Ellis, K.L. 1985. Effects of a new transmission line on distribution and aerial predation of breeding male sage grouse. Report for Deseret Generation and Transmission Cooperative, Sandy, Utah.

Conclusions and management implications: A number of interesting and useful conclusions can be drawn from this study. The following in a manifestation:

- 1. Breeding male sage grouse will not tolerate drastic environmental manipulation adjacent to a lek,
- 2. The placement of transmission line structures in the lane between leks and day use areas will cause an alteration of normal dispersal patterns,
- 3. The placement of transmission line structures in close proximity to a lek (within 200 m in this case) will cause an increase usage of the structures as hunting sites by raptors in the area,
- 4. Increased usage of towers adjacent to the lek by raptors will result in increased harassment of lekking grouse,
- 5. New transmission line routes should avoid leks and/or day use areas by at least 1.2 km and preferably by 1.5 km if breeding activity is to remain undisturbed, and
- 6. Males are very selective in the choice of day use areas and these areas must be considered as important as the lek site itself when altering an area adjacent to a lek.