Republic of Latvia

Cabinet

Regulation No. 592

Adopted 31 August 2021

**Procedures for Performing Flights with a Tethered Air Balloon, a Kite, an Unmanned Rocket, and Rocket Models**

*Issued pursuant to*

*Section 117.13 of the law On Aviation*

**I. General Provision**

1. The Regulation prescribes the procedures for performing flights with a tethered air balloon, a kite, an unmanned rocket, and rocket models.

**II. Flights with Tethered Air Balloons and Kites**

2. Flights with a tethered air balloon and a kite may be performed at a height of up to 50 m above the ground or water surface.

3. Flights with a tethered air balloon and a kite more than 50 m above the ground or water surface and also derogations from the requirement referred to in Sub-paragraph 4.3 of this Regulation are only allowed provided that the risk assessment has been carried out and a permit has been obtained from the State agency Civil Aviation Agency (hereinafter – the Civil Aviation Agency) and issued in accordance with the laws and regulations regarding the procedures for management of the airspace, the structure of the airspace, and the procedures for change thereof.

4. If a diameter of a tethered air balloon exceeds 2 m or a capacity of envelope exceeds 3 m3, or the total take-off mass of a kite exceeds 2 kg, flights with them may only be performed in the following cases:

4.1. if visibility on the ground is not less than 5 km;

4.2. not closer than 500 m from the cloud ceiling;

4.3. not closer than 10 km from the runway of the aerodrome or the helipad;

4.4. between sunset and sunrise if the gas balloon or kite and traces thereof are equipped with lighting spaced 15 m apart from each other that is visible from at least 10 km distance and flashes with the frequency of 40–100 cycles per minute.

4.5. if it is equipped with an automatic quick acting device for air evacuation which starts to operate if the tether is torn or loose.

5. If flights with a tethered unmanned air balloon and a kite are performed not farther than 75 m on a horizontal plane from a structure and not higher than its highest point, the requirements referred to in Sub-paragraphs 4.1, 4.2, and 4.3 of this Regulation shall not be applicable thereto.

6. If the tether is torn or loose but the device referred to in Sub-paragraph 4.5 of this Regulation fails to operate and the air balloon continues an uncontrolled flight thus creating collision risks to users of the airspace, its operator shall immediately inform *valsts akciju sabiedrība “Latvijas gaisa satiksme”* [State joint-stock company Latvian Air Traffic] (hereinafter – the Latvian Air Traffic) by contacting them according to the instructions on the website of the Latvian Air Traffic at www.lgs.lv, indicating also the time and place of loosening or tearing of the tether as well as the expected route of the air balloon flight.

7. It is prohibited to perform flights with a tethered unmanned air balloon and a kite more than 20 m above the ground or water surface if they are performed closer than 50 m on a horizontal plane from military and national defence objects, warships, places of military events, or specific objects and persons protected by the National Armed Forces, except for the cases where the flight is coordinated with the National Armed Forces.

**III. Unmanned Rocket and Rocket Model Flights**

8. Unmanned rocket flights may only be performed in the airspace of the Republic of Latvia provided that the unmanned rocket complies with the following requirements:

8.1. it is manufactured from light and fragile materials without significant metal parts in the construction thereof;

8.2. it is equipped with an industrially manufactured engine that is protected against spontaneous self-ignition by mechanic influence or temperature (up to 80°C) and is sealed by the manufacturer with easily removable seals of non-metallic material in the nozzle and in the front of engine (except for the case where a particular engine is designed to perform its function with installed seals);

8.3. it is equipped with an aerodynamic braking device (a parachute, braking tape, aerodynamic surface) that ensures safe landing of the unmanned rocket;

8.4. it is equipped with an electronically controllable launching mechanism that at the launch time ensures location in a safe distance for its operator which is not less than 5 m from the launch site of the unmanned rocket.

9. Unmanned rocket flights shall be performed in the airspace structure element which has been specially designed for specific flights in accordance with the laws and regulations regarding the procedures for management of the airspace, the structure of the airspace, and procedures for change thereof by taking into account that clouds or other natural phenomena do not shadow more than a half (4/8 of octa) of the rocket launching zone and horizontal visibility at any height is not less than 10 km.

10. Prior to the commencement of an unmanned rocket flight, its operator shall ensure that people who are not involved in the launching of the unmanned rocket, vehicles, personal property, flammable and explosive items are not present within a radius of 500 m in the launching territory and also that animals are not disturbed.

11. An unmanned rocket shall be launched from a launcher that is located on a stable and fireproof base and that prevents accidental change of track of the unmanned rocket.

12. Rocket models shall be considered an unmanned rocket which complies with the following requirements:

12.1. it is manufactured from light and fragile materials;

12.2. significant metal parts are not in the construction thereof (massive metal parts are not used for manufacture of the bearing frame, front cowling, stabilisers or stabilising surfaces);

12.3. its full take-off mass, including the engine, does not exceed 1500 g;

12.4. its engines contain no more than 200 g of solid fuel mixture in total and the total impulse of engines placed in models does not exceed 160 newton-seconds;

12.5. its single engine contains no more than 125 g of solid fuel mixture;

12.6. the impulse of its single engine does not exceed 100 newton-seconds;

12.7. the burn time of its single engine exceeds 0.05 s.

13. The requirements of Paragraphs 8, 9, and 10 of this Regulation shall not be applicable to the rocket models.

14. Rocket model flights may be performed at a height of up to 120 m above the ground or water surface and not closer than 10 km from the runway of the aerodrome or the helipad, except for the case where a permit has been obtained from the Civil Aviation Agency which has been issued in accordance with the laws and regulations regarding the procedures for management of the airspace, the structure of the airspace, and the procedures for change thereof.

15. Rocket model flights more than 50 m above the ground or water surface in the control zone (CTR) or traffic information zone (TIZ) may only be performed if they are coordinated by an air traffic service provider in accordance with the conditions and coordination procedures approved by the Civil Aviation Agency.

16. It is prohibited to perform unmanned rocket and rocket model flights closer than 50 m on a horizontal plane from military and national defence objects, warships, places of military events, or specific objects and persons protected by the National Armed Forces, except for the cases where the flight is coordinated with the National Armed Forces.

Prime Minister A. K. Kariņš

Minister for Transport T. Linkaits