

## On Spanning $m$ -regular Graph Designs

Saad El-Zanati, Illinois State University

Let  $v = km + 1$ , where  $k$  is odd. We show that there exists a factorization of  $K_v$  into  $k$  isomorphic  $m$ -factors. We investigate ways of identifying classes of  $m$ -regular graphs that factorize  $K_v$ .

Keywords: graph designs,  $m$ -factorizations