

# **Vitamin D Toxicity**

Vitamin D is a fat-soluble vitamin whose major function is the maintenance of adequate levels of calcium and phosphorous in the body. Megadoses of orally administered vitamin D can lead to vitamin D toxicity. Common manifestations include kidney stones caused by excess levels of calcium, abdominal pain, and loss of appetite. Vitamin D toxicity is also seen in sarcoidosis due to increased activation of vitamin D by epithelioid macrophages.



**PLAY PICMONIC** 

#### **Kidney Stones**

Kidney-throwing Stones

Excess levels of calcium in the blood can lead to an increased incidence of kidney stones.

#### Metastatic Calcification of the Kidney

(Metastatic) Mitt (calcification) Calcified Cow and Kidney

Hypercalcemia due to vitamin D excess can lead to abnormal deposition of calcium salts in otherwise normal tissue, especially in the kidney. Metastatic calcification is different from dystrophic calcification, which is caused by abnormalities of tissue that result in mineral deposition.

#### **Loss of Appetite**

X-on-mouth

Anorexia is a common symptom seen in hypercalcemia caused by vitamin D toxicity.

## **Abdominal Pain**

Abdominal Pain-bolt

Abdominal pain is a common symptom seen in hypercalcemia caused by vitamin D toxicity.

### Sarcoidosis

Shark-koi-fish

Vitamin D toxicity is seen in sarcoidosis due to increased activation of vitamin D by epithelioid macrophages.