

## **SCIENTIFIC NOTE**

### **NEW RECORD OF *BACTROCERA ZONATA* (SAUNDERA) (DIPTERA: TEPHRITIDAE) ON POTATOES IN EGYPT**

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#### ***Abstract***

The peach fruit fly *Bactrocera zonata* (Saunders) (Diptera: Tephritidae) is detected for the first time in Giza governorate on potatoes during October 2004.

Most of insect pests attack potato; *Solanum tuberosum* L. (Solanaceae) are injured in all regions by aphids, tuber moth, white flies and mites (Fetoh, 2003).

The peach fruit fly, *Bactrocera zonata* is an important insect attacks many fruit species (more than 50 host plants) including guavas, mangoes, peach, apricots, figs and citrus. The larvae feed on the pulp of ripe fruits inflicting a serious damage, makes fruits unfavorable for marketing and exportation; (Bezzi, 1915, White *et al.*, 1994 and Aluja *et al.* 1996).

In the present work potato tubers were collected from Giza governorate during October 2004 and transferred directly to the laboratory. They were examined in a first instance (externally for the presence of fruit fly ovipunctures and internally for larvae) and then placed on a sand medium in suitable containers until pupation and adult emergence (to facilitate accurate identification). Insects were then killed by freezing and identified by Insect Classification and Surveying Research Department (PPRI) as *Bactrocera zonata* (Saunders)(Diptera:Tephritidae) and this considered the first record of this species on potatoes in Egypt.

*Bactrocera zonata* is one of the most damaging fruit fly pests in the world due its broad host range, high reproductive potential, high mobility and adaptability to climate. Its presence on potatoes is the first record in Egypt and its establishment would be a serious threat to potatoes (Bateman ,1972 and Kapoor and Grewal 1986).

Hashem *et al.*(2004) mentioned that *B. zonata* infests cucurbitaceae, some solanaceae like pepper and eggplants as secondary hosts.

The occurrence of *Bactrocera zonata* in Egypt is an obstacle for the promotion of export of fruits and vegetables, therefore, International cooperation has been initiated to eradicate *B. zonata* and prevent any further spread. On 2002-03-05, International cooperation organized a workshop in Paris to review the current situation and decide on recommendations to be made. (Norton and Mumford 1993, FAO 1999, Hammes 1982 and Burn 1997).

It is concluded that *B. zonata* was found for the first time to attack potatoes which is a new phenomenon in Egypt. Further investigation in detail on this insect pest associated with the new host, soon will be concluded.

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تسجيل ذبابة الخوخ *Bactrocera zonata* لأول مرة  
على درنات البطاطس في مصر

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احتلت ذبابة الخوخ الصدارة في الأهمية نظرا لإصابتها لثمار كثير من أنواع الفاكهة المختلفة حتى أصبحت أكثر ضررا من ذبابة الفاكهة في هذا الصدد بمصر وفي هذا البحث تم تسجيل تواجد الحشرة لأول مرة بمحافظة الجيزة على درنات البطاطس خلال شهر أكتوبر سنة ٢٠٠٤.