P53 More than 2-Year Follow-up of Resistant Hypertensive Patients with Neurovascular Decompression of the Brain Stem on the Left Side

Imola Fejes¹, Erika Vörös², Pál Barzó³, Dóra Bajcsi¹, Annamária Letoha¹, Sándor Sonkodi¹, György Ábrahám¹, Péter Légrády¹

¹Department of Medicine, University of Szeged, Szeged, Hungary
²Radiology Department, University of Szeged, Szeged, Hungary
³Department of Neurosurgery, University of Szeged, Szeged, Hungary

ABSTRACT

In the background of resistant hypertension (RHT) the neurovascular pulsatile compression (NVPC) of the left rostral ventrolateral medulla may play a role. In these cases, a neurosurgical decompression (NVD) decreased the blood pressure (BP) and the antihypertensive medication became more effective. The aim of this work was to compare BP values recorded at the farthest time from the time of the NVD, up to maximum 31 December 2016. Earlier we published first 2-year follow-up data of 9 operated patients. In this work we retrospectively collected these 9 patients' data from the clinical center's patient management system. We analyzed BP values recorded before NVD, 1 and 24 months after NVD and the last recorded ones. The NVDs of these patients were performed between 2000 and 2004. The mean follow-up time was 11 years (minimum 3 years, maximum 16 years). Both the systolic and the diastolic BP decreased significantly in all cases after the NVD and at the last record they were significantly lower than before the NVD. Last recorded BP values compared to the 24-month data also were lower (148/96 mmHg vs. 135/81 mmHg). In 5 cases the number of antihypertensives increased and the mean number of combinations was higher compared to 24-month data (5.7 vs. 6.7). These results confirmed our previous opinion that in severe hypertension not responding to conventional therapy the NVD of the left side NVPC could guarantee a long-lasting BP reduction. An NVD may have increased the sensitiveness for antihypertensive medication.

© 2019 Association for Research into Arterial Structure and Physiology. Publishing services by Atlantis Press International B.V. This is an open access article distributed under the CC BY-NC 4.0 license (http://creativecommons.org/licenses/by-nc/4.0/).