Vehicle Safety Policy - Swedish Transport Administration

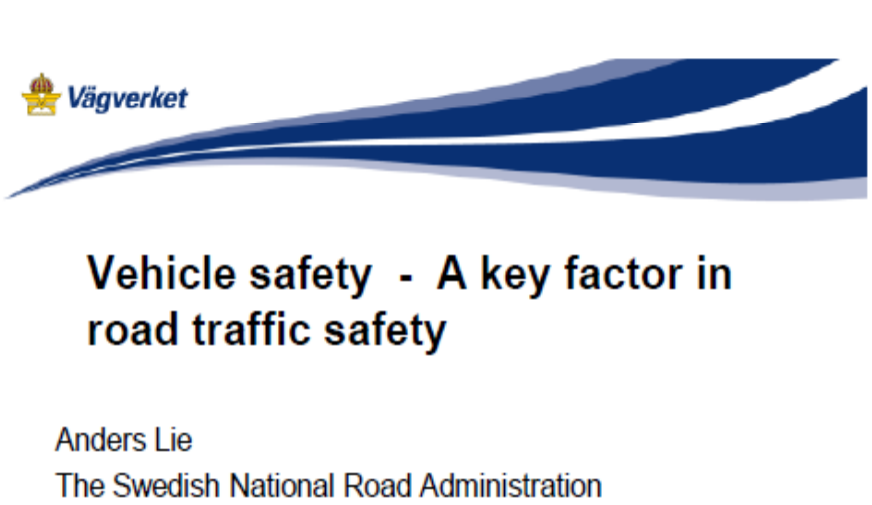
Anders Lie
Specialist,
Traffic Safety Division

TRAFIKVERKET

PRAISE
Work-Related Road Safety

ETSC
European Transport Safety Council

1 April 2010 The Swedish Transport Agency started and contains the operations of the previous administration





As a Governmental body we are leading in safety demands on our own transport

- Guided by Governmental Decree (2009:1) Environmental and Road safety
- Travel policy pushing further demands on vehicles
  - Lease vehicles
  - Short term rental vehicles
  - Private vehicles used on duty
- Demands on alcohol starter interlock on suppliers of transport and road maintenance services
- Active in the development of ISO 39001 (Management System Standard for Traffic Safety



Travel Policy with Vehicle Environmental and Safety Demands

- First development in 2002. Demands on safety level and fuel efficiency
- Second generation 2005
- Third generation 2010 (Just decided)



Travel Policy with Vehicle Environmental and Safety Demands (2005)

Cars rented for less than 6 months must meet the following requirements:

- Be awarded 5 stars for occupant protection by Euro NCAP (pre 2009)
- Be equipped with an anti skid system (Electronic Stability Control, ESC)
- Be equipped with a seatbelt reminder on the driver seat that meets Euro NCAP requirements
- Protection against whiplash injury shall be assessed as at least a “yellow” on the SRA system or as “acceptable” in a Thatcham dynamic test.
- Mass between 1000-1500kg for normal car, 1000-1700kg for large car.

Travel Policy with Vehicle Environmental and Safety Demands (2005)

Cars rented for more than 6 months must also meet the following requirements:

- Be awarded at least 2 stars for pedestrian protection by Euro NCAP
- Be equipped with an alcohol ignition interlock
- Be equipped with an informative or supportive Intelligent Speed Assistance system (telling the local speed limit and/or issuing a warning if this is exceeded)

Energy efficiency (all cars):

- Normal car maximum 6,7 litre petrol or 6,0 litre diesel/100 km.
- Larger car (3–5 people) maximum 8,0 litre petrol or 7,2 litre diesel/100 km.
- Big car (More than 5 people) maximum 9,2 litre petrol or 8,2 litre diesel/100 km.

Travel Policy with Vehicle Environmental and Safety Demands (2010)

Cars rented for less than 6 months must meet the following requirements:

- Be awarded 5 stars for occupant protection by Euro NCAP (pre 2009)
- Be awarded 31,5 points for occupant protection by Euro NCAP (2009)
- Be awarded 14 points for pedestrian protection by Euro NCAP (2009)
- Be equipped with an anti skid system (Electronic Stability Control, ESC)
- Be equipped with a seatbelt reminder on the driver and passenger seats that meets Euro NCAP requirements
- Protection against whiplash at least 2 points Euro NCAP
- Mass between 1000-1600kg for normal car, 1000-1900kg for large car.

Travel Policy with Vehicle Environmental and Safety Demands (2010)

Cars rented for more than 6 months must also meet the following requirements:

- Be equipped with a seatbelt reminder on the driver, passenger and rear seats that meets Euro NCAP requirements (3 points)
- Be equipped with an alcohol ignition interlock
- Be equipped with an informative or supportive Intelligent Speed Assistance system (telling the local speed limit and/or issuing a warning if this is exceeded)

All Vehicles Controlled by the Government

Decree (2009:1) Environmental and Road safety Purchasing demands on governments (state agencies, administrations) vehicles and travels

Started as only environmental decree, evolved with safety demands in 2009

- **Environmental and safety demands on cars bought, leased and used by governmental bodies**
- **Alternative fuels, low CO2 emissions, low in particulates**
- **Alcolock (at least 75% of the fleet)**
- **Crash safety occupant protection (32,5 points Euro NCAP/5 stars)**
- **Crash safety pedestrians (9,5 points Euro NCAP/1 star)**
- **Antis skid system (ESC)**
- **Seat belt reminder (de facto in Euro NCAP 32,5 points)**

(Euro NCAP tested cars or certificate from manufacturer, Swedish Transport Agency has the responsibility to check and support)

All Vehicles Controlled by the Government

Decree (2009:1) Environmental and Road safety

(Developments because of new Euro NCAP system 2009 / minimum intervention)

–31,5 points Occupant protection Euro NCAP 2009+

–2 points whiplash protection

–Seat belt reminder front seats

–Alternative fuels, low CO2 emissions, low in particulates

–Alcolock (at least 75% of the fleet)

–Crash safety pedestrians (9,5 points Euro NCAP/1 star)

–Stability Control System (ESC)

–Euro NCAP is and should be a moving target

New technologies with high potential

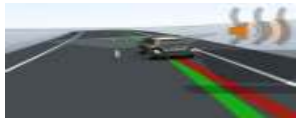
- Impaired driving (alcohol / fatigue)
- Seat belt reminders (~50% unbelted in fatal accidents)
- Speed limit recognition and driver support (Speed Alert /ISA)
- Autonomous emergency braking
- Lane departure warning/assistance











Alcolocks – 10 years of systematic work with two parallel areas

As..
an alternative to driving licence
revocation
a quality assurance of transports

Results 2008:

23 % of municipalities and 18 % of county councils have stipulating the need for alcolocks when purchasing new vehicles

50.000+ alcolocks installed

Sweden; municipalities 290. County councils /Regions 20







Trends in business life

- Brand name more and more important

- Prepared to take responsibility (Corporate Social Responsibility)

- Want to act transparent and open to public









Road safety trends in business

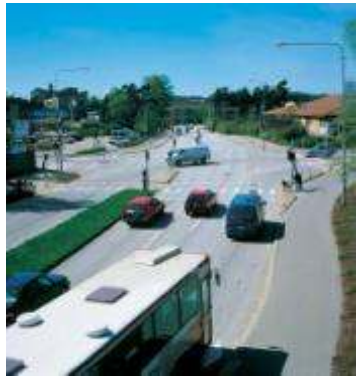
- Travel policies
- Purchasing demands on products and services
- Labelling systems
- Systematic work: ISO 39001

The road transport system is an open and complex system…

- Infrastructure
- Vehicles
- Road
- Transportation of goods and passengers
- Road users during the execution of their duties
- Corporations and organizations

- Regulatory framework
- Monitoring
- Etc..









…This is where ISO 39001 comes in!

The vision behind ISO 39001



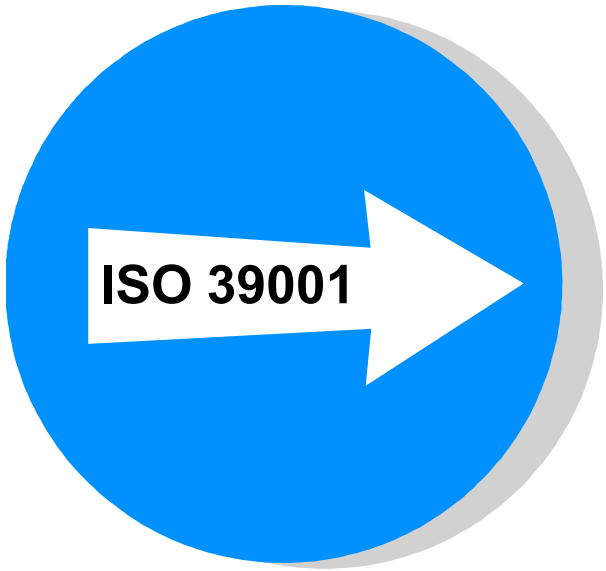
GLOBAL STATUS REPORT
ON ROAD SAFETY
TIME FOR ACTION
World Health Organization

- Elimination of death and serious injury in the road transport system is the overarching goal.
- A voluntary and complementary tool to legislation, addressing all organizations interfering with road traffic and driven by the needs of interested parties, including market forces.
- An approach to utilize and disseminate ”best practice”.
- Knowledge transfer from Traffic safety experts to the intended user community of the standard.

On the road to ISO 39001

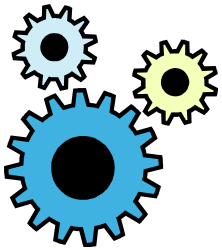
- Road Traffic Safety (RTS) management systems

- Work item approved by ISO ballot among ISO member countries January 2008.
- ISO Project Committee, ISO/PC 241, established by ISO Technical management board February 2008
- Secretariat allocated to Swedish Standards Institute.
- ISO 39001 to be published at the end of 2011.
- Chairman of ISO/PC 241 Claes Tingvall, Director Road Safety, SRA – Swedish Road Administration.



An ISO management system standard …

- is a voluntary tool for organizations to work systematically with specific issues (Environment, Quality, Food safety, Road Traffic Safety etc.).
- is often based on the concept of *continual improvement* – PDCA cycle and *process approach.*
- does not specify any specific technical solution or minimum requirements and is flexible and adaptable to the needs and resources of each specific organization







Members of ISO/PC 241

Participating members

- Argentina
- Armenia
- Australia
- Canada
- China
- Colombia
- Finland
- Germany
- Italy
- Japan
- Jordan
- Korea
- Malaysia
- New Zeeland
- Nigeria
- Philippines
- South Africa
- Sweden
- Switzerland
- Thailand
- United Kingdom

Observing members

- Bulgaria
- Cyprus
- Czech Republic
- France
- Israel
- Netherlands
- Singapore

Liaison organizations

- ISO/TC 22, Road Vehicles
- ISO/TC 211, Geographic information/Geomatics
- Global Road Safety Forum (GRSF)
- Global Road Safety Partnership (GRSP)
- World Health Organization (WHO)
- World Bank (WB)
- The International Transport Forum (ITF/OECD)
- International Association of Oil & Gas producers (OGP)
- UN Economic Commission for Europe (UNECE)
- European Transport Safety Council (ETSC)
- The International Road Federation (IRF)

The “architecture” of ISO 39001 draft standard

- The overall structure and content aligned with ISO management systems
- Clause 4. Top management responsibilities and commitment
  - concept adopted from ISO 9000 and ISO 31000
- Clause 5.2. Organizational context related to RTS
  - adopted from ISO/TMB/JTCG “Joint vision” and ISO 31000
- Clause 5.4.1.1 RTS performance factors
  - reflects common experience and knowledge in the field of road traffic safety
- Clause 5.6.3.1. Incident investigation
  - partly adopted from OHSAS 18001

- the “marriage” between ISO world and Traffic Safety expertise

Top management responsibilities and commitments

- Focus on health and prevention of loss of life
- Focus on results
- Leadership
- Partnership and collaboration
- Process approach
- Continual improvement
- Transparent and inclusive process
- Tailored implementation
- Part of decision making
- Emergency response
- Responsibility
- Capacity
- Compliance with statutory and regulatory requirements

RTS performance factors

- a) Risk exposure factors
  - Traffic volume and traffic mileage by vehicle and road user type
  - Product/service volume provided by the organization
- b) Final safety outcome factors
  - Deaths and serious injuries
- c) Intermediate safety outcome factors

RTS performance factors

(c) Intermediate safety outcome factors

- 1. The safe planning, design, operation and use of the road network
  - Road design and safe speed
  - Use of appropriate roads
  - Use of personal safety equipment
  - Safe driving speed
  - Fitness of drivers especially considering fatigue, alcohol and drugs
  - Safe journey planning including consideration of the need to travel, the amount and mode of travel and choice of route
- 2. The safe entry and exit of vehicles and road users to the road network
- 3. The recovery and rehabilitation of crash victims from the road network

Conclusion / Key findings

A shared vision **=> new ideas and solutions, shared responsibility**

Targets, monitoring **=> systematic follow up, realism**

Collaboration **=> less conflicts / confrontations**

Road safety in enterprises = **crucial to create effects**

Automobile industry/Road administration = **important**

What Can a Country/Organisation/Company do to Promote Safer Vehicles

- Use travel policies
- Look at management systems (ISO 39000)
- Include vehicle safety in the traffic safety work
- Support Euro NCAP and actively use the results
- Support every organisation that want to focus safety
- Be the market (Everyone must only buy....)
- Get occupational health and safety on-board
- Follow up new technologies (to give advice)

Thank You!



Anders Lie
Traffic Safety Division

Direct: +46 243 750 17

Trafikverket
Swedish Transport Administration
S-781 89 Borlänge
Röda vägen 1
www.trafikverket.se