

## Background

Research in children with Developmental Language Disorder (DLD) and typically developing children has demonstrated a relationship between language functioning and other domains, such as communicative participation, academic achievement & social-emotional functioning. Little is known about the factors that predict the variation in developmental patterns and outcomes in the different domains.

In this study, longitudinal data are collected from 600 Dutch children with (presumed) DLD. They are monitored from 4 years of age until adulthood. Data are collected at important transition points, such as the start of primary school and the transition to high school.

## Research questions

- Which factors explain the variation in developmental patterns of children with (presumed) DLD?
- What is the relationship between language, intelligibility and communicative participation in 4-year-old children with DLD?
- Which factors are predictive for communicative participation in 4-year-old children with DLD?

## Participants

N = 333		
	Mean (SD)	Range
Age at T0 (N = 303)	3;9 (0;3)	3;1-4;8
Age at T1 (N = 330)	4;6 (0;3)	4;3-6;3

## Methods

**Test moments** T0 = before school entrance and T1 = six months after the start at primary school.

**Variables** Dependent: communicative participation (T1)  
Independent: language comprehension, receptive and expressive vocabulary, expressive grammar & nonverbal IQ (T0), intelligibility, background measures like SES & multilingualism (T1).

**Instruments** Standardized tests for language and cognition, Intelligibility in Context Scale<sup>1</sup>, and questions on communicative participation with Visual Analog Scales<sup>2</sup>.

**Analysis** Multiple regression analyses and correlations in SPSS. N = 205 due to missing data.

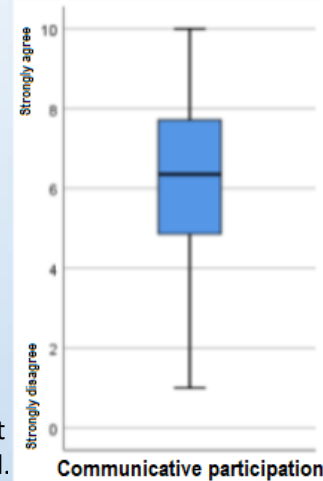
### References

<sup>1</sup> McLeod, S., Harrison, L.J., & McCormack, J. (2012). The Intelligibility in Context Scale: Validity and reliability of a subjective rating measure. *Journal of Speech, Language, and Hearing Research*, 55, 648-656.

<sup>2</sup> Zwitserlood, M., Wiefferink, K., & Gerrits, E. (submitted). Speech and language intervention via parents: a randomized trial with Dutch toddlers with DLD.

## Results and Implications

- Intelligibility (T1) and (to a lesser extent) expressive grammar (T0) explain a significant proportion of variance in communicative participation at T1.
- 47,5% of the variance is explained by these two measures.
- Language comprehension, receptive and expressive vocabulary, nonverbal IQ, and the background measures do not significantly add to that and were not included in the final model.



Regression Coefficients for predicting Communicative Participation

Variable	B	95% CI		$\beta$	t	p
		upper	lower			
(Constant)	-4,702	[-6,455,	-2,949]			
Intelligibility	2,061	[1,706,	2,415]	.609	11,452	.000
Expressive grammar	,037	[,017,	,058]	.195	3,668	.000

Note R<sub>z</sub>\_adj = .475 (N=205, p = 0.000). CI = confidence interval for B

## Take-home message:

The communicative participation of young children with (presumed) DLD depends on their intelligibility and expressive grammatical skills.

**Conflict of interest:** All authors declare that they have no conflict of interest.