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## CONTROLLED RELEASING TERMINAL PERFORMANCE

REFERENCE: Work Plan No. 86-R-5 ; Update U88-3

HISTORY: The features, installation and first winter's performance of this experimental terminal were reported in Update No. U88-3, January 1988. At that time the Controlled Releasing Terminal (CRT) had not been struck but had "fallen down" due to the weight of built up ice and snow from plowing operations.

STATUS Following repair of the CRT in late 1987 which was accomplished using off the shelf lock washers of a heavier gauge to replace the locking rings originally installed, there was no further damage until April of 1988. During the weekend of April 16-18 a vehicle, as yet unidentified, struck the CRT. The rail apparently released as designed and the twelve wooden posts broke off at ground level as they were designed to do. Six of the steel posts located immediately after the wooden posts were also bent. Many of the "Bendaway attachments" sustained damage also. It is possible that the heavier lock washers contributed to more attachment damage than might otherwise have been expected. The vehicle which struck the installation was apparently driven away. Because the vehicle was unidentified the angle of impact, speed and other questions remain unanswered at this writing. The amount of damage sustained by the CRT suggests that this vehicle may have been a large truck which would have the weight, bumper strength, and momentum to break the twelve wood posts, bend 6 steel posts and sustain a sufficiently small amount of damage to permit it to continue without assistance.

Because of the experimental nature of this installation which is a first nationwide and consists of two of the four CRTs produced by its manufacturer, replacement cost for components are not available at the time of this writing.

CONCLUSIONS The CRT performed its designed function of preventing the vehicle from striking an overhead sign support or crossing the median. Because the vehicle was able to leave the scene without reporting the accident it is reasonable to conclude that the CRT did this without excessive damage to the vehicle, roll over or "capturing" the vehicle.

FOLLOW UP The CRT repair and its cost will be monitored as will the difficulty of obtaining replacement parts.

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