

LARGE APOLLO

SCIENTIFIC NAME: **Parnassius apollo**

CONSERVATION STATUS: **Locally Vulnerable (VU)**

FACT FILE

- ORDER: LEPIDOPTERA
- FAMILY: PAPILIONIDAE
- WINGSPAN: 65–90 MM
- FLIGHT PERIOD: JUNE–AUGUST (ALTITUDE DEPENDENT)
- HABITAT: ALPINE AND SUBALPINE MEADOWS ROCKY LIMESTONE SLOPES
- LARVAL FOODPLANT: STONECROPS (SEDUM SPECIES)
- ONE GENERATION PER YEAR
- OVERWINTERS AS AN EGG
- STRONG GLIDING FLIGHT

Few butterflies command attention like the Large Apollo. Broad white wings drift slowly across a mountain slope, luminous against rock and sky. When it settles, flashes of **crimson eye-spots** punctuate the pale surface — bold warning signals on an otherwise delicate canvas. In the higher limestone landscapes of the Provence-Alpes-Côte d’Azur, particularly within the southern Alps and upland plateaux, this butterfly occupies open flower-rich slopes typically between **800 and 2,500 metres**. It favours warm, sunny exposures where thin soils support both nectar plants and its essential larval food source.



AN EMBLEMATIC MOUNTAIN SPECIALIST

The Large Apollo is built for altitude. Its pale wings reflect intense sunlight while dense scales help retain warmth in cooler air. It flies with a steady, gliding motion, conserving energy as it moves between patches of flowers. Unlike smaller, darting butterflies, its flight is deliberate and almost floating — an adaptation to open windy terrain.

The red eye-spots are not decoration. They function as anti-predator signals, startling birds and other hunters. The butterfly also contains defensive chemicals derived from its larval foodplants, making it distasteful if attacked.

A PRECISE ECOLOGICAL PARTNERSHIP

Its life cycle is tightly synchronised with mountain conditions. Eggs are laid singly on or near low-growing stonecrops in late summer. They overwinter fully exposed to snow and frost, hatching in spring when fresh growth appears.

The caterpillars feed exclusively on Sedum species, particularly those growing in open rocky patches. If vegetation becomes too dense or shaded the host plants decline and the butterfly disappears. After several weeks of feeding the caterpillar pupates among stones or low vegetation, emerging as an adult in early summer.

This dependency on specific plants and open structure makes the species highly sensitive to environmental change.

A HIGH-ALTITUDE BUTTERFLY OF FLOWER-RICH MOUNTAIN GRASSLANDS

LANDSCAPE AND TRADITION

Historically, low-intensity grazing helped maintain the open mosaic of grassland and rock that the Large Apollo requires. Where grazing is abandoned slopes can scrub over. Where land is intensified or afforested nectar plants and stonecrops are lost. Because populations are often small and isolated on separate mountains natural recolonisation is limited. Each colony can represent a fragile stronghold tied to a particular slope or valley.

CLIMATE PRESSURE

As temperatures rise suitable habitat may shift upslope. In mountainous regions there is only so far a species can move before it runs out of altitude. Fragmented landscapes compound this risk, leaving populations stranded on ecological “islands”.

DID YOU KNOW?

Individual Large Apollos vary in the number and intensity of their red spots. Some mountain populations show particularly bold markings, while others are paler and more restrained — subtle differences shaped by geography and isolation.

