Could APC gene screening be useful in children with hepatoblastoma? Early onset of adenocarcinoma in a child with familial adenomatous polyposis and hepatoblastoma

Ilaria Lazzareschi^{1*}, Giuseppe Barone^{1*}, Stefano Mastrangelo¹, Ilaria Francesca Furfaro¹, Giacomo Rando², and Riccardo Riccardi¹

¹Division of Pediatric Oncology, and ²Division of Pediatric Surgery, A Gemelli Hospital, Catholic University of Rome, Rome, Italy

*Ilaria Lazzareschi and Giuseppe Barone have contributed equally to this work.

ABSTRACT

Familial adenomatous polyposis is an inherited disorder characterized by the development of hundreds of colorectal adenomas during adolescence, which in many cases will transform into colorectal cancer by the fourth decade of life, along with the development of various malignant tumors including hepatoblastoma. We report on a female patient with a de novo interstitial deletion of 5q21.3-q23.3, encompassing the APC gene, associated with adenomatous polyposis and early colorectal cancer, hepatoblastoma, epidermoid cysts, mental retardation, several mild dysmorphic signs and lower limb venous thrombosis.

> Key words: adenocarcinoma, attenuated familial adenomatous polyposis, hepatoblastoma, 5q deletion, APC gene.

> The authors declare no conflict of interest.

> Correspondence to: Giuseppe Barone, MD, Division of Pediatric Oncology, Department of Pediatrics, A. Gemelli Hospital, Catholic University of Rome, Largo A. Gemelli 8. 00168, Rome, Italy. Tel +39-06-3058203; fax +39-06-3052751; e-mail giuseppebarone@alice.it

Received January 23, 2009; accepted May 14, 2009.