## Reactions 1824, p254 - 3 Oct 2020

## Risperidone

## Acute psychosis secondary to stroke: case report

A 60-year-old woman developed acute psychosis secondary to stroke during treatment with risperidone for schizophrenia. The woman, who had hypertension, diabetes mellitus and schizophrenia, presented to a hospital in USA with acute psychosis and focal neurologic deficits on the left side. She had been receiving risperidone [dosage and route not stated] for the schizophrenia. She had also been receiving aspirin, glipizide, hydrochlorothiazide and lisinopril concomitantly. One week before this presentation, she experienced headache, cough, vomiting and diarrhoea. Eventually, she was diagnosed with severe acute respiratory syndrome coronavirus-2 (SARS-CoV-2) infection, and was thus hospitalised. She had no known drug allergies. Physical examination was unremarkable. Laboratory examination revealed the following: haematocrit 36.7%, Haemoglobin 12.1 g/dL, WBC count 10,520 /μL, neutrophils 9080 /μL, lymphocytes 700 /μL, monocytes 700 /μL, eosinophils 0 /μL, platelet count 279,000 /μL, prothrombin time 13 sec, Prothrombin-time international normalised ratio 1.0, D-dimer 1263 ng/mL, sodium 137 mmol/L, potassium 4.2 mmol/L, chloride 98 mmol/L, carbon dioxide 24 mmol/L, urea nitrogen 56 mg/dL, creatinine 1.87 mg/dL, glucose 115 mg/dL, ferritin 450 µg/L, LDH 278 U/L, C-reactive protein 49.5 mg/L and creatine kinase 198 U/L. A cranial-nerve examination was normal. Strength in the right arm and right leg was 5/5, and strength in the left arm and left leg was 4/5. She experienced difficulty manipulating small objects placed in the left hand. The left arm showed pronator drift and orbiting. Light touch sensation was intact. Diffusion-weighted brain MRI revealed a punctate focus of restricted diffusion within the posterior limb of the right internal capsule (an acute brain lesion). No corresponding abnormality was observed on a T2-weighted fluid-attenuated inversion recovery image. The results of the brain imaging were consistent with a stroke.

Clopidogrel was therefore added to the woman's ongoing aspirin therapy (dual antiplatelet therapy), atorvastatin was also initiated. It was suspected that the psychosis was induced by stroke, and the risperidone therapy had direct association with the stroke [time to reactions onsets not stated]. Treatment with risperidone was however continued. She also received low-molecular-weight heparin to prevent deep-vein thrombosis. During the hospital stay, she also received off-label treatment with ceftriaxone and azithromycin for the SARS-CoV-2 infection. Her hospital stay was complicated by delirium, which was treated with olanzapine and quetiapine. Subsequently, her overall condition improved. On hospital day 14, she was discharged to the rehabilitation facility.

Singhal AB, et al. Case 26-2020: A 60-Year-Old Woman with Altered Mental Status and Weakness on the Left Side. New England Journal of Medicine 383: 764-773, No. 8, 20 Aug 2020. Available from: URL: http://doi.org/10.1056/NEJMcpc2004976