

## GEOMETRY OF YOKES

PETER JUPP

A yoke on a manifold  $M$  is a real-valued function defined on the ‘square’  $M \times M$  of  $M$  which satisfies some mild conditions. A yoke on  $M$  yields various geometric objects (notably a Riemannian metric on  $M$  and a symplectic structure on part of  $M \times M$  near the diagonal.). An overview of these objects will be given and some statistical applications will be sketched.