Abstract

Stroke is relatively less prevalent among young adults. Young stroke generally refers to its occurrences in individuals under the age of 45. The underlying causes of stroke in this age group are usually different from those in older populations.

Danazol, a commonly prescribed medication, exhibits a unique mechanism of action with both procoagulant and antithrombotic properties. It exerts its effects on platelets and also interferes with the hypothalamic-pituitary-gonadal axis. There have been documented instances of arterial and venous thrombosis linked to the use of danazol and other androgenic steroids.

This case report describes a 25-year-old female with endometriosis, who was managed with combined oral contraceptive pills and laparoscopic surgery. Due to poor symptom control, she was started on danazol. While on Danazol, she presented with sudden onset left-sided hemiparesis. Following clinical examination and imaging, she was diagnosed with an ischemic stroke due to right common carotid artery thrombosis. Thrombolysis was not an option due to the delayed presentation. Thrombectomy could not be performed within 24 hours, due to lack of resources. Her condition worsened with evidence of a midline shift in imaging. She was managed with urgent decompression craniotomy on the third day of symptoms, to relieve raised increased intracranial pressure. She later received post-stroke rehabilitation, achieving a successful functional recovery.

After comprehensive investigations, it was determined that the patient did not exhibit any risk factors for atherosclerosis, nor was there any evidence of thrombophilic conditions or vasculitis. However, mild thrombocytosis was observed. Subsequently, the thrombosis was attributed to danazol therapy which is a rare cause for arterial thrombosis.