

HOOM MILIUSA TOMENTOSA (ANNONACEAE) AS NEW LARVAL HOST PLANT FOR THE COMMON JAY BUTTERFLY *GRAPHIUM DOSON* (C. & R. FELDER, 1864)(INSECTA: LEPIDOPTERA: PAPILIONIDAE)

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INTRODUCTION

The Bombay Natural History Society (BNHS) Nature Reserve is a forested area spread over 33 acres and is nestled between Dadasaheb Phalke Chitra Nagari (aka Film City) and Sanjay Gandhi National Park in Mumbai City of Maharashtra, India. The Reserve also has a small butterfly garden spread over an area of around quarter of an acre.

Common Jay *Graphium doson* (C. & R. Felder, 1864) (Insecta: Lepidoptera: Papilionidae) is a common butterfly found throughout India (Varshney & Smetacek, 2015). It is found even in urban habitats, possibly due to plantation of some of its larval host plants along the roads and in city gardens.

Since September 2020, the first author is rearing caterpillars of butterflies in Mumbai area and especially in the Bombay Natural History Society (BNHS) Nature Reserve, Mumbai.

On 24 June 2021 the author saw a *G. doson* female laying eggs on the leaves of *Miliusa tomentosa* (Family Annonaceae). Eggs were laid on upperside of the leaf near the mid-rib or near the leaf margin. Two eggs hatched on 29 June 2021, but the blackened larvae died after a few days, possibly due to some parasitoid infestation. Another caterpillar in an early instar was photographed on the same plant on 29 June 2021 (see Image).

On 18 June 2022, a *G. doson* female was seen laying many eggs on *M. tomentosa* plants. On 25 June 2022, the author found two late instar caterpillars of *G. doson* on the upperside of leaves of another plant. The caterpillars were collected and fed with leaves *M. tomentosa*. The caterpillars pupated on 30 June 2022 and on 1 July 2022 (see images).

Two adult *G. doson* butterflies eclosed from the two pupae on 10 and 11 July 2022 respectively, with a pupal diapause of 10 days. The second pupa had changed colour in the morning preparatory to

eclosion but the adult eclosed in the evening at 4 pm.

Following is a complete list of larval host plants reported till date for *G. doson* as summarised by Nitin *et al.* (2018): Annonaceae (Robinson *et al.*, 2010), *Annona muricata*, *Polyalthia* (Robinson *et al.* 2010), *Polyalthia longifolia* (Wynter-Blyth, 1957) (Annonaceae); *Hunteria zeylanica* (Wynter-Blyth, 1957) (Apocynaceae); *Cinnamomum* (Robinson *et al.*, 2010), *Cinnamomum macrocarpum*, *Cinnamomum malabattrum* (Lauraceae); *Magnolia grandiflora* (Wynter-Blyth, 1957), *Magnolia liliifera* (Wynter-Blyth, 1957), *Magnolia oblonga* (Robinson *et al.*, 2010), *Trachelospermum asiaticum* (Wynter-Blyth, 1957) (Magnoliaceae).

CONCLUSION

The observation of egg laying and sighting of caterpillars of *G. doson* on the *M. tomentosa* plants and rearing of the caterpillars till eclosion of adult butterflies clearly indicates the regular use of the plant as a larval host. Looking at the previously published list of larval host

plants, this is a new record of larval host plant for *G. doson*.

REFERENCE

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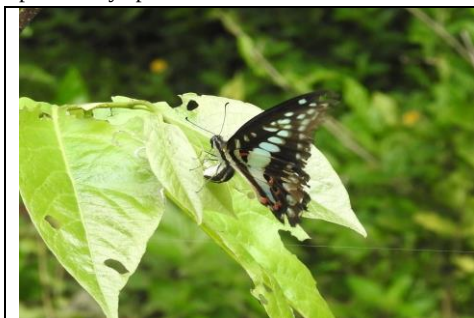


Fig 1: Common Jay laying egg on *Miliusa tomentosa* leaf



Fig 2: Common Jay egg



Figure 3: Common Jay caterpillar and its feeding pattern



Figure 4: Common Jay caterpillar early instar



Figure 5: Common Jay caterpillar late instar



Figure 6: Common Jay Pupa

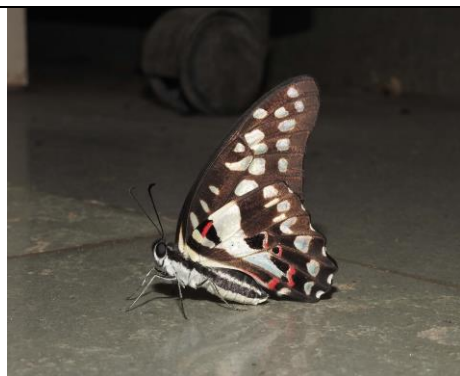


Figure 7: Freshly emerged Common Jay