

# **NHS** Children's Acute Transport Service



## Clinical Guidelines

# Malaria

### Document Control Information

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## Summary

- *Plasmodium falciparum* is usually responsible for severe disease (tropical Africa and South East Asia).
- Incubation period 7-14 days.
- Cerebral malaria has 25% mortality

## Clinical

- Fever
- Headache
- Vomiting and/or diarrhoea
- flu-like

## Complications

- Cerebral malaria: Seizures, coma, encephalopathy (especially 6m to 3yrs. This is the most life-threatening form of malaria).
- Bleeding tendency: DIC – consider bacterial infection
- Haemolysis and anaemia
- Hypoglycaemia (also occurs with Quinine)
- Renal failure
- Pulmonary oedema
- Jaundice

## Medical Management

- Supportive measures
- Schizonticides (quinine, chloroquine, mefloquine)
- Artesunate (at ID team advice, if not stocked locally, start IV quinine while awaiting artesunate)
- Exchange transfusion and erythrocytapheresis may be considered in the critically ill.

### If Malaria is confirmed on smear:

Collect clinical data regarding:

- organ involvement/failure (particularly U&Es / LFTs / coag / FBC / Respiratory System function)
- parasite count.

Conference call with ID consultant (GOSH/SMH)

- Options appraisal:
- 1) CATS retrieval to PICU/NICU
  - 2) Local team transfer to ID ward
  - 3) Remains at local with ID consultant advice

### **Assessment**

- Criteria for transfer to PICU/NICU:
- Intubated cases
- Incipient organ failure
- Cerebral malaria (low GCS or AVPU)
- < 5 yrs of age + parasite count > 5%
- All children with parasite count > 10%

Criteria for management at referring hospital:

- Well children, older children, semi-immune children
- Parasite count 5-10%
- Treatment has already started
- Normal FBC + Chemistry

### **Post-intubation management**

- Respiratory failure requiring intubation requires a loading dose of Quinine or Artesunate.
- Seek the advice of the ID consultant at GOSH/SMH.

### **Transport considerations**

- CATS standard operating procedures apply.

The decision for a local team transfer to ID ward must be led by the consultant staff at the referring hospital, CATS and GOSH/SMH ID consultant. This may be most effectively organised using a conference call with those individuals.