





Use of Restraint Systems on Aircraft by Individuals with Disabilities Resource Guide







Table of Contents

- I. Introduction
- II. FAA Regulations
 - A. 14 CFR Section 121.311
 - **B.** General Exemption Information
- III. Child Restraint Systems/Restraint Systems
 - A. FAA Approved Forward-Facing and Aft-Facing CRS
 - B. FAA Approved Harness-Type Restraint (CARES)
 - C. FAA Approved CRS for Older and/or Larger Individuals
 - D. Non-FAA Approved CRS/Restraint Systems for Use by Individuals with Disabilities
- IV. Petitioning for an Exemption from FAA Regulations
 - A. Petition for Exemption
 - B. Equivalent Level of Safety and Public Interest
 - C. Grant of Exemption
 - D. Conditions and Limitations
- V. CRS Checklist
- VI. Petition for Exemption Templates
 - A. CARES
 - B. E-Z-On Harness
 - C. Non-FAA Approved CRS with Hard Shell Seat and Back with Internal Harness
- VII. FAA Information Regarding the Use of Child Restraint Systems on Aircraft
 - A. FAA Website
 - **B.** Child Restraint Regulations
 - C. Child Restraint Advisory Circulars
 - D. Child Restraint Information for Operators
 - E. Child Restraint Civil Aerospace Medical Technical Reports
 - F. Child Restraint Technical Standard Order

I. Introduction

Welcome! The Federal Aviation Administration (FAA) prescribes regulations and minimum safety standards and requires air carriers to provide service with the highest possible degree of safety in the public interest. The FAA is also committed to increasing accessibility to air transportation for individuals with disabilities. This resource guide was developed to support both of these commitments.

This is a resource guide regarding the use of child restraint systems (CRS) and other types of restraints on aircraft by individuals with disabilities. It contains some general information regarding the use of FAA approved CRS. It also contains detailed information regarding the different options available when an individual with disabilities needs to use a unique type of restraint on an aircraft that may not be FAA approved or needs to exceed certification limitations for certain FAA approved CRS, regarding weight and height of the user.

This resource guide contains information regarding FAA regulations, guidance, and processes regarding the use of CRS on aircraft. It also contains information regarding many non-government entities and products. The FAA does not endorse or recommend any of the non-government entities or products listed within this resource guide. The only purpose for providing this information is for users of this resource guide to be able to acquire technical data as needed from these sources and to be aware of the existence of such products.

II. FAA Regulations

The goal of FAA regulations is to enhance aviation safety. FAA regulations apply to many types of "regulated entities" such as air carriers, crewmembers, maintenance providers, manufacturers, and passengers (including passengers who want to use CRS and other restraint systems on aircraft).

A. Pertinent Part of Title 14 of the Code of Federal Regulations (14 CFR) Regarding the Use of Child Restraint on Aircraft (Air Carrier and Commercial Operator)

§121.311 Seats, safety belts, and shoulder harnesses.¹

- (a) No person may operate an airplane unless there are available during the takeoff, en route flight, and landing—
 - (1) An approved seat or berth for each person on board the airplane who has reached his second birthday; and

3

¹ Bold emphases throughout this section provided by FAA and are not found in the actual regulation.

- (2) An approved safety belt for separate use by each person on board the airplane who has reached his second birthday, except that two persons occupying a berth may share one approved safety belt and two persons occupying a multiple lounge or divan seat may share one approved safety belt during en route flight only.
- (b) Except as provided in this paragraph, each person on board an airplane operated under this part shall occupy an approved seat or berth with a separate safety belt properly secured about him or her during movement on the surface, takeoff, and landing. A safety belt provided for the occupant of a seat may not be used by more than one person who has reached his or her second birthday. **Notwithstanding the preceding requirements, a child may**:
 - (1) Be held by an adult who is occupying an approved seat or berth, provided the child has not reached his or her second birthday and the child does not occupy or use any restraining device; or
 - (2) Notwithstanding any other requirement of this chapter, occupy an approved child restraint system furnished by the certificate holder or one of the persons described in paragraph (b)(2)(i) of this section, provided:
 - (i) The child is accompanied by a parent, guardian, or attendant designated by the child's parent or guardian to attend to the safety of the child during the flight;
 - (ii) Except as provided in paragraph (b)(2)(ii)(D) of this section, the approved child restraint system bears one or more labels as follows:
 - (A) Seats manufactured to U.S. standards between January 1, 1981, and February 25, 1985, must bear the label: "This child restraint system conforms to all applicable Federal motor vehicle safety standards."
 - (B) Seats manufactured to U.S. standards on or after February 26, 1985, must bear two labels:
 - (1) "This child restraint system conforms to all applicable Federal motor vehicle safety standards"; and
 - (2) "THIS RESTRAINT IS CERTIFIED FOR USE IN MOTOR VEHICLES AND AIRCRAFT" in red lettering;
 - (C) Seats that do not qualify under paragraphs (B)(2)(ii)(A) and (b)(2)(ii)(B) of this section must bear a label or markings showing:
 - (1) That the seat was approved by a foreign government;
 - (2) That the seat was manufactured under the standards of the United Nations;

- (3) That the seat or child restraint device furnished by the certificate holder was approved by the FAA through Type Certificate or Supplemental Type Certificate; or
- (4) That the seat or child restraint device furnished by the certificate holder, or one of the persons described in paragraph (b)(2)(i) of this section, was approved by the FAA in accordance with §21.8(d) of this chapter or Technical Standard Order C-100b, or a later version. The Child restraint device manufactured by AmSafe, Inc. (CARES, Part No. 4082) and approved by the FAA in accordance with §21.305(d) (2010 ed.) of this chapter may continue to bear a label or markings showing FAA approval in accordance with §21.305(d) (2010 ed.) of this chapter.
- (D) Except as provided in §121.311(b)(2)(ii)(C)(3) and §121.311(b)(2)(ii)(C)(4), booster-type child restraint systems (as defined in Federal Motor Vehicle Safety Standard No. 213 (49 CFR 571.213)), vest- and harness-type child restraint systems, and lap held child restraints are not approved for use in aircraft; and
- (iii) The certificate holder complies with the following requirements:
 - (A) The restraint system must be properly secured to an approved forward facing seat or berth;
 - (B) The child must be properly secured in the restraint system and must not exceed the specified weight limit for the restraint system; and
 - (C) The restraint system must bear the appropriate label(s).
- (c) Except as provided in paragraph (c)(3) of this section, the following prohibitions apply to certificate holders:
 - (1) Except as provided in §121.311(b)(2)(ii)(C)(3) and §121.311(b)(2)(ii)(C)(4), no certificate holder may permit a child, in an aircraft, to occupy a booster-type child restraint system, a vest-type child restraint system, a harness-type child restraint system, or a lap held child restraint system during take off, landing, and movement on the surface.
 - (2) Except as required in paragraph (c)(1) of this section, no certificate holder may prohibit a child, if requested by the child's parent, guardian, or designated attendant, from occupying a child restraint system furnished by the child's parent, guardian, or designated attendant provided—
 - (i) The child holds a ticket for an approved seat or berth or such seat or berth is otherwise made available by the certificate holder for the child's use;
 - (ii) The requirements of paragraph (b)(2)(i) of this section are met;

- (iii) The requirements of paragraph (b)(2)(iii) of this section are met; and
- (iv) The child restraint system has one or more of the labels described in paragraphs
- (b)(2)(ii)(A) through (b)(2)(ii)(C) of this section.
- (3) This section does not prohibit the certificate holder from providing child restraint systems authorized by this section or, consistent with safe operating practices, determining the most appropriate passenger seat location for the child restraint system.

* * * * *

B. General Exemption Information

Generally, if you are affected by a regulation in 14 CFR, then you may petition (the "petitioner") for an exemption from any rule issued by FAA under its statutory authority. Exemptions from a specific regulation (or several regulations) may be granted by the FAA if the petitioner can show why the exemption is in the public interest and why the exemption from certain requirements provides an equivalent level of safety to that of the affected regulation(s).

Detailed information regarding how public interest and equivalent level of safety are essential parts of a petition for exemption to allow the use of certain non-FAA approved child restraints by individuals with disabilities on aircraft can be found in section IV of this resource guide.

III. Child Restraint Systems/Restraint Systems

A. FAA Approved Forward-Facing and Aft-Facing CRS

Title 14 CFR Section 121.311(b) prescribes, in pertinent part, that each person aboard an aircraft operated under part 121 must occupy an approved seat with a separate safety belt secured about him or her during movement on the surface, take off and landing. The regulations also allow a child (by definition, an individual under 18 years of age) to occupy an FAA approved CRS. In addition, the regulations require air carriers to ensure that the restraint system is properly secured to a forward-facing seat, that the child is properly secured in the restraint system, and that the child does not exceed the specified weight limits for the restraint system.



Typical Forward-Facing CRS



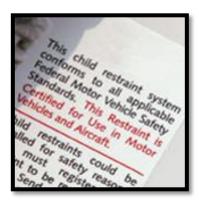
Typical Aft-Facing CRS

1. "FAA Approved" Labeling for Typical Forward-Facing and Aft-Facing CRS

Typical forward-facing and aft-facing CRS must bear two labels to be FAA approved for use on aircraft. The labeling must include the text "This child restraint system conforms to all applicable Federal Motor Vehicle Safety Standards" and "This Restraint is Certified for Use in Motor Vehicles and Aircraft," in red lettering. It is acceptable if the text for these two required labels is merged onto one label.

2. Examples of Labeling

The following images are examples of labeling that indicate a CRS is FAA approved for use on aircraft:



OR

This child restraint system conforms to all applicable Federal motor vehicle safety standards.

This Restraint is Certified for Use in Motor Vehicles and Aircraft.

B. FAA Approved Harness-Type Restraint-CARES

The Child Aviation Restraint System (CARES) Aviation Child Safety Device (ACSD) is currently the only FAA approved harness-type restraint. CARES is approved for use by children weighing between 22 and 44 pounds and who are less than 40 inches tall. CARES works with the existing aircraft seat belt to provide its user with protection and safety during airplane travel.





If a child with a disability is over 44 pounds or 40 inches tall, and the child's medical advisor thinks CARES is an appropriate restraint for use on aircraft, you can petition the FAA for an exemption from current regulations in order for a larger child to be able to use CARES. In this case, if granted, an exemption would allow a child with a disability who is over the weight or height certification limitations of 44 pounds or 40 inches to use CARES during all phases of flight.

Detailed information regarding Exemptions and how to submit a Petition for Exemption can be found in the "CRS Checklist" section of this Resource Guide.

1. "FAA Approved" Labeling for Harness-Type Restraint-CARES

CARES labeling indicates it is FAA approved for use on aircraft. This labeling is different than the labeling on a typical FAA approved forward-facing or aft-facing CRS because a different certification process was used to approve CARES for use on aircraft.

2. Examples of labeling on CARES

Each CARES has a label that states "FAA Approved in Accordance with 14 CFR 21.8(d) Approved for Aircraft Use Only" or "FAA Approved Child Restraint System (CRS) in Accordance with 14 CFR 21.305(d) Amd 21.50 6-9-1980 ELOS to TSO-C100b Approved for Aircraft Use Only" on it.

FAA APPROVED IN
ACCORDANCE WITH
14 CFR 21.8(d)
APPROVED FOR
AIRCRAFT USE ONLY

OR

FAA APPROVED

Child Restraint System (CRS)

IN ACCORDANCE WITH

14 CFR 21.305 (d)

AMD 21.50 6-9-1980

ELOS to TSO-C100b

APPROVED FOR AIRCRAFT USE ONLY

Note: Unlike typical FAA approved forward-facing and aft-facing CRS, the CARES ACSD is not approved for use in motor vehicles. It can only be used on an airplane. When making travel plans, be aware that an additional CRS (approved for use in a motor vehicle) would have to be available for use in a motor vehicle at the destination if one is required. Each CARES has the following label as a reminder that it is not safe for use in motor vehicles:



3. Purchasing CARES

CARES is available from many commercial vendors and websites. The FAA does not recommend one vendor over another. CARES is manufactured by AmSafe Aviation, Inc. (AmSafe). AmSafe maintains a website where you can purchase CARES and also provides detailed information regarding the use of CARES by individuals with disabilities. The AmSafe website also provides instructions on how to petition the FAA for an exemption if a CARES user with disabilities exceeds the limits of 44 pounds or 40 inches established during the certification process for CARES.

The AmSafe website can be accessed at: www.kidsflysafe.com.



Note: There are two sizes of CARES. Generally, if the user is under 5 feet tall (60 inches), the regular CARES will fit (an exemption is required for use if the user is over 44 pounds or 40 inches tall). If the user is close to, or over, 5 feet tall, the Special CARES is a better fit because the shoulder straps can extend to accommodate a person up to 6 feet tall. An exemption is always required to use Special CARES because the user would always be more than 40 inches tall. The Special CARES has the following labeling:

IF OCCUPANT FALLS OUTSIDE THE RESTRAINT'S HEIGHT OR WEIGHT LIMITATIONS, AN FAA EXEMPTION LETTER MUST BE OBTAINED AND BE PRESENT EVERY TIME THE RESTRAINT IS USED IN FLIGHT. FOR STEPS ON HOW TO OBTAIN AN FAA EXEMPTION LETTER, PLEASE VISIT WWW.KIDSFLYSAFE.COM.

C. FAA Approved CRS – For Older and/or Larger Individuals

There are many FAA approved CRS that can accommodate a larger child. These FAA approved CRS can be used without having to petition the FAA for an exemption. The FAA does not recommend any particular CRS, but listed below are some examples of various models of CRS that are approved for use in automobiles and aircraft that can be used by larger children (some can be used by children who weigh as much as 150 pounds and who are five feet tall). It is the parent's or caregiver's responsibility to read the instruction manual to ensure the user meets weight and height limitations before use on an airplane.

Note: The FAA considers anyone who has not reached his/her 18th birthday to be a child for the purpose of its regulations regarding CRS, so a child could use a CRS that accommodates his/her weight and height on any U.S. airline until he/she turns 18. After a child turns 18, an exemption would be required to use an FAA approved CRS (even though the person is within the height and weight limitations), because the child is considered to be an adult.

1. Information Regarding FAA Approved CRS that can be Used by Older and/or Larger Children

Many of the following manufacturers make several different models of FAA approved CRS. Certain models of CRS that accommodate larger users have been highlighted. Contact information for some vendors of these CRS has also been included. Many of these CRS can be purchased from multiple

vendors. Most importantly, you are encouraged to engage with the manufacturer/vendor technical experts and the user's medical team to determine the appropriate CRS or restraint system for the user's height, weight, and disabilities.

- (a) Inspired by Drive (http://www.inspiredbydrive.com/
 - IPS Car Seat, 2000 Series
 - o Accommodates users 20 to 102 pounds and up to 60 inches tall
 - o FAA approved for use on aircraft



IPS Car Seat, 2000 Series (20 to 102 pounds)

- (b) Tumbleforms (http://www.performancehealth.com)
 - Carrie Seat, Elementary
 - o Accommodate users 30 to 60 pounds and between 38 and 48 inches tall
 - o FAA approved for use on aircraft



Tumbleforms Carrie Seat, Elementary (30 to 60 pounds)

(c) Brittax (www.britaxusa.com)

- Convertible Car Seats (Boulevard, Marathon, Roundabout)
 - o Depending on model, accommodates users 4 to 120 pounds
 - o FAA approved for use on aircraft
- Frontier Click Tight
 - Accommodates users 25 to 90 pounds and between 30 and 58 inches tall and who are at least 2 years of age
 - o FAA approved for use on aircraft when using the internal harness
- Pinnacle Click Tight
 - Accommodates users 25 to 90 pounds and between 30 and 58 inches tall and who are at least 2 years of age.
 - o FAA approved for use on aircraft when using the internal harness



Britax Marathon
(Rear-facing: 5 to 65 pounds
Forward-facing: 20 to 65 pounds)



Britax Frontier Click Tight (25 to 90 pounds)

(d) Diono (http://us.diono.com/)

- radian® rXT
 - Accommodates users (rear-facing) 5 to 45 pounds and up to 44 inches tall when used as a harnessed restraint
 - Accommodates users (forward-facing) 20 to 80 pounds and up to 57 inches tall when used as a harnessed restraint
 - o Folds up to carry as a backpack or over the shoulder

o FAA approved for use on aircraft when using the internal harness





Diono Radian rXT (Depending on orientation, 5 to 80 pounds)

- (e) Special Tomato (http://www.specialtomato.com)
 - Small Multi-Positioning Seat (MPS)
 - o Accommodates users 20 to 80 pounds and between 28 and 52 inches tall
 - o FAA approved for use on aircraft
 - Large MPS
 - o Accommodates users up to 150 pounds and between 45 and 62 inches
 - o FAA approved for use on aircraft



Special Tomato Car Seat (MPS) (20 to 150 pounds, depending on model)

(f) Thomashilfen (https://www.thomashilfen.us)

- Recaro Performance Sport Reha
 - Accomodates users 20 to 90 pounds and between 27 and 50 inches when used in harness mode
 - o FAA approved for use on aircraft when using the internal harness



Recaro Performance Sport Reha (20 to 90 pounds)

- (g) Some vendors of FAA approved CRS for Individuals with Disabilities
 - www.adaptivemall.com
 - www.especialneeds.com
 - www.rehabmart.com
 - www.tadpoleadaptive.com
 - www.numotion.com
 - www.flaghouse.com

Note: One CRS (Convaid Carrot 3), that the FAA is aware of , is labeled as being certified for use on aircraft but includes manufacturer's instructions (https://www.convaid.com/wp-content/uploads/2017/02/carrot3UG0002-ENG-Rev_11302015.pdf) that the Carrot 3 must always be used in a seat with a lap and shoulder (3-point) safety belt restraint system (such as that in a typical automobile) to secure the child restraint and the child. While some smaller or private aircraft may have this type of restraint configuration in their passenger seats, the FAA is not aware of any commercial air carriers with a lap and shoulder (3-point) safety belt restraint system in the passenger seats on their aircraft. Therefore, the Convaid Carrot 3 may not generally be used on commercial air carriers. (See https://www.convaid.com/child-restraint-systems/carrot-3/)

Note: As per FAA regulations (§§ 121.311 (b)(2)(i), 125.211(b)(2)(i), 135.128(a)(2)(i)), no operator may prohibit a child (an individual who has not reached his or her 18th birthday) from using an approved CRS when a seat is purchased for the child, the child is accompanied by a parent or guardian, and the child is within the weight limits for the CRS. If an approved CRS, for which a ticket has been purchased, does not fit in a particular seat on the aircraft, it is the responsibility of the aircraft operator to accommodate the CRS in another seat in the same class of service.

Note: As per FAA regulations (§ 121.311 (k)), air carriers must make available on their websites the width of the narrowest and widest passenger seats in each class of service for each airplane make, model and series operated by that air carrier. This provides greater information to assist a caregiver to determine whether a particular CRS will fit in an airplane seat.

D. Non-FAA Approved CRS/Restraint Systems for Use by Individuals with Disabilities

There are many types of FAA approved CRS available that can accommodate a variety of special needs. However, some individuals with disabilities need to use non-FAA approved restraints on aircraft to address unique physical needs regarding that individual's safety, support, and security. Other individuals with disabilities may be able to use an FAA approved restraint system but exceed the weight or height limit established by the manufacturer for the restraint. In both of these situations, the individual, his or her parent or caregiver, or the aircraft operator (on the individual's behalf) may petition the FAA for an exemption from certain operating requirements regarding the use of the CRS or restraint on an aircraft.

1. Some examples of non-FAA approved CRS that can be used WITH AN EXEMPTION by individuals with disabilities on aircraft:

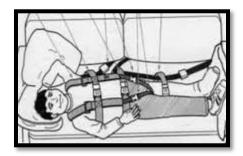


MERU Travel Chair (Up to 77 pounds)



Britax Traveler Plus (22 to 105 pounds)





EZ-On Harness (Used for body casts, hip spica casts, braces, or any other configuration where the child must be transported lying down.)
(Model 101M2: 20 to 100 pounds;
Model M203: 20 to 65 pounds)

2. Although CARES is an FAA approved restraint, it is only approved for use by an individual who is between 22 and 44 pounds and less than 40 inches tall. However, CARES can be used with an exemption by a person with a disability who exceeds the weight or height limit established by the manufacturer.



CARES (Needs an exemption when the user exceeds 44 pounds or 40 inches)

IV. Petitioning for an Exemption from FAA Regulations

A. Petition for Exemption

When a person or an air carrier was not contemplated by the FAA when the regulation was written or literally can't comply with the regulations as written, the person or air carrier can petition the FAA for an exemption from part or all of the regulation in order to accommodate his or her unique set of circumstances. In the case of child restraint/restraint systems, the FAA has determined that some individuals with disabilities are unique from the general class of regulated persons subject to the provisions of Section 121.311(b), so as to justify relief through an exemption rather than through the general rulemaking process. For example, the FAA has issued exemptions from regulations regarding the use of restraint systems on aircraft to individuals with cerebral palsy, scoliosis, autism, chronic respiratory insufficiency, Lissencephaly, or certain neuromuscular disorders that affect body movement, muscle control, muscle coordination, muscle tone, reflex, posture, and balance.

Anyone can petition the FAA for an exemption by submitting a request to the Federal Docket Management System at: www.regulations.gov.

Detailed information regarding Exemptions and how to submit a Petition for Exemption can be found in the "CRS Checklist" section of this Resource Guide.

B. Equivalent Level of Safety and Public Interest

In order for an exemption to be granted, the "petitioner" (person who requests the exemption, either for himself/herself or on behalf of another person) must demonstrate to the FAA that the exemption, if granted, provides an equivalent level of safety to that provided by the regulations and is in the public interest. The FAA analyzes the safety and public interest considerations in the petition for exemption and determines whether to grant the exemption in order to allow the use of a non-FAA approved restraint system during all phases of flight.

If the FAA determines that the safety and public interest requirements are addressed, the FAA issues a Grant of Exemption. For example, many Grants of Exemption regarding the use of non-FAA approved CRS by people with disabilities acknowledge that the *public interest is served because without the support and security of a CRS that addresses the individual's unique needs, the person would be unable to fly commercially*. Additionally, the safety analysis performed for Grants of Exemption results in a

determination that the use of the CRS ensures a high level of safety for both the user and for other aircraft occupants.

C. Grant of Exemption

A "Grant of Exemption" relieves a person from specific FAA regulations and usually includes specific conditions and limitations that ensure safety is maintained. If granted, an exemption would allow a person with a disability to be able to use a non-FAA approved CRS or to exceed the weight or height limit established by the manufacturer for an FAA approved CRS for all phases of flight. With any Grant of Exemption, the individual using the CRS would be required to comply with all conditions and limitations contained in the grant of exemption.



D. Conditions and Limitations

When the FAA grants an exemption from FAA regulations, the Grant of Exemption contains certain conditions and limitations. For example, every Grant of Exemption the FAA issues regarding the use of CRS on aircraft requires the petitioner to advise the air carrier about the contents of the exemption at least 48 hours before the date of each flight. This involves a call to a reservations agent who typically can handle any special requirements or seat assignments.

Note: Parents and caregivers should also know that 14 CFR part 382 Nondiscrimination on the Basis of Disability in Air Travel requires that every air carrier make available a Complaints Resolution Official (CRO) to any passenger who requests to speak to them. Airlines that provide service using aircraft with 19 or more passenger seats must designate one or more CROs and make the CRO available to consumers either by phone or in person, on request and at no charge to the passenger. CROs must be thoroughly

familiar with Part 382 and have the authority to resolve complaints promptly. This individual can be a great resource to speak to BEFORE your travel date, to ensure travel goes smoothly when there are complex issues involved in certain Grants of Exemption. More information regarding the role of the CRO at an air carrier can be accessed at:

https://www.transportation.gov/airconsumer/disability-training ("The ABCs of Accessible Travel")

V. CRS Checklist

CRS Checklist

This CRS Checklist contains a step-by-step approach to help determine some CRS/Restraint System options for an individual with disabilities.

A. What type of child restraint will this child use on the airplane?

- 1) Ask the parent/caregiver what kind of restraint the child uses in a car.
 - The CRS might be FAA approved and can be used on an airplane [no exemption necessary].
 - See section III of this resource guide to view examples of CRS labeling that indicate it is FAA approved for use in aircraft.
 - If the CRS that is used in the car is not FAA approved for use in aircraft, it is possible to petition the FAA on the child's behalf for an exemption to use that same CRS on the airplane. For example, the design of the CRS may be medically necessary or the child may be more comfortable in a familiar CRS. It is also an easy way to make sure the child's CRS is available to use in a motor vehicle at the destination.
 - See sections C and D of the **CRS Checklist** to learn how to petition the FAA for an exemption.
- 2) Consider if CARES might be appropriate to use.
 - Information regarding CARES can be found in section III B. of this resource guide.
 - CARES is FAA approved for use by a child between 22-44 pounds and under 40 inches [no exemption necessary]
 - Use of CARES for any individual with disabilities would typically involve a discussion with a medical provider to determine if CARES provides an appropriate level of support for the individual.
 - Use of CARES for any individual over 44 pounds or 40 inches tall requires petitioning the FAA for an exemption.
 - See sections C and D of the **CRS Checklist** to learn how to petition the FAA for an exemption.

- CARES is not approved for use in motor vehicles. It can only be used on an airplane. When making travel plans, an additional child restraint approved for use in a motor vehicle must be available at the destination if one is required.
- 3) Consider if an FAA approved CRS for a larger child might be appropriate [no exemption necessary].
 - See section III C. of this resource guide to view examples of several CRS that are FAA
 approved for use by children up to 150 pounds.
 - An effective practice for some organizations is to possess various models of FAA approved
 CRS that will accommodate a larger child so that a child (who fits within the range of weights
 provided by the manufacturer for that specific CRS) may use that CRS on a temporary basis
 for airplane travel. After a trip, the FAA approved CRS can then be cleaned and reused by
 other children.
- 4) Consider if a non-FAA approved CRS is appropriate.
 - See section III D. of this resource guide to view examples of non-FAA approved CRS.
 - Use of a non-FAA approved CRS for any individual with disabilities would typically involve
 a discussion with a medical provider to determine if the CRS provides an appropriate level of
 support for the individual.
 - Use of a non-FAA approved CRS requires petitioning the FAA for an exemption.
 - See sections C and D of the **CRS Checklist** to learn how to petition the FAA for an exemption.
- 5) Consider if a child has unique needs that require the child to lie in a prone position during most of the flight and whether an E-Z-On Harness (non-FAA approved CRS) is appropriate.
 - See section III D. of this resource guide to see an example of an E-Z-On Harness.
 - Use of an E-Z-On Harness for any individual with disabilities would typically involve a
 discussion with a medical provider to determine if the E-Z-On Harness provides an
 appropriate level of support for the individual.
 - Use of an E-Z-On Harness for any individual with disabilities requires petitioning the FAA for an exemption
 - See sections C and D of the **CRS Checklist** to learn how to petition the FAA for an exemption.

- 6) Consider if a child has unique needs that require the child to have his or her seat reclined during the entire flight but is not required to lie in a completely prone position and whether using the CARES restraint is appropriate.
 - FAA regulations require seatbacks to be in the upright position for takeoff and landing (14 CFR Section 121.311).
 - However, there is language in the regulation that allows air carriers to develop procedures to
 accommodate people who are unable to sit upright for medical reasons but only if the seat
 back does not obstruct any passenger's access to the aisle or to any emergency exit (121.311
 (e)).
 - In this case, you should contact the air carrier to see if it has approved procedures in place to accommodate this type of seating requirement.
 - Ask to speak to someone at the airline who is an expert in disability issues. (See information regarding CROs on page 19) That disability expert will know if the air carrier has procedures in place to accommodate an individual's disability by allowing the seatback to be reclined during the entire flight.
 - In this case, if the child is more than 44 pounds or 40 inches tall, you would still need to
 petition for an exemption in order to use CARES. See sections C and D of the CRS
 Checklist to learn how to petition the FAA for an exemption.

B. What should I do if this child needs an exemption to use a child restraint on an airplane?

- 1) Petition for an exemption as soon as possible.
 - Once it's determined that a child will need an exemption from FAA regulations to use a child restraint on an airplane, start the process to petition the FAA for an exemption as soon as possible.
 - It can take 6-8 weeks to complete the process (and could take longer if there are certain novel issues regarding the restraint).
 - Grants of Exemption are specific to the individual.
 - If an exemption is granted to use a child restraint on an airplane, it typically remains effective for 5 years. **Note:** If an older child will become an adult (reach the age of 18) prior to the termination date for an exemption, the FAA will include additional relief (from other regulations) in the Grant of Exemption that will continue to allow the restraint to be used by

the person, who is now an adult, so the Grant of Exemption will continue to be "seamlessly" effective for 5 years.

- ▶ Petition the FAA for an exemption as soon as possible. It is much better for a child to have the Grant of Exemption weeks or even months before his or her flight than to not receive the grant because too little time was left to properly complete the exemption process prior to travel.
- ▶ A petition for an exemption does not require specific travel information, such as the name of the airline, specific travel dates or even departure or arrival cities. These details are not relevant to the petition for exemption.
- ▶ Once granted, an exemption can be used by that individual for travel on any date, between any city pairs, and on any part 121 U.S.-certificated operator (air carrier) for the duration of the exemption (typically 5 years).

Note: A response to a petition for exemption is provided to the petitioner via U.S. mail and email (if email address is provided) and is posted to the docket at www.regulations.gov.

Note: FAA regulations only apply to U.S.-certificated air carriers. However, several Civil Aviation Authorities (CAA) for other countries recognize FAA approval of CRS for use on aircraft and/or FAA exemptions allowing the use of certain child restraints for use on the air carriers regulated by that CAA. If travel includes a foreign air carrier, contact the foreign air carrier regarding its specific policies.

- 2) Use the templates in section VI of this resource guide to develop the petition for exemption.
 - For a petition to use CARES, use Template #1.
 - For a petition to use the E-Z-On Harness, use Template #2.
 - For a petition to use a non-FAA approved CRS with a hard shell seat and back with an internal harness, use Template #3.
- Submit the petition for exemption using the instructions in sections C and D of the CRS Checklist.

C. Detailed Submission Instructions

Send your petition to the Federal Docket Management System (FDMS) electronically by accessing the

public portal: www.regulations.gov.

1. In the center of the homepage, locate the "Search for" field.



2. In the "SEARCH for: Rules, Comments, Adjudications or Supporting Documents:" field, enter "FAA-2007-0001" (without the quotation marks).

Note: This Docket, FAA-2007-0001, is referred to as the "FAA Shell Docket". It serves as the slate that enables Agencies to collect public requests such as Applications, Petitions, CARES, etc., for which a docket does not exist. Therefore, only items without an existing docket number should be submitted to FAA-2007-0001.



- 3. Select "Search" or click your "Enter" button. Regulations.gov will display a Search Results page.
- 4. Put cursor over the "This docket, FAA-2007-001, is referred to as the "FAA (Federal Aviation Admi..." result in the Featured Result and click your "Enter" button. Or, put cursor over the "Open Docket Folder" result and click your "Enter" button.

Featured Result - Docket ID: FAA-2007-0001

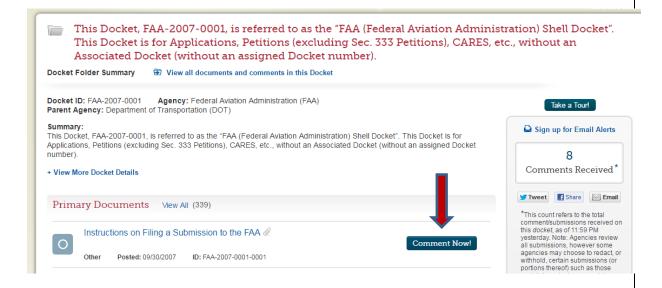
Dopen Docket Folder

This Docket, FAA-2007-0001, is referred to as the "FAA (Federal Aviation Admi...

Agency: Federal Aviation Administration (FAA)

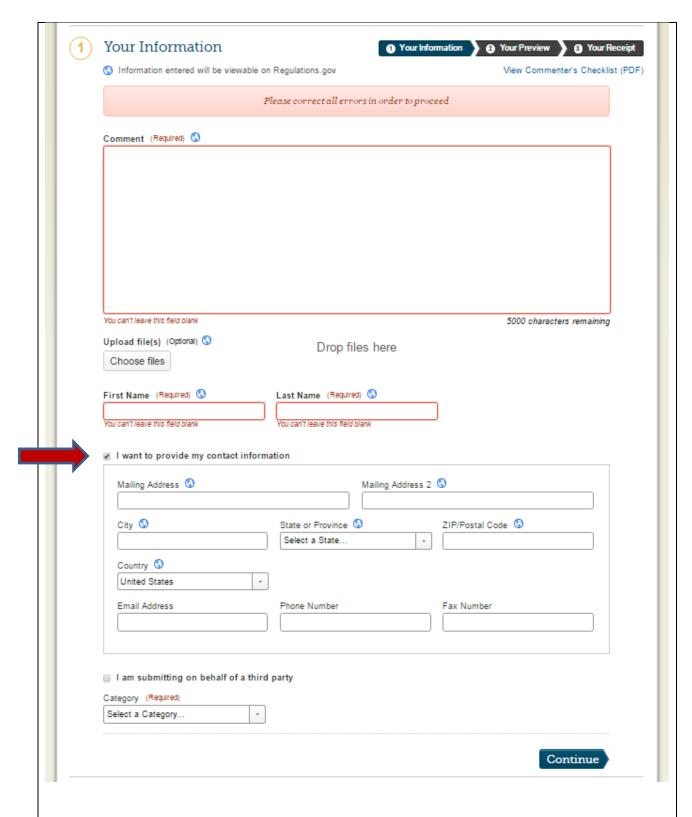
Summary: This Docket, FAA-2007-0001, is referred to as the "FAA (Federal Aviation Administration) Shell Docket". This Docket is for Applications, Petitions (excluding Sec. 333 Petitions), CARES, etc., without an Associated Docket (without an assigned Docket number).

Select the "Comment Now" icon next to the "Instructions on Filing a Submission to the FAA" result.

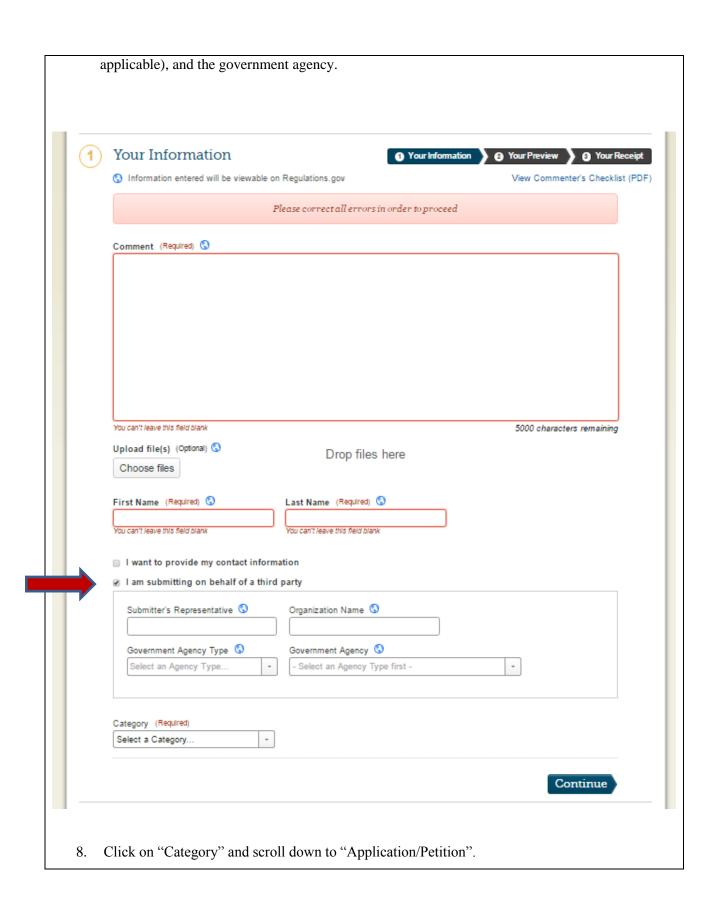


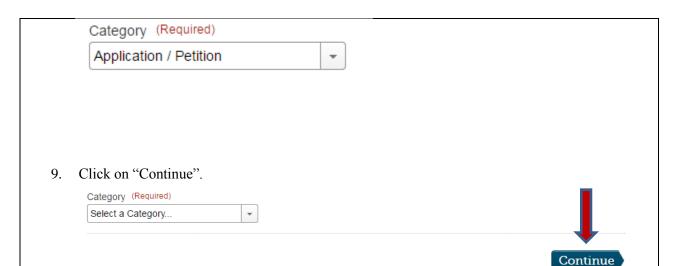
6. Enter your First and Last Names. If you wish to be the point of contact on the exemption request, click the box next to "I want to provide my contact information", type your mailing address and, if you wish, other contact information such as email address, phone number, or fax number

Note: FAA regulations require your name and address when submitting a petition for exemption.



7. Additionally, you can submit an exemption request on behalf of a third party. If this is the case, click the box next to "I am submitting on behalf of a third party" and type in the name of the submitter's representative, organization name (if applicable), the government agency type (if





- 10. On the "Your Preview" page, review the information you entered. If edits are required, click on "Edit" and make changes. If you approve, review the submission statement, and if you understand the statement, click on the box to indicate such.
- 11. Click on "Submit Comment".

Once the confirmation page appears with your comment tracking number, print the page or record your comment tracking number to locate your petition after submission. If you wish to receive a copy of your confirmation page by email, enter your email address and click "Email Receipt".

D. Submission Instructions-Quick Reference Guide

- Go to: http://www.regulations.gov/
- Enter "FAA-2007-0001-0001" in the "SEARCH for: Rules, Comments, Adjudications or Supporting Documents:" field
- Click "Search".
- Click the "Comment Now!" button on the right side of the page.
- Fill out the information requested under #1 "ENTER INFORMATION" on the left side of the page.
- Go to #3 "UPLOAD FILES(s) (Optional)".
- Click the "Choose File" button and upload your petition.
- Click "Submit"

• Take note of the tracking number on the confirmation screen. You can enter this number into the SEARCH field at www.regulations.gov in 7-10 days to view your petition in the docket and learn the unique docket number that has been assigned to your petition.

VI. Petition for Exemption Templates

A. Petition Template for CARES (when the user is over 44 pounds and/or 40 inches tall)

I am writing to request an exemption from Title 14 of the Code of Federal Regulations (14 CFR) § 121.311(b) to the extent required for *name* to be able to use a Federal Aviation Administration (FAA) approved child restraint system even though *she/he* exceeds the weight limits for the CRS. In addition, if my petition is granted, I request that any air carrier or commercial operator operating under part 121 while *name* is aboard its aircraft is granted an exemption from 14 CFR § 121.311(b)(2)(iii)(B) to the extent necessary to allow *name* to exceed the specified weight limit for an FAA approved child restraint system during use of that child restraint system aboard an aircraft.

I believe the pertinent section from 14 CFR part 121 from which we seek relief is Section 121.311 Seats, safety belts, and shoulder harnesses.

My daughter/son is _____ years old, weighs _____ pounds, and is _____ inches tall.

My *daughter's/son's* physical condition is as follows (*Insert a description of physical challenges*). As a result of *her/his* physical condition, *she/he* needs the support and security provided by an FAA approved child restraint system, but because of *her/his weight/height* is incapable of compliance with the regulation.

I am also submitting the following contact information:

Mr. / Mrs. / Ms. first and last names of parent/guardian mailing address of parent/guardian including city, state and zip code email address of parent/guardian

I understand that the regulation is written to create a high level of safety for each individual passenger by ensuring that they are securely restrained in their seats during all phases of flight. The regulation also ensures that an individual does not cause harm to other passengers on the airplane by being thrown into them during turbulent or emergency conditions.

I propose that *name* be allowed to occupy an FAA approved child restraint system (CARES, manufactured by AmSafe, Inc.), even though (*she/he*) exceeds the manufacturer's *weight/height* limits. This ensures a high level of safety for *name* and a high level of safety for the other passengers and crew

on the airplane. In fact, in *name's* case, safety is greatly enhanced by the extra support and security that the FAA approved child restraint system will provide during the entire flight.

Enhancing safety for *name* is in the public interest. In addition, the public interest is also served by the fact that the use of this FAA approved child restraint system allows *her/him* to use commercial air transportation. Without the support and security of the FAA approved child restraint system, *she/he* would be unable to fly commercially.

I also believe that, with certain limitations established by the FAA in a grant to this petition, there can be an equivalent level of safety to that provided by the affected regulation. The CARES child restraint system has been certified by the manufacturer for use by children 22- 44 pounds. However, the components of the CARES restraint are the same as those used in restraints for adults on aircraft and would maintain their integrity if used by someone who weighed several hundred pounds.

I believe that the limit of 44 pounds was established because, with the additional weight of the child attached to the seatback, the seatback would move forward more quickly in an accident scenario, and this might cause a higher Head Injury Criteria (HIC) load for the person seated in the seat behind the passenger using the CARES child restraint system (because the seatback moving forward more quickly would mean that it would not be there to attenuate the energy from the impact of the person seated behind the person using the CARES child restraint system).

In order to achieve an equivalent level of safety as that provided by the affected regulation, I propose that the FAA establish a limitation in a grant to this petition that *name* only sits in a passenger seat with no passenger seated behind *her/him*. Therefore, no unsafe condition would exist for a passenger seated behind *name* while *she/he* is using the CARES child restraint system. I also propose that all operations under this exemption be conducted with at least one of *name's* parents or a caregiver accompanying *her/him*. In addition, I propose that *name's* parent or caregiver must carry a copy of this exemption.

I also request that the processing of this petition not be delayed for publication and comment in the <u>Federal Register</u>. We want to travel *beginning/ending travel dates*. If you take the time to put this in the <u>Federal Register</u>, it will delay the process, and we may not be able to travel in this timeframe.

If it is necessary to put a summary in the Federal Register, I submit the following:

This is a request for an exemption from 14 CFR section 121.311 (b) to the extent required for a child to use an FAA approved child restraint system on an aircraft, even though the child exceeds the weight limits for the CRS. Due to physical challenges, without the support and security of this FAA approved child restraint system, this child would be unable to fly. We request that this child be allowed to occupy an FAA approved child restraint system (CARES, manufactured by AmSafe, Inc.), even though *she/he* exceeds the manufacturer's weight limits of 44 pounds. In this case, the safety of this child is greatly enhanced by the extra support and security that the FAA approved child restraint system will provide for *her/him* during the flight.

Thank you for your consideration of this request.

B. Petition Template for E-Z-On Harness

I am writing to request an exemption from Title 14 of the Code of Federal Regulations (14 CFR) § 121.311(b) to the extent required for *name* to be able to use a dynamically tested restraint system that conforms to the Federal Motor Vehicle Safety Standard No. 213 during all phases of flight, including ground movement, takeoff, and landing. In addition, if my petition is granted, I request that any air carrier or commercial operator operating under part 121 while *name* is aboard its aircraft is granted an exemption from 14 CFR § 121.311(b)(2)(iii)(B) to the extent necessary to allow *name* to use a dynamically tested restraint system that conforms to the Federal Motor Vehicle Safety Standard No. 213 during use of that restraint system aboard an aircraft.

I believe the pertinent section from 14 CFR part 121 from which we seek relief is Section 121.311 Seats, safety belts, and shoulder harnesses.

My *daughter/son* is _____ years old, weighs _____ pounds, and is _____ inches tall.

My *daughter's/son's* physical condition is as follows (*Insert a description of physical challenges*). As a result of *her/his* physical condition, *she/he* needs the support and security provided by a dynamically tested restraint system that conforms to the Federal Motor Vehicle Safety Standard No. 213 but because of *her/his* physical needs is incapable of compliance with the regulation.

I am also submitting the following contact information:

Mr. / Mrs. / Ms. first and last names of parent/guardian mailing address of parent/guardian including city, state and zip code email address of parent/guardian

I understand that the regulation is written to create a high level of safety for individual passengers by ensuring that they are securely restrained in their seats during all phases of flight. The regulation also ensures that an individual does not cause harm to other passengers on the airplane by being thrown into them during turbulent or emergency conditions.

I propose that *name* be allowed to occupy a dynamically tested restraint system that conforms to the Federal Motor Vehicle Safety Standard No. 213 (*Name*, *Model Number of E-Z-ON restraint device you wish to use inflight*). This dynamically tested restraint system conforms to the Federal Motor Vehicle Safety Standard No. 213, and use of this restraint system ensures a high level of safety for *name* and a

high level of safety for the other passengers and crew on the airplane. In fact, in *name's* case, safety is greatly enhanced by the extra support and security that the restraint system will provide during the entire flight.

Enhancing safety for *name* is in the public interest. In addition, the public interest is also served by the fact that the use of this restraint system allows *her/him* to use commercial air transportation. Without the support and security of this restraint system, *she/he* would be unable to fly commercially.

I also believe that, with certain limitations established by the Federal Aviation Administration (FAA) in a grant to this petition, there can be an equivalent level of safety to that provided by the affected regulation. The components of the restraint system are the same as those used in restraints for adults on aircraft and would maintain their integrity if used by someone who weighed several hundred pounds.

In order to achieve an equivalent level of safety as that provided by the affected regulation, I propose that the FAA establish a limitation in a grant to this petition. Specifically, I propose that all operations under this exemption be conducted with at least one of *name's* parents or a caregiver accompanying *her/him*. In addition, I propose that the restraint system is used in accordance with the manufacturer's instruction manuals, which require that the restraint system is first installed on *name* and, in turn, secured to the airplane passenger seats using at least two of the aircraft seat belts. Proper use requires *name* to be lying in a prone position across two airplane passenger seats during the flight, to include ground movement, takeoff, and landing. *Name's* parent or caregiver must carry a copy of this exemption and advise the air carrier about the contents of the exemption at least 48 hours before the date of each flight.

I also request that the processing of this petition not be delayed for publication and comment in the <u>Federal Register</u>. We want to travel *beginning/ending travel dates*. If you take the time to put this in the <u>Federal Register</u>, it will delay the process, and we may not be able to travel in this timeframe.

If it is necessary to put a summary in the Federal Register, I submit the following:

This is a request for an exemption from 14 CFR section 121.311 (b) to the extent required for a child to use a dynamically tested restraint system that conforms to the Federal Motor Vehicle Safety Standard No. 213 on an aircraft. Due to physical challenges, without the support and security of this restraint system, this child would be unable to fly. In this case, the safety of this child is greatly enhanced by the extra support and security that the restraint system will provide for *her/him* during the flight.

Thank you for your consideration of this request.								
Pavision 6.1.17	35							

C. Petition Template for a Non-FAA Approved CRS with Hard Shell Seat and Back with Internal Harness

I am writing to request an exemption from Title 14 of the Code of Federal Regulations (14 CFR) § 121.311(b) to the extent required for *Name* to be able to use *a/an Name*, *Model Number of restraint system* as a restraint system during all phases of flight while aboard an aircraft. In addition, if my petition is granted, I request that any air carrier operating under part 121 while *Name* is aboard its aircraft is granted an exemption from 14 CFR § 121.311(b) to the extent necessary to allow *Name* to use *a/an Name*, *Model Number of restraint system* as a restraint system during all phases of flight while aboard an aircraft.

I believe the pertinent section from 14 CFR part 121 from which we seek relief is Section 121.311 Seats, safety belts, and shoulder harnesses.

My daughter/son is _____ years old, weighs _____ pounds, and is _____ inches tall.

My daughter's/son's physical condition is as follows (Insert a description of physical challenges). As a result of her/his physical condition, she/he needs the support and security provided by the Name, Model Number of restraint system and because of her/his disability is incapable of compliance with the

regulation.

I am also submitting the following contact information:

Mr. / Mrs. / Ms. first and last name of parent/guardian mailing address of parent/guardian including city, state and zip code email address of parent/guardian

I understand that the regulation is written to create a high level of safety for each individual passenger by ensuring that they are securely restrained in their seats during all phases of flight. The regulation also ensures that an individual does not cause harm to other passengers on the airplane by being thrown into them during turbulent or emergency conditions.

I propose that *Name* be allowed to occupy *a/an Name of restraint system*, which will be securely strapped in a passenger seat with the aircraft seat belt. *Name* will then be secured with the *Name of restraint system's* internal restraints. The *Name of restraint system* will not block any passenger's view of the "Fasten Seat Belt" sign, "No Smoking" sign, or any required exit sign. It will also be placed in

such a manner that its location will not restrict access to, or use of, any required emergency exit, or of the aisle in the passenger compartment.

This proposal will satisfy the intended purpose of the regulations by ensuring that *Name* is securely restrained by the *Name of restraint system*'s internal restraints and the *Name of restraint system* itself is securely restrained by the seat belt. This ensures a high level of safety for *Name* and a high level of safety for the other passengers and crew on the airplane. In fact, in *Name*'s case, safety is greatly enhanced by the extra support and security that the *Name of restraint system* will provide during the entire flight.

Enhancing safety for *Name* is in the public interest. In addition, the public interest is also served by the fact that the use of this restraint system allows *her/him* to use commercial air transportation. Without the support and security of this specially designed restraint system, *she/he* would be unable to fly commercially.

I propose that all operations under the exemption be conducted with at least one of *Name's* parents or a caregiver accompanying *her/him*. I also propose that *Name*, while seated in the *Name of restraint system*, must be secured with the restraint's internal restraint system. I further propose that the *Name of restraint system* must be secured in the airplane passenger seat by means of the airplane passenger seatbelt in accordance with the instructions provided with the restraint.

In addition, I propose that *Name's* parent or caregiver be required to carry a copy of the exemption with them during the flight and to advise the air carrier about the contents of the exemption at least 48 hours before the date of each flight.

I also request that the processing of this petition not be delayed for publication and comment in the <u>Federal Register</u>. We want to travel *beginning/ending travel dates*. If you take the time to put this in the <u>Federal Register</u>, it will delay the process and we may not be able to travel in this timeframe.

If it is necessary to put a summary in the Federal Register, I submit the following:

This is a request for an exemption from 14 CFR section 121.311 (b) and (c) to the extent required for a person to use *a/an Name of restraint system* on an aircraft. Due to physical challenges, without the support and security of the *Name of restraint system*, this person would be unable to fly. In this case, the

safety of this person is greatly enhanced by the extra support and security that the <i>Name of restraint</i>							
system will provide for her/him during the flight.							
Thank you f	or your considera	ation of this reque	st.				

VII. FAA Information Regarding the Use of Child Restraint Systems on Aircraft

A. FAA Website



http://www.faa.gov/passengers/fly children/

The FAA website contains information regarding:

- Child Restraint Systems (CRS)
- Installing a CRS on an Airplane
- FAA Approved Child Harness Device (CARES)
- Tips for Parents
- Seat Fit
- Children with Special Needs
- Where Can I Find More Information?

B. Child Restraint Regulations:

- For general aviation flights: 14 CFR 91.107: Use of safety belts, shoulder harnesses, and child restraint systems.
 - http://www.ecfr.gov/cgi-bin/text-idx?SID=d34f7b37ccfc524f3dbc2e156c76a9c3&mc=true&node=pt14.2.91&rgn=div 5#se14.2.91_1107
- For commercial aviation flights: 14 CFR 121.311: Seats, safety belts, and shoulder harnesses (use of seat/safety belts).

- http://www.ecfr.gov/cgi-bin/text-idx?SID=d34f7b37ccfc524f3dbc2e156c76a9c3&mc=true&node=pt14.3.121&rgn=div5#se14.3.121_1311
- For private carriage operations: 14 CFR 125.211: Seat and safety belts.
 - http://www.ecfr.gov/cgi-bin/text-idx?SID=d34f7b37ccfc524f3dbc2e156c76a9c3&mc=true&node=pt14.3.125&rgn=div5#se14.3.125_1211
- For commuter and on-demand operations: 14 CFR 135.128: Use of safety belts and child restraint systems.
 - http://www.ecfr.gov/cgi-bin/text-idx?SID=d34f7b37ccfc524f3dbc2e156c76a9c3&mc=true&node=pt14.3.135&rgn=div5#se14.3.135_1128

C. Child Restraint Advisory Circulars (AC):

An AC is an informational document produced by the FAA to inform and guide external stakeholders within the aviation industry, as well as the general public. ACs are used to convey information, best practices and means of compliance with certain regulations. They provide information about regulations and operations.

- AC 91-62A: Use of Child Seats in Aircraft.
 - http://www.airweb.faa.gov/Regulatory_and_Guidance_Library/rgAdvisoryCircular.n sf/0/79C64C8578074E45862569EA00695A20?OpenDocument
- AC 120-87C: Use of Child Restraint Systems on Aircraft.
 - http://www.airweb.faa.gov/Regulatory_and_Guidance_Library/rgAdvisoryCircular.n sf/0/054397A43411433086257ED00053F7F9?OpenDocument

D. Child Restraint Information for Operators (InFO)

An InFO contains valuable information for operators that should help them meet administrative requirements or certain regulatory requirements with relatively low urgency or impact on safety. InFOs contain information or a combination of information and recommended action to be taken by the respective operators identified in each individual InFO.

• InFO 07012: Accommodating Approved Harness-type CRS.

- https://www.faa.gov/other_visit/aviation_industry/airline_operators/airline_safety/inf o/all_infos/media/2007/inFO07012.pdf
- InFO 15013: Regulatory Requirements Regarding Accommodation of Child Restraint Systems.
 - https://www.faa.gov/other_visit/aviation_industry/airline_operators/airline_safety/inf
 o/all_infos/media/2015/InFO15013.pdf

E. Child Restraint Civil Aerospace Medical Institute (CAMI) Technical Reports:

The CAMI Technical Reports index is a listing of aviation research reports from 1961 to the present. The reports are available in full-text Adobe PDF format to view and download.

- FAA-AM-78-12: Child Restraint Systems for Civil Aircraft.
 - http://www.faa.gov/data_research/research/med_humanfacs/oamtechreports/1970s/m edia/am78-12.pdf
- FAA-AM-94-19: Performance of Child Restraint Devices in Transport Airplane Pax Seats.
 - https://www.faa.gov/data_research/research/med_humanfacs/oamtechreports/1990s/media/AM94-19.pdf
- FAA-AM-11-3: Aviation Child Safety Device Performance Standards Review.
 - https://www.faa.gov/data_research/research/med_humanfacs/oamtechreports/2010s/media/201103.pdf
- To access other FAA CAMI Reports
 - o http://www.faa.gov/data_research/research/med_humanfacs/oamtechreports/

F. Child Restraint Technical Standard Order (TSO):

A TSO is a minimum performance standard issued by the FAA for specified materials, parts, processes, and appliances used on aircraft. TSO-C100c contains minimum performance standards for the testing and evaluation of CRS.

- TSO C100c: Child Restraint System (CRS).
 - http://rgl.faa.gov/Regulatory_and_Guidance_Library/rgTSO.nsf/0/14280BE2D4385
 A92862579E40047815B?OpenDocument