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Highway Safety
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PROCEEDINGS:
TRAFFIC RECORDS WORKSHOP
DECKERS, COLORADO
September 17-20, 1973

The Committee on Traffic Records of the Transportation Research Board sponsored a Traffic Records Workshop on September 17-20, 1973, at the Lost Valley Ranch, Deckers, Colorado. Twenty-five persons from various disciplines and backgrounds in the fields of highway operations and safety attended the workshop and participated in a series of eight intensive working group sessions aimed at producing guidance on the utility and application of traffic records systems.



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Workshop Origin

Over the past several years, members of the Committee on Traffic Records have become increasingly aware of the need for improved communications relative to the management of traffic records systems. An effective traffic records system impacts on the broad field of highway operations and traffic safety.

Committee activities have revealed that many professionals, associated in the field of traffic records, have valuable experience and insights concerning the development and operation of records systems. One problem in bringing all resources to bear on the subject has been the lack of time for adequate information exchange at regular meetings of the Committee. The normal meeting seldom provides the time to document experience or to fully utilize the talents available. People in the traffic records field have had only limited opportunity to work together with their peers on substantive problems.

A Committee-sponsored workshop was proposed as an activity to help solve the communications problem. Members of the Committee, and other interested individuals were enthusiastic about the concept and general purposes of the workshop. The following sections summarize the planning that went into the workshop and the results obtained.

Purpose and Intended Output

The purpose of the workshop was to assemble a group of motivated and highly qualified professionals to interact in working sessions aimed at producing guidance on the utility and applications of traffic records systems. The workshop considered as its clients the professionals with responsibilities in the field of traffic records. In addition to the intangible value of the interaction among participants, the workshop was to produce one or a series of technical papers which will provide guidelines for the application and examples of the usefulness of traffic records systems in various areas.

Physical Arrangements

The workshop was held at the Los Valley Ranch, Deckers, Colorado. Participants working together were provided separate housing facilities that promoted interaction within the groups. Conference facilities where plenary sessions could be carried out were available and workshop participants usually ate and relaxed together.

Workshop Participants

Participation was by invitation only and invitations were given on the basis of current professional interest and work in the traffic records field. The 25 who accepted actually work in the field and, thus, a common background was provided. In addition, a conscious attempt was made to select professionals with suitable diversity and expertise in the traffic safety area. It was not required that attendees be members of the Highway Research Board or the Traffic Records Committee. About 40 percent of the attendees had responsibilities that involved both enforcement and engineering aspects of traffic safety. Another 40 percent were concerned with the engineering aspects only and the remaining, a mixture of both. In considering the agency for which the participants worked, about 18 percent came from the federal

government, about 25 percent from state government, about 11 percent from local governments, about 11 percent from universities, and the remaining 34 percent from private industry.

The names and affiliations of all attendees are listed in the Appendix.

Workshop Format

Perhaps the most important factor that governed the planning and organization of the workshop was that it was to be kept informal and unstructured. There would be no prepared papers and no lectures. At the outset, the participants were divided into small groups, each working on a specific topic of interest. Most of the workshop time was spent working in these small groups, which devoted themselves to substantive work accounting for the workshop's output. Plenary sessions enabled the participants to be guided on the direction of their work and to summarize progress and problems of all working groups and to comment and criticize. Before the end of the workshop, each group produced a draft report that summarized its work in a form appropriate for publication. These documents are the basis of these proceedings.

Workshop Topics

Each participant who had agreed to attend the workshop was sent a formal invitation, a description of the workshop concept and later, a series of ten workshop topic suggestions. These ten topics were as follows:

Topic 1 -- TRAFFIC RECORDS SYSTEMS, GENERAL FRAMEWORK

The overall question of definition of a traffic records system needs to be addressed. It should involve a simple definition of terms and be end-user oriented. As envisioned, the results of addressing this topic would provide the material necessary to introduce users to the concept of traffic records and put all the other topics addressed and examples presented in the proper context.

Topic 2 -- IDENTIFICATION AND SURVEILLANCE OF HIGH ACCIDENT LOCATIONS

State and local public officials have a responsibility to maintain accurate records of accident experience (i.e., both in terms of frequency and rate) at locations under their jurisdiction. Traffic records systems can be used effectively for this purpose. This topic involves developing guidelines on how best to meet these responsibilities under various constraints (i.e., time, money, etc.) and developing examples of the techniques that could be used and demonstrating the public benefits that can be achieved.

Topic 3 -- EVALUATION OF SAFETY IMPROVEMENT PROJECTS

With continuous emphasis on traffic safety improvements programs, the importance of traffic records systems to support evaluations of these programs has been enforced. Before-and-after studies have been used extensively. This topic involves examining the role of the traffic records system in the process, and identifying strengths and weaknesses of the application. Hopefully, examples of such applications can be developed to aid other traffic records system users.

Topic 4 -- ALLOCATION AND ASSIGNMENT OF ENFORCEMENT PERSONNEL

Traffic law enforcement can be an effective traffic safety tool. If properly applied, traffic records systems can be used to determine the time, location and type of enforcement action that should be employed. Examples of the effective use of records systems for this purpose should be developed and presented. The potential of integrating the records system into a more complete personnel management and evaluation system should be pursued.

Topic 5 -- HIGHWAY MAINTENANCE PROGRAMMING AND EVALUATION

Traffic records systems have been used extensively for maintaining records of highway geometrics and traffic control devices. These systems can be used effectively for programming special and routine maintenance of the highway system. The exact uses of the records system should be delineated and examples of best possible usage developed and presented.

Topic 6 -- EVALUATION OF ADJUDICATION PROCEDURES

In many cases, failures of the traffic records system to bridge the gap between the operating system and the courts have been evident. This aspect of traffic records system use needs careful consideration. Problems with different areas of responsibility (e.g., a municipality and the courts) need to be examined and methods for overcoming these problems pointed out.

Topic 7 -- DETERMINING THE NATURE AND MAGNITUDE OF THE TRAFFIC SAFETY PROBLEM

This application involves comparing general traffic safety experience with specific experiences in an area. Traffic records systems can play an important role in pointing out

trends. For example, does City A have a specific problem with bicycle accidents when compared with surrounding areas or a national average? Periodic applications of a records system or a combination of systems can be very valuable in this regard. Examples and frequency of application and pitfalls should be developed and presented to system users.

Topic 8 -- RESPONSE TO PUBLIC INQUIRIES

Accurate records for use in responding to the public can be very valuable. Often access to a good traffic records system can save a great deal of time for public officials. Examples of this application along with a general treatment of the type and accessibility of records for use in responding to the public should result from work in this topic area.

Topic 9 -- BUDGETING AND BUDGET SUBSTANTIATION

Traffic records systems have been used effectively for establishing and supporting traffic operations and safety budget requirements. Projecting budget needs for responding to changed standards (e.g., the new requirements stated in the Manual on Uniform Traffic Control Devices) could rely greatly on a traffic records system containing the proper information. This and other records systems applications to the budgeting process need to be addressed and requirements delineated.

Topic 10 -- HIGHWAY SAFETY RESEARCH

Traffic records systems have been used extensively to support many aspects of highway safety research. Examples of both good and bad applications are well known. The extent and methods to use records systems for research is the subject of this topic. There should be broad interest in the subject. Both highway and vehicle related research applications are to be included here.

Workshop participants were asked to:

- . Review each topic with the intent of modifying or improving the statement and description;
- . Add any new topics considered appropriate for consideration by the workshop;
- . Give all topics a rank order of importance in terms of those most appropriate to the purpose of the workshop; and
- . Indicate by rank order three topics the responding participant would like to work during the workshop as a member of a three to four man working group.

The responses of the workshop participants were analyzed and it was interesting to note that almost all responses could be structured to match one of the ten proposed topics. Information provided during the review was integrated and then later made available to the working groups.

A ranking of topics based on importance and participant interest was carried out that showed that the interest and importance rankings were closely related. The resulting topic rankings were as follows:

WORKSHOP TOPIC RANKING

<u>Interest</u>	<u>Importance</u>
GENERAL FRAMEWORK	GENERAL FRAMEWORK
PROJECT EVALUATION	PROJECT EVALUATION
IDENTIFICATION AND SURVEILLANCE	IDENTIFICATION AND SURVEILLANCE
NATURE AND MAGNITUDE	NATURE AND MAGNITUDE
SAFETY RESEARCH	SAFETY RESEARCH
ADJUDICATION	ENFORCEMENT
PUBLIC INQUIRIES	ADJUDICATION
ENFORCEMENT	PUBLIC INQUIRIES
BUDGETING	MAINTENANCE
MAINTENANCE	BUDGETING

As a result of the analysis, two topics, Highway Maintenance Programming and Evaluation, and Budgeting and Budget Substantiation, were eliminated. The eight remaining topics were addressed during the workshop.

Results and Future Directions

The primary beneficiaries of the Traffic Records Workshop were the participants. What they gained and what they will use from this experience is an individual matter. For the participants the primary benefit was the opportunity to work closely with professionals in the traffic records field. Each participant developed new personal relationships and information and communications channels have been opened. There is little doubt that significant professional growth has resulted.

Each group at the workshop produced a written paper documenting the results of its work. These papers have been reproduced and contained in these proceedings. It should be clear that the papers were created and written in a draft form during the two-and-one-half day duration of the workshop. Each paper is the output of a working group assigned to a topic. No major effort has been made to alter the work of the authors. The workshop concept was to use these papers as written at the workshop itself. Hopefully, these proceedings will be circulated and used both by the participants and other professionals in the traffic records field.

Chairman's Observations

It is hoped that the availability of the papers produced at the Traffic

Records Workshop will provide users of traffic records systems an overview of current thinking on the subject. As envisioned, these proceedings provide the basis for future work in this field. Obviously, the Workshop was considered an experiment. Overall, the participants indicate that it was a stimulating experience. Future workshops should be considered and the lessons learned here applied in other fields of highway transportation.