

**National Child Restraint Use Special Study (NCRUSS)
Supporting Statement for Information Collection Request
(Part A and C)**

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December 01, 2010

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**National Child Restraint Use Special Study (NCRUSS)
Supporting Statement for Information Collection Request**

A. Justification

The National Highway Traffic Safety Administration (NHTSA) was established to carry out a Congressional mandate to reduce the mounting number of deaths, injuries, and economic losses resulting from motor vehicle crashes on our Nation's highways; it was given the authorization to conduct research (i.e., The National Traffic and Motor Vehicle Safety Act of 1966, The Highway Safety Act of 1966) to help carry out this mandate. To support this mission, NHTSA proposes to conduct the *National Child Restraint Use Special Study*, in order to collect observational data on correct and incorrect use of child restraint systems in passenger vehicles, as well as interview information from drivers about their knowledge and perceptions of child restraint systems (CRS). The primary population for observation will be restrained and unrestrained child passengers ages 0-8 riding in any seating position in passenger vehicles. Interviews with drivers who agree to participate will be used to obtain the following data: demographic information on the driver and passengers, the driver's knowledge about a specific CRS in the vehicle, and the driver's general knowledge and experience with different types of restraint systems. While cooperation is being solicited and the interview is being conducted, a second trained observer will collect information about the vehicle, the driver, and the passengers within the vehicle, as well as about a specific CRS in the vehicle. Data collected about this CRS will include the type of restraint that is used, the type of installation (seat belt or LATCH), how the CRS is installed, harness use, and seat belt fit. NHTSA anticipates conducting approximately 3,000 observations of children in passenger vehicles and interviews with the drivers of these vehicles. Data collection is expected to take place over a 3-5 month period in the spring and summer of 2011.

The following sections describe the justification for the proposed study in more detail, along with the estimates of cost and burden.

A.1. Explain the circumstances that make the collection of information necessary. Identify any legal or administrative requirements that necessitate the collection. Attach a copy of the appropriate section of each statute and regulation mandating or authorizing the collection of information.

a. Circumstances necessitating the data collection.

Appropriate use of child restraint systems can prevent many deaths and injuries among children in motor vehicle crashes (e.g., Hanna, 2010, DOT HS 811 325), while incorrect use can reduce their potential effectiveness. Studies have demonstrated a large gap between the recommended appropriate use and the observed use of CRS, even though vehicle and child safety seat safety regulations, the types of vehicles and safety seats that are manufactured, and the recommended procedures for using child restraint systems in passenger vehicles have changed over the years, in an effort to improve child passenger safety.

NHTSA has taken actions to close this gap. In March 1999, NHTSA published a final rule, which is described in Federal Motor Vehicles Safety Standard (FMVSS) 213, Child Restraint Systems, and FMVSS 225, Child Restraint Anchorage Systems. In order to provide easier method of attaching a child restraint to the vehicle, this rule established a uniform child restraint attachment system, known as LATCH, Lower Anchors and Tethers for Children. In other actions, NHTSA developed programs to educate consumers regarding the benefits of using child restraint systems and the proper method(s) of using them, as well as conducted studies to evaluate child passenger safety regulations and programs.

These studies, however, continued to find misuse of child restraints. In the *Misuse of Child Restraints* survey conducted in 2002-2003, an overall critical CRS misuse of 72.6 percent was found (Decina and Lococo, 2003; DOT HS 809 671). In 2005, an evaluation of FMVSS 213 and 225, as required by Executive Order 12866, was conducted. In the *Child Restraint Use Survey, LATCH Use and Misuse* (Decina, Lococo, and Doyle, 2006; DOT HS 810 679), 39 percent of CRS were found to be attached to the vehicle incorrectly. In addition, 61 percent of upper tether nonusers and 55 percent of lower attachment nonusers cited a lack of knowledge about tethers and lower attachments as their reason for not using them.

Since NHTSA's last data collection efforts to evaluate use and misuse of child restraints, NHTSA has revised consumer education programs, developing new content and additional methods of delivering this information to consumers. Also, each year more vehicles with the LATCH system have entered the fleet. NHTSA plans to conduct a new study, the National Child Restraint Use Special Study (NCRUSS) to assess the levels of CRS use and misuse for children riding in passenger vehicles, and to examine whether the levels of use and/or misuse are related to any specific characteristics of the drivers, their passengers and/or their vehicles. This new collection of data is needed to evaluate the effectiveness of FMVSS 225 and FMVSS 213, as well as to obtain an up to date snapshot of child restraint use and misuse across the United States. This survey supports the DOT strategic goal to: "*Improve public health and safety by reducing transportation-related fatalities and injuries*", and this information will be used in assessing what additional actions NHTSA should take to improve child passenger safety.

b. Statute authorizing the collection of information

FMVSS No. 213, Child Restraint Systems, mandates child safety seats to have straps to hook to the vehicle's lower anchors and to the vehicle's upper or tether anchor. (See Attachment A1 for full text.)

FMVSS No. 225, Child Restraint Anchorage Systems, mandates vehicles to have two bars or lower anchors, as well as one upper or tether anchor, to which the child safety seats can be attached. (See Attachment A2 for full text.)

Executive Order 12866 requires Federal agencies to evaluate their existing regulations and programs and measure their effectiveness in achieving their objectives. (See Attachment A3 for full text.)

The National Traffic and Motor Vehicle Safety Act of 1966, Title 15 United States Code 1395, Section 106 (b), gives the Secretary authorization to conduct research, testing, development, and training as authorized to be carried out by subsections of this title. The Vehicle Safety

Act was subsequently re-codified under Title 49 of the U.S. Code in Chapter 301, Motor Vehicle Safety. Section 30168 of Title 49, Chapter 301, gives the Secretary authorization to conduct research, testing, development, and training to carry out this chapter. (See Attachment A4 for full text.)

The Highway Safety Act of 1966, P.L. 89-564, 72 Stat. 885 (1966), codified at 23 U.S.C. § 401 *et seq.*, authorizes the Secretary of Transportation to conduct research in driver behavior. (See Attachment A5 for full text.)

A.2. Indicate how, by whom, and for what purpose the information is to be used. Except for a new collection, indicate the actual use the agency has made of the information received from the current collection.

Use of Data from Prior Collections. Prior data collections have: 1) Evaluated LATCH, 2) Assessed the overall use and misuse of child restraint systems in general, and 3) Observed booster seat usage.

2005 LATCH Study. Information obtained from the 2005 LATCH Survey was used by the agency to make an initial evaluation of FMVSS 213, Child Restraint Systems, and FMVSS 225, Child Restraint Anchorage Systems. However, this evaluation was limited due to the fact that at the time of the survey, vehicles with LATCH were only a small portion of the fleet of vehicles available.

One of the main findings of this study was that consumer knowledge about and experience with LATCH was limited. In response to this information, the content and the delivery of the educational material for consumers has been expanded and improved. The Child Passenger Safety (CPS): Ease-of-Use Ratings, which evaluate manual instructions, vehicle installation features, labels, and ease of using different models of child restraint systems, has been revised, incorporating additional, enhanced criteria for rating CRS. The content on the NHTSA website has been re-organized to make it easier for consumers to find the information that they are seeking, at the same time that additional information on child safety has been added. Concurrently, social media techniques are now being used, including Facebook and Twitter.

Other findings highlighted the need for additional coordination and research among NHTSA and manufacturers of vehicles and CRS, in order to determine the correct standards for using CRS and the vehicle anchorage systems. NHTSA held a public meeting to bring together a roundtable of child restraint and vehicle manufacturers, retailers, technicians, researchers and consumer groups to discuss ways to improve child safety through improving the design and increasing the use of child restraint anchorage systems. In addition, the manufacturers began a series of meetings to address some of the issues raised and NHTSA began a vehicle research program to test best practices.

2004 Misuse of Child Restraints Study. A key finding of this study was that 72.6 percent of child restraints had one or more critical misuses (i.e., types of misuse that

are likely to increase the risk of injury). The most frequent types of misuse were loose harness straps securing the child in the CRS and loose attachment of the CRS to the vehicle. The study recommended periodic monitoring of misuse because of changes in occupant protection systems in vehicles, as well as additional research on the best ways to educate consumers, development of effective strategies for enforcement of child restraint laws, and development of education programs to promote effective use of child restraints.

The 2004 misuse study has served as the basis for developing NHTSA's education and outreach campaign promoting child passenger safety, including the national Child Passenger Safety Week campaign, which promotes inspection stations and educates consumers about LATCH and the proper use of child restraints. This information on misuse is also valuable in promoting the campaign and responding to media requests for information.

To address the particularly low restraint use rates among children ages 4-8, NHTSA has funded demonstration programs to promote the use of child seats and booster seats among this age group. Currently, NHTSA is developing an enforcement guide to help law enforcement officers understand child passenger safety and enforce child restraint laws.

In addition, subsequent NHTSA studies have examined the key types of misuse from a human factors approach. A series of five experiments identified reasons for installation errors and suggested possible improvements to reduce them (Tsai and Perel, 2009, DOT HS 811 234). Two follow-up studies currently funded by NHTSA are examining the effects of labels, instructions, and features of CRS and their effects on installation errors.

National Survey of the Use of Booster Seats (NSUBS)

The NSUBS is the only probability-based nationwide child restraint survey that obtains age by interview and restraint use by observation. However, the study is focused on identifying whether children are riding in the correct type of CRS, and it does not examine whether the CRS is used correctly or whether LATCH is used to install the CRS. The data collected in NSUBS has been used by NHTSA, along with data from Fatality Analysis Reporting System (FARS) and State fatality data to obtain estimates of the use rate and the benefits of booster seats, as well as to develop programs for booster-age children.

Use of Data for the Current Collection. Given the many changes that have occurred since the previous information collections, an up-to-date snapshot of child restraint use and misuse across the United States is needed. Results from the NCRUSS will be used by NHTSA analysts and engineers to evaluate the effectiveness of FMVSS 225 and FMVSS 213, as well as to inform consumer education and outreach efforts. Current estimates of the effectiveness of LATCH will be used by NHTSA to determine if revisions to the standards are necessary. In addition, data on the drivers' familiarity with child restraints and usage practices will aid consumer education and outreach efforts by identifying problems that individuals are having with installing and using

child restraint systems and by examining the relationships among correct use and characteristics of drivers, passengers, vehicles, and child restraints.

There are seven survey forms that are being used to collect data.

The first form, the **Daily Site Form-Tallies**, does not require any interaction with the drivers of the vehicles. One form per site location is filled out. This form is for recording information regarding site characteristics, the number of vehicles with children under age 9 years of age that enter the site, and the number of children under age 9 years that are in these vehicles. The purpose of this form is to collect site specific information and to collect data for vehicle non-selection bias adjustments.

The next three forms are interview forms--the only forms that require interaction with the drivers. The NASS researcher uses them to conduct an in-person interview with the driver to obtain information regarding the characteristics of the vehicle's occupants, the driver's specific knowledge about the CRSs in use in the vehicle, and the drivers' general knowledge, experience, likes and dislikes of different types of restraint systems. These interview forms are used to obtain the following information:

The **Interview Form-Vehicle** is for collecting the drivers' general knowledge and opinions about booster and child safety seats, where the drivers' obtain this information, and whether the vehicles have tether and lower anchors.

The **Interview Form-Occupants by SP** is for collecting demographic information (e.g., birth date or age, gender, origin, race, height, weight, relationship to the driver) on the vehicle's occupants who are under 13 years of age, regardless of the seating position and type of restraint use. In addition, a more limited set of demographic information will be collected for passengers 13 years and older.

The **Interview Form-Restraints** is for collecting information regarding drivers' knowledge about and experience with a specific restraint in their vehicles. In addition, demographic information about the drivers will be collected.

The final three forms are vehicle specific observation forms that do not require interaction with the drivers of the vehicles. They are completed by one NASS researcher, a certified Child Passenger Safety Technician (CPST), while the other researcher conducts the in-person interview with the driver. These observation forms are used to obtain the following information:

The **Observation Form-Non-Response** is used by the CPST to record observation data that is obtained by the CPST while the NASS researcher approaches the vehicle in order to obtain cooperation of the driver. This observation data is collected on the vehicle and its occupants for use in later adjustments for non-response bias that is introduced by drivers who refuse to participate in the survey. This data is to be collected whether or not the driver agrees to cooperate in the study.

Once cooperation of the driver is obtained, the **Observation Form-Restraints** will be used by the observer to record observations about one specific CRS in the vehicle, including the type of restraint that is used, the type of installation (seat belt or LATCH), how the CRS is installed (e.g., if secure, direction, angle), harness use (where applicable), and seat belt fit (for children in boosters or seat belts).

Finally, the **Observation Form-Vehicle Restraints** will be used by the CPST to record observations of the location and number of seating positions that are available in the vehicle, the location and number of seating positions that are in use in the vehicle, and the type of restraints that are available and are in use in each seating position.

Besides developing its own program activities, NHTSA will:

- Disseminate the information to State and local highway safety authorities, who will use it to inform their own programs and activities in child passenger safety.
- Disseminate the information to citizen action groups and other organizations concerned with child passenger safety, which will use it to inform their own programs and activities.

In sum, the proposed study will provide a status report on drivers' knowledge, perceptions, and behavior related to child passenger safety. The data will be studied to determine the effectiveness of NHTSA's past activities and to identify appropriate emphases for future activities in child passenger safety. The results will also be disseminated to others for use in their research and program development activities. If this survey were not conducted, NHTSA program efforts would lack adequate information upon which to base program decisions; severely limiting the Agency's effectiveness in reducing injuries and fatalities.

A.3. Describe whether, and to what extent, the collection of information involves the use of automated, electronic, mechanical, or other technological collection techniques or other forms of information technology. Also describe any consideration of using information technology to reduce burden.

This collection of information does not involve the use of technological collection techniques. NHTSA believes that simple paper and pencil forms are cost effective (because of not having to purchase the design, software or equipment to collect the data electronically), and provide a less formal and more comfortable environment for the interviewed motorists. Because interview and observation techniques will be used, the use of technology would not reduce the burden on respondents. While the data collectors will not use electronic devices such as Personal Data Assistants, the collected data will be entered into an electronic database and NHTSA will receive 100 percent of the results of the data collection in electronic files.

A.4. Describe efforts to identify duplication. Show specifically why any similar information already available cannot be used or modified for use for the purposes described in Item 2 above.

NCRUSS will combine data collection that in the past has been conducted by two different types of surveys: 1) Evaluations of LATCH and whether the LATCH system is easier to use correctly than the systems that uses a seat belt; and 2) Measurement of use and misuse of child restraint systems used for children riding in passenger vehicles. Current data for both of these types of information collections are needed for the following reasons:

A study of LATCH was conducted in 2005 at which time the fleet of available vehicles on the road still contained a majority of vehicles without lower anchorages. The vehicles equipped with LATCH, primarily SUVs and high-end passenger cars, were not representative of the overall on-road vehicle fleet. Now, the majority of the current fleet of vehicles does contain lower anchorages, and the majority of the CRS in use contains lower attachments for LATCH use. Data about LATCH usage on the current fleet of vehicles and child restraint systems is needed.

Periodically, there have been studies of the use and misuse of CRS to assess the current status of usage by the general public using CRS to restrain their children while riding in passenger vehicles. The population of persons whose children are young enough to need to use CRS, as well as the fleet of vehicles on the road and the characteristics of the child restraint systems in use change over time. While prior data collections can be used as benchmarks, they cannot be used to assess current levels of use and misuse. Current data about the overall use and misuse of CRS is needed.

Given the similarities in the types of data that are needed for these two studies, NHTSA believes that it will be cost effective to conduct a combined study, rather than two separate studies. Combining resources will obtain a larger data set than individual studies could achieve and will permit more complex research questions and greater possibilities for data analysis. For example, the interview questions about driver CRS knowledge combined with the detailed misuse observations may help identify specific reasons for the different types of misuse.

In addition, previous studies have not provided nationally representative estimates of use and misuse of CRS. This study will be the first to gather nationally representative information on CRS use and misuse. Many studies have examined misuse in specific populations, such as parents attending seat check events. Because these populations are often self selected, the results are not necessarily representative of the general public.

The methodology used by the NCRUSS has some similarities with the National Survey on the Use of Booster Seats (NSUBS), which is a nationwide survey that measures restraint use among children ages 0-12. The NSUBS collects information on the type of restraint used, including child seats, booster seats, and seat belts, as well as information on the child's ethnicity, race, weight, height, and age. This NSUBS, which is currently conducted biennially, provides important data for tracking restraint use among children, including information on children who are prematurely graduated from one restraint mode to another (e.g., from a booster seat to a seat belt). While this basic usage information is important to collect, there is information in which NHTSA is interested that the NSUBS does not collect: detailed observations of actual misuse of CRS, observations of the fit of seat belts for children restrained only in seat belts, observations of

the specific vehicle and CRS hardware being used, and knowledge and perceptions of CRS among drivers.

NHTSA has also searched for duplicate efforts outside of the Agency. The Centers for Disease Control and Prevention (CDC) have some research efforts related to child passenger safety (described on their web site: <http://www.cdc.gov/ncipc/factsheets/childpas.htm>), but these studies are primarily gathering self-report usage data and would not be duplicated by the NCRUSS.

In summary, this data collection entails no duplication, since this study will generate data for which no similar information is available.

A.5. If the collection of information impacts small businesses or other small entities, describe methods used to minimize burden.

The collection of information involves drivers of passenger vehicles transporting children under age 9, not small businesses. Potential survey sites (e.g., libraries, malls, day care) will be contacted in advance to see if they would be willing to voluntarily grant permission to conduct the survey at their establishment. Businesses will be fully informed as to the nature of the survey operations, as well as the amount of time required for the data collection activities.

A.6. Describe the consequence to Federal program or policy activities if the collection is not conducted or is conducted less frequently, as well as any technical or legal obstacles to reducing burden.

NHTSA knows of no previous study that has provided nationally representative estimates of the use and misuse of CRS. Consequently, if this study is not conducted, real-world data to evaluate FMVSS 213, Child Restraint Systems, and FMVSS 225, Child Restraint Anchorage Systems would not be available. In addition, if NHTSA does not collect this information, it will not have scientifically-based information from actual motorists on the use of LATCH and other child restraint system with which to better target Agency outreach efforts. Congress has tasked NHTSA, as the national leader in traffic safety research, with providing evidence-based guidance to the States and stakeholders. Without timely information on the knowledge, perceptions, and behavior of drivers who transport children, it will be impossible to develop effective strategies to improve child passenger safety.

A.7. Explain any special circumstances that would cause the information collection to be conducted in a manner inconsistent with the guidelines set forth in 5 CFR 1320.6.

There are no circumstances requiring information to be collected in a manner inconsistent with the guidelines in 5 CFR 1320.6.

A.8. Provide a copy and identify the date and page number of publication in the Federal Register of the agency's notice, required by 5 CFR 1320.8 (d), soliciting comments on the information collection prior to submission to OMB. Summarize public comments received in response to that notice and describe actions taken by the agency in response to these comments. Describe efforts to consult with persons outside the agency to obtain their views.

FEDERAL REGISTER NOTICES:

A copy of the 60-Day Federal Register Notice is provided in Attachment C1. The Notice appeared in the Federal Register, Volume 75, Number 110, pages 32838-32839, Wednesday, June 9, 2010. The closing date for comments was August 9, 2010. No comments were received.

A copy of the 30-Day Federal Register Notice is provided in Attachment C2. The Notice appeared in the Federal Register, Volume 75, Number 169, page 53734, Wednesday, September 1, 2010.

EXPERT CONSULTATION: Experts within NHTSA played vital roles in the design of the survey instrument. Prior to the survey development work, NHTSA's Child Passenger Safety Interest Group provided input on the topics and questions to be included. Experts in program development, communications, behavioral research, human factors, biomechanical engineering, vehicle and child restraint systems, and child injury prevention were consulted, including several individuals who were certified Child Passenger Safety Technicians. In addition, staff from Safe Kids, USA, was contacted for input on survey forms and study design. Finally, the following sources were reviewed to assist with the development of the study and its survey instrument:

- Previous NHTSA studies, including the *Misuse of Child Restraints* (DOT HS 809 671), *Child Restraint Use Survey, LATCH Use and Misuse* (DOT HS 810 679), and *Drivers' Mistakes When Installing Child Seats* (DOT HS 811 234).
- *NCSA Technical Report: The 2006 National Survey of the Use of Booster Seats — Methodology Report* (DOT HS 811 111).
- *National Child Passenger Safety Certification Training Program* (DOT HS 810 731), published by NHTSA in cooperation with the National Child Passenger Safety Board and Safe Kids Worldwide.
- *The LATCH Manual, 2009*, published by Safe Ride News Publications.
- *Identifying Specific Criteria for Measuring Child Restraint System Misuse*, a transcript from an expert panel meeting held in Washington, DC, on March 12, 2002 (Attachment D.1).

A.9. Explain any decision to provide any payment or gift to respondents, other than remuneration of contractors or grantees.

No payment will be made to respondents in the survey. Respondents would receive information on child passenger safety and a list of inspection stations where they may choose to have their child restraint system inspected. Consequently, the respondent is potentially receiving benefit in return for his/her participation.

A.10. Describe any assurance of confidentiality provided to respondents and the basis for the assurance in statute, regulation, or agency policy.

Respondents are informed in the survey introduction that their answers will be kept private, used only for statistical purposes, and the data will be protected to the full extent of the law. Participation in the survey is voluntary. No identifying information for interviewees will be obtained during data collection or entered into any system of records.

A.11. Provide additional justification for any questions of a sensitive nature, such as sexual behavior and attitudes, religious beliefs, and other matters that are commonly considered private.

The survey does not contain any questions related to matters that are commonly considered sensitive or private.

A.12. Provide estimates of the hour burden of the collection of information on the respondents. Provide estimates of annualized cost to respondents for the hour burdens for collections of information, identifying and using appropriate wage rate categories.

Consultation with a sample (fewer than 10) of potential respondents, as well as testing of the survey form on some federal employees, was completed. In addition, averages from the previous LATCH and CRS misuse studies were used to determine the time it would take to collect data.

While there are 7 forms, only three of them (i.e., Interview Form—Vehicles, Interview Form—Children by SP, Interview Form—Restraint) will place burden on the respondents (i.e., the vehicles' drivers). One of the forms (i.e., Daily Site Form-Tallies) is used to observe the flow of vehicles at the sites and does not require any interaction with the drivers of the vehicles. Three other forms (i.e., Observation Form—Non-Response, Observation Form- Restraints, Observation Form-Vehicle Restraints) will be completed via observation by a Child Passenger Safety Technician (CPST) while a NASS researcher conducts an in-person interview with the driver. Burden for these three interview forms consists of interviews conducted during the survey and those conducted during the pilot study, as well as the time to approach the drivers who do not agree to participate in the survey or in the pilot study. It is estimated that the burden for conducting the interviews in the main survey will be about 15 minutes per driver or a total of 750 hours for 3,000 respondents. Additional burden is estimated to include the time to request cooperation of the drivers of the vehicles that are approached, but which do not agree to cooperate in the survey (i.e., 1900 drivers @ 3 minutes each = 95 hours), as well as the drivers approached during the pilot study. During the pilot study, it may take longer for the data collectors to conduct the interviews, as they are becoming better acquainted with the survey forms; therefore, it is estimated that each complete interview will take 20 minutes. It is estimated that the burden for the pilot study will be 35 hours (i.e., 96 participating drivers @20 minutes each = 32 hours, and 61 non-participating drivers @ 3 minutes each = 3 hours).

Consequently, the total respondent burden in hours is estimated to be 880 hours for both the survey and the pilot study.

A.13. Provide an estimate of the total annual [non-hour] cost burden to respondents or record keepers resulting from the collection of information. (Do not include the cost of any hour burden shown in Items 12 and 14).

There are no costs to respondents or record keepers associated with participating in this survey.

A.14. Provide estimates of annualized cost to the Federal government.

The estimated cost to the Federal government for contractor services is \$1,000,000 over 24 months. The annualized cost is \$500,000.

A.15. Explain the reasons for any program changes or adjustments reported in Items 13 or 14 of the OMB Form 83-1.

There will be a program change of increased burden hours of 880 to NHTSA's overall burden hour amount.

A.16. For collections of information whose results will be published, outline plans for tabulation, and publication.

Overall

The report(s) will focus on the effectiveness of FMVSS 225 and FMVSS 213, as well as to provide an up to date snapshot of child restraint use and misuse across the United States. The planned data collection period is 32 weeks. The initial schedule is for data to be collected in spring to summer of 2011 with the report being published January/February 2013. Data from the 3,000 child seat observations will be used for this analysis. Data from the interview survey forms will be analyzed to try to determine why misuse is found in some vehicles and not in other vehicles (e.g., driver lack of knowledge about the importance of and/or the ways of attaching CRS in the vehicle). These secondary analyses will be primarily done to identify areas in which additional research, consumer education and/or rulemaking might be of value. The methodology portion of the report will include information on the sampling frame, the survey participation rate, and copies of the questionnaires in both English and Spanish.

The reports that are expected include:

Evaluation of LATCH

NHTSA's staff will analyze the data to estimate LATCH misuse, compare this to the traditional child safety seat misuse, and estimate the benefits of LATCH. The results will be published in a formal technical report (or in a series of technical reports, if deemed

appropriate), in accordance with established agency procedures.

Measurement of use and misuse of child restraint systems

NHTSA plans to examine each of the following research questions posed by the study:

1. What is the overall level of CRS use and misuse, as well as the use and misuse rates for the different restraint types?
2. What are the rates of proper use and misuse of the specific sub-components, such as lower anchors, seat belts, and tethers?
3. What are the specific types and frequencies of misuse? A preliminary list of misuse types that may be included in the analysis are included the table below: *TYPES OF MISUSE SEEN BY TYPE OF RESTRAINT USED*
4. Is the appropriate child safety seat for a child's age, weight, and height being used?
5. Is misuse associated with any specific characteristics of the drivers, their passengers and/or their vehicles?
6. Where do people obtain information about CRS installation (e.g., vehicle manufacturers, safety seat manufacturers, doctor's offices, NHTSA website, other person, seat checkpoint, other), and is the source of information related to CRS use or misuse?

TYPES OF MISUSE SEEN BY TYPE OF RESTRAINT USED

Type of Misuse	Applicable Restraint Types				
	Infant	Rear-facing Convertible	Forward -Facing	High-back Booster	Backless Booster
Selection of CRS					
Age/fit inappropriateness of CRS	X	X	X	X	X
Installation of CRS					
Incorrect Seat Direction	X	X	X		
CRS in front of an airbag	X	X			
Incorrect seat angle	X	X	X		
Lower anchors and seat belt used together	X	X	X		
Unbuckled seat belt (in seat belt installation)	X	X	X		
Seat belt is not locked (in seat belt installation)	X	X	X		
Improper routing of vehicle seat belt	X	X	X		
Improper routing of LATCH belt	X	X	X		
LATCH belt not attached to lower anchors (LATCH installations)	X	X	X		
LATCH belt attached to wrong anchors	X	X	X		
LATCH non-approved position	X	X	X		
Loose CRS attachment to vehicle (e.g., 1, 2, 3, 4, or > 5 inches)	X	X	X		
Top tether not used (when available)			X		
Top tether strap loose (e.g., 1, 2, 3, 4, or 5 or more inches of slack)			X		
Tether not attached to correct anchor			X		
Top tether strap routed over top of headrest			X		
Top tether is used improperly (unless allowed by manufacturer)	X	X			
Harness Use					
Harness strap not used	X	X	X		
Unbuckled harness strap	X	X	X		
Improper harness belt paths/slots	X	X	X		
Improper position of harness strap	X	X	X		
Loose harness straps (e.g., 1, 2, 3, 4, or 5 or more inches of slack)	X	X	X		
Unbuckled harness retainer clip	X	X	X		
Other Types of Misuse					
Visible damage to restraint	X	X	X	X	X
Use of aftermarket products	X	X	X	X	X
Problems Specific to Boosters and Seat Belts					
Head restraint needed					X
Loose shoulder belt				X	X
Shoulder belt behind arm or back				X	X
Shoulder belt sits too high (e.g., at neck or face)				X	X
Shoulder belt sits too low (below shoulder)				X	X
Loose lap belt				X	X
Lap belt not positioned across thighs/hips				X	X
Lap only belt used (unless the booster allows it)				X	X

A.17. If seeking approval to not display the expiration date for OMB approval of the information collection, explain the reasons that display would be inappropriate.

The expiration date for OMB approval will be displayed on all survey forms. NHTSA is not seeking approval to not display the expiration date.

A.18. Explain each exception to the certification statement identified in Item 19, “Certification for Paperwork Reduction Act Submissions,” of OMB Form 83-1.

No exception is requested to any of the items in the certification statement.

B. Collections of Information Employing Statistical Methods: Please see separate Part B section.

C. Attachments

C.1. Attachment A. Statutory Authority

- a. Attachment A1. FMVSS 213
- b. Attachment A2. FMVSS 225
- c. Attachment A3. Executive Order 12866
- d. Attachment A4. The National Traffic and Motor Vehicle Safety Act of 1966
- e. Attachment A5. The Highway Safety Act of 1966

C.2. Attachment B. Federal Register Notices

- a. Attachment B1. 60-Day Federal Register Notice
- b. Attachment B2. 30-Day Federal Register Notice

C.3. Attachment C. Data Collection Forms

- a. Attachment C1. Daily Site Form--Tallies
- b. Attachment C2. Interview Form—Vehicles
- c. Attachment C3. Interview Form—Occupants by SP
- d. Attachment C4. Interview Form—Restraints
- e. Attachment C5. Observation Form—Non-Response
- f. Attachment C6. Observation Form--Restraints
- g. Attachment C7. Observation Form--Vehicle Restraints

C.4. Attachment D. Other Survey Materials

- a. Attachment D1. Workshop Proceedings
Identifying Specific Criteria for Measuring Child Restraint System Misuse