

What is the effectiveness of mental health interventions for children with long term physical conditions: a systematic review

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Background

Children and young people (CYP) with long term physical conditions (LTC) and comorbid mental illness may suffer from exacerbated symptoms and reduced responsiveness to treatment. Additionally, aspects of patients' LTC may reduce the effectiveness of existing 'standard' mental health interventions. There is a need to understand the effectiveness of interventions to improve the mental health of CYP with LTCs.

Methods

Searches:

- 13 databases, supplementary searches of relevant reviews, websites, citation lists and grey literature
- We sought RCTs of interventions to improve the mental health of CYP with any LTC, aged 0-25, and symptoms of mental ill health

Extraction and synthesis:

- All study details were extracted, including data for all reported outcomes
- Standardised mean differences (Cohen's d) were calculated for all raw data
- Meta-analysis was performed where intervention, LTC and outcome were similar

Study assessment:

- Study quality and risk of bias was assessed using a modified version of the Cochrane risk of bias tool

Results

Included studies:

- Screening of 17,383 titles and abstracts led to 345 full text records, and eventually to 25 included studies reported across 31 papers
- 11 types of intervention were reported
- CBT was the most common, appearing in 7 studies. Parenting interventions (n=4) and group play therapy (n=3) were the next most frequent
- Cancer and diabetes (n=5) were the most frequently studied LTC.

Synthesis:

- Little opportunity to meta-analyse due to heterogeneity across LTC, intervention category and outcome measure
- CBT most promising, with several large effect sizes ($d=0.81$ to 1.50) reported across studies for improved depression and general mental health.
- There was tentative evidence to suggest that interventions tailored to the needs of CYP were more effective than more generic programmes.

CBT Intervention aims, name, study

Effectiveness

Focused on anxiety and physical symptoms 'TAPS' (Masia Warner et al., 2011)	Improves general MH, but NOT anxiety
Targets anxiety in IBD specifically 'TAPS+IBD' (Reigada et al., 2015)	Improves IBD-specific anxiety
Targets enhanced control in physical illnesses 'PASCET-PI' (Szigethy et al., 2007/2014)	Improves depression, general MH and perceived control
Generic stress management programme with diabetes-specific components 'Best Of Coping' (Srelachius et al., 2014)	Did NOT improve LTC-specific stress or self-efficacy
Specifically targets depression, without LTC specificity 'CBI' (Martinovic et al., 2006)	Improved depression
Targets acceptance of chronic pain, not avoidance 'ACT' (Wicksell 2009)	Reduced fear, did NOT improve coping, depression

Conclusions

- There is a need for large, high quality RCTs with consistency in intervention design and outcome reporting
- Studies should examine the effectiveness of interventions across a range of LTCs
- And investigate how they should be tailored to the recipient's LTCs and needs
- Although the existing evidence base is weak, it suggests there may be promise for CBT that has been adapted to the young person's LTC, as a means of improving the mental health of children and young people with LTCs.