# Intervention SENSory regulation Early life

Published: 15-10-2024 Last updated: 18-01-2025

The aim of this project is to investigate a parent-mediated treatment method targeting sensory processing difficulties thereby improving the emotion regulation difficulties and quality of life of the child and its family.

Ethical review Approved WMO

**Status** Pending

**Health condition type** Developmental disorders NEC

Study type Interventional

## **Summary**

#### ID

**NL-OMON57172** 

#### Source

**ToetsingOnline** 

**Brief title** 

**ISENSE** 

#### **Condition**

Developmental disorders NEC

#### **Synonym**

Sensory atypicalities; Sensory processing difficulties

#### Research involving

Human

### **Sponsors and support**

**Primary sponsor:** GGZ instellingen / Psychiatrische Ziekenhuizen **Source(s) of monetary or material Support:** Ministerie van OC&W

#### Intervention

Keyword: Early intervention, Parent-child interaction, Sensory Processing Difficulties

#### **Outcome measures**

#### **Primary outcome**

- Emotional regulation capacities of the child using The Emotion Dysregulation Index (EDI) (Samson et al., 2013).
- Quality of life of the child using the Pediatric Quality of Live Inventory (PedsQL) (Varni et al., 1998).

#### **Secondary outcome**

- Adaptive functioning using the Vineland Screener 0-6 years (Scholte et al.,
  2008) is completed by parents during the intake process and two times more, to
  asses a short-term and long-term adaptive functioning level of the child.
- Sensory processing difficulties using the Sensory Profile-NL-2 (SP-NL-2)
  (Dunn, 2002).
- Parental burden based on the Opvoedingsbelasting Vragenlijst (OBVL)
  (Vermulst, Kroes, De Meyer, Nguyen, & Veerman, 2015).
- Quality of life of the parents using the Pediatric Quality of Live Inventory
  Family Impact Module (PedsQL-FIM) (Varni et al., 1998).
- Parental sensitivity and co-regulation using the Parent-Infant/Toddler Coding of Interaction Preschool (PInTCI-P) (Pijl et al., 2018).
- Last, parental level of satisfaction is rated on a 5-point Likert Scale short-term post-intervention, using a 20-item custom made questionnaire.

# **Study description**

#### **Background summary**

Clinical observations and scientific research show that parents referred to specialized mental health care often ask professional support regarding sensory processing difficulties of their young child. It is well established that sensory processing difficulties can have a profound negative impact on a child\*s functioning (Posar, 2018) which may continue later on in life. While increasing the risk for emotional regulation problems, social withdrawal and impaired quality of life, it also effects participation in society such as work and leisure activities (Benen Demchick, Goldrich Eskow, & Crabtree, 2014; Costa-López, 2021; Schaaf, Toth-Cohen, Johnson, Outten, & Benevides, 2011). Children may be hyper- and/or hyporeactive to sensory stimuli or both at different times, which makes it difficult for parents to understand and interpret their child\*s signals and respond adequately. Importantly, at this point no evidence-based treatments are available that focus on young children with sensory processing difficulties.

#### Study objective

The aim of this project is to investigate a parent-mediated treatment method targeting sensory processing difficulties thereby improving the emotion regulation difficulties and quality of life of the child and its family.

#### Study design

Given the expected heterogeneity in our study population, an experimental single-subject design is used in this study (A1-B-A2 design) (Backman et al., 1997) to investigate this intervention.

#### Intervention

The intervention consits of an e-learning, parent groups, and individual parent-child sessions (home visits).

#### Study burden and risks

Nature and extent of the burden and risks associated with participation, benefits, and group relatedness: Participants (parents/caregivers and children) are expected to benefit from the treatment. The risks associated with participating in the study were considered negligible and the burden associated with participation was estimated to be low.

## **Contacts**

#### **Public**

Selecteer

Reinier Postlaan 12 Nijmegen 6525 GC NL

**Scientific** 

Selecteer

Reinier Postlaan 12 Nijmegen 6525 GC NL

## **Trial sites**

#### **Listed location countries**

**Netherlands** 

# **Eligibility criteria**

#### Age

Adults (18-64 years) Children (2-11 years)

#### Inclusion criteria

- -Age between 0-7 years old.
- -Meeting the decision criteria need for highly specialized mental health care, based on the Decision

Tool of Karakter Young Child Center.

-Evident sensory processing difficulties, with hyperreactivity or both hyperand hyporeactivity to

sensory stimuli, based on the information collected during the intake process and the SP-NL-2

(Dunn, 2002) questionnaire and interview, the latter two completed within 3 weeks after completion

of the intake process both by a member of the research team.

#### **Exclusion criteria**

- -No completed or ongoing treatment at Karakter for parents/primary caregiver or child
- -Children with only hyporeactivity to sensory stimuli are excluded, due to the use of habituation techniques.
- -Unable although support - to respond to questions (parents)
- -Insufficient mastery of Dutch language (parents)
- -Trauma-related disorders/complaints for which trauma treatment is directly indicated in the child
- -Attachment problems that meet the classification criteria for an attachment disorder according to

the Diagnostic and Statistical Manual of Mental Disorders-5 (DSM-5).

# Study design

## **Design**

Study type: Interventional

Masking: Open (masking not used)

Control: Uncontrolled

Primary purpose: Treatment

#### Recruitment

NL

Recruitment status: Pending

Start date (anticipated): 01-05-2024

Enrollment: 20

Type: Anticipated

## Medical products/devices used

Registration: No

## **Ethics review**

Approved WMO

Date: 15-10-2024

Application type: First submission

Review commission: CMO regio Arnhem-Nijmegen (Nijmegen)

# **Study registrations**

## Followed up by the following (possibly more current) registration

No registrations found.

## Other (possibly less up-to-date) registrations in this register

No registrations found.

## In other registers

Register ID

CCMO NL85666.091.23