DEPAR

National Highway Traffic Safety Administration

[Docket No. NHTSA-2022-0108]

Agency Information Collection Activities; Submission to the Office of Management and Budget for Review and Approval; Request for Comment; Older Driver Rearview Video Systems

AGENCY: National Highway Traffic Safety Administration (NHTSA), Department of Transportation (DOT).

ACTION: Notice and request for comments on a reinstatement of previously approved information collection.

SUMMARY: In compliance with the Paperwork Reduction Act of 1995 (PRA), this notice announces that the Information Collection Request (ICR) summarized below will be submitted to the Office of Management and Budget (OMB) for review and approval. The ICR describes the nature of the information collection and its expected burden. NHTSA invites public comments about our intention to request approval from the Office of Management and Budget (OMB) for a reinstatement with modification of a previously approved information collection request exploring older drivers' use of rearview video systems (backing cameras). A Federal Register Notice with a 60-day comment period soliciting comments on the following information collection was published. NHTSA received comments from one organization, which we address below.

DATES: Comments must be submitted on or before [INSERT DATE 30 DAYS AFTER THE DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: Written comments and recommendations for the proposed information collection, including suggestions for reducing burden, should be submitted to the Office of Management and Budget at www.reginfo.gov/public/do/PRAMain. To find this particular

information collection, select "Currently under Review – Open for Public Comment" or use the search function.

FOR FURTHER INFORMATION CONTACT: For additional information or access to background documents, contact Kathy Sifrit, PhD, Office of Behavioral Safety Research (NPD-320), (202) 366-9982, National Highway Traffic Safety Administration, W46–472, U.S. Department of Transportation, 1200 New Jersey Avenue, SE, Washington, DC 20590. Please identify the relevant collection of information by referring to its OMB Control Number.

SUPPLEMENTARY INFORMATION: Under the PRA (44 U.S.C. 3501 *et seq.*), a Federal agency must receive approval from the Office of Management and Budget (OMB) before it collects certain information from the public and a person is not required to respond to a collection of information by a Federal agency unless the collection displays a valid OMB control number. In compliance with these requirements, this notice announces that the following information collection request will be submitted OMB.

Title: Older Driver Rearview Video Systems.

OMB Control Number: 2127-0731.

Form Number: Forms 1398 and 1399.

Type of Request: Reinstatement with modification of a previously approved information collection (OMB Control No. 2127–0731).

Type of Review Requested: Regular

Length of Approval Requested: Three years (except for certain research projects)

Summary of the Collection of Information: The National Highway Traffic Safety Administration of the U.S. Department of Transportation is seeking approval to reinstate an information collection to recruit 120 older licensed drivers, 60 between ages 60 and 69 and 60 age 70 and older, for a one-time voluntary research study to assess whether training on the use of Rear Video Systems (RVS) improves the ability of older drivers to back safely. NHTSA expects 180 volunteers will complete screening over the telephone or in-person to determine their eligibility

for the study. Recruiting participants for the reinstated collection has an estimated burden of 15 hours (five minutes per respondent). NHTSA expects that among the 180 who are screened, 120 will be eligible and willing to participate in the study. These 120 participants will complete informed consent forms (15 minutes per participant or 30 burden hours), participate in either RVS training or an equal-time placebo group (30 minutes per participant or 60 burden hours), and complete a series of backing tasks on a closed test-track (60 minutes per participant or 120 burden hours). The overall expected burden for screening (15 hours) and the experiment (210 hours) is 225 hours.

NHTSA previously obtained clearance from OMB to conduct the information collections for this one-time study. However, NHTSA was unable to complete the study as a result of the public health emergency in 2020 and 2021. The requested reinstatement is 125 fewer burden hours than the previous information collection request because the reinstatement is for 120 rather than 200 participants. The reinstatement requests fewer burden hours because NHTSA previously completed the first part of this collection by observing older drivers while backing for the development of training. NHTSA is now requesting a reinstatement to allow it to complete the second part, assessing the effects of the training. NHTSA will use the information to produce a technical report containing summary statistics and tables. No identifying information or individual responses will be reported. The technical report will be made available to a variety of audiences interested in improving highway safety through the agency web site and the National Transportation Library. This project involves approval by an institutional review board, which the contractor will obtain before contacting potential participants. This collection will inform the development of behavioral safety countermeasures to improve older driver safety, particularly older driver training.

Description of the Need for the Information and Proposed Use of the Information: Older adults comprise an increasing proportion of the driving population.[1] The independent mobility that driving confers improves older adults' access to the goods and services they need and enhances their ability to take part in community and family activities that support quality of life. New vehicle technologies, like RVS, may help compensate for some age-related deficits and keep older adults driving safely.

The theory underpinning the assumption that older drivers have an elevated safety risk associated with backing crashes is based upon known age-related deficits. Many older drivers have musculoskeletal difficulties that limit their ability to turn and scan behind the vehicle. For example, Chen et al. (2015) found that older drivers had less neck and trunk rotation and were less successful in detecting targets requiring body rotation in a driving simulator.[2] Aging also diminishes the visual search, visual information processing, and divided attention capabilities needed to be alert to possible conflicts from cross traffic when backing from a driveway or parking space. Deficits in visual scanning among older drivers have been reported in numerous studies. For example, Pollatsek et al. (2012) found that older drivers were less likely to focus their visual attention on areas with potential hazards than younger experienced drivers at intersections in a simulator and on-the-road.[3]

An analysis of NHTSA's Non-Traffic Surveillance from 2012 through 2014 indicated that older drivers were involved in an estimated 19,000 backing crashes a year that resulted in death or injury. This represented 22% of all non-traffic backing crashes. Older drivers represented 17% of all licensed drivers but accounted for 22% of all non-traffic backing crashes

---

[1]National Center for Statistics and Analysis. (2022, July). 2020 older population fact sheet. (Traffic Safety Facts. Report No. DOT HS 813 341). National Highway Traffic Safety Administration. Available at https://crashstats.nhtsa.dot.gov/Api/Public/ViewPublication/812372.

[2] Chen, K. B., Xu, X., Lin J. H., & Radwin, R. G. (2015). "Evaluation of older driver head functional range of motion using portable immersive virtual reality." *Experimental gerontology, 70*, 150–156. https://doi.org/10.1016/j.exger.2015.08.010

[3] Pollatsek, A., Romoser, M. R., & Fisher, D. L. (2012). "Identifying and remediating failures of selective attention in older drivers." *Current directions in psychological science, 21*(1), 3-7. https://doi.org/10.1177/0963721411429459

during this period, indicating an over-representation in non-traffic backing crashes per licensed driver. Studies have found that the most frequent error among older drivers involved in crashes is failure to yield the right-of-way. For example, Cicchino and McCartt (2015) found that "the most frequent error made by crash-involved drivers ages 70 and older was inadequate surveillance, which included looking but not seeing and failing to look."[4] The fact that older drivers are at elevated risk of crashes due to inadequate surveillance compared to younger drivers may explain their over-representation in backing crashes per licensed driver.

RVS is expected to offer more potential benefits to older drivers than younger drivers because older drivers have more room for improvement due to the age-related decline in the ability to rotate one's body. It may also compensate for the fact that older drivers are more likely to have inadequate surveillance or scanning than younger drivers. A recently published article addressed this question. Cichino (2017) found that RVS reduced backing crash involvement among drivers 70 and older by 36% compared to 16% for drivers younger than 70, but the difference was not statistically significant. The study also found that backing sensors reduced backing crash involvement for drivers 70 and older by 38% compared to no effectiveness for drivers younger than 70, which was a statistically significant difference.[5]

60-Day Notice:

A Federal Register notice with a 60-day comment period soliciting public comments on the following information collection was published on 01/12/2023 (88 FR 2168-70). One organization, the National Association of Mutual Insurance Companies (NAMIC) submitted comments. NAMIC noted support for the project, specifically that the proposed information collection is necessary for the proper performance of the functions of NHTSA and indicated that there is every reason the believe that the results of the study will have great practical utility.

---

[4] Cicchino, J. B. and McCartt, A. T. (2015). "Critical older driver errors in a sample of serious U.S. crashes." *Accident analysis and prevention, 80*, 211–219. https://doi.org/10.1016/j.aap.2015.04.015

[5] Cichino, J. B. (2017). "Effects of rearview cameras and rear parking sensors on police-reported backing crashes." *Traffic injury prevention*, *18*(8), 859–865. https://doi.org/10.1080/15389588.2017.1317758

NAMIC went on to recommend that NHTSA "continue to seek input from the insurance industry," as they may be able to provide input on metric, performance indicators, and measures of success. They added that NAMIC would be interested in working with NHTSA on these areas of study and analysis. While NHTSA has not worked with NAMIC on this project, under Part 1 of the project, the contractors conducted a literature review of research in older driver safety that focused on performance in backing maneuvers. That review included research from the Insurance Institute for Highway Safety. This review, combined with analyses of older adults' backing performance collected in Part 1 of the project informed both the training and data collection protocols.

Affected Public: The potential respondent universe is comprised of all residents of the New River Valley and Roanoke Valley regions in Virginia who are age 60 and older. From this universe, the new data collection screening questionnaire will be administered to an estimated 180 potential participants to qualify a total sample of 120 volunteer drivers, 60 between ages 60 and 69 and 60 who are 70 and older.

Estimated Number of Respondents: The study anticipates screening 180 potential participants to obtain 120 older drivers who meet study inclusion criteria. NHTSA expects to collect information either over the telephone or in-person from up to 180 potential participants to determine their eligibility for the study. Based upon previous research experience in the study area, an estimated 120 potential participants (65% of those who respond to screener questions) will be eligible and interested. The 120 participants are expected to consent and complete the study.

Frequency: This study is a one-time information collection, and there will be no recurrence.

Number of Responses: 180

Estimated Total Annual Burden Hours: 225 hours.

Estimated Total Annual Burden Cost: $6,558.

The contractor will use a screening questionnaire (Form 1398) to identify 120 drivers (60 between ages 60 and 69 and 60 age 70 and older) who are properly qualified and choose to participate in the study. Participants will answer the screening questionnaire items either over the phone or in person to determine if they qualify for the study. Respondents are expected to take an estimated average of 5 minutes to complete the initial screening resulting in 15 burden hours for screening up to 180 potential participants. It is estimated that 65% of those who begin the screening process will be eligible and interested in participating. As such, we anticipate screening up to 180 individuals to recruit an estimated 120 potential participants for the consenting process. The consenting process includes an overview of the study and an explanation of the form (Form 1399). Respondents are expected to take an average of 15 minutes for the consenting process including reviewing and completing the form resulting in 30 burden hours. The 120 participants will complete study activities with an estimated burden of 90 minutes per participant for a total estimated burden of 180 hours.

Table 1 describes the calculation of the estimated burden hours for a total of 225 annual hours. To calculate the opportunity cost to participants in this study, NHTSA used the average (mean) hourly earnings from employers in all industry sectors in the State of Virginia, which the Bureau of Labor Statistics lists at $28.92.[6] NHTSA estimated the opportunity cost for each form (and associated study activities) and arrived at a total opportunity cost of $6,558.

Table 1: Burden Estimates

	Burden (minutes) per respondent	New respondents	New total burden hours	New total labor costs
Form 1398				
Telephone Screening	5	180	15	$434
Form 1399				
Informed Consent	15	120	30	$868
Backing Performance Evaluation	60	120	120	$3,470
Training Protocol/ Placebo	30	120	60	$1,735
Total Form 1399			210	$6,073

[6] May 2021. See https://www.bls.gov/oes/current/oes_va.htm#00-0000.

Total estimated burden hours			***225***	***$6,558***

PUBLIC COMMENTS INVITED: You are asked to comment on any aspects of this information collection, including (a) whether the proposed collection of information is necessary for the proper performance of the functions of the agency, including whether the information will have practical utility; (b) the accuracy of the agency's estimate of the burden of the proposed collection of information, including the validity of the methodology and assumptions used; (c) ways to enhance the quality, utility and clarity of the information to be collected; and (d) ways to minimize the burden of the collection of information on respondents, including the use of appropriate automated, electronic, mechanical, or other technological collection techniques or other forms of information technology, e.g., permitting electronic submission of responses.

AUTHORITY: The Paperwork Reduction Act of 1995; 44 U.S.C. Chapter 35, as amended; 49 CFR 1.49; and DOT Order 1351.29A.

Issued in Washington, D.C.

_____

Nanda Narayanan Srinivasan,

Associate Administrator,

Research and Program Development.

BILLING CODE 4910-59-P

[FR Doc. 2023-07521 Filed: 4/10/2023 8:45 am; Publication Date: 4/11/2023]