

ABSTRACTS FROM CURRENT LITERATURE

Treatment of primary anetoderma with colchicine. Braun PR, Borradori L, Chavoz P, et al. *J Am Acad Dermatol* 1998;38:1002-1003.

Anetoderma is a localised laxity of skin with herniation or outpouching resulting from weakened elastic tissue. Primary anetoderma is rare and is classified into 2 types- inflammatory (Jadasson Pellizeri) and noninflammatory (Scwhenninger Buzzi). Numerous therapeutic modalities have been tried including intralesional corticosteroids, oral peicillin G, phenytoin, dapsome, vit E, nicotinate and E aminocaproic acid. However most have been unsuccessful or of little benefit. The case report mentioned here is that of a 30year old man with a 5year history of well circumscribed patches that first occurred on the trunk and slowly spread to the extremities. Examination revealed areas of atrophy, sac-like lesions on the chest, lower back and upper part of limbs. Biopsy revealed neutrophilic interstitial infiltrate between collagen fibres in papillary and mid dermis with loss of elastic fibres in papillary and middermis. The patient was given oral colchicine 1mg daily. Within 2 weeks no new inflammatory lesions were appearing and atrophic noninflammatory lesions remained unaffected. After 7 months, treatment was discontinued and the new inflammatory lesions began to reappear. In anetoderma the basic pathology lies in the

damage to elastic fibres. The use of colchicine in anetoderma is attributed to its ability to decrease the neutrophils into an inflamed area, by decreasing the metabolic and phagocytic activities of neutrophils and by reducing the release of proinflammatory enzymes and histamine from mast cells.

Sunil Menon

Juvenile Reiter's syndrome : A report of four cases. Zivony D, Nocton J, Wortmann D, et al. *J Am Acad Dermatol*, 1998; 38: 32-37

The authors describe four cases of Reiter's syndrome in children and review its clinical and laboratory findings.

Case No.1 : A 13-year-old boy presented with two months history of intermittent fever and arthritis of major joints on right side of the body, balanitis circinata and an evanescent macular eruption on the back. There was no h/o diarrhoea or eye problem. Urine microscopy showed 5 WBC/HPF. He was treated with 900mg of aspirin, 4 times daily.

Case No. 2: A 13-year-old boy presented with 2 days history of fever, arthritis of right metatarsophalageal joint and bilateral conjunctivitis. He also gave history of bloody diarrhoea 2 weeks before. Urine microscopy showed 10 WBC/HPF and 5 RBC/HPF. HLA- B27 was positive within several days, he developed oral ulcers and

circinate balanitis. He was given the same treatment, but episodic arthritis continued and two years later he developed keratoderma blennorrhagicum.

Case No.3: A 17-year-old boy presented with diarrhoea of 1 week duration and arthritis of both elbows, knees and wrists. He also had keratoderma blennorrhagicum and an evanescent eruption. There was history of conjunctivitis 5 months back. Urine microscopy showed 5WBC/HPF and he was treated with tolmetin. During the not 4 years, he had recurrent arthritis.

In all patients, ESR and total leukocyte counts were elevated, blood, synovial fluid, stool cultures were negative, Antinuclear factor and rheumatoid factor were negative.

Reiter's syndrome which is preceded by a genitourinary infection is associated with sexually transmitted pathogens, whereas that preceded by gastrointestinal disease is caused by *Yersinia enterocolitica* or *Shigella flexneri*. In young children, this post dysenteric form is seen. This full triad of arthritis, urethritis and conjunctivitis is not usually seen in children. In this study, conjunctivitis was seen in 3 patients and one had keratitis. Urethritis is usually mild in children, meatal inflammation may be the only sign. In this study 3 patients had pyuria. Two of these patients had chronic arthritis, which lasted for several years. Circinate balanitis is usually rare in children and if present, is highly suggestive of Reiter's syndrome. Three out of 4 patients had this lesion. Stool culture may be positive for en-

teric pathogens, if it is obtained soon after the onset of diarrhoea. In this study, specimens were collected several weeks after diarrhoea and hence negative.

Sapna AB

Efficacy of pentoxifylline in the treatment of pruritic papular eruption of HIV- infected persons. Berman B, Flores F, Burka G, et al. *J Am Acad Dermatol* 1998; 38: 955-959

Pruritic papular eruption (PPE) is commonly associated with HIV infections. It is characterised by multiple, chronic pruritic hyperpigmented papule mainly on the lower extremities. The pruritus is severe and unresponsive. In this study, 12 patients with HIV/AIDS and pruritic papular eruptions were treated with pentoxifylline 400mg thrice daily for 8 weeks. All were receiving antiretroviral or protease inhibitory therapy. The study showed that pentoxifylline successfully and significantly reduced pruritus in patients with HIV/AIDS afflicted by PPE. It acts by inhibiting TNF alpha by decreasing m-RNA synthesis. Pentoxifylline also decreases serum fasting triglycerides and HIV replication in patients with AIDS. Previous studies had reported reduction in viral load with pentoxifylline. One patient had become HIV negative. Pentoxifylline inhibits the activation of transcription factor Nf-Kappa B which binds both enhancer region of TNF-alpha gene and long terminal repeat region of HIV genome. Further studies are required to confirm the effectiveness of pentoxifylline in the treatment of PPE in HIV-infected patients.

Anoop UC

Superciliary upswEEP or tented eye brows- A distinct Mendelian trait?-Case Report. Peter Hiltin, Gudule Kirtschig, Luzuis Colli, et al. *J Am Acad Dermatol.*1997; 37:297-299.

Usually the growth of eye brows changes continuously from an upward direction in the nasal part to a horizontal orientation in the temporal part. In the present cases, the mid position of the eye brows showed an upward slant producing the appearance of tented eye brows and were longer than in other parts. Several hereditary variations exist with or without associated anomalies. In the first family this feature of eye brow was inherited over four generations, suggesting an autosomal dominant inheritance. In the other two families the eye brow variations were documented in three members over two generations compatible with an autosomal dominant mode of transmission. In two families the expression of the trait varied in the form of both bilateral and unilateral involvement. No disease or malformations were associated with this eye brow anomaly. The eye brow anomaly observed in the present families constitute a distinct Mendelian trait.

Abubacker

Narrow band UVB (311nm) phototherapy and PUVA photochemotherapy - A combination. Calzavara-Pinton P J. *Am Acad Dermatol* 1998; 38: 687-690

The authors describe a combination

of UVB (wave length 311-2) and both PUVA phototherapy to treat plaque type psoriasis.

Twelve men with plaque type psoriasis, with fairly symmetric distribution, of age group between 20-71 years were selected. The PASI value ranged from 14.4 to 39.5. 8 methoxy psoralen was dissolved in 95% ethanol to produce a 0.5% stock solution. Bath solution was of the concentration 0.0003%. After soaking for 15- 20mts, the body was irradiated using dermalight cubicle, after calculating the minimal erythema dose. Six patients were treated with bath-PUVA on the right side of the body and bath PUVA + UVB (311) on Lt side and vice versa for the remaining 6 patients. Patients were treated 4 times a week with an intermission on Wednesday. Once weekly increments were made by 20-30%. The time of complete clearing, that is, reduction of PAS I by 95% or a delivery of 20 treatments were considered as end point.

Complete clearing was observed first on the side treated with bath PUVA-311 in 8 patients and on both sides in 3 patients.

This study shows a synergistic effect of the therapeutic activities of bath PUVA and UVB - 311 in psoriasis. The mechanism of action is photodamage of the immunocompetent cells which have the immunomodulatory action. Short term follow up of this study does not allow assessment of long term side effects like carcinogenesis.

Sapna B

Successful monotherapy of severe and intractable atopic dermatitis by photopheresis. Richter HI, Grewe M, Stige H, et al. *J Am Acad Dermatol* 1998; 38: 585-588.

Patients with chronic atopic dermatitis can become unresponsive to standard immunosuppressive therapy and thus pose a serious therapeutic problem. The authors proposed to evaluate the therapeutic efficacy of photopheresis used as monotherapy in the management of 3 patients with severe and intractable atopic dermatitis who previously did not respond to other modalities of treatment including glucocorticoids, cyclosporine, phototherapy or photochemotherapy. The patients were given 8-methoxy psoralen in a dose of 0.6 mg /Kg/body wt 2 hours before photopheresis. Blood was drawn from a peripheral vein 25-50 ml/ml and separated by centrifugation into leucocytes, plasma and erythrocytes. The erythrocytes were immediately reinfused, while the total buffy coat sample in solution was exposed in an extracorporeal system for 90 minutes to UVA radiation (24 J/cm²) and was then reinfused into the patient. This was repeated on two consecutive days for ten cycles at 2 weeks interval. However, in one patient, time intervals between consecutive treatments were extended from 2 to 4 weeks after the sixth cycle which resulted in a rapid increase of the clinical score as well as serum eosinophil cationic protein (ECP) and IgE levels. When the treatment free intervals were again reduced to 2 weeks, the patient showed improvement. The clinical severity, serum ECP level and serum IgE levels were assessed before and after each

photopheresis cycle by the scoring system developed by Costa et al, ie based on 10 severity criteria, scored from 0 to 6 which included erythema, oedema, vesiculation, exudation, crusting, excoriation, scales, lichenification, pruritus and loss of sleep. For the topographical scores each of the following areas was scored from 0 to 3 according to the extent of the involvement; face, neck, anterior and posterior aspects of the trunk, buttocks, arms, hands, legs, knees and feet. Patients were assessed by the same observer and by a confirmatory second observer before the first and after each subsequent treatment. Photopheresis led to a decrease in severity score from 38-40 to 6-10, topographical score from 8-15 to 2, total clinical score from 48-53 to 8-12. All patients showed a significant decrease in serum ECP and IgE levels. After termination of photopheresis after 10 cycles, two patients stayed in complete remission for 8 and 12 months, respectively. In the third patient, cessation of photopheresis was associated with a rapid loss of the beneficial effects. However, compared with other photo (chemo) therapeutic modalities, the logistic requirements for photopheresis are high, and it is a time-consuming procedure. The use of photopheresis should therefore be limited to patients in whom other immunosuppressive treatments have failed.

Deepa B

Idiopathic plantar hidradenitis - 4 case reports. Bartolo E, Anes I, Capitao-Mor M, et al, *J Eur Acad Dermatol Venereol* 1998; 10: 257-261.

Idiopathic plantar hidradenitis is a

form of neutrophilic eccrine hidradenitis (NEH) first described by Stahr et al in 1994.

The disease primarily affects healthy children and presents as tender erythematous or violaceous papules or nodules localised almost exclusively to the plantar surface and present characteristic histologic features.

Four males between ten and twenty years of age presented with tender erythematous to violaceous papules and nodules over the soles, purpuric in two and associated with erythema and edema of the feet in one, of a few days duration. There was no preceding fever, trauma, drug ingestion, topical application (except one who was in aminophylline and salbutamol for bronchial asthma). Routine lab studies were all normal. Biopsy was performed from the nodule and all four were treated with oral ibuprofen and topical hydrocortisone with total resolution of the lesions within 1-2 weeks. Histological features were very similar in the four. Dense neutrophilic infiltrate penetrating the wall of the eccrine ducts, necrosis and vacuolisation of eccrine coil cells. No organisms were seen in

PAS or Gram stains. These features differ from the histological picture of neutrophilic eccrine hidradenitis only in the absence of syringosquamous metaplasia.

Neutrophilic eccrine hidradenitis (NEH) was first described by Harris et al in a patient with acute myeloid leukemia and has been reported with other malignancies and under chemotherapy. Association with *Serratia* and *Enterobacteriaceae* has been described and Smith et al in 1990 reported two cases of NEH in patients with HIV infection, both under treatment with Zidovudine. Although histological features are similar, clinical features of idiopathic plantar hidradenitis differ from neutrophilic eccrine hidradenitis.

Pathogenesis is not very clear. Two mechanisms have been proposed. One due to a direct toxic effect on the eccrine gland - explains cases under chemotherapy and two - a hypersensitivity reaction of unknown etiology - a more acceptable possibility in the case of idiopathic hidradenitis.

C Lakshmi