

Jump To:

- <u>Anticholinergic Medications</u>
- <u>Anticonvulsant (Anti-Seizure) Medications</u>
- <u>Antidepressants</u>
- Muscle Relaxants (Antispastic Medications)
- Anti-Inflammatories (Pain Relief)
- Laxatives and Stool Softeners

Spastic cerebral palsy, the most common type of cerebral palsy, is characterized by muscle spasms and muscle tightness that can cause pain, limb rigidity and limitations in range of motion and joint function over time. One of the goals of supportive treatments for spastic cerebral palsy is managing spasticity. In some cases, pharmacological interventions may be needed to help reduce the impact of spasticity on a child's day-to-day life.

While each child's doctor may prescribe different drugs depending on the child's unique set of health concerns, there are two medications that are very, very common that parents should know about: Botox and baclofen. Both of these drugs are useful in helping control spasticity, but are used in different circumstances for different sets of problems. Please feel free to check out our <u>botox</u> and <u>baclofen</u> pages for more information.



There are, of course, numerous other drugs used to treat the conditions associated with cerebral palsy, though they do not all work to treat the same kinds of conditions. The following is a brief overview of just some of the drugs used to treat cerebral palsy:



Anticholinergic Medications

Anticholinergic medications treat uncontrolled movements such as tremors, spasticity and drooling. Commonly, this class of drugs is used to treat digestive tract spasticity, reduce saliva production and decrease bronchial secretion volumes. These drugs are often prescribed to those with athetosis, chorea, choreoathetoid cerebral palsy, and dystonia. These drugs block acetylcholine from binding to receiving nerves, decreasing the amount of stimulation the muscle receives. Although side effects are mild, anticholinergic medications are not prescribed together with antihistamines to prevent amplification. Common anticholinergic medications for cerebral palsy include the following:

- Benztropine mesylate
- Carbidopa-levodopa (Sinemet)
- Glycopyrrolate (Robinul)
- Procyclidine hydrochloride (Kemadrin)
- Trihexphenidyl hydrochloride

Anticonvulsant (Anti-Seizure) Medications

One of the concurrent effects of certain types of cerebral palsy is seizures and epilepsy. Because seizures can worsen brain damage, efforts are made to prevent further seizure activity using anticonvulsants, which depress (reduce) excessive brain stimulation. Because different types of seizures are best controlled using different medication classes, the process of prescribing anticonvulsants involves periods of prescription, monitoring and adjustment as needed. Sometimes dosages and medication types are changed due to adverse side effects, so it is very important for parents and physicians to monitor a child's health in case adverse effects do occur. Sometimes children build tolerance to anticonvulsants, necessitating dosage



change. After a certain point, however, a changeover (a switch to a different type of anticonvulsant) is needed to prevent adverse effects. This is done slowly to prevent withdrawal symptoms. The use of multiple anticonvulsants at once can sometimes occur, though it increases the risk of adverse effects and makes it harder for medical professionals to analyze a child's reaction to their prescription.



Trade Name	Common Name
Benztropine	Cogentin
Carbidopa-levodopa	Sinemet
Glycopyrrolate	Cuvposa, Robinul
Trihexyphenidyl	Artane
Gabapentin	Neurontin
Lamotrigine	Lamictal
Oxcarbazepine	Trileptal
Topiramate	Topamax
Zonisamide	Zonegran
Phenytoin	Dilantin
Depakene/ Valproic acid	Valproate/Valrelease
Divalproex Sodium	Epival
Carbamazepine	Tegretol
Clonazepam	Klonopin/Rivotril
Ethosuximide	Zarontin



Antidepressants

Antidepressants are often prescribed to those with cerebral palsy. This class of drugs help treat depression, anxiety and seizures (in certain instances). About ¹/₃ of people with chronic illnesses have depression, and depression can worsen the prognosis of cerebral palsy by decreasing confidence, increasing fatigue, making pain feel worse and decreasing an individual's ability to cope with their condition. Common antidepressants include the following:

- Citalopram (Celexa)
- Escitalopram (Lexapro)
- Fluoxetine (Prozac)
- Paroxetine (Paxil)
- Sertraline (Zoloft)

Muscle Relaxants (Antispastic Medications)

Muscle relaxants are often the first line of treatment for treating spasticity in many cases, as the medications are non-invasive and fairly common. They can be provided in an oral tablet form or via injection into affected muscles. In the case of baclofen, it can also be delivered via intrathecal pump. These drugs control muscle contractions and increase range of motion, which can reduce or delay the need for extensive surgeries and prevent contractures and bone deformities.

While Baclofen and Botox are the most well-known antispastic medications, there are numerous others, including Diazepam (Valium), Dantrolene (Dantrium), Cyclobenzadrine (Flexeril), and tizanidine. The kind of antispastic medication provided vary vastly depending



on a patient's circumstances, health history and other factors.

Anti-Inflammatories (Pain Relief)

Anti-inflammatory medications decrease pain, which can be a significant part of hypoxicischemic encephalopathy-related cerebral palsy, whether due to surgery, rehabilitation and therapy, orthopedic pain, or gastrointestinal trouble. Many are available over-the-counter, though some pain relievers are provided by prescription. Informally, some of the categories of pain relief medications include:

- Over-the-counter medications (such as aspirin, Tylenol, or Aleve)
- NSAIDs
- Anti-inflammatory corticosteroids

It is very important that medications be cleared with a primary doctor first so they can screen for adverse effects, drug interactions, and proper monitoring of the child.

Laxatives and Stool Softeners

Because constipation is fairly common in those with cerebral palsy, stool softeners can often be recommended in situations where high-fiber diets have not worked, and laxatives can stimulate motility in the gastrointestinal tract to help move waste out of the body.



Learn More About Medications for Cerebral Palsy:

- <u>Cerebral Palsy Medications: Overview (Neuromuscular Blockers, Muscle Relaxants,</u> <u>Benzodiazepines, Anticholinergic Agents, Dopamine Prodrugs, Anticonvulsant Agents, and</u> <u>Alpha2 Adrenergic Agonist Agents)</u>
- <u>CP Medications</u>
- [NIH] Drug Treatments for Cerebral Palsy
- [webMD] Cerebral Palsy Medications (list)