# Spring migration of European teals Anas crecca wintering in Italy









# D. Giunchi<sup>1</sup>, N.E. Baldaccini<sup>2</sup>, A. Lenzoni<sup>3</sup>, P. Luschi<sup>1</sup>, M. Sorrenti<sup>4</sup>, L. Vanni<sup>1</sup>

- 1 Dipartimento di Biologia, Università di Pisa, Via Volta 6, I-56126, Pisa
- 2 Centro Interuniversitario di Ricerca sulla Selvaggina e sui Miglioramenti Ambientali a fini Faunistici, Università di Firenze, Piazzale Cascine 18, I-50144, Firenze 3 Associazione Cacciatori Migratori Acquatici, Via Messina 45, I- 20154 Milano 4 Ufficio Avifauna Migratoria, Federazione Italiana della Caccia, Via Salaria 298/A, I-00199, Roma

#### Introduction





Tracking data on migratory movements of European ducks are relatively scarce and available information mainly belong to largest species (see e.g. van Toor et al 2013, Gehrold et al 2014). In 2013 we started a project aimed at investigating the ecology of migration of some species of dabbling ducks wintering in Italy by means of satellite tracking (AnaSat Project). In this first two years we marked only European teals Anas crecca, the smallest duck in Europe and one of the most abundant.



### **Materials and Methods**





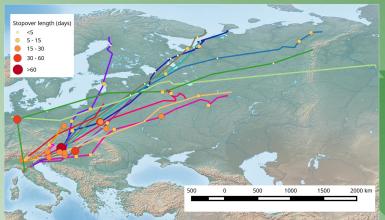
Birds were equipped with solar powered PTTs. (9.5 g, Microwave Telemetry) using the harness method proposed by Roshier et al (2009). The PTT had two different duty cycles (10h on/48h off or 6h on/16h off).



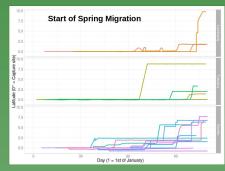


Teals (n=25 females) were caught in three different sites in Central and Northern Italy during winters 2013-2014 and 2014-2015.

#### Results and Discussion



Tracked birds started spring migration after the beginning of February and followed eastward routes. The first part of migration was generally slow and many birds stopped for several days (even more than one month) in areas mainly located in eastern Europe.



### Conclusion

On the whole, this is the first analysis at individual level on the timing of migration and routes of European teals and thus represent an important contribution for the management of the species at the continental scale. Further data, collected on more birds also belonging to other wintering sites, would be helpful to analyse more in depth the migratory strategies of this species and estimate their degree of repeatability.

Some teals ended their migration in central Europe, but several flew thousands of kilometres, sometimes reaching the Arctic circle in Russia, thus confirming previous evidences collected by means of ringing recoveries and stable isotopes analyses (see Guillemain & Elmberg 2014 for a review).

#### References

Gehrold et al 2014, J Avian Biol 45:131-139 – Guillemain & Elmberg 2014, The Teal, Poyser Roshier et al 2009, Freshwater Res 60:299-305 - van Toor et al. 2013, PLoS One 8(8).

# Acknowledgements



Lombardy: D. Bianchi, F. Bosio, G. Cirani, S. del Carlo, A. Mazzoleni, A. Piccinotti, A. Salvati, N. Semperboni and P. Tinti Tuscany: C. Caccamo, F. Carpita, F. Chini, P. Dall'Antonia, A. Galardini, R. Gambogi, R. Mencacci and the Migliarino San Rossore Massaciuccoli Regional Park

Veneto: A. Lucchetta, L. Marcato, L. Sattin, A. Valfrido and the owner of Valle Morosina Ghebo storto

