



## The Incidence of Neonatal Cryptorchidism in Sfax, Tunisia

**\*Zitouni HAYET<sup>1</sup>, Jallouli MOHAMED<sup>1,3</sup>, Ben DHAOU MAHDI<sup>1</sup>, Kotti AHMED<sup>1</sup>,  
Ben THABET AFEF<sup>2</sup>, Gargouri ABDELLATIF<sup>2</sup>, Mhiri RIADH<sup>1,3</sup>**

1. Dept. of Pediatric Surgery, HediChaker University Hospital, University of Sfax, Sfax, Tunisia
2. Neonatal Intensive Care Unit, Hedichaker University Hospital. University of Sfax, Sfax, Tunisia
3. Research Unit (99/UR/08-60) "Anatomy, Histology and Embryology", University of Sfax, Sfax, Tunisia

**\*Corresponding Author:** Email: hayetzitouni83@yahoo.fr

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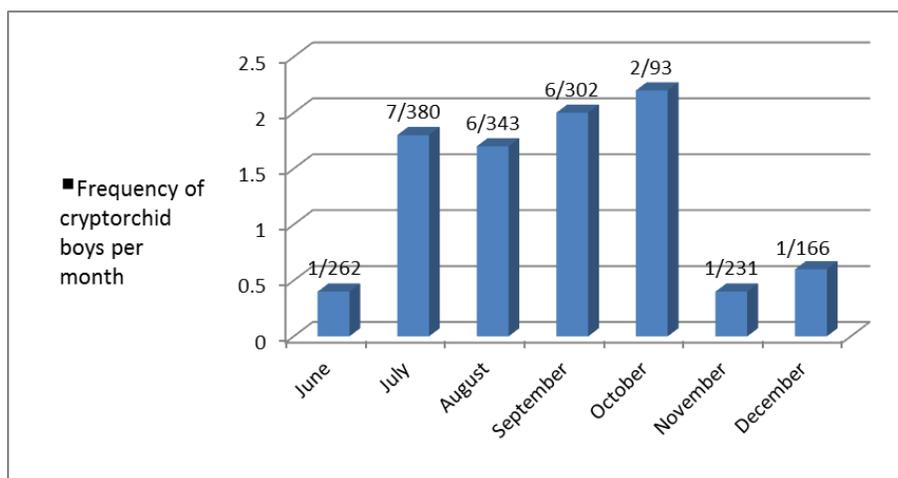
### Dear Editor-in-Chief

Cryptorchidism is a common finding in boys, and the majority of cases have no discernible etiology. As the region of Sfax is considered a polluted area in Tunisia (1), we decided to conduct a prospective study to assess the incidence of cryptorchidism in this area (Sfax-Tunisia).

From June to December 2013, at the Maternity Department of the Hedi Chaker teaching Hospital of Sfax (Tunisia), all full term born boys  $\geq 37$  weeks of amenorrhea were examined by pediatric surgeon. Excluding criteria was prematurity. Information on child (birth weight, term) and parents (life style, geography origin, maternal expo-

sure to pesticide) was recorded using medical chart. A follow up was done at 3-6 and 12 months by the same pediatric surgeon. A total of 24 of 1780 boys were born with cryptorchidism so the neonatal incidence was 1.3%. Although the study period was too short, we observed a seasonal variation in the incidence of cryptorchidism. There was a peak in September–October (Fig. 1) as has been reported by Berkowitz (2). Fifty percent of the mothers of cryptorchid children live in a rural setting.

The maternal exposure to pesticides during pregnancy was observed in 20% of cases.



**Fig. 1:** The monthly prevalence of cryptorchidism

Taking into account of all patients presenting up to age of 12 months, complete spontaneous descent occurred in 5 testicles by age 3 month or later (19.2%). The incidence of cryptorchidism at 1 year dropped to 1%.

Despite that Sfax is an industrialized city with high exposure to air pollutants (1), this rate is in the lower bracket compared with other countries (3-5). This lower incidence may be explained by the exclusion of preterm male in our study (4). Another reason is the fact that the maternal exposure to pesticides during pregnancy was observed only in 20% of cases (5). In addition, cryptorchidism is associated with a high maternal caffeine consumption and smoking during pregnancy (6). However, half of the mothers of cryptorchid boys in this study were living in rural setting and they do not consume coffee or smoke. The primary value of this study is what it shows about the low incidence of cryptorchidism at birth in our area (Tunisia). These results should be complemented by a multicentric study interesting the other Tunisian provinces.

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The authors declare that there is no conflict of interests.

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