Guidelines for the Use of Antiretroviral Agents in Pediatric HIV Infection

Downloaded from https://aidsinfo.nih.gov/guidelines on 9/26/2017

Visit the AIDSinfo website to access the most up-to-date guideline.

Register for e-mail notification of guideline updates at https://aidsinfo.nih.gov/e-news.
Table 13k. Antiretroviral Therapy-Associated Adverse Effects and Management Recommendations—Peripheral Nervous System Toxicity  *(Last updated April 27, 2017; last reviewed April 27, 2017)*

<table>
<thead>
<tr>
<th>Adverse Effects</th>
<th>Associated ARVs</th>
<th>Onset/Clinical Manifestations</th>
<th>Estimated Frequency*</th>
<th>Risk Factors</th>
<th>Prevention/ Monitoring</th>
<th>Management</th>
</tr>
</thead>
<tbody>
<tr>
<td>ARV Toxic Neuropathyb</td>
<td>d4T, ddI PIs</td>
<td>Onset: Weeks to months  Presentation:  • Decreased sensation  • Aching, burning, painful numbness  • Hyperalgnesia  • Algodynia  • Decreased or absent ankle reflexes  Distribution:  • Bilateral soles of feet, ascending to legs and fingertips</td>
<td>Children: Around 1% overall  d4T—10% to 25%  Adults: d4T—up to 50%</td>
<td>• Pre-existing neuropathy  • Elevated triglyceride levels  • Poor nutrition  • More advanced HIV disease  • Concomitant use of other neurotoxic agents (e.g., INH)  • Some mitochondrial DNA haplogroups may have increased risk.</td>
<td>Avoid use of d4T and ddI.  Monitor for symptoms and signs of peripheral neuropathy.</td>
<td>Discontinue offending agent.  Topical capsaicin 8% may be helpful.  Consider referral to a neurologist.  Data are insufficient to allow the Panel to recommend use of any of the following modalities: tricyclic antidepressants, gabapentin, pregabalin, mexiletine, Lamotrigine, and acupuncture or other complementary approaches</td>
</tr>
</tbody>
</table>

* Peripheral neuropathy may be underreported in children because symptoms are difficult to evaluate in young children.

b HIV infection itself may cause a distal sensory neuropathy that is phenotypically identical to ARV toxic neuropathy.

Key to Acronyms: ARV = antiretroviral; d4T = stavudine; ddI = didanosine; INH = isoniazid; NRTI = nucleoside reverse transcriptase inhibitor; PI = protease inhibitor

References


