Supplementary Materials

Linear Mixed-Effects Models

SM 1. Linear Mixed-Effects Model on All Participants' Log-Transformed Latencies, Morphological Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.598	0.022	–27.263	<.001
Prime Type (Identity Condition)	–0.010	0.006	–1.627	>.1
Prime Type (Unrelated Condition)	0.064	0.006	10.579	<.001
Target Type	–0.005	0.021	<|1|	>.1
Group	0.184	0.041	4.476	<.001
Prime Type (Identity Condition) × Target Type	0.011	0.022	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type	0.015	0.022	<|1|	>.1
Prime Type (Identity Condition) × Group	0.012	0.012	<|1|	>.1
Prime Type (Unrelated Condition) × Group	–0.012	0.012	<|1|	>.1
Target Type × Group	0.026	0.017	1.533	>.1
Prime Type (Identity Condition) × Target Type × Group	0.028	0.024	1.178	>.1
Prime Type (Unrelated Condition) × Target Type × Group	0.002	0.024	<|1|	>.1
Prime Frequency	–0.004	0.003	–1.394	>.1
Target Frequency	–0.005	0.004	–1.331	>.1

Note. df = 2748; α = .05

SM 2. Linear Mixed-Effects Model on L2 Learners' Log-Transformed Latencies, Morphological Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.498	0.031	–15.899	<.001
Prime Type (Identity Condition)	–0.003	0.009	<|1|	>.1
Prime Type (Unrelated Condition)	0.057	0.009	6.499	<.001
Target Type	0.003	0.029	<|1|	>.1
Proficiency	–0.013	0.004	–2.845	<.005
Prime Type (Identity Condition) × Target Type	0.010	0.032	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type	0.001	0.032	<|1|	>.1
Prime Type (Identity Condition) × Proficiency	0.001	0.001	1.122	>.1
Prime Type (Unrelated Condition) × Proficiency	0.003	0.001	2.394	<.017
Target Type × Proficiency	–0.000	0.002	<|1|	>.1
Prime Type (Identity Condition) × Target Type × Proficiency	0.002	0.003	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type × Proficiency	–0.002	0.003	<|1|	>.1
Prime Frequency	–0.006	0.004	–1.535	>.1
Target Frequency	–0.009	0.005	–1.679	<.094

Note. df = 1370; α = .05

SM 3. Linear Mixed-Effects Model on All Participants' Log-Transformed Latencies, Orthographic Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.558	0.022	–25.395	<.001
Prime Type (Identity Condition)	–0.054	0.006	–8.733	<.001
Prime Type (Unrelated Condition)	0.022	0.006	3.533	<.001
Target Type	0.024	0.016	1.456	>.1
Group	0.168	0.041	4.063	<.001
Prime Type (Identity Condition) × Target Type	–0.011	0.012	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type	–0.006	0.012	<|1|	>.1
Prime Type (Identity Condition) × Group	0.027	0.012	2.268	<.023
Prime Type (Unrelated Condition) × Group	0.005	0.012	<|1|	>.1
Target Type × Group	0.022	0.017	1.313	>.1
Prime Type (Identity Condition) × Target Type × Group	0.031	0.023	1.320	>.1
Prime Type (Unrelated Condition) × Target Type × Group	0.004	0.024	<|1|	>.1
Prime Frequency	0.000	0.002	<|1|	>.1
Target Frequency	–0.007	0.004	–1.659	<.097

Note. df = 2740; α = .05

SM 4. Linear Mixed-Effects Model on Native Speakers' Log-Transformed Latencies, Orthographic Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.644	0.026	–24.346	<.001
Prime Type (Identity Condition)	–0.068	0.008	–8.082	<.001
Prime Type (Unrelated Condition)	0.019	0.008	2.268	<.024
Target Type	0.017	0.020	<|1|	>.1
Prime Type (Identity Condition) × Target Type	–0.028	0.017	–1.688	<.092
Prime Type (Unrelated Condition) × Target Type	–0.008	0.016	<|1|	>.1
Prime Frequency	0.001	0.003	<|1|	>.1
Target Frequency	–0.006	0.005	–1.253	>.1

Note. df = 1365; α = .05

SM 5. Linear Mixed-Effects Model on L2 Learners' Log-Transformed Latencies, Orthographic Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.472	0.032	–14.707	<.001
Prime Type (Identity Condition)	–0.040	0.009	–4.483	<.001
Prime Type (Unrelated Condition)	0.023	0.009	2.261	<.024
Target Type	0.031	0.022	1.379	>.1
Proficiency	–0.010	0.005	–2.144	<.032
Prime Type (Identity Condition) × Target Type	0.006	0.018	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type	–0.004	0.018	<|1|	>.1
Prime Type (Identity Condition) × Proficiency	–0.002	0.001	–1.171	>.1
Prime Type (Unrelated Condition) × Proficiency	0.000	0.001	<|1|	>.1
Target Type × Proficiency	0.001	0.002	<|1|	>.1
Prime Type (Identity Condition) × Target Type × Proficiency	0.000	0.003	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type × Proficiency	–0.003	0.003	–1.350	>.1
Prime Frequency	0.000	0.003	<|1|	>.1
Target Frequency	–0.007	0.005	–1.381	>.1

Note. df = 1368; α = .05

SM 6. Linear Mixed-Effects Model on All Participants' Log-Transformed Latencies, Morphological vs. Orthographic Conditions

Variable	Estimate	SE	t	p
(Intercept)	–0.601	.021	–28.230	<.001
Condition	0.044	.006	6.903	<.001
Group	0.183	.041	4.410	<.001
Condition × Group	–0.014	.012	–1.143	>.1
Prime Frequency	–0.001	.002	<|1|	>.1
Target Frequency	–0.006	.002	–4.004	<.001

Note. df = 1819; α = .05

SM 7. Linear Mixed-Effects Model on All Participants' Log-Transformed Latencies, Semantic Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.533	0.022	–24.662	<.001
Prime Type (Identity Condition)	–0.068	0.006	–11.119	<.001
Prime Type (Unrelated Condition)	0.005	0.006	<|1|	>.1
Target Type	0.009	0.017	<|1|	>.1
Group	0.180	0.04	4.466	<.001
Prime Type (Identity Condition) × Target Type	–0.018	0.012	–1.459	>.1
Prime Type (Unrelated Condition) × Target Type	–0.014	0.012	–1.183	>.1
Prime Type (Identity Condition) × Group	0.015	0.012	<|1|	>.1
Prime Type (Unrelated Condition) × Group	–0.008	0.012	<|1|	>.1
Target Type × Group	0.010	0.017	<|1|	>.1
Prime Type (Identity Condition) × Target Type × Group	0.046	0.023	1.949	<.051
Prime Type (Unrelated Condition) × Target Type × Group	0.016	0.023	<|1|	>.1
Prime Frequency	–0.004	0.002	–1.965	<.049
Target Frequency	–0.009	0.004	–2.186	<.028

Note. df = 2722; α = .05

SM 8. Linear Mixed-Effects Model on Native Speakers' Log-Transformed Latencies, Semantic Condition

Variable	Estimate	SE	t	p
(Intercept)	–0.627	0.026	–24.590	<.001
Prime Type (Identity Condition)	–0.077	0.008	–9.483	<.001
Prime Type (Unrelated Condition)	0.009	0.008	1.071	>.1
Target Type	0.013	0.020	<|1|	>.1
Prime Type (Identity Condition) × Target Type	–0.040	0.016	–2.478	<.013
Prime Type (Unrelated Condition) × Target Type	–0.019	0.016	–1.228	>.1
Prime Frequency	–0.002	0.003	<|1|	>.1
Target Frequency	–0.007	0.005	–1.587	>.1

Note. df = 1354; α = .05

SM 9. Linear Mixed-Effects Models on Native Speakers' Log-Transformed Latencies for Stem and Inflected Targets, Semantic Condition

Target Type	Variable	Estimate	SE	t	p
Stem	(Intercept)	−0.633	0.033	−18.913	<.001
	Prime Type (Identity Condition)	−0.056	0.012	−4.817	<.001
	Prime Type (Unrelated Condition)	0.019	0.011	1.728	<.090
	Prime Frequency	−0.004	0.003	−1.045	>.1
	Target Frequency	−0.007	0.007	−1.037	>.1
Inflected	(Intercept)	−0.618	0.026	−23.886	<.001
	Prime Type (Identity Condition)	−0.097	0.012	−8.358	<.001
	Prime Type (Unrelated Condition)	−0.002	0.011	<|1|	>.1
	Prime Frequency	−0.002	0.004	<|1|	>.1
	Target Frequency	−0.002	0.006	<|1|	>.1

Note. df for stem target model = 674; *df* for inflected target model = 679; α = .05

SM 10. Linear Mixed-Effects Model on L2 Learners' Log-Transformed Latencies, Semantic Condition

Variable	Estimate	SE	t	p
(Intercept)	−0.441	0.032	−13.887	<.001
Prime Type (Identity Condition)	−0.059	0.009	−6.494	<.001
Prime Type (Unrelated Condition)	0.003	0.009	<|1|	>.1
Target Type	0.009	0.022	<|1|	>.1
Proficiency	−0.010	0.004	−2.211	<.027
Prime Type (Identity Condition) × Target Type	0.002	0.018	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type	−0.009	0.018	<|1|	>.1
Prime Type (Identity Condition) × Proficiency	−0.001	0.001	<|1|	>.1
Prime Type (Unrelated Condition) × Proficiency	0.000	0.001	<|1|	>.1
Target Type × Proficiency	0.000	0.002	<|1|	>.1
Prime Type (Identity Condition) × Target Type × Proficiency	0.001	0.003	<|1|	>.1
Prime Type (Unrelated Condition) × Target Type × Proficiency	−0.003	0.003	−1.070	>.1
Prime Frequency	−0.006	0.003	−1.933	<.053
Target Frequency	−0.009	0.005	−1.779	<.076

Note. df = 1361; α = .05