Mycophenolate-Mofetil May Stabilize Patients with Progressive Multiple Sclerosis

By Adrian Burton

Mycophenolate-mofetil (MMF) may be of use in stabilizing multiple sclerosis (MS) patients who have not responded to other immunosuppressant drugs. “MMF is a new oral immunosuppressant that has been used in transplantation with few side effects,” explained Christoph Heesen, Head of the MS Outpatient Clinic at Hamburg University Hospital, in Hamburg, Germany, who spoke here November 28 at the European Charcot Foundation Symposium. “There is some indication that it might be superior to azathioprine and other immunomodulators, so we tried it in four MS patients who had not responded well to standard treatments.” One man, now 42 years of age, with a history of brain stem symptoms, schizoaffective disorder, paraparesis, gait disturbance, loss of bladder function and uveitis, had been previously treated with lithium, steroids and eventually mitoxantrone 12 mg/m2, six courses every three months. After being stable for six months on the latter regimen, the patient’s Expanded Disability Status Score (EDSS) worsened from 4.0 to 6.5. However, after changing to MMF 2 g/day, the EDSS score remained the same for the two-year follow-up. A second MS patient, a woman now 29 years old with a history of relapsing MS that included sensory disturbances, gait ataxia, weakness and urinary symptoms, had previously received interferon beta-1 and Avonex (interferon beta-1a), but went on to develop iritis, cataracts, glaucoma and arthralgia. Her disease has stabilized on MMF 2 g/day and remained stable at two years of follow-up, longer than any previous stable period. Another woman, now 32 years old with repeating-relapsing MS and persistent uveitis, had not responded to standard immunosuppressant treatment, but the same MMF regimen stabilized her neurological disease, although she had two herpes zoster infections. A third woman, now 24 years old, with a 14 year history of gait disturbance, visual symptoms, paraparesis, optical neuritis and vasculitis, has remained neurologically and ophthalmologically stable for the last two years while receiving MMF treatment. All these patients tolerated the drug well with very few side effects, said Dr. Heesen. “This is a very small study and there have been no large studies of this ‘off-label’ drug in this context,” he explained. “In fact, there has only been one previous study with just seven patients. However, MMF might be a useful drug to at least add to our list of immunomodulators for MS patients that do not respond to standard immunosuppressant treatment.”