SAFETY DATA SHEET

1. Identification of the substance/preparation and of the company/undertaking

- 1.1 **Product identifier** Product Name: ARV-471 CAS#: 2229711-68-4 Catalog: EX-A5021
- **1.2** Relevant identified uses of the substance or mixture and uses advised against: Laboratory chemicals, manufacture of substances

1.3 Details of the supplier of the safety data sheet Company name: Excenen Pharmatech Co.,Ltd Tel: + 86 20 81775650 Fax: + 86 20 81619670 E-mail: tech@excenen.com

1.4 Emergency telephone number Emergency Phone: + 86 20 81775650

2. Hazards identification

2.1 Classification of the substance or mixture Not a hazardous substance or mixture.

2.2 GHS Label elements, including precautionary statements.

Not a hazardous substance or mixture.

GHS Precautionary Statements:

P261: Avoid breathing dust/fume/gas/mist/vapors/spray.

P280: Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.

P301+P312 IF SWALLOWED: Call a POISON CENTER or doctor if you feel unwell.

P302+P352 IF ON SKIN: Wash with plenty of water

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes/Remove contact lenses, if present and easy to do. Continue rinsing.

2.3 Other hazards

Irritating to eyes, respiratory system and skin.

3. Composition/information on ingredients

Name: ARV-471 FM: C45H49N5O4 Purity: >95% HPLC

4. <u>First Aid Measures(Symptoms)</u>

Skin contact: There may be redness or whiteness of the skin in the area of exposure. Irritation or pain may occur at the site of contact.

Eye contact: The eyes may water profusely. The vision may become blurred. There may be pain and redness.

Ingestion: Nausea and stomach pain may occur. There may be vomiting. The casualty may appear intoxicated. Convulsions may occur. There may be loss of consciousness.

Inhalation: Absorption through the lungs can occur causing symptoms similar to those of ingestion. Drowsiness or mental confusion may occur. There may be a feeling of tightness in the chest with shortness of breath.

4. Fist Aid Measures (Action)

Skin contact: Remove all contaminated clothes and footwear immediately unless stuck to skin. Drench the affected skin with running water for 10 minutes or longer if substance is still on skin. Transfer to hospital if there are burns or symptom of poisoning.

Eye contact: bathe the eye with running water for 15 minutes. Consult a doctor.

Ingestion: Wash out mouth with water. Do not induce vomiting. If conscious, give half a litre of water to drink immediately. Of unconscious, check for breathing and apply artificial respiration if necessary. If unconscious and breathing is OK, place in the recovery position. Transfer to hospital as soon as possible.

Inhalation: Remove casualty from exposure ensuring one's own safety whilst doing so. If conscious, ensure the casualty sites or lies down. If unconscious and breathing is OK, place in the recovery position. If unconscious, check for breathing and apply artificial respiration if necessary. If breathing becomes bubbly, have the casualty sit and provide oxygen if available. Transfer to hospital as soon as possible.

5. <u>Fire-fighting Measures</u>

Extinguishing media: Suitable extinguishing media for the surrounding fire should be used. Carbon dioxide, Dry chemical powder, Alcohol or polymer foam. Halons. Use water spray to cool containers.

Exposure hazards: In combustion emits toxic fumes.

Protection of fire-fighters: Wear seft-contained breathing apparatus. Wear protective clothing to prevent contact with skin and eyes.

6. Accidental release Measures

Personal precautions: Evacuate the area immediately. If outside do not approach from downwind, If outside keep bystanders upwind and away from danger point. Mark out the contaminated area with signs and prevent access to unauthorized personnel. Do not attempt to take action without suitable protective clothing – see section 8 of SDS. Turn leaking containers leak-side up to prevent the escape of liquid.

Environmental precautions: Do not discharge into drains or rivers. Contain the spillage using bunding. Alert the neighborhood to the presence of fumes or gas.

Clean-up procedures: Clean-up should be dealt with only by qualified personnel familiar with the specific substance. Mix with sand or vermiculite. Transfer to a closable, labeled salvage container for disposal by an appropriate method.

7. <u>Handling and storage</u>

Handling requirements: Avoid direct contact with the substance. Ensure there is exhaust ventilation of the area. Do not handle in a confined space. Avoid the formation of spread of mists in the air.

Storage conditions: Store in cool well ventilated area. Keep container tightly closed; keep away from sources or ignition. Avoid contact with water or humidity.

Recommended storage temperature:

-20°C	3 years
4°C	2 vears

In solvent

Powder

-80°C	6 months
-20°C	1 month

Shipping at room temperature if less than 2 weeks.

8. Exposure Controls/Personal Protection

Engineering measures: Use only in a chemical fume hood.

Respiratory protections: Seft-contained breathing apparatus must be available in case of emergency.

Hand protection: Impermeable gloves.

Eye protection: Safety goggles. Ensure eye bath is to hand.

Skin protection: Impermeable protective clothing.

9. <u>Physical and Chemical Properties</u>

State: solid powder

10.<u>Stability and Reactivity:</u>

Stability: Stable under cool conditions.

Conditions to avoid: Heat. Flames.

Materials to avoid: Strong oxidizing agents.

Haz. Decomp. Products: In combustion emits toxic fumes. In combustion emits toxic fumes of carbon dioxide/carbon monoxide. In combustion emits toxic fumes of hydrogen fluoride, nitric oxide, carbon monoxide etc.

11.<u>Toxicological Information:</u>

Chronic toxicity: To the best of our knowledge, the toxicological properties of this product have not been fully determined. It is recommended that this product be treated as harmful, and is only used by stall trained in the handling of hazardous chemicals.

Routes or exposure: Refer to section 4 of SDS for routes of exposure and corresponding symptoms.

12. Ecological Information

Mobility: N/A. Persistence and degradability: No data available. Bioaccumulative potential: No data available. Other adverse affects: No data available

13. Disposal Considerations

Disposal operations: Arrange disposal as special waste, by licensed disposal company. Disposal of packaging: Arrange for collection by specialized disposal company. NB: The user's attention is drawn to the possible existence of regional or national regulations regarding disposal.

14. Transport Information

Hazards Class: N/A UN no: N/A IMDG/IMO UN no: Not Classified IATA/ICAO UN no: Not Classified

15.<u>Regulatory Information</u>

Risk phrases: R20/21/22: Irritating to eyes, respiratory system and skin. Safety phrases: S16, S23, S36/37/39.

16.Other Information

Legal disclaimer: The above information is believed to be correct but does not purport to be all inclusive and shall be sued only as a guide. This company shall not be held liable for any damage resulting from handling or from contact with the above product.