



Volvo Car Corporation

Press Information

Forty-year jubilee for Volvo's three-point safety belt

CONSTANT DEVELOPMENT - TO BE CONTINUED...

At Volvo, work on making driving and riding in cars as safe as possible is constantly moving forwards. Solutions are being worked out, developed, evaluated, rejected or applied and eventually used to the benefit of Volvo customers. Sometimes these are small details, sometimes they are far-reaching revolutionary innovations. The one thing they have in common is that the purpose throughout is to improve their function and to improve safety.

Over the years, a large number of technical innovations have appeared in Volvo cars, particularly when it comes to safety. Many of them have been real world firsts, others have perhaps not been so spectacular, but have made an important contribution to making cars even better and safer. Here is a list of some of the innovations that have benefited all who drive or ride in a Volvo car, no matter where in the world.

Safety innovations in Volvo cars:

- 1944 - Laminated windscreen
- 1956 - Split safety steering column
- 1956 - Padded dashboard
- 1957 - Anchorage points for two-point belts at front
- 1958 - Anchorage points for two-point belts at rear
- 1959 - Three-point belt standard in front seat (Nordic markets)
- 1965 - Power-assisted brakes with pressure-relief valve
- 1965 - Volvo's child safety research begins
- 1966 - Disc brakes on all four wheels and dual-circuit triangle-split braking system
- 1966 - Crumple zones front and rear
- 1966 - Collapsible steering column
- 1966 - Safety door locks
- 1967 - Three-point belt standard on outer rear seats
- 1968 - Head restraint in front seats
- 1969 - Inertia-reel belts standard at front
- 1969 - Electrically-heated rear window
- 1972 - Belt reminder lamp
- 1972 - Standard inertia-reel belts rear
- 1972 - Child safety seat

1972 - Child safety locks in rear doors
1973 - Side impact protection
1973 - Collapsible safety steering wheel
1973 - Energy absorbing bumpers
1974 - Isolated fuel tank protected from rear impact
1975 - Day-running lamps
1975 - Warning lamps (hazard)
1979 - Windscreen washers/wipers
1982 - Safety belt combined with "anti-submarining" guard
1982 - Foglamps front and rear
1982 - Wide-angle rear-view mirror
1982 - Warning lamps in door-ends
1982 - Fuel tank positioned in front of rear axle
1984 - Anti-locking brakes - ABS
1985 - Electronic anti-spin system - ETC
1986 - Complete range of child safety seats
1986 - Eye-level brake lamp
1986 - Three-point inertia-reel belt in rear seat
1987 - Mechanical belt tensioners in front seat
1987 - Airbag for driver
1990 - Integrated child booster cushion in rear-seat armrest
1991- Side Impact Protection System - SIPS
1991- Self adjusting belt-reels in front seat - ARH
1992 - Reinforced rear seat in estates
1992 - Airbag for front passenger
1993 - Rear seat with fully integrated three-point inertia-reel belt with adjustable head restraints on all three seats in the Volvo 850 Estate
1994 - Side airbag in front seats - SIPS bag - supplements the SIPS system
1994 - Volvo Digital Accident Research Recorder - DARR
1996 - Force limiters to control the roll-out speed of the belt
1997 - Inflatable curtain - IC - supplements the SIPS system (prototype)
1997 - Whiplash Protection Study - WHIPS (prototype)
1997 - Automatic roll-over protection - ROPS - in the Volvo C70 Convertible
1998 - Inflatable Curtain - IC - standard in the Volvo 580
1998 - WHIPS seat with built-in whiplash protection mechanism standard in Volvo S80
1998 - Improved airbag with extended protection (head/chest)
1999 - To be continued...