Title: Acrodermatitis enteropathica-like skin eruption in cystic fibrosis patients

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Body: Dermatitis is an uncommon initial presentation of cystic fibrosis (CF). Here we report 3 CF patients diagnosed with severe dermatitis. Case 1: Four-month-old male patient was admitted with diffuse skin eruptions, failure to thrive, edema, hypoalbuminemia and anemia. His sweat test was not diagnostic; but he was suspected to be CF with clinical findings; treated with pancreatic enzyme replacement (PERT), and supportive therapy. His skin lesions resolved within 2 weeks. CF was confirmed with elevated sweat test (96 mEq/L) retested after the resolution of the edema, and mutation analysis that revealed 2183AA-G/-. Case 2: Two-month-old male patient was admitted with diffuse erythematous and pathchy, exfoliated skin eruptions, anemia, hypoalbuminemia, edema, diarrhea, failure to thrive and bronchiolitis history. He was thought to be CF; treated with PERT and skin lesions resolved within 3 weeks. High sweat test and homozygous DeltaF508 mutation confirmed the diagnosis. Case 3: Two-month-old male patient was admitted with scaling erythematous rash, puffy feet, failure to thrive, diarrhea, hypoalbuminemia, and anemia. We could not perform sweat test because of diffuse edema and rash. He was diagnosed as CF with clinical and laboratory findings. Despite supportive therapies, we lost him because of staphilococci sepsis as the skin integrity was impaired. Sequence analysis revealed G576A/R668C compound heterozygous mutation. Acrodermatitis enteropathica-like skin lesions can be seen in CF because of malabsorption and insufficient nutrition that lead to hypoproteinemia, zinc and essential fatty acids deficiencies. In patients with these skin lesions, CF must be kept in mind and sweat test must be repeated after the resolution of edema.