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Both, Christiaan; Van Turnhout, Chris A. M.; Bijlsma, Rob G.; Siepel, Henk; Van Strien, Arco J.; Foppen, Ruud P. B.

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**Electronic Supplementary information 3: population trends in species of European passerines for which we have data in both Northern and Western Europe in 1989-2005.**

With: Avian population consequences of climate change are most severe for long-distance migrants in seasonal habitats.

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Table 2: population trends in species of European passerines for which we have data in both Northern (Norway, Sweden, Finland) and Western Europe (Austria, Belgium, Denmark, former West Germany, Ireland, The Netherlands, Switzerland, United Kingdom, France) in 1989-2005.

Species		Northern Europe			Western Europe			Year		Area		Area*Year		
		Growth	SE	Ratio 2005/1989	Growth	SE	Ratio 2005/1989	F	p	F	p	F	p	
Tree pipit	<i>Anthus trivialis</i>	LDM	0.978	0.002	0.685	0.979	0.009	0.708	23.6	0.000	30.7	0.000	0.048	0.83
Common redstart	<i>Phoenicurus phoenicurus</i>	LDM	1.021	0.002	1.420	0.999	0.016	0.978	0.06	0.80	0.41	0.53	8.53	<b>0.007</b>
Wood warbler	<i>Phylloscopus sibilatrix</i>	LDM	0.964	0.003	0.531	0.923	0.017	0.258	398	0.000	15.8	0.001	56.6	<b>0.000</b>
Garden warbler	<i>Sylvia borin</i>	LDM	0.999	0.002	0.975	0.989	0.006	0.821	4.37	0.044	0.59	0.45	2.69	0.111
Spotted flycatcher	<i>Muscicapa striata</i>	LDM	1.003	0.003	1.051	0.960	0.026	0.498	38.7	0.000	4.12	0.051	22.2	<b>0.001</b>
Pied flycatcher	<i>Ficedula hypoleuca</i>	LDM	0.985	0.002	0.774	0.969	0.005	0.589	42.9	0.000	8.70	0.006	5.71	<b>0.024</b>
Long-tailed tit	<i>Aegithalos caudatus</i>	RES	1.013	0.016	1.242	1.001	0.013	1.052	0.50	0.48	50.3	0.000	0.18	0.67
Marsh tit	<i>Poecile palustris</i>	RES	0.950	0.007	0.417	0.984	0.017	0.788	2.31	0.14	0.79	0.38	8.12	<b>0.008</b>
Willow tit	<i>Poecile montana</i>	RES	0.957	0.004	0.474	1.030	0.030	1.301	1.37	0.25	7.90	0.009	10.11	<b>0.003</b>
Crested tit	<i>Lophophanes cristatus</i>	RES	0.989	0.008	0.826	0.985	0.013	0.891	4.58	0.04	0.52	0.48	0.27	0.61
Coal tit	<i>Periparus ater</i>	RES	0.938	0.005	0.334	0.989	0.027	0.962	0.08	0.77	2.02	0.16	32.72	<b>0.000</b>
Blue tit	<i>Cyanistes caeruleus</i>	RES	1.021	0.003	1.423	1.015	0.005	1.254	34.5	0.000	32.6	0.000	1.69	0.20
Wood nuthatch	<i>Sitta europaea</i>	RES	0.994	0.004	0.905	0.983	0.015	0.817	4.49	0.04	6.00	0.02	0.50	0.48
Eurasian treecreeper	<i>Certhia familiaris</i>	RES	0.996	0.005	0.936	0.998	0.004	0.958	0.48	0.50	38.9	0.000	0.02	0.89
Bullfinch	<i>Pyrrhula pyrrhula</i>	RES	1.003	0.004	1.055	0.973	0.014	0.723	1.06	0.31	73.6	0.000	2.13	0.15

The analysis is performed on  $\log^{10}$ -transformed population estimates, in a GLM with year as a covariate and area as factor. If the interaction was significant the F-values and p-values for the main effects are given in the model including the interaction term (degrees of freedom for the interaction term are always 1,30). If the interaction term is non-significant the p-values refer to a back-wards elimination procedure.