

THE CLINICAL FAILURES AND TREATMENT OF CHRONIC SINUSITIS IN CHILDREN

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The intranasal pictures of 506 children aged one to 14 years, with chronic sinusitis, were studied. The principal findings were edematous swelling of the nasal particularly turbinate structures, hypertrophy of the middle nasal concha, ethmoturbinal hyperplasy and edematous swelling, hypertrophy, atrophy (mild) of the inferior nasal concha and also an occasional polyp. These findings tend to increase appreciably after the age of 13 years or thereabouts. Nasal polyps are found very infrequently at and below the age of 12 years. The incidence of nasal polyps was only 8 in the entire group of 506 children. The histologic picture in the polyps found was typical allergic edema, often without increased mucus. The histologic picture of the sinal mucous membrane while showing higher degrees of changes in some of the cases was usually that of allergic edema in and below the age of 12 years. Histologic changes consisting of bacterial leucocytic response in addition to the allergic edema without epithelial fibrosis increase in and over the age of 13 years.

Table 1. Diagnostic Paspal Test

No.	Before Treatment (cm ²)	After Treatment
1	6.1	4.1
2	5.3	3.4
3	4.3	4.2
4	4.5	2.3
5	10.7	5.3
6	7.1	5.3
7	0.5	—
8	6.6	3.7
9	17.6	1.7
10	6.8	4.7
Average	6.95	3.47

Table 2. Symptoms and Effect of Treatment (10 Cases)

No.	Age	Sex	Untreated Period (years)	Symptoms			Effect
				Nasal Discharge	Postnasal Dropping	Others	
1	12	♂	2		+	Nasal Obstruction	++
2	12	♂	1	+	+	Nasal Obstruction	++
3	11	♂	1	+			++
4	8	♂	1	+		Nasal Obstruction	++
5	10	♂	2	+		Nasal Obstruction	++
6	7	♀	3	+		(Mild Headache Stertor	++
7	12	+	1	+			++
8	13	♀	6	+	+	Mild Headache	+
9	6	♀	2	+			++
10	13	♀	3	+	+	Nasal Obstruction	+

Therefore, the symptoms of chronic sinusitis may be considered relatively mild and the pathologic changes usually reversible in and below the age of 12 years. For the treatment of chronic sinusitis in children with the symptoms and signs mentioned above, our department makes it a rule, to which there are few exceptions, to resort to medical treatment. We proceed to surgery only if and when the disease has not responded to medical therapy and when the pathologic condition is judged to have become "irreversible". We believe that adequate medical management centers around Paspaspat therapy. This is one of the most simple non-specific hyposensitization technics clinically available.

Patients whose diagnostic Paspaspat test is positive are treated in accordance with the following guide-line:

1. The intracutaneous test after Paspaspat therapy (10 dosis for each course) should show a diminished flare and wheal;
2. Intracutaneous and precipitin tests against various antigens should usually show negative conversion following the use of Paspaspat;
3. There should be a decrease in symptoms.

Positive reactions to the Paspaspat intracutaneous test were found in 74 percent of 38 children below the age of 10 years and results were secured in 82 percent of the positive reactors. Though late results remain yet to be found out, the effective rate of symptomatic relief mentioned above may be deemed significant. Paspaspat therapy, therefore, seems to be a recommendable intelligent and adequate medical treatment for "chronic sinusitis" in children.

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