are their nuclei, but they are very rich in protoplasm (Fig. 2). Only rarely an antipodal is found to be vacuolated.

The details of the embryology of this and some other plants of the same family shall be published elsewhere.

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[1] Schnarf, K., *Vergleichende Embryology der Angiospermen*, Berlin, 1931.
[2] Junell, S., "*Symb. Bot. Upsalienses*, 1934, **1**, No. 4.

The Occurrence of *Cystopus ipomoeae-panduratae* (Schw.) Swingle on *Ipomoea pestigridis* Linn.

Cystopus ipomœæ-panduratæ is reported on various species of *Ipomœa*, *viz.*, *I. eriocarpa*, *I. reniformis*, *I. hederacea*, *I. Batatas*, etc., in India and elsewhere also. So far as the writer is aware its occurrence on *Ipomœa pestigridis* is not reported from India.

The infected leaves of *Ipomœa pestigridis* were first collected at Utratia, District Lucknow, in September 1936. The disease manifests itself as white spots on the leaf (Fig. 1) which brings about distorted deformity of the leaf resulting prematurely in death. In older spots, the tissue crumbles down and holes are formed. The diseased plants with large ellipsoidal spots of dull white colour were also collected in Badashahbagh in October 1936, where the infection was visible on the petiole and stem also.

Fig. 1.

Leaf of *Ipomoea pestigridis* Linn., showing infection as white pustules. × natural size.

In spite of best efforts, only conidial stages were found, which are generally laid down in a thick sorus under the epidermis of the host and the conidial spores are liberated by its rupture. The spores are broad, ellipsoidal, smooth and are 16 to 21 μ long and 12 to 16 μ broad. The identification of the parasite was confirmed by the Imperial Mycologist, Delhi, to whom my thanks are due.

This species of *Ipomœa*, a diffuse, twining, pubescent herb, is very common in the United Provinces during the rainy season almost in all fields.

An effort to germinate the spores in culture was unsuccessful.

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Petalody in Cotton

Ramanatha Ayyar and Sankaran[1] have described the appearance and genetic behaviour of a petaloid mutant from Karunganni cotton. They record complete dominance of normal in F_1 and segregation into 3 normal : 1 petaloid in F_2.

Seed of heterozygotes was kindly supplied to us by Mr. Ramanatha Ayyar, and grown at Indore. It was observed that the fertile plants in segregating families were of two kinds, those bearing normal flowers with never more than one or two petaloid stamens and those bearing flowers showing slight petalody in a quarter to half the stamens. Karunganni strains are so late in fruiting at Indore that very little seed was obtained. Nine F_2 plants with normal flowers (only an occasional stamen petaloid) gave 24 normal plants in F_3. Five F_3 plants with a quarter to half their stamens slightly petaloid gave 3 normal : 6 intermediate : 4 petaloid plants in F_3. Dominance of normal is therefore