

**JOB PROGRESS REPORT  
RESEARCH PROJECT SEGMENT**

**STATE:** Territory of Guam

**PROJECT NO.:** W-1R-8  
**SUB-PROJECT NO.:** W-2  
**STUDY NO.:** 2  
**JOB NO.:** 1

**JOB TITLE:** Population Size and Distribution of Black Francolin on Guam  
(1460, 1430)

**PERIOD COVERED:** October 1, 1999 to September 30, 2000

**SUMMARY**

Black francolins (*Fancolinus francolinus*) were detected on 21 of 23 (91%) survey routes conducted throughout Guam. Three routes had decreases, 18 routes had increases including eight routes with increases of one or more birds, and three routes had no change in the number of Black francolin recorded.

**BACKGROUND**

In 1961, 171 Black francolin (BLFR) were introduced to southern Guam as part of the Foreign Game Bird Introduction Program of the U.S. Fish and Wildlife Service (USFWS). Surveys that were conducted in 1980 indicated the population was adequately established in most parts of southern Guam to open a hunting season. Regulations were promulgated to open a one-month season in December 1981 with a 4-bird daily limit and a 20-bird season limit. BLFR populations continued to increase from 1980-1982, but public hunting pressure remained low, possibly due to the unfamiliarity of the sporting qualities of the bird. With the BLFR population increasing and little seasonal hunting pressure, bag limits were further liberalized in FY83 to a two-month split season, one month in January and one month in July, and the bag limit was increased to 5 birds per day with no season limit. Revisions to the BLFR season were made again in FY90, extending the season from January 1 to February 28 and from July 1 to August 31. The BLFR season was changed to year-round in FY00.

**OBJECTIVES**

- 1) To determine current relative abundance and current distribution of BLFR on Guam.
- 2) To monitor BLFR population trends on Guam.



## PROCEDURES

Each spring, conduct annual island-wide bird surveys using 5-minute station counts, to monitor distribution and status of BLFR throughout the island.

## RESULTS

### Spring Bird Surveys

BLFR were detected on 21 of 23 (91%) spring bird surveys conducted in May (Table 1). Three survey routes had decreases, 18 routes had increases of which 8 had increases of one or more birds, and 3 routes had no change in the number of birds per count. BLFR were found on 11 of 12 (92%) survey routes in northern Guam, an increase of 3 routes from FY99 (DAWR 1999). They were found on 10 of 11 (91%) surveys south of Rt. 4, an increase of one survey route from FY99 (DAWR 1999).

The results from all survey routes combined showed an increase in BLFR numbers observed as compared to FY99. Two southern routes, Ija (7.38 birds per station) and Naval Ordnance Annex (6.60 birds per station), recorded the highest number of birds per station for the entire island (Table 1). Most notably was the increase of BLFR detected in the Pulantat (3.10 average increase) and Orote Point (3.50 average increase) areas. The Navy Golf Course route recorded the largest number of birds/station (4.40) birds/station for northern Guam.

Table 1. Numbers of BLFR detected per count and average numbers of birds detected per station, as detected in spring bird surveys at various locations on Guam during May 2000. Values in the trend column are the difference between the average station count between years. (Ave. = average)

Survey Location	No. of Stations	No. BLFR Observed	FY99Avg/Station	FY00 Avg/Station	Trend in Avg FY99-00
<b>Northern</b>					
Tarague	10	4	0.00	0.40	0.40
MSA	10	10	1.10	1.00	-0.10
NWF	10	25	1.40	2.50	1.10
NCTAMS	10	28	1.90	2.80	0.90
Cap. Improve. Rd.	10	0	0.00	0.00	0.00
MT. Santa Rosa	10	16	0.20	1.60	1.40
Y Sengsong Rd.	10	6	0.00	0.60	0.60
Two Lovers	10	30	2.70	3.00	0.30
Andersen South	10	7	0.30	0.70	0.40
Navy Golf Course	10	44	3.30	4.40	1.10
Barrigada Hill	10	24	3.00	2.40	-0.60
Toto Pipeline	8	3	0.00	0.38	0.38
<b>Southern</b>					
Nimitz Hill	10	50	4.50	5.00	0.50

RCBR	4	2	0.00	0.50	0.50
Orote Point	6	37	2.67	6.17	3.50
Pulantat	10	60	2.90	6.00	3.10
Cross Island Rd.	10	26	3.00	2.60	-0.40
NOA	10	66	5.30	6.60	1.30
Umatac	10	60	3.60	6.00	2.40
Dandan	7	51	5.00	5.10	0.10
Ija	8	59	5.63	7.38	1.75
Merzio	4	45	5.50	5.63	0.13
Cocos Island	10	0	0.00	0.00	0.00

BLFR became noticeably more common on parts of AAFB during FY99-00, especially at Pati Point and in the Munitions Storage Area (MSA), where an increase in the number of birds sighted were reported.

### **Depredation Permits**

In southern Guam, the abundance of BLFR has lead to the issuance of depredation permits to control their numbers near cultivated areas to reduce crop damage. BLFR are known to peck at watermelon to obtain moisture, which renders the fruit unmarketable. During FY00, two male and two female BLFR, were removed by watermelon farmers holding depredation permits.

### **RECOMMENDATIONS**

- 1) Continue to monitor BLFR population status, distribution, and hunter harvest.

### **PROGRAM COST**

The estimated cost of the project is \$15,000.

This report was prepared by: Dana T. Lujan, Wildlife Biologist II and Lloyd B. Dicke, Wildlife Biologist I.

### **LITERATURE CITED**

Division of Aquatic and Wildlife Resources. 1998. Job Progress Report. Federal Aid to Fish and Wildlife Restoration. Div. Aquatic Wildlife Res., Dept. Agric., Mangilao.