

Monitoring – *Bactrocera dorsalis* (BD)

Status of BD:

- *Bactrocera dorsalis* (Oriental Fruit Fly) is a quarantine pest of Asian origin capable of infesting various commercial fruit crops (400 recorded hosts). It was previously described as the Invader fruit fly (*Bactrocera invadens*).
- It is now found in 65 countries and in most sub-Saharan countries.
 - In South African the official pest status is summarised in Table 1.
- High BD trap counts were recorded in May 2017. Please note that the areas where it is currently absent are vulnerable to point incursions. These areas should be extra vigilant.

Why monitor:

- Keeping it out of your region is by far the most cost effective and viable option. Early detection enables the implementation of an eradication programme.
- Monitoring in regions where BD is present is a requirement for the control of BD.
- Monitoring of BD and recording of data is a requirement for any special programme (e.g. Exports of Peach & Nectarines to the European Union).
 - Previous years BD monitoring records to be submitted to DAFF as part of the orchard registration process.

What do I do if I get a BD in a trap:

- Notify FruitFly Africa – Contact person: Eloise du Plessis: 021 882 9541, eloise@fruitfly.co.za
- Place specimen in closed plastic vial and send it to FruitFly Africa for identification.
- If confirmed to be BD – a delimiting survey will be instituted.
 - A 5km radius of trap will be placed under quarantine.
 - A “Removal Permit” is required to move fruit from the quarantine area to a non-infested area. Fruit trading may therefore continue in compliance with established additional risk mitigation procedures.
 - If no further BD found for 12 weeks – quarantine lifted and area declared “pest free”.
- If a second BD is found in the delimited area an eradication programme will be initiated.
 - Eradication control measures (MAT Blocks, Protein Baits, sanitation) implemented for 8 weeks.
 - Monitor for further 4 weeks - If no further BD catches the quarantine lifted and area declared “Eradicated”.

Monitoring Guidelines:

- Monitoring guidelines attached.

Table 1: Official status of *Bactrocera dorsalis* in South Africa for each province in separate district municipalities.

Province	District Municipality	Status
Limpopo	Vhembe**	Present and subject to official control
	Mopani**	Present and subject to official control
	Capricorn**	Present, only in some areas where host crop(s) are grown, and subject to official control
	Sekhukhune**	Present, only in some areas where host crop(s) are grown, and subject to official control
	Waterberg**	Present, only in some areas where host crop(s) are grown, and subject to official control
Mpumalanga	Ehlanzeni**	Present and subject to official control
	Nkangala**	Present and subject to official control
	Gert Sibande	Absent
North West	Ngaka Modiri Molema**	Present only in some areas and subject to official control
	Bojanala Platinum**	Present at low prevalence, seasonal in some areas and subject to official control
	Dr Kenneth Kaunda	Absent
	Dr Ruth S. Mompoti	Absent
Gauteng	City of Tshwane**	Present and subject to official control
Kwazulu Natal	iLembe**	Present and subject to official control
	King Cetshwayo**	Present and subject to official control
	Ugu**	Present and subject to official control
	uMkhanyakude**	Present and subject to official control
	eThekweni**	Present and subject to official control
	Amajuba	Absent
	uMgungundlovu	Absent
	uMzinyathi	Absent
	uThukela	Absent
	Zululand	Absent
	Namakwa	Absent
Northern Cape	Pixley ka Seme	Absent
	John Taolo Gaetsewe	Absent
	Frances Baard	Absent
	Z.F. Mgcau**	Transient under surveillance
Free State	All districts	Absent
Eastern Cape	All districts	Absent
Western Cape	All districts	Absent

NOTE: A "Removal Permit" is required to move fruit from an infested districts marked with ** to a non-infested area.

MONITORING GUIDELINES for *Bactrocera dorsalis*

Abbr.
Bactrocera dorsalis - BD
 FruitFly Africa - FFA
 Methyl Eugenol - ME
 Production Unit Code - PUC

WHY MONITOR

- BD is a quarantined pest
- Monitoring data is required for special program registration
- Pro-active eradication/ control

HOW MANY TRAPS NEEDED

BD not present

- 1/PUC
- 1/100 ha

BD present

- 1/PUC
- 1/25 ha

WHICH TRAP

- Bucket trap
- Lure: ME Dispenser
- Be cautious of cross contamination when handling ME.
- Insecticide: Dichlorvos strip
- Coat support wire with sticky ant barrier or Vaseline

TWO YELLOW STRIPES
ON THORAX

CLEAR WING WITH
CONTINUOUS DARK
COSTAL BAND

DARK T-SHAPED
MARKING ON
ABDOMEN

OVIPOSITOR
(FEMALE ONLY)

NOTIFICATION

If in a BD free area:

- Notify FFA; Eloise du Plessis (eloise@fruitfly.co.za or 021 882 9541)
- Send specimen in vial to FFA

PLACEMENT

- In the orchard
- In the host tree
- 1,5 m above ground
- Place in shade
- Clear of leaves
- Additional trap in home garden

MONITORING

- Monitor all year
- Bi-weekly

REPLACE ATTRACTANT

- Every 6 – 8 weeks

RECORD KEEPING

Datasheet with the following details:

- Province and region
- Farm Name
- PUC
- Host/ cultivated crop
- Orchard number
- Date
- GPS coordinates
- Keep records

HORTGRO
Growing Fruit IQ

- English and Afrikaans Infographics attached in this freshNOTES email.

BEHEERRIGLYNE

vir *Bactrocera dorsalis*

Abbr.

Bactrocera dorsalis - BD

FruitFly Africa - FFA

Metiel-eugenol - ME

Produksie-eenheidskode - PUC

PLASING

- In die boord
- In die gasheerboom
- 1,5 m bo grond
- Plaas in skaduwee
- Vry van blare
- Bykomende lokval in huistuin

MONITERING

- Moniteer heeljaar
- Tweewekliks

VERVANG LOKMIDDEL

- Elke 6 tot 8 weke

REKORDHOUDING

Datablad met die volgende besonderhede:

- Provinsie en streek
- Plaasnaam
- PUC
- Gasheer/ verboude gewas
- Boordnommer
- Datum
- GPS koördinate
- Hou rekords

HOEKOM MONITOR

- BD is 'n kwarantynplaag
- Monitoringsdata word vereis vir spesiale program registrasie
- Proaktiewe uitwissing/ beheer

HOVEEL LOKVALLE WORD BENODIG

BD nie teenwoordig

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BD teenwoordig

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WATTER LOKVAL

- Emmerlokval
- Lokmiddel: ME houer
- Wees behoedsaam vir kruisbesoedeling tydens die hantering van ME.
- Insekdoder: Dichlorvos strook/band
- Bedek ondersteuningsdraad met taai mierversperring of Vaseline

TWEE GEEL STREPE
OP TORAKS

DEURSIGTIGE VLERK
MET AANEENLOPENDE
DONKER GERIBDE BAND

DONKER T-VORMIGE
MERK OP ABDOMEN

EIERBOOR
(SLEGS VROULIK)

KENNISGEWING

In 'n BD-vrye gebied:

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- Stuur monster in 'n steriele vlessie na FFA

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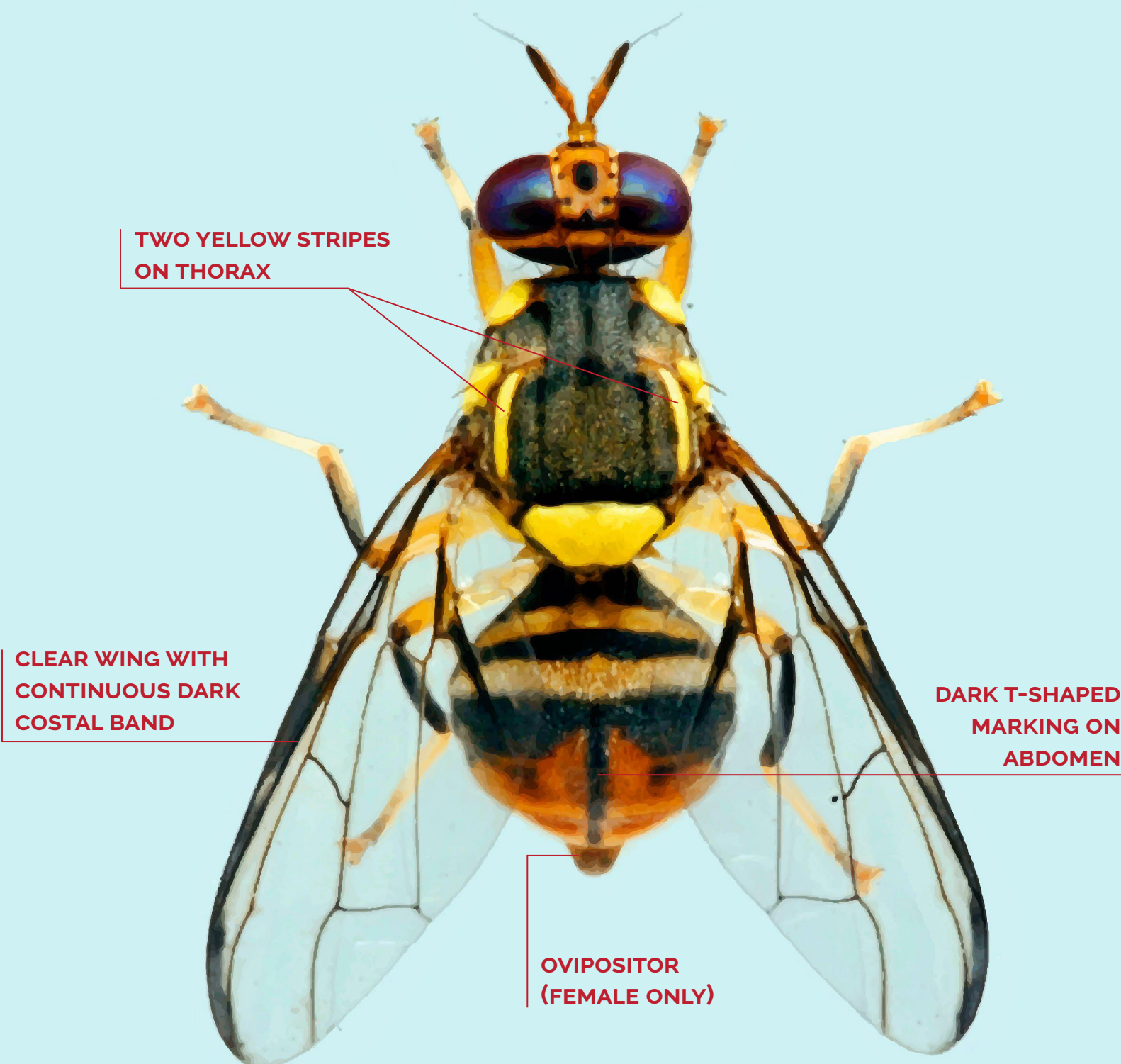
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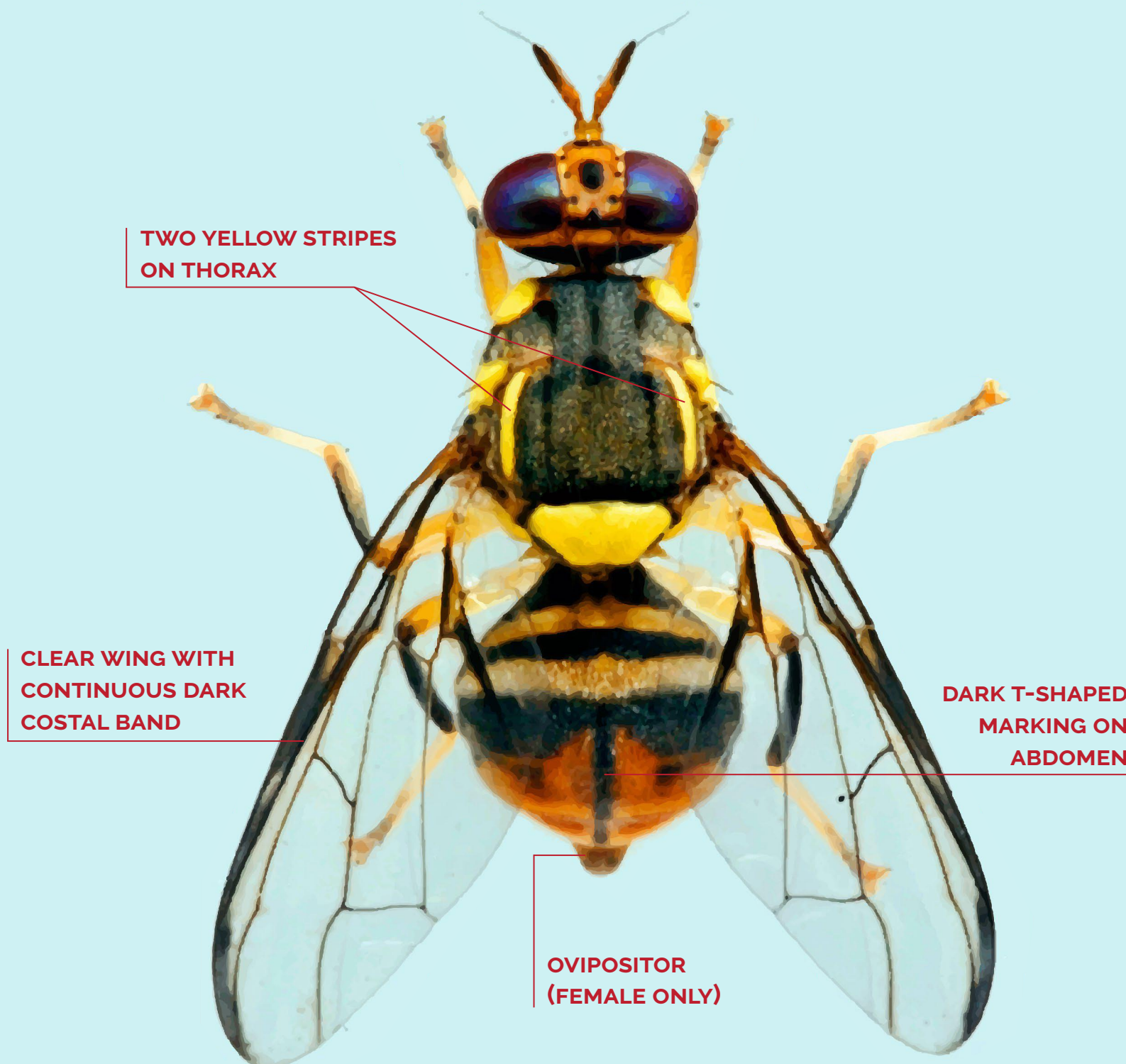
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