Effect of massage therapy to improve lung function and reduce anxiety among asthmatic children

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Worldwide childhood asthma appears to be increasing in prevalence despite considerable improvement in management and pharmacopeia. Asthma prevalence in children is expected to be twice in 2020. The aim of the study is to assess the effectiveness of massage therapy on lung function and anxiety among asthmatic children, carried out in 2 different tertiary care hospitals with 238 consecutive asthmatic children who are attending the outpatient department. Institutional ethical committee approval was obtained. Children between the age group of 8 – 12 years were diagnosed as asthma within 2 years was included in the study. By using purposive sampling technique, 238 samples were selected and were divided as 120 in study group and 118 in control group. An informed consent was obtained from the parents. Detailed history and the findings were recorded in a predesigned patient proforma. Initially, study group and control group children were assessed for peak expiratory flow rate, forced expiratory volume in one second, forced vital capacity, forced expiratory ratio by Microplus Spirometer. Heart rate and respiratory rate was assessed manually and anxiety level was assessed by using Modified Spence Children Anxiety Scale. The study group children received intervention (Massage) for 20 minutes which includes hot pack application, deep breathing exercises, kneading, thumb stroke, effleurage, friction, raking which performed 20 to 30 minutes during bed time daily for a month. The mothers of asthmatic children were asked to observe the technique of massage therapy. Education film of massage therapy (CD), booklet for massage therapy and massage practice dairy which was developed by researcher was given. Mothers were instructed to do massage to their children for 20 minutes just before the bedtime for a month and they have reinforced to attend the hospital alternate week to share their views and perform massage in front of the investigator. On 15th day and 30th day lung function and anxiety was assessed by using the same tool. The findings showed a highly statistically significant difference between pre-test and post-test lung function scores PEFR (F=380.69) FEV1 (F=578.86) FVC (F=653.12) FER (F=558.43) HR (F=78.61) and RR (679.20) at p=0.001 and negative correlation between anxiety and lung function scores among asthmatic children in study group. To conclude, massage therapy combined with standard treatment is more effective in children with asthma.

Biography

Valliammal Shanmugam has completed her PhD and currently working in College of nursing, NIMHANS- an institute of national importance. She is holding the position of Head of the Nursing Research Department & Subject Teacher in Pediatric Nursing for nursing students. She has published more than 30 papers in reputed journals and serves as an Editorial Board Member & peer reviewer of reputed nursing journals. She has organised more than 40 national & international conferences, workshops, seminars and symposiums. She is a recognised PhD Nursing examiner in reputed universities in the country.

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