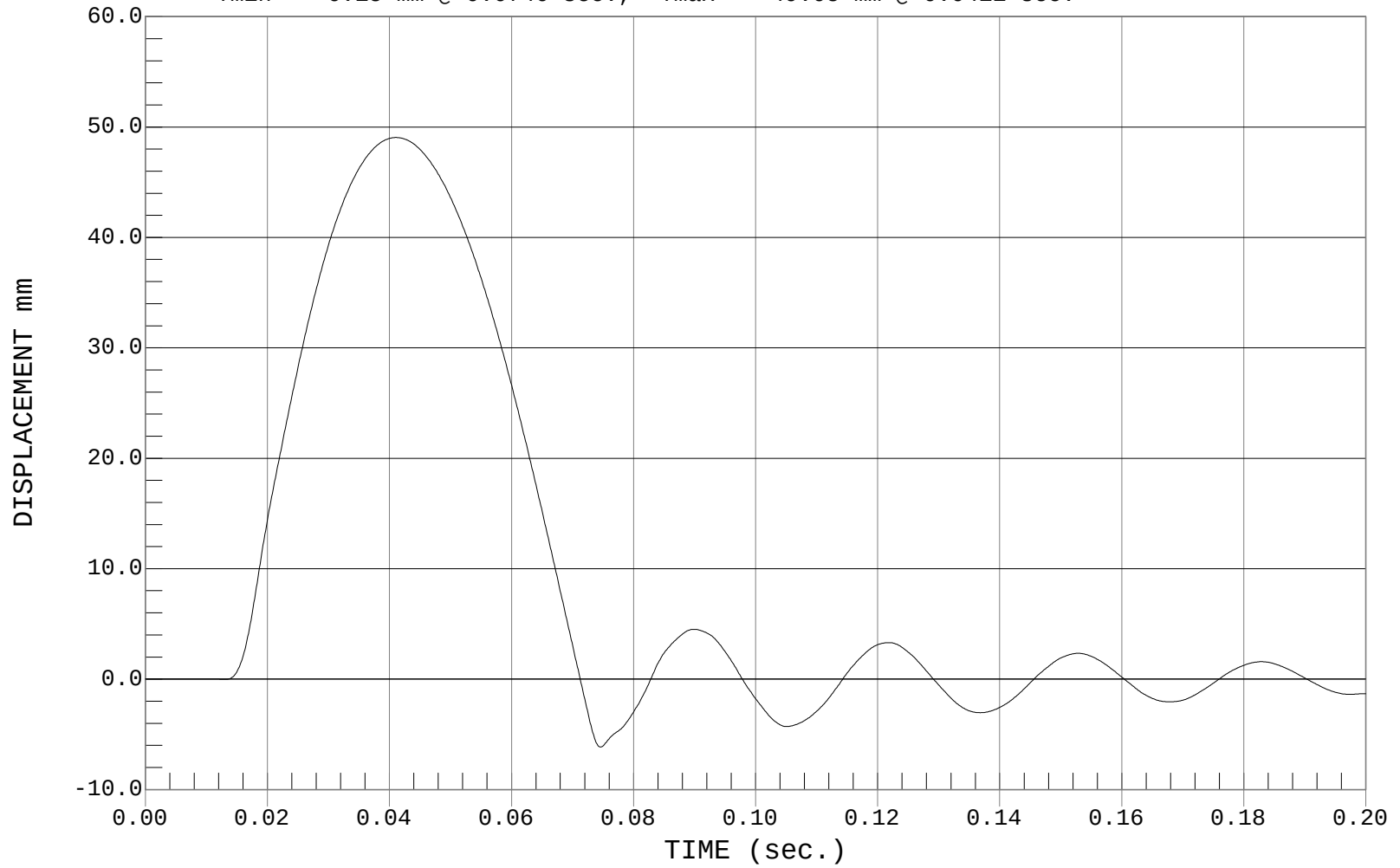
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #010

Test Date: 10-09-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01456DF.D07

Ymin = -6.15 mm @ 0.0746 sec., Ymax = 49.05 mm @ 0.0411 sec.



MGA RESEARCH CORPORATION
ABDOMEN TEST
EUROSID 2 DUMMY

Date: 10/11/01

Dummy Serial Number: 010

Test Number: D011457

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	22.0
Relative Humidity (%)	10 – 70	45
Probe Speed (m/s)	3.90 – 4.10	3.97
Maximum Impact Force	4.00 – 4.80 kN	4.77
Time of Maximum Force	10.60 – 13.00 ms	12.30
Maximum Total Abdomen Force	2.20 – 2.70 kN	2.29
Time of Max. Total Force	10.00 – 12.30 ms	11.70

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



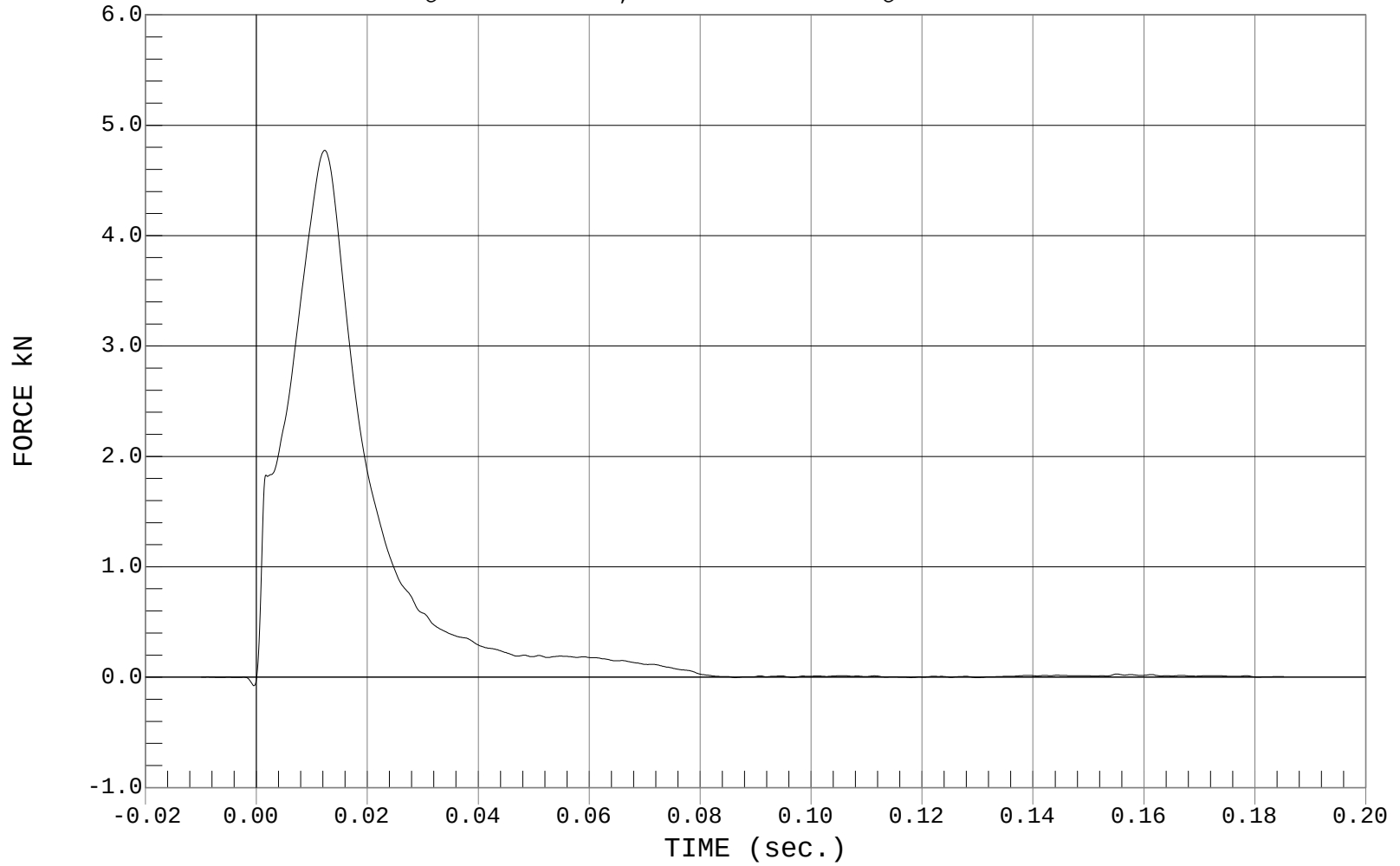
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Abdomen Imapct
Component: Dummy #010

Test Date: 10-11-01
Speed: 13.02 FT/SEC, 3.97 M/SEC

1 FORCE, D01457FT.F01

Ymin = -.08 kN @ -0.0004 sec., Ymax = 4.77 kN @ 0.0123 sec.





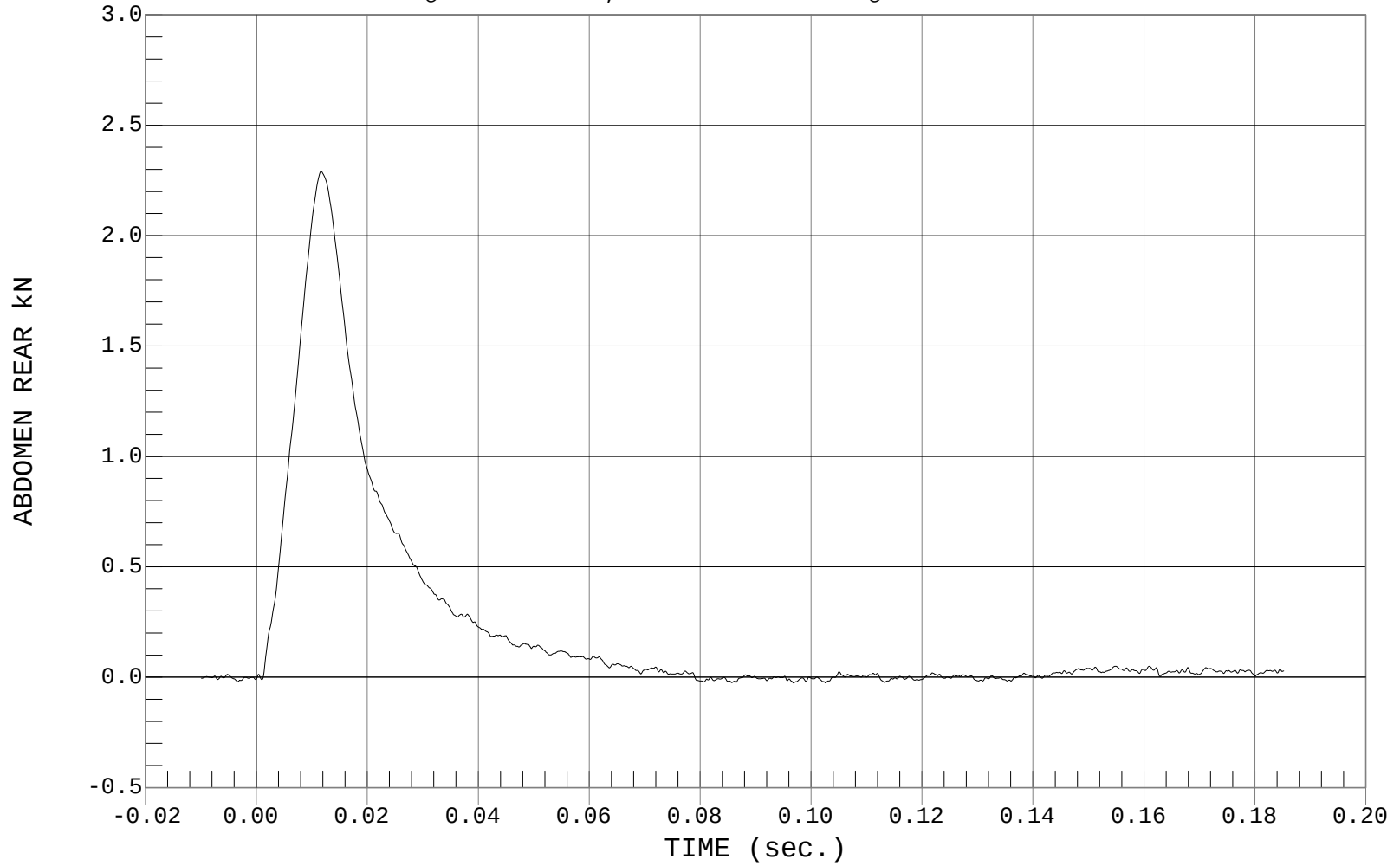
ABDOMEN FORCE

Test Desc.: Dummy Calibration - Abdomen Imapct
Component: Dummy #010

Test Date: 10-11-01
Speed: 13.02 FT/SEC, 3.97 M/SEC

— 1 ABDOMEN REAR, D01457FT.F02

Ymin = -.03 kN @ 0.0969 sec., Ymax = 2.29 kN @ 0.0117 sec.



MGA RESEARCH CORPORATION
LUMBAR SPINE TEST
EUROSID 2 DUMMY

Date: 10/11/01

Dummy Serial Number: 010

Test Number: D011458

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.8
Relative Humidity (%)		10 – 70	46
Pendulum Speed		5.95 – 6.15	6.00
Pendulum Deceleration	10 msec	2.46 - 1.59 m/sec	-1.87
	20 msec	5.25 - 4.07 m/sec	-4.23
	25 msec	6.64 - 5.3 m/sec	-5.31
	30 msec	≥ -6.5 m/sec	-6.0
Maximum Flexion Angle		45.0 – 55.0 deg	48.8
Time of Max. Flexion Angle		39.0 – 53.0 ms	45.2
Maximum Angle Theta (A)		31.0 – 35.0 deg	31.5
Time of Max. Theta (A)		44.0 – 52.0 ms	44.9
Maximum Angle Theta (B)		27.20 – 29.70 deg	27.72
Time of Max. Theta (B)		44.0 – 52.0 ms	46.6

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____

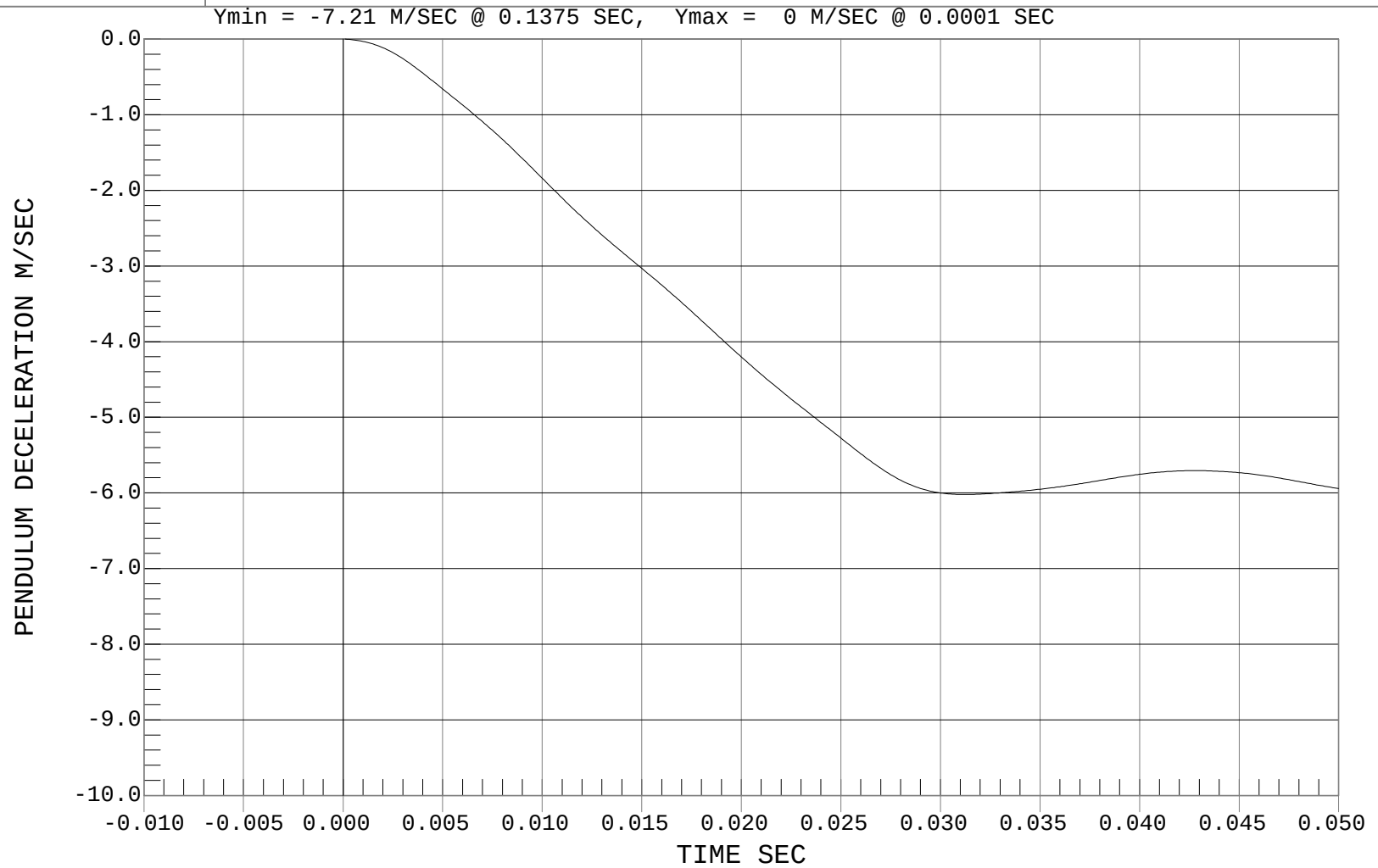


PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #010

Test Date: 10-11-01
Speed: 19.69 FT/SEC, 6.00 M/SEC

— 1 PENDULUM DECELERATION, D01458AI.V04





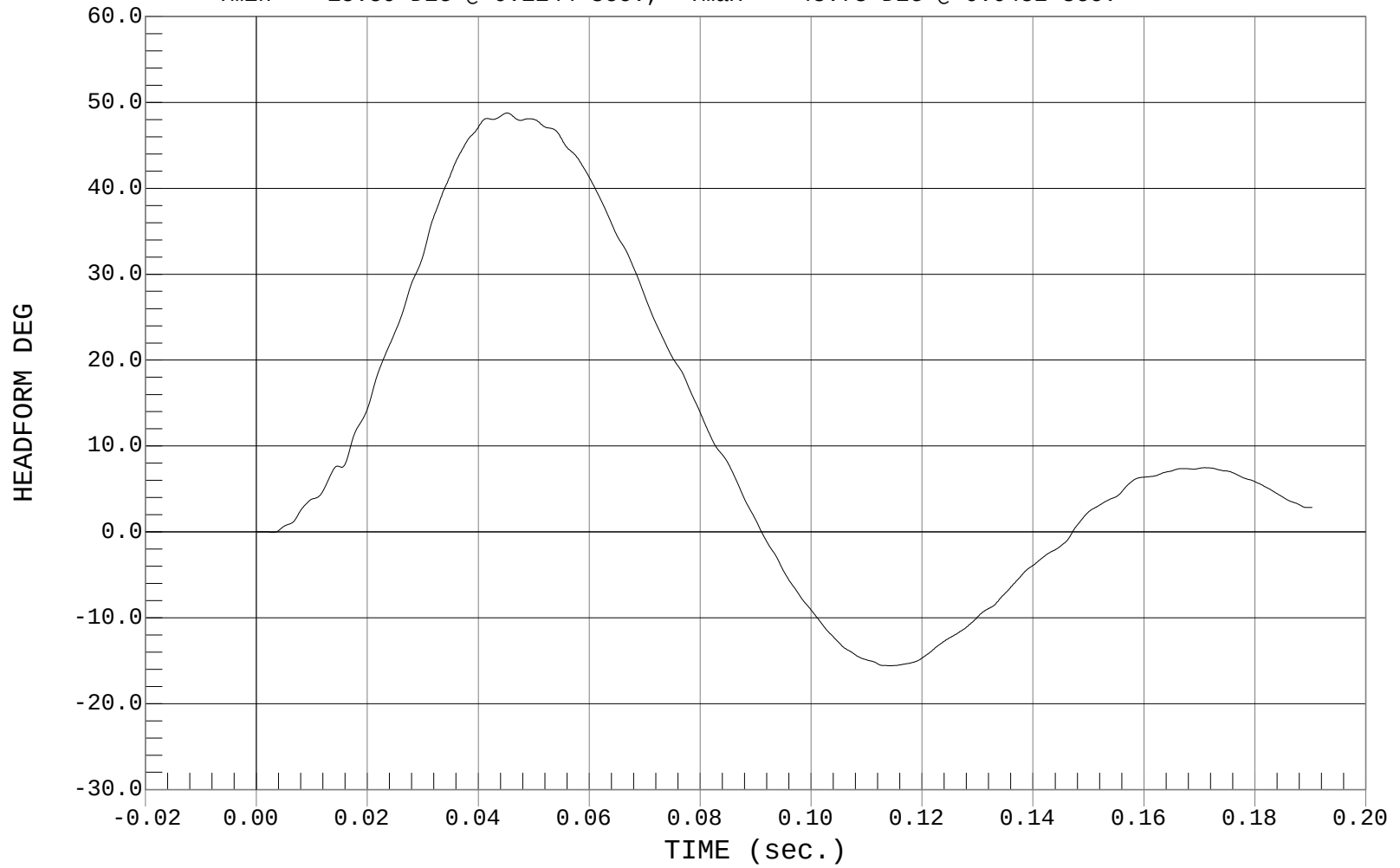
FLEXION ANGLE

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #010

Test Date: 10-11-01
Speed: 19.69 FT/SEC, 6.00 M/SEC

— 1 HEADFORM, D01458DT.D08

Ymin = -15.59 DEG @ 0.1144 sec., Ymax = 48.78 DEG @ 0.0452 sec.





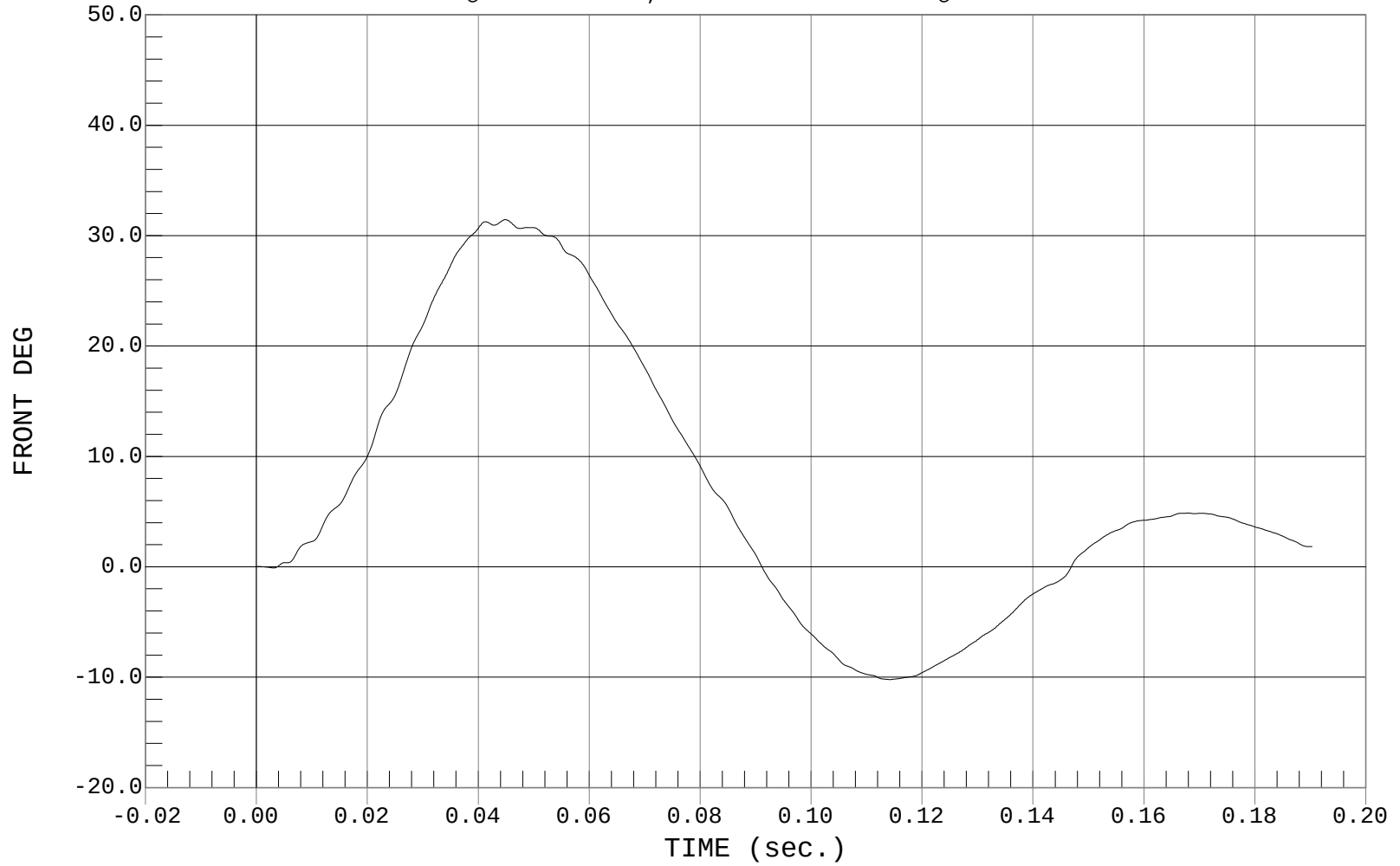
THETA A

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #010

Test Date: 10-11-01
Speed: 19.69 FT/SEC, 6.00 M/SEC

— 1 FRONT, D01458DT.D05

Ymin = -10.21 DEG @ 0.1142 sec., Ymax = 31.45 DEG @ 0.0449 sec.





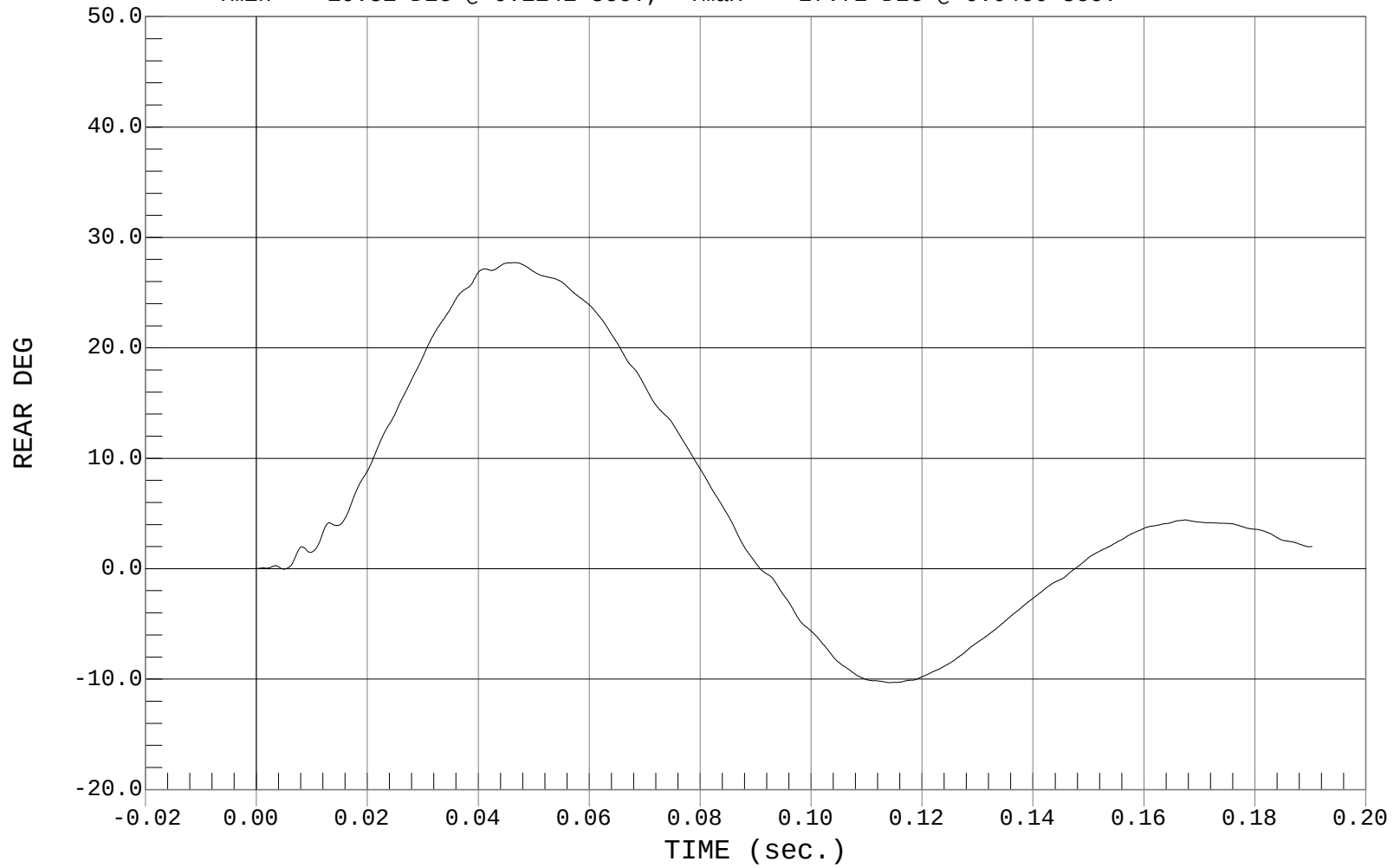
THETA B

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #010

Test Date: 10-11-01
Speed: 19.69 FT/SEC, 6.00 M/SEC

— 1 REAR, D01458DT.D06

Ymin = -10.31 DEG @ 0.1141 sec., Ymax = 27.72 DEG @ 0.0466 sec.



MGA RESEARCH CORPORATION
PELVIS TEST
EUROSID 2 DUMMY

Date: 10/11/01

Dummy Serial Number: 010

Test Number: D011459

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.8
Relative Humidity (%)	10 – 70	46
Pendulum Speed	6.20 – 6.30 m/s	6.28
Maximum Impactor Force	9.80 – 12.20 kN	11.10
Time of Max. Impactor Force	9.50 – 12.50 ms	11.30
Maximum Pubic Force	2.65 – 3.35 kN	3.30
Time of Max. Pubic Force	10.00 – 13.00 ms	11.50

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



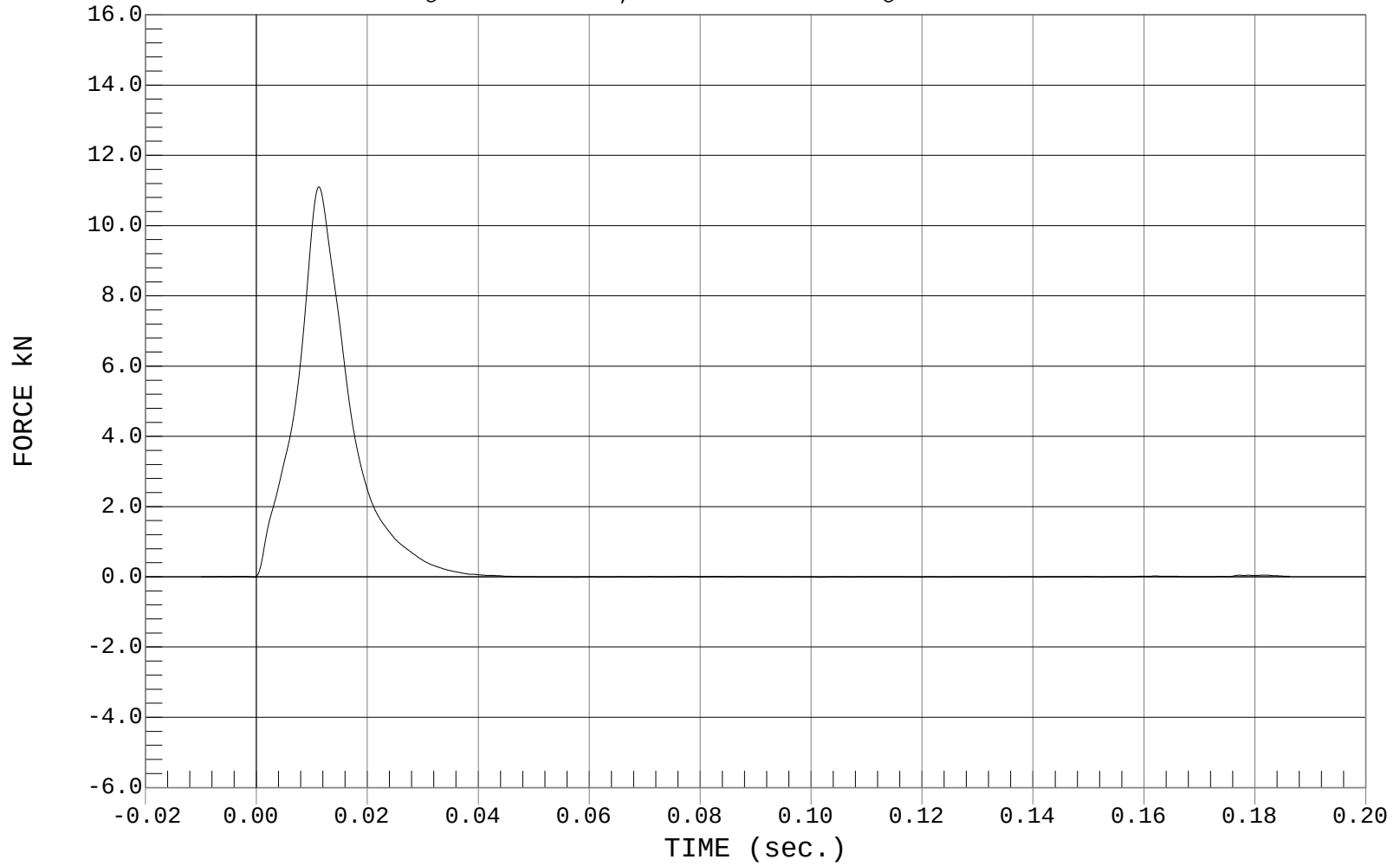
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #010

Test Date: 10-11-01
Speed: 20.61 FT/SEC, 6.28 M/SEC

— 1 FORCE, D01459FT.F01

Ymin = -.01 kN @ -0.0005 sec., Ymax = 11.1 kN @ 0.0113 sec.





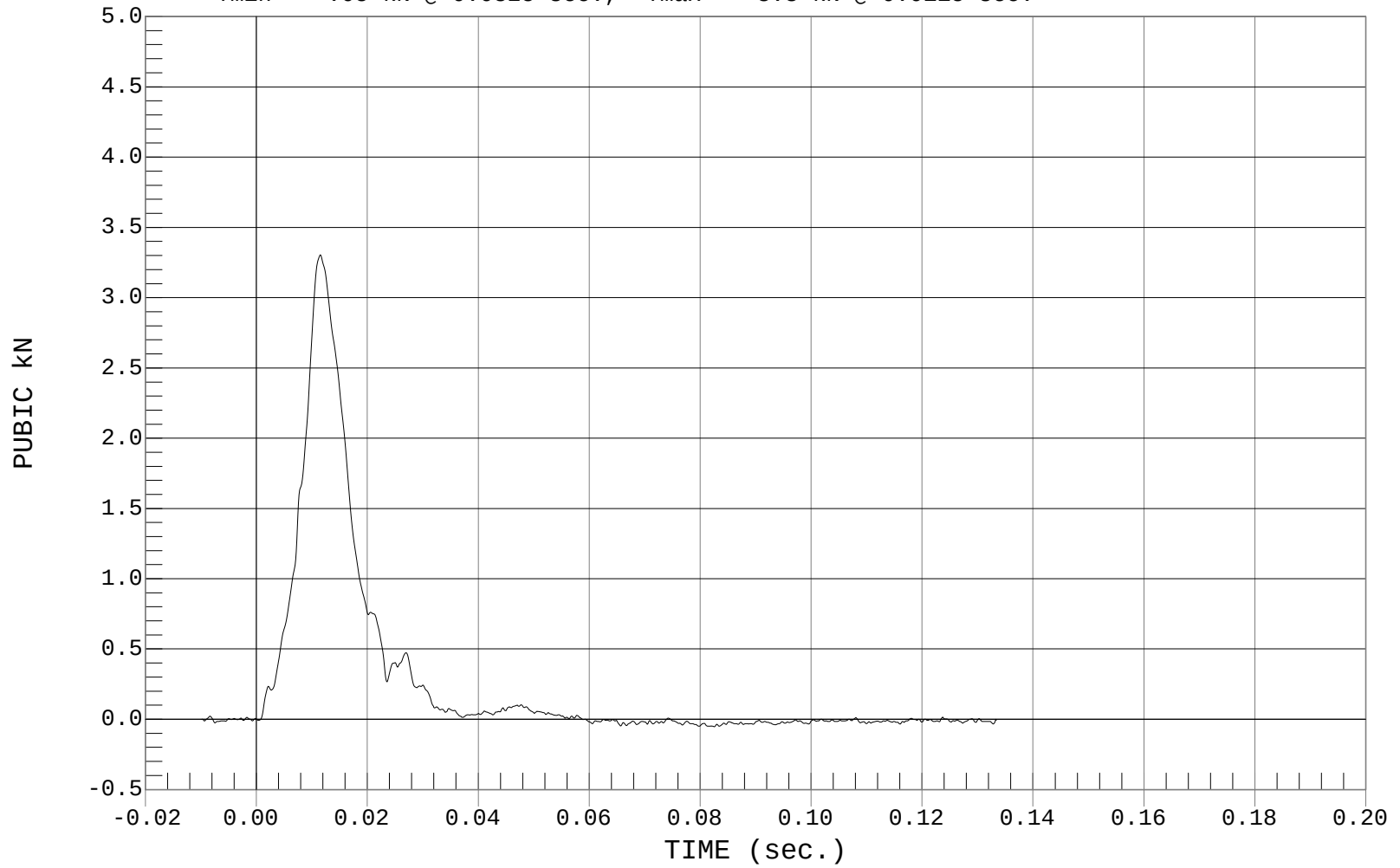
PUBIC FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #010

Test Date: 10-11-01
Speed: 20.61 FT/SEC, 6.28 M/SEC

1 PUBIC, D01459FT.F02

Ymin = -.05 kN @ 0.0825 sec., Ymax = 3.3 kN @ 0.0115 sec.



CERTIFICATION DATA

Dummy Serial Number: 009

Calibration Test Results Summary

Dummy Serial Number: 009

Post-Test Calibration

Head Drop Test:	The head passed all drop test requirements.
Neck Pendulum Test:	The neck passed all impact test requirements.
Shoulder Impact Test:	The shoulder passed all impact test requirements.
Rib Tests:	All ribs passed all impact test requirements.
Abdomen Test:	The abdomen passed all impact test requirements.
Lumbar Spine Test:	The lumbar spine passed all impact test requirements.
Pelvis Test:	The pelvis passed all impact test requirements.

MGA RESEARCH CORPORATION
HEAD DROP TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011481

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.5
Relative Humidity (%)	10 – 70	36
Peak Resultant Acceleration	100 – 150 g's	143
Time of Max. Res. Acceleration		22.6 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



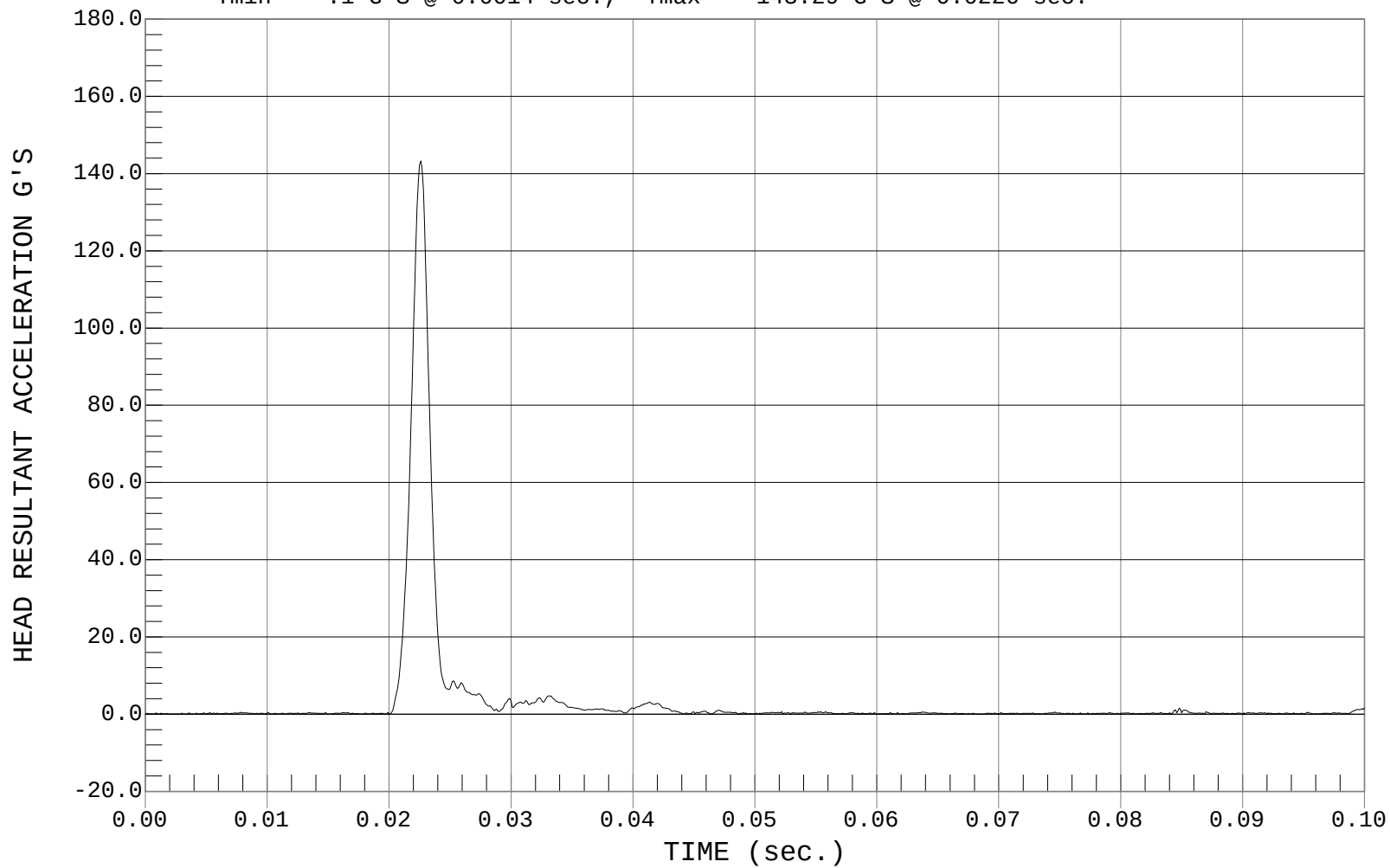
PEAK RESULTANT ACCELERATION

Test Desc.: Dummy Calibration - Head Drop
Component: Dummy #009

Test Date: 10-15-01
Speed: 0.00 FT/SEC, 0.00 M/SEC

— 1 HEAD RESULTANT ACCELERATION, D01481AV.A01

Ymin = .1 G'S @ 0.0014 sec., Ymax = 143.29 G'S @ 0.0226 sec.



MGA RESEARCH CORPORATION
NECK PENDULUM TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011482

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.5
Relative Humidity (%)		10 – 70	36
Pendulum Speed		3.3 - 3.5	3.4
Pendulum Deceleration	3 msec	ˆ.25 - ˆ.53 m/sec	-.33
	8 msec	ˆ1.59 - ˆ2.04 m/sec	-1.70
	14 msec	ˆ3.20 - ˆ3.85 m/sec	-3.34
Maximum Flexion Angle		49.0 – 59.0 deg	57.3
Time of Max. Flexion Angle		54.0 – 66.0 ms	59.3
Maximum Angle Theta (A)		32.0 – 37.0 deg	34.8
Time of Max. Theta (A)		53.0 – 63.0 ms	59.0
Maximum Angle Theta (B)		29.84 – 32.34 deg	30.73
Time of Max. Theta (B)		54.0 – 64.0 ms	59.0

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____

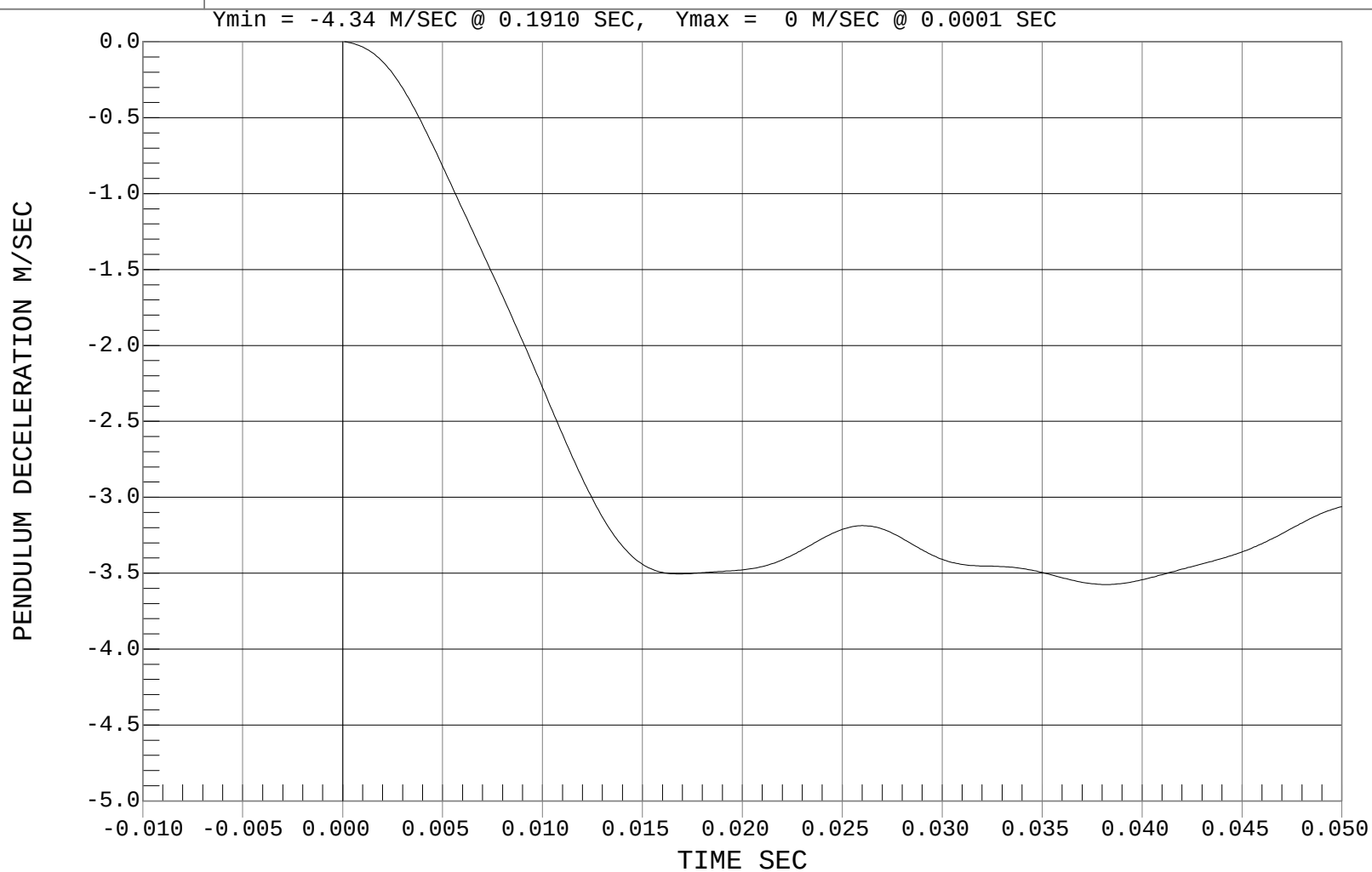


PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-15-01
Speed: 11.28 FT/SEC, 3.44 M/SEC

— 1 PENDULUM DECELERATION, D01482AI.V04





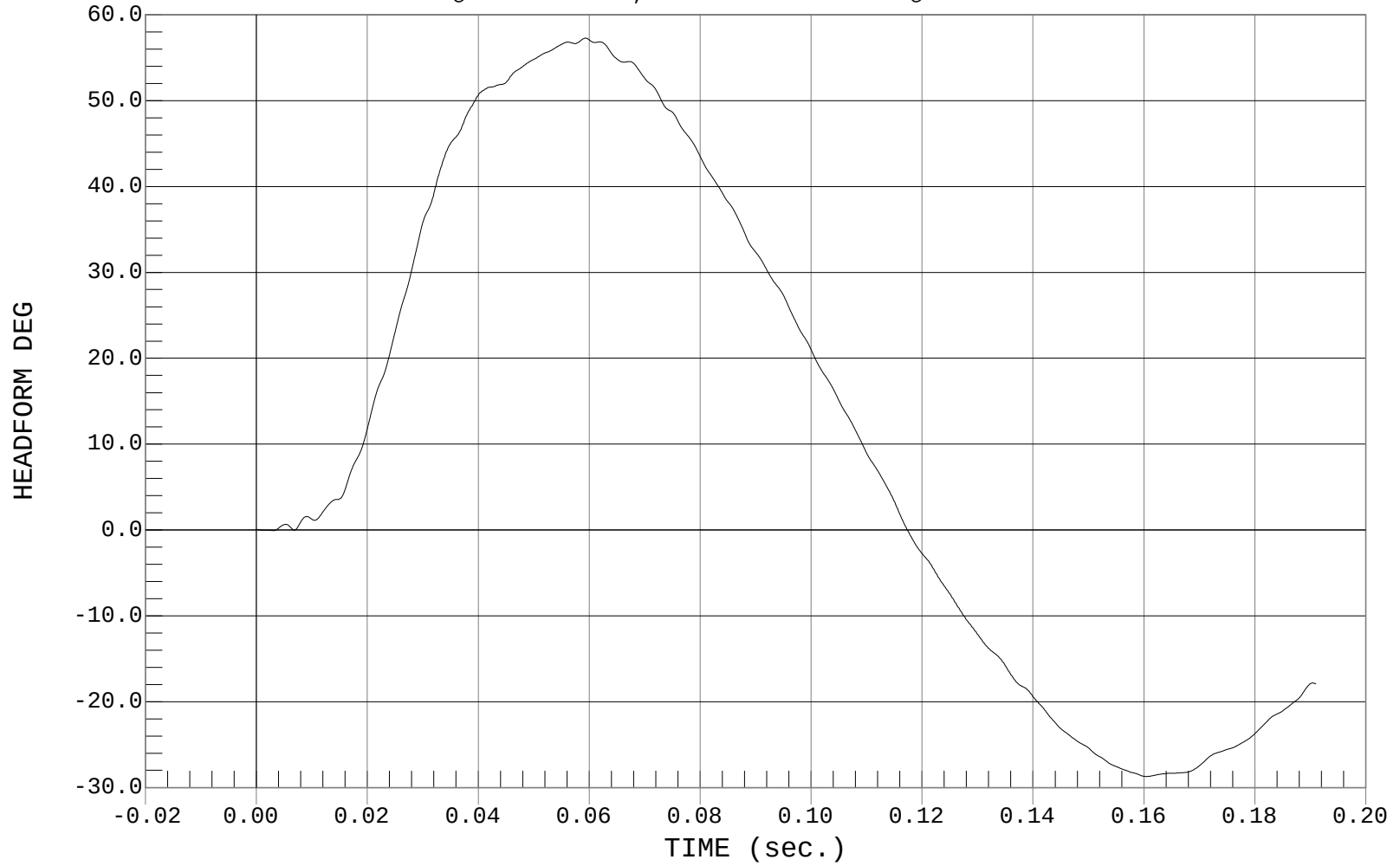
FLEXION ANGLE

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-15-01
Speed: 11.28 FT/SEC, 3.44 M/SEC

— 1 HEADFORM, D01482DT.D08

Ymin = -28.7 DEG @ 0.1604 sec., Ymax = 57.3 DEG @ 0.0593 sec.





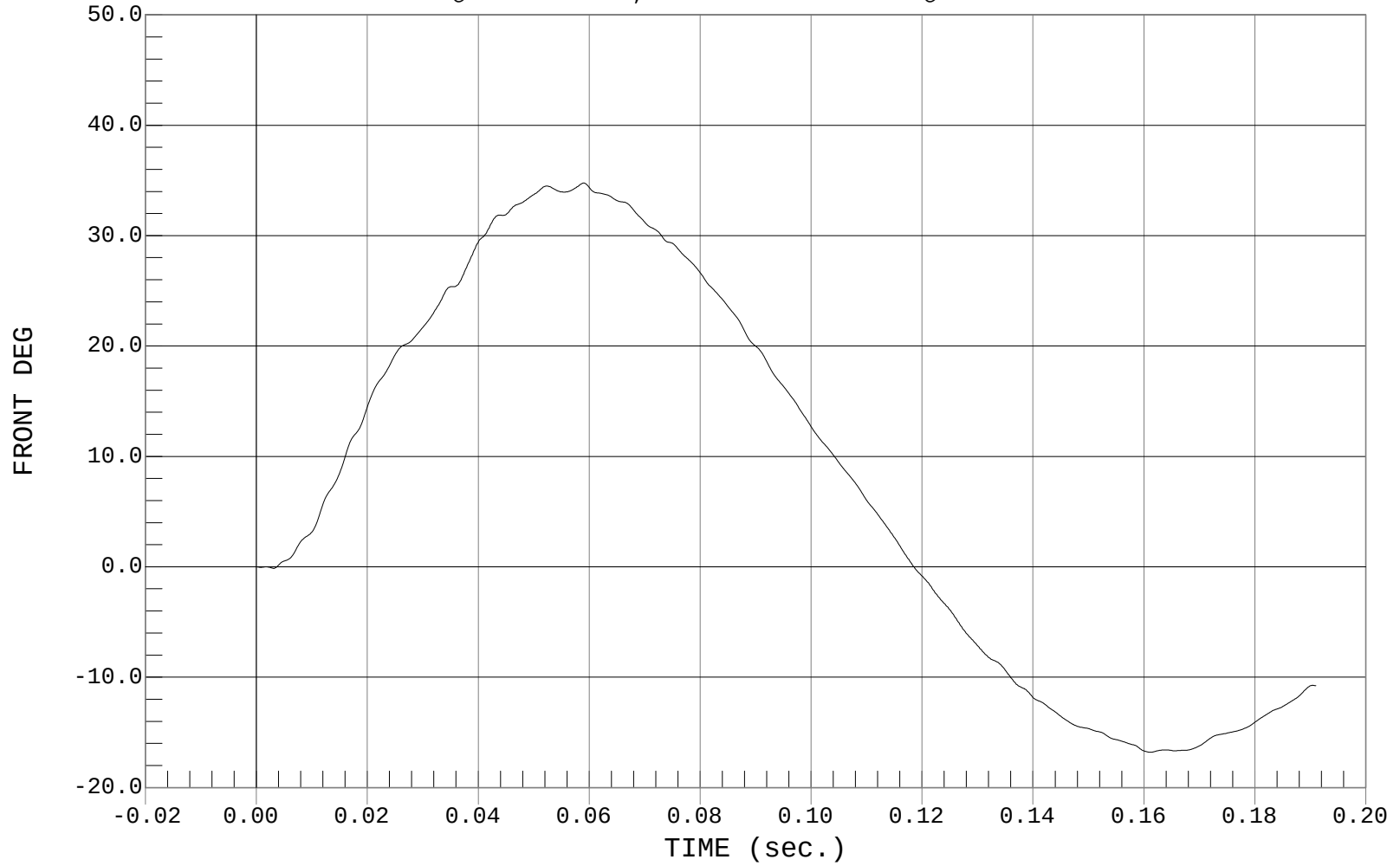
THETA A

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-15-01
Speed: 11.28 FT/SEC, 3.44 M/SEC

— 1 FRONT, D01482DT.D05

Ymin = -16.8 DEG @ 0.1612 sec., Ymax = 34.77 DEG @ 0.0590 sec.





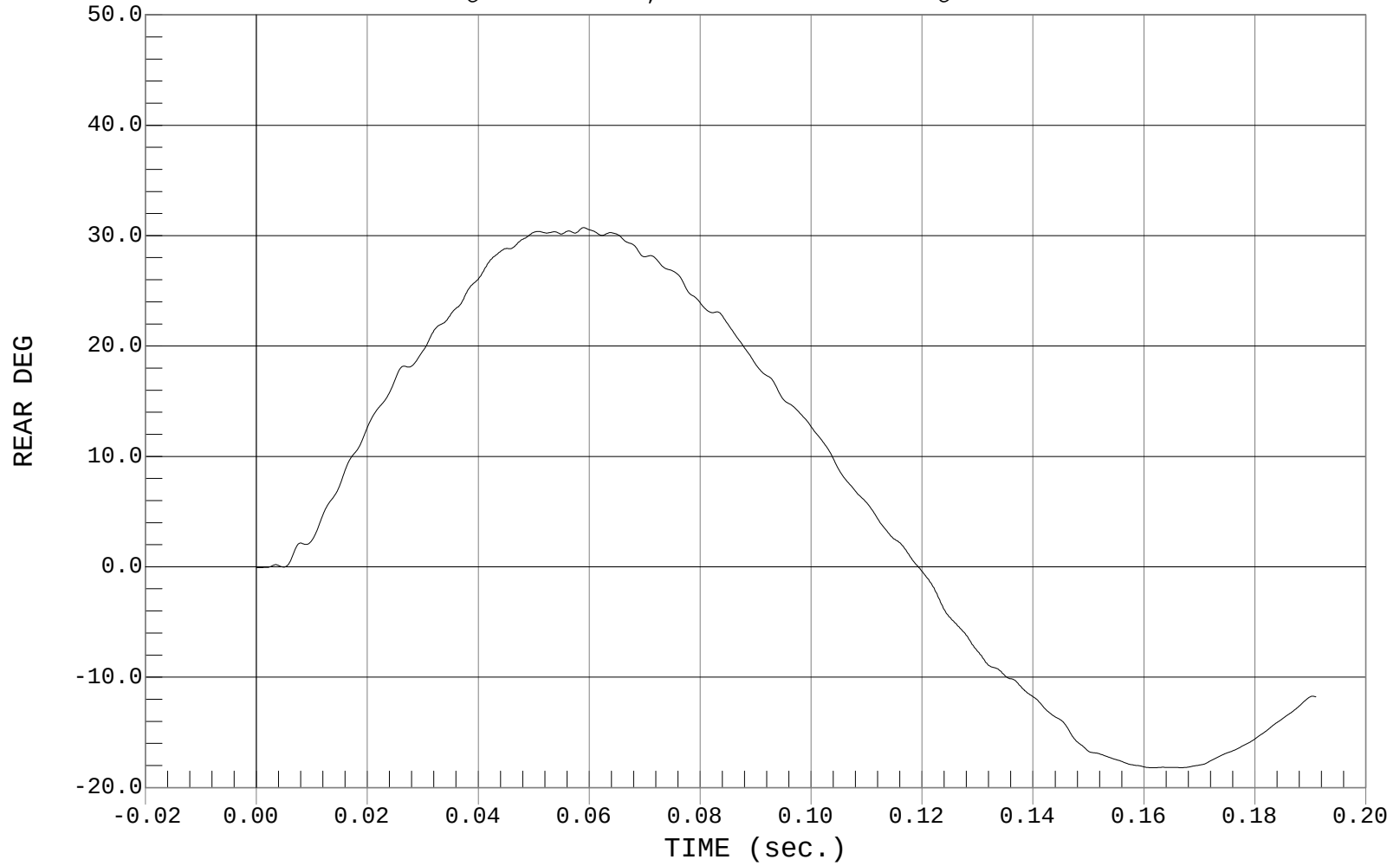
THETA B

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy #009

Test Date: 10-15-01
Speed: 11.28 FT/SEC, 3.44 M/SEC

— 1 REAR, D01482DT.D06

Ymin = -18.21 DEG @ 0.1616 sec., Ymax = 30.73 DEG @ 0.0590 sec.



MGA RESEARCH CORPORATION
SHOULDER IMPACT TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011483

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.2
Relative Humidity (%)	10 – 70	39
Pendulum Speed	4.2 – 4.4 m/s	4.3
Max. Resultant Acceleration	7.5 – 10.5 g's	9.2
Time of Max. Pendulum Acceleration		25.9 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



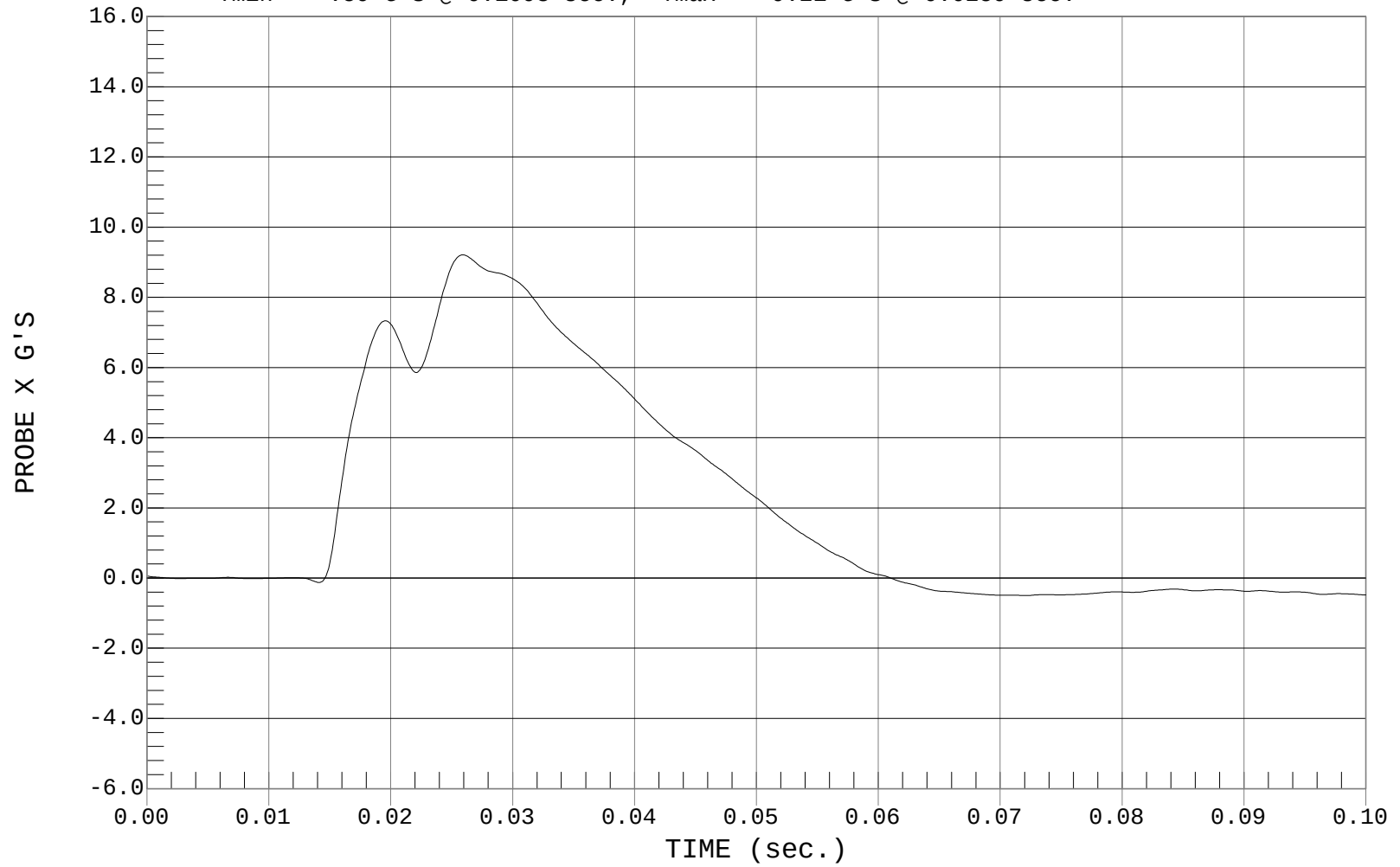
SHOULDER ACCELERATION

Test Desc.: Dummy Calibration - Shoulder Impact
Component: Dummy #009

Test Date: 10-15-01
Speed: 14.15 FT/SEC, 4.31 M/SEC

— 1 PROBE X, D01483AF.A01

Ymin = -.59 G'S @ 0.1093 sec., Ymax = 9.21 G'S @ 0.0259 sec.



MGA RESEARCH CORPORATION
UPPER/MIDDLE/LOWER RIB TESTS
SIDE IMPACT DUMMY (SID)

Date: 10/15/01
Dummy Serial Number: 009
Test Number: D011484/5/6

UPPER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.3
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	26.3
Displacement at 3 m/s	36.0 – 40.0 mm	38.8
Displacement at 4 m/s	46.0 – 51.0 mm	48.7

MIDDLE RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.3
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	26.0
Displacement at 3 m/s	36.0 – 40.0 mm	38.6
Displacement at 4 m/s	46.0 – 51.0 mm	50.0

LOWER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.4
Relative Humidity (%)	10 – 70	36
Displacement at 2 m/s	23.5 – 27.5 mm	26.0
Displacement at 3 m/s	36.0 – 40.0 mm	38.6
Displacement at 4 m/s	46.0 – 51.0 mm	49.9

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



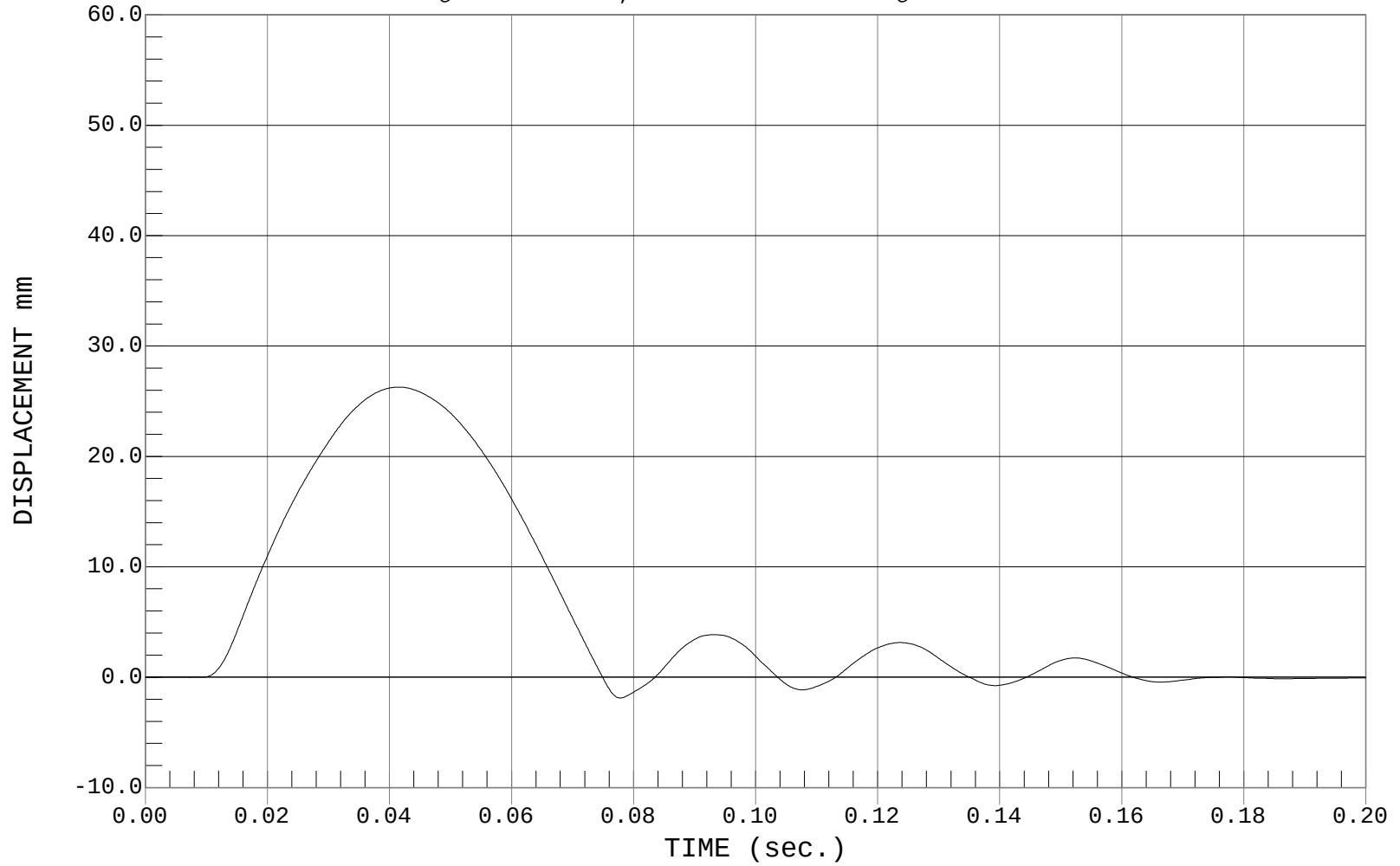
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01484DF.D05

Ymin = -1.89 mm @ 0.0778 sec., Ymax = 26.28 mm @ 0.0416 sec.





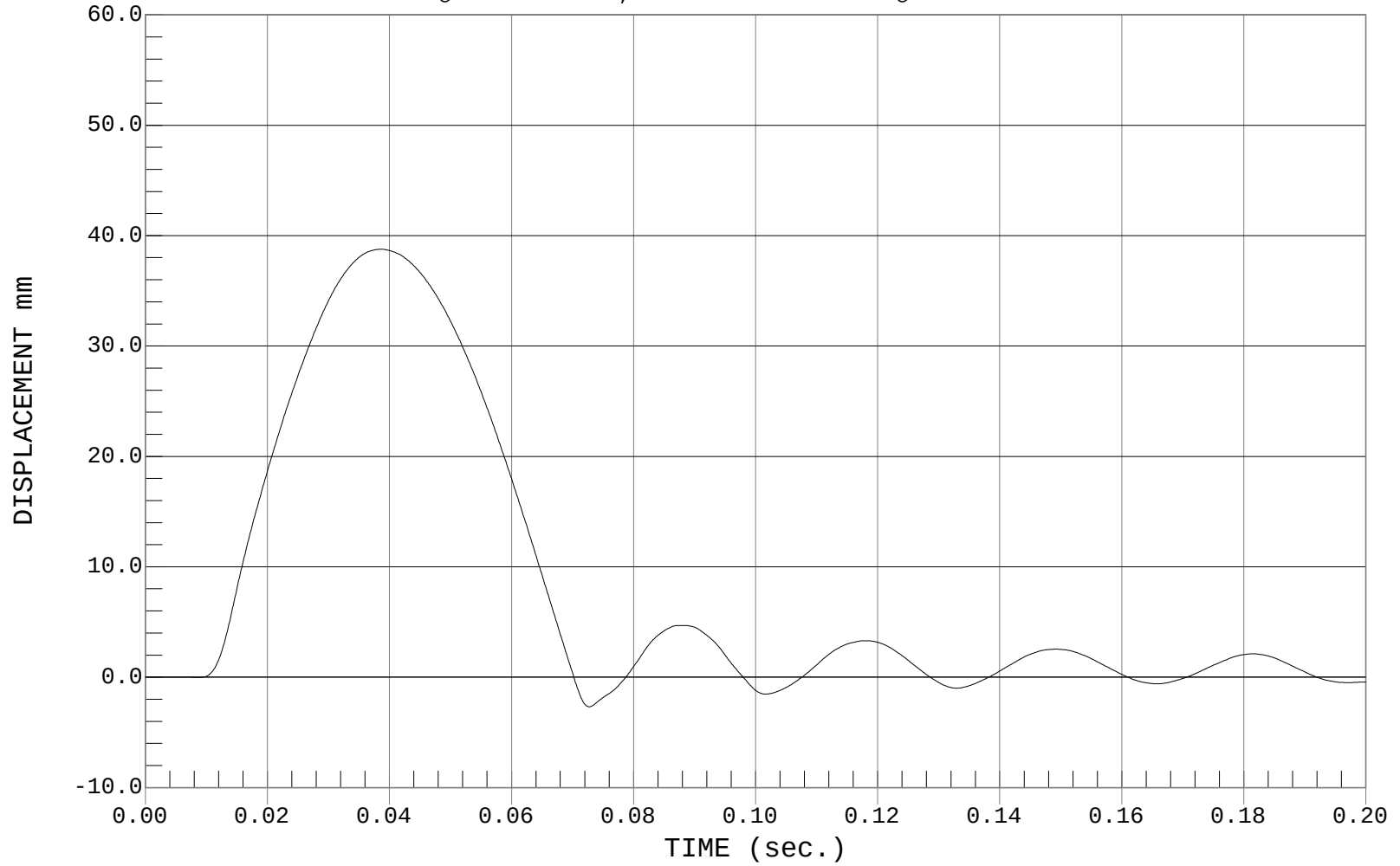
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01484DF.D06

Ymin = -2.68 mm @ 0.0727 sec., Ymax = 38.76 mm @ 0.0386 sec.





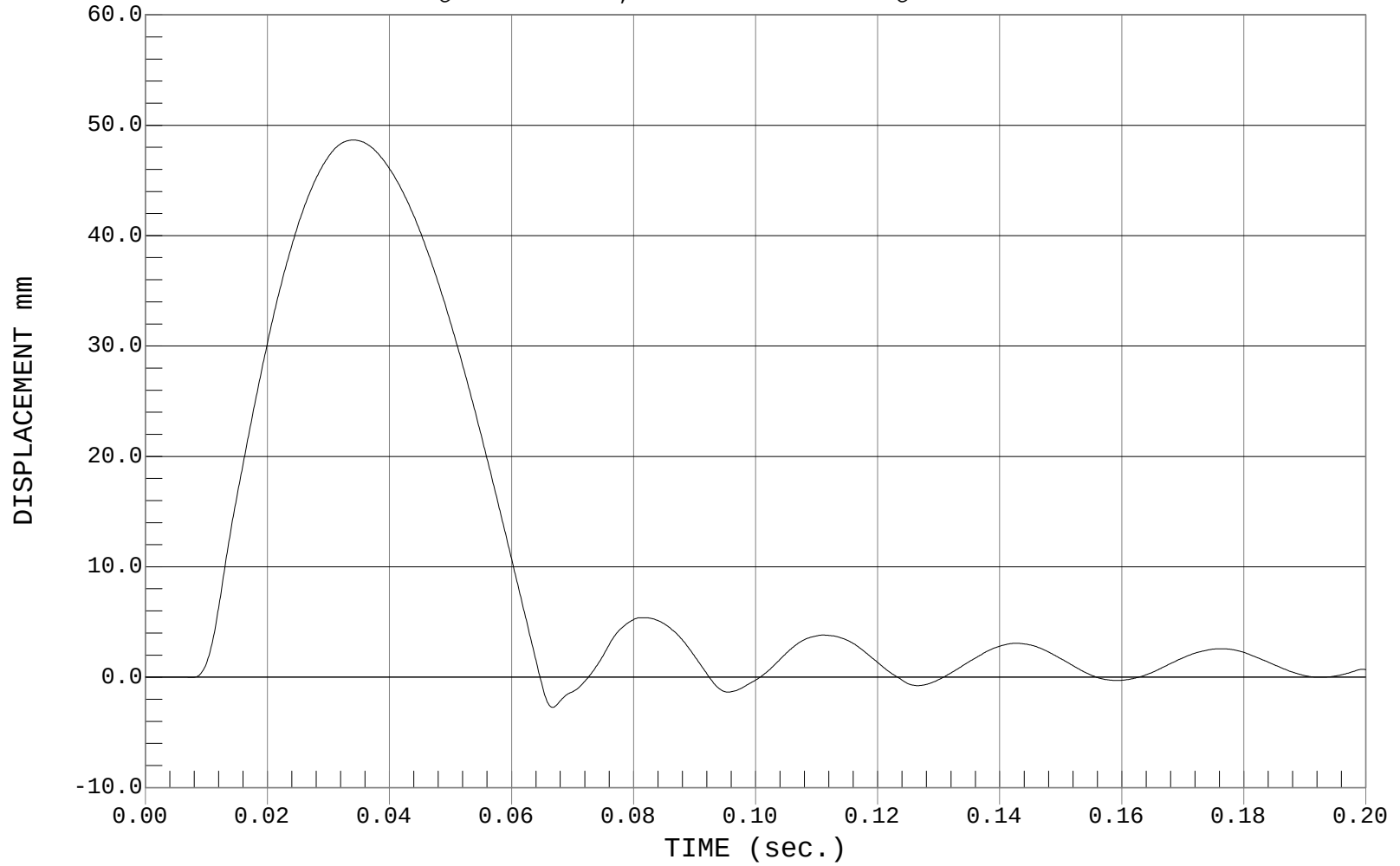
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01484DF.D07

Ymin = -2.74 mm @ 0.0667 sec., Ymax = 48.66 mm @ 0.0341 sec.





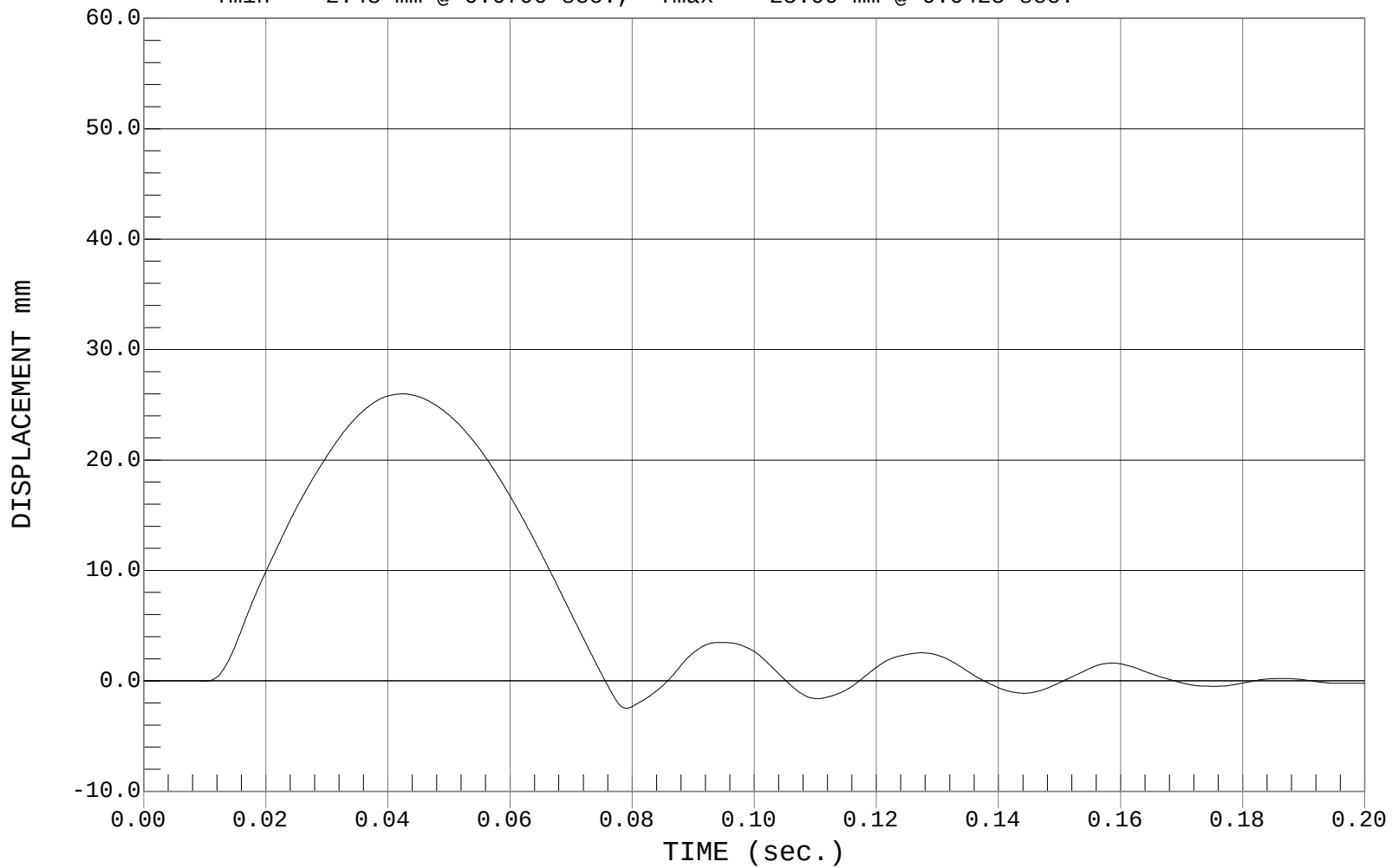
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01485DF.D05

Ymin = -2.48 mm @ 0.0790 sec., Ymax = 25.99 mm @ 0.0425 sec.





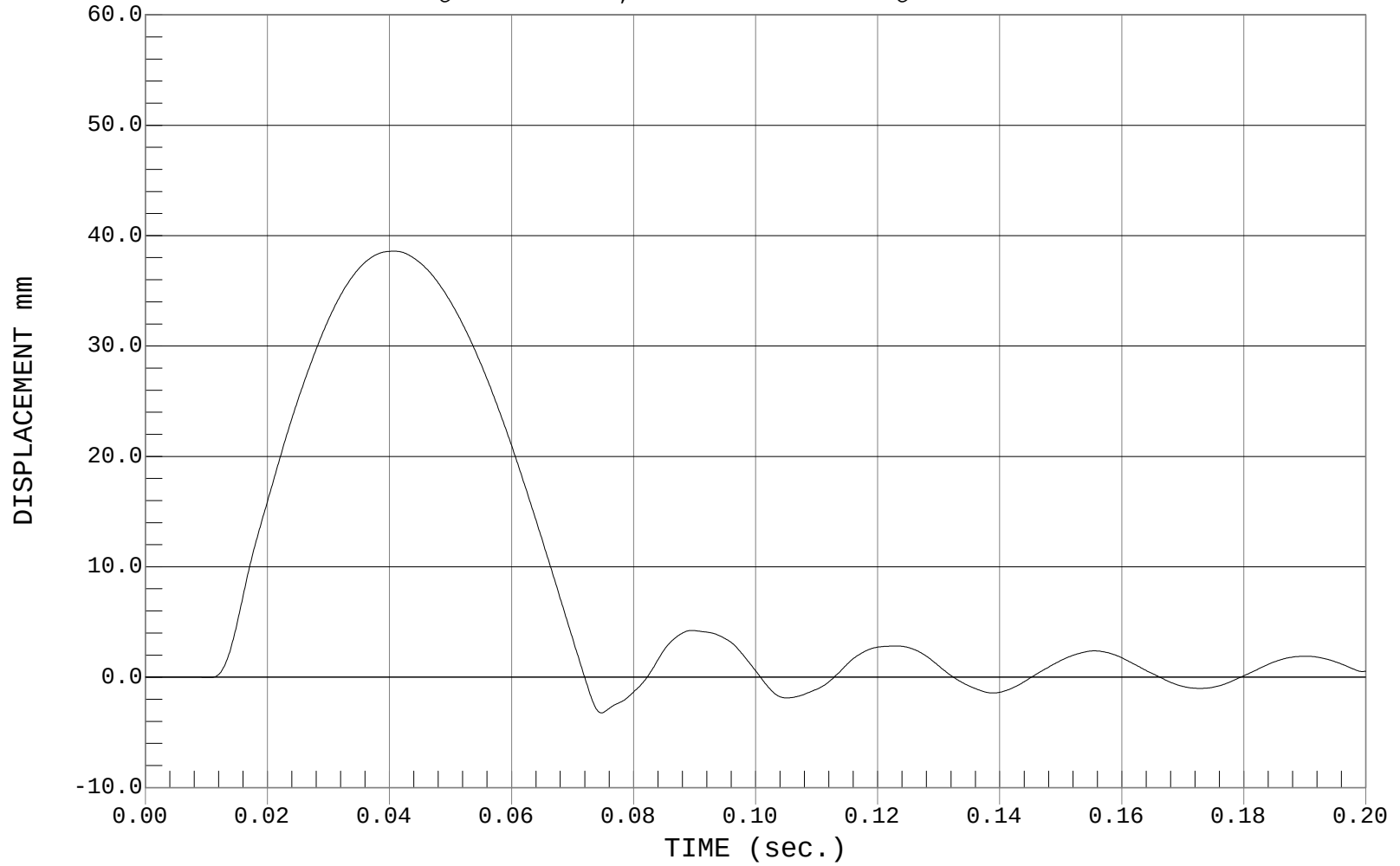
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01485DF.D06

Ymin = -3.23 mm @ 0.0747 sec., Ymax = 38.59 mm @ 0.0408 sec.





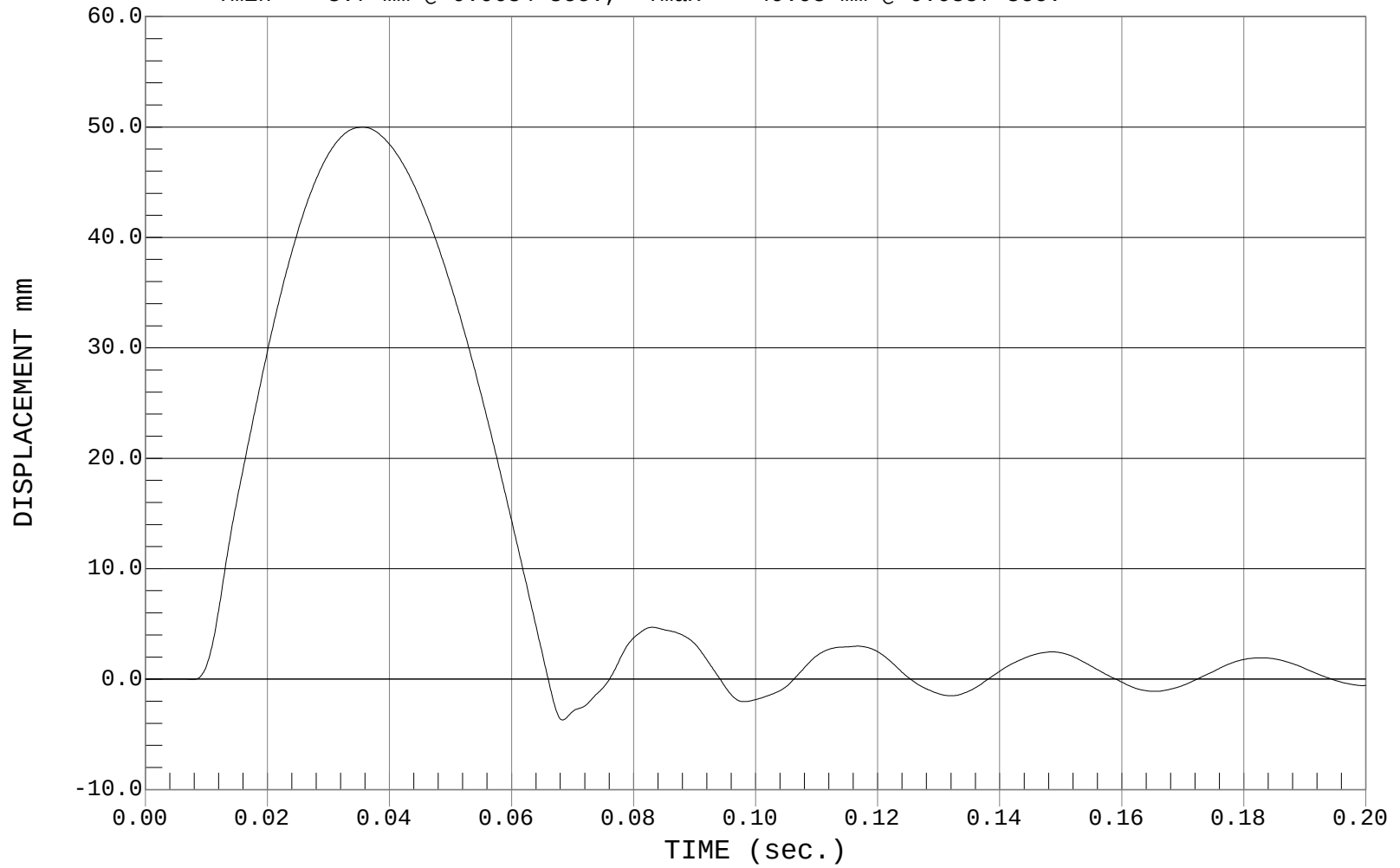
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01485DF.D07

Ymin = -3.7 mm @ 0.0684 sec., Ymax = 49.98 mm @ 0.0357 sec.



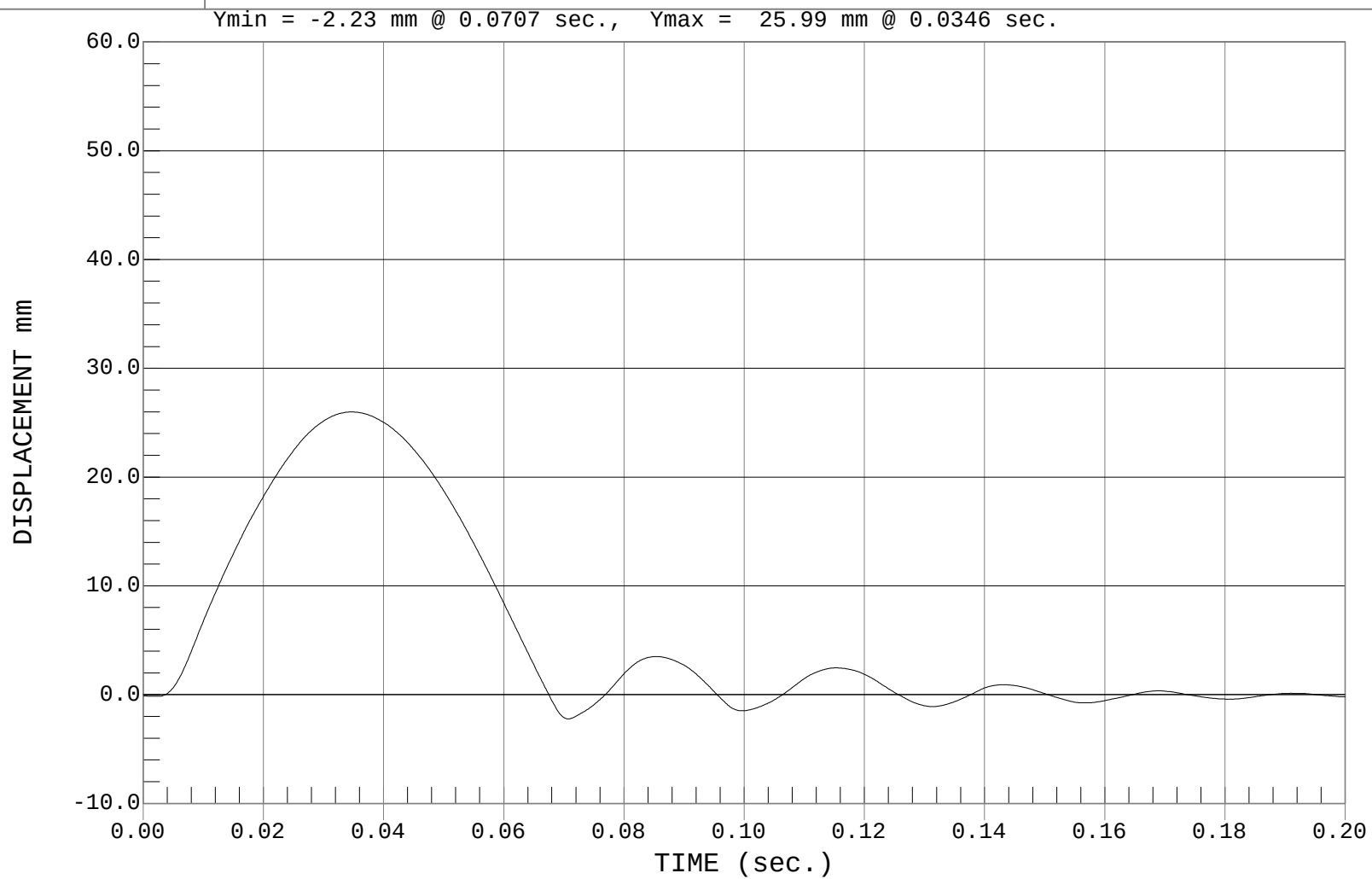


LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01486DF.D05





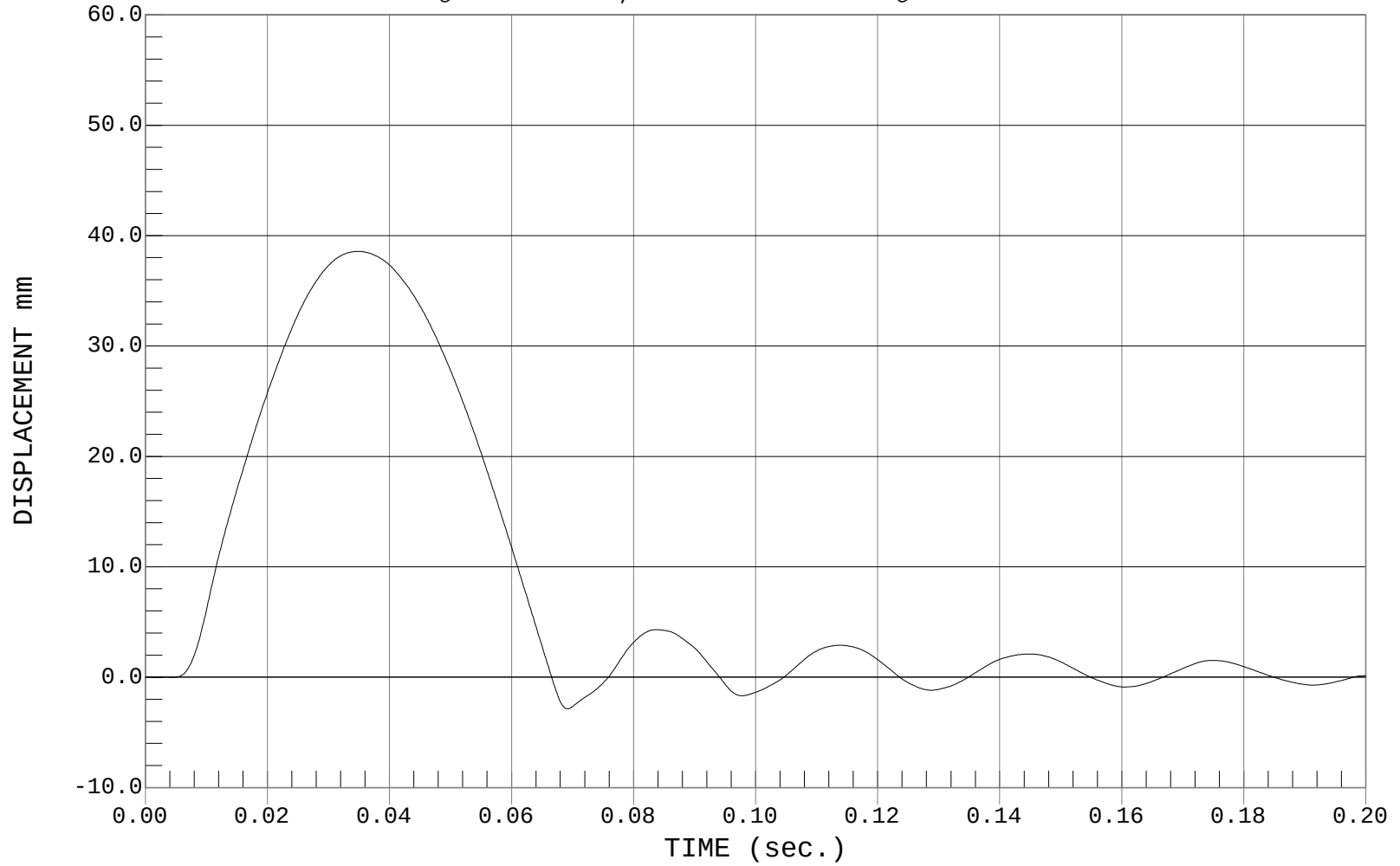
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01486DF.D06

Ymin = -2.87 mm @ 0.0692 sec., Ymax = 38.57 mm @ 0.0349 sec.



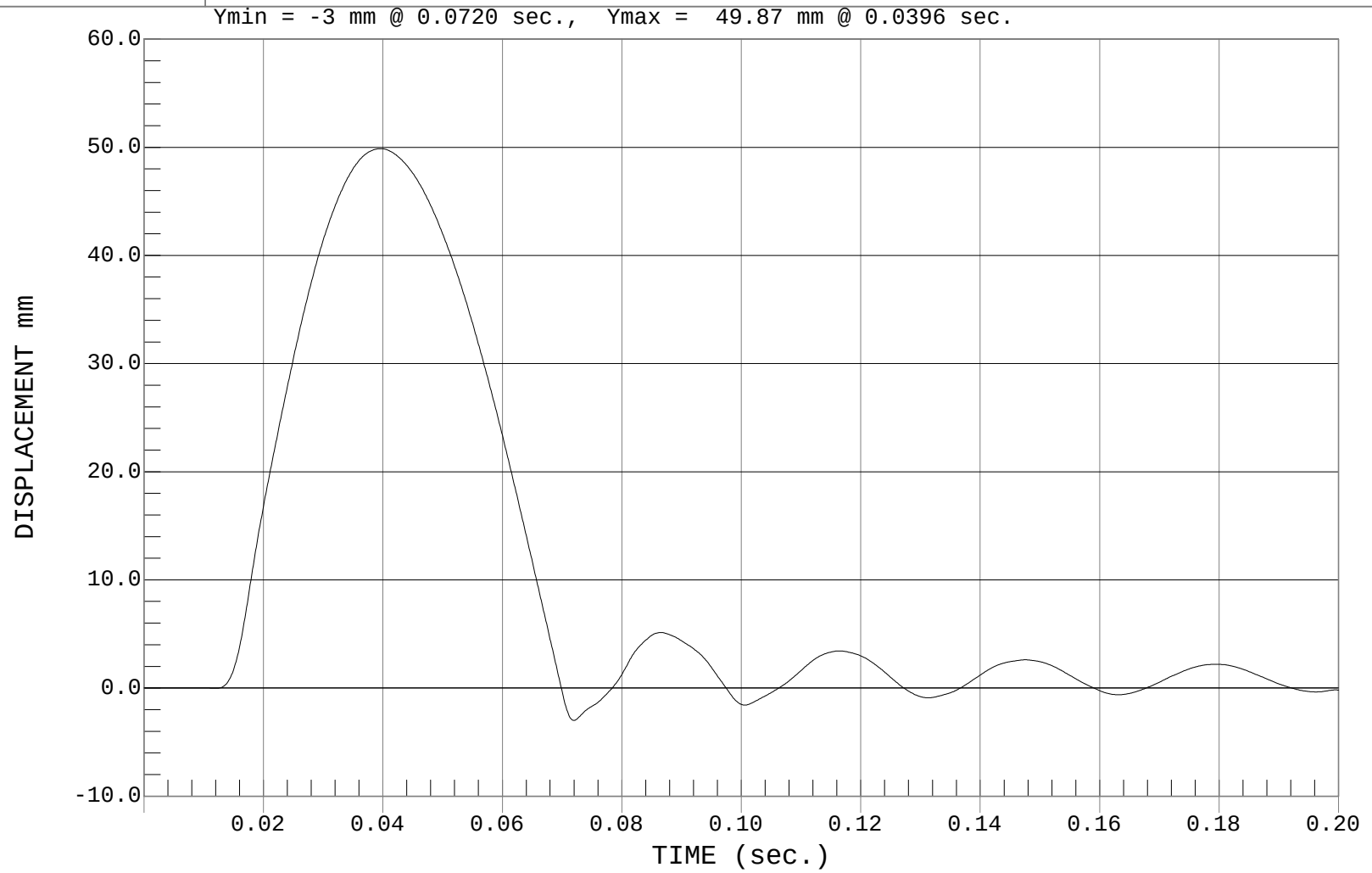


LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy #009

Test Date: 10-15-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01486DF.D07



MGA RESEARCH CORPORATION
ABDOMEN TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011487

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.3
Relative Humidity (%)	10 – 70	39
Probe Speed (m/s)	3.90 – 4.10	3.97
Maximum Impact Force	4.00 – 4.80 kN	4.68
Time of Maximum Force	10.60 – 13.00 ms	11.20
Maximum Total Abdomen Force	2.20 – 2.70 kN	2.29
Time of Max. Total Force	10.00 – 12.30 ms	10.80

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



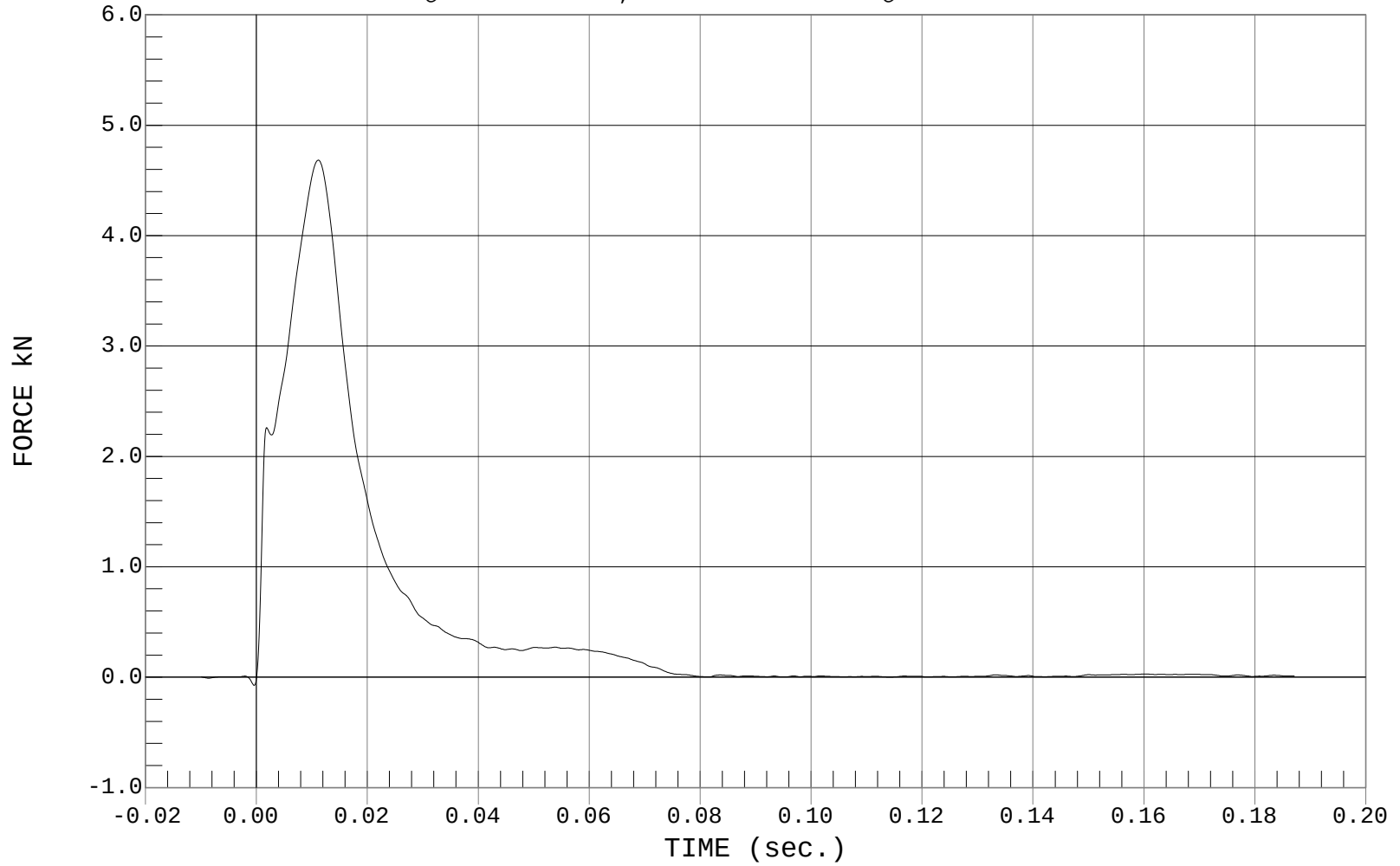
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #009

Test Date: 10-15-01
Speed: 13.02 FT/SEC, 3.97 M/SEC

— 1 FORCE, D01487FT.F01

Ymin = -.07 kN @ -0.0004 sec., Ymax = 4.68 kN @ 0.0112 sec.





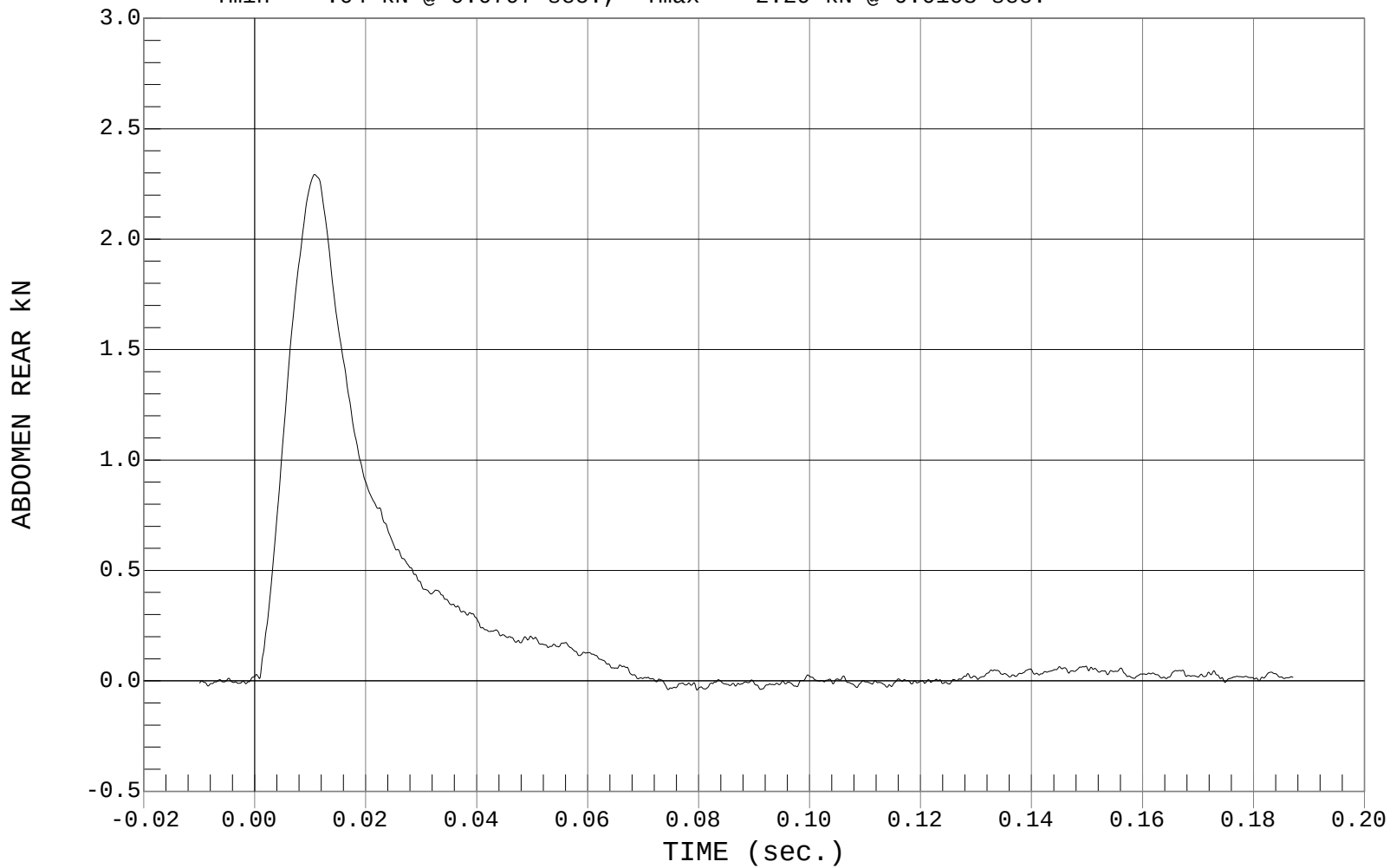
ABDOMEN FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #009

Test Date: 10-15-01
Speed: 13.02 FT/SEC, 3.97 M/SEC

— 1 ABDOMEN REAR, D01487FT.F02

Ymin = -.04 kN @ 0.0797 sec., Ymax = 2.29 kN @ 0.0108 sec.



MGA RESEARCH CORPORATION
LUMBAR SPINE TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011488

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.5
Relative Humidity (%)		10 – 70	36
Pendulum Speed		5.95 – 6.15	6.10
Pendulum Deceleration	10 msec	2.46 - 1.59 m/sec	-2.04
	20 msec	5.25 - 4.07 m/sec	-4.63
	25 msec	6.64 - 5.3 m/sec	-5.77
	30 msec	≥ -6.5 m/sec	-6.2
Maximum Flexion Angle		45.0 – 55.0 deg	50.6
Time of Max. Flexion Angle		39.0 – 53.0 ms	45.1
Maximum Angle Theta (A)		31.0 – 35.0 deg	32.7
Time of Max. Theta (A)		44.0 – 52.0 ms	45.6
Maximum Angle Theta (B)		28.16 – 30.66 deg	28.87
Time of Max. Theta (B)		44.0 – 52.0 ms	47.2

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



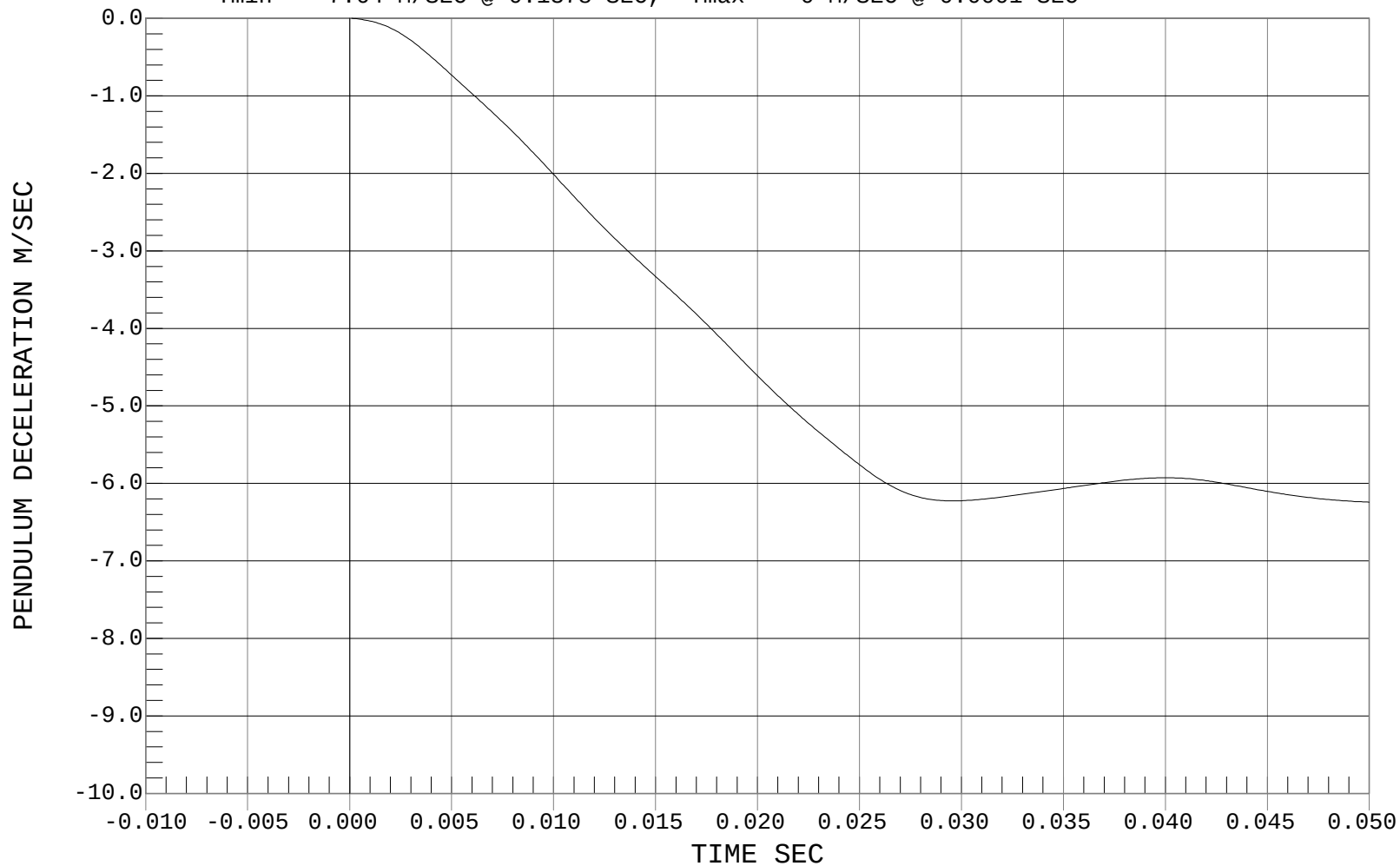
PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.01 FT/SEC, 6.10 M/SEC

— 1 PENDULUM DECELERATION, D01488AI.V04

Ymin = -7.64 M/SEC @ 0.1378 SEC, Ymax = 0 M/SEC @ 0.0001 SEC





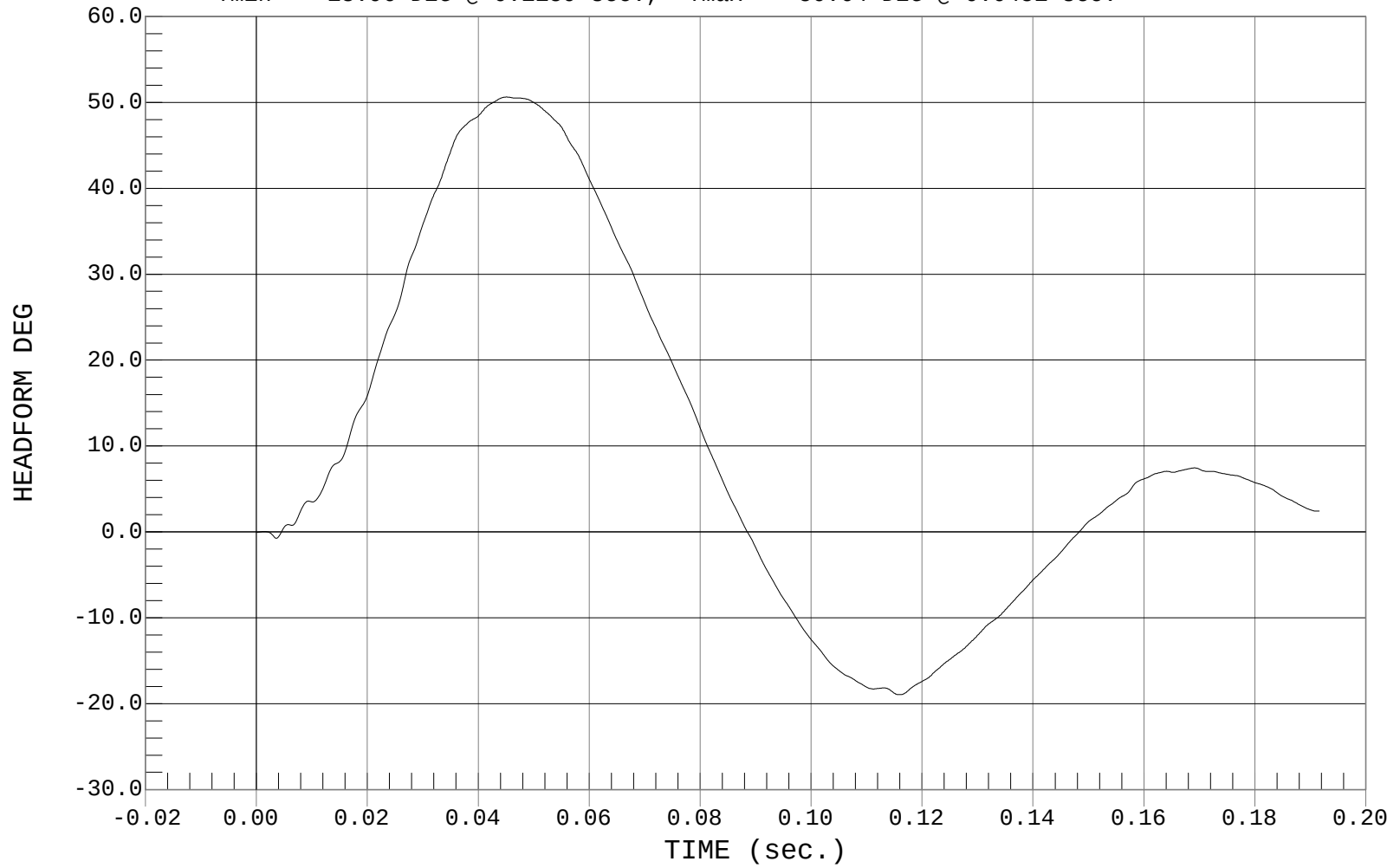
FLEXION ANGLE

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.01 FT/SEC, 6.10 M/SEC

— 1 HEADFORM, D01488DT.D08

Ymin = -18.96 DEG @ 0.1159 sec., Ymax = 50.64 DEG @ 0.0451 sec.





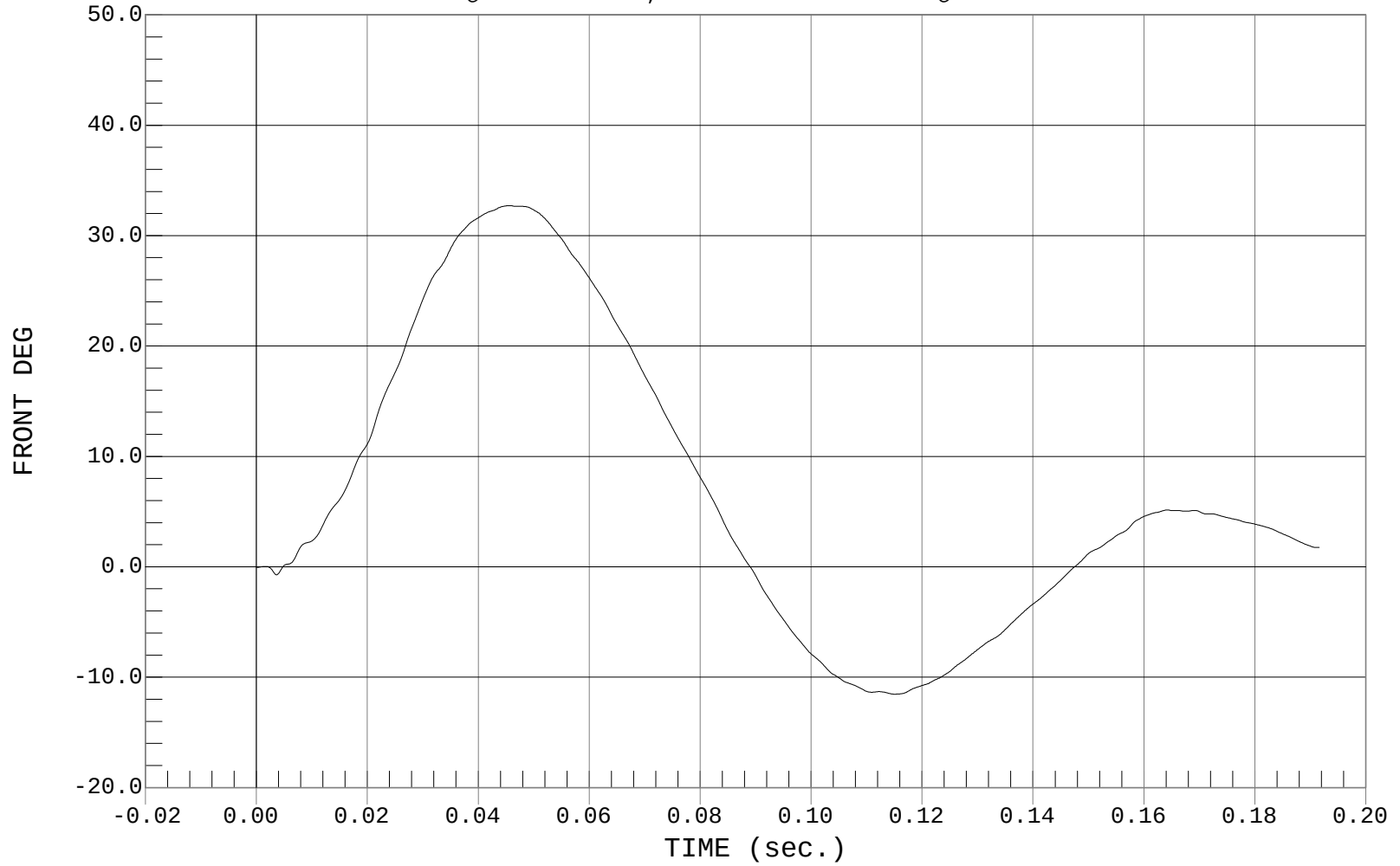
THETA A

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.01 FT/SEC, 6.10 M/SEC

— 1 FRONT, D01488DT.D05

Ymin = -11.55 DEG @ 0.1151 sec., Ymax = 32.72 DEG @ 0.0456 sec.





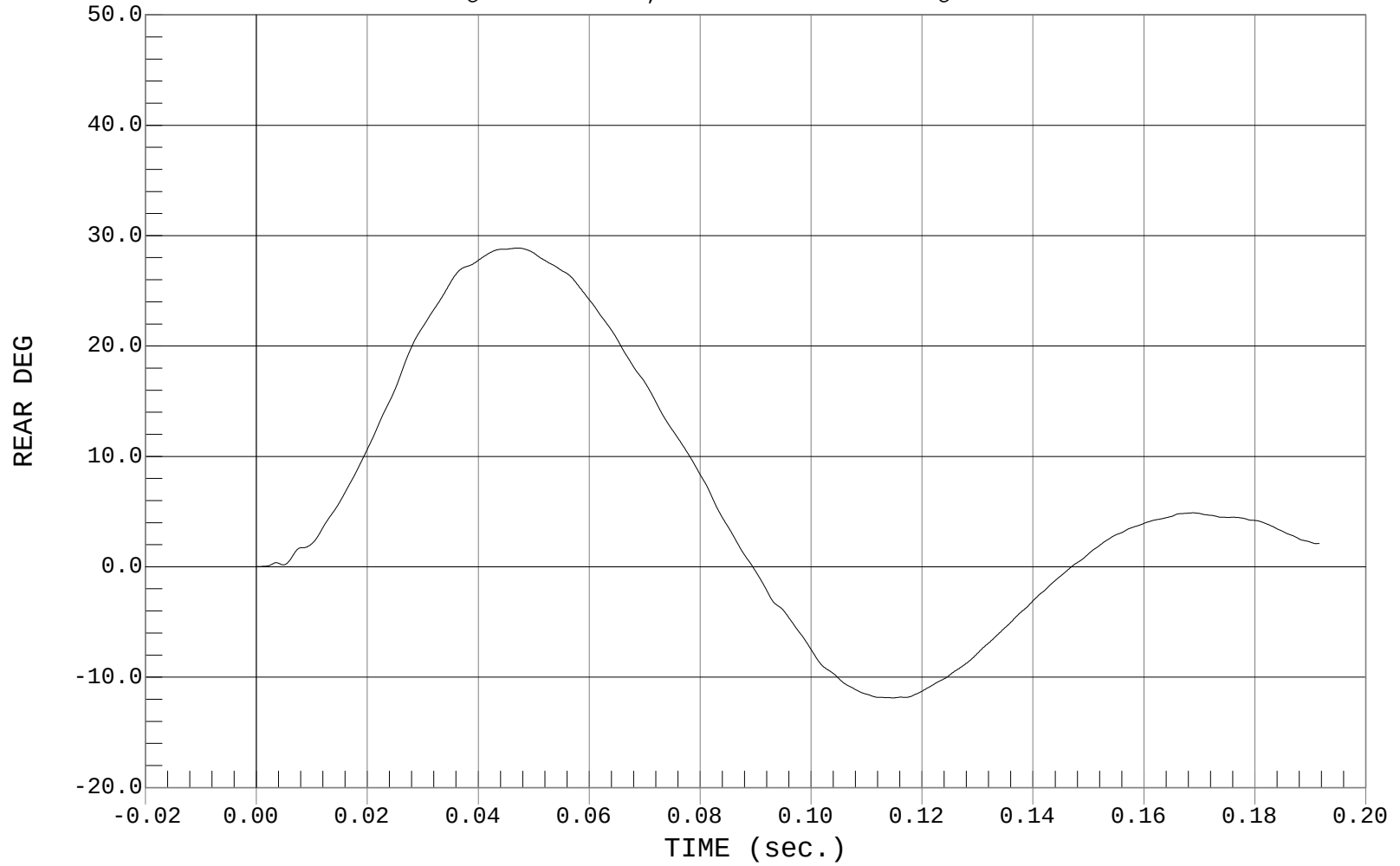
THETA B

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.01 FT/SEC, 6.10 M/SEC

— 1 REAR, D01488DT.D06

Ymin = -11.88 DEG @ 0.1147 sec., Ymax = 28.87 DEG @ 0.0472 sec.



MGA RESEARCH CORPORATION
PELVIS TEST
EUROSID 2 DUMMY

Date: 10/15/01

Dummy Serial Number: 009

Test Number: D011489

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.2
Relative Humidity (%)	10 – 70	39
Pendulum Speed	6.20 – 6.30 m/s	6.25
Maximum Impactor Force	9.80 – 12.20 kN	11.22
Time of Max. Impactor Force	9.50 – 12.50 ms	10.90
Maximum Pubic Force	2.65 – 3.35 kN	3.32
Time of Max. Pubic Force	10.00 – 13.00 ms	11.90

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



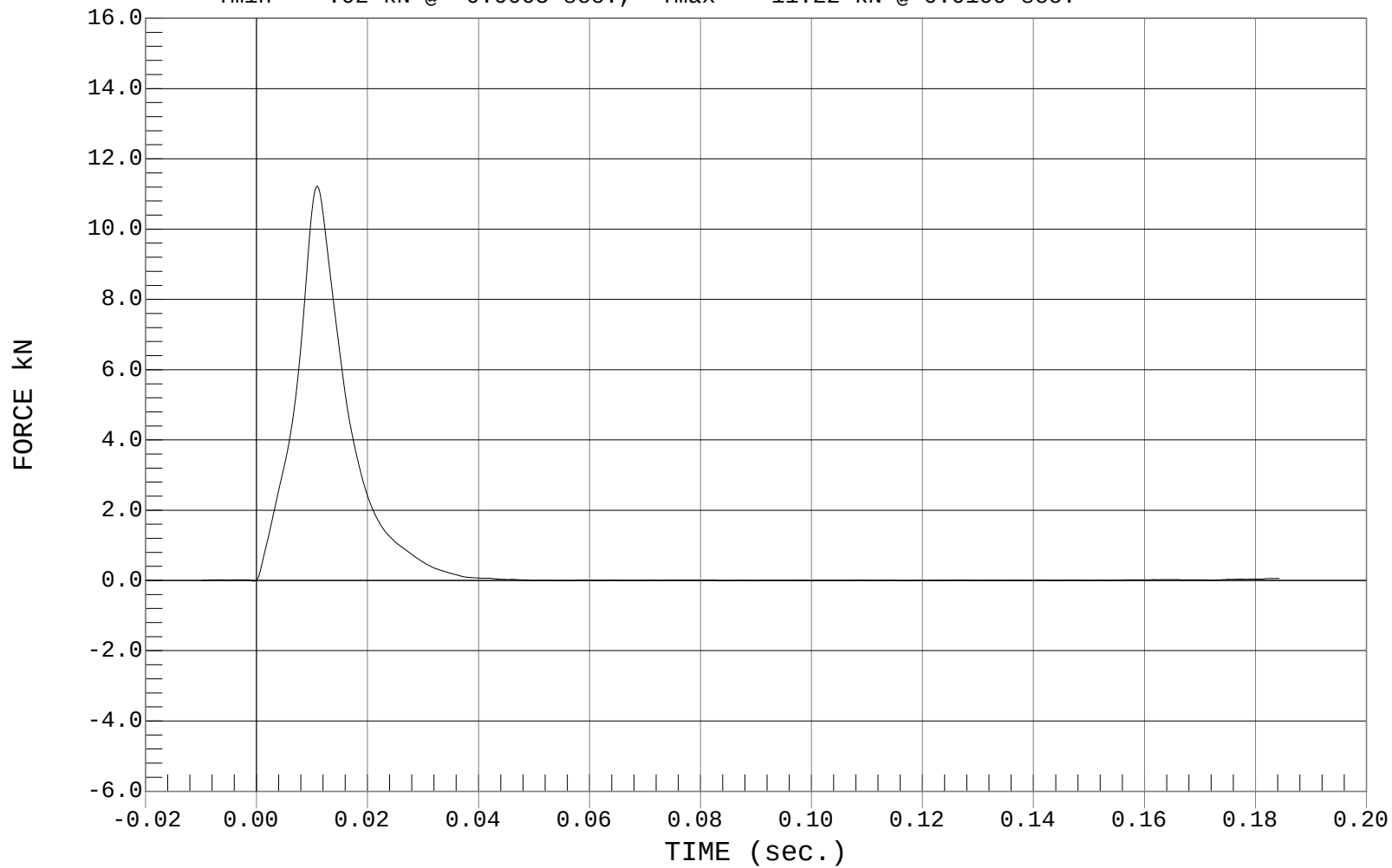
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.52 FT/SEC, 6.25 M/SEC

— 1 FORCE, D01489FT.F01

Ymin = -.02 kN @ -0.0005 sec., Ymax = 11.22 kN @ 0.0109 sec.





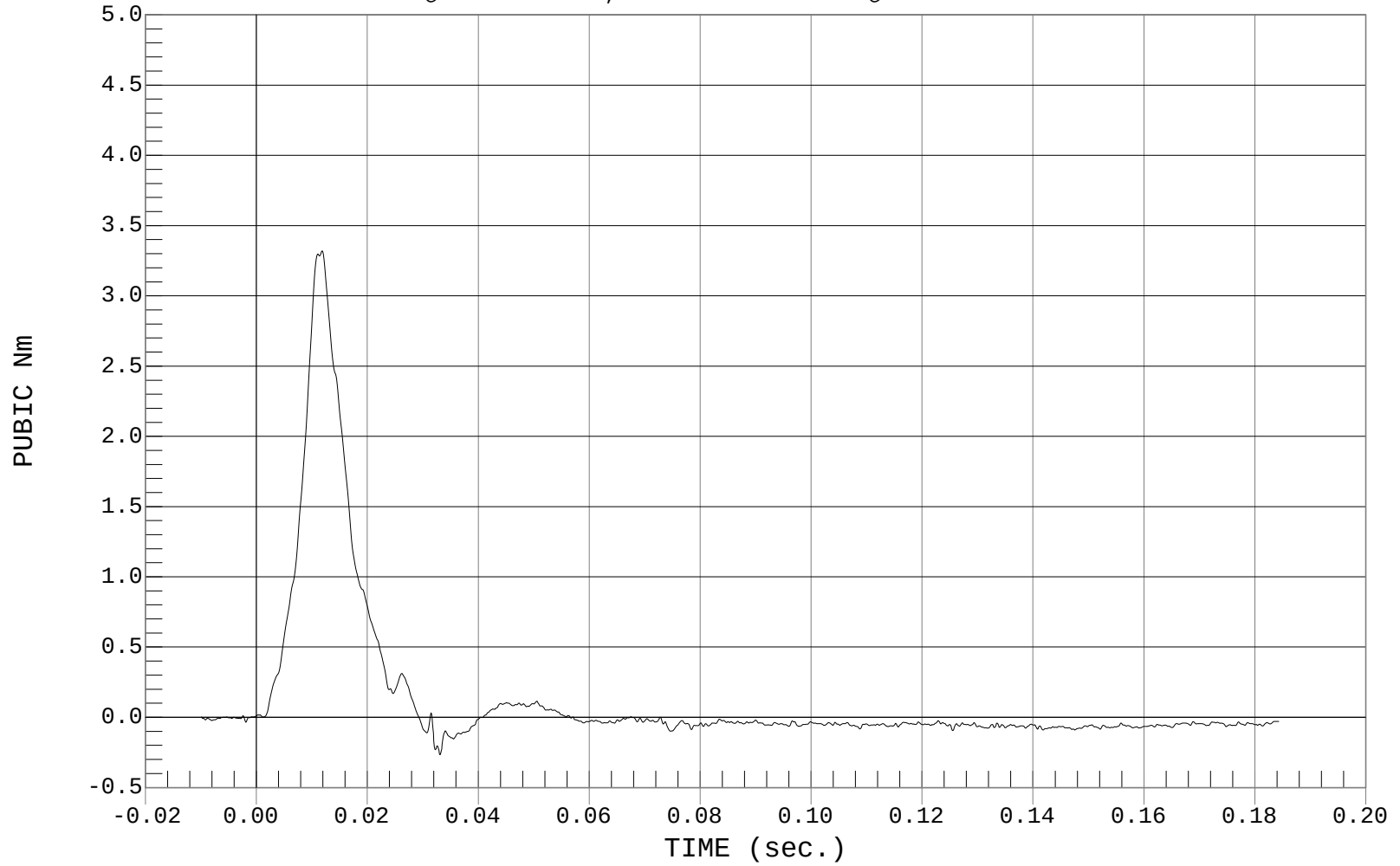
PUBIC FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #009

Test Date: 10-15-01
Speed: 20.52 FT/SEC, 6.25 M/SEC

— 1 PUBIC, D01489FT.F02

Ymin = -.27 Nm @ 0.0331 sec., Ymax = 3.32 Nm @ 0.0119 sec.



CERTIFICATION DATA

Dummy Serial Number: 010

Calibration Test Results Summary

Dummy Serial Number: 010

Post-Test Calibration

Head Drop Test:	The head passed all drop test requirements.
Neck Pendulum Test:	The neck passed all impact test requirements.
Shoulder Impact Test:	The shoulder passed all impact test requirements.
Rib Tests:	All ribs passed all impact test requirements.
Abdomen Test:	The abdomen passed all impact test requirements.
Lumbar Spine Test:	The lumbar spine passed all impact test requirements.
Pelvis Test:	The pelvis passed all impact test requirements.

MGA RESEARCH CORPORATION
HEAD DROP TEST
EUROSID 2 DUMMY

Date: 10/17/01

Dummy Serial Number: 010

Test Number: D011501

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.3
Relative Humidity (%)	10 – 70	29
Peak Resultant Acceleration	100 – 150 g's	141
Time of Max. Res. Acceleration		24.8 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



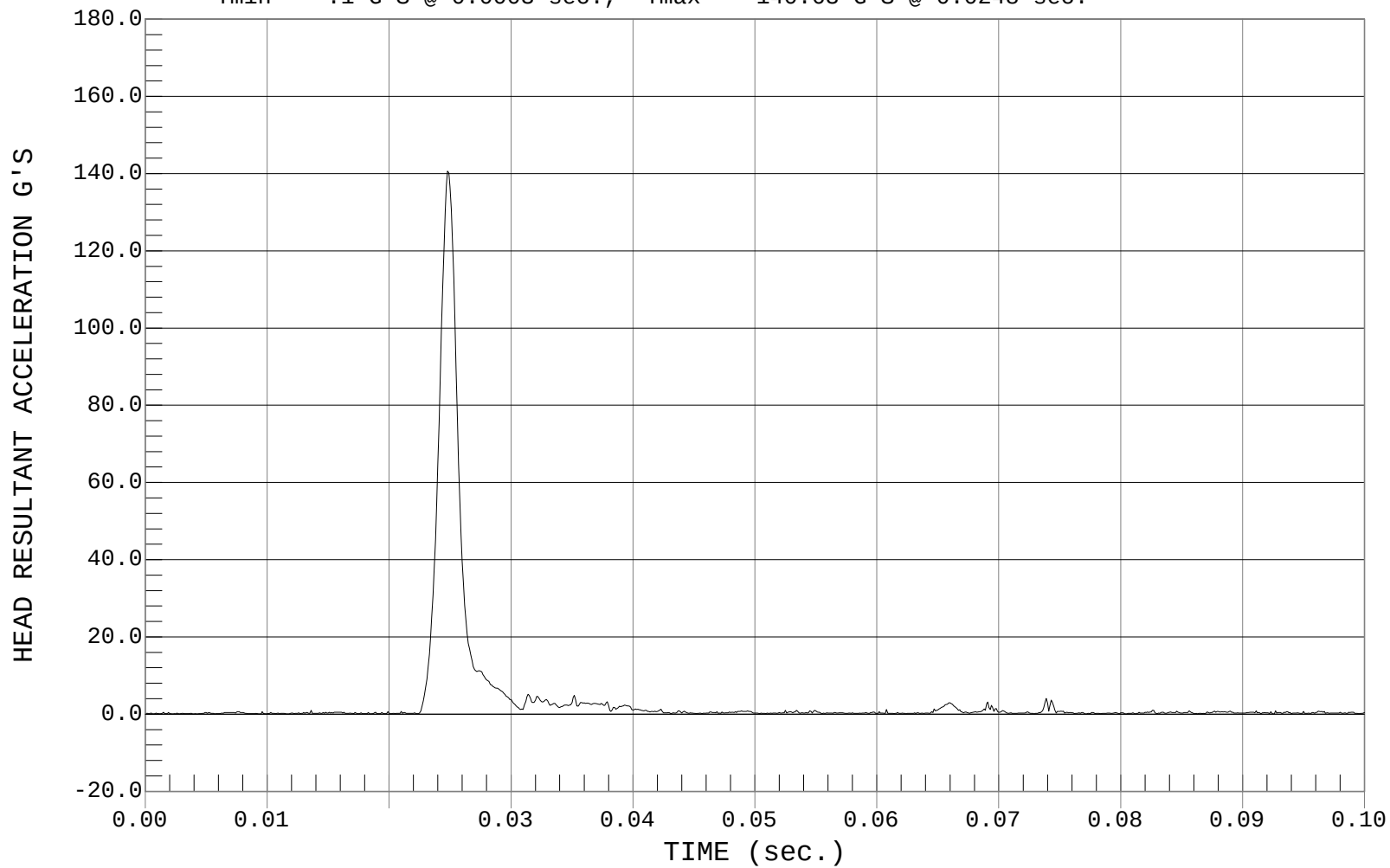
PEAK RESULTANT ACCELERATION

Test Desc.: Dummy Calibration - Head Drop
Component: Dummy # 010

Test Date: 10-17-01
Speed: 0.00 FT/SEC, 0.00 M/SEC

— 1 HEAD RESULTANT ACCELERATION, D01501AV.A01

Ymin = .1 G'S @ 0.0003 sec., Ymax = 140.63 G'S @ 0.0248 sec.



MGA RESEARCH CORPORATION
NECK PENDULUM TEST
EUROSID 2 DUMMY

Date: 10/18/01

Dummy Serial Number: 010

Test Number: D011502

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.4
Relative Humidity (%)		10 – 70	29
Pendulum Speed		3.3 - 3.5	3.4
Pendulum Deceleration	3 msec	1.25 - 1.53 m/sec	-.35
	8 msec	1.59 - 2.04 m/sec	-1.71
	14 msec	3.20 - 3.85 m/sec	-3.35
Maximum Flexion Angle		49.0 – 59.0 deg	58.6
Time of Max. Flexion Angle		54.0 – 66.0 ms	59.1
Maximum Angle Theta (A)		32.0 – 37.0 deg	35.3
Time of Max. Theta (A)		53.0 – 63.0 ms	58.9
Maximum Angle Theta (B)		30.34 – 32.84 deg	30.99
Time of Max. Theta (B)		54.0 – 64.0 ms	59.7

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



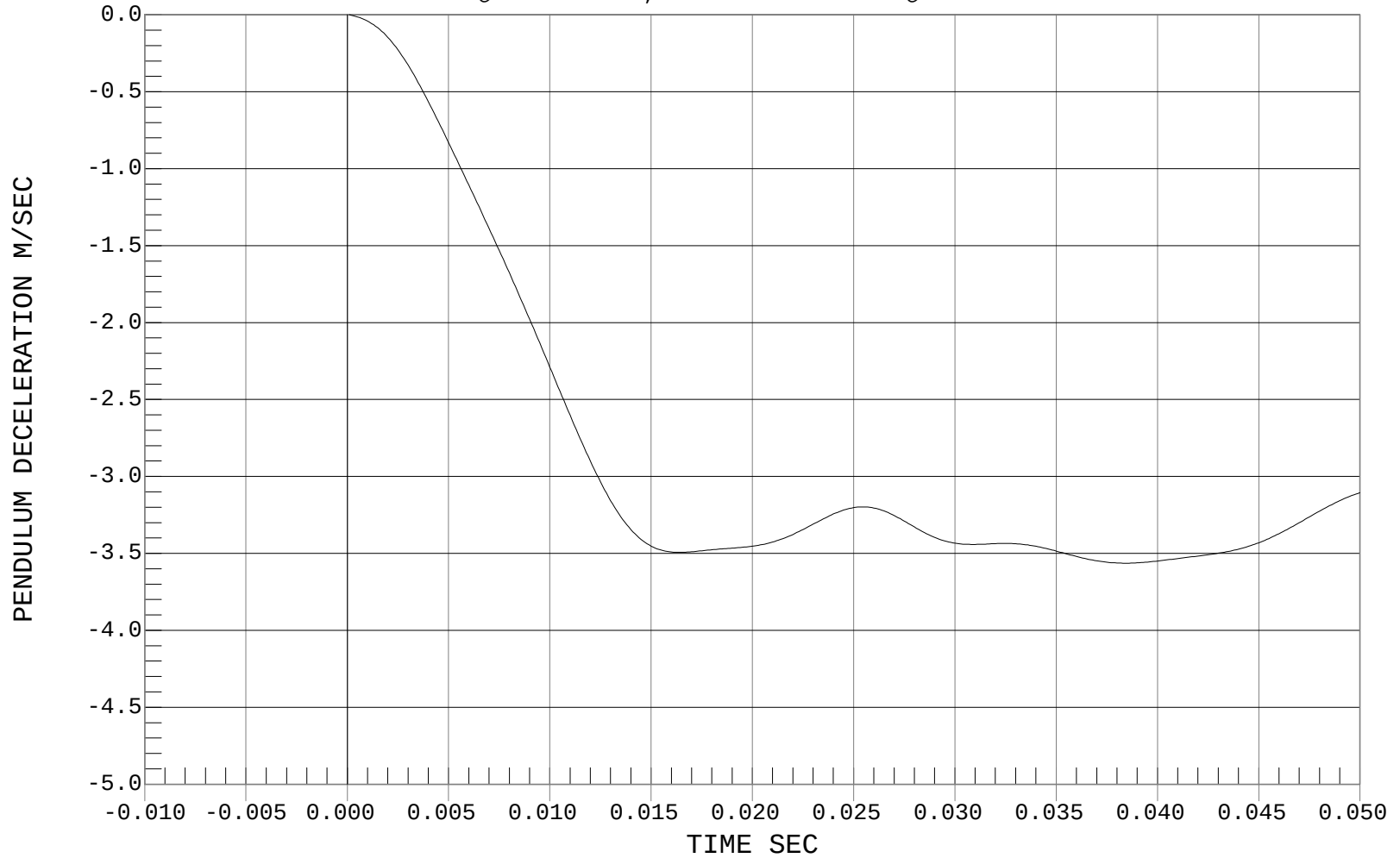
PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy # 010

Test Date: 10-18-01
Speed: 11.04 FT/SEC, 3.36 M/SEC

— 1 PENDULUM DECELERATION, D01502AI.V04

Ymin = -4.47 M/SEC @ 0.01916 SEC, Ymax = 0 M/SEC @ 0.0001 SEC





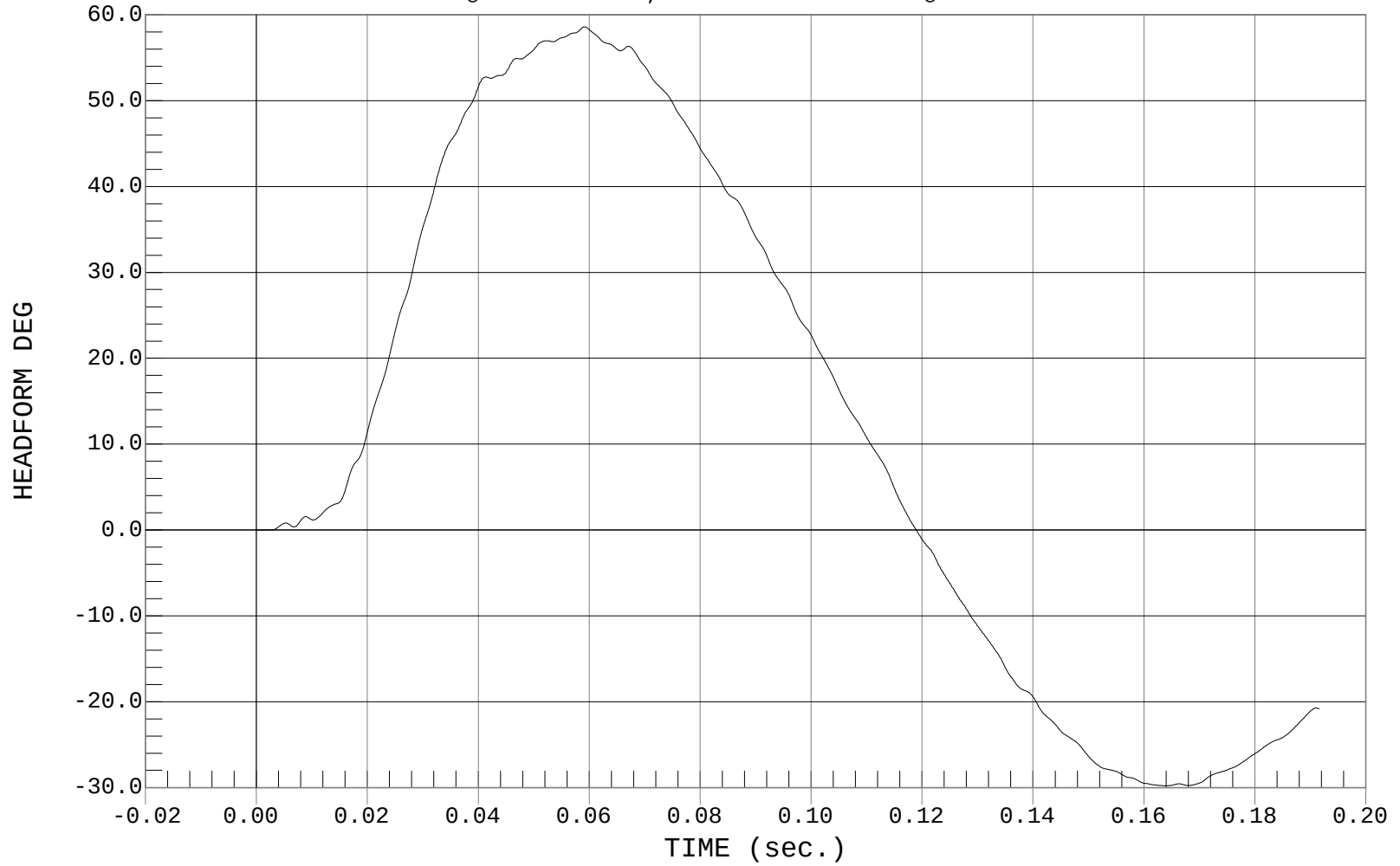
FLEXION ANGLE

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy # 010

Test Date: 10-18-01
Speed: 11.04 FT/SEC, 3.36 M/SEC

— 1 HEADFORM, D01502DT.D08

Ymin = -29.79 DEG @ 0.1638 sec., Ymax = 58.6 DEG @ 0.0591 sec.





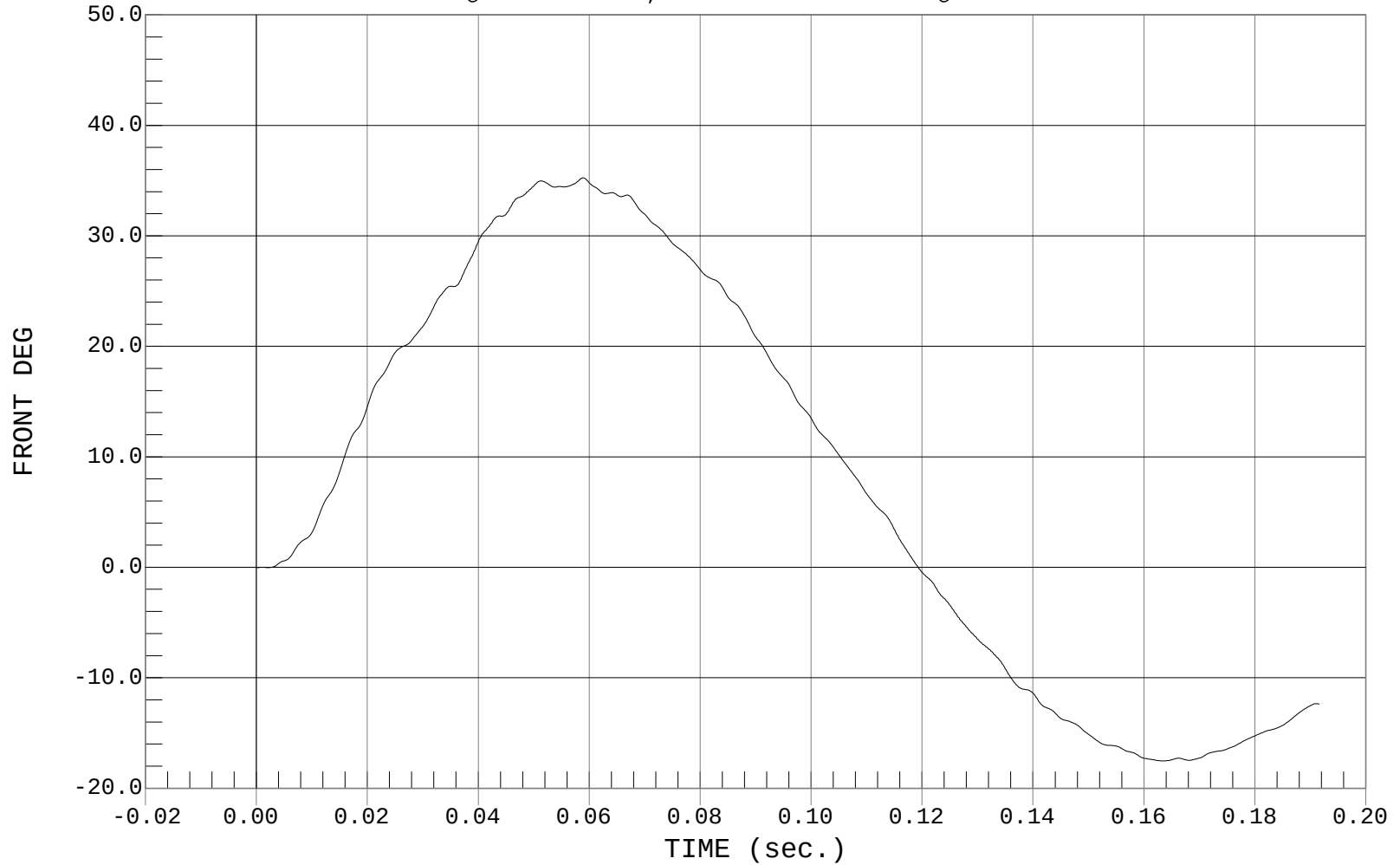
THETA A

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy # 010

Test Date: 10-18-01
Speed: 11.04 FT/SEC, 3.36 M/SEC

— 1 FRONT, D01502DT.D05

Ymin = -17.53 DEG @ 0.1635 sec., Ymax = 35.25 DEG @ 0.0589 sec.





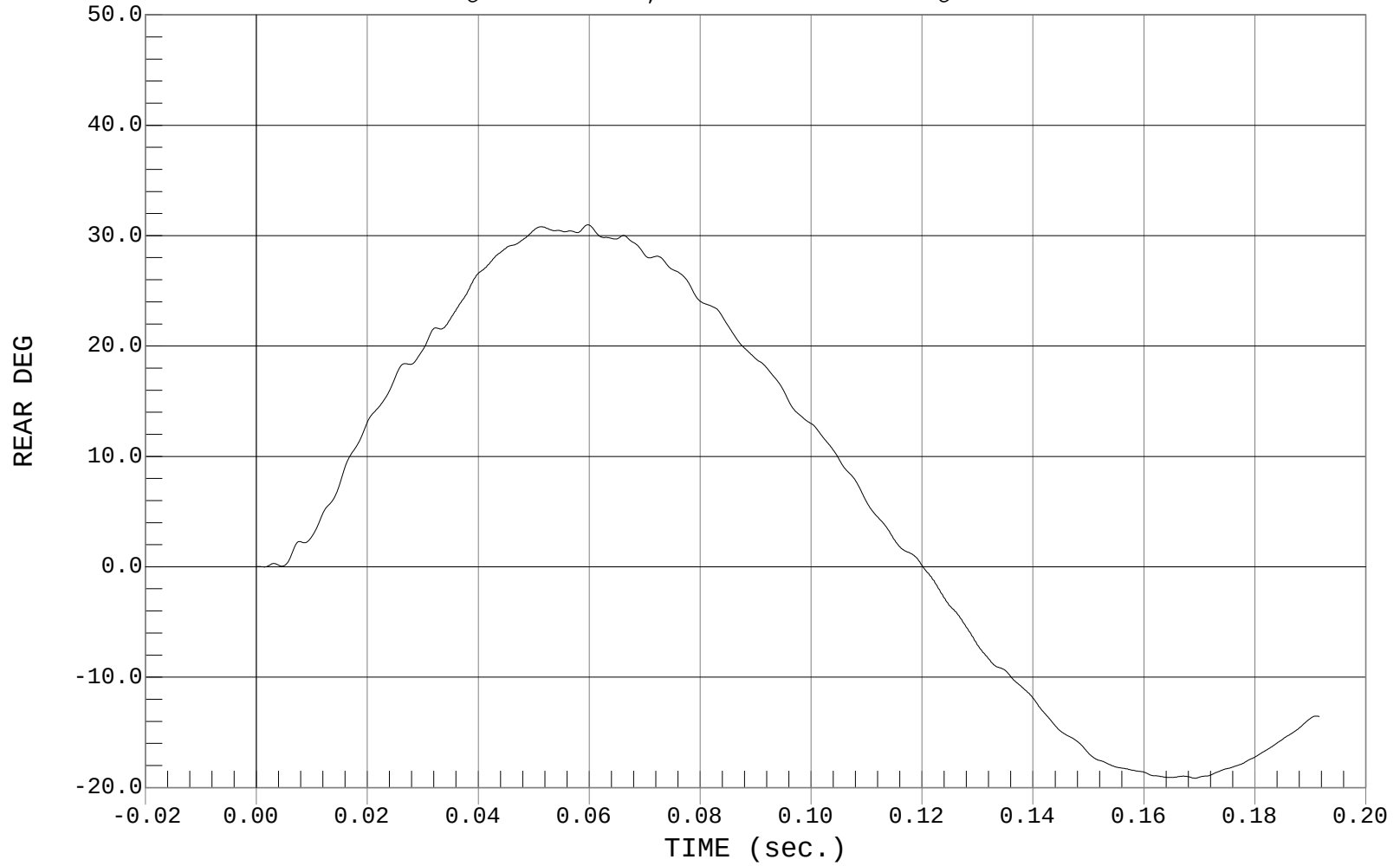
THETA B

Test Desc.: Dummy Calibration - Neck Bending
Component: Dummy # 010

Test Date: 10-18-01
Speed: 11.04 FT/SEC, 3.36 M/SEC

— 1 REAR, D01502DT.D06

Ymin = -19.15 DEG @ 0.1692 sec., Ymax = 30.99 DEG @ 0.0597 sec.



MGA RESEARCH CORPORATION
SHOULDER IMPACT TEST
EUROSID 2 DUMMY

Date: 10/18/01

Dummy Serial Number: 010

Test Number: D011503

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	31
Pendulum Speed	4.2 – 4.4 m/s	4.3
Max. Resultant Acceleration	7.5 – 10.5 g's	9.1
Time of Max. Pendulum Acceleration		25.3 msec

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



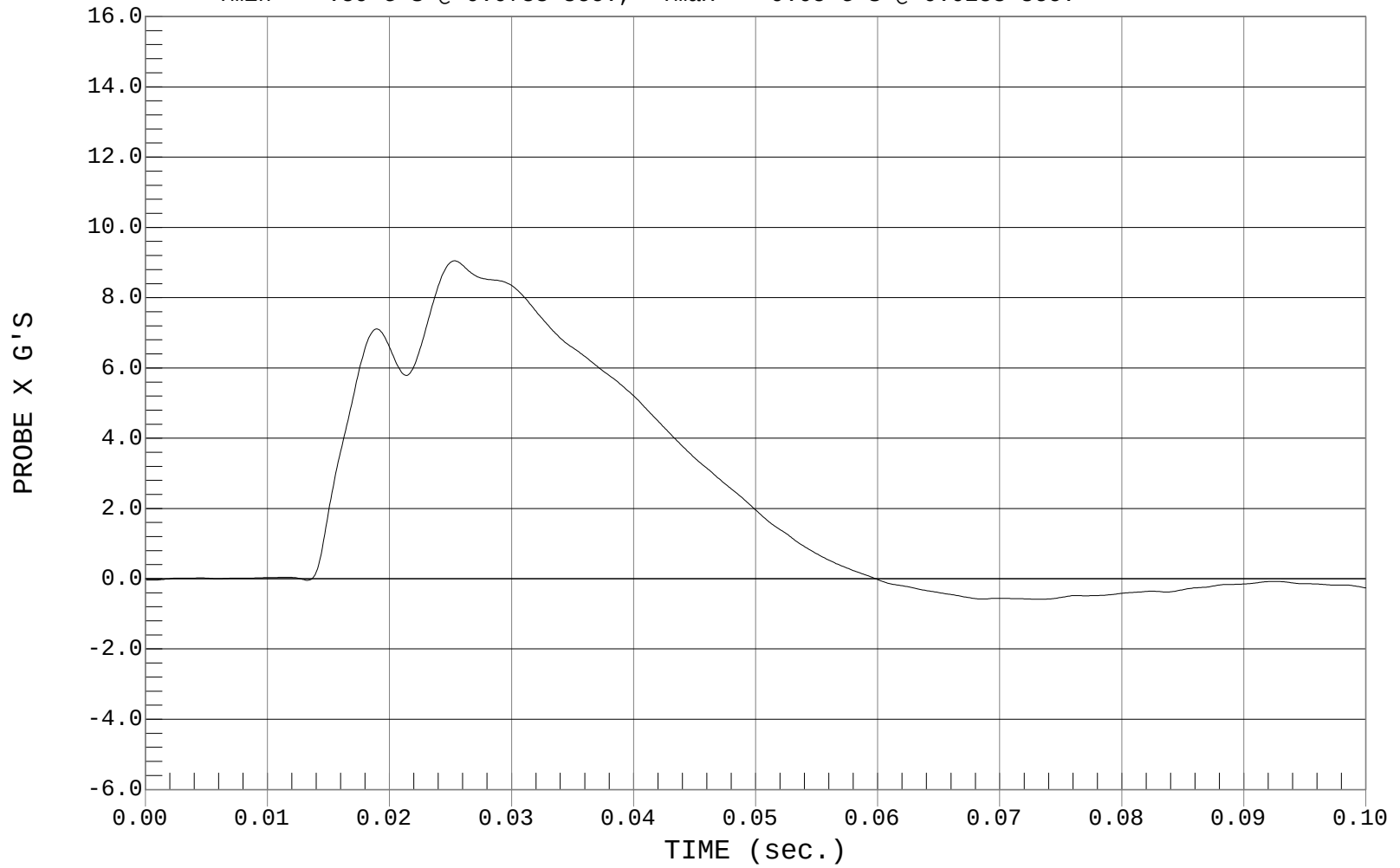
SHOULDER ACCELERATION

Test Desc.: Dummy Calibration - Shoulder Impact
Component: Dummy #010

Test Date: 10-18-01
Speed: 14.10 FT/SEC, 4.30 M/SEC

— 1 PROBE X, D01503AF.A01

Ymin = -.59 G'S @ 0.0733 sec., Ymax = 9.05 G'S @ 0.0253 sec.



MGA RESEARCH CORPORATION
UPPER/MIDDLE/LOWER RIB TESTS
SIDE IMPACT DUMMY (SID)

Date: 10/16/01
Dummy Serial Number: 010
Test Number: D011504/5/6

UPPER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.3
Relative Humidity (%)	10 – 70	31
Displacement at 2 m/s	23.5 – 27.5 mm	24.7
Displacement at 3 m/s	36.0 – 40.0 mm	39.1
Displacement at 4 m/s	46.0 – 51.0 mm	49.7

MIDDLE RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.3
Relative Humidity (%)	10 – 70	31
Displacement at 2 m/s	23.5 – 27.5 mm	25.0
Displacement at 3 m/s	36.0 – 40.0 mm	37.7
Displacement at 4 m/s	46.0 – 51.0 mm	49.8

LOWER RIB - TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18.9 – 25.5	21.3
Relative Humidity (%)	10 – 70	31
Displacement at 2 m/s	23.5 – 27.5 mm	23.6
Displacement at 3 m/s	36.0 – 40.0 mm	37.5
Displacement at 4 m/s	46.0 – 51.0 mm	49.4

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



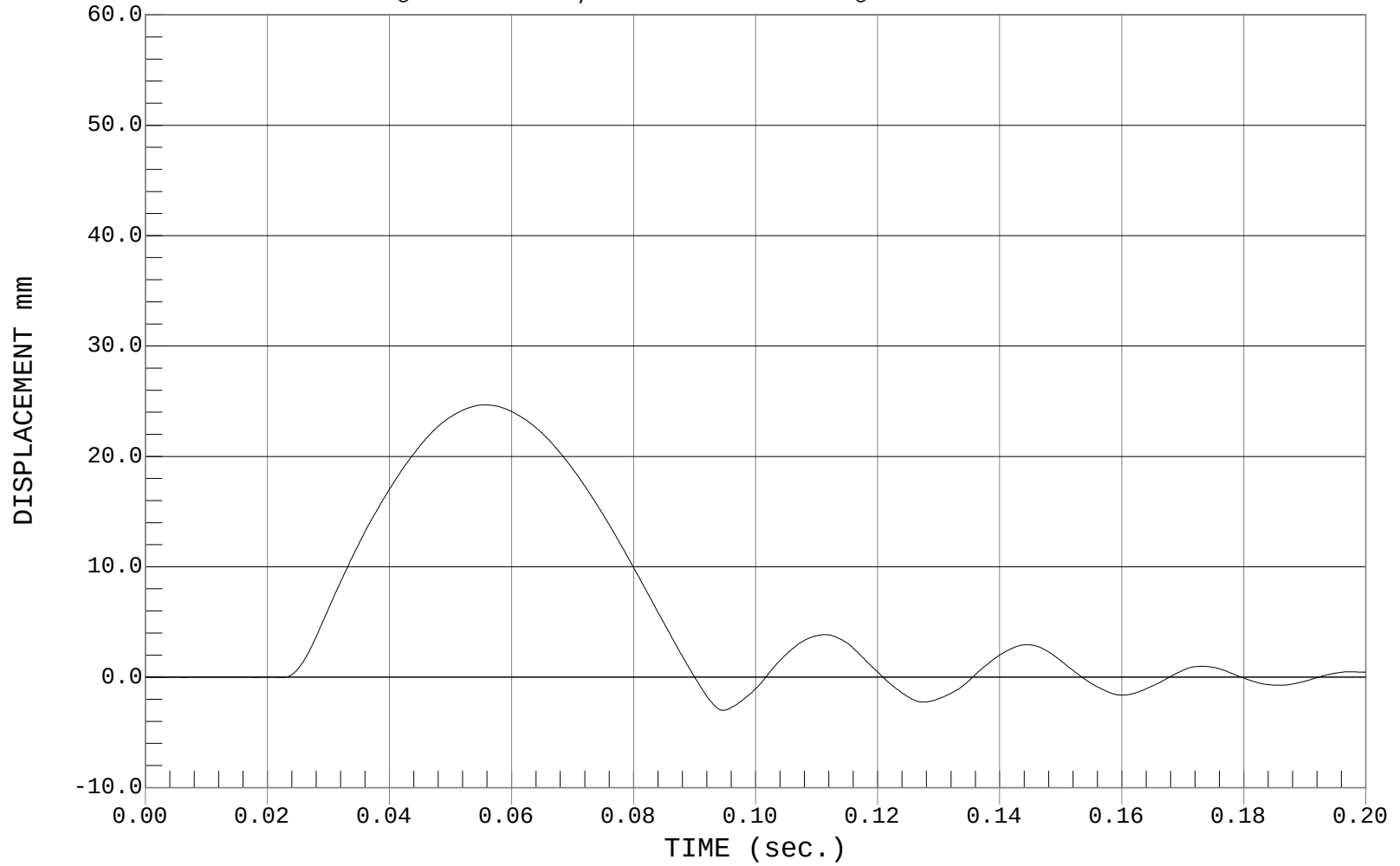
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01504DF.D05

Ymin = -3 mm @ 0.0947 sec., Ymax = 24.67 mm @ 0.0556 sec.





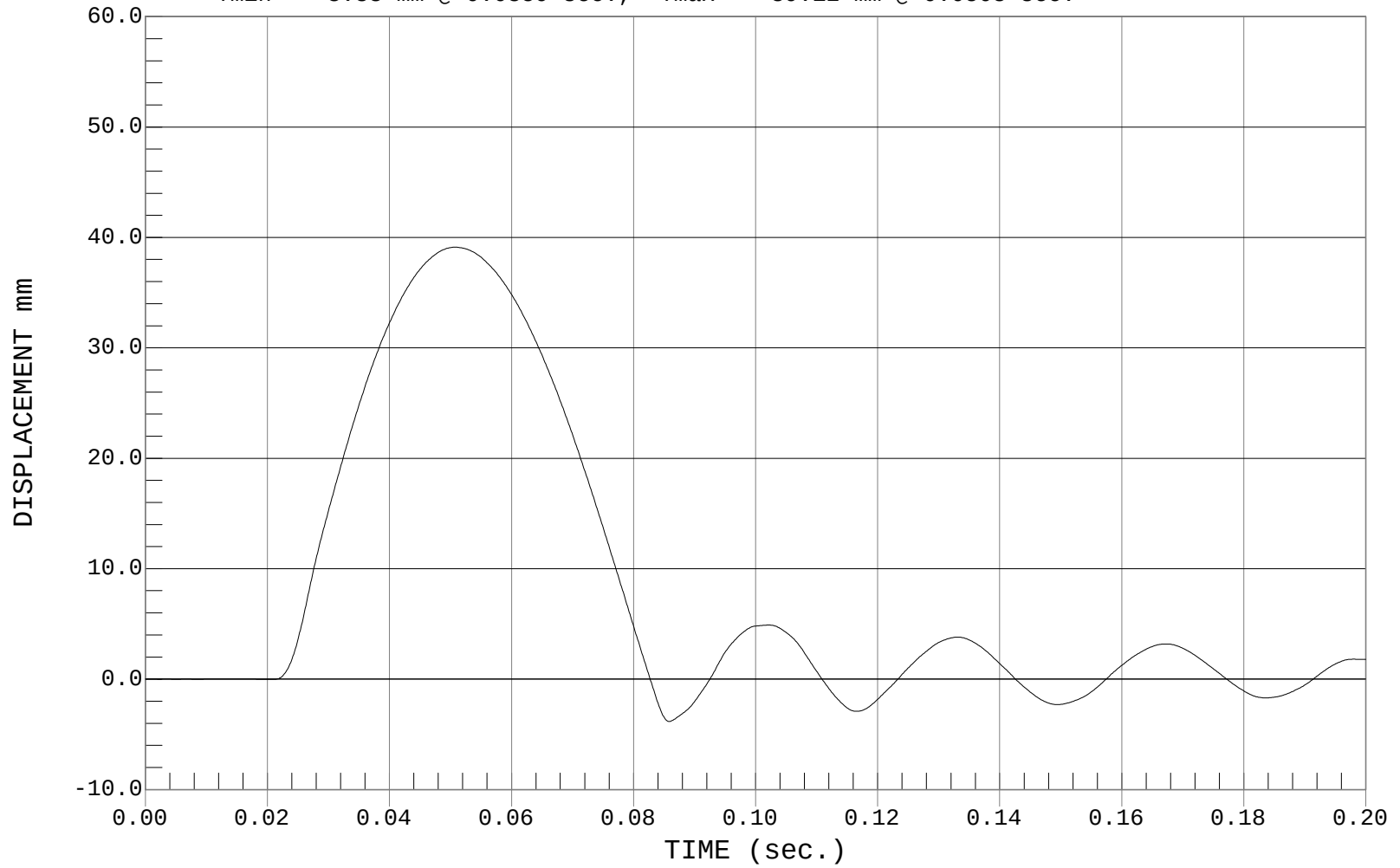
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01504DF.D06

Ymin = -3.83 mm @ 0.0859 sec., Ymax = 39.12 mm @ 0.0508 sec.





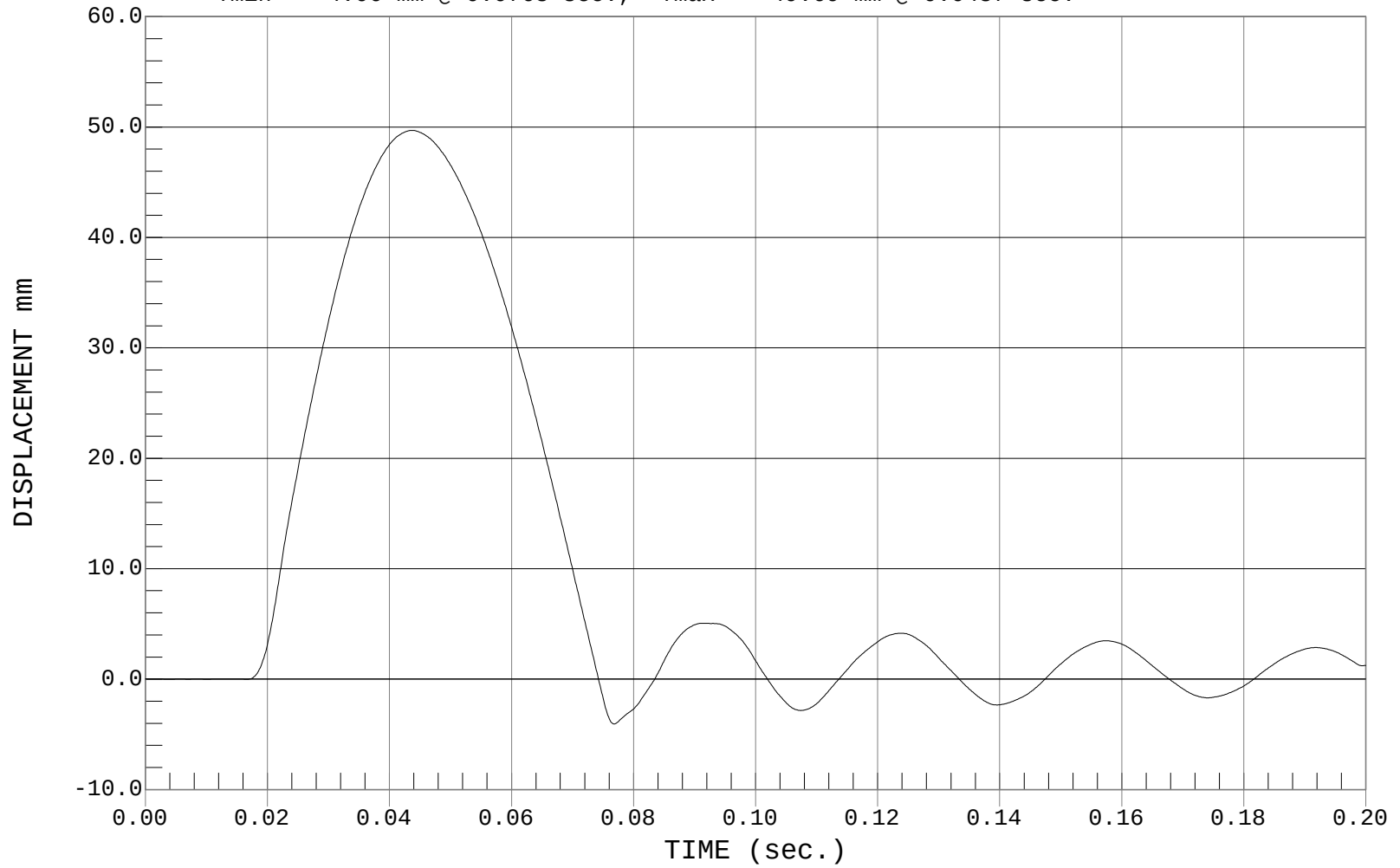
UPPER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01504DF.D07

Ymin = -4.06 mm @ 0.0768 sec., Ymax = 49.69 mm @ 0.0437 sec.





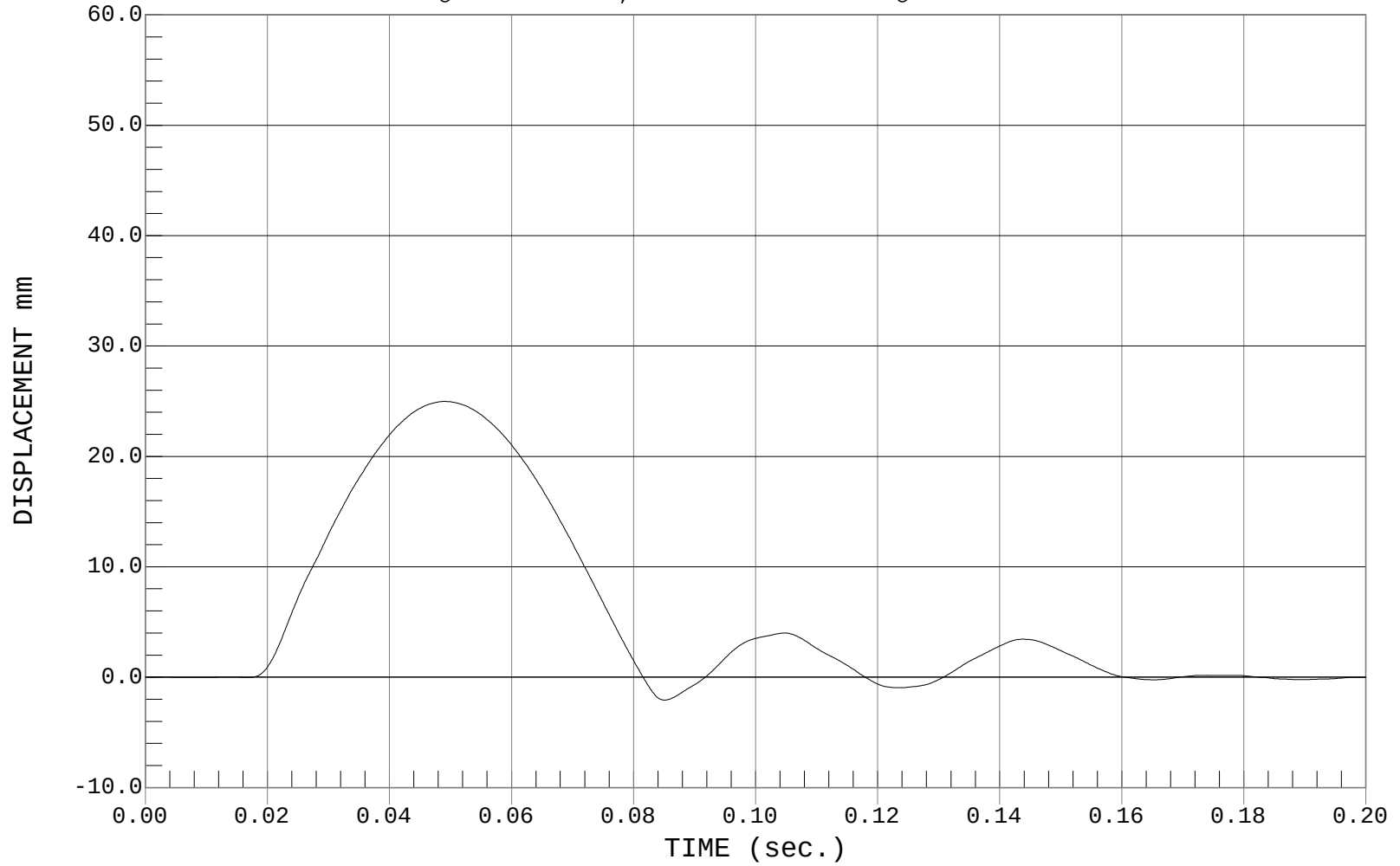
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01505DF.D05

Ymin = -2.07 mm @ 0.0851 sec., Ymax = 24.98 mm @ 0.0490 sec.





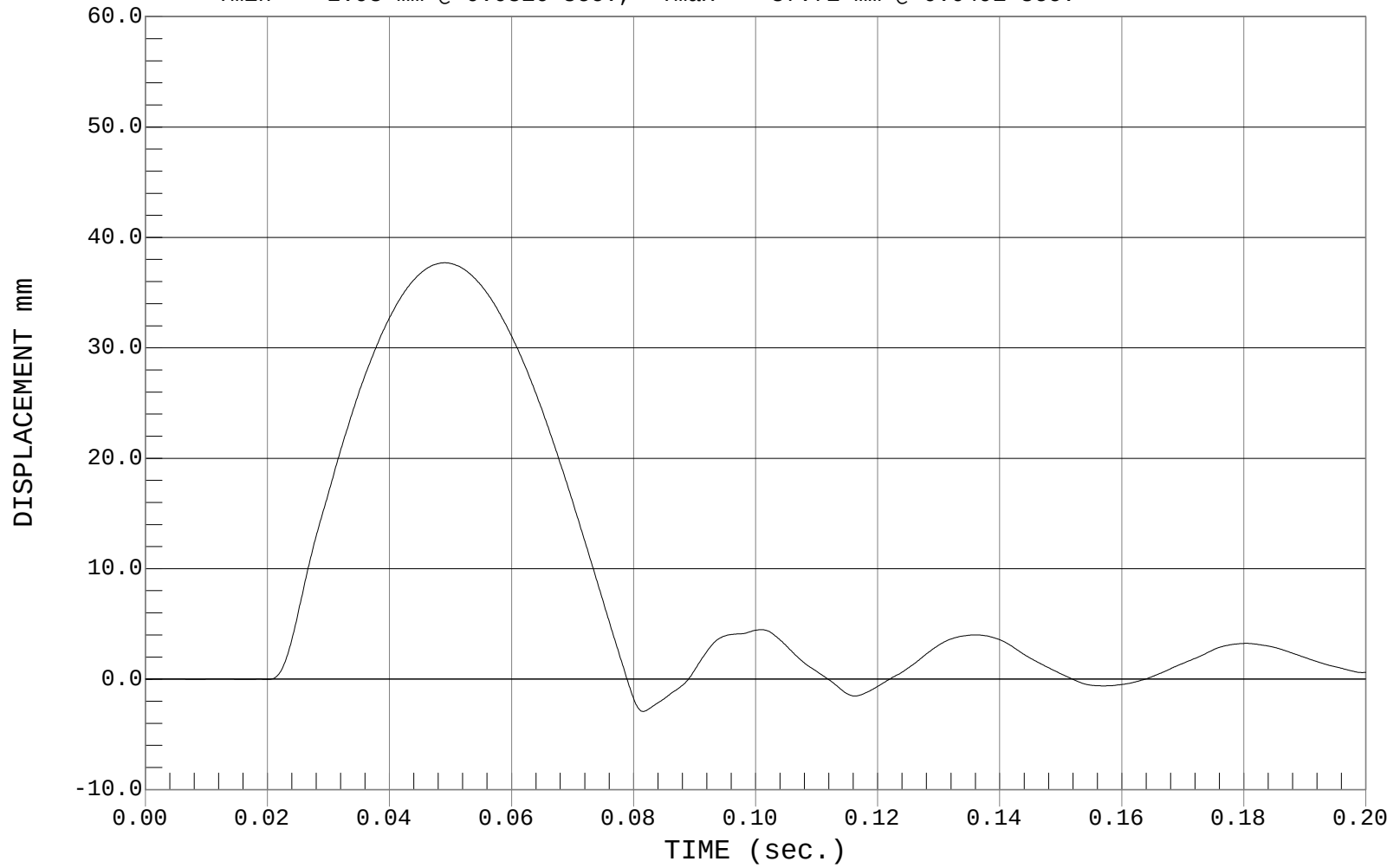
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01505DF.D06

Ymin = -2.93 mm @ 0.0816 sec., Ymax = 37.71 mm @ 0.0491 sec.





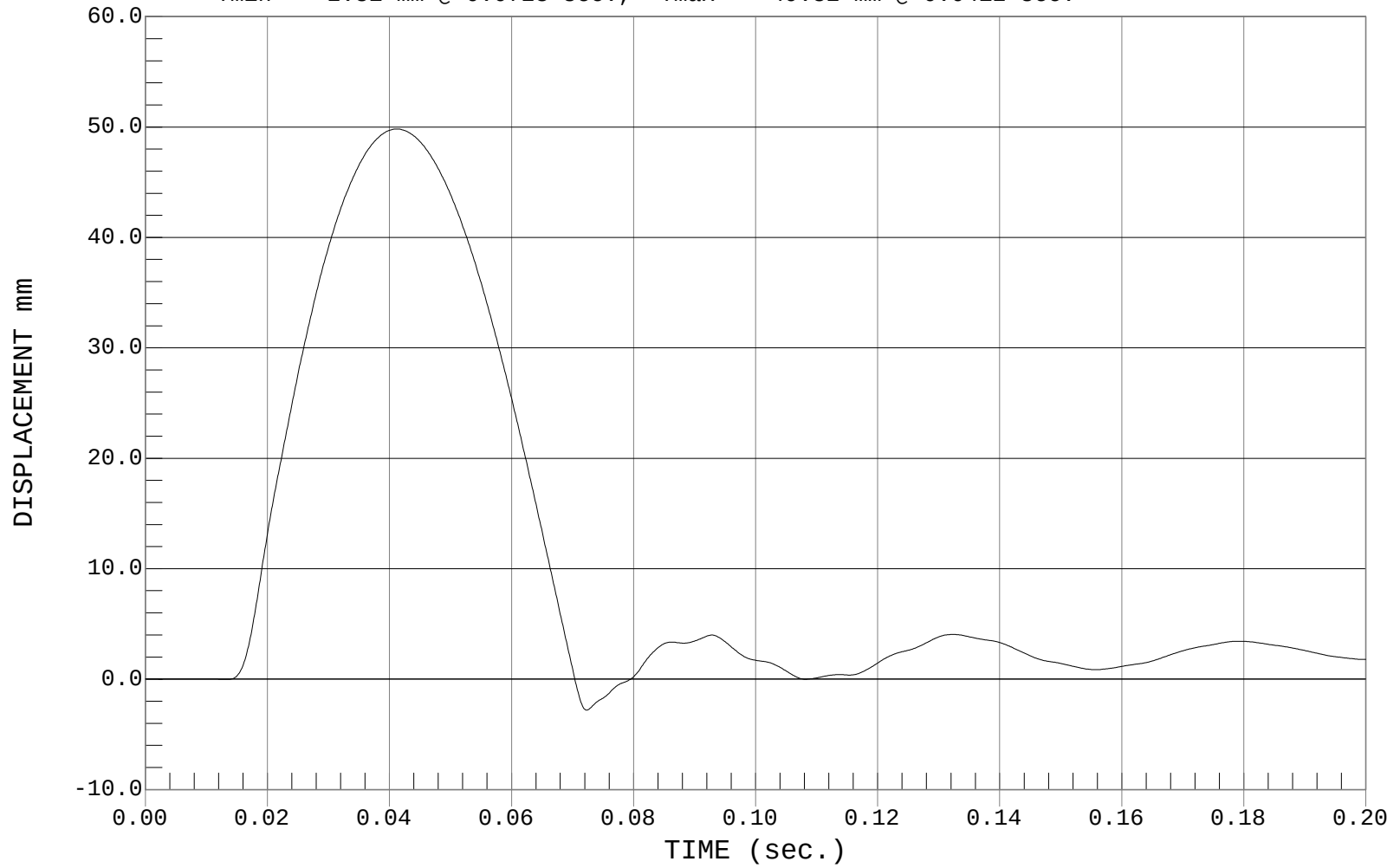
MIDDLE RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01505DF.D07

Ymin = -2.81 mm @ 0.0723 sec., Ymax = 49.82 mm @ 0.0412 sec.





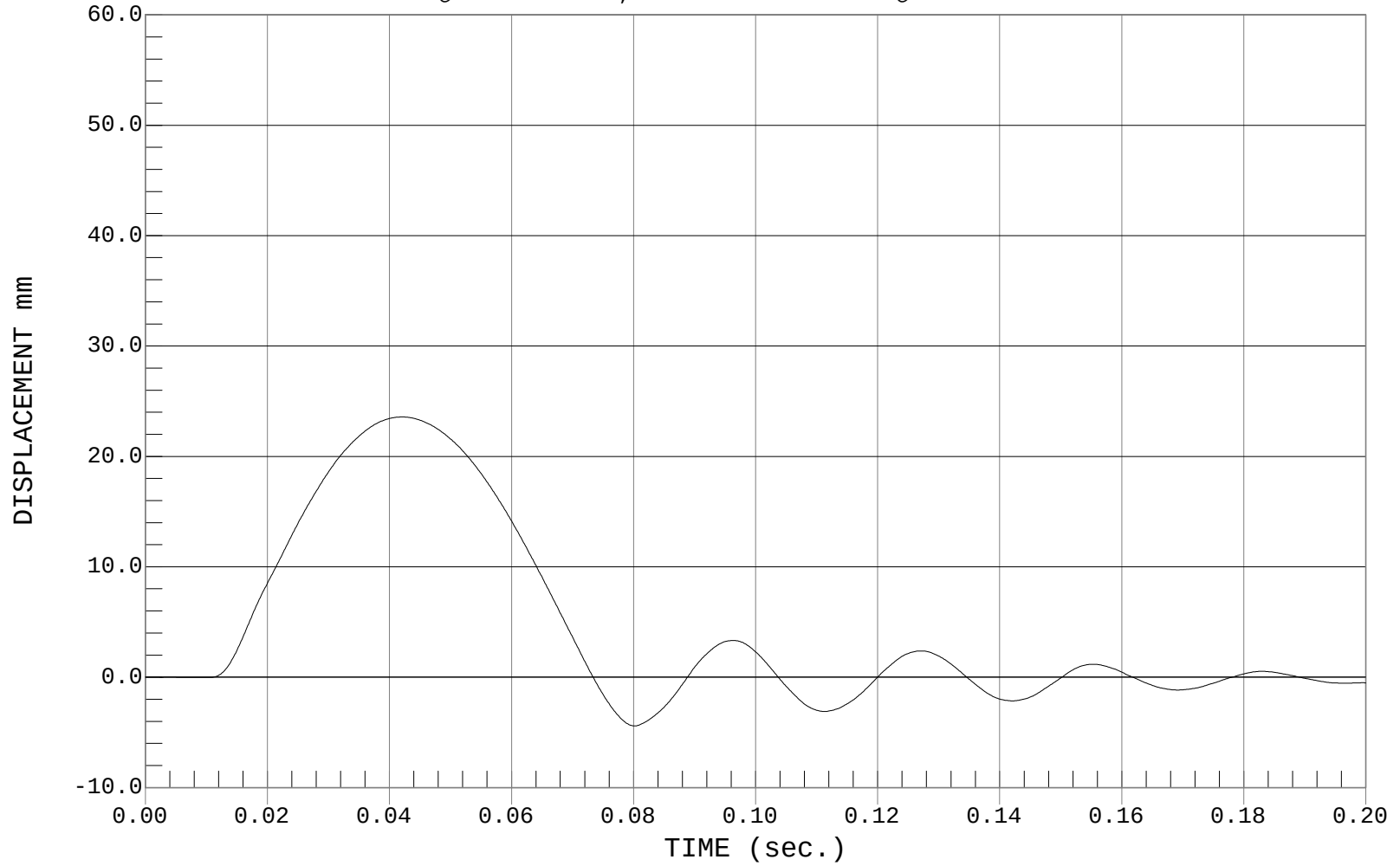
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 6.56 FT/SEC, 2.00 M/SEC

— 1 DISPLACEMENT, D01506DF.D05

Ymin = -4.42 mm @ 0.0802 sec., Ymax = 23.57 mm @ 0.0421 sec.





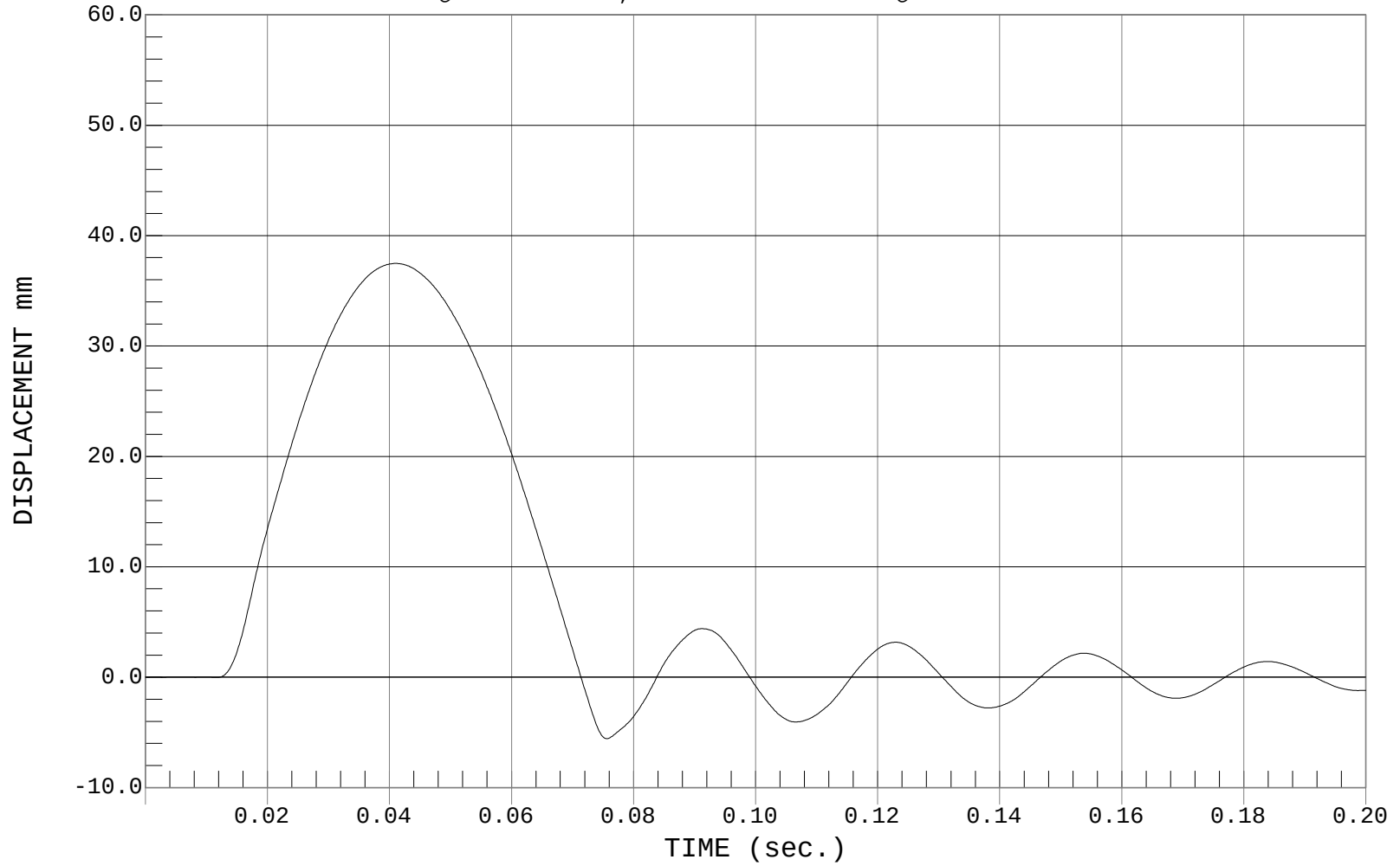
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 9.84 FT/SEC, 3.00 M/SEC

— 1 DISPLACEMENT, D01506DF.D06

Ymin = -5.57 mm @ 0.0756 sec., Ymax = 37.48 mm @ 0.0410 sec.





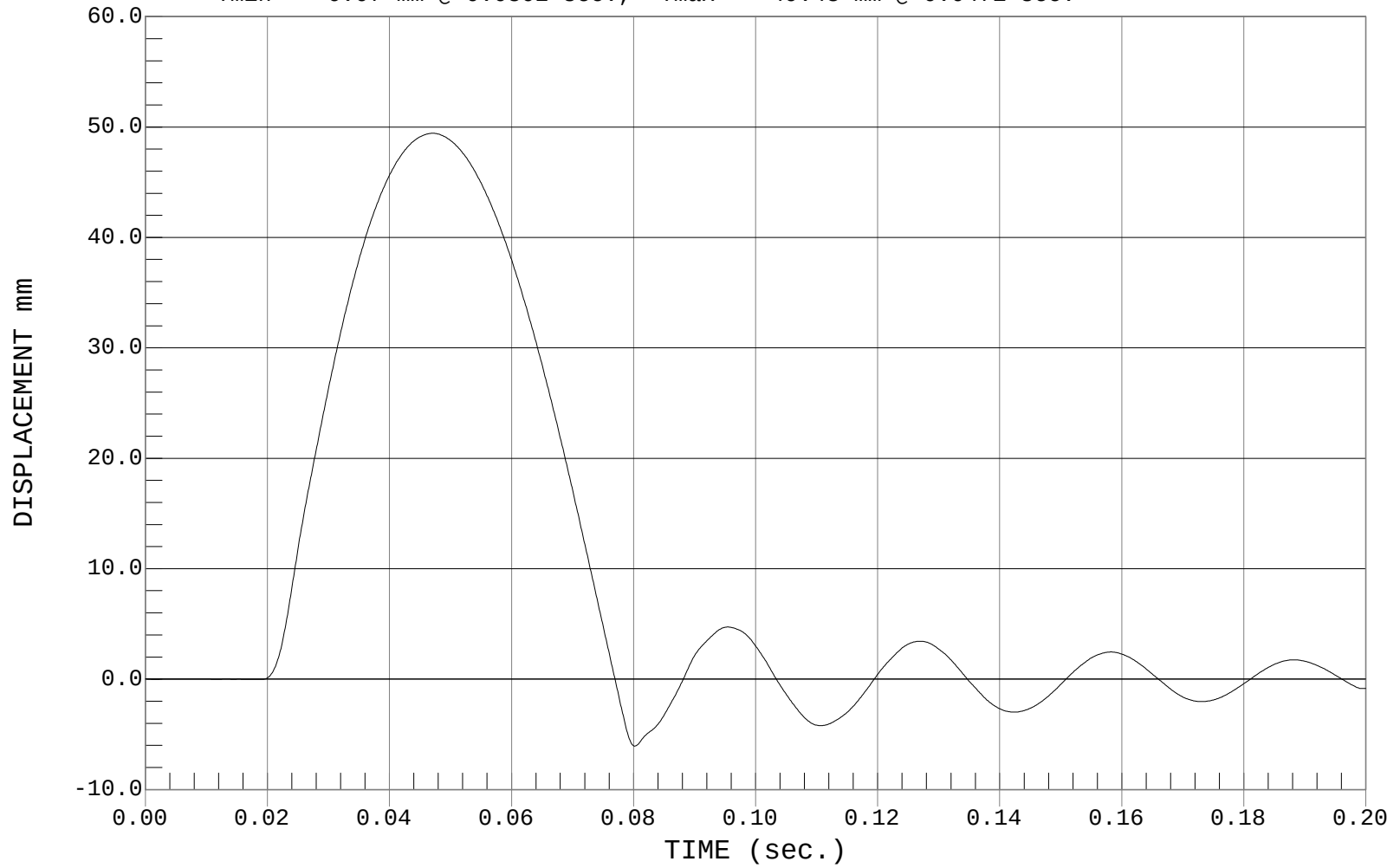
LOWER RIB DISPLACEMENT

Test Desc.: Dummy Calibration - Rib Module
Component: Dummy # 010

Test Date: 10-16-01
Speed: 13.12 FT/SEC, 4.00 M/SEC

— 1 DISPLACEMENT, D01506DF.D07

Ymin = -6.07 mm @ 0.0802 sec., Ymax = 49.43 mm @ 0.0471 sec.



MGA RESEARCH CORPORATION
ABDOMEN TEST
EUROSID 2 DUMMY

Date: 10/18/01

Dummy Serial Number: 010

Test Number: D011507

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.7
Relative Humidity (%)	10 – 70	31
Probe Speed (m/s)	3.90 – 4.10	4.00
Maximum Impact Force	4.00 – 4.80 kN	4.78
Time of Maximum Force	10.60 – 13.00 ms	12.20
Maximum Total Abdomen Force	2.20 – 2.70 kN	2.20
Time of Max. Total Force	10.00 – 12.30 ms	11.90

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



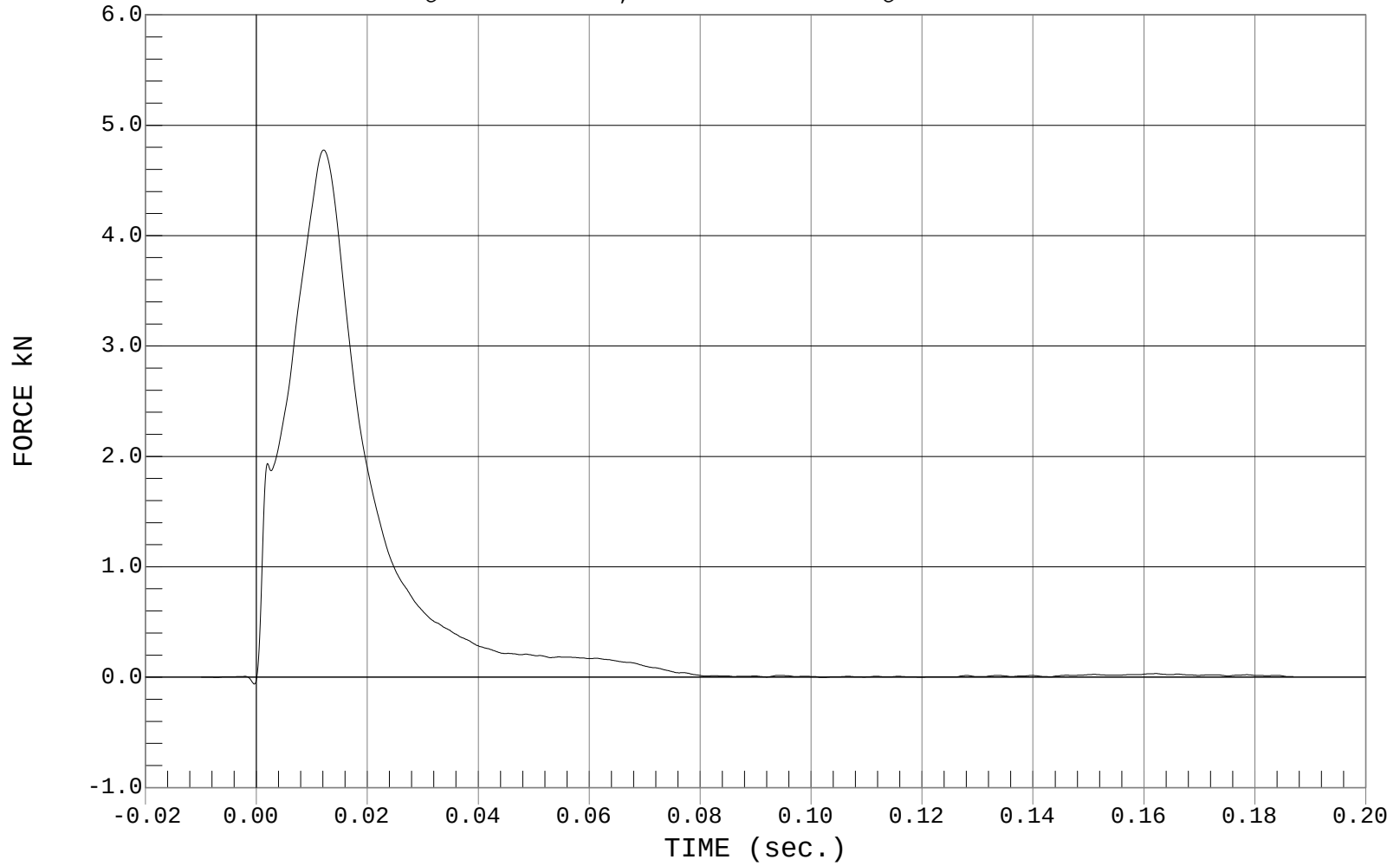
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #010

Test Date: 10-18-01
Speed: 13.11 FT/SEC, 4.00 M/SEC

— 1 FORCE, D01507FT.F01

Ymin = -.06 kN @ -0.0004 sec., Ymax = 4.78 kN @ 0.0122 sec.





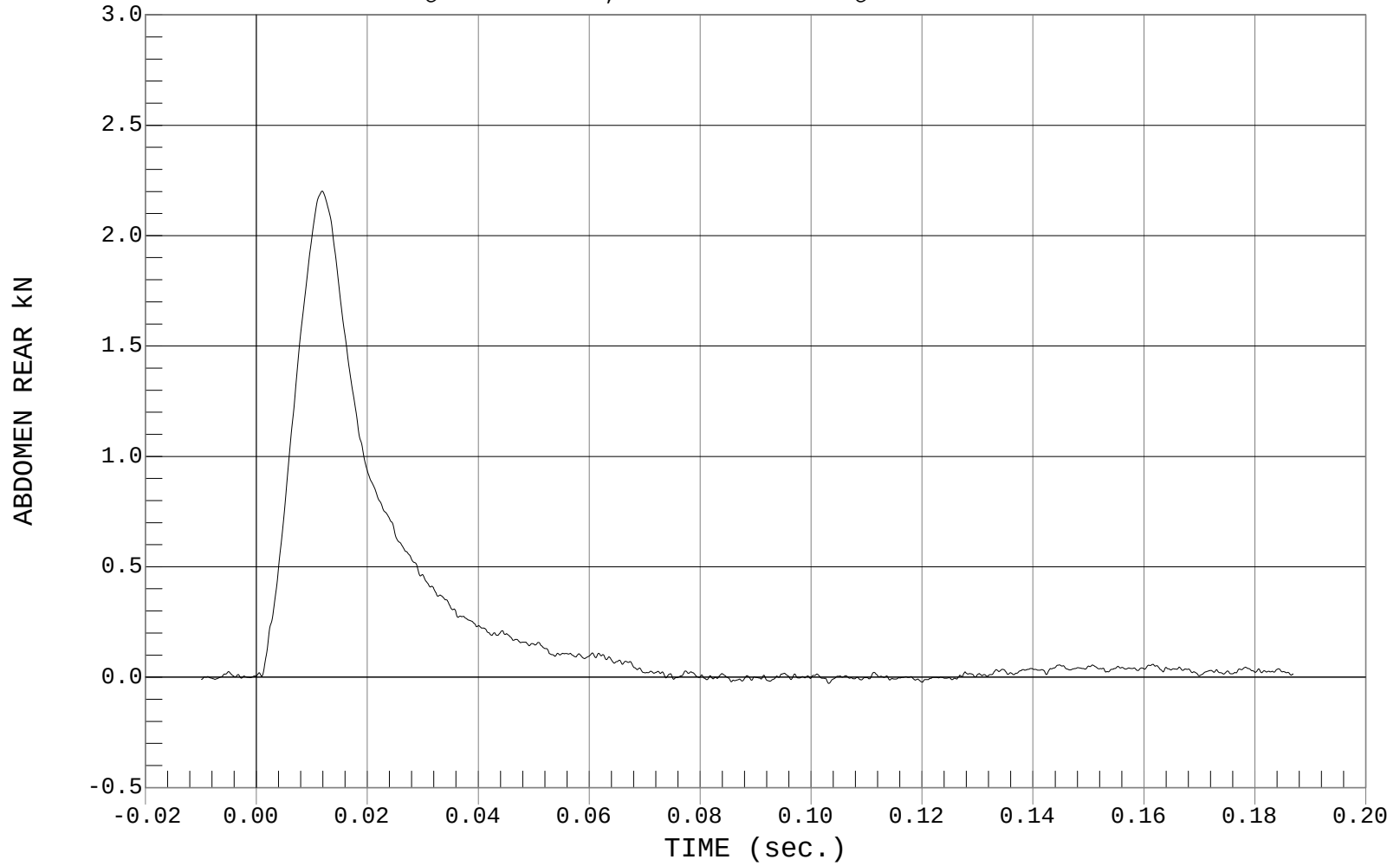
ABDOMEN FORCE

Test Desc.: Dummy Calibration - Abdomen Impact
Component: Dummy #010

Test Date: 10-18-01
Speed: 13.11 FT/SEC, 4.00 M/SEC

— 1 ABDOMEN REAR, D01507FT.F02

Ymin = -.03 kN @ 0.1032 sec., Ymax = 2.2 kN @ 0.0119 sec.



MGA RESEARCH CORPORATION
LUMBAR SPINE TEST
EUROSID 2 DUMMY

Date: 10/18/01

Dummy Serial Number: 010

Test Number: D011508

TEST PARAMETER		SPECIFICATION	TEST RESULTS
Temperature (°C)		18 – 22	21.0
Relative Humidity (%)		10 – 70	29
Pendulum Speed		5.95 – 6.15	6.08
Pendulum Deceleration	10 msec	2.46 - 1.59 m/sec	-1.91
	20 msec	5.25 - 4.07 m/sec	-4.34
	25 msec	6.64 - 5.3 m/sec	-5.42
	30 msec	≥ -6.5 m/sec	-6.1
Maximum Flexion Angle		45.0 – 55.0 deg	54.6
Time of Max. Flexion Angle		39.0 – 53.0 ms	50.8
Maximum Angle Theta (A)		31.0 – 35.0 deg	34.5
Time of Max. Theta (A)		44.0 – 52.0 ms	50.9
Maximum Angle Theta (B)		29.60 – 32.10 deg	30.45
Time of Max. Theta (B)		44.0 – 52.0 ms	51.4

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



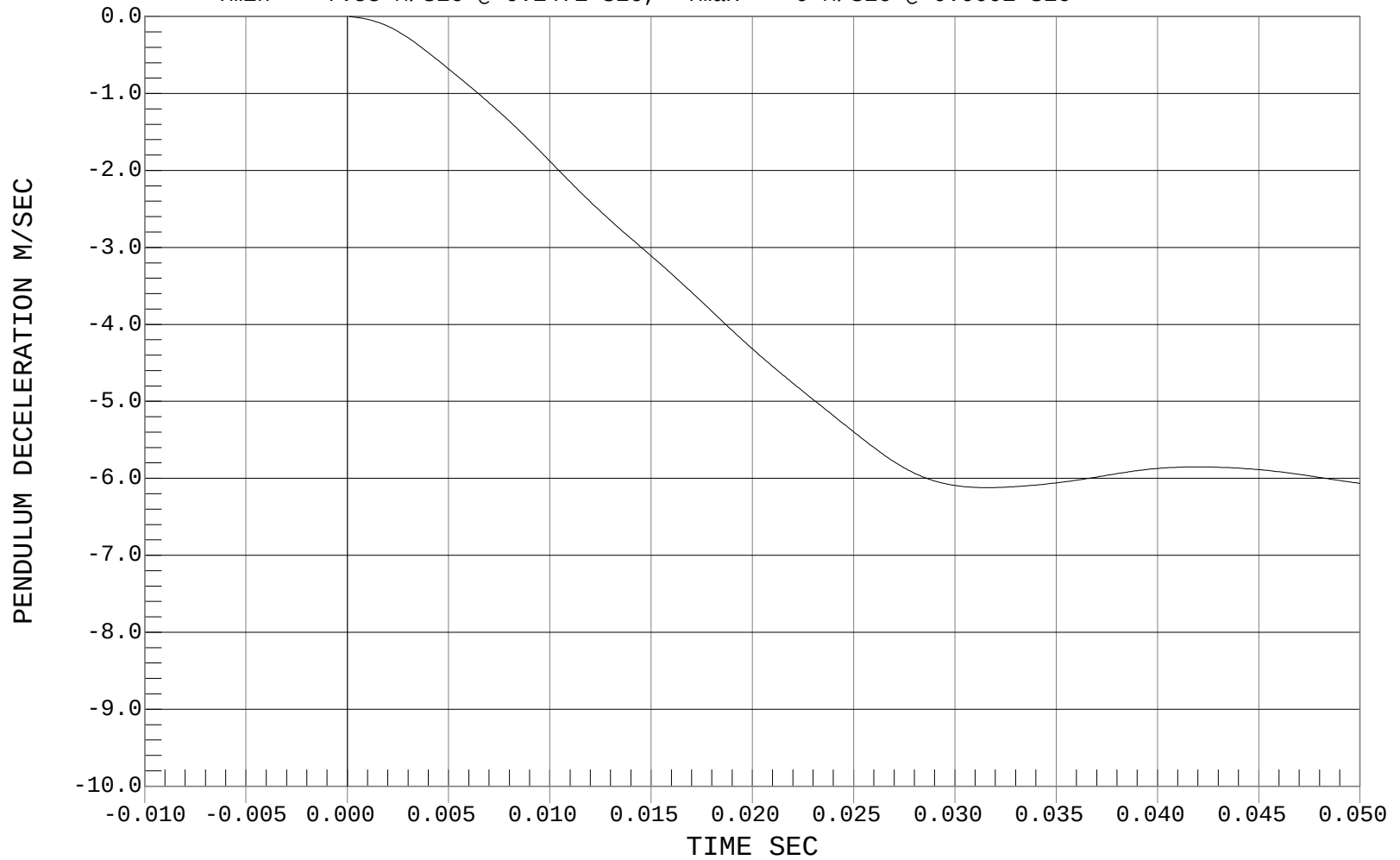
PENDULUM DECELERATION

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy # 010

Test Date: 10-18-01
Speed: 19.96 FT/SEC, 6.08 M/SEC

— 1 PENDULUM DECELERATION, D01508AI.V04

Ymin = -7.53 M/SEC @ 0.1471 SEC, Ymax = 0 M/SEC @ 0.0001 SEC





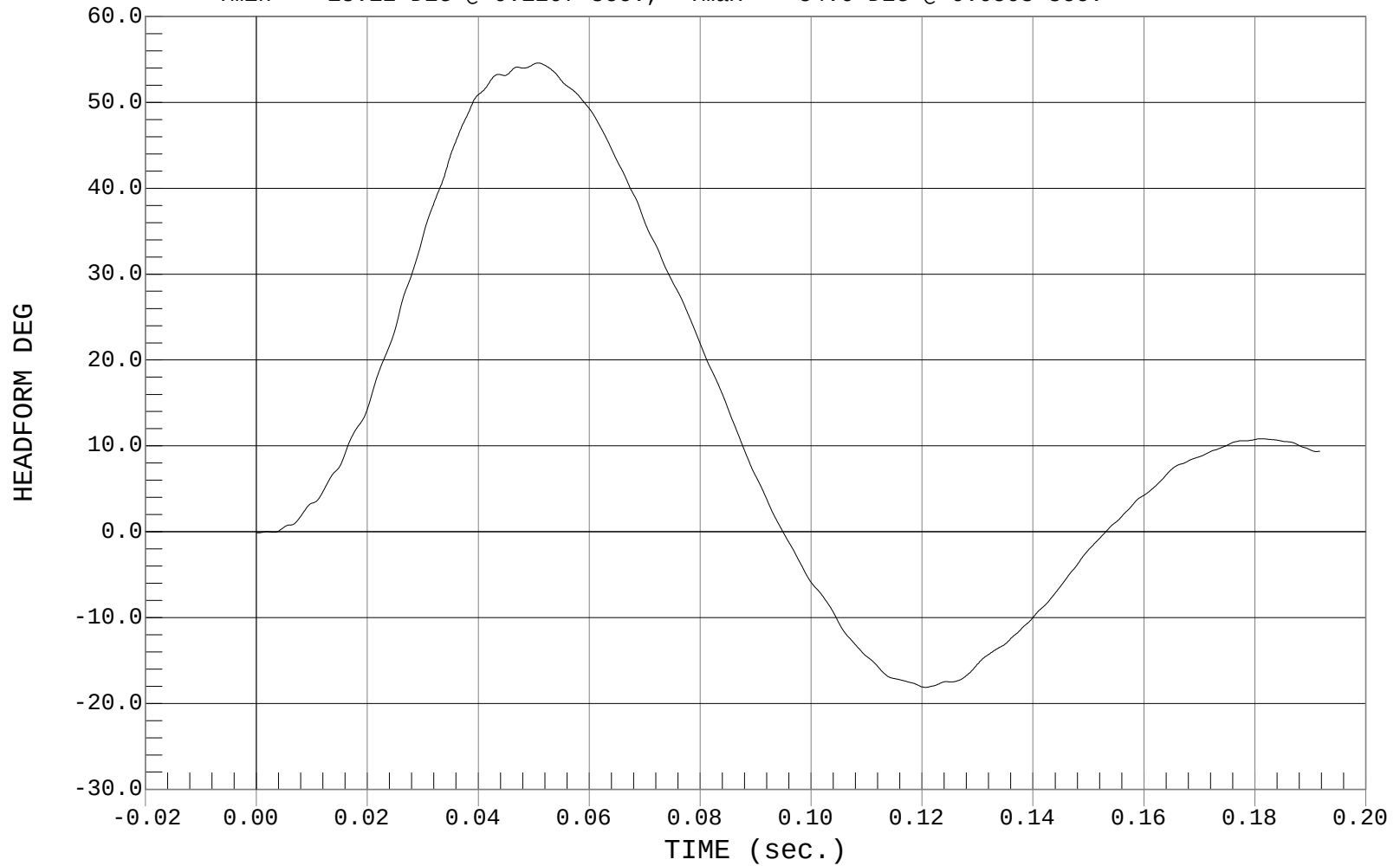
FLEXION ANGLE

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy # 010

Test Date: 10-18-01
Speed: 19.96 FT/SEC, 6.08 M/SEC

— 1 HEADFORM, D01508DT.D08

Ymin = -18.12 DEG @ 0.1207 sec., Ymax = 54.6 DEG @ 0.0508 sec.





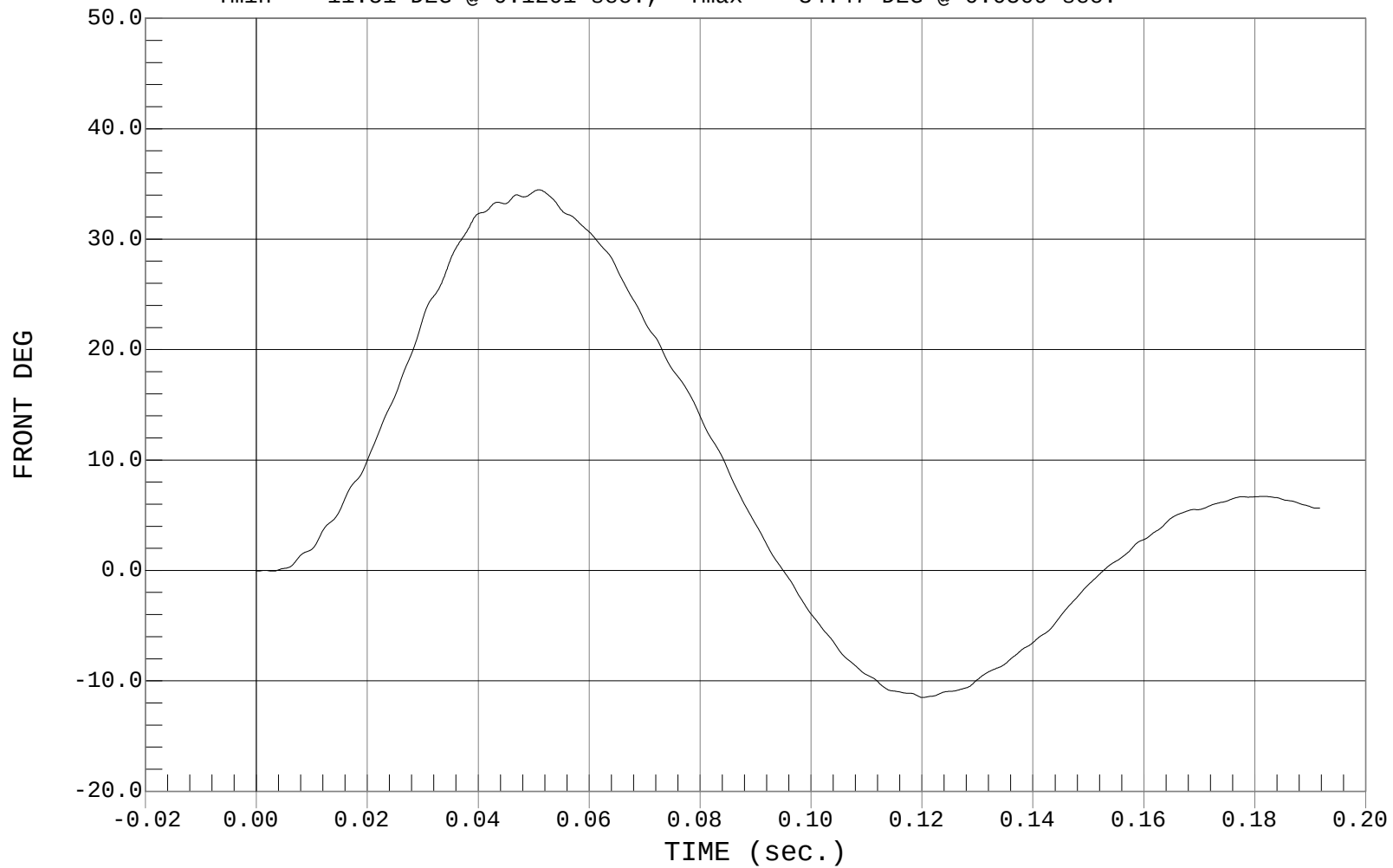
THETA A

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy # 010

Test Date: 10-18-01
Speed: 19.96 FT/SEC, 6.08 M/SEC

— 1 FRONT, D01508DT.D05

Ymin = -11.51 DEG @ 0.1201 sec., Ymax = 34.47 DEG @ 0.0509 sec.





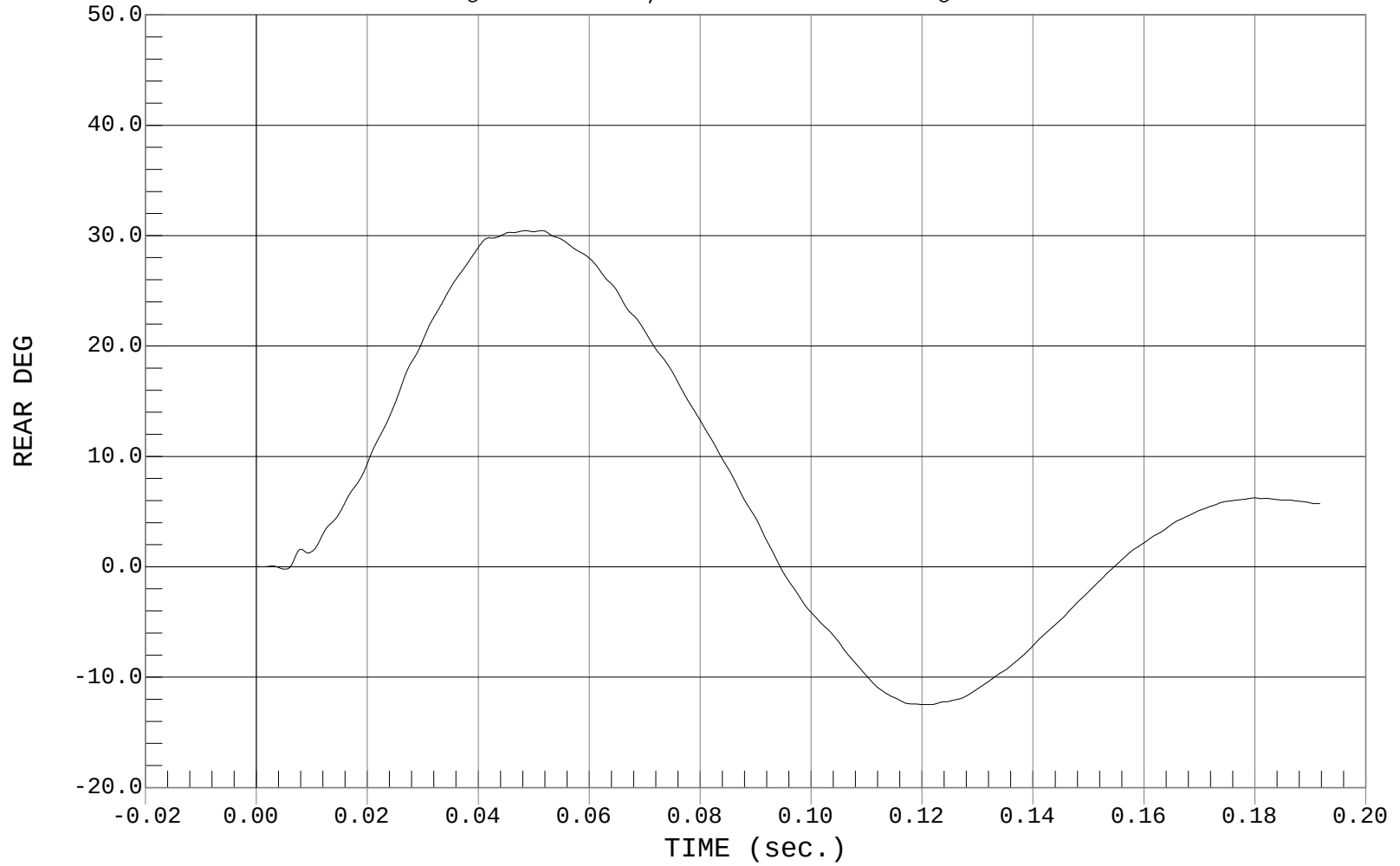
THETA B

Test Desc.: Dummy Calibration - Lumbar Flexion
Component: Dummy # 010

Test Date: 10-18-01
Speed: 19.96 FT/SEC, 6.08 M/SEC

— 1 REAR, D01508DT.D06

Ymin = -12.48 DEG @ 0.1204 sec., Ymax = 30.45 DEG @ 0.0514 sec.



MGA RESEARCH CORPORATION
PELVIS TEST
EUROSID 2 DUMMY

Date: 10/18/01

Dummy Serial Number: 010

Test Number: D011509

TEST PARAMETER	SPECIFICATION	TEST RESULTS
Temperature (°C)	18 – 22	21.9
Relative Humidity (%)	10 – 70	31
Pendulum Speed	6.20 – 6.30 m/s	6.27
Maximum Impactor Force	9.80 – 12.20 kN	10.95
Time of Max. Impactor Force	9.50 – 12.50 ms	12.10
Maximum Pubic Force	2.65 – 3.35 kN	3.32
Time of Max. Pubic Force	10.00 – 13.00 ms	12.20

TEST MEETS SPECIFICATIONS

Technician: _____

Approved By: _____



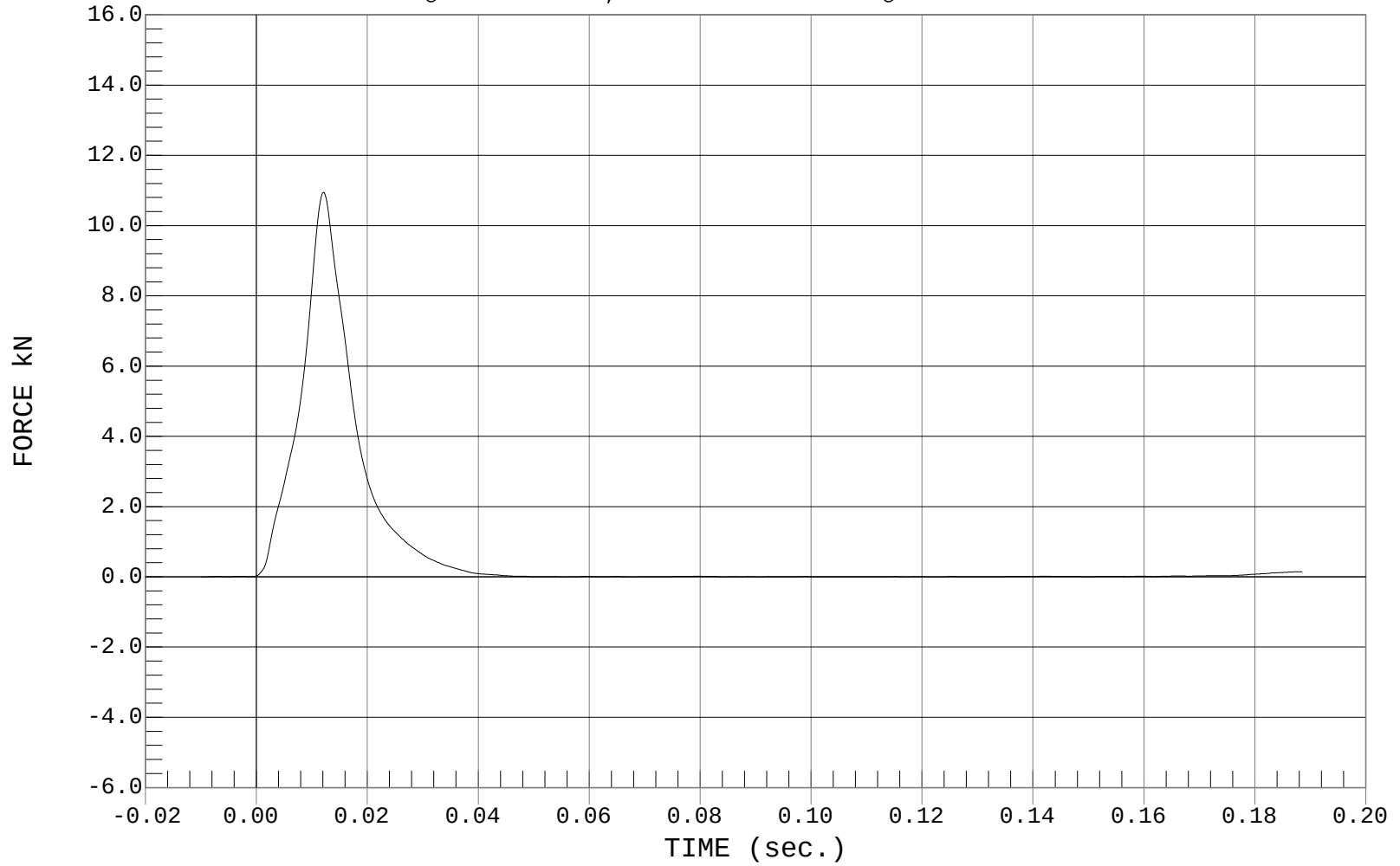
IMPACTOR FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #010

Test Date: 10-18-01
Speed: 20.57 FT/SEC, 6.27 M/SEC

— 1 FORCE, D01509FT.F01

Ymin = -.01 kN @ 0.1172 sec., Ymax = 10.95 kN @ 0.0121 sec.





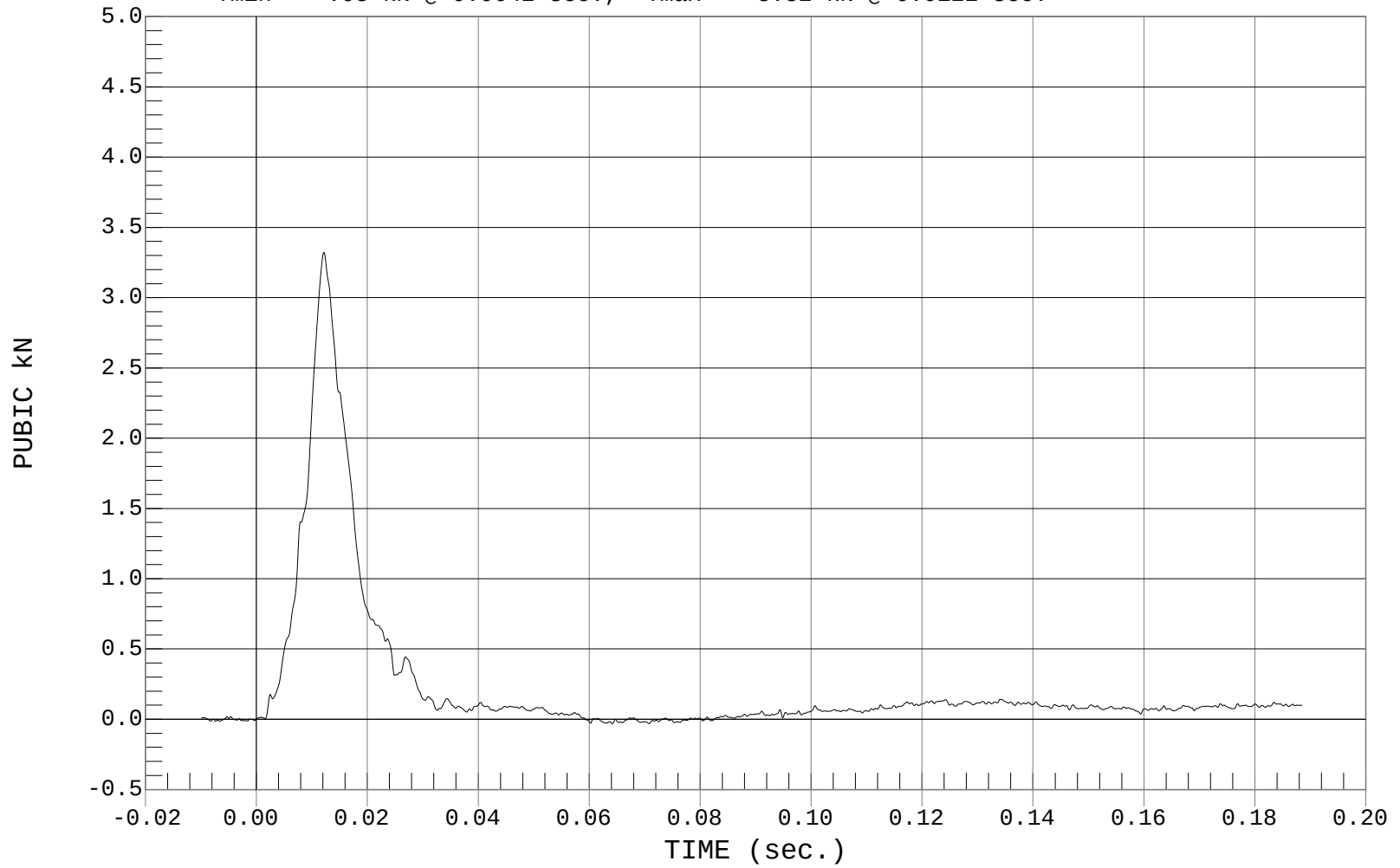
PUBIC FORCE

Test Desc.: Dummy Calibration - Pelvis Impact
Component: Dummy #010

Test Date: 10-18-01
Speed: 20.57 FT/SEC, 6.27 M/SEC

— 1 PUBIC, D01509FT.F02

Ymin = -.03 kN @ 0.0642 sec., Ymax = 3.32 kN @ 0.0122 sec.



APPENDIX D

TEST EQUIPMENT LIST AND CALIBRATION INFORMATION

DUMMY AND VEHICLE CALIBRATION DATA

	INSTRUMENTS FOR LEFT FRONT DUMMY NO. 009		
	SERIAL NO.	MANUFACTURER	CALIBRATION DATE
Head X Accelerometer	J14006	Endevco	10/2/01
Head Y Accelerometer	J13628	Endevco	10/2/01
Head Z Accelerometer	J13652	Endevco	10/2/01
Upper Neck Load Cell	105	FTSS	4/30/01
Lower Neck Load Cell	110	FTSS	5/4/01
Shoulder Force Load Cell	119	FTSS	4/24/01
Upper Spine X Accelerometer	J10730	Endevco	10/2/01
Upper Spine Y Accelerometer	J11014	Endevco	10/2/01
Upper Spine Z Accelerometer	J11625	Endevco	10/2/01
Upper Rib Y Accelerometer	AGRW3	Endevco	6/20/01
Mid Rib Y Accelerometer	AHY71	Endevco	6/20/01
Lower Rib Y Accelerometer	AMPY0	Endevco	6/20/01
Upper Rib Displacement	009	Honeywell	5/22/01
Mid Rib Displacement	009	Honeywell	5/22/01
Lower Rib Displacement	009	Honeywell	5/22/01
Lower Spine X Accelerometer	J13927	Endevco	10/2/01
Lower Spine Y Accelerometer	J13941	Endevco	10/2/01
Lower Spine Z Accelerometer	J13984	Endevco	10/2/01
Torso Load Cell	122	FTSS	4/12/01
T-12 Load Cell	102	FTSS	3/27/01
Front Abdomen Load Cell	122	FTSS	4/26/01
Mid Abdomen Load Cell	123	FTSS	4/26/01
Rear Abdomen Load Cell	124	FTSS	4/26/01
Pubic Symphysis Load Cell	115	Denton	3/29/01
Pelvis X Accelerometer	AHTF1	Endevco	10/2/01
Pelvis Y Accelerometer	AJ9D6	Endevco	10/2/01
Pelvis Z Accelerometer	AJ9D8	Endevco	10/2/01
Right Femur Load Cell	135	FTSS	4/18/01
Left Femur Load Cell	136	FTSS	4/19/01
Lumbar Load Cell	104	FTSS	4/24/01

DUMMY AND VEHICLE CALIBRATION DATA (Continued)

	INSTRUMENTS FOR LEFT REAR DUMMY NO. 010		
	SERIAL NO.	MANUFACTURER	CALIBRATION DATE
Head X Accelerometer	J20392	Endevco	5/31/01
Head Y Accelerometer	ALDD6	Endevco	5/31/01
Head Z Accelerometer	AGT18	Endevco	5/31/01
Upper Neck Load Cell	106	FTSS	3/27/01
Lower Neck Load Cell	111	FTSS	5/8/01
Shoulder Force Load Cell	120	FTSS	4/24/01
Upper Spine X Accelerometer	AN8D5	Endevco	7/3/01
Upper Spine Y Accelerometer	J13709	Endevco	7/3/01
Upper Spine Z Accelerometer	AN8D2	Endevco	7/3/01
Upper Rib Y Accelerometer	J13653	Endevco	6/20/01
Mid Rib Y Accelerometer	J13649	Endevco	6/20/01
Lower Rib Y Accelerometer	J13713	Endevco	6/20/01
Upper Rib Displacement	010	Honeywell	5/22/01
Mid Rib Displacement	010	Honeywell	5/22/01
Lower Rib Displacement	010	Honeywell	5/22/01
Lower Spine X Accelerometer	AH1F9	Endevco	8/21/01
Lower Spine Y Accelerometer	AH0F0	Endevco	8/21/01
Lower Spine Z Accelerometer	AH097	Endevco	8/21/01
Torso Load Cell	123	FTSS	4/12/01
T-12 Load Cell	103	FTSS	4/26/01
Front Abdomen Load Cell	119	FTSS	4/26/01
Mid Abdomen Load Cell	120	FTSS	4/26/01
Rear Abdomen Load Cell	121	FTSS	4/26/01
Pubic Symphysis Load Cell	113	Denton	3/29/01
Pelvis X Accelerometer	AH0C3	Endevco	8/30/01
Pelvis Y Accelerometer	AHT12	Endevco	8/30/01
Pelvis Z Accelerometer	AHTN3	Endevco	8/30/01
Right Femur Load Cell	137	FTSS	4/18/01
Left Femur Load Cell	138	FTSS	4/18/01
Lumbar Load Cell	105	FTSS	5/7/01

DUMMY AND VEHICLE CALIBRATION DATA (Continued)

	VEHICLE ACCELEROMETERS		
	SERIAL NO.	MANUFACTURER	CALIBRATION DATE
Moving Barrier CG X	D11-F01	Entran	5/30/01
Moving Barrier CG Y	J10-E18	Entran	8/21/01
Moving Barrier CG Z	I25-J09	Entran	5/25/01
Moving Barrier Rear Axle X	E03-H06	Entran	6/7/01
Moving Barrier Rear Axle Y	F11-G09	Entran	9/27/01
Left Mid A-Post Y	L15-G21	Entran	6/25/01
Left Lower A-Post Y	H14-N15	Entran	9/12/01
Left Upper B-Post	G03-N09	Entran	7/30/01
Left Mid B-Post Y	I25-F02	Entran	6/19/01
Left Lower B-Post Y	G03-N15	Entran	7/30/01
Rear Floorpan Above Axle X	C25-A25	Entran	8/21/01
Rear Floorpan Above Axle Y	I14-D13	Entran	8/21/01
Rear Floorpan Above Axle Z	G01-J02	Entran	8/21/01
Driver Seat Track Y	F18-G07	Entran	8/29/01
Right Side Sill at Front Seat X	H07-F07	Entran	9/27/01
Right Side Sill at Front Seat Y	I25-F05	Entran	9/27/01
Right Side Sill at Front Seat Z	A08-A11	Entran	8/29/01
Right Side Sill at Rear Seat X	A08-A13	Entran	8/7/01
Right Side Sill at Rear Seat Y	G13-F12	Entran	8/7/01
Right Side Sill at Rear Seat Z	K11-G07	Entran	3/21/01
Left Side Sill at Front Seat Y	G03-N02	Entran	9/27/01
Left Side Sill at Rear Seat Y	D11-F14	Entran	5/30/01
Vehicle CG X	E23-R11	Entran	9/27/01
Vehicle CG Y	F12-G01	Entran	9/27/01
Vehicle CG Z	J10-E12	Entran	9/27/01

DUMMY AND VEHICLE CALIBRATION DATA (Continued)

	VEHICLE ACCELEROMETERS		
	SERIAL NO.	MANUFACTURER	CALIBRATION DATE
Left Front Door @ Mid Rib	H14-N05	Entran	9/12/01
Left Front Door @ Pelvis	H14-N04	Entran	9/12/01
Left Front Door @ Knee	H14-N03	Entran	9/12/01
Left Front Door @ Arm	H14-N06	Entran	9/12/01
Left Rear Door @ Mid Rib	H14-N01	Entran	9/12/01
Left Rear Door @ Pelvis	H14-N14	Entran	9/12/01
Left Rear Door @ Knee	H14-N02	Entran	9/12/01
Left Rear Door @ Arm	H14-N03	Entran	9/12/01
Left Driver Seat Frame	K11-J08	Entran	8/8/01
Right Driver Seat Frame	F04-N10	Entran	6/22/01
Right Rear Occupant Compartment	G03-N07	Entran	7/30/01

Note: All Endevco accelerometers are Model No. 7264-2000

All Entran accelerometers are Model No. EGE-72

APPENDIX E

PROCEDURE FOR ES-2 POSITIONING

Installation of the Side Impact Dummy (recommended practice)

1. GENERAL

- 1.1 The dummy to be used for the following installation procedure is described in Annex 6 to this regulation.
- 1.2 Adjust the knee joints so that they just support the leg when it is extended horizontally (1 to 2 g).
- 1.3 Clothe the dummy in form fitting cotton stretch mid-calf length pants. Each foot is equipped with a shoe.

2. INSTALLATION

- 2.1 Place the dummy in the outboard front seat of the impact side as described in the test specifications.
- 2.2 The mid-sagittal plane of the dummy shall coincide with the centerplane of the occupant (as determined according to Annex 3, paragraph 2.8) with a tolerance of 2°.
- 2.3 The pelvis of the dummy shall be positioned according to the following:
 - 2.3.1 The pelvis pitch angle shall be $20.0^{\circ} \pm 2.5^{\circ}$.
 - 2.3.2 A line passing through the dummy H-points shall pass through an imaginary circle in the mid-sagittal plane of the dummy. This circle has a radius of 10 mm and is located 20 mm horizontally forward and 5 mm vertically above the reference H-point, determined by the 3D H-point machine.
- 2.4 The upper torso of the dummy shall be positioned according to the following:
 - 2.4.1 The upper torso shall be bent forward and then laid back against the seat back. The shoulder of the dummy shall be set fully rearward.
 - 2.4.2 The torso reference line pitch angle shall be $25.0^{\circ} \pm 2.5^{\circ}$. The torso reference line is defined as the thoracic spine center line.
- 2.5 The arms shall be positioned in such a way that the angle between the projection of the arm centerline on the mid-sagittal plane of the dummy and the torso reference line is $40^{\circ} \pm 5^{\circ}$.

- 2.6 For the driver's seating position, without inducing pelvis or torso movement, place the right foot of the dummy on the undepressed accelerator pedal with the heel resting as far forward as possible on the floorpan. Set the left foot perpendicular to the lower leg with the heel resting on the floorpan in the same lateral line as the right heel. Set the knees of the dummy such that their outside surfaces are 150 ± 10 mm from the plane of symmetry of the dummy. If possible, within these constraints, place the thighs of the dummy in contact with the seat cushion.
- 2.7 For other seating positions, without inducing pelvis or torso movement, place the heels of the dummy as far forward as possible on the floorpan without compressing the seat cushion more than the compression due to the weight of the leg. Set the knees of the dummy such that their outside surfaces are 150 ± 10 mm from the plane of symmetry of the dummy.

APPENDIX F
ES-2 PEAK RESPONSES

DRIVER (ES-2) PEAK RESPONSE TABLE

Location	Peak Values				
				2002 Escape 10/12/01	
	Class	Axis	Units	Peak	Time
Head	1000	X	G	-19.8	53
	1000	Y	G	26.3	48
	1000	Z	G	-20.6	65
	1000	RES	G	29.0	48
Head Injury Criteria (HIC)				74	
Upper Neck Force	1000	X	N	-186	102
	1000	Y	N	-348	66
	1000	Z	N	-792	66
	1000	RES	N	862	66
Upper Neck Moment	600	X	Nm	-84.4	63
	600	Y	Nm	-52.9	62
	600	Z	Nm	21.1	70
	600	RES	Nm	100.7	62
Lower Neck Force	1000	X	N	-574	63
	1000	Y	N	-723	50
	1000	Z	N	-644	52
	1000	RES	N	896	52
Lower Neck Moment	600	X	Nm	49.9	109
	600	Y	Nm	-25.2	167
	600	Z	Nm	29.4	66
	600	RES	Nm	55.1	109
Shoulder Force	600	X	N	337	61
	600	Y	N	-412	60
	600	Z	N	-451	37

DRIVER (ES-2) PEAK RESPONSE TABLE (CONTINUED)

Location	Peak Values				
				2002 Escape 10/12/01	
	Class	Axis	Units	Peak	Time
Upper Spine	180	X	G	-17.7	50
	180	Y	G	36.9	61
	180	Z	G	5.3	44
Lower Spine	180	X	G	-17.7	43
	180	Y	G	51.7	50
	180	Z	G	-5.6	54
Upper Rib	180	Y	G	50.6	56
Mid Rib	180	Y	G	89.4	53
Lower Rib	180	Y	G	76.0	38
Upper Rib Deflection	180	Y	mm	**	**
Mid Rib Deflection	180	Y	mm	5.6	48
Lower Rib Deflection	180	Y	mm	11.1	48
Upper Rib VC	180	Y	m/sec	**	**
Mid Rib VC	180	Y	m/sec	-0.04	50
Lower Rib VC	180	Y	m/sec	0.1	44
Torso Force	600	X	N	649	131
	600	Y	N	-414	53
Torso Moment	600	Y	Nm	-18.8	50
	600	Z	Nm	27.9	130
T12 Force	600	X	N	266	55
	600	Y	N	2604	52
T12 Moment	600	X	Nm	**	**
	600	Y	Nm	44.2	55

** No valid data collected

DRIVER (ES-2) PEAK RESPONSE TABLE (CONTINUED)

Location	Peak Values				
				2002 Escape 10/12/01	
	Class	Axis	Units	Peak	Time
Abdomen Front Force	600	Y	N	231	49
Abdomen Mid Force	600	Y	N	408	38
Abdomen Rear Force	600	Y	N	731	47
Abdomen Summed Force	600	Y	N	1339	49
Pubic Symphysis Force	600	Y	N	3739	42
Right Femur Force	600	X	N	-179	45
	600	Y	N	-814	58
	600	Z	N	1015	46
	600	RES	N	1041	46
Right Femur Moment	600	X	Nm	-256.2	42
	600	Y	Nm	28.6	54
	600	Z	Nm	28.5	60
	600	RES	Nm	-257.3	42
Left Femur Force	600	X	N	219	52
	600	Y	N	-778	36
	600	Z	N	749	58
	600	RES	N	848	36
Left Femur Moment	600	X	Nm	188.6	42
	600	Y	Nm	-41.2	45
	600	Z	Nm	31.1	42
	600	RES	Nm	-193.2	42
Pelvis	1000	X	G	-30.1	41
	1000	Y	G	80.7	43
	1000	Z	G	-8.5	47

PASSENGER (ES-2) PEAK RESPONSE TABLE

Location	Peak Values				
				2002 Escape 10/12/01	
	Class	Axis	Units	Peak	Time
Head	1000	X	G	-20.2	59
	1000	Y	G	80.0	61
	1000	Z	G	-24.2	86
	1000	RES	G	84.1	61
Head Injury Criteria (HIC)				370	
Upper Neck Force	1000	X	N	467	72
	1000	Y	N	-1557	69
	1000	Z	N	-753	66
	1000	RES	N	1677	69
Upper Neck Moment	600	X	Nm	-90.9	84
	600	Y	Nm	-30.3	85
	600	Z	Nm	34.8	86
	600	RES	Nm	101.1	84
Lower Neck Force	1000	X	N	-335	80
	1000	Y	N	-630	70
	1000	Z	N	-1766	71
	1000	RES	N	1871	71
Lower Neck Moment	600	X	Nm	-208.7	71
	600	Y	Nm	57.5	117
	600	Z	Nm	50.7	82
	600	RES	Nm	210.5	72
Shoulder Force	600	X	N	-384	77
	600	Y	N	-514	78
	600	Z	N	481	63

PASSENGER (ES-2) PEAK RESPONSE TABLE (CONTINUED)

Location	Peak Values				
				2002 Escape 10/12/01	
	Class	Axis	Units	Peak	Time
Upper Spine	180	X	G	-13.2	64
	180	Y	G	41.4	65
	180	Z	G	12.3	83
Lower Spine	180	X	G	-10.9	70
	180	Y	G	43.8	54
	180	Z	G	10.9	83
Upper Rib	180	Y	G	84.6	60
Mid Rib	180	Y	G	65.0	55
Lower Rib	180	Y	G	69.7	52
Upper Rib Deflection	180	Y	mm	18.4	77
Mid Rib Deflection	180	Y	mm	15.4	72
Lower Rib Deflection	180	Y	mm	6.8	62
Upper Rib VC	180	Y	m/sec	0.12	64
Mid Rib VC	180	Y	m/sec	0.09	60
Lower Rib VC	180	Y	m/sec	0.04	59
Torso Force	600	X	N	-117	103
	600	Y	N	-365	56
Torso Moment	600	Y	Nm	6.6	64
	600	Z	Nm	-5.1	199
T12 Force	600	X	N	***	***
	600	Y	N	***	***
T12 Moment	600	X	Nm	***	***
	600	Y	Nm	***	***

*** No load cell available

PASSENGER (ES-2) PEAK RESPONSE TABLE (CONTINUED)

Location	Peak Values				
	Class	Axis	Units	Peak	Time
Abdomen Front Force	600	Y	N	327	53
Abdomen Mid Force	600	Y	N	406	54
Abdomen Rear Force	600	Y	N	375	55
Abdomen Summed Force	600	Y	N	1085	54
Pubic Symphysis Force	600	Y	N	2636	47
Right Femur Force	600	X	N	404	48
	600	Y	N	-1050	49
	600	Z	N	1131	46
	600	RES	N	1369	47
Right Femur Moment	600	X	Nm	-82.7	60
	600	Y	Nm	55.0	59
	600	Z	Nm	35.2	41
	600	RES	Nm	-87.0	60
Left Femur Force	600	X	N	-755	48
	600	Y	N	2074	48
	600	Z	N	-4417	82
	600	RES	N	4420	82
Left Femur Moment	600	X	Nm	-152.1	51
	600	Y	Nm	-122.6	48
	600	Z	Nm	-31.6	47
	600	RES	Nm	-169.6	51
Pelvis	1000	X	G	-32.0	49
	1000	Y	G	71.8	49
	1000	Z	G	-22.8	54

APPENDIX G

ES-2 POLARITY CHECKLIST

ES-2 POLARITY CHECKLIST

Location	Channel	Dummy Manipulation	Polarity
Upper Neck	Fx	Head Rearward, Chest Forward	+
	Fy	Head Leftward, Chest Rightward	+
	Fz	Head Upward, Chest Downward	+
	Mx	Left Ear Toward Left Shoulder	+
	My	Chin Toward Sternum	+
	Mz	Chin Toward Left Shoulder	+
Lower Neck	Fx	Head Rearward, Chest Forward	+
	Fy	Head Leftward, Chest Rightward	+
	Fz	Head Upward, Chest Downward	+
	Mx	Left Ear Toward Left Shoulder	+
	My	Chin Toward Sternum	+
	Mz	Chin Toward Left Shoulder	+
Shoulder	Fx	Shoulder Forward, Chest Rearward	+
	Fy	Shoulder Rightward, Chest Leftward	+
	Fz	Shoulder Downward, Chest Upward	+
Torso Back Plate	Fx	Push Backplate in the +X Direction	+
	Fy	Push Backplate to the Right (+Y)	+
	My	Push Bottom Half and Pull Top Half of Backplate	+
	Mz	Push Left Half and Pull Right Half of Backplate	+
Thorax Upper Rib	Dy	Push Rib Rightward	+
Thorax Mid Rib	Dy	Push Rib Rightward	+
Thorax Lower Rib	Dy	Push Rib Rightward	+
Pubic Load	Fy	Right H-Point Pad Leftward, Left Pad Rightward	(-)
T12 Load	Fx	Chest Rearward, Pelvis Forward	+
	Fy	Chest Leftward, Pelvis Rightward	+
	Mx	Left Shoulder Toward Left Hip	+
	My	Sternum Toward Front of Legs	+
Left Iliac Load	Fy	Left Iliac Rightward, Chest Leftward	+

ES-2 POLARITY CHECKLIST (CONTINUED)

Location	Channel	Dummy Manipulation	Polarity
Ant. Ab. Load	Fy	Left Side of Abdomen Rightward, Chest Leftward	+
Mid Ab. Load	Fy	Left Side of Abdomen Rightward, Chest Leftward	+
Post. Ab. Load	Fy	Left Side of Abdomen Rightward, Chest Leftward	+
Left Upper Leg Load	Fx	Knee Upward, Upper Femur Downward	+
	Fy	Knee Rightward, Upper Femur Leftward	+
	Fz	Knee Forward, Pelvis Rearward	+
	Mx	Knee Leftward, Hold Upper Femur in Place	+
	My	Knee Upward, Hold Upper Femur in Place	+
	Mz	Tibia Leftward, Hold Pelvis in Place	+
Lumbar Spine	Fx	Knee Upward, Upper Femur Downward	+
	Fy	Knee Rightward, Upper Femur Leftward	+
	Fz	Knee Forward, Pelvis Rearward	+
	Mx	Knee Leftward, Hold Upper Femur in Place	+
	My	Knee Upward, Hold Upper Femur in Place	+
	Mz	Tibia Leftward, Hold Pelvis in Place	+