Road Infrastructure Safety Management

Forbes Vigors

Project Manager Road Safety

National Roads Authority

Best Practices in Implementation

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Topics for discussion

• Article 4.
  • Road Safety Audits for Infrastructure Projects
• Article 5.
  • Safety Ranking & Management of the Road Network in Operation
• Article 6.
  • Safety Inspections
Art. 5 Network Safety Ranking

EU RISM
‘ranking of high accident concentration sections’ means a method to identify, analyse and rank sections of the road network which have been in operation for more than three years and upon which a large number of fatal accidents in proportion to the traffic flow have occurred;

S.I. 472/2011
“network safety ranking” means a method for identifying, analysing and classifying parts of the existing road network according to their potential for safety development and accident cost savings;

NRA HD 15
“network safety ranking” means a method for identifying, analysing and classifying parts of the existing road network according to their potential for safety development and accident cost savings;
NRA HD 15 – High Collision Location

1km Segment
Collision Rate Twice above average & 3 or more collisions
Team Qualifications

Assessment Team Member (ATM)

- At least one member of the Assessment Team will be a Chartered Engineer or equivalent with seven years post graduate experience with a minimum of five years in the design and construction of road projects and/or Road Safety Schemes, and will have two or more year’s experience of collision investigation and remedial measures.
- They will have taken part in ten road safety audits as a Team Member.
- They will hold a Certificate of Competence in Road Safety Audit.
1. Member States shall ensure that safety inspections are undertaken in respect of the roads in operation in order to identify the road safety related features and prevent accidents.

(1) The Authority shall ensure that safety inspections in respect of roads in operation are undertaken in accordance with guidelines issued by the Authority for that purpose.

An ordinary periodical verification of the characteristics and defects of an operational road that require maintenance work for reasons of road safety.
NRA HD 17 – Road Safety Inspections
<table>
<thead>
<tr>
<th>HAZARD</th>
<th>HAZARD 2</th>
<th>PROBLEM</th>
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<tbody>
<tr>
<td>Safety Barrier</td>
<td>Barrier terminal</td>
<td>Risk of an errant vehicle striking the ramped end</td>
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Team Qualifications

Inspection Team Leader (ITL)

- An Inspection Team Leader will be a Chartered Engineer or equivalent.
- They will have ten years post graduate experience with a minimum of seven years in the design and construction of Road Projects and/or Road Safety Schemes and will have two or more year’s experience of collision investigation and remedial measures.
- They will have taken part in ten road safety audits as team member, and will have a Certificate of Competence in Road Safety Audit.
Art 4. Road Safety Audits

**EU RISM**  
Member States shall ensure that road safety audits are carried out for all infrastructure projects.

**S.I. 472/2011**  
(1) Any person or body undertaking an infrastructure project shall ensure that—
(a) a road safety audit is carried out for that project, in accordance with guidelines issued by the Authority;

**NRA HD 19**  
Road Safety Audit:  
The evaluation of a road scheme during design, construction and early operation, to identify potential safety hazards which may affect any type of road user, and to suggest measures to eliminate or mitigate those problems.  
Road Scheme. A scheme designed in accordance with NRA DMRB which results in new road construction or permanent change to the existing road or roadside layout.
Team Qualifications

2.1 Audit Team Leader (ATL)
An Audit Team Leader will be a Chartered Engineer or equivalent with at least two years experience of collision investigation and remedial measures, will have a Certificate of Competence in Road Safety Audit and will have taken part in ten road safety audits as team member,
An Audit Team Leader will have completed as team member at least two audits of a similar category of scheme to that for which approval is being sought, and at least two audits of a similar stage.
They will also have done at least five road safety audits within the preceding three years.

2.2 Audit Team Member (ATM)
An Audit Team Member will be a road safety engineer, road design engineer or road traffic engineer.
They will have taken part as trainee in five road safety audits and will have attended an accredited three to five day course in road safety audit theory and practice.
NRA HD 19 Road Safety Audit

- Certification of Competence
- 10 day course
  - Road Infrastructure Safety Management in Ireland
  - Collision Data Recording and Analysis
  - Evaluation of Options
  - Economic Assessment
  - Scheme Options for Design
  - Road Safety Audits
  - Design Stage Audits
  - Post Opening Stage Audits
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Thank you for your Time