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Gardening is Good for You

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April is Arizona Garden Month!



Growing Good Health in Your Garden

It is completely true; spending time gardening can be a guiltless pleasure since the activity brings health and wellness benefits of multiple kinds. You do not have to just take our word for it. Let's "dig" into the benefits.

Strength, balance, flexibility, and stamina gains

The Mayo Clinic Health System (2022) agrees with us that nurturing nature helps your mind and body. Tending a garden can be as physically demanding as a rigorous workout in the gym or as gentle as a walk in the park. It all depends on your goals and pace of activity. The chances are you'll find yourself doing squats, lifts and cardio that will improve your balance, strength, flexibility, and stamina.

Mayo Clinic also encourages gardeners to adapt activities to guard against injury. If you have a bad back, consider investing in raised garden beds (Figure 1) or use shovels and rakes to support your knees when squatting. Smaller pots and bags of mulch are easier to move, and you will need less storage to keep them from becoming trip hazards.



Figure 1. Raised beds are better for your back and provide more space in the soil for plant roots to grow vertically down. In some cases, you can often plant more in a given area. Raised beds can also drain more quickly and increase the comfort of tending the plants to those with physical limitations.

Improved diet

While you burn calories tending your garden, eating your homegrown fruits and veggies will help improve your nutritional intake. There are few things more satisfying than growing and eating your own fruits and vegetables, and you will rarely eat fresher produce. Gardeners often consume more and a wider variety of vegetables and fruits. Gardeners also have control over pesticides and fertilizers used during the growth cycle. You can decide which products you want to use, and when (within the label parameters).



Many vegetables and fruits we grow in Arizona have profound health benefits. While seasonality and choice depend on where you are in the state, many valuable health benefits are associated with produce that can be grown at some point in the year.

- Tomatoes are high in vitamin C and potassium. They also contain lycopene, an antioxidant that may reduce prostate cancer risk (Moran et al., 2022). You can learn more information about growing tomatoes in Arizona from this Extension publication: <https://extension.arizona.edu/sites/default/files/2024-09/az2078-2024.pdf>.
- Spinach and broccoli contain antioxidants like sulforaphane and vitamins A, C, and E as well as important minerals like iron, potassium, and magnesium.
- Spinach, broccoli, tomatoes, Brussels sprouts, peas, potatoes, beets, and carrots contains an antioxidant known as alpha-lipoic acid which has effects on the regulation of insulin sensitivity and insulin secretion improving blood glucose control in people with diabetes. It is proving to be particularly helpful in managing diabetic neuropathy due to its positive effects on nerve conduction and alleviation of symptoms (Capece et al., 2022).
- Leafy greens are high in chlorophyll which research suggests may have anticancer properties (Vaňková et al., 2018)
- and improves bone health.
- Citrus fruits are not a surprising addition to this list, since we typically turn toward vitamin C when we have colds. Almost all citrus fruits, including oranges, grapefruit, lemons, and limes, are high in vitamin C.
- Peppers contain capsaicin which has been shown to have anti-inflammatory properties, due to the inhibition of inflammatory pathways and reduction of release of

inflammatory factors (Zhao et al., 2021) and can reduce heart disease (Szallasi, 2022).

- Vitamin K, particularly K1 (phylloquinone), is abundant in green leafy vegetables including kale, spinach, broccoli, and lettuce. Vitamin K consumption is important for many aspects of good health and specifically acts as a modifier of bone matrix proteins, improving calcium absorption, and may even reduce the amount of calcium that is excreted in urine (Rodríguez-Ollerós Rodríguez & Díaz Curiel, 2019).
- Luteolin is a flavonoid found in various plants, including celery, broccoli, bell peppers, artichoke, spinach, cabbage, onion, oranges, grapes, dates, and herbs like thyme, rosemary, and oregano. Luteolin is effective in inhibiting the replication of viruses including coronaviruses, influenza, enteroviruses, rotaviruses, herpesviruses, respiratory syncytial viruses, and many others, boosting immunity to viral infections (Lu et al., 2023).

Stress reduction

Getting outdoors, having your hands in soil, hearing the wind, and feeling the sun warm your skin is, simply put, good for your mental health. Mayo Clinic Health System (2022) reports that people tend to breathe deeper when they are outside. This helps to clear out the lungs, improve digestion, improve immune response and increase oxygen levels in the blood. Furthermore, they add that spending time outdoors has been shown to reduce the heart rate and ease muscle tension, and exposure to sunlight helps to lower blood pressure and increase vitamin D levels.

If you are a person who has never experienced the immense satisfaction of planting, tending, harvesting and sharing food and flowers you have grown, we encourage you to give it a go. Even harvesting veggies grown in countertop hydroponic systems and herbs in pots is a thrill (Figure 2).



Figure 2. Countertop hydroponic growth system and potted herbs.

Gardening often brings people together, strengthening social bonds and a shared sense of community. Post-pandemic, we appreciate how vital social connections are in managing stress, improving resilience and providing a social support system during difficult times in life. A strong sense of belonging and shared community lowers the risk of depression (Odeh et al., 2022), stress (Egerer et al., 2022) and suicide. Supported by proven theoretical foundations, a growing number of research articles support the causal relationship between social isolation and suicide, and the protective effect of social support against suicide (Motillon-Toudic et al., 2022).

If you are looking to start gardening or improve your skills, make sure to reach out to one of your county Master Gardeners through your local Cooperative Extension office.

Our University of Arizona Master Gardeners are highly trained, passionate local volunteers dedicated to educating and empowering fellow garden enthusiasts. They are a power for good in their communities.

This factsheet is dedicated to Master Gardeners and the University teams that coordinate our state program. The authors thank you.



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Mayo Clinic Health System SPEAKING OF HEALTH TUESDAY, JULY 12, 2022
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April 22nd is Earth Day.

"In fact, it was written on April 22, 1970 by Joseph Lelyveld, whose story about the first Earth Day ran on the front page of The New York Times the next morning. Across six columns the headline blared: Millions Join Earth Day Observances Across the Nation. You could buy a copy of the paper for ten cents then.

Even President Richard Nixon planted a tree on the White House lawn with First Lady Pat Nixon to commemorate the joyful day. Among the national throng of 20 million on that first Earth Day, I was barely a teenager, coming of age as environmental protection saw its greatest flowering: the Clean Air Act, the Clean Water Act, the Endangered Species Act, and the establishment of the EPA. It made America the greatest friend of Earth in the eyes of the whole world."

David Sassoon, Founder and Publisher, Inside Climate News, a 501(c)(3) nonprofit organization.

Tuesday, April 22, 2025 is the 55th anniversary of Earth Day. We invite everyone to support Earth Day's 2025 theme: OUR POWER, OUR PLANET™.

There are many ways you can get involved and make a difference for our planet on Earth Day and every day. Join millions worldwide in Earth Day 2025 activities. Attend a local event or plan and register your own. Below you'll find resources such as Quizzes, Fact Sheets, Articles and More to help you celebrate Earth Day this year in your community, at home, at work and at school. Read more at <https://www.earthday.org/our-power-our-planet/>



What the Heck Was This? (From our February issue)



Answer: The ironclad beetle (*Phloeodes diabolicus*) is as rugged as it sounds. Native to western North America this beetle has layered structures in its interlocking wing cases make the beetle highly resistant to being squashed. No Master Pest Detectives answered this one.

What the Heck is This?



If you know the answer, email Dawn at dhgouge@arizona.edu. You will not win anything if you are correct, but you will be listed as a “**Master Pest Detective**” in the next newsletter issue.

Upcoming/Ongoing Events

Save the Dates! 8th Arizona School IPM Conference

In-person April 25, 2025
Online April 29 – May 31, 2025

The Arizona School IPM Conference is a great opportunity for continuing education for all institutional staff engaged in operations, maintenance, turf and landscape, food service, health services and more, in schools, childcare, community colleges, public health, medical facilities, city parks and rec, turf and landscape and many other areas.

The direct registration links are below:

In-person <https://www.eventbrite.com/e/8th-arizona-school-ipm-conference-in-person-tickets-1269334737369?aff=oddtcreator>

Online <https://www.eventbrite.com/e/8th-arizona-school-ipm-conference-online-tickets-1271509732839?aff=oddtcreator>

Email nairs@arizona.edu if you have questions.

What's Bugging You? First Friday Events *(New York State IPM Program)* Fridays | 12:00 pm. – 12:30 p.m. EDT | Zoom | Free but registration required.

In this monthly virtual series, we explore timely topics to help you use integrated pest management (IPM) to avoid pest problems and promote a healthy environment where you live, work, learn and play. What is IPM? It's a wholistic approach that uses different tools and practices to not only reduce pest problems, but to also address the reasons why pests are there in the first place. Each month, our speakers will share practical information about how you can use IPM. **Register for upcoming events.**

What's Bugging You First Friday events are also available in **Spanish**. Individuals interested in these events can find more information on this website: <https://cals.cornell.edu/new-york-state-integrated-pest-management/outreach-education/events/whats-bugging-you-webinars/conozca-su-plaga>

Urban and Community IPM Webinars (Host: University of California)
UC Statewide IPM Program Urban and Community webinar series is held the third Thursday of every month to teach about pest identification, prevention and management around the home and garden. This series is free but advanced registration is required.

Dates and topics below, all begin at noon Pacific. <https://ucanr.edu/sites/ucipm-community-webinars/>

To view previous University of Arizona newsletters, visit:
<https://acis.cals.arizona.edu/community-ipm/home-and-school-ipm-newsletters>.

We want to hear from you!

Please take this short 5-question survey about our newsletter:
https://uarizona.co1.qualtrics.com/jfe/form/SV_cMhZ82JodDKJgCa

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We respectfully acknowledge the University of Arizona is on the land and territories of Indigenous peoples. Today, Arizona is home to 22 federally recognized tribes, with Tucson being home to the O'odham and the Yaqui. Committed to diversity and inclusion, the University strives to build sustainable relationships with sovereign Native Nations and Indigenous communities through education offerings, partnerships, and community service.