DOTS in Pediatric Patients

In the September issue of Indian Pediatric there were three different and interesting articles on practicing DOTS in pediatric patients. Although these articles tried to cover whole range of issues *i.e.*, diagnosis, categorization and treatment, yet there are certain issues that remain unclear and require further analysis.

1. Suggestion of adding fourth category for pediatric patients needs further research, as there is not any specific indicator or added benefit of using second line of drug in pediatric patients. If we consider irregular treatment as the base for development of drug resistance with first line drugs then the chances of a pediatric patient to develop drug resistance to first line of drug is much less than an adult patients. Instances have shown that even those adult patient with history of much more irregular treatment schedule or history of relapses after full course show improvement and cure under DOTS.
2. The second suggestion given in report for changing the regimen to second line drugs in case 'the patient did not improve or deteriorated with 5 drugs in 2 months' looks like a premature decision of shifting the patients. A point mentioned in the study(1) to recategorize new patients as treatment failure just after 3 months of intensive treatment is also not justifiable. The indication of 'good compliance' is not rational as the drugs were dispensed for a period of one month for home and how could a doctor be sure about good and bad compliance (rely on personal understanding?)
3. This study has advocated increasing the duration of TB treatment in some specific patients, but research(2) show that if the treatment is followed without fail under DOTS then there is no added advantage of increasing duration of all or one or other drugs.
4. The same study has also emphasized the necessity of adding preventive treatment for pediatric patient under present DOTS schedule, but ignored the fact that the treatment of latent tuberculosis is well within the RNTCP guidelines (based on researches in TOMAN). Under DOTS all children below six years who are in direct contact of any sputum positive case have to be put on six-month daily dose of Isonex as 5 mg per kg of body weight.

Based on these issues it is required that for diagnosis of pediatric TB the earlier proven scoring system could be used (or any new tools), but as per the treatment practices concerned all these patients could easily be categorized in 3 standard (WHO suggested) categories as given in the paper. However, for fourth category they could be treated under Cat II with 5 drugs successfully and DOTS should be followed in all such cases for definite cure.

Vandana Joshi,
CARE-India,
Madhya Pradesh, India.
E-mail: vdjoshi@satyam.net.in

REFERENCES

1. Kabra SK, Lodha R, Seth V. Category based treatment of tuberculosis in children. Indian Pediatr 2004; 41: 927-937.
2. Frieden T (ed). Toman's Tuberculosis: Case Detection, Treatment and Monitoring (2nd edn): Geneva: World Health Organization; 2004.

Reply

Our response to comments by Dr. Joshi are as follows:

1. Need for Category 4: We agree that with DOTS, resistant TB can be decreased