Supplemental file 3 – Table V interaction with intelligibility

Table Vb. Linear mixed-effects model accounting for change in pupil size in window 2 (time 0.7s to 2.4s relative to stimulus offset) for _slower-rate_ speech, interacting each model term with dataset (all data versus only-correct-trials dataset).

		Estimate	st. err	df	t	p
$\beta 1$	Intercept (Slow-rate, High-Cont.)	0.108	0.018	20.92	6.1	< .001
$\beta 2$	Time (_slope_)	-0.022	0.005	24.30	-4.74	< .001
$\beta 3$	Low-Context	0.003	0.010	58.25	0.26	.796
$\beta 4$	**$All Correct**	**-0.001**	**0.004**	**37.32**	**-0.24**	**.810**
$\beta 5$	Time (slope) : Low-Context	0.010	0.004	33.34	2.49	.018
$\beta 6$	**Time (slope) : $All Correct**	**0.000**	**0.002**	**130.48**	**-0.12**	**.903**
$\beta 7$	**Low-Context : $All Correct**	**0.000**	**0.006**	**22.52**	**0.02**	**.987**
$\beta 8$	**Time (slope) : Low-Context : $All Correct**	**-0.002**	**0.003**	**231.02**	**-0.52**	**.604**

Table Vc. Linear mixed-effects model accounting for change in pupil size in window 2 (time 0.7s to 2.4s relative to stimulus offset) for _original-rate_ speech interacting each model term with dataset (all data versus only-correct-trials dataset).

		Estimate	st. err	df	t	p
$\beta 1$	Intercept (Slow-rate, High-Cont.)	0.113	0.014	21.96	7.97	< .001
$\beta 2$	Time (_slope_)	-0.010	0.006	21.07	-1.76	.092
$\beta 3$	Low-Context	-0.004	0.010	52.15	-0.46	.649
$\beta 4$	**$All Correct**	**-0.001**	**0.004**	**66.86**	**-0.17**	**.867**
$\beta 5$	Time (slope) : Low-Context	0.011	0.004	34.16	2.56	.015
$\beta 6$	**Time (slope) : $All Correct**	**-0.003**	**0.002**	**164.39**	**-1.21**	**.230**
$\beta 7$	**Low-Context : $All Correct**	**0.003**	**0.006**	**38.30**	**0.41**	**.688**
$\beta 8$	**Time (slope) : Low-Context : $All Correct**	**0.001**	**0.004**	**39.01**	**0.38**	**.709**

Note: St.Err is standard error of the mean estimation, df is degrees of freedom estimated using the Satterthwaite approximation (implementation by Kuznetsova et al. 2017)
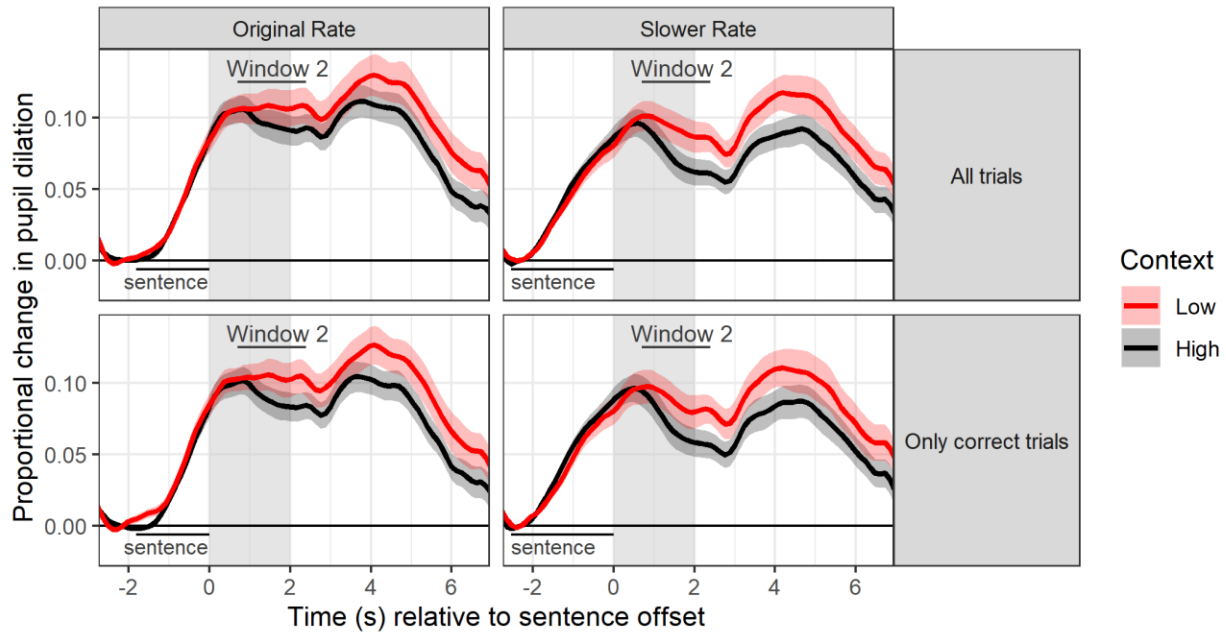
(Figures on next page)

Figure 3d. Proportional change in pupil dilation over time for sentences spoken at the original rate (left panels) or a slower rate (right panels). Low-context sentences are displayed with red lines, and high-context sentences are displayed with black lines. Width of the error ribbon represents ±2 1 standard error of the mean. The gray shaded region represents the silent interval between stimulus offset and the visual prompt for listeners to repeat the sentence. Upper panels include all data (same as in the main manuscript), and lower panels include only trials with correct intelligibility responses.
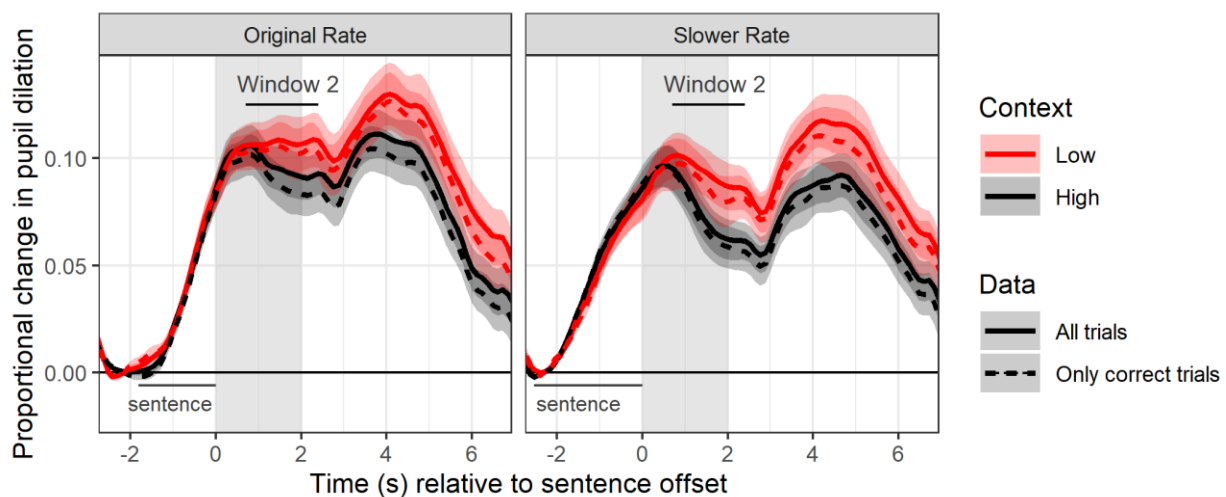

Figure 3e. Same as Figure 3d, but showing both datasets on the same panels to facilitate direct comparison.