

life on
GREENACRES

NUTRIENT DEFICIENCIES IN PLANTS

..... HOW TO IDENTIFY & WHAT THEY MEAN

Yellow leaves aren't always the same problem. Here's how to spot the difference.

NUTRIENT	HOW IT APPEARS ON LEAVES	WHERE IT SHOWS UP	OTHER SIGNS	WHAT IT MEANS	WHAT TO DO
IRON (Fe) Iron deficiency (common in alkaline soil or high pH)	 Yellowing between veins (interveinal chlorosis) Veins remain green	 NEWER / YOUNGER LEAVES <i>at the top of the plant (new growth first)</i>	• New leaves may be pale, small, or thin • In severe cases leaves can turn almost white or yellow	 Iron may be present in the soil but unavailable to the plant, especially when soil pH is high.	 If iron chlorosis is confirmed, apply an appropriate chelated iron product. Address high soil pH only if testing indicates it is needed. <i>Soil and/or plant tissue testing can help confirm the diagnosis.</i>
MAGNESIUM (Mg) Magnesium deficiency	 Yellowing between veins Veins remain green	 OLDER LEAVES <i>at the bottom or middle of the plant (older growth first)</i>	• Yellowing starts at leaf edges and moves inward • Lower leaves may drop in more severe cases	 Magnesium is needed for chlorophyll production. Deficiency affects older leaves first.	 If magnesium deficiency is confirmed, apply a magnesium source such as magnesium sulfate (Epsom salts) according to soil-test or product recommendations. <i>Soil and/or plant tissue testing can help confirm the diagnosis.</i>
ZINC (Zn) Zinc deficiency	 Yellowing between veins Leaves may be small and narrow	 NEWER / YOUNGER LEAVES <i>at the top of the plant (new growth first)</i>	• Leaves may be small, narrow, or distorted • Shortened internodes (little space between leaves)	 Zinc is essential for growth hormones. Deficiency can cause stunted growth and distorted leaves.	 If zinc deficiency is confirmed, apply a zinc product (chelated zinc) according to label directions. <i>Soil and/or plant tissue testing can help confirm the diagnosis.</i>
MANGANESE (Mn) Manganese deficiency	 Yellowing between veins with small brown or gray specks	 NEWER / YOUNGER LEAVES <i>at the top of the plant (new growth first)</i>	• Small brown or gray specks may appear between veins • In severe cases, leaves may develop necrotic spots	 Manganese can be unavailable in high pH soil or waterlogged conditions.	 If manganese deficiency is confirmed, apply a manganese product (chelated manganese) according to label directions. <i>Soil and/or plant tissue testing can help confirm the diagnosis.</i>



SOIL TESTING IS KEY!

A soil test can help identify pH and nutrient issues that may affect plant health. When micronutrient deficiency is suspected, plant tissue testing can provide additional clues. Yellowing can also be caused by watering, root, disease, or environmental problems – not just nutrient deficiencies.



BEST PRACTICES FOR HEALTHY PLANTS

For many garden plants, a soil pH around 6.0 – 6.5 supports good nutrient availability. Ideal pH varies by plant.



Water consistently and avoid over-fertilizing.



Healthy soil = healthy plants!

