



**SAB-B9**

**MATERIAL SAFETY DATA SHEET**

Revision 6 – 7 Jun 2016

**1. Product and manufacturer Identification**

Alpinestars Commercial Reference: 650 8015 – Tech Air System 650 8016 – Tech Air Race Vest  
Alpinestars Certification Reference: SAB1 RAV1  
Directive 2007/23 Registration Number: 0080.P1.15.0023 0080.P1.15.0023

The Tech Air System is a vest which is subsequently installed into a compatible outer garment. The Tech Air System is a device which is intended to increase the level of protection offered to a motorcyclist in the event of an accident. An on board control unit monitors the rider and inflates the airbag in case of danger. The inflatable subassembly is not for any other use.

Manufacturer Information: Alpinestars SpA  
Viale Fermi 5, Asolo (TV), 31011, ITALY  
Tel: +39 0423 5286

**2. Hazard Identification**

In case of function the assembly will:

Effect	Hazard
a. Rapidly inflate and attempt to form a predefined shape.	Possible Mechanical Injury if not worn correctly
b. Create a bang at the instant of inflation	Possible hearing discomfort
c. Slowly vent the filling gas	Possible irritant if inhaled in high concentrations

Note that function of the assembly will only occur if commanded by the electronic unit, or if the conditions in section 5 are met.

**3. Composition and information on Ingredients**

The inflatable subassembly consists of two airbag inflators attached with an ear clamp to a sealed airbag chamber.

Airbag Chamber: Manufactured from Nylon 6,6 yarn, laminated with a Polyurethane coating  
Airbag Inflators: A Steel vessel containing an igniter and 15-30g of a compressed gas mixture (96% Argon, CAS 7440-37-1 and 4% helium, CAS 7440-59-7)  
Each Igniter contains 0.350g of Zirconium Potassium Perchlorate

**4. First Aid Measures**

Shall be applied with reference to the type of injury received listed in the hazards above.

**5. Fire Fighting measures**

Copious amounts of water must be used to extinguish fires and to cool the items. Note also that:

- When the temperature exceeds 125°C the inflators will start to release the gas stored inside
- When the temperature exceeds 300°C the igniters will self combust

**6. Accidental Release Measures**

In the event of accidental release the individual articles can be readily collected. No special collection or decontamination procedure is required.

**7. Handling and Storage**

Storage:

Where possible store inside original packaging: Temperatures between -20°C & +60°C with humidity < 80%. Where the original packaging is no longer available the item is best stored suspended vertically on a hanger.

Handling:

- Packaged in a box or unpackaged: No special handling is required.
- When installed in compatible outer garment: The electronic unit must be switched off. In this state no special handling is required. The system can be verified in the off state if there are no illuminated LEDs on the garment sleeve when the garment is fastened.

## 8. Exposure Controls and Personal Protection

Exposure Controls

N/A

Individual Protection:

No particular PPE is required

## 9. Physical and Chemical Properties

Appearance:

- The vest is predominantly black in colour with yellow details. There is a segmented back protector on the rear of the article. The electronic control unit is visible on the rear as well as the words "Tech Air" in white.

## 10. Stability and Reactivity

The assembly is inherently stable. Conditions to avoid are:

- Exposure to excessive heat or flame (See section 5)
- Crushing or puncturing of the device – this may cause a rapid escape of gas from the inflator(s)

## 11. Toxicological Information

Nil

## 12. Ecological Information

Nil

## 13. Disposal Information

The assembly may not be disposed of while both inflation units are still live. These must both be fired. Once this has been done the assembly may be disposed of in accordance with national waste regulations for fabrics, metals and electronic parts. It is suggested that the assembly is returned to Alpinestars for disposal at the end of its life.

## 14. Transportation Information

The European Notified Body, INERIS has conducted an assessment of the Tech Air System (SAB1) and in relation to UN documents ST/SG/AC.10/1/Rev 19 and ST/SG/AC.10/11/Rev.5 and notably the paragraphs 2.1.1.1b and 2.1.3.6.1 in chapter 2.1 of the document ST/SG/AC.10/1/Rev 18 has found that the system does NOT merit inclusion as Dangerous Goods in neither Class 1 nor Class 9 .

As a consequence the Tech Air System (SAB1) can be considered as 'NOT DANGEROUS GOODS' and thus does not require any special handling for road, rail, sea or air transport. This certificate, reference PNEO – AgCE 123/5 is attached.

## 15. Regulatory Information

The airbag inflators have been CE Certified under EU Directive 2007/23/EC, registration number : 0589.P1.000406  
The Tech Air Vest SAB1 and RAV1 (Airbag Module) has been CE Certified under EU Directive 2007/23/EC, registration number 0080.P1.15.0023

## 16. Additional Information

The information contained in this document relates only to the specific assembly described. The information is correct to the best of Alpinestar's knowledge at the date of publication. This information is provided only for guidance on the safe handling, storing, use, processing, storage, transportation and disposal and is not to be considered as a warranty or quality specification.

Created by: CJB Checked by: PR

Verneuil-en-Halatte, le 18 septembre 2015

**CERTIFICAT DE NON-CLASSEMENT EN CLASSES 1 & 9**

- 1- Ce certificat, délivré par l'INERIS, laboratoire officiel chargé des essais de produits explosifs, approuve le non-classement de l'objet désigné ci-dessous, d'après les principes définis par le Comité d'Experts en matière de transport des marchandises dangereuses de l'ONU, publiés dans les documents ST/SG/AC.10/1/Rev.19 and ST/SG/AC.10/11/Rev.5 et notamment les paragraphes 2.1.1.1b et 2.1.3.6.1 du chapitre 2.1 du document ST/SG/AC.10/1/Rev.19.
- 2- Ce certificat a été établi à la demande de la Société Alpinestars S.p.a., Viale Fermi 5, Asolo (TV), 31011 Italie, en date du 17 juin 2015.
- 3- Nom commercial : Module airbag pour veste de motocycliste TECH AIR VEST (SAB1)  
(Certificat d'examen CE de type n°0080.P1.15.0023)
- 4- Le non-classement en classes 1 et 9 repose sur l'examen d'un dossier technique de définition de l'objet et sur des essais réalisés sur des objets non emballés et emballés, en rapport avec la disposition spéciale 289 du document ST/SG/AC.10/1/ Rev.19.
- 5- Ce certificat permet l'application des dispositions prévues dans les réglementations sur les transports des marchandises dangereuses : ADR, RID, IMDG, OACI, ADN.
- 6- Date d'expiration :  
Ce certificat annule et remplace le certificat référence DSC-15-152036-04591A, PNEO-AgCE 123/3 en date du 5 mai 2015. Il demeure valable jusqu'à abrogation ou remplacement par un certificat révisé.



Certifié par :

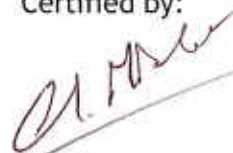
C. MICHOT  
Délégué Général Certification

Verneuil-en-Halatte, September 18, 2015

**NO-CLASSIFICATION IN CLASSES 1 & 9 CERTIFICATE**

- 1- This certificate, by INERIS, an official laboratory in charge of testing explosive products, approves the no-classification of the article listed hereafter, according to the recommendations of the United Nations Committee of Experts on the Transport of Dangerous Goods as published in the UN Documents ST/SG/AC.10/1/Rev.19 and ST/SG/AC.10/11/Rev.5 and notably the paragraphs 2.1.1.1b and 2.1.3.6.1 in chapter 2.1 of the document ST/SG/AC.10/1/ Rev.19.
- 2- This certificate is based on the request of the Company Alpinestars S.p.a., Viale Fermi 5, Asolo (TV), 31011 Italy, dated June 17, 2015.
- 3- Description: Motorcyclist vest airbag module TECH AIR VEST (SAB1)  
(EC type examination certificate nr 0080.P1.15.0023)
- 4- The no-classification in classes 1 and 9 is based on a technical file describing the article and on tests performed on representatively unpackaged and packed articles, in conjunction with special provision 289 of the document ST/SG/AC.10/1/ Rev.19.
- 5- This certificate enables to implement the provisions in the regulations on the transport of dangerous goods: ADR, RID, IMDG, ICAO, ADN.
- 6- Expiration date:  
This certificate cancels and replaces the certificate reference DSC-15-152036-04591A, PNEO-AgCE 123/3 dated May 5, 2015. It remains valid until withdrawn or superseded by a revised certificate.

Certified by:



**C. MICHOT**  
Chief Certification Officer

