

# D/V-Rate

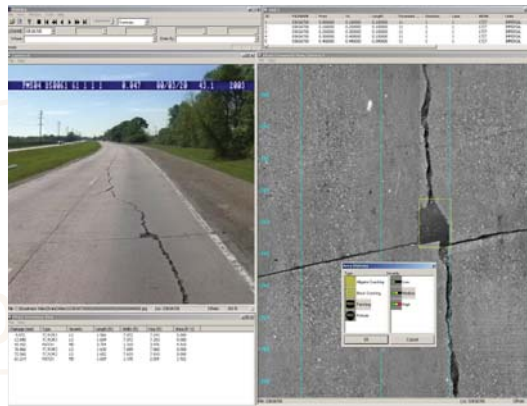
D/V-Rate is a process developed by Fugro Roadware to produce an inventory of visually assessable pavement distresses and roadway features. Using right-of-way and pavement view images, raters are able to perform pavement condition assessments in project-level detail or emulate windshield rating surveys from the office.

## D-Rate

Digital Rating (D-Rate) allows raters to define individual distresses and measurements with on-screen graphical representations of the rated features. The rater interacts directly with the pavement images using a point-and-click interface (mouse or alternate device). A customizable rating protocol allows users to assign labels and pre-define distress types as point, linear or area measured features, prompting the software to allow dot, line or box drawing as applicable. All rated distresses are saved by the D-Rate software and may be reviewed and/or edited at any time.

## Quality Control and Training

D-Rate allows for the implementation of 'rater layers' so that multiple raters may interact with a single section. Each layer is tagged with a rater ID so that all rated features are easily reviewed and inter-rater comparisons may be performed at-a-glance.



*Pictured here: D-Rate screen interface*

## V-Rate

Windshield rating may be emulated through the Visual Rating (V-Rate) functionality of D/V-Rate. While similar to D-Rate, V-Rate differs in that raters interact with the displayed images through the computer keyboard or optional rater board. Distress types and severities are assigned to user-defined keys and the rater inventories the appropriate distress while the displayed images take the rater on a virtual drive of the section in the controlled environment of the office. In addition to road condition assessments, pertinent features may also be marked, such as bridges, construction zones, shoulder types, etc. Keystrokes record the start and end or location of each feature. All rated features are displayed alongside the

## FEATURES

- Reports crack type, severity, extent and location
- Allows detection and analysis of cracks as small as 1 mm (0.03 in.)
- Graphical display of rated distresses for easy review and Quality Control
- Implements layers for multiple raters or passes
- Dual video cameras record 1.5 m by 4 m sections of pavement
- High intensity strobe lights produce consistent illumination of pavement images
- Eliminates hazardous and expensive on-site surveys
- Crack mapping can be done without disrupting traffic flow
- Interactive, symbiotic and open architecture design
- Helps agencies meet mandates for PMS data collection
- Compatible with most rating protocols including AASHTO and LTPP



Accurate,  
reviewable  
crack  
identification



Forward Imagery Display

Onscreen Record of Rated Distresses

Pavement Imagery Display

Specialized Rating Keyboard

Pictured here: D/V-Rate workstation

pavement images and may be reviewed at any time.

### Quality Control and Training

Raters have the capability of adjusting the playback speed and may 'speed up' through areas of minimal distress (increased efficiency) or 'slow down' through demanding areas (increased accuracy) as required. All rated features are displayed visually and may be reviewed and/or edited as needed.

### Distress Inventory

An Inventory of all rated features is maintained and updated in real-time. Selecting items in this inventory allows the user to 'go to' the selected item on demand.

## SYSTEM COMPONENTS

### Minimum Requirements:

Operating System: MS Windows 2000  
 CPU: Intel Pentium 2  
 Memory: 256MB  
 Monitor: SVGA resolution 1200x800

### Recommended:

Operating System: MS Windows XP  
 CPU: Intel Pentium 4  
 Memory: 512MB or greater  
 Monitor: SVGA resolution 1600x1200

## OUTPUT

D/V-Rate generates an MS Access database in real-time. The finished table may then be summarized by section or defined intervals.