1. **Title:** The MindSpring project: Prevention of trauma-related mental health problems among refugees

2. **Status of the project:** Pilot completed, controlled study running

3. **Project period:** February 2016 – March 2019

4. **Investigator:** Charlotte Sonne, MD, PhD, postdoc fellow

5. **Supervisors and collaborative partners**
The project supervisors include Senior Consultant Jessica Carlsson, PhD (Competence Centre for Transcultural Psychiatry at Mental Health Centre Ballerup), Professor Erik Lykke Mortensen (University of Copenhagen) and Professor Derrick Silove (Director of Psychiatry Research & Teaching at the Mental Health Centre, Liverpool Hospital and professor at the University of New South Wales, Australia).
The project is carried out in collaboration with the Danish Refugee Council’s Centre for Vulnerable Refugees and The New South Wales Service for the Treatment and Rehabilitation of Torture and Trauma Survivors (STARTTS).

6. **Background**
Posttraumatic stress disorder (PTSD) is a serious psychiatric condition that in some individuals causes severe disabilities. In Denmark PTSD has been the most common reason for early retirement during the last seven years\(^1\). It is estimated that PTSD affects approximately 30% of all refugees\(^2\). Newly arrived refugees are in an especially vulnerable position as cultural differences often are experienced as additional stressors to pre-migration and migration traumas\(^3\). There is therefore an urgent need to take steps early on to prevent the development of trauma-related psychiatric disorders as well as to identify individuals in need of immediate psychiatric treatment. The current knowledge about preventive interventions is however very limited. Although rehabilitation programmes for refugees were first established in countries of resettlement more than 30 years ago, the field has been slow to develop and apply evidenced-based interventions, a gap that it is now recognised and urgently in need of being addressed\(^4\)–\(^6\). Particularly when it comes to group interventions for trauma-affected refugees only few studies have been carried out and, as far as we know, no studies of the effects of psychosocial preventive group-interventions for trauma-affected refugees have ever been published\(^7\). Hence this project will be the first of its kind worldwide.

7. **Aim/s**
The aim of the project is to prevent PTSD and other mental health problems among trauma-affected refugees by achieving a better understanding of the effects of early interventions. The objectives are:

- To design and validate a screening tool for psychological symptoms and psychosocial problems among trauma-affected refugees. The constructs of this screening tool are based on data from over 5000 refugee clients and it will be pilot tested simultaneously in Denmark and Australia.

- To evaluate short- and long-term effects of the psychosocial group intervention MindSpring among refugees who have recently obtained asylum.

The hypothesis is:
• Participants of the MindSpring intervention show significantly greater improvement in psychiatric symptoms and level of functioning compared to matched controls.

8. Methods
The project includes the development and validation of a rating scale and two studies about the MindSpring intervention:
1) The pilot study: Adjustment of the MindSpring intervention
2) The matched control study: Determining effects of preventive interventions among newly arrived refugees

8.1 Number of participants (N)
Study 1: 98
Study 3: approx. 230 active participants and 460 matched controls

8.2 Population: Newly arrived trauma-affected refugees

8.3 Description of data and data collection
Development and validation of the screening tool
A self-rating screening tool of approximately 35 items covering the most common psychiatric symptoms as well as life quality and social functioning problems among trauma-affected refugees will be developed in cooperation between the Danish, Swedish and Australian research groups. The screening tool will be constructed on the basis of data collected in previous research projects in Denmark, Sweden and Australia as well as an ongoing project at CTP about cultural validity of rating scales. The end product will be electronic so users will be able to complete the ratings on computers, tablets or smart phones. The screening tool will be available in the participant’s own language and software that read the questions aloud is currently being tested in order not to exclude illiterate participants. The screening tool will be piloted among the target group of refugees in Australia and Denmark. Success criteria: A screening tool that is appropriate and acceptable for the target group.

The MindSpring pilot study
This pilot study will be carried out in order to customise the intervention to newly arrived refugees. Content of the intervention, cultural acceptability as well as overall satisfaction is evaluated with a satisfaction survey and focus groups. The WHO-5 rating is completed in the beginning of and after the intervention to provide a preliminary picture of change over the intervention course. Results will be used to adapt the intervention and research setup before the matched control group study. Success criteria: Min. 25% participants and trainers respectively participate in focus groups.

The MindSpring controlled study
Built upon the results of the pilot study a matched control group study will be carried out. Active participants complete a brief sociodemographic questionnaire, an intervention specific questionnaire as well as the Refugee Health screener (RHS-13) and an extended version of the WHO-5. Ratings are completed before and after participating in the MindSpring group intervention. Controls are identified via language schools and will be rated with the same intervals. Success criteria: Minimum 80% of participants (attrition rate based on previous experiences with MindSpring) complete the MindSpring program and ratings.
8.4 Application/acceptance from the Danish Data Protection Agency, the National Committee on Health Research Ethics: All relevant permissions will be obtained before the project commence.

8.5 Analysis
Baseline differences in both the register study and the matched control study will be analysed with t-test/chi²-test. For the pilot study pre-post treatment changes will be analysed with paired t-test whereas follow up differences for the controlled study will be analysed with mixed method multiple regression.

9. Expected results
The project is expected to contribute with new important knowledge about the effect of early interventions on the mental health and wellbeing among refugees. In the long term the results can be used to prevent that individuals with refugee background develop chronic mental disorders and thus potentially cut down society’s expenses of treatment, flexible jobs and early retirement.

10. Dissemination of results
Three publications are planned based on the results from the project:
1) Design and validation of a multi-module rating scale for trauma-affected refugees
2) The MindSpring intervention – a pilot study of a psycho-social group intervention for refugees
3) MindSpring – psychological and social effects of a group program for newly arrived refugees.

11. References


