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When children face fear: treatment, child, and family factors in cognitive behavioral therapy for childhood anxiety

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I am extremely grateful to everyone who had a part in this exciting, challenging, and rewarding PhD journey. Throughout, I have struggled with keeping to word limits. However, nowhere was this as difficult as in this section. If I have been unable to mention you by name, let me say here: thank you!

First, I would like to thank all the children and their parents who participated in the KibA study. You were incredibly brave in facing your fears. Thank you for your time and effort in helping future children. See the gallery on the next pages for some of their (and our) proudest moments.

My deepest gratitude to my supervisors for their guidance and support. Anke, thank you for thinking of me while I was still travelling the world. You saw from the beginning that this project suited me extremely well. Thank you for giving me the opportunity to combine my passions for research and clinical practice, and for your support throughout. Tom, your experience has been invaluable. I feel honored that you have spent so much time mentoring me, making me a better therapist, trainer, and researcher. Your passion for advancing this field and your patient guidance have been irreplaceable. Bonny, thank you for joining the supervisory team and making it the great team it was. You always managed to get me unstuck, helped me keep pace toward the end, and your analytical thinking and practical feedback have been incredibly valuable.

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A GALLERY OF PROUD MOMENTS









THERAPIST PREPARATION INSPIRATION

Within the KibA study, therapist handouts were developed for each specific phobia to support the preparation and delivery of exposure sessions. These materials were created collaboratively with clinicians and included practical guidance on arranging exposure contexts, recruiting relevant animals or objects, and designing creative, individualized exposure exercises. Although multiple phobia-specific protocols were developed, this appendix presents one illustrative example focusing on dog phobia. This example also links back to the case vignette introduced at the beginning of this dissertation.

Therapists reported that generating exposure exercises was easier for more common phobias (e.g., dog phobia), whereas less common or more abstract phobias (e.g., buttons, traffic lights) and injection phobias often required more structured inspiration and peer discussion. Even for familiar phobias such as dog phobia, designing a full three-hour exposure session was considered demanding, and sharing ideas across therapists and using the inspiration sheet was helpful in developing varied and sufficiently graded exercises.

Sam's treatment

In preparation for treatment, Sam's therapist used this guideline to design a three-hour exposure session. Together with Sam, key catastrophic fears were identified, particularly relating to sudden dog movements and situations in which dogs appeared excited. Three dogs were selected for the session, with increasing levels of difficulty from a calm dog to a highly playful and excitable dog in the final phase.

The exposure followed a graded but flexible hierarchy, beginning with observation-based tasks and progressing toward direct interaction. Sam engaged with the dogs through descriptive attention tasks, therapist modelling, and collaborative interaction, gradually increasing contact across situations both indoors and outdoors.

By the end of the session, Sam had successfully interacted with all three dogs, including the most excitable dog. He was able to remain in a room with a playing dog, engage in feeding and play, and walk through a park while encountering unfamiliar dogs at a distance. Although still experiencing some anxiety, he reported increased confidence in managing dog encounters.

During the four-week practice period, Sam and his parents continued exposure practice in daily life contexts, including parks, visits to relatives with dogs, and interactions with a friend's dog. At follow-up, avoidance had substantially reduced and dog-related anxiety no longer dominated family functioning. Sam still reported discomfort when dogs jumped toward him but was able to cope effectively without panic.

Treatment inspiration sheet - dogs

Common catastrophic thoughts:

If I encounter a dog, it will run toward me and I will be so frightened that I cannot cope.

If I encounter a dog, it will jump up at me and then I will fall very hard.

If I encounter a dog, it will bite me.

I become so panicked when I encounter a dog that I run into the street without looking and that is dangerous.

Materials to bring (most are provided by dog owners):

- A different dog every hour (size/breed/activity level/vocalization depending on the child's fear)
- Treats/Toys/Brush
- Water bowl/Blanket/Leash
- Optional: visual progress overview & stickers to track exercises during the OST

Children may be asked to bring dog treats as a thank-you to participating dogs (this is often experienced as motivating). Preferences and sensitivities of each dog should be discussed in advance with their owner.

General exposure ideas (pick those suitable for your client):

Pretend you cannot see the dog and let the child describe the dog (at different distances)	Discuss dog behavior (how can you see this is a friendly dog? Why do you think it moved? It barked—what could that mean?)	Pet the dog as a team (therapist models; child touches therapist's shoulder/arm/hand; petting together; then petting alone)
Passing the dog: therapist between child and dog, then reversed, then alone	Walk the dog (together as a team/alone) on a leash through the room and outside	Have multiple dogs in the room at the same time
Discuss differences between different dogs	Let the dog walk freely in the room (build up: child on table, therapist beside child, alone)	Observe dogs on the street/in the park
Enter a room with a dog that greets you excitedly	Study the mouth/nails of the dog and discuss their uses	Ask someone whether you may pet their dog
Sitting on the floor with a dog	Let a dog give its paw	Lie on the floor with a dog in the room
Have a dog sit on your lap	Let a dog walk toward you	Brush the dog
Give the dog a treat	Listen to a barking dog	Let a dog jump against you
Give the dog a command	Play with the dog (ball, stick, rope)	Show parents how to pet a dog

Also try to go outside during the session. Walk the dog outside. Observe and pass dogs in the street. When possible, incorporate the child's interests, such as playing tag or soccer with the dog or letting the child do a dance performance for the dog.

Rough structure, adjust as needed:

Hour 1:

If necessary, observe the dog from behind a screen. Preferably start with the dog in the room (on short leash on the other side of the room).

Starting exercise: The therapist pretends to be blind and the child describes the dog.

Move chairs progressively closer.

Therapist pets the dog – child watches and describes.

Petting together as a team.

Walk dog on leash through the room: practice passing.

Give a treat together or alone as a reward.

Optional: walk the dog outside together for a short distance.

Hour 2:

New dog. Same steps as Hour 1, which may now go faster.

Then add dog off leash in the room.

Sit on the floor with the dog.

Play with the dog.

Enter the room and be greeted by the (off-leash) dog.

Hour 3:

New dog, same steps as before but faster and expanded.

Optional: let dog step over legs.

Practice with a jumping dog.

Walk a short distance together and practice passing outside.

CURRICULUM VITAE

Annelieke Hagen was born on April 13, 1992 in Haarlem, the Netherlands. In 2010, she graduated from Mendelcollege secondary school in Haarlem. In 2013, she obtained her Bachelor of Science degree in Psychology (Clinical Developmental Psychology track, with honors) from the University of Amsterdam. In 2015, she completed the Research Master's program in Psychology at the University of Amsterdam, specializing in Clinical Developmental Psychology with a minor in Methodology, graduating with distinction.

Following her academic training, she combined clinical practice, research, and teaching. She worked as a junior researcher at the University of Amsterdam on projects focusing on childhood tic disorders, obsessive-compulsive disorder, and alcohol misuse, and contributed to teaching within the Clinical Developmental Psychology program. In parallel, she gained clinical experience as a master's-level psychologist at De Bascule (now LEVVEL) in Amsterdam, at the University of Amsterdam general practitioners' clinic (POH-GGZ), and at the Leiden University Treatment and Expertise Centre (LUBEC).

In 2020, she started her PhD research at Leiden University within the Programme Group Developmental and Educational Psychology. Her research focuses on improving treatment for children with anxiety disorders, with a particular emphasis on intensive exposure-based interventions for childhood specific phobias. During her PhD, Annelieke provided diagnostics and treatment for children with specific phobias, supervised master's thesis students, delivered guest lectures, and trained clinicians in One-Session Treatment. She was also an active member of the Leiden University Knowledge Center Anxiety and Stress in Youth. Annelieke completed training in cognitive behavioral therapy for children and adolescents, imagery rescripting, and a train-the-trainer program for One-Session Treatment under Professor T. H. Ollendick (Virginia Tech, USA). She also attended courses in scientific integrity, data management, and academic writing, and presented her work at national and international conferences, including the European Association for Behavioural and Cognitive Therapies (EABCT), the Dutch Association for Behavioral and Cognitive Therapies (VGCT), and the Dutch Society for Developmental Psychology (VNOP). In 2025, she became a board member of the Foundation for the Treatment of Selective Mutism. On November 1, 2026, she will begin the post-master's training program to become a health care psychologist (GZ-psycholoog), while remaining involved in research as an advisor on other projects related to the KibA study.

LIST OF PUBLICATIONS

Hagen, A., Klein, A. M., Bögels, S. M., & van Steensel, F. J. A. (2025). Family functioning in families of children with an anxiety disorder, with and without autism spectrum disorder. *Journal of Autism and Developmental Disorders*, 1-14. <https://doi.org/10.1007/s10803-025-06894-w>

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