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*Curcumin serves as an anti-inflammatory by inhibiting molecules that would trigger inflammation if they were released and free to act as normal.*

## THE ANTI-INFLAMMATORY ACTIVITY OF CURCUMIN

**T**urmeric is an orange-yellow spice that can often be found in curry powder. It has been used in traditional Indian medicine many years. More recently, modern medicine has found that it can be used for its anti-inflammatory properties. These properties come from a part of the plant called curcumin, a component that can be extracted from the turmeric.

A recent study compiled the data from numerous previous experiments on the toxicity and anti-inflammatory properties of curcumin. Among the data included four cases on the anti-inflammatory ability of curcumin in humans. The studies ranged from as few as five participants to as many as 45 and the subjects were each given curcumin for a length of time ranging between two weeks to 22 months. In all four cases there was statistically significant evidence that curcumin was effective in reducing inflammation.

Laboratory studies have concluded that there are a number of different molecules involved in triggering the inflammation process. The way that curcumin is able to reduce inflammation is by inhibiting many of these trigger molecules. Some of these trigger molecules inhibited by curcumin include: phospholipase, lipooxygenase, COX-2, leukotrienes, thromboxane, prostaglandins, nitric oxide, collagenase, elastase, hyaluronidase, MCP-1, interferon-inducible protein, tumor necrosis factor, and interleukin-12.

*Chainani-wu N. Safety and Anti-Inflammatory Activity of Curcumin: A Component of Turmeric (Curcuma longa). 2003. The J of Alt and Comp Med 9(1):161-8.*