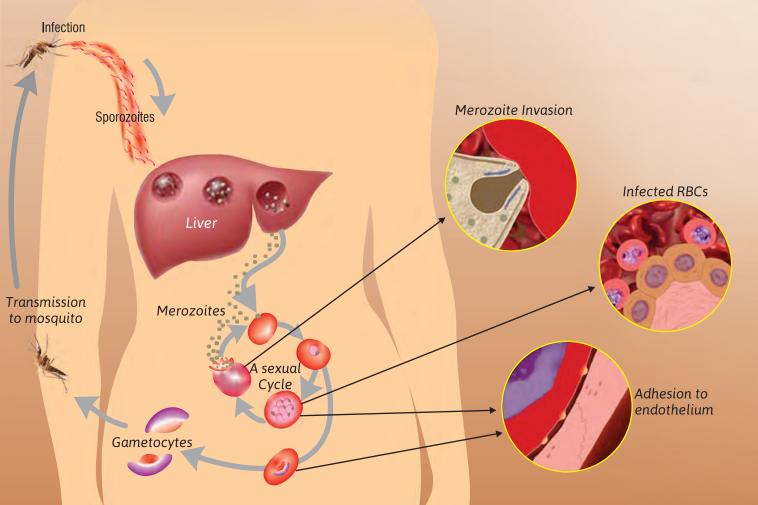
# MALARIA

#### re-emerging as world No.1 infectious Killer

Malaria is the most common infectious tropical disease and an enormous public health problem. It is caused by the parasite called plasmodium and is passed to human by mosquito (female anopheles). It is a disease that can be treated in just 2 days, yet it can cause fatal complication if the diagnosis is delayed.

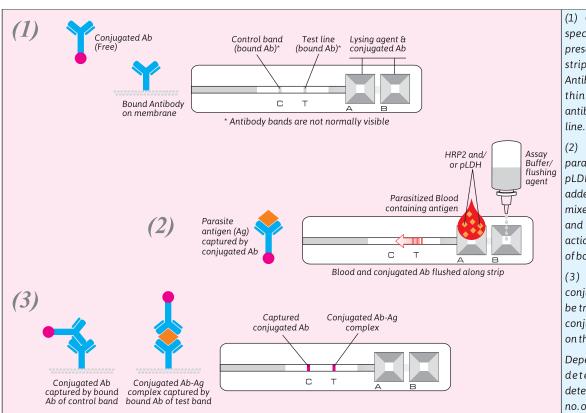
## Antigen Test Made Malarial Detection Just Early, Easy & Accurate.....

- Advantage Mal Card
- Advantage Malaria Pan+Pf Card
- Advantage Pf Malaria Card
- Advantage Malaria Card
- Advantage Pan Malaria Card



# Combining Reliability with Convenience through Rapid Antigen Test...

#### Lets know about J. Mitra Malaria principle.....



- (1) Conjugated antibody (Ab), specific for target antigen, is present below the nitrocellulose strip. Target Antigen specific Antibody is bound to the strip in a thin (test) line, and control antibody, is bound at the control line.
- (2) Blood Sample containing parasite antigen (HRP-2 and/or pLDH) and Assay Buffer, are added in the respective well, are mixed with conjugated antibody and are drawn up by capillary action in the strip across the lines of bound antibody.
- (3) If antigen is present, conjugated Ab-Ag complex will be trapped on the test line. Excess conjugated antibody is trapped on the control line.
- Depending on the target antigen detection and differential detection of plasmodium species, no. of test lines will vary.

#### PLASMODIUM SPECIES DETECTION BY DIFFERENT TEST

Test Line Test Line	PAN	P.v	Pf	
Product Name			HRP-2	pLDH
Advantage Mal Card	✓	_	_	✓
Advantage Malaria Pan+Pf Card	<b>√</b>	_	✓	_
Advantage Pf Malaria Card	_	_	✓	_
Advantage Malaria Card	_	✓	✓	_
Advantage Pan Malaria Card	<b>✓</b>	_	_	_

### Advantage MAL CARD

For detection of P. falciparum - pLDH & Plasmodium Species (P. falciparum/P. vivax/P. malariae/P. ovale - pLDH) in Human Whole Blood



ensitivity: 100% Specificity: 99.95%

- Individually pouched Single Tests Practical & Safe
- Analytical Sensitivity of 100-200 parasite per μl blood
- See through Device
- Longer Shelf Life 30 months at 4-30°C
- Easy to Interpret Colour Bands
- Result within 20 minutes
- Convenient Pack size: 50 Tests & 100 Tests
- Panel Detection Score: 97.1%\*(P.v) Specificity: 99.60%\*
   \*As per WHO, Geneva evaluation

#### Advantage Malaria PAN + P.f CARD

For detection of P. falciparum - HRP-2 & Plasmodium Species (P. falciparum/P. vivax/P. malariae/P. ovale - pLDH)in Human Whole Blood

- Individually pouched Single Tests Practical & Safe
- Analytical Sensitivity of 50-100 parasite per μl blood
- See through Device
- Longer Shelf Life 30 months at 4-30°C
- Easy to Interpret Colour Bands
- Result within 20 minutes
- Convenient Pack size: 50 Tests & 100 Tests
- Panel Detection Score: 100%\* (P.v & Pf) Specificity: 100%\*
   \*As per WHO, Geneva evaluation

### Advantage P.f MALARIA CARD

For detection of P. falciparum - HRP-2 in Human Whole Blood



Sensitivity: 100% Spo



- Individually pouched Single Tests Practical & Safe
- Analytical Sensitivity of ≥50 parasite per μl blood
- See through Device
- Longer Shelf Life 30 months at 4-30°C
- Easy to Interpret Colour Bands
- Result within 20 minutes
- Convenient Pack size: 25 Tests
- Panel Detection Score: 99%\* Specificity: 100%\*

\*As per WHO, Geneva evaluation

#### **Advantage MALARIA CARD**

For detection of P. falciparum - HRP-2 & Plasmodium Species (P. vivax - pLDH) in Human Whole Blood



Sensitivity: 100%

- Individually pouched Single Tests Practical & Safe
- Analytical Sensitivity of 50-200 parasite per  $\mu$ l blood
- See through Device
- Longer Shelf Life 30 months at 4-30°C
- Easy to Interpret Colour Bands
- Result within 20 minutes
- Convenient Pack size: 25 Tests & 50 Tests

#### Advantage PAN MALARIA CARD

For detection of Plasmodium Species (P. falciparum/ P. vivax/ P. malariae/ P. ovale - pLDH) in Human Whole Blood

• Individually pouched Single Tests - Practical & Safe

Specificity: 99.77%

- Analytical Sensitivity of 100 parasite per μl blood
- See through Device
- Longer Shelf Life 30 months at 4-30°C
- Easy to Interpret Colour Bands
- Result within 20 minutes
- Convenient Pack size: 50 Tests & 100 Tests
- Panel Detection Score: 100%\* (P.v) Specificity: 99.6%\*

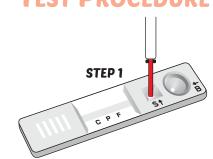
\*As per WHO, Geneva evaluation



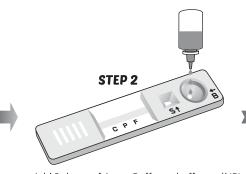
Sensitivity: 100%

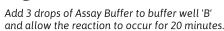
Specificity: 99.8%

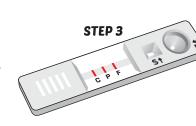
#### TEST PROCEDURE



Add 4 µl of the anti-coagulated blood sample using sample dropper or micropipette (or finger prick sample) to the sample well 'S'. Make sure that the blood from the sample dropper has been completely transferred to the sample pad.







Read Result in 20 minutes.

Important Note: Discard the DEVICE immediately after reading results as it is potentially infectious.

in 2013, WHO, Geneva and FIND (Foundation for Innovative New Diagnostics), Geneva launched an evaluation program to assess the performance of commercially available malaria RDTs and their results are:

Figure 13: Phase-2 P. vivax panel detection score and positivity rate at 200 parasites/µL

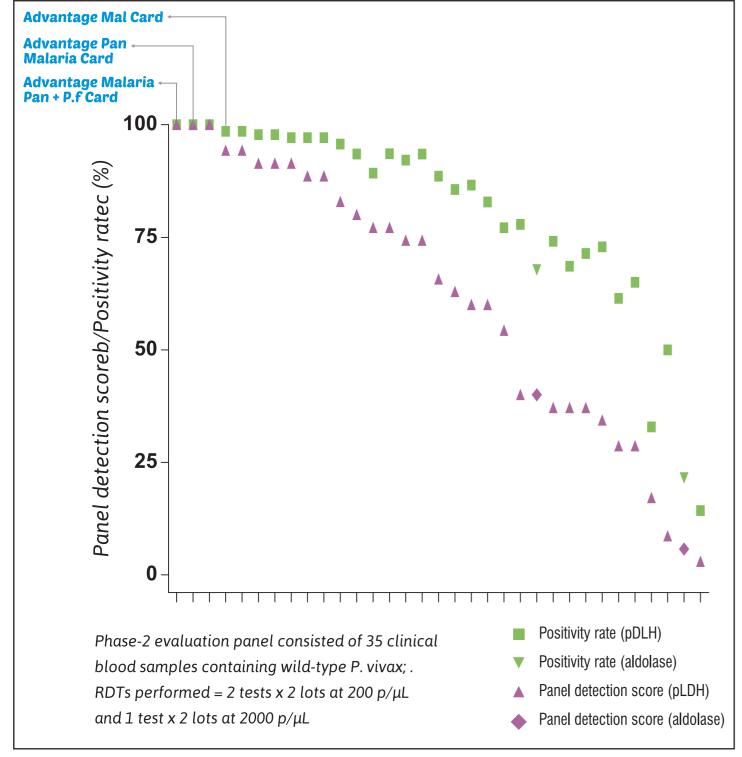
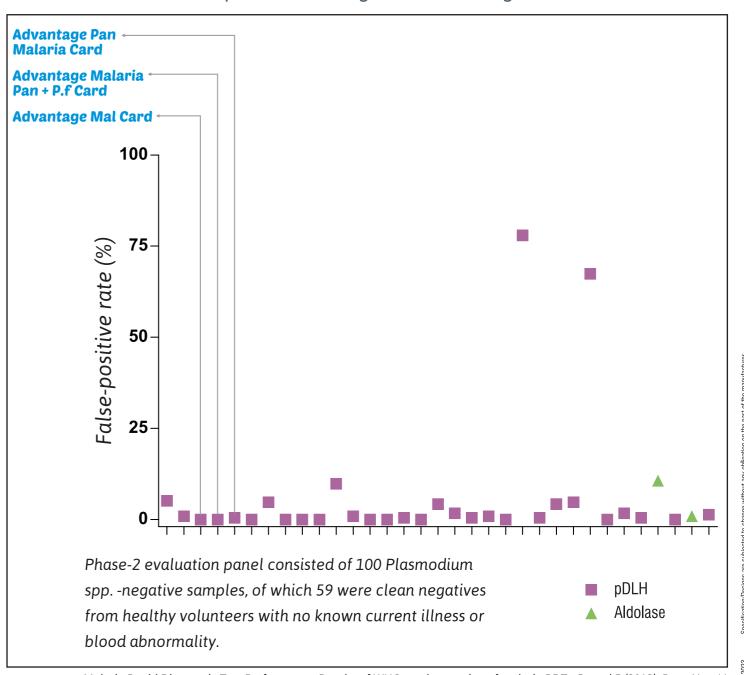


Figure 15: Phase-2 Plasmodium spp. (pan or P. vivax/Pvom test line) false-positive rate against clean-negatives



Malaria Rapid Diagnostic Test Performance, Results of WHO product testing of malaria RDTs: Round 5 (2013), Page No.: 46
Website: http://apps.who.int/iris/bitstream/10665/128678/1/9789241507554 eng.pdf

\*Note: The above information is provided for the scientific community, It is not for commercial or promotional purpose.





