7. Prevention

A small child does not typically have proper control of his/her urinary sphincter and bladder; his/her voids are involuntary, and lead to incomplete voiding. With toilet training, the child also learns to empty the bladder completely.

Most children develop normal urinary functioning and continence irrespective of the timing and type of toilet training undertaken. However, if delayed or if inappropriate, incomplete voiding is prolonged and this abnormal functional behavior can persist and predispose to urinary tract infections, dysfunctional voiding, and overactive bladder **[IIc]**.

A Belgian study interviewed 321 parents of different generations that had trained 812 children over the last 60 years and a major change in toilet training was observed. The group of parents aged 60 and older in 2000 achieved daytime continence in their children prior to 1 year of age in 21% of cases, as opposed to the more recent generation (between 20 and 40 years of age) that only attained it in 3% at this age. The generational differences were the earlier start in toilet training (before 18 months) in the older parents. How continence was taught, the use of the toilet, a more disperse stimulus intensity due to the use of several methods at the same time, and insisting that the child try if he/she did not urinate on the first attempt were more frequent in the younger generations. It is likely that having both parents working and the convenience of the washing machine and disposable nappies have motivated this evolution[1] [IIc].

The same authors interviewed 140 children (73 with overactive bladder or dysfunctional voiding and 67 asymptomatic children) and found that the late start in toilet training, insisting if the child did not urinate at the first failed attempt, urging the child to strain, and punishment for accidental loss of urine were attitudes associated with the group with micturition problems[39] [IIb]. In another cross-sectional study in which 5646 questionnaires were sent out and 4332 responses received (77%), the association between recurrent urinary tract infections and different factors was analyzed. Recurrent urinary tract infections

were seen to be associated with a late start in urinary continence training and with a method that kept the child seated in an attempt to urinate for longer or straining to do so[40] [IIc].

The following attitudes have been shown to be beneficial in achieving daytime urinary continence at an earlier age and avoiding dysfunctional voiding. Although it is not known if they will also bring about the onset of nocturnal urinary continence, it is recommended **[C]**:

- Start toilet training before the age of 18 months, perhaps when the child is able to wake up dry from his/her nap.
- Use of a pot or potty chair that properly supports his/her thighs and feet.
- Suggest to the child that they should urinate when you see or imagine that they feel the urge, so that they can do so on the first try. Do not keep the child seated on the pot until he/she urinates and do not insist that they strain if the first attempt fails.
- Be persistent in this training, because the objective can be achieved in less than three months. Do not dilute the effort by continually changing the technique.