

Estimating Pronghorn Abundance Using Aerial Line Transect Sampling

R.J. Guenzel

Wyoming Game and Fish Department

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This manual describes the current procedures used by the Wyoming Game and Fish Department for estimating pronghorn (*Antilocapra americana*) population sizes using aerial line transect surveys. It contains a detailed description of the survey design, field methods and analysis. The Wyoming Game and Fish Department and the author, Rich Guenzel, have kindly arranged for it to be scanned and made available online in the hope that it will be of use to others planning or performing similar surveys.

The prefatory sections and Chapters 1-4 will probably be the most useful. Most of the appendices are out-of-date, as are the sections on the analysis of data in Distance. (The manual was written in the days of Distance 2.2.)

To facilitate downloading, the manual has been divided up into several files, approximately one for each chapter. Because the files are quite large, we recommend you use the "Save Target As..." or "Save Link As..." option in your browser to save each chapter to your local machine so that you will not have to download them again. The files are in Adobe Acrobat (.pdf) format. The total size of the files is approximately 19 MB. For those with good internet connections, the entire manual is also available in one 17MB zip file.

Please cite the manual as:

Guenzel, R.J. 1997. *Estimating Pronghorn Abundance Using Aerial Line Transect Sampling*. Wyoming Game and Fish Department, Cheyenne. 176pp.

- [pronghorn.zip](#) Complete manual as a zip file (17 MB), containing all of the files listed below.
- Manual divided into individual pdf files
 - [Covering letter](#)
 - [Cover, Front material and Index](#)
 - [Chapter 1](#) - Introduction
 - [Chapter 2](#) - Quality Control
 - [Chapter 3](#) - Basic Survey Design
 - [Chapter 4](#) - Conducting the Survey
 - [Chapter 5](#) - Analysis (somewhat out of date - but still useful!)
 - [Chapter 6](#) - Application to Management
 - [Literature Cited](#)
 - [Appendix I](#) - Providers of Class 1 Air Charter Services
 - [Appendix II](#) - Survey forms

- [Appendix III](#) - Table of Conversions for Distance Bands
 - [Appendix IV](#) - Obtaining Updates of DISTANCE (out of date!)
 - [Appendix V](#) - DISTANCE Quick Reference (out of date!)
 - [Appendix VI](#) - Example Templates for DISTANCE Input Files (out of date!)
 - [Appendix VII](#) - Example Input and Output from DISTANCE (out of date!)
 - [Appendix VIII](#) - LIMITS.XLS - Excel Spreadsheet to Calculate Log-based Confidence limits
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[Distance book web site](#)

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