

Growth patterns of common carp (*Cyprinus carpio*) in inland waterbodies of Uzbekistan

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Table S1. Population-specific length–weight regression diagnostics and HC3 robust inference for $H_0: b = 3$.

Population	Shapiro–Wilk W	P (Shapiro)	Breusch–Pagan χ^2	P (BP)	b	HC3 95% CI of b	P (HC3), b vs 3	Growth type
Zamonbobo	0.928	0.015	2.798	0.094	2.781	2.5032–3.0585	0.1182	I
Karakir	0.970	0.382	0.411	0.521	2.856	2.7731–2.9393	0.0012	–A
Tudakul	0.950	0.082	4.550	0.033	3.046	2.9517–3.1404	0.3296	I
Charvak	0.958	0.150	8.084	0.004	3.032	2.7923–3.2714	0.7891	I
Eastern Arnasay	0.981	0.754	2.437	0.118	3.086	2.9558–3.2156	0.1895	I
Tuzkon	0.927	0.014	7.421	0.006	2.667	2.4287–2.9059	0.0076	–A

Note. Shapiro–Wilk tests assess normality of the ordinary least-squares residuals; Breusch–Pagan tests assess homoscedasticity. The slope estimate b is from the log-transformed ordinary least-squares model. Confidence intervals and P-values for $H_0: b = 3$ use heteroscedasticity-consistent HC3 standard errors. I = not statistically distinguishable from isometry; –A = negative allometric growth. $p < 0.05$ indicates a statistically significant diagnostic result or departure of b from 3, as applicable.

Table S2. Games–Howell post hoc comparisons for relative condition factor (K_n) and Fulton’s condition factor (K).

Condition factor	Comparison	Mean difference	Lower 95% CI	Upper 95% CI	Adjusted p -value	Significant
K_n	Zamonbobo – Karakir	-0.0020	-0.0604	0.0565	1.000	No
K_n	Zamonbobo – Tudakul	-0.0054	-0.0785	0.0677	1.000	No
K_n	Zamonbobo – Charvak	-0.0083	-0.0920	0.0753	1.000	No
K_n	Zamonbobo – Eastern Arnasay	-0.0024	-0.0624	0.0576	1.000	No
K_n	Zamonbobo – Tuzkon	-0.0273	-0.1461	0.0916	0.983	No
K_n	Karakir – Tudakul	-0.0035	-0.0823	0.0754	1.000	No
K_n	Karakir – Charvak	-0.0064	-0.0950	0.0822	1.000	No
K_n	Karakir – Eastern Arnasay	-0.0004	-0.0676	0.0667	1.000	No
K_n	Karakir – Tuzkon	-0.0253	-0.1476	0.0970	0.990	No
K_n	Tudakul – Charvak	-0.0029	-0.1012	0.0953	1.000	No
K_n	Tudakul – Eastern Arnasay	0.0030	-0.0770	0.0830	1.000	No
K_n	Tudakul – Tuzkon	-0.0218	-0.1509	0.1072	0.996	No
K_n	Charvak – Eastern Arnasay	0.0059	-0.0836	0.0955	1.000	No
K_n	Charvak – Tuzkon	-0.0189	-0.1537	0.1158	0.998	No
K_n	Eastern Arnasay – Tuzkon	-0.0249	-0.1478	0.0981	0.991	No
K	Zamonbobo – Karakir	-0.2491	-0.3488	-0.1494	<0.001	Yes
K	Zamonbobo – Tudakul	-0.3027	-0.4193	-0.1862	<0.001	Yes
K	Zamonbobo – Charvak	-0.2865	-0.4181	-0.1549	<0.001	Yes
K	Zamonbobo – Eastern Arnasay	-0.2592	-0.3538	-0.1647	<0.001	Yes

Condition factor	Comparison	Mean difference	Lower 95% CI	Upper 95% CI	Adjusted <i>p</i> -value	Significant
K	Zamonbobo – Tuzkon	-0.1329	-0.3111	0.0452	0.249	No
K	Karakir – Tudakul	-0.0536	-0.1887	0.0814	0.853	No
K	Karakir – Charvak	-0.0374	-0.1853	0.1105	0.976	No
K	Karakir – Eastern Arnasay	-0.0101	-0.1273	0.1071	1.000	No
K	Karakir – Tuzkon	0.1161	-0.0739	0.3062	0.472	No
K	Tudakul – Charvak	0.0162	-0.1428	0.1753	1.000	No
K	Tudakul – Eastern Arnasay	0.0435	-0.0880	0.1750	0.926	No
K	Tudakul – Tuzkon	0.1698	-0.0287	0.3683	0.136	No
K	Charvak – Eastern Arnasay	0.0273	-0.1175	0.1720	0.994	No
K	Charvak – Tuzkon	0.1535	-0.0533	0.3604	0.262	No
K	Eastern Arnasay – Tuzkon	0.1263	-0.0615	0.3140	0.363	No

Note. Mean difference is the mean of the first-named population minus the mean of the second-named population. Games–Howell adjusted *p*-values account for unequal variances and group-specific standard errors. Significant = adjusted *p* < 0.05.