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Implementing workplace-adapted mindfulness-based stress reduction in private companies

Submission date
14/02/2022

Recruitment status
No longer recruiting

Registration date
15/02/2022

Overall study status
Completed

Last Edited
16/03/2023

Condition category
Mental and Behavioural Disorders

[ ] Prospectively registered
[X] Protocol
[ ] Statistical analysis plan
[X] Results
[ ] Individual participant data

Plain English summary of protocol

Background and study aims
Mindfulness-based interventions (MBIs) are being implemented in many private and public workplaces. Previous research has shown MBIs in workplace settings to be effective in reducing perceived stress, symptoms of anxiety and depression as well as enhancing well-being. Recent research indicates that workplace MBIs facilitate enhanced communication and collaboration within the workplace. Practising mindfulness enables a greater awareness of one's own patterns of behaviour and can in effect enable individuals to be less reactive in situations of stress. Moreover, practising mindfulness facilitates greater compassion for yourself and others. These parameters may positively affect the psychological work environment. Prevously, the MBIs implemented in workplace settings varied in both the content and the length of the intervention. Therefore, there is a need to investigate the feasibility and impact of a documented effective MBI in workplace settings. One such intervention is the manualized programme, Mindfulness-based Stress Reduction (MBSR). Consequently, the aims of this study are:
1. To systematically develop a workplace-adapted Mindfulness-based Stress Reduction (MBSR) programme
2. To evaluate the feasibility of implementing a workplace-adapted MBSR program in small and medium-sized private companies
3. To evaluate the impact of a workplace-adapted MBSR programme on mental health and psychological work environment

Who can participate?
All employees and managers from small and medium-sized private companies

What does the study involve?
The study involves employees and managers from four small and medium-sized private companies. Each company receives an intervention consisting of three elements:
1. An obligatory 2-hour introductory session on mental health and mindfulness for all employees and managers
2. A 10-week workplace-adapted MBSR-programme for self-selecting employees and managers
3. The offer of participating in a workshop on further implementation of mindfulness in the company for selected managers and employee representatives

All employees and managers receive electronic questionnaires at the start of the study, after the intervention and at 12 months follow-up. Selected employees and managers are asked to participate in focus group interviews at the start of the study and after the intervention.

What are the possible benefits and risks of participating?
Previous research has found MBSR effective in reducing stress, symptoms of depression and anxiety and enhancing well-being. There are indications that mindfulness in a workplace setting may facilitate healthier work environments with more constructive conflict management. There are no known risks of participating.

Where is the study run from?
The study is run from Denmark in a collaboration between the Danish Center for Mindfulness, Department of Clinical Medicine, Aarhus University and Southern University of Denmark

When is the study starting and how long is it expected to run for?
January 2020 to February 2022

Who is funding the study?
The Velliv Association (Denmark)

Who is the main contact:
Lise Juul
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Contact information

Type(s)
Principal investigator

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Additional identifiers

Clinical Trials Information System (CTIS)
Nil known

ClinicalTrials.gov (NCT)

Nil known

Protocol serial number
1715

Study information

Scientific Title
The feasibility and impact of implementing workplace-adapted mindfulness-based stress reduction in small and medium-sized private companies on the mental health and psychological work environment: a mixed-methods, quasi-experimental study

Study objectives
Hypotheses:
1. The mental health of individuals will improve following participation in a workplace-adapted Mindfulness-based Stress Reduction (MBSR) programme
2. Enhanced awareness through practising mindfulness will improve pro-social behaviour and interpersonal relations
3. Enhancements in pro-social behaviour and interpersonal relations among those choosing to participate in a workplace-adapted MBSR-programme are expected to affect the psychological work environment in the entire company

Ethics approval required
Old ethics approval format

Ethics approval(s)
Approved 24/02/2020, The Danish Data Protection Agency (Carl Jacobsens Vej 35, 2500 Valby, DK; +45 (0)33193200; dt@datatilsynet.dk), ref: 2016-051-000001/1715

Study design
Quasi-experimental interventional trial without control group

Primary study design
Interventional

Study type(s)
Prevention

Health condition(s) or problem(s) studied
Individual mental health and psychological work environment promotion and prevention in private companies

Interventions
The intervention is three-fold:
1. 2-hour obligatory introductory sessions for all employees and managers within four small and medium-sized private companies
2. A 10-week workplace-adapted MBSR-programme for self-selected employees and managers within the respective companies
3. A 2-hour workshop for selected managers and employee representatives on further implementation of mindfulness in the companies following the MBSR-programme

A certified MBSR teacher carries out both the two-hour introductory sessions and the workplace-adapted MBSR-programme. The workplace-adapted MBSR-programme is delivered in a live online format with one weekly 1.5-hour session. The workshop is led by an organizational psychologist, a scientific assistant and a certified MBSR teacher and delivered in a live online format.

Intervention Type
Behavioural

Primary outcome(s)
Perceived stress level measured using Cohen's Perceived Stress Scale-10 (PSS-10) at baseline, post-intervention and at 12 months follow-up

Key secondary outcome(s))
Utilizing mixed methods, both quantitative and qualitative methods are used to evaluate the feasibility and impact of the intervention.

Quantitative evaluation:
1. Self-reported symptoms of depression and anxiety measured using Hopkins Symptom Check List-5 (SCL-5) at baseline, post-intervention and at 12 months follow-up
2. Self-reported well-being measured using Short Warwick-Edinburgh Mental Wellbeing Scale (SWEMWBS) at baseline, post-intervention and at 12 months follow-up
3. Self-reported resilience measured using Brief Resilience Scale (BRS) at baseline, post-intervention and at 12 months follow-up
4. Self-reported mindfulness practice measured using questions related to mindfulness practice at post-intervention and 12 months follow-up
5. Self-reported sleep measured using 6 items of the Karolinska Sleep Questionnaire at baseline, post-intervention and at 12 months follow-up
6. Social capital in the workplace measured using a questionnaire developed by the Danish National Institute of Occupational Health at baseline, post-intervention and at 12 months follow-up
7. Negative acts in the workplace measured using Negative Act Questionnaire-short (NAQ-S) at baseline, post-intervention and at 12 months follow-up
8. Self-reported dispositional mindfulness measured using Five Facet Mindfulness Questionnaire-15 (FFMQ-15) at baseline, post-intervention and at 12 months follow-up
9. Organizational conditions relating to the psychological work environment, such as social support and work-life balance, measured using questions from a questionnaire on psychological work environment developed by the Danish National Institute of Occupational Health at baseline, post-intervention and at 12 months follow-up

Qualitative evaluation:
1. Data on participants' knowledge of mindfulness, perceived stress and stress management, organizational conditions for psychological work environment and knowledge of facilitators and barriers to implementation, collected using semi-structured focus group interviews with both employees and managers in each company at baseline and post-intervention
2. Team psychological safety measured using the 7-item scale developed by Amy Edmundson at baseline, post-intervention and at 12 months follow-up

Completion date
01/02/2022

Eligibility

Key inclusion criteria
1. For companies to enroll in this trial, they have to be a small or medium-sized private company (10-250 employees and managers)
2. All employees and managers within the enrolled companies are eligible for inclusion

Participant type(s)
Other

Healthy volunteers allowed
No

Age group
All

Sex
All

Total final enrolment
250

Key exclusion criteria
Companies with more than 250 employees

Date of first enrolment
28/02/2020

Date of final enrolment
04/12/2020

Locations

Countries of recruitment
Denmark

Study participating centre
Aarhus University
Danish Center for Mindfulness
Hack Kampmanns Plads 1-3
4th floor
Aarhus
Denmark
8000

Study participating centre

Southern University of Denmark
Campusvej 55
Odense
Denmark
5230

Sponsor information

Organisation
Aarhus University

ROR
https://ror.org/01aj84f44

Funder(s)

Funder type
Other

Funder Name
The Velliv Association

Results and Publications

Individual participant data (IPD) sharing plan
Anonymized data will be available upon reasonable request from the Principal Investigator, Associate Professor Lise Juul (lise.juul@clin.au.dk). The quantitative data will be available for researchers following the publication of the results of the trial until 01/03/2025. The quantitative data can be used for replication of the analyses performed. Participants provided consent by completing baseline questionnaires, this being the standard protocol in Denmark when performing non-biological research. The qualitative data will not be made freely available but we encourage interested researchers to contact us, should questions arise.

IPD sharing plan summary
Available on request

Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Results article		06/12/2022	16/03/2023	Yes	No
Results article		07/03/2023	16/03/2023	Yes	No
Participant information sheet	Participant information sheet	11/11/2025	11/11/2025	No	Yes

Protocol file	In Danish	01/09/2019	05/09/2022	No	No