

Bell's Palsy

There is a paucity of information about the magnitude and prognostic features of Bell's palsy in children. Patients with Bell's palsy, below 14 years of age, attending the Kasturba Hospital, Sewagram during 1985 to 1990 were studied. There were 16 cases of Bell's palsy. The incidence rate was $7.3 \pm 1.4/100,000$ children attending the hospital per year (range: 5.8-9.3). The incidence was slightly higher among boys ($7.6 \pm 2.5/100,000$) than girls ($6.8 \pm 1.2/100,000$). All the cases had deviation of the angle of mouth, inability to close eyes, dribbling of saliva and inability to blow cheeks. Four patients each had decreased lacrimation, sensory disturbances and fever; two each had impaired taste sensation and phonophobia. Severity of facial paralysis was graded in all cases(1). Seven patients presented with complete paralysis (grade VI), five with grade V, three with grade IV and one with grade III. The severity of paralysis did not show significant correlation with the duration -of recovery period ($r = 0.3$).

Several signs and symptoms have been reported to be associated with poor prognosis in Bell's palsy including decreased tearing(2), complete paralysis, decreased salivary flow(3), pain, hyperacusis and older age at onset(4). Prognostic features in children are less often reported. Of our patients, 4 had decreased lacrimation, and 7 had complete paralysis at presentation. All these except one girl with decreased lacrimation and partial paralysis recovered completely. Decreased lacrimation and

complete paralysis were not associated with an unsatisfactory prognosis in our patients.

The outcome of Bell's palsy in children has been reported to be good with recovery rates ranging from 75%(1) to 93.8%(4). In the present study, 93.8% children recovered completely within 16 weeks of the onset of the disease without any residual disfigurement or disability. All these cases received conservative management with steroids, neurotonics and vasodilators.

Bell's palsy has been reported to be associated with viral infections like varicella zoster(5) and in isolated cases with chicken-pox. In the present study there were four cases of Bell's palsy with history of exposure to cold, one case each suffering from measles, chicken-pox and sickle-cell trait. Berg *et al.*(5), however, observed no serological evidence of measles infection in children with Bell's palsy. The role of sickle-cell trait in Bell's palsy needs further evaluation. Further studies are needed to identify the predisposing and prognostic indicators of Bell's palsy in children.

**Arunabha Chakravarti,
M. Meghachandra Singh,
V.N. Chaturvedi,
P. Chaturvedi,**

*Departments of Otorhinolaryngology,
Community Medicine and Pediatrics.
Mahatma Gandhi Institute of Medical
Sciences, Sewagram, Wardha 442:102.*

REFERENCES

1. House JW, Brackmann DE. Facial nerve grading system. *Arch Otolaryngol Head Neck Surg* 1985, 93: 146-147.

2. Adour KK, Byle FM, Hilsinger RL, Kahn ZM, Sheldon MI. The true nature of Bell's palsy: analysis of 1000 consecutive patients. *Laryngoscope* 1978, 88:787-801.
 3. May M, Klein SR, Taylor FH. Idiopathic (Bell's) facial palsy: natural history de steroid or surgical treatment. *Laryngoscope* 1985, 95: 406-409.
 4. Hauser WA, Karnes WE, Annis J, Kurland LT. Incidence and prognosis of Bell's palsy in the population of Rochester, Minnesota. *Mayo Clin Proc* 1971, 46: 258-264.
 5. Berg R, Forgren M, Schiratzki H. Acute facial palsy: some clinical and observations. *Acta Otolaryngol* 1976, 81: 462-467.
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