

SPACE ACT AGREEMENT NO. NNK11MS05S  
BETWEEN  
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION  
AND  
UNITED LAUNCH ALLIANCE, L.L.C.  
FOR  
COMMERCIAL CREW DEVELOPMENT ROUND 2 (CCDev 2)

**BACKGROUND**

In 2009, the National Aeronautics and Space Administration ("NASA") began the Commercial Crew Development ("CCDev") initiatives to stimulate efforts within the private sector to develop system concepts and capabilities that could ultimately lead to the availability of commercial human spaceflight services. NASA is continuing that effort through a second round of CCDev initiatives ("CCDev 2") in order to further foster activity leading to the development of orbital commercial Crew Transportation Systems ("CTS"). Through this CCDev 2 activity, NASA may be able to continue to spur economic growth as capabilities for new space markets are created, and reduce the gap in U.S. human spaceflight capability.

The goals of the CCDev 2 initiative are to advance orbital commercial CTS concepts and enable significant progress on maturing the design and development of elements of the system, such as launch vehicles and spacecraft, with the overall objective of accelerating the availability of U.S. CTS capabilities while ensuring crew and passenger safety. This Space Act Agreement (the "Agreement" or "SAA") represents ULA's and NASA's commitment to encourage innovations and efficiencies in CTS concepts and capabilities to achieve these CCDev 2 goals.

ARTICLE 1. AUTHORITY AND PARTIES

This Agreement is entered into by the National Aeronautics and Space Administration, located at 300 E Street, SW, Washington, D.C. (hereinafter referred to as "NASA" or Government), and United Launch Alliance, L.L.C., (hereinafter referred to as "ULA" or "Participant") with a place of business at 9100 E. Mineral Circle, Centennial, Colorado. NASA and ULA may be individually referred to as a "Party" and collectively referred to as the "Parties". NASA's authority to enter into this Agreement is in accordance with the authority set forth in Sections 203(c)(5) and 203(c)(6) of the National Aeronautics and Space Act of 1958, as amended. This agreement will be implemented by NASA at the John F. Kennedy Space Center in Brevard County, Florida.

## ARTICLE 2. PURPOSE

The purpose of this Agreement is to provide limited technical assistance to ULA's advancement of commercial crew space transportation systems concepts. ULA's development work should show, within the timeframe of the Agreement, significant progress in maturing the design and development of elements of a commercial CTS while ensuring crew and passenger safety.

## ARTICLE 3. RESPONSIBILITIES

A. ULA will:

(1) Conduct the CCDev 2 effort as described in and in accordance with the milestones listed in Article 4 of this Agreement.

(2) Lead a project status briefing in conjunction with each Milestone Review described in Article 4.

B. NASA will:

(1) Participate in milestone and technical review briefings as identified under Article 4, Schedule and Milestones to develop appropriate technical insight.

(2) Participate in the project status briefings provided in conjunction with each Milestone Review described in Article 4.

## ARTICLE 4. SCHEDULE AND MILESTONES

The planned major milestones for the activities referred to in Article 3, "Responsibilities" are as follows:

<p>Launch Vehicle Certification Kickoff Review - Conduct kickoff to present program expectations and program plan.</p>	<p>July 2011</p>
<p>Design Equivalency Review (DER) Summary Review - ULA will present a briefing of Atlas V systems requirements and certification process development.</p> <p>ULA Documentation provided for review includes, but is not limited to: Decomposition results of system level assessment; Allocation of relevant requirements to Launch Vehicle; Preliminary Disposition of relevant requirements by affected functional area Subject Matter Experts from all functional areas affected by the CTS Requirements; and ULA Launch Vehicle CTS Certification Process Description. Definition of concept and trade study parameters for key design activities required for CTS.</p>	<p>July- September 2011</p>
<p>Probabilistic Risk Assessment (PRA) Review - Review PRA for Launch Vehicle and Safety Critical Support Systems. Includes Explosion Modeling, System Hazard Analysis and Report, and revised Fault Coverage Characteristics.</p>	<p>July - November 2011</p>
<p>Tailored System Requirements Review (SRR) – ULA shall conduct a Tailored SRR of the system requirements for Atlas V</p> <p>ULA Documentation provided for review includes, but is not limited to: Common Element CTS Certification Impacts Description, Draft Hazard Report; Draft System Safety Report; PRA Summary; Common Elements Requirements Review. Results of key design trade studies required for CTS.</p>	<p>November - December 2011</p>
<p>Systems Requirements Review (SRR) Completion of common element risk mitigation evaluation and common element level requirements reviews to establish requirements and flowdown for each common element.</p> <p>ULA Documentation provided for review includes, but is not limited to: Final CTS Certification Requirements for Atlas Launch Vehicle; Hazard Report; System Safety Report; Atlas CTS PRA Report; CTS ULA Certification Rationale for Atlas LV; Common Elements Development Program Plan.</p>	<p>Second Quarter 2012</p>

ARTICLE 5. [RESERVED]

ARTICLE 6. DISSEMINATION OF PUBLIC INFORMATION

A. NASA or ULA may, consistent with Federal law and this Agreement, release general information regarding its participation in this Agreement as desired.

B. ULA agrees the words "National Aeronautics and Space Administration" or the letters "NASA" will not be used in connection with a product or service in a manner reasonably calculated to convey any impression that such product or service has the authorization, support, sponsorship, or endorsement of NASA, which does not, in fact, exist. In addition, with the exception of release of general information in accordance with paragraph A above, ULA agrees that any proposed public use of the NASA name or initials shall be submitted by ULA in advance to the NASA Administrative Contact, who will submit the proposed use to the NASA Assistant Administrator for Public Affairs or designee ("NASA Public Affairs") for review and approval. NASA approval shall be based on applicable law and policy governing the use of the NASA name and initials. Such approval shall not be unreasonably withheld. Use of NASA emblems/devices (i.e., NASA Seal, NASA Insignia, NASA logotype, NASA Program Identifiers, and the NASA Flag) is governed by 14 C.F.R. Part 1221. ULA agrees that any proposed use of such emblems/devices shall be submitted in advance to the NASA Administrative Contact, who will submit the proposed use to NASA Public Affairs for review and approval in accordance with such regulations.

C. NASA does not endorse or sponsor any commercial product, service, or activity. NASA's participation in this Agreement does not constitute endorsement by NASA. ULA agrees that nothing in this Agreement will be construed to imply that NASA authorizes, supports, endorses, or sponsors any product or service of ULA resulting from activities conducted under this Agreement.

ARTICLE 7. NASA FURNISHED INFORMATION AND SERVICES

A. NASA may, at its sole discretion and on terms to be negotiated between the Parties (including terms relating to the determination under 51 U.S.C. § 20135(b) in Article 13 below), provide ULA services, technical expertise, or access to Government Property. Such NASA services, technical expertise, or access to Government Property may be provided on either a reimbursable or non-reimbursable basis. Specific services and property and any terms and conditions applicable to the provision of such services, technical expertise and access to Government property will be identified in appropriate appendices to this Agreement. Unless NASA specifically requires ULA to use NASA furnished services, technical expertise, or Government Property to fulfill its obligations under this Agreement, any decision by ULA to use NASA furnished services, technical expertise, or Government Property shall be at ULA's

discretion. ULA shall remain solely responsible for completion of its milestones under this Agreement regardless of the availability or use of NASA services, technical expertise, or Government Property.

B. ULA may enter into separate Space Act agreements with NASA Centers to use NASA resources in performance of this Agreement. The terms and conditions of such other Space Act agreements will govern the use of NASA resources not being provided under this Agreement. ULA will be responsible for ensuring timely, accurate work of its team, including any NASA Centers, and, if necessary, replacing such subcontractors/partners in order to meet milestones.

#### ARTICLE 8. NONEXCLUSIVITY

This Agreement is not exclusive; accordingly, NASA may enter into similar Agreements for the same or similar purpose with other entities.

#### ARTICLE 9: PARTICIPANT CERTIFICATIONS

Within 10 calendar days of the effective date of this agreement, and within 10 calendar days of any change in status under A. through C. below (including the addition of any new contractor/partner), ULA shall certify to the best of its knowledge and belief the following to the NASA Administrative Contact:

- A. Neither ULA nor any of its contractors/partners are presently debarred, suspended, proposed for debarment, or otherwise declared ineligible for award of funding by any Federal agency.
- B. Neither ULA nor any of its contractors/partners have been convicted nor had a civil judgment rendered against it within the last three (3) years for fraud in obtaining, attempting to obtain, or performing a Government contract.
- C. ULA is an eligible participant as defined in Section 4.2 of the CCDev 2 Announcement.

#### ARTICLE 10. LIABILITY AND RISK OF LOSS

A. ULA hereby waives any claims against NASA, its employees, its Related Entities, (as used in this Article 10, "Related Entities" is defined as contractors and subcontractors at any tier, grantees, investigators, customers, users, and their contractors and subcontractors, at any tier) and employees of NASA's Related Entities for any injury to, or death of, ULA employees or the employees of ULA's Related Entities, or for damage to, or loss of, ULA's property or the property of its Related Entities arising from or related to activities conducted under this

Agreement, whether such injury, death, damage, or loss arises through negligence or otherwise, except in the case of willful misconduct.

B. ULA further agrees to extend this unilateral waiver to its Related Entities by requiring them, by contract or otherwise, to waive all claims against NASA, its related entities, and employees of NASA and employees of NASA's related entities for injury to, or death of, their employees or for damage to or loss of their property arising from or related to activities conducted under this Agreement.

#### ARTICLE 11. [RESERVED]

#### ARTICLE 12. INTELLECTUAL PROPERTY AND DATA RIGHTS - RIGHTS IN DATA

##### A. General

(1) "Related Entity" as used in this Article 12, means a contractor, subcontractor, grantee, or other entity having a legal relationship with NASA or ULA that is assigned, tasked, or contracted with to perform specified NASA or ULA activities under this Agreement.

(2) "Data," as used in this Agreement, means recorded information, regardless of form, the media on which it may be recorded, or the method of recording. The term includes, but is not limited to, data of a scientific or technical nature, software and documentation thereof, and data comprising commercial and financial information.

(3) "Proprietary Data," as used in this Article, means Data embodying trade secrets or comprising commercial or financial information that is privileged or confidential.

(4) The Data rights set forth herein are applicable to employees of ULA and employees of any Related Entity of ULA. ULA shall ensure that its employees and employees of any Related Entity that perform ULA activities under this Agreement are aware of the obligations under this Article and that all such employees are bound to such obligations.

(5) Data exchanged between NASA and ULA under this Agreement will be exchanged without restriction as to its disclosure, use, or duplication except as otherwise provided in this Article.

(6) No preexisting Proprietary Data will be exchanged between the Parties under this Agreement unless specifically authorized in this Article or in writing by the owner of the Proprietary Data.

(7) In the event that Data exchanged between NASA and ULA include a restrictive notice that NASA or ULA deems to be ambiguous or unauthorized, NASA or ULA may inform the other Party of such condition. Notwithstanding such a notice, as long as such notice provides an indication that a restriction on use or disclosure was intended, the Party receiving such Data will treat the Data pursuant to the requirements of this clause unless otherwise directed in writing by the Party providing such Data.

(8) Notwithstanding any restriction on use, disclosure, or reproduction of Data provided in this clause, the Parties will not be restricted in the use, disclosure, or reproduction of Data provided under this Agreement that: (a) is publicly available at the time of disclosure or thereafter becomes publicly available without breach of this Agreement; (b) is known to, in the

possession of, or developed by the receiving Party independent of carrying out the receiving Party's responsibilities under this Agreement and independent of any disclosure of, or without reference to, Proprietary Data or otherwise protectable Data hereunder; (c) is received from a third party having the right to disclose such information without restriction; or (d) is required to be produced or released by the receiving Party pursuant to a court order or other legal requirement.

(9) If either NASA or ULA believes that any of the events or conditions that remove restriction on the use, disclosure, or reproduction of the Data apply, NASA or ULA will promptly notify the other Party of such belief prior to acting on such belief, and, in any event, will notify the other Party prior to an unrestricted use, disclosure, or reproduction of such Data.

(10) Disclaimer of Liability: Notwithstanding any restriction on use, disclosure, or reproduction of Data provided in this Article, NASA will not be restricted in, nor incur any liability for, the use, disclosure, or reproduction of any Data not identified with a suitable restrictive notice in accordance with paragraphs B and G of this Article or of any Data included in Data which ULA has furnished, or is required to furnish to the U.S. Government without restriction on disclosure and use.

(11) ULA may use the following, or a similar, restrictive notice as required by paragraphs B and G of this Article. In addition to identifying Proprietary Data with such a restrictive notice, ULA should mark each page containing Proprietary Data with the following, or a similar, legend:

"PROPRIETARY DATA – use and disclose only in accordance with notice on title or cover page."

#### Proprietary Data Notice

These data herein include *<enter as applicable: "Background Data" or "Data Produced by ULA under a Space Act Agreement">* in accordance with the Data Rights provisions under Space Act Agreement *<provide applicable identifying information>* and embody Proprietary Data. In accordance with the Space Act Agreement, NASA will use reasonable efforts to maintain the data in confidence and limit use, disclosure, and reproduction by NASA and any Related Entity of NASA (under suitable protective conditions including a non-disclosure agreement between ULA and the NASA Related Entity) in accordance with restrictions identified in the Space Act Agreement *<may list specific restrictions listed in the Agreement>*.

#### B. Data First Produced by ULA under this Agreement

(1) Data first produced by ULA in carrying out ULA's responsibilities under this Agreement, will be furnished to NASA upon request and such Data will be disclosed and used by NASA and any Related Entity of NASA (under suitable protective conditions) during the term of this Agreement only for evaluating ULA's performance under this Agreement. If ULA considers any such Data to be Proprietary Data, and such Data is identified with a suitable restrictive notice, NASA will use reasonable efforts to maintain the Data in confidence.

(2) Upon a successful completion by ULA of all milestones under this Agreement, NASA shall not assert rights in such Data or use such Data for any purpose except that NASA shall

retain the right to: (1) maintain a copy of such Data for archival purposes; and (2) use or disclose such archived Data by or on behalf of NASA for Government purposes in the event the NASA determines that

(a) Such action is necessary because ULA, its assignee, or other successor has not taken, or is not expected to take within a reasonable time, effective steps to achieve practical application of inventions, hardware, or software related to such Data;

(b) Such action is necessary because ULA, its assignee, or other successor, having achieved practical application of inventions, hardware, or software related to such Data, has failed to maintain practical application;

(c) Such action is necessary because ULA, its assignee, or other successor has discontinued making the benefits of inventions, hardware, or software related to such Data available to the public or to the Federal Government;

(d) Such action is necessary to alleviate health or safety needs which are not reasonably satisfied by ULA, its assignee, or other successor; or

(e) Such action is necessary to meet requirements for public use specified by Federal regulations and such requirements are not reasonably satisfied by ULA, its assignee, or successor.

In the event NASA determines that one of the circumstances listed in subparagraphs (a)–(e) above exists, NASA shall provide written notification to the ULA Administrative Point of Contact. Upon mailing of such determination, ULA shall have thirty (30) days to respond by providing its objection to the determination as a dispute under the Article entitled “Dispute Resolution” of this Agreement. In the event that ULA does not respond in writing to NASA’s determination, then such determination shall serve as a final agency decision for all purposes including judicial review.

(3) In the event NASA terminates this Agreement in accordance with Article 16.B., Termination for Failure to Perform, NASA shall have the right to use, reproduce, prepare derivative works, distribute to the public, perform publicly, display publicly, or disclose Data first produced by ULA in carrying out ULA’s responsibilities under this Agreement by or on behalf of NASA for Government purposes.

(4) The Parties will negotiate rights in Data in the event of termination for any other reason.

#### C. Data First Produced by NASA under this Agreement

(1) As to Data first produced by NASA (or any Related Entity of NASA) in carrying out NASA responsibilities under this Agreement that would be Proprietary Data if it had been obtained from ULA, such Data will be appropriately marked with a restrictive notice and maintained in confidence for the duration of this Agreement, with the express understanding that during the aforesaid restricted period such marked Data may be disclosed and used by NASA and any Related Entity of NASA (under suitable protective conditions) only for carrying out NASA responsibilities under this Agreement.

(2) Upon a successful completion by ULA of all milestones under this Agreement, NASA shall not use such Data for any purpose except that NASA shall retain the right to: (1) maintain

and reproduce copies of such Data for archival purposes; and (2) use or disclose such archived Data by or behalf of the NASA for Government purposes in the event the NASA determines that

(a) Such action is necessary because ULA, its assignee, or other successor has not taken, or is not expected to take within a reasonable time, effective steps to achieve practical application of inventions, hardware, or software related to such Data;

(b) Such action is necessary because ULA, its assignee, or other successor, having achieved practical application of inventions, hardware, or software related to such Data, has failed to maintain practical application;

(c) Such action is necessary because ULA, its assignee, or other successor has discontinued making the benefits of inventions, hardware, or software related to such Data available to the public or to the Federal Government;

(d) Such action is necessary to alleviate health or safety needs which are not reasonably satisfied by ULA, its assignee, or other successor; or

(e) Such action is necessary to meet requirements for public use specified by Federal regulations and such requirements are not reasonably satisfied by ULA, its assignee, or successor.

In the event NASA determines that one of the circumstances listed in subparagraphs (a)–(e) above exists, NASA shall provide written notification to the ULA Administrative Point of Contact. Upon mailing of such determination, ULA shall have thirty (30) days to respond by providing its objection to the determination as a dispute under the Article entitled “Dispute Resolution” of this Agreement. In the event that ULA does not respond in writing to NASA’s determination, then such determination shall serve as a final agency decision for all purposes including judicial review.

(3) In the event NASA terminates this Agreement in accordance with Article 16.B., Termination for Failure to Perform, NASA shall have the right to use, reproduce, prepare derivative works, distribute to the public, perform publicly, display publicly, or disclose Data first produced by NASA in carrying out NASA’s responsibilities under this Agreement by or on behalf of NASA for Government purposes.

(4) The Parties will negotiate rights in Data in the event of termination for any other reason.

#### D. Publication of Results

(1) Recognizing that section 203 of the National Aeronautics and Space Act of 1958 (42 U.S.C. § 2473), as amended, requires NASA to provide for the widest practicable and appropriate dissemination of information concerning its activities and the results thereof, and that the dissemination of the results of NASA activities is one of the considerations for this Agreement, NASA will coordinate proposed publication of results with ULA in a manner that allows ULA a reasonable amount of time to review and comment on proposed publications.

(2) Consistent with other obligations in this Article, NASA agrees that it will not publish any results without first receiving permission from ULA.

#### E. Data Disclosing an Invention

In the event Data exchanged between NASA and ULA discloses an invention for which patent protection is being considered, the furnishing Party specifically identifies such Data, and the disclosure and use of such Data is not otherwise limited or restricted herein, the receiving Party agrees to withhold such Data from public disclosure for a reasonable time (presumed to be 1 year unless mutually agreed otherwise) in order for patent protection to be obtained.

F. Data Subject to Export Control

Data, whether or not specifically identified or marked, that is subject to the export laws and regulations of the United States and that is provided to ULA under this Agreement will be treated as such, and will not be further provided to any foreign persons or transmitted outside the United States without proper U.S. Government authorization, where required.

G. Background Data

(1) In the event ULA furnishes NASA with Data developed at private expense that existed prior to, or was produced outside of, this Agreement, and such Data embody Proprietary Data, and such Data is so identified with a suitable restrictive notice, NASA will use reasonable efforts to maintain the Data in confidence and such Data will be disclosed and used by NASA and any Related Entity of NASA (under suitable protective conditions including a non-disclosure agreement between ULA and the NASA Related Entity) only for evaluating ULA's performance under this Agreement. Upon completion of activities under this Agreement, such Data will be disposed of as requested by ULA.

(2) At the time of execution of this Agreement, the Parties agree that the Background Data identified in Appendix 1 (if any) embodies Proprietary Data that will be provided to NASA.

H. Handling of Data

(1) In the performance of this Agreement, ULA and any Related Entity of ULA may have access to, be furnished with, or use the following categories of NASA Data:

(a) Proprietary Data of third parties that the U.S. Government has agreed to handle under protective arrangements; and/or

(b) U.S. Government Data, the use and dissemination of which, the U.S. Government intends to control.

(2) Data provided by the U.S. Government under the Agreement

(a) The Parties agree that, during the term of this Agreement, ULA may request from NASA, and NASA may provide, Proprietary Data of third parties, with the express understanding that ULA will use and protect such Data in accordance with this Article.

(b) The Parties agree that, during the term of this Agreement, ULA may request from NASA, and NASA may provide, U.S. Government Data, with the express understanding that ULA will use and protect such U.S. Government Data in accordance with this Article.

(c) At the time of execution of this Agreement, the Parties agree that the following software and related Data will be provided to ULA, to the extent NASA has determined it has

the right to distribute, under a separate Software Usage Agreement with the express understanding that ULA will use and protect such related Data in accordance with this Article: NONE. Unless ULA has entered into a license, consistent with 37 C.F.R. Part 404, for software provided under this Agreement, upon completion of activities under this Agreement, such related Data will be disposed of as instructed by NASA. Note: From time to time during the term of this Agreement, ULA may request from NASA, and NASA may provide, such software and related data.

(3) With respect to such Data specifically identified in this Agreement or specifically marked with a restrictive notice, ULA agrees to:

(a) Use, disclose, or reproduce such Data only to the extent necessary to perform the work required under this Agreement;

(b) Safeguard such Data from unauthorized use and disclosure;

(c) Allow access to such Data only to its employees and any Related Entity that require access for their performance under this Agreement;

(d) Except as otherwise indicated in (3)(c) above, preclude access and disclosure of such Data outside ULA's organization;

(e) Notify its employees who may require access to such Data about the obligations under this Article, and ensure any Related Entity performs the same functions with respect to its employees; and

(f) Return or dispose of such Data, as NASA may direct, when the Data is no longer needed for performance under this Agreement.

I. Oral and visual information

If information that ULA considers to be Proprietary Data is disclosed orally or visually to NASA, NASA will have no duty to limit or restrict, and will not incur any liability for, any disclosure or use of such information unless (1) ULA orally informs NASA before initial disclosure that such information is considered to be Proprietary Data, and (2) ULA reduces such information to tangible, recorded form that is identified and marked with a suitable restrictive notice as required by paragraphs B and G above and furnishes the resulting Data to NASA within 10 calendar days after such oral or visual disclosure.

#### ARTICLE 13. INTELLECTUAL PROPERTY AND DATA RIGHTS - INVENTION AND PATENT RIGHTS

(1) The invention and patent rights herein apply to employees and Related Entities (as that term is used in Article 12) of Partner. Partner shall ensure that its employees and Related Entity employees know about and are bound by the obligations under this clause.

(2) NASA has determined that 51 U.S.C. § 20135(b) does not apply to this Agreement. Therefore, title to inventions made (conceived or first actually reduced to practice) under this agreement remain with the respective inventing Party(ies). No invention or patent rights are exchanged or granted under this Agreement. NASA and Partner will use reasonable efforts to report inventions made jointly by their employees (including employees of their Related Entities). The Parties will consult and agree on the responsibilities and actions to establish and maintain patent protection for joint invention, and on the terms and conditions of any license or other rights exchanged or granted between them.

#### ARTICLE 14. DISCLAIMER OF WARRANTY

Goods (e.g., equipment, facilities, technical information, data, and prototypes) and services, if provided by NASA or ULA under this Agreement, are provided "as is" and no warranty related to availability, title, or suitability for any particular use, nor any implied warranty of merchantability or fitness for a particular purpose, is provided under this Agreement. Neither NASA nor ULA makes any express or implied warranty as to any intellectual property, generated information, or product made or developed under this Agreement, or that the goods, services, materials, products, processes, information, or Data to be furnished hereunder will accomplish intended results or are safe for any purpose including the intended purpose. Neither Party nor its Related Entities shall be liable for any direct, general, special, consequential, indirect, or incidental damages attributed to such goods, services, materials, products, processes, information, or Data furnished under this Agreement.

#### ARTICLE 15. TERM OF AGREEMENT

This Agreement becomes effective upon the date of the last signature below and shall remain in effect until the completion of all obligations of both Parties hereto, or one (1) year from the date of the last signature, whichever comes first.

## ARTICLE 16. TERMINATION

### A. Termination by Mutual Consent

This Agreement may be terminated at any time upon mutual written consent of both Parties.

### B. Termination for Failure to Perform

At its discretion, NASA may terminate this Agreement 30 calendar days after issuance of a written notification that ULA has failed to perform under this Agreement, including failure to meet a scheduled milestone as identified and described in Article 4. Before making such a notification, NASA will consult with ULA to ascertain the cause of the failure and determine whether additional efforts are in the best interest of the Parties.

### C. Unilateral Termination by NASA

(1) NASA may unilaterally terminate this Agreement upon written notice in the following circumstances: (a) upon a declaration of war by the Congress of the United States; or (b) upon a declaration of a national emergency by the President of the United States; or (c) upon a NASA determination, in writing, that NASA is required to terminate for reasons beyond its control. For purposes of this Article, reasons beyond NASA's control include, but are not limited to, acts of God or of the public enemy, acts of the U.S. Government other than NASA, in either its sovereign or contractual capacity (to include failure of Congress to appropriate sufficient funding), fires, floods, epidemics, quarantine restrictions, strikes, freight embargoes, or unusually severe weather.

(2) Upon receipt of written notification that the Government is unilaterally terminating this Agreement, ULA shall immediately stop work under this Agreement and shall immediately cause any and all of its partners and suppliers to cease work, except to the extent that ULA wishes to pursue the activities defined in Article 4 exclusively for its own benefit.

### D. Limitation on Damages.

In the event of any termination by either Party, neither NASA nor ULA shall be liable for any loss of profits, revenue, or any indirect or consequential damages incurred by the other Party, persons in privity with such Party, or customers as a result of any termination of this Agreement.

## ARTICLE 17. CONTINUING OBLIGATIONS

The obligations of the Parties set forth in the provisions of Article 10 (Liability and Risk of Loss) and Articles 12-13 (Intellectual Property and Data Rights) of this Agreement, and such other

rights and obligations which by their terms continue past the expiration or termination of this Agreement, shall so continue to apply.

ARTICLE 18. DISPUTE RESOLUTION

All disputes concerning questions of fact or law arising under this Agreement shall be referred by the claimant in writing to the ULA Administrative Contact and the NASA Administrative Contact, who shall seek to resolve such disputes by mutual agreement. If they are unable to resolve the dispute, then the dispute will be referred to the KSC Commercial Crew Development Program Manager and the VP Business Development and Advance Programs, George Sowers for joint resolution. If the Parties are still unable to resolve the dispute, the Associate Administrator for Exploration Systems Mission Directorate, or the Deputy of the Directorate, will seek to resolve the dispute, and if necessary issue a written decision that shall be a final Agency decision for all purposes including judicial review.

Pending resolution of any disputes pursuant to this Article, the Parties agree that performance of all obligations shall be pursued diligently in accordance with the direction of the KSC Commercial Crew Development Program Manager.

The Parties agree that this Disputes Resolution procedure shall be the exclusive procedure followed by the Parties in resolving any dispute arising under, or based on, an express or implied provision of this Agreement, including an alleged breach.

ARTICLE 19. PRINCIPAL POINTS OF CONTACT

The following personnel are designated as the Administrative and Technical Contacts between the Parties in the performance of this Agreement.

NASA Administrative Contact

\_\_\_\_\_  
David Shreve  
Agreements Officer  
John F. Kennedy Space Center  
Mail Code: OP  
NASA Kennedy Space Center, FL 32899  
  
Phone: 321-867-3456  
Fax: 321-867-1166  
E-mail: david.shreve@nasa.gov

ULA Administrative Contact

\_\_\_\_\_  
[REDACTED]  
Contracts Administrator  
United Launch Alliance, L.L.C  
9100 E. Mineral Circle  
Littleton, CO 80112  
Mail Code: [REDACTED]  
Phone: [REDACTED]  
Fax: [REDACTED]  
E-mail: [REDACTED]

NASA Technical Contact

Cheryl Malloy  
Launch Vehicle Partner Manager  
Mail Stop: FA-C  
Kennedy Space Center, FL 32899  
Phone: 321-867-3778  
Fax: 321-861-8923  
Cheryl.A.Malloy@nasa.gov

ULA Technical Contact

[REDACTED]  
Program Manager  
United Launch Alliance, L.L.C  
9100 E. Mineral Circle  
Littleton, CO 80112  
Mail Code: [REDACTED]  
Phone: [REDACTED]  
Fax: [REDACTED]  
E-mail: [REDACTED]

ARTICLE 20. MODIFICATION/AMENDMENTS

All modifications and amendments to this Agreement shall be by mutual agreement of the Parties and shall be executed, in writing, and signed by the signatories to this Agreement, or their respective successor or designee.

ARTICLE 21. ASSIGNMENT OF RIGHTS

Neither this Agreement nor any interest arising under it will be assigned by either Party without the express written consent of the other Party.

ARTICLE 22. ANTI-DEFICIENCY ACT

There will be no transfer of funds or other financial obligations between the Parties under this Agreement and each Party will fund its own participation. All activities under or pursuant to this Agreement are subject to the availability of funds, and no provision of this Agreement shall be interpreted to require obligation or payment of funds in violation of the Anti-Deficiency Act, Title 31 U.S.C. § 1341.

ARTICLE 23. APPLICABLE LAW AND SEVERABILITY

A. U.S. Federal law governs this Agreement for all purposes, including, but not limited to, determining the validity of this Agreement, the meaning of its provisions, and the rights, obligations and remedies of the Parties.

B. If any portion of this Agreement is held invalid by a court of competent jurisdiction, the Parties agree that such invalidity shall not affect the validity of the remaining portions of this Agreement, unless applying such remaining portions would frustrate the purpose of this Agreement.

#### ARTICLE 24. EXPORT LICENSES

ULA will be responsible for:

A. Compliance with all U.S. export control laws and regulations, including the International Traffic in Arms Regulations (ITAR), 22 CFR Parts 120 through 130, and the Export Administration Regulations (EAR), 15 CFR Parts 730 through 799, in the performance of this Agreement. In the absence of available license exemptions/exceptions, ULA will be responsible for obtaining the appropriate licenses or other approvals, if required, for exports of hardware, technical data, and software, or for the provision of technical assistance.

B. Obtaining export licenses, if required, before utilizing foreign persons in the performance of this Agreement, including instances where CCDev 2 efforts are to be performed on-site at NASA Centers, where the foreign person will have access to export-controlled technical data or software.

C. All regulatory record keeping requirements associated with the use of licenses and license exemptions/exceptions.

D. Ensuring that the provisions of this Article apply to persons in privity with ULA for activities conducted under this Agreement.

In the event that either Party intends to utilize a foreign person (as defined in the ITAR and the EAR) in the performance of this Agreement, such Party shall be responsible for obtaining the required export licenses in advance of the foreign person's participation.

#### ARTICLE 25. LIMITATIONS ON ACTIVITIES WITH RUSSIAN ENTITIES FOR GOODS OR SERVICES

A. ULA shall not provide technical support received from NASA under this Agreement to Russian entities without first receiving written approval from the NASA Administrative Contact. In order to obtain this written approval to engage in such transactions with any Russian entity, ULA shall provide the NASA Administrative Contact with the following information related to each planned transaction:

(1) A detailed description of the Russian entity, including its name, address, and a point of contact, as well as a detailed description of the proposed transaction including the specific purpose of payments that will be made under the transaction.

(2) ULA shall provide certification that the Russian entity is not on any of the denied parties, specially designated nationals and entities of concern, lists found at:

BIS's Listing of Entities of Concern: <http://www.access.gpo.gov/bis/ear/pdf/744spir.pdf>

BIS's List of Denied Parties: <http://www.bis.doc.gov/dpl/default.shtm>

OFAC's List of Specially Designated Nationals:

<http://www.ustreas.gov/offices/enforcement/ofac/sdn/>

List of Unverified Persons in Foreign Countries:

[http://www.bis.doc.gov/enforcement/unverifiedlist/unverified\\_parties.html](http://www.bis.doc.gov/enforcement/unverifiedlist/unverified_parties.html)

State Department's List of Parties Statutorily Debarred for Arm Export Control Act Convictions: <http://www.pmdetc.state.gov/compliance/debar.html>

State Department's List of Proliferating Entities:

<http://www.state.gov/t/isn/c15231.htm>

- B. Unless otherwise agreed by the NASA Administrative Contact, the information necessary to seek approval to enter into any transaction shall be provided to the NASA Administrative Contact 30 calendar days prior to entering into such transaction with any Russian entities.
- C. After receiving approval to enter into a requested transaction, ULA shall provide the NASA Administrative Contact with a report not later than 10 calendar days after the end of each calendar quarter which documents the individual payments made to such Russian entity.
- D. For the purpose of this Article 25, the term "Russian entities" includes the following:
- (1) Russian persons, or
  - (2) Entities created under Russian law (including any organization, entity, or element of the Government of the Russian Federation) or owned, in whole or in part, by Russian persons or companies.

ARTICLE 26. SIGNATURE BLOCK

NATIONAL AERONAUTICS AND  
SPACE ADMINISTRATION

BY: Philip R. McAlister  
Philip McAlister  
Acting Director, Commercial Spaceflight  
Development

DATE: 7/13/2011

UNITED LAUNCH ALLIANCE, L.L.C.

BY: Randall M. Tanner  
Randall M. Tanner  
Manager, Contracts

DATE: 13 JULY 2011

## **APPENDIX 1: Background Data**

Any data associated with the design, analysis, development, qualification, certification, test, production, launch and business operations of the Atlas V launch vehicle.