

# International transport of dangerous goods by road

ADR Agreement  
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Ulaanbaatar, 28 June 2017



**UNECE**

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# ADR

- Agreement

- Done in September 1957
- Entered into force on 29 January 1968
- General principles for acceptance of dangerous goods in international transport by road
- Conditions for derogations (special agreements)
- Conditions for application of additional rules (for reasons other than safety during transport)
- Solving disputes

- Protocols of amendments

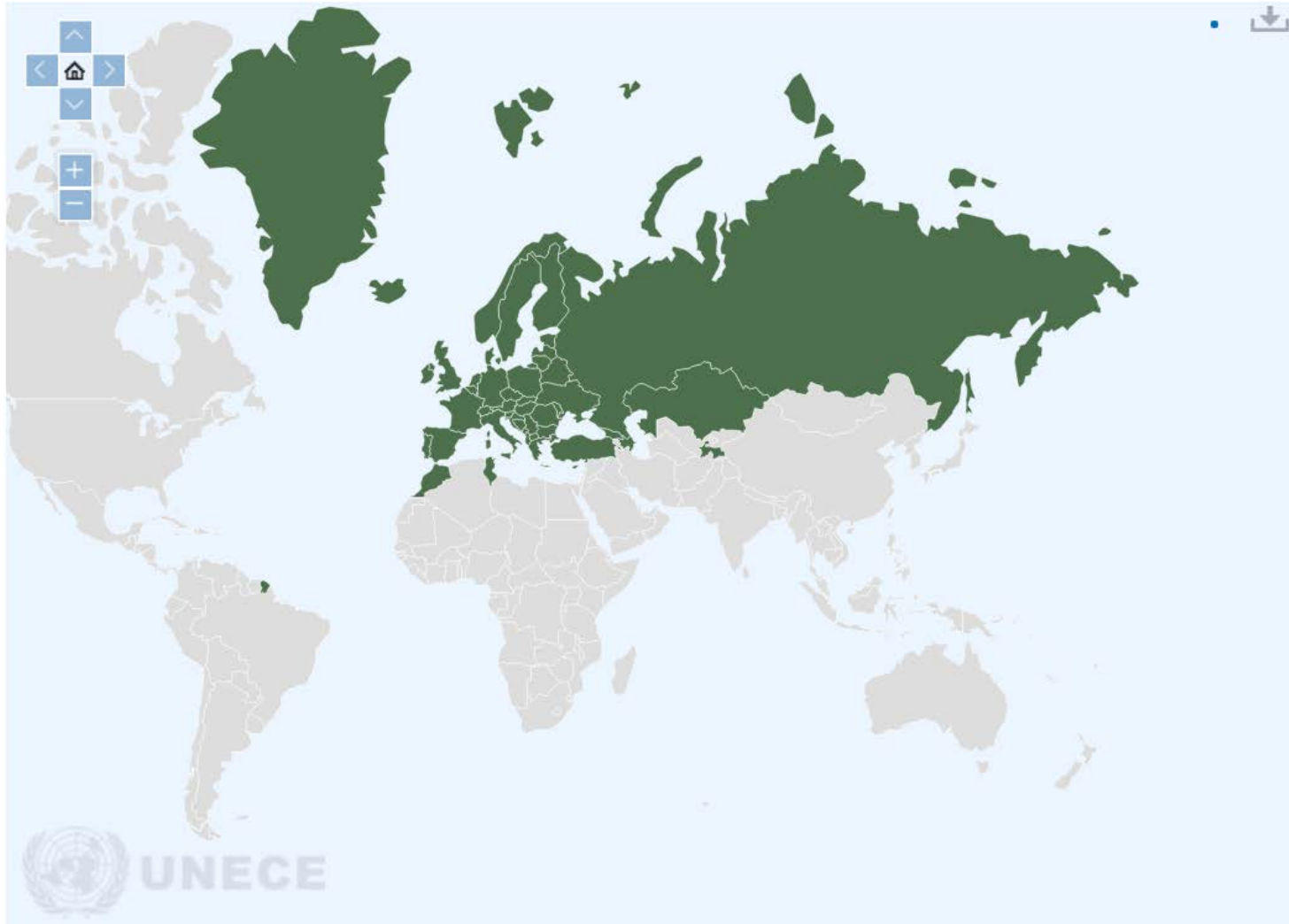
- Annexes A and B

- Regularly amended since 1968 (last edition 2017)
- Annex A: Conditions specific to the goods (packing, labelling, classification) (Parts 1 to 7)
- Annex B: Conditions specific to vehicle construction, equipment and operation (Parts 8, 9)



# Scope and application

49 Contracting Parties



# Contracting parties

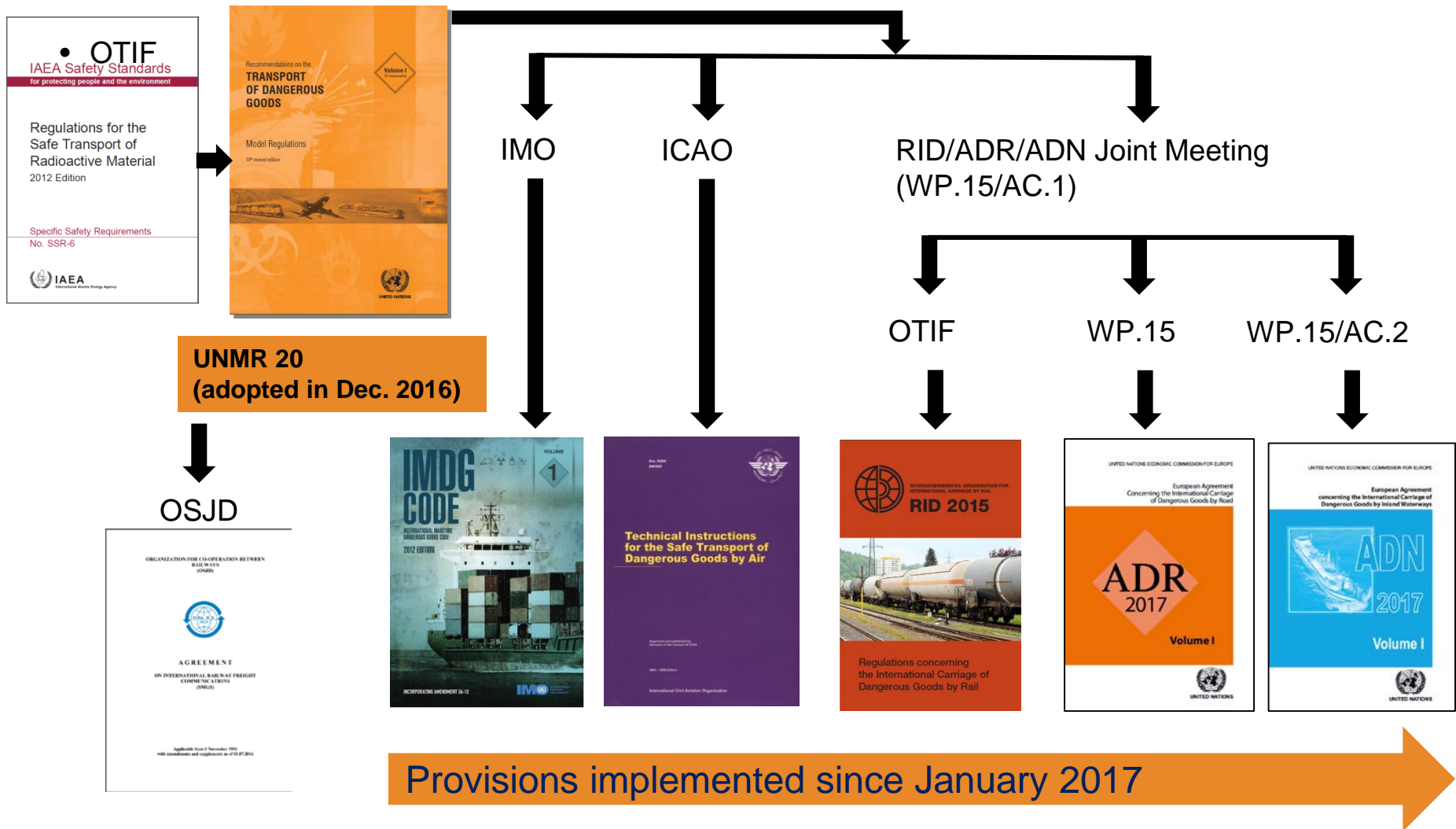
- 49 Contracting Parties
  - All European Union (EU) and most non-EU European countries
  - 2 non-European countries (North Africa : Morocco and Tunisia)
- Open to all UN Member States
- Geographical extension linked to territorial proximity
- National application in some countries (Thailand, South America)

# Advantages

- Annexes harmonized with other modal regulations (sea, air, rail)
- Border-crossing and transit facilitation
- Mutual trust and cooperation between Contracting Parties
- High level of safety, without excessive burden for countries

# Advantages

## Multimodal harmonization



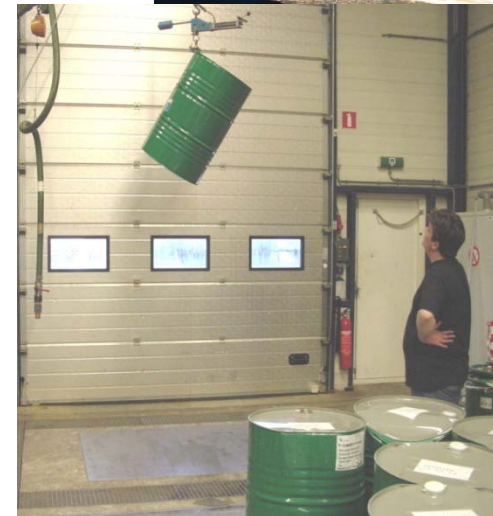


# Multimodal harmonisation

## General provisions based on the UN Model Regulations

### Annex A

1. General
2. Classification
3. List of Dangerous Goods
4. Use of packagings/Gas receptacles/Tanks
5. Consignment procedures (Labelling, Marking, Documents)
6. Construction, testing and approval of packagings/tanks
7. Transport operations





# Provision specific to road transport

General provisions based on the UN Model Regulations

## Annex B, Part 8-9

Provisions concerning transport equipment and transport operations:

- Vehicle crew, including training
- Operation and equipment
- Supervision of vehicles
- Road tunnel restrictions
- Construction, approval and inspections of vehicles



# Advantages

## Facilitation of international road transport

Agreement: article 2

Dangerous goods barred from carriage by Annex A not accepted for international transport (very few; only extremely dangerous goods)

Other dangerous goods authorized subject to compliance with conditions of Annexes A and B (very wide range of goods of commercial importance)

Vehicles carrying dangerous goods in accordance with Annexes A and B must be accepted on the territory of all transit and destination countries which are Contracting Parties



# Advantages

## Facilitation of international road transport

### Reservations in articles 4 (1) and (5)

#### Article 4 (1)

Each Contracting Party retain the right to regulate or prohibit, for reasons OTHER than safety during carriage, the entry of dangerous goods on its territory.

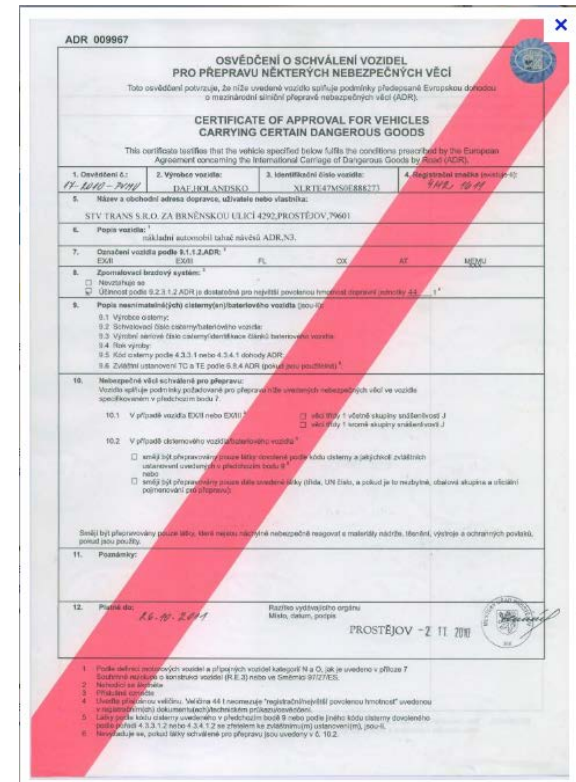
#### Article 5

Transport operations shall remain subject to national or international regulations applicable in general to road traffic, international road transport and international trade.

# Advantages

## Mutual recognition of certificates

- Packaging certificates
- Vehicle certificates
- Tank certificates
- Driver training certificates

# Advantages

## Trust and confidence

- Mutual trust between contracting parties
- Framework for administrative controls (section 1.8.1)
  - Without endangering persons, property or the environment
  - Without major disruption of road services
- Mutual administrative support (section 1.8.2)
  - Dialogue and communication between Competent authorities
  - Participation in WP.15
- Procedure for solving disputes (Article 11)
- Possibility of concluding multilateral/bilateral agreements





# Advantages

## Safety and Security

- How to provide a high level of safety
- Prevent accidents to persons and property and damage to the environment during loading, unloading, transport
- Keep the effects of an accident as low as possible





# Advantages

## Safety and Security: Dangerous goods

Starting point: the dangerous goods

- Classification in accordance with the UN Model Regulations
- Identification of the goods with the UN Number which is recognised internationally
- Identification of the danger with the danger labels
- Packagings and tanks meet the UN Model Regulations requirements or requirements harmonised between ADR and RID/SMGS

# Advantages

## Safety and Security: Vehicles and equipment

### Construction requirements for vehicles and tanks:

- Tanks: design criteria for shells, minimum thickness, service equipment and safety devices
- Vehicles: Approval required for carriage in tanks and carriage of explosives, electrical equipment, breaking equipment, prevention of fire, speed limitation device

### Prescriptions for the equipment:

- Fire-fighting equipment
- Personal protection

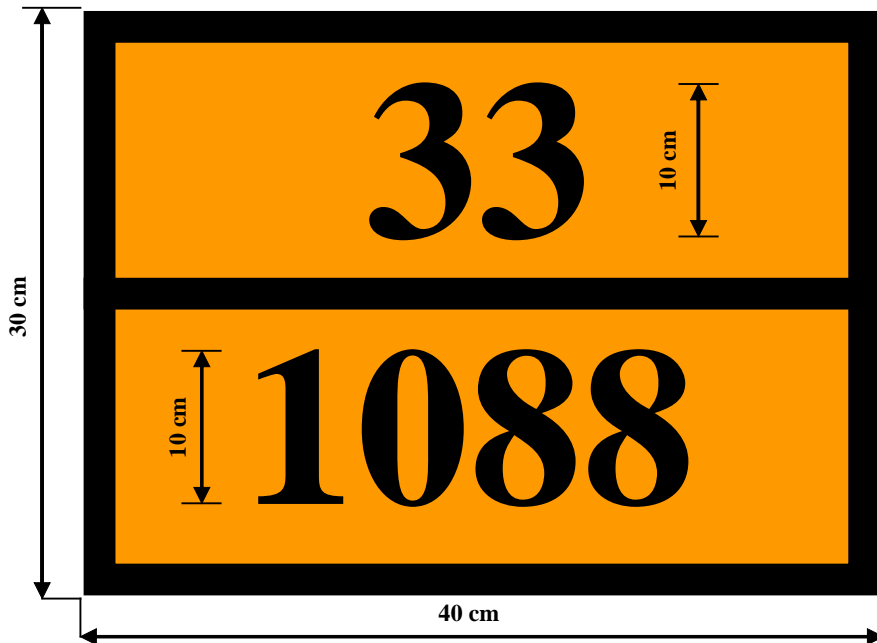


# Advantages

Safety and Security: Vehicles

Identification of the danger: orange plate marking

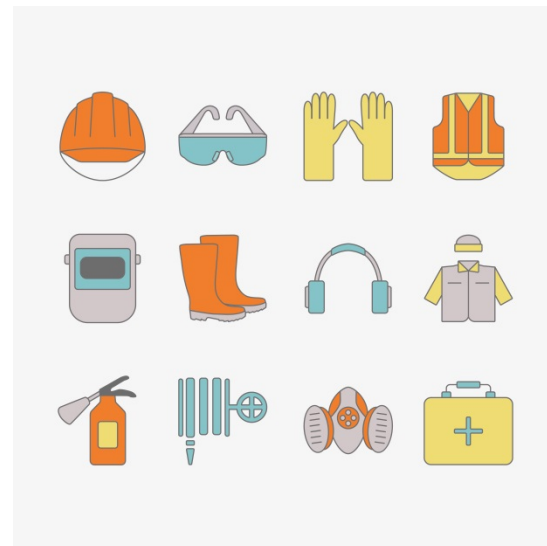
Identification of the type of danger: placarding





# Advantages

## Safety and Security: Vehicle crew

Additional equipment adapted to the goods transported: gloves, eye protection, emergency escape mask



## Instructions in writing

Danger labels and placards (1)	Hazard characteristics (2)	Additional guidance (3)
Oxidizing substances  5.1	Risk of vigorous reaction, ignition and explosion in contact with combustible or flammable substances.	Avoid mixing with flammable or combustible substances (e.g. sawdust).
Organic peroxides  5.2	Risk of exothermic decomposition at elevated temperatures, contact with other substances (such as acids, heavy-metal compounds or amines), friction or shock. This may result in the evolution of harmful and flammable gases or vapours or self-ignition.	Avoid mixing with flammable or combustible substances (e.g. sawdust).

# Advantages

## Safety and Security: Appropriate behaviour

### Training of drivers

- Know the goods and their danger
- Preventive and safety measures
- What to do in case of an accident (first aid, road safety, basic knowledge about the use of protective equipment, instructions in writing)
- Marking, labelling, placarding and orange-coloured plate marking
- What a driver should and should not do during the carriage of dangerous goods
- Prohibitions on mixed loading
- Precautions during loading and unloading, handling and stowage
- Traffic restrictions in tunnels and instructions on behaviour in tunnels
- Security awareness



# Advantages

## Safety and Security: Dangerous goods safety adviser

Required for undertakings with the following activities: carriage, packing, loading, filling or unloading of dangerous goods

Certificate issued by the competent authority after training and examination

Role of the DGSA:

- Help to prevent the risks
- Know the regulations
- Advisory services
- Annual report on activities related to transport of dangerous goods

Exemption for small activities



# Advantages

## Safety and Security: Obligations for the participants

- All participants in the carriage of dangerous goods
  - Consignor, carrier, loader, filler, ...
- Safety obligations: clear identification of the duties of the participants in the transport chain
- Training appropriate to the responsibilities and duties
  - General awareness
  - Function-specific training
  - Safety training: safe handling and emergency procedure

# Working Party on the TDG (WP.15)

## Amendment procedure

Agreement: Review Conference

Annexes:

- Proposal by one Contracting Party to other CPs through depositary
- Acceptance if no objection from  $\geq 5$  CPs 3 months after notification

**BUT**

Protocol of signature recommends that amendment proposals be submitted first to meeting of experts of:

- All CPs
- If necessary UNECE countries which are not CPs
- Transport International Organisations
- NGOs



**WP.15**

# Working Party on the TDG (WP.15)

- Develop and update ADR
- Encourage the accession of new countries
- Encourage participation in its activities
- Any country, that is member of the United Nations, may participate in its activities and is invited to accede to ADR
- Participants
  - Member countries of ECE and all ADR Contracting Parties: full participants
  - Any other Member of the United Nations: may participate in a consultative capacity
  - Specialized agencies, intergovernmental organizations and non-governmental organizations: consultative status



# Implications for Contracting Parties

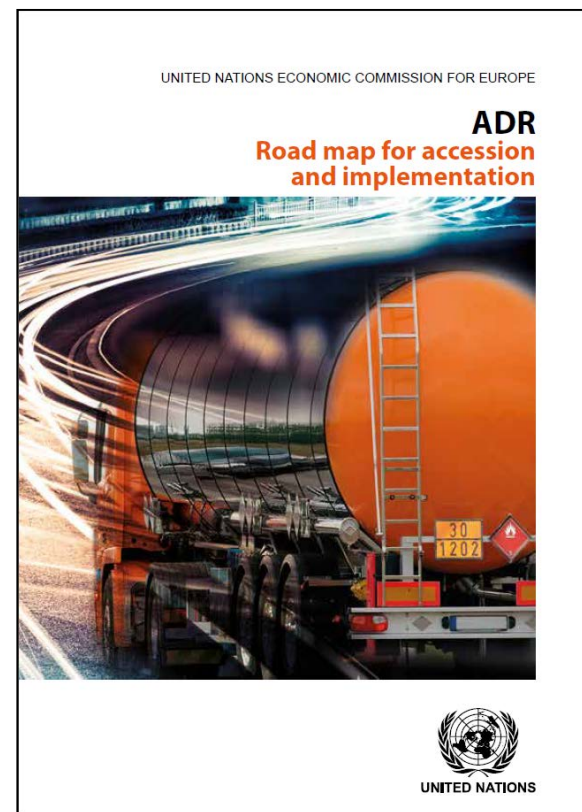
- Administrative procedures for:
  - packagings, tanks and vehicles approval/certificates
  - dangerous goods safety adviser certificates
  - driver training certificates
  - enforcement (controls and checks; penalties)
  - cooperation with other Contracting Parties
- Notifications to the UNECE secretariat
- Regular participation in the Working Party on the Transport of Dangerous Goods (WP.15)

# Implications for Contracting Parties

- Notifications to the UNECE secretariat
  - Driver training certificates
  - Contact details of the Competent Authorities, restrictions of circulation, tunnel classification
  - Instructions in writing
  - Multilateral agreements
  - Accident reports
- Information on WP.15 meetings
  - Schedule of meetings
  - Reports (may contain questions of interpretation)
  - Documentation for the sessions
    - Official documents
    - Informal documents

# Recommendations

- Apply the ADR Road Map for Implementation
- Establish administrative procedures for certificates
  - Packagings
  - Tanks
  - Vehicles
  - Training of drivers
  - Dangerous Goods Safety Advisers
- Participation in the sessions of WP.15
- Apply ADR also for national transports





# Thank you!



<http://www.unece.org/trans/danger/danger.htm>

[http://www.unece.org/trans/danger/publi/adr/adr\\_roadmap.html](http://www.unece.org/trans/danger/publi/adr/adr_roadmap.html)