primary studies - published, non RCT

Changes in Pulmonary Function and Controlled Ventilation-High Resolution CT of Chest After Antibiotic Therapy in Infants and Young Children with Cystic Fibrosis.

Code: PM25762451 **Year:** 2015 **Date:** 2015 **Author:** Sheikh SI

Study design (if review, criteria of inclusion for studies)

retrospective diagnostic survey

Participants

Infants with cystic fibrosis. The sample included 21 infants, mean age 85.2 ± 47.6 weeks.

Interventions

Infant pulmonary function tests (IPFT) and controlled ventilation-high resolution computed tomography (CV-HRCT) of chest done before and after 2 weeks of IV antibiotics over the last 12 years were compared. CV-HRCTs were compared using the modified Brody scoring system.

Outcome measures

CV-HRCTs were compared using the modified Brody scoring system.

Main results

Mean change in weight was 0.4 ± 0.38 kg (p = 0.001). Significant changes in IPFT included mean % predicted FEV(0.5) (+13.5 %, p = 0.043), mean % FEF(25-75) (+30.2 %, p = 0.008), mean %RV/TLC (-11.2 %, p = 0.008), and mean %FRC/TLC (-4.5 %, p = 0.001). Total Brody scores improved from a median of 10 to 5 (p

Authors' conclusions

IPFT and CV-HRCT can be used as objective measures of improvement in lung disease for infants with CF treated with antibiotics.

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See also

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Keywords

Child; computed tomography; non pharmacological intervention - diagn; diagnostic procedures;