

Case Report

## A novel *TSC1* mutation (c.1964delA) in a Chinese patient with tuberous sclerosis complex

G.-X. Wang<sup>1,2</sup>, D.-W. Wang<sup>3</sup>, J.-S. Zhao<sup>2</sup>, S.-F. Wang<sup>2</sup> and R.-P. Sun<sup>1</sup>

<sup>1</sup>Department of Paediatrics, Qilu Hospital of Shandong University, Jinan, P.R. China
<sup>2</sup>Institute of Paediatrics, Qilu Children's Hospital of Shandong University, Jinan, P.R. China
<sup>3</sup>School of Life Science, Shandong Normal University, Jinan, P.R. China

Corresponding author: R.-P. Sun E-mail: gxw5201@163.com

Genet. Mol. Res. 10 (1): 107-113 (2011) Received July 19, 2010 Accepted November 15, 2010 Published January 25, 2011 DOI 10.4238/vol10-1gmr977

**ABSTRACT.** Tuberous sclerosis complex is an autosomal-dominant heritable disease caused by mutations in the *TSC1* and *TSC2* genes. We studied a Chinese patient with sporadic tuberous sclerosis complex. The clinical features of this patient included epilepsy, hypomelanotic macules and angiofibromas on his back; a cranial CT scan showed subependymal nodules along the lateral walls of the lateral ventricles. The *TSC1* and *TSC2* genes were studied by PCR and direct sequencing of the entire coding region and exon-intron boundaries of these genes. A novel deletion mutation (c.1964delA) in the *TSC1* gene exon 15 was identified, which was not present in his parents or 100 unrelated normal controls. This is the first report of this c.1964delA mutation of the *TSC1* gene, associated with tuberous sclerosis complex, expanding the spectrum of *TSC1* mutations that cause this disease.

Key words: Tuberous sclerosis complex; Mutation; TSC1; Gene

©FUNPEC-RP www.funpecrp.com.br

Genetics and Molecular Research 10 (1): 107-113 (2011)