

Ściborska M., Busse P. 2004. *Intra-seasonal changes in directional preferences of Robins (*Erithacus rubecula*) caught on autumn migration at Bukowo-Kopań ringing station (N Poland) in 1996*. Ring 26, 1: 41-58.

Abstract

Data were collected in 1996 at Bukowo-Kopań ringing station situated on the southern Baltic coast. During the whole autumn migration period 2380 Robins were caught, and 445 of them were tested with Busse's method for directional behaviour.

Birds' headings were grouped in four main axes: ENE-WSW, NNE-SSW, NNW-SSE and WNW-ESE. The seasonal dynamics of birds caught was divided into periods reflecting waves of migration. For each period the percentage shares of these four main axes were extrapolated into the daily numbers of birds caught. The obtained pattern consisted of four migration dynamics characterising differently heading birds.

The total migration dynamics of the Robin at the station is interpreted as follows. In 1996, the intensive migration started around the middle of September with a numerous wave consisting of at least three populations. The peaks of those population waves were shifted in relation to each other in just 1-2 days, and occurred in following order: birds heading to the Apennine winter-quarter, birds heading to the most eastern wintering grounds, and birds heading to the southern parts of Western winter-quarter. The second, numerous wave consisting at least of birds heading to Mediterranean winter-quarter occurred with a peak on 26 September. In two most numerous October waves around 10 and 18 October, birds heading to the northern parts of Western migration route dominated. However, also birds heading to the Balkan (earlier) or even more eastern (later) wintering grounds formed numerous waves around those dates.

The model of Robin migration is proposed, in which the wavy character of migration is generally explained by large-scale factors (like macrosynoptic weather situations, or changes in length of day). Their influence results in the most pronounced waves consisting of populations of different origin. However, the final pattern of dynamics is affected strongly by many other factors: *e.g.* localisation and characteristics of those populations.

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