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Medicine

CHILD PARASITISM AND ALLERGIC SKIN DISORDERS

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ABSTRACT:
PARASITOSES ARE EXTREMELY COMMON CONDITIONS IN PEDIATRICS. IT IS ESTIMATED THAT OVER 80% OF CHILDREN HAVE AN EPISODE OF GIARDIAS (FOR EXAMPLE) DURING THEIR LIFETIME. THERE ARE ALSO PARASITIC ENDEMIC EVOLUTIONS, SUCH AS ASCARIASIS IN THE HILLY AREA OF MEHEDINTI.
SKIN ERUPTIONS, THE PRESENCE OF URTICARIAL PHENOMENA ARE A REALITY IN THE CASE OF PEDIATRIC PARASITOSES, MOST PARASITOSES ALSO ACTING THROUGH THE TOXIC-ALLERGIC MECHANISM, THROUGH MOLECULAR MIMICRY WITH THE PROTEINS OF THE ORGANISM.
MANY RELAPSING SKIN CONDITIONS SHOULD RAISE SUSPICIONS ABOUT CONCOMITANT PARASITOSIS TO BREAK THE VICIOUS CIRCLE.

KEYWORDS: PARASITOSIS, ALLERGIC DISEASE, PEDIATRICS.

Age of childhood is extremely vulnerable to infection or infestation. Mechanisms are obviously diverse (virulence of germs, low immunity, collectivity, non-compliance with hygiene rules, avoidance of vaccination, etc.). In addition, the little child has an Oedipus complex, the mouth is the main tool that connects him to the mother and the environment. The child "tastes" the world around, this being the main path of parasitic infestation. All parasitoses occur in children in proportions 8-10 times higher than in adults. In some cases, for example, visceral larva migrans produced by Ancylostoma larva, the only clinical manifestation that draws attention is the existence of a linear, serpiginous cutaneous cord with a width of 1-2 mm

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that extends a few centimeters a day and has a vesicle at the end. The tract is intense, the larva can be isolated from the vesicle, and the distribution is at the level of the hands, trunk, buttocks. Diagnosis can be difficult, due to poor clinical interpretation and confusion with other conditions (eg dermatitis, prurigo strophulus, eczema etc.). Infestation with Ancylostoma or Taenia is rare in pediatric pathology.

In order, the most common parasitoses are lambliasis, oxyuriasis, toxocariasis, trichinellosis. Trichinella spiralis certainly has a direct anamnestic connection with the consumption of wild boar or pig, incorrectly prepared thermally and infested with larvae of Trichinella spiralis viviparous. Clinical manifestations occur approximately 2 weeks after ingestion: nausea, diarrhea, colic abdominal pain, then systemic signs (facial edema, periorbital, myalgia, persistent fever, subconjunctival haemorrhage, photophobia, eye pain). Invasion of striated muscles results in polymyositis, including myocarditis. Invasion of the diaphragm causes severe respiratory distress. CNS involvement causes encephalitis, convulsions.

Increased eosinophilia is a feature of the disease.

Positive diagnosis is determined by serology (> 1 month from infestation) and biopsy.

Toxocariasis - visceral larva migrans is caused by the dog's ascaride (canis) or cat (catii).

Ascaris remain in a biological "deadlock" in certain organs and act through a toxic-allergic mechanism and mechanical obstruction.

Appear: fever, asthenia, loss of appetite, vomiting, diarrhea, hepatomegaly, pruritic rashes, quincke edema; brain location causes convulsions, coma, paresis or paralysis. Eye location causes endophthalmia.

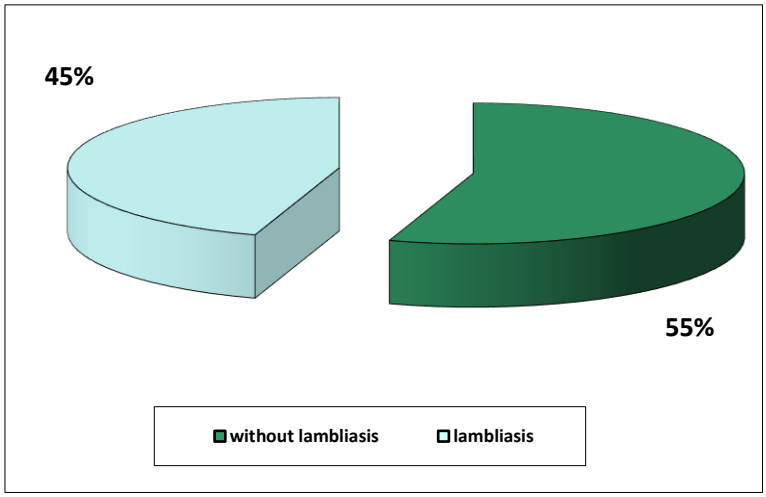
The diagnosis is supported anamnestic by close contact with non-parasite animals in children who are geophagi. In laboratory tests, leukocytosis, hepatomegaly, eosinophilia and hypergammaglobulinaemia, as well as toxin-positive antibodies, will determine the diagnosis.

Lambliasis is the most common parasitosis of the toddler (1-3 years old). In the Oltenia area it is estimated that about 75% of young children have at least one episode of Lambliasis.

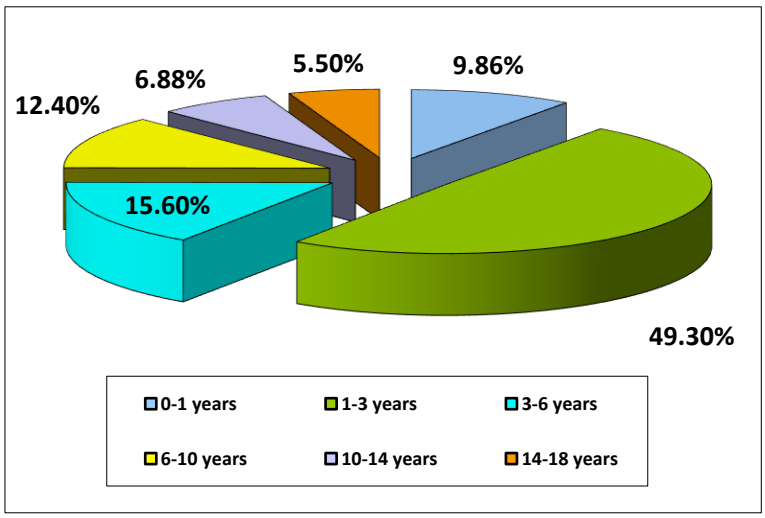
Protozoa contaminates water, which is the main cause of infection. Children are contaminated through fecal-oral route. Clinically, diarrhea sometimes occurs, chronic, cramping, flatulence, headache, nausea and vomiting, to SDA. Skin ulceration occurs in approximately 30% of children with polymorphic appearance and is due to a form of molecular mimicry between the parasite proteins and their own.

Determination of etiology is based on the presence of the parasite in the stool (cyst or trophosoid, determines specific antibodies), duodenal aspiration, endoscopy with biopsy.

A 12-month study of 968 children aged 0-15 years showed the presence of lambliasis in 436 children (45%).

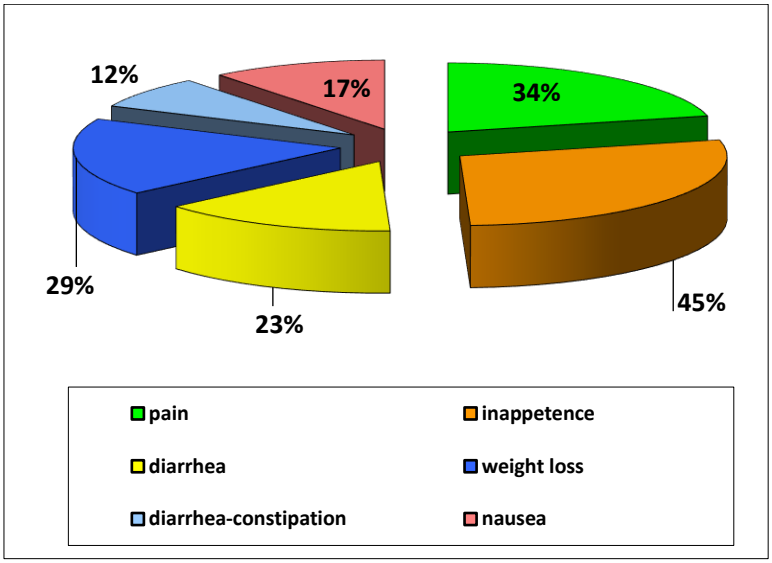


The age distribution was: 0-1 year, 43 (9.86%), 215, 1-3 years (49.3%), 3-6 years, 68 (15.6%), 6-10 years, 54 cases (12.4%), 10-14 years, 30 cases (6.88%) and 14-18 years, 24 cases (5.5%).



In most children over the age of 6, the discovery of the disorder was haphazard. Infants were symptomatic of digestive disorders and at 1-3 years of age they inappetence, diarrhea, weight loss, between 3-6 years of digestive manifestations were slightly attenuated, a quasi-symptomatic symptom was abdominal pain with periumbilical localization.

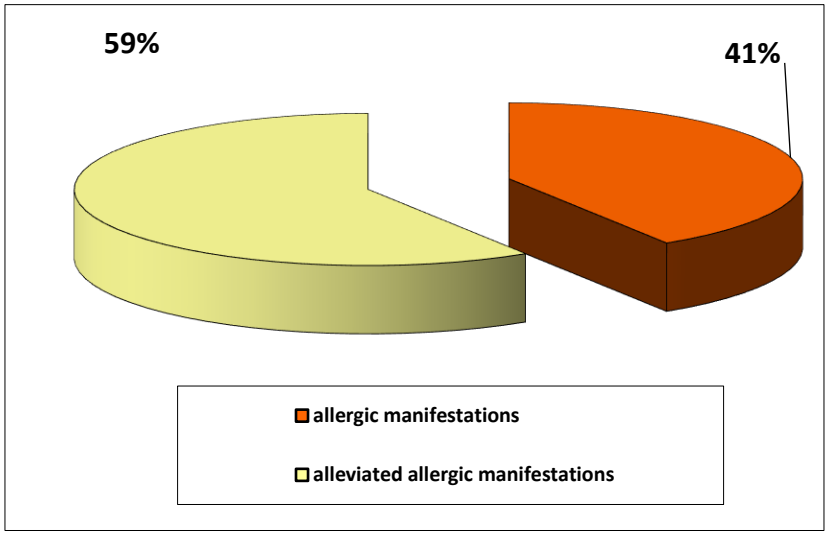
Digestive symptoms showed a certain importance: pain (34%), inappetence (45%), diarrhea (23%), weight loss (29%), the alternation diarrhea-constipation (12%), nausea (17%).



Allergic cutaneous manifestations appear to be more common than initially thought.

For the group of 215 children between 1 and 3 years of giardiasis infestation, retrospective, anamnestic, there were recurrent episodes of prurigo and prolonged to 71 cases (33%). These skin manifestations include various aspects: atopic dermatitis, allergic prurigo, eczema, without the tendency of self-limiting, healing or disparition.

Only anti-parasitic treatment, complete and correct, led to the remission of skin allergic manifestations in 59% of cases - 42 patients.



Ascaris develops endemic in certain areas. Ascaris infestation is common in the hilly area of Oltenia.

Clinical manifestations depend on the parasite cycle, mechanical or toxic-allergic effects.

Clinically appears fever, coughing, wheezing (Löffler's syndrome at the parasite's lung passage, colic abdominal pain, inappetence, weight loss, or occlusion by parasites).

There is also mechanical jaundice, appendicitis, pancreatitis. The correct diagnosis is determined by the examining a stool sample for parasites and ova, the presence of sputum larvae, echography, hypereosinophilia, colangiopancreatography.

Oxyuriasis is another common parasitoses in pediatrics. Anal prurit is the sign that immediately attracts attention, possibly vaginal to little girls. It also appears: insomnia, abdominal pain, decrease in attention and concentration. Diagnosis is performed by a special test – scratch test or anal fingerprint, taking the eggs from the perianal area onto an adhesive paper and examining them microscopically.

CONCLUSION

- parasitoses are common conditions in childhood, much more common than in adults.
- lambliasis, oxyuriasis, ascaris or visceral larva migrans must be considered by any pediatrician.
- atenuated, intricate, nonspecific symptomatology obliges the diagnosis to be suspected, which must be confirmed by laboratory tests, imaging, biopsies etc.
- any pruritic, eczematic, chronic skin condition obliges clinic-biological assessment to detect a parasitoses, 33% of the children of the group studied with giardiasis have experienced various rashes.
- deficient hygiene leads to endemic developments for child parasites
- because of the repercussions on somatic growth and development and due to neuropsychic influences, correct detection and treatment is a necessity.
- there is no post-healing immunity, infection is frequent due to favorable conditions (geophagia, lack of hygiene) and the disease is manifested again plenary.
- implementing hygiene courses in schools or kindergartens would reduce the incidence and prevalence of parasitic diseases.

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