

The *Movement* Disorder Society
TARGETING A_{2A} RECEPTORS IN PARKINSON'S DISEASE WEBCAST

CME REQUEST INFORMATION

The *Movement* Disorder Society designates this educational activity for a maximum of 1.0 *AMA PRA Category 1 Credits*[™]. Physicians should only claim credit commensurate with the extent of their participation in the activity.

I am requesting the following: _____ AMA Category 1 Credit _____ Certificate of Completion

Please indicate the number of credits claimed (in quarter hour increments). _____ . _____

Name and Designation: _____

Signature: _____

Date of Birth (Day/Month/Year): _____

Address where Certificate should be mailed: _____

Address 1

Address 2

City

State/Province

Postal/Zip Code

Country

POST TEST

1. The adenosine A_{2A} receptor is primarily localized in what area of the brain?
 - A. The striatum
 - B. The hippocampus
 - C. The pons
 - D. All of the above

2. Which of the following anti-parkinsonian outcomes has been observed in experiments of A_{2A} antagonists performed in animal models of Parkinson's disease?
 - A. A_{2A} antagonists produced marked rotation on their own
 - B. A_{2A} antagonists altered rotation in the presence of high doses of levodopa
 - C. A_{2A} antagonists potentiated the effects of low doses of levodopa
 - D. A_{2A} antagonists curtailed the effects of levodopa

3. Which of the following dyskinesia outcomes has been observed in experiments of A_{2A} antagonists performed in animal models of Parkinson's disease?
 - A. A_{2A} antagonists alone provoked dyskinesia established by levodopa
 - B. A_{2A} antagonists potentiated dyskinesia produced by low doses of levodopa
 - C. A_{2A} antagonists potentiated dyskinesia produced by high doses of levodopa
 - D. A_{2A} antagonists reversed dyskinesia produced by high doses of levodopa

4. Preclinical data suggest that A_{2A} antagonists are most effective when they are dosed how?
 - A. As monotherapy
 - B. With low-dose (i.e., suboptimal) levodopa
 - C. With high-dose (i.e., optimal) levodopa
 - D. With any dose of levodopa

5. True or false? The effects of A_{2A} antagonists are mediated by dopamine receptors that dimerize with A_{2A} receptors.
 - A. True
 - B. False

6. Features of istradefylline include:
 - A. 12 hour half life in man
 - B. Lowest level of binding in human brain in striatum
 - C. Binding to A_{2A} adrenergic receptors
 - D. Decreasing output from striatopallidal pathway

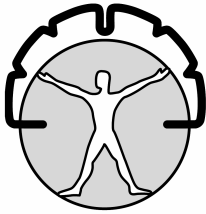
7. Parkinson disease subjects with advanced disease and optimally treated with levodopa and adjunctive medications, found that istradefylline:
 - A. Significantly decreased "off" time versus placebo
 - B. Was tolerated well in dosage up to 300 mg/day
 - C. Caused marked sedation for 15% of subjects
 - D. Had a 10% incidence of hepatic toxicity

8. Adenosine receptors in the brain:
 - A. Are co-localized with dopamine receptors
 - B. Provide a pharmacological target "downstream" from dopaminergic pathways
 - C. Are near-completely blocked by istradefylline at 2 mg/day p.o.
 - D. Bind irreversibly with istradefylline

9. Objectives for improving control of Parkinson disease include:
 - A. Enhanced duration of action throughout day and night
 - B. Control of problems not generally helped by dopaminergic therapy, such as imbalance, postural disturbance, fatigue, and speech disorders
 - C. Suppression of dyskinesias
 - D. Not causing cognitive impairment or hallucinations
 - E. All of the above

10. In a clinical trial using 40 mg/day, istradefylline treatment:
 - A. Resulted in a 10.8% decrease of "off" time as compared to a 4.0% decrease from placebo
 - B. Led to increased levodopa-induced dyskinesias
 - C. Was tested in a placebo-controlled randomized format involving a total of almost 400 subjects.
 - D. A and C

**Please fax your completed Post-test and Evaluation to:
Catherine Breckenridge, MDS Program Manager, at +1 414-276-3349**



The *Movement Disorder Society*

ENDURING CME ACTIVITY

PARTICIPANT EVALUATION FORM

Targeting A2A Receptors in Parkinson's Disease

Please take time to complete this evaluation form. Your input and comments are essential in planning future educational activities for MDS. To indicate your answers, use the rating scale by circling the number that represents your answer.

ACTIVITY CONTENT AND OBJECTIVES

		Please rate your ability to perform the following objectives both prior to participating in the activity and upon its completion (circle one):					
		Excellent	Above Average	Average	Below Average	Poor	
1.	Describe the role of adenosine system in the basal ganglia in relation to Parkinson's disease;	Before the activity:	5	4	3	2	1
		After the activity:	5	4	3	2	1
2.	Define the potential role of adenosine antagonists in the management of Parkinson's disease;	Before the activity:	5	4	3	2	1
		After the activity:	5	4	3	2	1
3.	Discuss the current evidence for the use of adenosine antagonists in Parkinson's disease.	Before the activity:	5	4	3	2	1
		After the activity:	5	4	3	2	1

Please rate your level of agreement with the following statements:		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree
		4.	The content of this program is relevant to my practice.	5	4	3
5.	Participation in this activity enhanced my professional effectiveness.	5	4	3	2	1
6.	The science and medical knowledge advanced by this activity will ultimately enhance care of patients with Movement Disorders.	5	4	3	2	1
7.	The syllabus was useful.	5	4	3	2	1
8.	The handouts were useful.	5	4	3	2	1
9.	The audiovisuals were effective.	5	4	3	2	1
10.	The overall format of this activity was effective.	5	4	3	2	1
11.	I would like MDS to continue to offer educational activities on this topic.	5	4	3	2	1

FACULTY

Utilizing the scale above, please rate the following speakers:		Peter Jenner					Peter LeWitt				
		1	2	3	4	5	1	2	3	4	5
12.	The speaker is knowledgeable and demonstrated appropriate expertise in the subject area.	1	2	3	4	5	1	2	3	4	5
13.	The speaker was clear, concise, and able to keep my attention.	1	2	3	4	5	1	2	3	4	5
14.	The presentation materials were appropriate and effective.	1	2	3	4	5	1	2	3	4	5
15.	The presentation was free of commercial bias.	1	2	3	4	5	1	2	3	4	5

16. Comments for Peter Jenner, Bpharm, PhD, DSc:

17. Comments for Peter A. LeWitt, MD:

FEEDBACK TO IMPROVE MDS's OVERALL EDUCATION PROGRAM

The following educational formats are useful to my professional development:		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree
		18.	Live, lecture-style educational activities	5	4	3
19.	Live, interactive educational activities	5	4	3	2	1
20.	Printed continuing medical education (CME) materials	5	4	3	2	1
21.	Online, Web-based CME	5	4	3	2	1
22.	CD-ROM based CME	5	4	3	2	1
23.	Audio/video tape CME	5	4	3	2	1

24. I am interested in attending future educational activities on the following topics:

- | | | |
|---|---|---|
| <input type="checkbox"/> ₁ Ataxia | <input type="checkbox"/> ₁₀ Gait disorders | <input type="checkbox"/> ₁₉ Sleep disorders |
| <input type="checkbox"/> ₂ Basic neuroscience | <input type="checkbox"/> ₁₁ Huntington's disease | <input type="checkbox"/> ₂₀ Spasticity |
| <input type="checkbox"/> ₃ Blepharospasm | <input type="checkbox"/> ₁₂ Myoclonus | <input type="checkbox"/> ₂₁ Tardive dyskinesia |
| <input type="checkbox"/> ₄ Brain stem function | <input type="checkbox"/> ₁₃ Neuropharmacology | <input type="checkbox"/> ₂₂ Tics and Tourette syndrome |
| <input type="checkbox"/> ₅ Chorea | <input type="checkbox"/> ₁₄ Neurosurgical therapy | <input type="checkbox"/> ₂₃ Tremor |
| <input type="checkbox"/> ₆ Dysphonia | <input type="checkbox"/> ₁₅ Neurotransplantation and stem cell therapy | <input type="checkbox"/> ₂₄ Wilson's disease |
| <input type="checkbox"/> ₇ Diagnosis and treatment of Movement Disorders | <input type="checkbox"/> ₁₆ Parkinson's disease | <input type="checkbox"/> ₂₅ Atypical Parkinsonian disorders (PSP, CBD, DLB, MSA) |
| <input type="checkbox"/> ₈ Dyskinesia | <input type="checkbox"/> ₁₇ Psychogenic Movement Disorders | <input type="checkbox"/> ₂₆ Non-motor aspects of Basal Ganglia Disorders |
| <input type="checkbox"/> ₉ Dystonic disorders | <input type="checkbox"/> ₁₈ Restless legs syndrome | |

25. Other: _____