



INF.6
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Report on prevention and mitigation of freight train derailments - for information -

Emmanuel Ruffin
Safety Unit



EC mandate (2009)

General

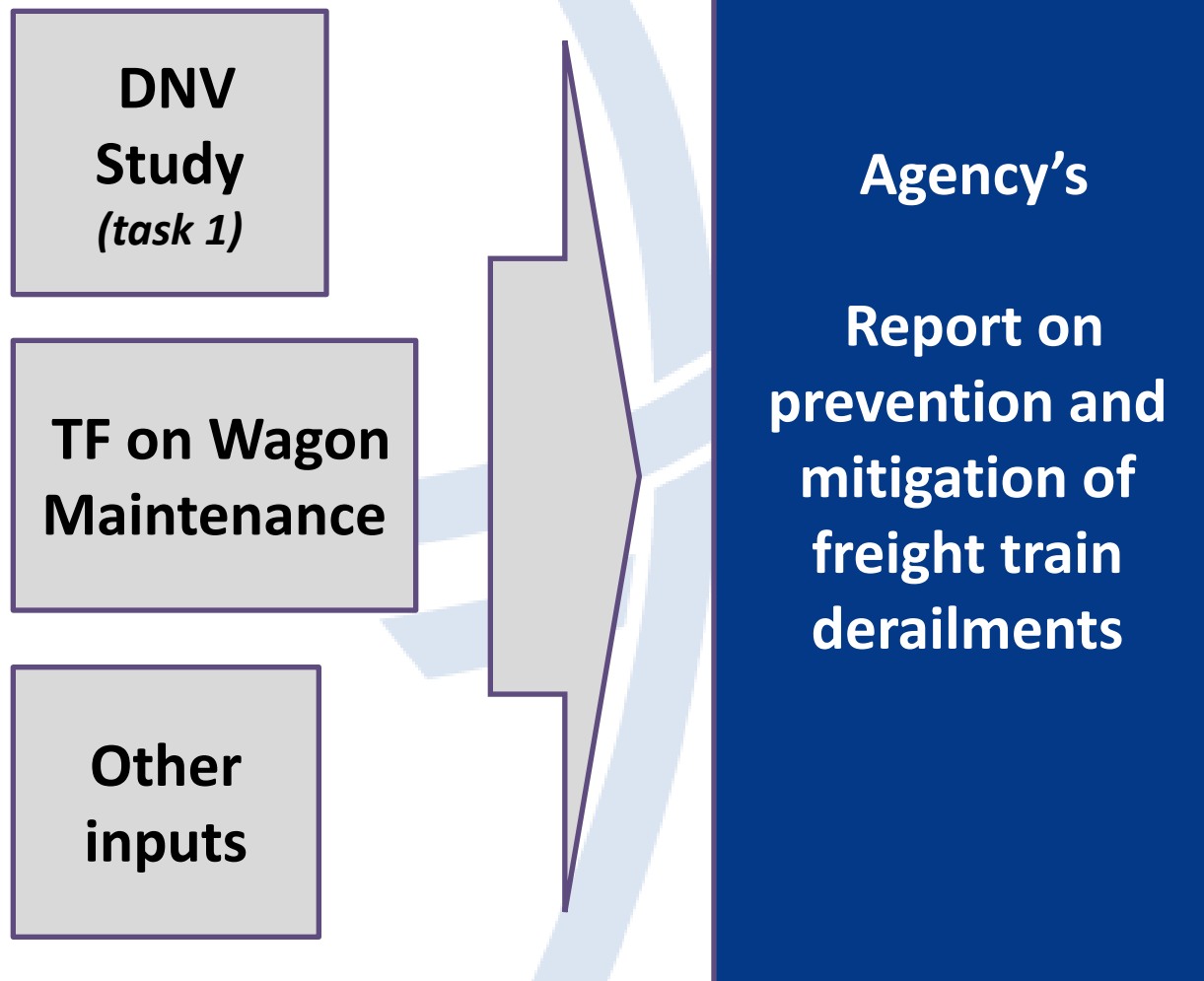
1. *Study on derailment **preventive measures which would lead to better impact assessment results** (than the device (DDD) assessed by the Agency in 2009)*

Specific to the Derailment Detection

2. *Study on the impact of false alarms and the level of reliability that should be imposed for the derailment detection device (DDD)*
3. *Market research on products that meet the DDD provision in its current version (and/or in the version modified)*
4. *Study on the impact of automatic braking in tunnels /bridges*
5. *Additionally, amend the TSIs need to be revised in order to include the technical requirements of such devices... (DDD or modified) ...and the corresponding conformity assessment/verification procedures*



Inputs to ERA's report





Review of DNV's findings

The Agency

- *Checked DNV's methodology,*
 - *Checked inputs and re-assessed DNV's findings,*
 - *Shared and discussed DNV's reports in two workshops (May and September 2011):*
 - *Representatives from RISC, TDG/EC, NSA, NIB, RID experts, CEFIC, CER, EIM, ERFA, UIC, UIP, UIRR, UNIFE were invited.*
 - *Received detailed comments from:*
 - *DK NSA, FI NSA, IT NSA, FR NIB, BE ECM, CER, CH FOT, RID WG TVT, UIC, Rail Cargo Austria, Knorr-Bremse*
- > General agreement on the high quality of the DNV's Study*



The Agency

- *Used relevant results from the DNV's study, including answers to detailed comment received from interested parties,*
- *Complemented with other relevant inputs*
- *Answered to the questions raised in 2009 by the RISC and ITDG EC Committee (Slide 2) – in the light of the new findings*
- *Put in perspective short/medium/long term measures*
- *Recommended on the most efficient risk reduction actions*
- *Sent its draft report for consultation of associations*



Consultation on ERA's report

Consultation from 20/01/2012 to 06/02/2012 of representative associations:

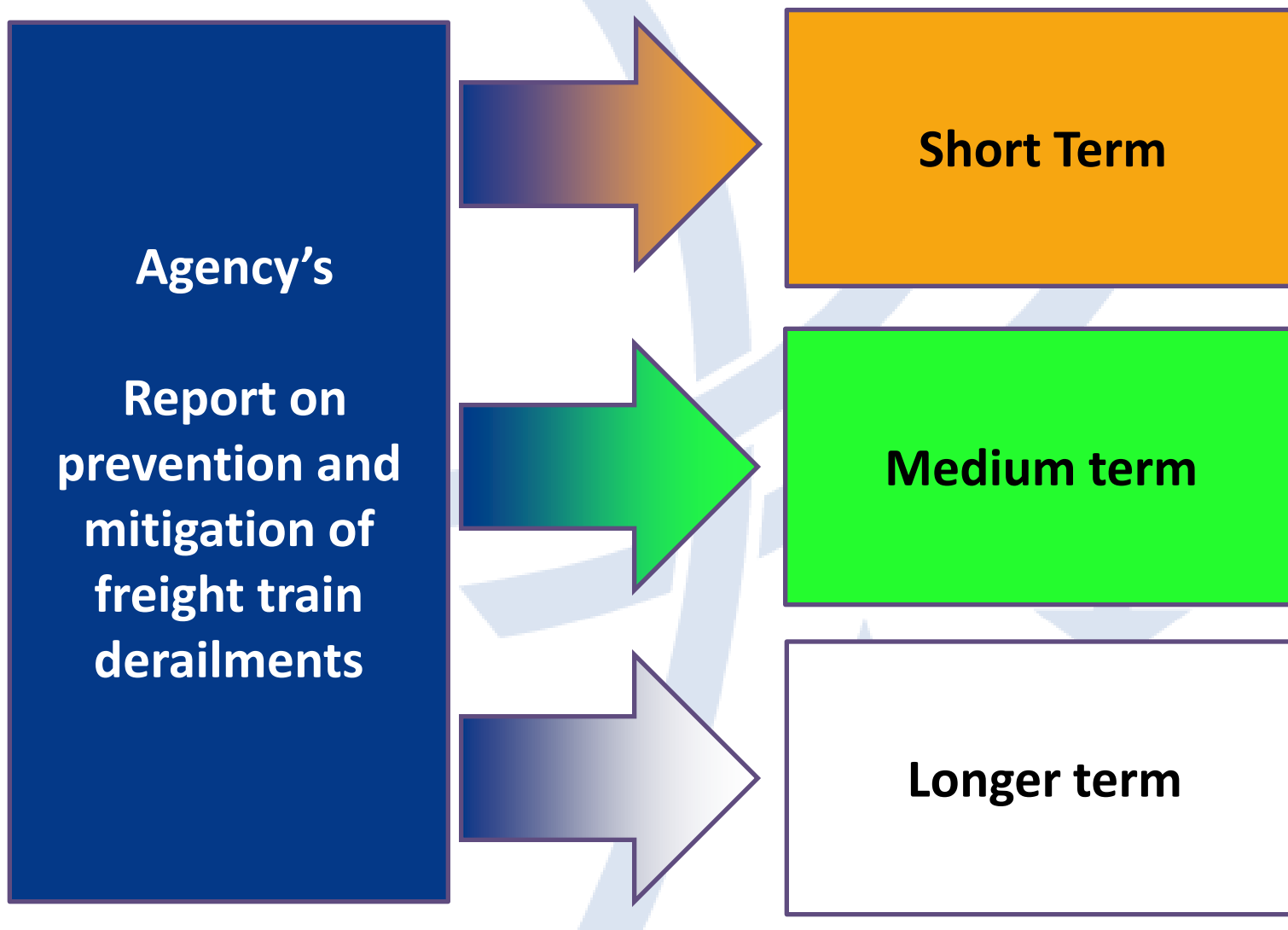
- CER, EIM, ERFA, UIC, UIP, UIRR and UNIFE

- Two answers: UIRR, CER

*-> **General agreement on Agency's conclusions**
including, detailed comments which support / do not
affect the general conclusions*



Main conclusions





Priority to SMS and maintenance systems

- 1. Priority is to make safety management system and maintenance system working better*
- 2. More efficient measures than the derailment detection are immediately practicable*
- 3. Derailment detection should be withdrawn from the RID*



Voluntary approach for (additional) technical measures

- 1. The Agency recommends a voluntary approach concerning four (4) technical measures assessed as being efficient at EU level (WLID/WIM, PRC, BHD, BAM).*
- 2. RUs & IMs must target efficient measures, as a result of
a) the implementation of their SMS,
b) taking into account company and country specific situations*
- 3. Priority is to make safety management system and maintenance system working better*



Longer term measures

1. *Improving knowledge on derailments combined causes*

For example:

- Wheel/Rail interactions
- Intervention limits concerning track quality

2. *Prepare future developments in IT systems for safety data monitoring and data networking*

For example:

- Harmonised real-time monitoring (quality of wagon/track/train composition)
- Harmonised safety-data exchanges (RUs, IMs & ECMs)

3. *Study potential changes in freight fleet design (combined add-values for logistics and safety improvements)*

For example:

- Increased use of central-couplings
- Wagons fitted with power supply and data transmission ...



Thank you for your attention

