

Bisphosphonates and Jaw Bone Damage

What is osteonecrosis of the jaw?

Osteonecrosis of the jaw (jaw bone damage) is a rare condition that occurs when the bone is injured and dies. It happens when bones don't heal properly after certain dental procedures, such as having a tooth pulled. Patients who have osteonecrosis of the jaw may have severe pain and swelling in the jaw and loose teeth. Recently in the news there have been reports of jaw bone damage in patients taking medications called bisphosphonates. Bisphosphonates are a widely used class of medications that help make bones strong and less likely to break. Bisphosphonate pills or capsules are commonly used for the prevention or treatment of osteoporosis. There are also some bisphosphonates given intravenously (through the vein) to prevent bone complications related to certain types of cancers. There are six oral bisphosphonates and four intravenous bisphosphonates available:

Oral (by mouth)

- *Actonel* (risedronate)
- *Bonefos, Ostac, Clasteon* (clodronate) (Canada only)
- *Boniva* (ibandronate) (U.S. only)
- *Didronel* (etidronate)
- *Fosamax* (alendronate)
- *Skelid* (tiludronate) (U.S. only)

Intravenous

- *Aredia* (pamidronate)
- *Bonefos, Ostac, Clasteon* (clodronate) (Canada only)
- *Boniva* (ibandronate) (U.S. only)
- *Zometa* (zoledronic acid)

Should I be worried if I'm taking a bisphosphonate?

In general, osteonecrosis of the jaw is a RARE condition. The chances of developing jaw bone damage from using any bisphosphonate is very small. Of the millions of people who have used bisphosphonates over the years, only 368 cases of jaw damage have been reported as of May 2006. Of those cases, the majority are in cancer patients using the intravenous form of a bisphosphonate (e.g., *Zometa* or *Aredia*). Your risk could increase, however, if you have certain dental procedures such as having a tooth pulled. Even though your chances of developing osteonecrosis of the jaw are rare, it is a good idea to tell your dentist if you are taking a bisphosphonate.

What is the best way to prevent osteonecrosis of the jaw?

The best way to prevent jaw osteonecrosis is to take good care of your teeth. It is important to brush and floss your teeth at least once a day to keep your teeth and gums healthy. Also, be sure to visit your dentist regularly for routine dental exams and cleaning. If you are not currently taking a bisphosphonate, but will be starting one soon, be sure to tell your dentist NOW. They may want to take care of necessary dental work before you start taking your bisphosphonate.

Should I continue taking my bisphosphonate?

Yes. Bisphosphonates are very safe drugs that have been used by millions of people. Bisphosphonates can help make your bones stronger and prevent them from breaking. Your chances of developing jaw bone damage are very small, while the overall benefits of using a bisphosphonate are large. Be sure to take good care of your teeth and have routine dental exams and cleaning to prevent the need for dental procedures. If you're concerned about taking a bisphosphonate, talk with your physician about what would be best for you. Don't stop taking your bisphosphonate on your own.