

Crash Tests

New Car Safety

Hyundai Santa Fe

11/2009 on 07/2012 - Frontal+Side+Head

Overall Evaluation



Overall Score
Variant: GLS 4WD

33.34 out of 37
Engine: 2.2 litre diesel
Category: Large SUV

The diesel left-hand-drive European model was tested by Euro NCAP. Australasian specifications may vary and therefore models sold in Australasia might provide different levels of protection to those described on this page.

Model History and Safety Features

The Hyundai Santa Fe was introduced in Australia during 2006. This 5-star rating applies to 2.2 diesel and 2.4 petrol variants built from November 2009, when several safety-related upgrades were introduced.

Dual front airbags, side airbags and head-protecting side curtains are standard equipment. The side curtains are designed to deploy in a rollover crash. Antilock brakes (ABS), electronic brake distribution (EBD) and electronic stability control (ESC) are also standard. Advanced seat belt reminders are fitted to the driver and front passenger seats.

Pre-tensioners are fitted to the front seat belts to reduce slack in the event of a crash. Three point seat belts are fitted to all seats. These provide better protection than a two point (lap) seat belt.

Overall Evaluation: 5

5 Stars. The upgraded Santa Fe scored 13.34 out of 16 in the offset crash test. The passenger compartment held its shape well. There was a slight risk of serious chest and leg injury for the driver.

The vehicle scored 16 out of 16 in the side impact crash test and a further two points in the optional pole test.

Frontal Offset Crash Test

Body region scores out of 4 points each: Head/neck 4 pts, chest 2.70 pts, upper legs 3 pts, lower legs 3.64 pts.

The passenger compartment held its shape well in the offset crash test. The brake pedal moved rearwards by 99 mm and downwards 3mm. The steering wheel hub moved forwards 10mm, downwards 17mm and sideways 2 mm. The front ("A") pillar moved 13 mm rearwards. All doors remained closed during the crash. After the crash high manual effort were required to open the driver's door.

The airbag cushioned the head of the driver and contact was stable. Steering column and dash components were a potential source of injury for the driver's knees. The passenger's head was cushioned by the airbag. Centre console and dash components were a potential knee injury hazard for the passenger.

Side Impact Crash Test

Body region scores out of 4 points each: Head 4 pts, chest 4 pts, abdomen 4 pts, pelvis 4 pts.

Body region scores out of 4 points each: Head 4 pts, chest 4 pts, abdomen 4 pts, pelvis 4 pts.

The vehicle was eligible for an optional pole impact test and this was conducted by Euro NCAP. The curtain did not deploy fully and one point was deducted by Euro NCAP. The curtain system was upgraded and ANCAP was provided with evidence that the deployment problem had been rectified so a full 2 points was awarded for the upgraded vehicle.

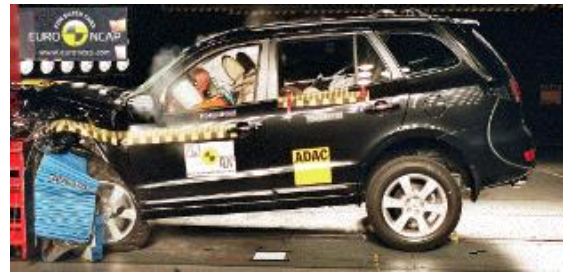
Pedestrian rating (v4.2)



The original Santa Fe earned zero stars from Euro NCAP. ANCAP conducted additional tests of the upgraded vehicle and it improved to one star.

Child head impacts 4
Adult head impacts 2.89
Upper leg impacts Zero
Lower leg impacts Zero
Total (out of 36) 6.89

Offset crash test at 64km/hr



Injury Measurements

Refer to the information sheet 'How the tests are done'	Offset Crash Test at 64km/h (v4.1)		Side Impact Crash Test aa 50km/h (v4.1) Driver
	Driver	Passn	
Head			
- HIC	237	193	13
- Acceleration (g for 3ms)	38	36	14.7
Neck			
- Shear (kN)	0.4	0.23	
- Tension (kN)	1.36	0.66	
- Extension (Nm)	14	12.4	
Chest			
- Acceleration (g for 3ms)			
- Compression (mm)	31.12	19.21	16.91
- Viscous Criterion (m/s)	0.17	0.05	0.08
Abdomen			
- Force (kN)			0.47
Pelvis			
- Force (kN)			0.87
Upper Legs Force (kN)			
- Left	2.79	3.42	
- Right	2.17	0.46	
Knee Displacement (kN)			
- Left	0.2	3.6	
- Right	0	1	
Lower Legs Force (kN)			
- Left	0.89	2.23	
- Right	2.08	1.33	
Index (Upper Lower)			
- Left	0.22 0.18	0.23 0.33	
- Right	0.33 0.16	0.36 0.27	

Bonus points (maximum 5)

Pole Test: 2 points
Seat Belt Reminders: 2

Modifiers for offset test scores

Head	No deduction
Chest	No deduction
Upper leg	Variable contact 0.5pt deduct L&R D, 1pt deduct L&R P
Lower leg	No deduction
Foot score	4 points
Structure	

Modifiers for side impact test scores

Head	
Chest	No deduction
Upper leg	
Lower leg	
Foot score	
Structure	



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