**PPE RISK ASSESSMENT**Hereby,

Name of manufacturer: Mad Hatter Ware   
Address: 14/F Winfull Commercial Building 172-76 Wing Lok St. Sheung Wan  
City: Hong Kong

Country China

Declares that this product (helmet):  
  
Product description: Helmets for alpine skiers and snowboarders   
Trademark:   
Type: S-298  M: 56-59CM ; L: 60-63CM ;

Is compliant with the following: **(Requirements covered by the harmonized standard(s) are crossed out)**

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| **Essential health and safety requirements**  **(Annex II)** | **EN1077 Helmet for alpine skiers and snow-boarders** | **EN1078 Helmet for pedal- cyclists and for users of skate-boards and roller skates** | **EN1080 Helmet for impact protection helmets for young children** | **EN1385 Helmet for canoeing or white water sport (class 1-4)** | **EN1384 Helmet for  eques-trian activities** | **EN12492 Helmet for mountain- eers** | **Risk Level** | | | 1. **Justification/explanation**   **risk level (mandatory for all risk levels)**  **+**   1. **Risk Control Measures (Mandatory for Medium and High risk level)** |
| **Low** | **Medium** | **High** |
| **1.1.1 Ergonomics**  PPE must be so designed and manufactured that in the foreseeable conditions of use for which it is intended the user can perform the risk-related activity normally whilst enjoying appropriate protection of the highest possible level. | YES |  |  |  |  |  | √ |  |  | 1. The actual usability of the PPE had been checked.The user is able to perform the sport without problems.  2. design control plan. The design stage of the PPE, ergonomic principles had been evaluated and improved. The current state of art had been considered for protection. |
| **1.1.2.1 Highest level of protection possible**  The optimum level of protection to be taken into account in the design is that beyond which the constraints imposed by the wearing of the PPE would prevent its effective use during the period of exposure to the risk or normal performance of the activity. | YES |  |  |  |  |  |  | √ |  | 1. Helmet is designed using the EN960 headform and for the specific sport.    2. User instructions describe proper helmet fitting and use. The helmet provides some protection even when not properly adjusted |

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| **1.1.2.2 Classes of protection appropriate to different levels of risk**  Where differing foreseeable conditions of use are such that several levels of the same risk can be distinguished, appropriate classes of protection must be taken into account in the design of the PPE. |  |  |  |  |  |  |  |  |  |  |
| **1.2.1 Absence of risks and other ‘inherent’ nuisance factors**  PPE must be so designed and manufactured as to preclude risks and other nuisance factors under foreseeable conditions of use. |  |  |  |  |  |  |  |  |  |  |
| **1.2.1.1 Suitable constituent materials**  PPE materials and parts, including any of their decomposition products, must not adversely affect user hygiene or health. |  |  |  |  |  |  |  |  |  |  |
| **1.2.1.2 Satisfactory surface conditions of all PPE parts in contact with the user**  Any PPE part in contact with the user must be free of roughness, sharp edges, projections and the like which could cause excessive irritation or injuries. |  |  |  |  |  |  |  |  |  |  |
| **1.2.1.3 Maximum permissible user impediment**  Any impediment caused by PPE to movements to be made, postures to be adopted and sensory perception must be minimized; nor must PPE cause movements which endanger the user or other persons. |  |  |  |  |  |  |  |  |  | 1.    2. |

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| **1.3.1 Adaptation of PPE to user morphology**  PPE must be so designed and manufactured as to facilitate correct positioning on the user and to remain in place for the foreseeable period of use. It must be possible to optimize PPE adaptation to user morphology by all appropriate means. |  |  |  |  |  |  |  |  |  |  |
| **1.3.3. Compatibility of different classes or types of PPE designed for simultaneous use**.  If the same manufacturer markets several PPE models of different classes or types in order to ensure the simultaneous protection of adjacent parts of the body against combined risks, these must be compatible. | YES |  |  |  |  |  |  | √ |  | 1. Register the type of accessories using on different models, and control the income material (What kind of PPE does the manufacturer purchase with the helmet (gloves or eye wear/goggles?)  no any PPE accessories with the helmet.  2. quality control plan; The helmet can only protect the head and does not protect other body parts. |
| **2.1 PPE incorporating adjustment systems**  If PPE incorporates adjustment systems, the latter must be so designed and manufactured as not to become incorrectly adjusted without the user’s knowledge under the foreseeable conditions of use. |  |  |  |  |  |  |  |  |  | 1.    2. |
| **2.2 PPE ‘enclosing’ the parts of the body to be protected.**  PPE ‘enclosing’ the parts of the body to be protected must be sufficiently ventilated to limit perspiration resulting from use; if this is not the case, it must if possible be equipped with devices which absorb perspiration. | YES |  |  |  |  |  | √ |  |  | 1. Design enough ventilation holes and use perspiration absorption material inside the helmet.  2. using test (EN1077 and some chemical test for the parts on the helmet)Helmet is designed with ventilation and absorption material |
| **2.4 PPE subject to ageing**  If it is known that the design performances of new PPE may be significantly affected by ageing, the date of manufacture and/or, if possible, the date of obsolescence, must be indelibly inscribed on every PPE item, in such a way as to preclude any misinterpretation; this information must also be indelibly inscribed on the packaging. If a manufacturer is unable to give an undertaking with regard to the useful life of PPE, his notes must provide all the information necessary to enable the purchaser or user to establish a reasonable obsolescence date, bearing in mind the quality level of the model and the effective conditions of storage, use, cleaning, servicing and maintenance. Where appreciable and rapid deterioration in PPE performance is likely to be caused by ageing resulting from the periodic use of a cleaning process recommended by the manufacturer, the latter must, if possible, affix a mark to each item of PPE placed on the market indicating the maximum number of cleaning operations that may be carried out before the equipment needs to be inspected or discarded; failing that, the manufacturer must give this information in his notes. |  |  |  |  |  |  |  |  |  |  |
| **2.7 PPE intended for emergency use or rapid installation and/or removal**  These PPE classes must be so designed and manufactured as to minimize the time required for attachment and (or) removal. Any integral systems permitting correct positioning on, or removal from, the user must be susceptible of rapid and easy operation. | YES |  |  |  |  |  | √ |  |  | 1. The helmet donning and doffing was designed very easily through the chin strap buckle. with one action the helmet can be doffing in case of any problem.    2. Instruction manual describes how to use it. |
| **2.9 PPE incorporating components which can be adjusted or removed by the user.**  Any PPE components which can be adjusted or removed by the user for the purpose of replacement must be so designed and manufactured as to facilitate adjustment, attachment and removal without tools. | YES |  |  |  |  |  |  | √ |  | 1. Register the type of accessories using on different models,.    2. Instructions are provided in the manual |
| **3.6.2 Complete PPE ready for use**  the quantity of heat transmitted by PPE to the user must be sufficiently low to prevent the heat accumulated during wear in the part of the body at risk from attaining, under any circumstances, the pain or health impairment threshold | YES |  |  |  |  |  | √ |  |  | 1.The helmet is enclosing a relatively small part of the head. Extra attention is being paid to heat transmittance of the materials in the design process  2. Helmet is designed with vents. |
| **3.7.2 Complete PPE ready for use**  The flux transmitted by PPE to the user must be sufficiently low to prevent the cold accumulated during wear at any point on the part of the body being protected, including the tips of fingers and toes in case of hands or feet, from attaining, under any circumstances the pain or health impairment threshold | YES |  |  |  |  |  | √ |  |  | 1. The human head can get cold when riding in extremely cold conditions and the helmet will help by covering the head.  2. Helmet has comfort pads to help keep the head warm in cold environments. Field testing validates adequate heat management. |
| That the required warnings made in the PPE standards are available to the end-user either by marking or instructions. | YES |  |  |  |  |  | √ |  |  | 1. User can read the warnings in instruction manual.  2. Labels are inside the helmet and on the packaging |
| Are there any critical manufacturing states during the production process that may lead to a degradation of performance | YES |  |  |  |  |  | √ |  |  | 1. The quality of the PPE is found to be consistent  2. strict quality control plan; |
| Is the production process standard to ensure product consistency | YES |  |  |  |  |  | √ |  |  | 1. We have made production control standards to check the consistency, also the tests.  2. batch testing |

**Additional health risks only applicable for S-EPAC helmets:**

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| **Risk & hazards identification**  **(beyond coverage of the HS)** | **Risk**  **Occurrence Probability**  **[%]** | **Impact of the hazard** | | | 1. **Justification/explanation**   **risk level (mandatory for all risk levels)**  **+**   1. **Risk Control Measures (Mandatory for Medium and High risk level)** |
| **Low** | **Medium** | **High** |
| Head injury when falling from a S-EPAC (high speed electric bike) | NA |  |  |  | 1. use of this PPE IN S-EPAC which not intended use and would be unusual    2. Design and test according EN 1077：2007 class B  3. no control measured for this |

**Other safety or health risks not defined above and not covered by the harmonized standard(s):**

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| **Risk & hazards identification**  **(beyond coverage of the HS)** | **Risk**  **Occurrence Probability**  **[%]** | **Impact of the hazard** | | | 1. **Justification/explanation**   **risk level (mandatory for all risk levels)**  **+**   1. **Risk Control Measures  (mandatory for medium and high risk levels)** |
|  |  | **Low** | **Medium** | **High** |  |
| Strangulation / suffocation | <1% |  |  | √ | 1. Intended Sport have inherent strangulation risk,but it is very low    2. Read the manual carefully before use helmet |
| Neck injury | <1% |  |  | √ | 1.If don't use the helmet in the right way,neck injury will be occur, It's possible that in rare cases, a user could sustain a neck injury while using PPE.    2. Read the manual carefully before use helmet |
|  |  |  |  |  | 1.    2. |
|  |  |  |  |  | 1.    2. |

The manufacturer and / or the entity who places the product on the market, confirms that the product contains no health impairing concentrations of substances according to Annex XVI and XVII of Regulation (EC) No. 1907/2006 (REACH).

The requirements for polyaromatic hydrocarbons (PAH) to GS 2014:01 PAK are met. We also confirm that the product is made of materials that under foreseeable conditions of normal use or by degradation do not release substances generally known to be toxic, carcinogenic, mutagenic, allergenic, toxic to reproduction or otherwise harmful.

Date: 10-12-2024

City: Hong Kong

Name: Max Theil

Function: Operations

Signature: