KAZUISTIKY

In most paediatric patients we are able to achieve control over common dermatological diseases using local therapy. Dermatology is the only branch that systematically uses the effects of drugs applied externally to the skin. Outer (external, topical, local) therapy enables the application and effects of drugs directly to the affected sites in the necessary concentrations. Of course, a prerequisite of successful dermatological therapy is a correct diagnosis. In addition, paediatric patients have certain specific characteristics, which must be considered in local therapy to avoid injuring the child. The principles of safe local therapy are based on the knowledge of both the anatomical and functional differences of the skin in infants and children and the pharmacodynamics of single medicines. Ichthammol and zinc oxide belong among the topical dermatological drugs commonly used in children (due to their safety in long-term administration).

Ichthamolum (ichthammol, ichthyol) is a mixture of substances obtained by sulphonation of bituminous oils; it was conventionally produced by the distillation of fossil shale. It has anti-pruriginous, anti-inflammatory, keratoplastic, anti-seborrhoeic, and weak anti-septic effects. It has weak irritant effects, a low sensitization potential and desensitises the skin to light but has an unpleasant characteristic odour and brown-black colour. We prescribe it in the form of a soft paste, liquid powder or zinc oil. Ichthammol should be used in the treatment of subacute forms of eczema (especially atopic), seborrhoeic and perioral dermatitis, acute attacks of psoriasis, lichen ruber planus, pityriasis rosea and acne vulgaris. Some therapeutic and over-the-counter dermato-cosmetic products contain light or white ichthammol (ichthammol pale), which has the same therapeutic properties and is therefore much more comfortable for the patients. Ichthammol has a similar favourable therapeutic effect to pix lithantracis (coal tar) but does not possess its undesirable effects (toxic effects on the liver and kidney, local cancerogenity in long-term use in higher concentrations).
Zincum oxydatum (zinc oxide, zinc flower) is an amorphous, fine white powder without odour. It is produced from a natural material called zincite. It has cooling, weak astringent and mild antiseptic effects. Zinc oxide is a constituent of powders, suspensions, liquid powders and soft pastes, which are prescribed most often in paediatric dermatology. Zinc pastes have a favourable effect on healing.

Therefore, on a proposal from paediatric dermatologists pharmacologists have prepared a soft paste called Vitella Ictamo / Ictamo Pro which is available without a medical prescription at chemists’ and contains the two basic active substances stated above. We use it mostly for the long-term therapy of infants and small children with atopic and seborrhoeic dermatitis, intertriginous, irritative and nappy dermatitis. In a number of paediatric patients, Vitella Ictamo / Ictamo Pro is also suitable in the acute eruptive stage of paediatric psoriasis, pityriasis rosea Gibert and in some forms of exanthemata in children (mostly in APEC). We cannot do without this zinc oxide soft paste even in the long-term treatment of children with perioral dermatitis. It is always necessary to inform the parents of children with a skin disease that the first results of therapy are visible after 2 to 6 weeks. Treatment must be not only long-term but also regular; the parents apply the paste in a very thin layer as per the doctor's recommendation once or twice daily on the entire affected area of the skin. Mild desiccation of the treated areas is involved in the therapeutic effect. Therefore, we mostly combine treatment (especially in atopic dermatitis) with regular therapy using emollients. The examples of suitable usage of Vitella Ictamo / Ictamo Pro are documented by the following two casuistries.

Case 1

Petr H. was born to young non-related parents of the first, uncomplicated pregnancy in the 40th week of pregnancy with a birth body weight of 4,050 g and length of 51 cm. His post-delivery adaptation was good and without infantile jaundice. He was fully breast fed and his development was good with regular body weight increments. In the first three weeks of his life small, yellow-brown scales appeared on the pale-pink base of his scalp in the frontal and parietal areas and covered extensive areas of the skin. In addition, in his 4th week of life a fissured, yellow-grey firmly adherent deposit of greasy scales developed above the major fontanel through which his hair grew. These changes in the scalp are generally called cradle cap and are symptoms of seborrhoeic dermatitis. The dermatitis spread in two weeks from the scalp to eyebrows and the middle portion of the face where sharply delimited light red deposits with soft pityriasiform desquamation developed. The disease also affected the intertriginous localization (mainly the nappy and inguinal area, the area around the navel, armpits, cervical sulcus and retroauricular areas) where infiltrated but not madescent erythematosquamous deposits appeared. Despite this serious clinical finding of the skin the little boy had no alteration of his general condition, he did not scratch himself and he slept and ate well. We managed to soothe the dermatitis within three weeks by means of a combination of lubricating the body and limbs with synderman with a cooling effect and applying a thin layer of Imazol cream paste on all intertriginous locations. During regular care of the skin on the hairy part of the scalp using sunflower oil the deposits of scales in this area separated. However, in his fourth month of life, a flare-up of very acute infiltrative dermatitis appeared without an apparent triggering stimulus. It was located in the fuzzy delimited extensive areas on both buttocks and in the broad areas under the knees and subsequently included the eruption of small, itchy deposits on his thighs and calves (Fig. 1).
Between the 3rd and 6th months of life a transition to atopic dermatitis appears in 1/3 of infants with more severe forms of seborrhoeic dermatitis. This was the case with our small patient in whom a positive family history (both his parents have allergic hay fever and his mother used had symptoms of atopic dermatitis during her first three years of life) played a role. The previously established local therapy, which was restarted immediately by the parents had no expected effect and the boy was restless, scratched himself intensively and did not sleep at night. Therefore, we adjusted the therapy with regard to the new diagnosis during the check-up at our department. The parents did not agree with short-term initial therapy using a weaker local corticosteroid and therefore only classical dermatological therapy consisting of a combination of emollients containing vitamins and soft zinc oxide ichthammol paste was introduced.

The parents treated the whole buttocks and lower limbs with Vitella vitamin liniment twice daily and added a thin, uninterrupted layer of Vitella Ictamo / Ictamo Pro after absorption of the liniment (after approximately 10 minutes) on the reddish deposits only. After two months of therapy complete healing of the deposits was achieved (Fig. 2) and, of course, the standard regimen measures for an atopic child were added, such as: using only cotton clothing, prevention of sweating, bathing only three times a week without using soap, diet of a breastfeeding mother avoiding the most common food allergens.

Case 2

Zuzana Č. was born in the 41st week from a second, risky pregnancy with a body weight of 3,250 g and body length of 49 cm. The post-delivery adaptation was good and the little girl did well. She was breast fed only for 6 weeks but she tolerated soft, milky food well and later, meat/vegetable supplementary food. She was vaccinated as planned based on the vaccination schedule. She was ill only rarely and had only the common upper respiratory tract infections including a case of otitis once. Kindergarten was tolerated well. No skin or allergic diseases were found in the family history and Zuzanka has never had any symptoms of atopic eczema or skin or allergic reactions. Her mother took her to our department when she was 4 years old. She had classical symptoms of quite serious perioral dermatitis around her mouth (Fig. 3). According to her mother, the disease had appeared nine months ago when a common rash around the nasal opening occurred when she had a cold. Initially, the skin symptoms were treated with Framykoin but as her condition grew worse she was prescribed Fucidine H cream, Elidel cream, Pevaryl cream and Elocom cream by various doctors. Papulous exanthema initially spread into the nasolabial and nasofacial folds and then gradually around the mouth to the upper and lower lips where fusion into an extensive pathological reddish area occurred. Perioral dermatitis is a chronic recurrent inflammatory skin disease located periorally, in the nasolabial folds...
and in the periorbicular area in children. Although this disease affects mostly women between the ages of 20 and 30 we can also see this persistent disease in small children. The ethiopathogenesis of this disease is not fully clarified. The appearance of the skin symptoms is often explained by a reduction of skin immunity and changes of the skin microflora during therapy with topical corticosteroids. The uncontrolled application of more potent halogenated corticosteroids on the skin of the face precedes perioral dermatitis in most paediatric cases.

The treatment of perioral dermatitis is extremely slow. Any therapy currently used must be discontinued (especially topical corticosteroids of any type) and common cosmetics (lubricating creams, purified water, soaps) as well. We recommend non-foaming toothpaste without fluoride and we warn against touching the affected areas. It is necessary to reduce all irritating influences: the child should not stay in a dusty environment during cleaning, must not go to a swimming pool, staying outside in windy or hot weather is not suitable, as is sun-bathing. All this information was provided to the mother during the first visit and she applied these instructions immediately.

In the first week of therapy, Zuzka could use only a dry dressing containing a cool Jarisch solution used for washing her face as well. In the second week of therapy her mother used only special mineral water to wash her face and she treated the reddish places in the evening before bedtime using the thinnest layer of zinc oxide ichthammol paste, Vitella Ictamo / Ictamo Pro. Initially, the skin should not be greased and we should let it dry. From the fourth week of therapy when the first signs of improvement appeared we added home-made rendered lard to the anti-inflammatory paste, which was applied to the extremely dry areas on the face. After three months of strict regime measures and very careful topical therapy a marked paling of the affected areas with apparent residua of single papules occurred only around the corners of the mouth (Fig. 4). After six months the perioral dermatitis was healed completely but when she goes swimming in a pool, experiences illness or if her skin comes into contact with toothpaste the single papulous efflorescences appear rarely around her mouth again (Fig. 5). They can be healed well after regular application of Vitella Ictamo / Ictamo Pro just on single papules.

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