

Incident and Emergency Handling

Cross Country Organisational Issues in the UK – a reference for Europe

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Cross Country Organisational Issues in the UK – a reference for Europe

Incident detection objectives

STREETWISE experience

National standards/requirements

Traffic flows across TERN

Pan European requirements

Incident Detection Objectives

- Safety improvements
 - Inform drivers of incidents
 - Reduce secondary accidents
 - Reduce incident duration
- Traffic flow improvements
 - Quote typical figures for delay at an incident
 - Improved network efficiency
- Pan-European (common) experience

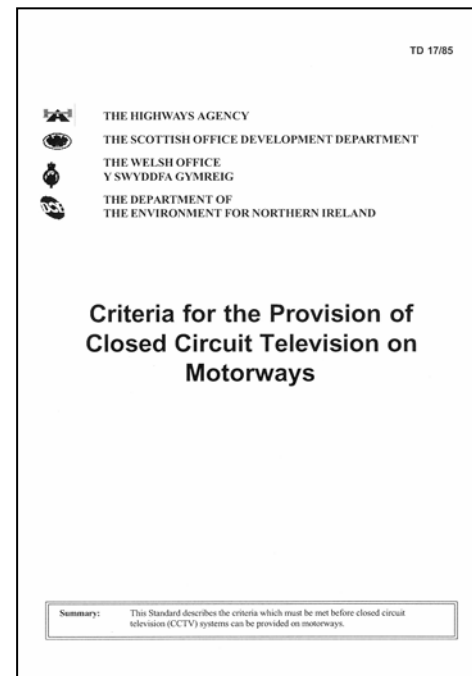
STREETWISE Experience

- DMRB principles applied in Republic of Ireland
- DMRB Compilation
 - Initial draft
 - National comment (Wales, Scotland & Northern Ireland)
 - Technical Design Notes/Technical Advice Notes
 - Country Addenda



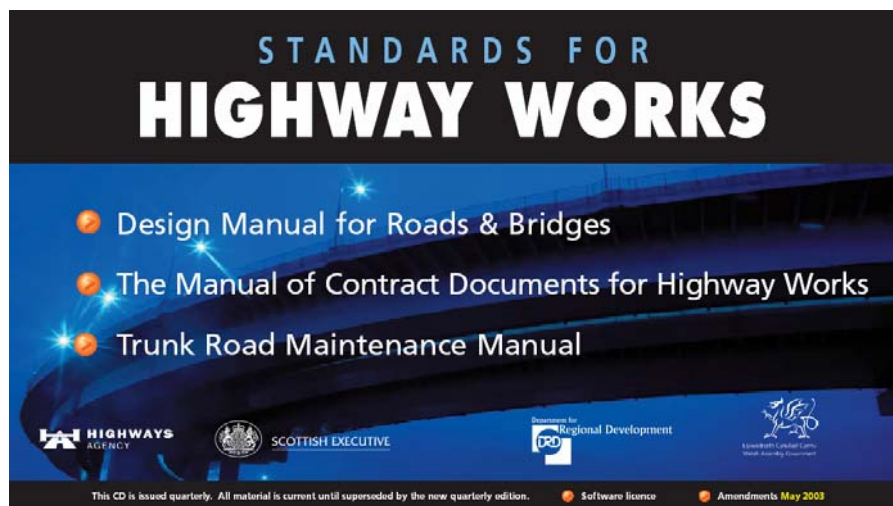
Incident Detection in STREETWISE

- Design Manual for Roads & Bridges
 - Incident Detection (CCTV/MIDAS/AID) - 10,000 vehs/lane/day
 - Triple Package (VMS/MIDAS/Motorway Comms.) - 15,000 vehs/lane/day



STREETWISE Experience

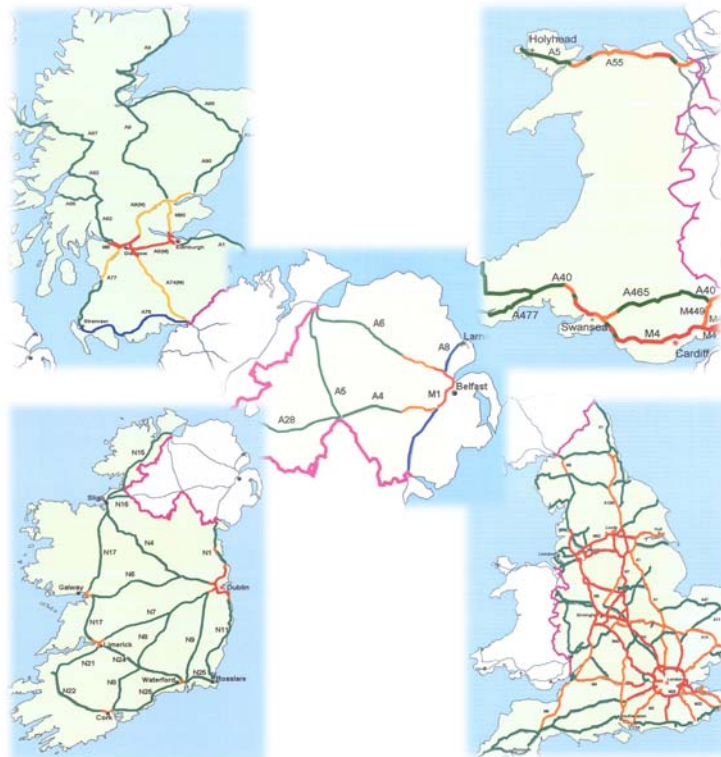
- Approach to rollout
 - Business case established for each deployment scenario
 - Common technology framework guidelines
 - Transferable business case applied
 - No need for individual site evaluation³



STREETWISE

- Traffic Monitoring Strategy
 - Category A - 43,001 - 168,000 vehs/day
 - Category B - 24,000 - 43,000 vehs/day
 - Category C - 0 - 24,000 vehs/day
 - Category P (Priority Route)
 - “Strategically important routes that either form part of the TERN or enable access to it”

STREETWISE - Traffic Monitoring Strategy



- Category A
- Category B
- Category C
- Category P

Pan-European Experience

Examples of Incident Detection Guidelines

- Viking
 - Developed a set of incident detection guidelines
 - Adopted by project partners
 - Defined by incident black spot or flow related delay
 - Different incident detection requirements by country
- Corvette
 - Defined by incident black spot or flow related delay
- ARTS (Spain)
 - Defined by incident black spot or flow related delay
 - Installation in tunnels
- SERTI (Italy)
 - Defined by road authorities/motorway companies/police

Incident Detection

Standards/Guidelines

- E-R project experience
 - Critical points on network
 - Flow related delay
- Adoption of TELTEN guidelines
 - VIKING
 - CORVETTE
- Criteria for implementation varies across Europe
- Common technologies for incident detection
 - Loops, radar, video
- Lack of generic business case due to:
 - Varying implementation criteria
 - Number of agencies involved

Common Incident Detection Standards

- Benefits of approach
 - Seamless traffic and travel information
 - Generic business case available
 - Transferable benefits
 - Simplifies implementation programme
 - Satisfies core E-R Project objectives
 - Unique situation in STREETWISE project
- Disbenefits of approach
 - Requires a common technology platform
 - May not allow for national network characteristics
 - Concentrates solely on heavily trafficked roads
 - Ignores incident blackspots
 - Pan-European agreement to standard

Pan European Requirements for Incident Detection

- Issues to be resolved
 - Reconciling national guidelines/practice to a common standard
 - Institutional agreement to guidelines
 - Common consent
 - Private road networks
 - Inclusion as part of contract requirements
 - Infrastructure requirements
- Should a common standard be adopted?