1. **GRANTEE**: Romeo Systems, Inc.  
d.b.a. Romeo Power  
Vernon, CA

2. **PURPOSE AND LIMITATION:**

   a. This special permit authorizes the transportation in commerce of lithium ion batteries each exceeding 35 kg net weight when transported aboard cargo aircraft. This special permit provides no relief from the Hazardous Materials Regulations (HMR) or the International Civil Aviation Organization’s Technical Instructions for the Safe Transport of Dangerous Goods by Air (ICAO TI) other than as specifically stated herein. The most recent revision supersedes all previous revisions.

   b. The safety analyses performed in the development of this special permit only considered the hazards and risks associated with the transportation in commerce.

   c. No party status will be granted to this special permit.

   d. This special permit serves as an approval under Packing Instruction 965, Section IA.2. paragraph 3 and Special Provision A99 of the ICAO TI and as a “Competent Authority Approval” as defined under 49 CFR § 107.1.

3. **REGULATORY SYSTEM AFFECTED**: 49 CFR Parts 106, 107 and 171-180 and the ICAO TI.
4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR § 172.101 Hazardous Materials Table Column (9B) in that a lithium battery may exceed 35 kg when transported aboard cargo aircraft; and § 173.185(b) in that alternative packaging is authorized, as specified herein.

5. BASIS: This special permit is based on the application of Romeo Systems, Inc. dated November 23, 2020, submitted in accordance with § 107.109.

6. HAZARDOUS MATERIALS (49 CFR 172.101):

<table>
<thead>
<tr>
<th>Hazardous Materials Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proper Shipping Name</td>
</tr>
<tr>
<td>------------------------</td>
</tr>
<tr>
<td>Lithium ion batteries</td>
</tr>
</tbody>
</table>

7. SAFETY CONTROL MEASURES:

a. PACKAGING:

(1) The Hermes Modules:

   (i) Inner Packaging: Each battery module must be placed in a non-metallic inner packaging (such as a poly bag) that completely encloses the module and surrounded by cushioning material (such as foam liners) that is non-combustible and non-conductive.

   (ii) Outer Packaging: The inner packaging must be further packaged in a UN 4G fiberboard box rated to the Packing Group II performance level.

(2) The Prometheus Battery Pack: Each battery pack must have a strong impact-resistant outer casing, have an anti-static foam placed on the top and bottom of the pack prior to the pack being shrink wrapped, and be packaged in a non-specification wooden crate as described in Romeo Systems, Inc.’s application dated July 23, 2020 and on file with the Office of Hazardous Materials Safety Approvals and Permits Division.
(3) The enclosed modules or battery packs must be securely fastened to the outer box to prevent movement during transportation.

(4) A maximum of one battery module or pack per package is permitted.

b. OPERATIONAL CONTROLS:

(1) Only the following batteries are authorized to be transported under the terms of this special permit:

<table>
<thead>
<tr>
<th>Battery</th>
<th>Configuration</th>
<th>Energy</th>
<th>Max Net Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hermes 16S Module</td>
<td>16S36P</td>
<td>10–10.5 kWh</td>
<td>50 kg</td>
</tr>
<tr>
<td>Hermes 24S Module</td>
<td>24S24P</td>
<td>10–10.5 kWh</td>
<td>50 kg</td>
</tr>
<tr>
<td>Prometheus Battery Pack</td>
<td>8S1P</td>
<td>80–84 kWh</td>
<td>500 kg</td>
</tr>
</tbody>
</table>

(i) The Hermes 16S modules consist of Samsung SDI cells (either Model INR21700-48G, INR21700-50G or INR21700-48X) arranged in a 16S36P configuration. Each module has a maximum weight of 50 kg. The nominal capacity of modules comprising of the 48G and 48X cells is 10 kWh and 10.5 kWh for the module comprising of the 50G cells.

(ii) The Hermes 24S modules consist of Samsung SDI cells (either Model INR21700-48G, INR21700-50G or INR21700-48X) arranged in a 24S24P configuration. Each module has a maximum weight of 50 kg. The nominal capacity of the modules comprising of the 48G and 48X cells is 10 kWh and 10.5 kWh for the module comprising of the 50G cells.

(iii) The Prometheus packs consist of an 8S1P configuration of the Hermes 24S modules. The maximum weight of the battery pack is 500 kg and
the maximum energy capacity of the pack is 80 kWh with the 48G and 48X cells and 84 kWh when utilizing the 50G cells.

(2) The battery modules and the battery packs must be equipped with an effective means to prevent dangerous reverse current flow.

(3) Lithium ion cells, modules, and battery packs must be protected against short circuits.

(4) The state of charge of the battery modules and packs may not exceed 30\% when offered for transportation.

c. TESTING:

(1) All lithium ion cells must be of a type that have passed all required tests as specified in the “UN Manual of Tests and Criteria, 6th Revised Edition”.

(2) All battery modules (Hermes 16S and Hermes 24S) must be of a type that have passed all required tests as specified in the “UN Manual of Tests and Criteria, 6th Revised Edition”.

(3) The Prometheus battery pack must be equipped with a battery management system that has been verified as preventing overcharge, short circuits, and over-discharge between the battery modules.

d. MARKING: Each package covered under the terms of this special permit must be durably and legibly marked and displayed on a background of contrasting color with “DOT-SP 21081”.

8. SPECIAL PROVISIONS:

a. Under the terms of this special permit, the grantee may only offer hazardous materials (i.e., the grantee is not authorized as a carrier).

b. A person who is not a holder of this special permit who receives a package covered by this special permit may reoffer it for transportation provided no modification or change is made to the package and it is reoffered for transportation in conformance with this special permit, the HMR, and the ICAO TI.
c. A current copy of this special permit must be maintained at each facility where the package is offered or reoffered for transportation.

d. This special permit in no way affects the need to obtain any required authorizations from other agencies of the United States Government or from the competent authorities of countries of origin, transit, and destination.

9. **MODES OF TRANSPORTATION AUTHORIZED:** Cargo-only aircraft.

10. **MODAL REQUIREMENTS:** A current copy of this special permit must be carried aboard each aircraft used to transport packages covered by this special permit. The shipper must furnish a copy of this special permit to the air carrier before or at the time the shipment is tendered.

11. **COMPLIANCE:** Failure by a person to comply with any of the following may result in suspension or revocation of this special permit and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. 5101 et seq:

   o All terms and conditions prescribed in this special permit and the Hazardous Materials Regulations, 49 CFR Parts 171-180.

   o Persons operating under the terms of this special permit must comply with the security plan requirement in Subpart I of Part 172 of the HMR, when applicable.

   o Registration required by §107.601 et seq., when applicable.

Each “Hazmat employee”, as defined in §171.8, who performs a function subject to this special permit must receive training on the requirements and conditions of this special permit in addition to the training required by §§172.700 through 172.704.

No person may use or apply this special permit, including display of its number, when this special permit has expired or is otherwise no longer in effect.
Under Title VII of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU)—“The Hazardous Materials Safety and Security Reauthorization Act of 2005” (Pub. L. 109-59), 119 Stat. 1144 (August 10, 2005), amended the Federal hazardous materials transportation law by changing the term “exemption” to “special permit” and authorizes a special permit to be granted up to two years for new special permits and up to four years for renewals.

12. **REPORTING REQUIREMENTS**: Shipments or operations conducted under this special permit are subject to the Hazardous Materials Incident Reporting requirements specified in 49 CFR §§ 171.15 - Immediate notice of certain hazardous materials incidents, and 171.16 - Detailed hazardous materials incident reports. In addition, the grantee(s) of this special permit must notify the Associate Administrator for Hazardous Materials Safety, in writing, of any incident involving a package, shipment or operation conducted under terms of this special permit.

Issued in Washington, D.C.:

[Signature]

for William Schoonover
Associate Administrator for Hazardous Materials Safety


Copies of this special permit may be obtained by accessing the Hazardous Materials Safety Homepage at [https://www.phmsa.dot.gov/approvals-and-permits/hazmat/special-permits-search](https://www.phmsa.dot.gov/approvals-and-permits/hazmat/special-permits-search). Photo reproductions and legible reductions of this special permit are permitted. Any alteration of this special permit is prohibited.

PO: SH/TG