**Anopheles gambiae Patton (Cellia)**

**Strain Name:** ZAN/U, MRA-594  
**Place of Origin:** Mwera, Zanzibar  
**Colonization date:** 1982  
**Established by:** Dr. C.F. Curtis  
**Deposited by:** Dr. Frank Collins, Dr. Hilary Ranson  
**Genotype:** 2La/+, 2Rj +/-, TEP1 r/s  
**Phenotype:** polymorphic for c+ (collarless); increased Glutathione-S-transferase activity  
**Karyotype:** undefined  
**Ribosomal DNA form:** Savanna  
**Insecticide Resistance:** DDT

### Larval Morphological Traits

Collarless (c+) is caused by a uric acid build-up in the larvae. Expression is often variable but best seen in L4 larvae. ZAN/U is polymorphic for c+.

Red stripe-if present, individuals expressing red stripe are female.

When reared in a dark pan, larvae with wild-type eye color will melanize when compared to a cohort reared in a white pan.

### Adult Morphological Traits

Morphological characteristics of *An. gambiae* s.l. adults.

**Authentication Methods used to confirm stock identity**

1. Examined immatures for the collarless (c+) trait: L4 larvae are polymorphic for c+.

2. Examined the color of the larvae when cultured in a black pan: larvae are melanized when compared to a cohort reared in a white pan.

3. Examined adults microscopically for morphological characters: all individuals had standard features of *An. gambiae* and wild-type eye.

4. Exposed L4 larvae to .4ppm DDT for 24 hours to confirm resistant status. ~100% survival expected.

5. At least 40 mixed ♂&♀ molecularly tested for *An. gambiae* identification and rDNA type. *An. gambiae* s.s. and savanna type expected.
6. At least 40 mixed ♂ & ♀ molecularly tested for ZAN/U specific SNPs in the white gene.

References referring to this stock:


