

Desmopressin melt improves sleep and psychological functioning in patients with monosymptomatic nocturnal enuresis

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Introduction

A comorbidity and a possible causality between nocturnal enuresis, sleep disorders and attention deficit-hyperactivity disorder has been suggested (Yeung et al 2008, Dhondt et al 2009). This prospective study in children with monosymptomatic nocturnal enuresis (MNE) associated with nocturnal polyuria (NP) aims to evaluate the impact of desmopressin melt on sleep and psychological functioning of the child.

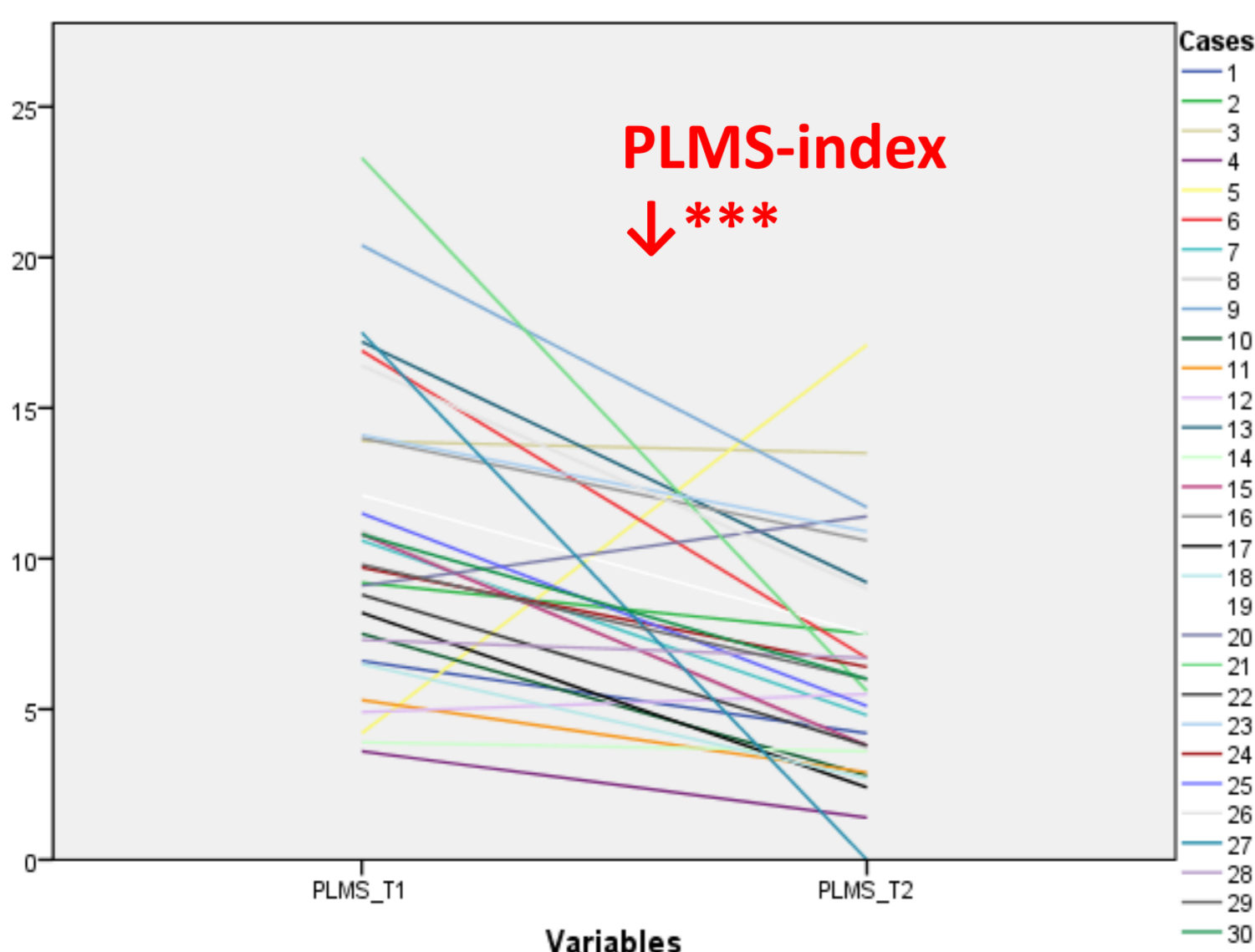
Material and methods

Thirty patients aged 6-16 years with MNE who experienced at least 4/7 wet days with proven NP, defined as nocturnal diuresis >100% bladder volume for age, are included. Patients are tested before the start of desmopressin melt and 6 months later. It is a multi-informant (children, parents, teachers) and multi-method study, using video-polysomnography, questionnaires, clinical interviews and neuropsychological testing.

Results

10 full response, 2 response, 11 partial response
6 non-response, 2 unknown response

Desmopressin → SLEEP

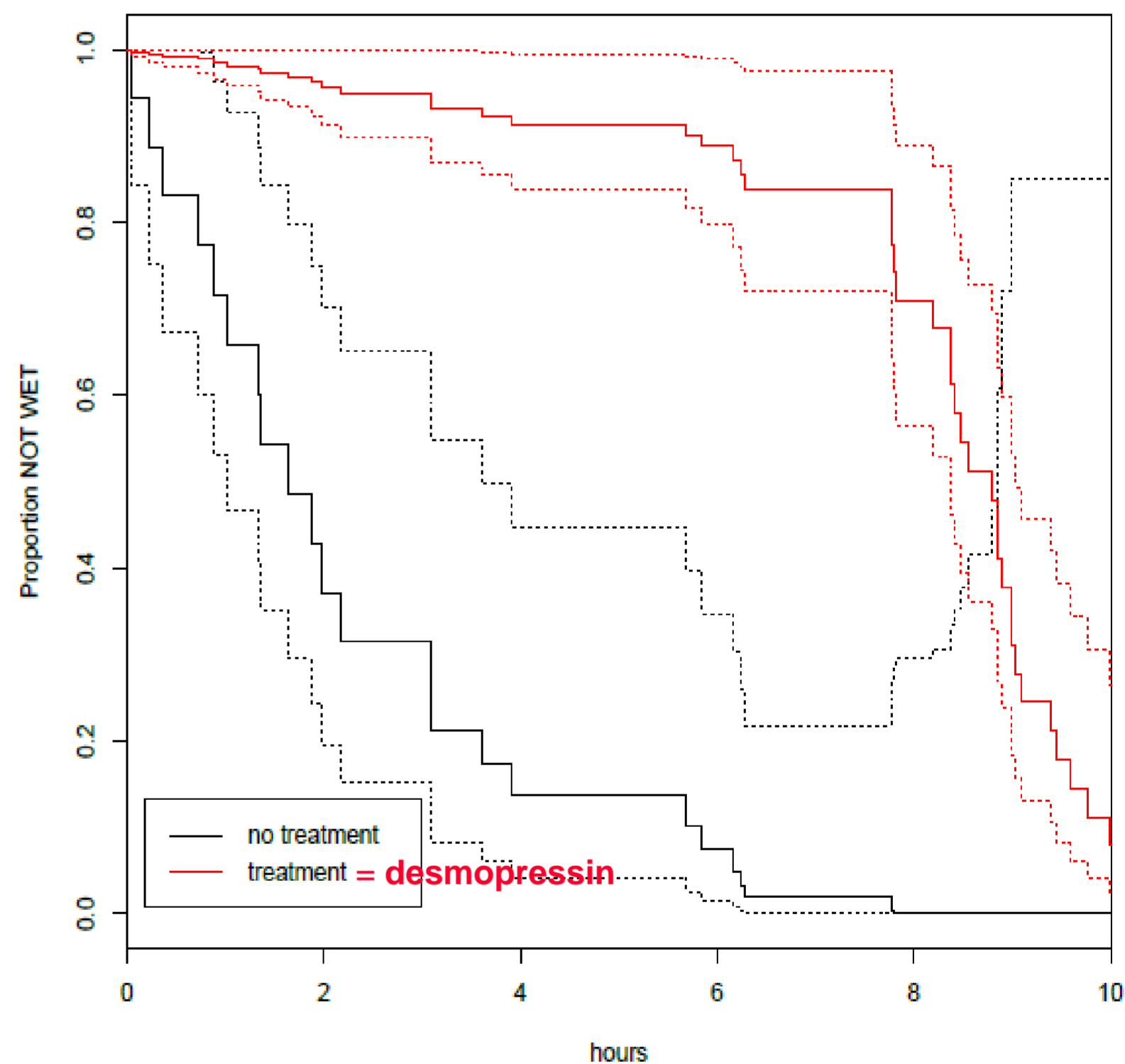


Cortical arousals ↓

- Arousal index ↓**
- Awakening index ↓*

Chance of being dry during the night ↑

FUSP ↑



Desmopressin → PSYCHOLOGY

- Attention problems**
- Internalizing problems*
- Externalizing problems*(*)
- QoL**
- Executive functioning*(*)
- Auditive memory**

*p<.05; **p<.01; ***p<.001

Conclusion

Desmopressin melt improves sleep pattern and neuropsychological functioning in patients with MNE.