GENERAL NOTES

More on the wing length of the Slate-colored Junco.—I have twice previously (Blake, 1962, *Bird-Banding* **38**: 97-99 and 1964, **35**: 125-127) discussed the wing length of *Junco hyemalis*. Recently I have been able to partition a sample of provable adults into two Gaussian distributions by Rao's method (C. R. Rao, 1952, Advanced Statistical Methods in Biometric Research, 300-304). The sample from my Hillsborough, N. C. bandings differs somewhat from the 1962 sample. It consists of 146 birds with mean 77.1 ± 2.9 mm. The mean and standard deviation are essentially identical with those of the earlier sample. The skewness $(-.313)$ has the same sign but is larger and is considered significant. The new sample is leptokurtic (3.43) but not significantly so while the former sample was insignificantly platykurtic (2.29).

The method of Rao assumes that each component has the same standard deviation. The main effect of this simplifying assumption is to bias the estimates of the proportions of the components relative to the whole sample. I further assume that the component with the smaller mean length consists of females and the one with the larger mean, of males. The results of the calculations are stated on the assumptions above.

	Wing length	Standard Deviation	Per cent in sample
Females	73.7	1.5	32
Males	78.7	1.5	68

The component assumed to be female has the same mean as my 1962 sample of known immatures from Lincoln, Mass. This is hardly a surprising result. The male component has a mean 0.5 mm. greater and almost the same standard deviation as my earlier sample of birds without brown in the plumage which I then suggested were adult males. Actually one would not expect the complete agreement between the female and immature means except by the merest chance. The two presumed male samples have probability of real agreement of about 0.65 based on a *t*-test. It would appear that the mean difference of wing length between immature and adult males is about 5 mm. I believe these results are more nearly correct than those I arrived at in 1962.

The present results lend some credence to the possibility I rejected in 1964, that the adult population here was preponderantly male. It still remains to be shown that there are areas in which wintering adult females are in excess.—Charles H. Blake, Mus. Comparative Zoology, Cambridge, Mass.

Second broods in the Wood Duck.—It is well known that wild ducks are single-brooded and renest only if their first nests are lost. Recently, however, Wood Ducks (*Aix sponsa*) have been observed to renest after a successful first nest. Hester (*Proc. 16th An. Conf. SE Asso. Game and Fish Comm.* pp. 67-70, 1962) reported four cases in North Carolina; Grice and Rogers (*The wood duck in Massachusetts. Final Rept., Fed. Aid Project* W-19-R, 1965, see p. 45) one case in Massachusetts; and McGilvrey (*Auk*, **83**: 303, 1966) two cases in Maryland. The purpose of this report is to document five similar cases observed on the Duck Creek Wildlife Area and the Mingo National Wildlife Refuge, contiguous areas in southeast Missouri where Wood Duck studies have been underway for several years. One case was noted in 1965 and four in 1966, as follows:

1. F 656-17010. Nest of 19 eggs begun 6 March 1965 and hatched 15 April 1965; second nest of 12 eggs begun 28 May 1965 and hatched 9 July 1965.

2. F 656-17005. Nest of 15 eggs begun 16 March 1966 and hatched 25 April 1966; second nest of 13 eggs begun 25 May 1966 and hatched 3 July 1966.

3. F 706-22636. Nest of 13 eggs begun 11 March 1966 and hatched 26 April 1966; second nest of 8 eggs begun 1 June 1966 and hatched 11 July 1966.

4. F 706-22576. Nest of 15 eggs begun 4 March 1966 and hatched 13 April 1966; second nest of 11 eggs begun 25 May 1966 and hatched 3 July 1966.

5. F 556-33087. Nest of 12 eggs begun 14 March 1966 and hatched 24 April 1966; second nest of 12 eggs begun 22 May 1966 and hatched 29 June 1966.