RON FINLEY

Teaches Gardening

MASTERCLASS

Meet Ron

Ron Finley comes from a place where much of what grows must force itself through cracks in the concrete. The "Gangster Gardener," as he's known, hails from South Central Los Angeles, a neighborhood so often portrayed in film and on television as a harsh landscape of poverty, gangs, and endless drive-through fast-food joints. Thanks to Ron, South Central is now also becoming known for its communally managed organic fruit and vegetable gardens.

In 2010, Ron got fed up with having to drive 45 minutes to find a tomato that hadn't been doused in agrochemicals. So he cleared the trash from a narrow strip of soil that ran between the sidewalk and the street in front of his house and planted tomatoes, melons, broccoli, kale, and other fruit and vegetable varieties. Soon he had such a bumper crop on his hands that he was feeding not just himself but his neighbors. Ron's garden became a conversation piece, a catalyst for new friendships, the midwife for a new kind of street vibe—sprouting new possibilities.

It turned out that in Los Angeles, growing organic goodness on these city-owned parkway strips was a punishable offense. Homeowners are allowed to plant grass on these plots, but not eggplants or heirloom tomatoes. Ron had already been cited once by the Bureau of Street Services for his banana trees, which he agreed to cut down in order to avoid a fine. Since he was a repeat offender, this time there would be a warrant for his arrest. He chose to fight City Hall, and with a deluge of media attention, plus a little help from a sympathetic council member, he persuaded the powers that be to exempt vegetable gardens from parkway landscaping restrictions.

"For the last 10 years, I've worked to turn this food desert into a food forest," Ron says. "I wanted to show people the possibilities of what could happen with this land that was just being used for people's dog shit. People leave dressers and toilets and whatever. They just discard all their trash on their parkway. I wanted to beautify this. I wanted to show people they could do the same thing."

A viral TED talk in 2013 catapulted Ron onto the world stage. Suddenly folks like Alice Waters and Bette Midler were calling, and Ron found himself on TV. Corporations wanted in on his brand. Ron, a fashion designer by trade, even became the subject of a 2015 documentary, *Can You Dig This*, produced by chart-topping recording artist John Legend (and co-produced by Ron). A star, as they say, was born.

As the Gangster Gardener, Ron has taken plenty of risks, but he's also a bit of a philosopher. "To me, gardening is gangster. Soil is gangster. Air is gangster as fuck! You can't get no more gangster than air. Mother Nature serves us all, so we have to have respect and help Mother Nature do what she do."

Now, Ron welcomes you to his garden classroom: "I'm going to teach you how to grow your own damn food!"

Welcome to Ron Finley's MasterClass.

MEET YOUR FELLOW GARDENERS

Want to chat propagation, harvest tracking, and microclimates with like-minded green thumbs? Then head to community.masterclass.com to connect with Ron's other students and trade gardening tips.

CONSIDER THE CLIMATE

GANGSTER GARDENER WISDOM

“Climate determines how long you can grow and what you can grow.”

Success in gardening is all about putting the right plant in the right place at the right time. That starts with an understanding of the crops suited to your climatic region and the season in which to plant them. Every plot also has its own microclimate—variations in sunlight, wind exposure, and drainage—which has a huge impact on what will thrive.

Lingo

Annual
A plant that completes its life cycle in one growing season.

Cool season crop
Plants that grow best with highs in the 60s and 70s and lows in the 40s and 50s.

Perennial
A plant that returns year after year.

Warm season crop
Plants that grow best with highs in the 70s and 80s and lows in the 50s and 60s.

Winter dormancy
The state of hibernation during the cold months that some plants go into in order to produce flowers and fruit during the following growing season.

Finding Your Zone

Temperature is the ultimate arbiter of plant life. The gardening season begins each spring as frosty nights dissipate and plants sense that it is safe to send out tender new shoots. Summer is an eruption of growth—of flowering and fruiting. It's the season that feels like it will never end, when anything seems possible. But in the plant world, the party is over as soon as the temperature first dips below 32 degrees.

When temperatures go below freezing, plants cease to grow. If you're an **annual plant**, you shrivel up and die; if you are a **perennial**, you pull all of your energy and resources inward and prepare for the winter dormant season. But here's where it starts to get complicated.

Some perennial plants are more cold-hardy than others. "Here in L.A."—where it virtually never goes below 30 degrees—"we can grow damn near anything all the time," says Ron. "But if you're in Washington, D.C., you don't have that luxury because you have to deal with frost."

In Southern California, tropical tree species keep pumping out bananas, papayas, and mangoes throughout the mild winters. In D.C., for example, winter lows occasionally dip to around 0 degrees, a temperature that kills many Mediterranean species, like figs and olives, but does no harm to temperate fruit trees, like apples and peaches. In Fairbanks, Alaska, where the thermometer can dip to -50, one is limited to obscure fruit crops from the tundra, such as the Siberian kiwi—the fuzz-less, berry-size cousin of the green fruit we're all familiar with.

The USDA maintains a plant hardiness map, searchable by zip code, which divides the country into 13 zones based on average annual minimum temperature (the map was revised in 2012 due to climate change). Find your zone and familiarize yourself with the fruits, vegetables, flowers, and herbs that thrive in it, says Ron (if you're outside of the United States, consult these international hardiness zone maps). When you go to a garden center or browse online nurseries, you'll find that plants are often labeled with a number corresponding to this map that tells you whether the crop you're considering will survive in your zone. (Find a full list of suitable species for your zone at gardenia.net.) To help you plan, ufseeds.com provides sample vegetable planting schedules for various zones. Click here for a list of fruit varieties with best zones for each.

Understanding Your Zone

When plant shopping, sometimes you will find a range of cold hardiness zones on the label (zones 4 through 8, for example), indicating both lower and upper climatic thresholds (some crops don't like it too hot). Also, many fruiting plants actually require a certain amount of **winter dormancy**; in this case, the higher number reflects regions of the country that have the minimum amount of cold weather needed for the crop. This can vary even within species. As an example, Bing cherries are rated for zones 5 through 9, but Black Tartarian cherries are restricted to zones 5 through 7, as they require a longer winter to produce fruit.

The USDA map provides critical information for perennials, but sometimes you'll also find annuals labeled with a zone number. All annuals die at 32 degrees, but some need a longer frost-free growing season than others, for which the USDA zone system provides a rule of thumb: The higher the number, the longer the growing season.

THE HEAT FACTOR

It's not just cold that stops a growing plant in its tracks. Many species stop growing at high temperatures, and some will even wither away entirely. For this reason, Ron recommends some careful study of the **American Horticultural Society's heat zone map**. Divided into 12 zones based on average number of days per year above 86 degrees (the temperature at which many plants wish they could pull up their roots and scurry into the shade), it is the perfect complement to the USDA's cold hardiness map. Increasingly, nursery plants are labeled with a heat zone number, representing the highest temperatures in which they can sustain growth. Or you may see a range of heat zones on the label, as some crops also need a minimum amount of summer warmth to produce a harvest.

Seasonal Considerations

The final key to understanding your horticultural zone is the concept of first and last frost. **Cool season crops** may be planted as soon as frost is no longer expected in spring; these often fade, and may die altogether, during the heat of summer. A second window for planting cool season crops opens up in late summer and early fall; once mature, these species can actually survive a light frost (in mild climates, they may even continue producing into the winter months). **Warm season crops** are typically planted about six weeks after the last frost, thriving through the summer months and finally turning brown with the first frost in fall.

Frost doesn't correspond precisely to freezing temperatures, as sometimes climatic conditions can cause frost to form on plants at temperatures above 32 degrees. To find the average date of first and last frost in your area, go to The Old Farmer's Almanac and put in your zip code.

Once you've determined your number of frost-free days per year—the length of your growing season—you'll have a much better idea of what to plant and when to plant it. You'll notice that seed packets typically indicate the number of "days to maturity" that the crop requires. Armed with this information, count backward from your area's average date of last frost to determine the latest possible date to plant each crop. But keep in mind that sometimes crops grow more slowly than usual and that frosts can come earlier than average—it's wise to add two to four weeks, just to be safe.

Formulas and gardening apps are helpful, but Ron insists that the key to gardening success is to observe and interact. Understand your climate by getting out in it. "Study where you are," says Ron.

COOL SEASON CROPS NOT AFFECTED BY FROST			
Asparagus	Broad Bean	Broccoli	Brussels Sprouts
Cabbage	Collard	Garlic	Horseradish
Kale	Kohlrabi	Leek	Onion
Pea	Radish	Rhubarb	Shallot
Spinach	Turnip		

COOL SEASON CROPS AFFECTED BY FROST			
Beets	Carrots	Cauliflower	Celery
Chard	Chinese Cabbage	Endive	Lettuce
Mustard	Parsnip	Potato	Swiss Chard

WARM SEASON CROPS			
Cantaloupe	Cucumber	Pumpkin	Tomato
New Zealand Spinach	Pepper	Sweet Potato	Squash
Sweet Corn	Lima Bean	Watermelon	Eggplant
Snap Bean			

Microclimate

Nursery labels generally indicate whether a plant likes full sun (six-plus hours of direct light each day), part sun/part shade (three to six hours of direct light each day), or full shade (little to no direct light, though dappled sun is fine). Noting the sun exposure in different areas of your yard provides a baseline understanding of microclimates, but smart gardeners elevate that understanding to a refined science.

As you begin to pay close attention to the climatic conditions of your yard and neighborhood, you may notice significant variations: cooler on one street, hotter on the next, dry on one side of the house, wet on the other. Those variations determine the microclimate of a given location. Many gardening failures result from not paying attention to microclimates. It might be sunny outside, "but that doesn't mean your plants are getting sun," Ron says.

Unlike the broader climate, which is influenced by global weather patterns, you can exert a degree of control over the microclimate of your garden. In the northern hemisphere, south-facing slopes warm up earlier in spring and stay warm later in fall—a longer growing season, in other words, and a wise location for your garden. The land doesn't need to be sloped in order to take advantage of this effect. Planting your garden on the south side of your house (or any other building, wall, or solid fence) directs extra solar energy onto your crops.

Conversely, a north-facing exposure has a shorter growing season. Western exposures, which face directly into the sun at the hottest time of day, can also be detrimental, especially for crops that do not tolerate high heat—these are better suited to the east side of your house (or the east side of a tree) where they will receive shade in the late afternoon.

Ron believes that no one is born with a black thumb. Struggling to grow a particular crop? "A lot of that isn't you," he says. "It might be where you decided to put your garden."

Assignment

In order to decide where to plant what, begin keeping a garden journal, noting the microclimate conditions you observe. Go beyond a hot/cold analysis and take note of where the wind comes from (better to plant sensitive vegetables in a spot where they have protection from prevailing gales) and drainage (avoid planting crops in swampy places where water pools after a storm). You may also note wildlife activity, soil quality, and any design inspirations that arise. If you'd like, transfer these observations onto a map of your yard and begin to pencil in areas for different garden elements, including vegetable beds, fruit trees, herbs, trellising, benches, a water feature, a fire pit, a pizza oven—imagine how you want your garden to look and feel.

SECRETS OF THE SOIL

GANGSTER GARDENER WISDOM

“Soil is everything.”

It's often been said that smart gardeners don't worry about raising healthy crops. They work on improving the health of their soil, which in turn provides everything a plant needs to be healthy.

Lingo

Compost
Organic material that is added to soil in order to help plants grow.

Loam
Soil with a healthy balance of clay, silt, and sand.

pH
The measure of acidity and alkalinity expressed on a scale from 1 (most acidic) to 14 (most alkaline); the optimal pH for most food plants is 5.5 to 6.5.

Black Gold

Imagine yourself in a forest, says Ron. You pull back the duff beneath a massive old tree and dig your hands into crumbly, dark earth. It's moist but not soaked, even after days of rain. It holds together when you squeeze it, but it's also loose and fluffy, almost like a sponge, even in a drought. This, says Ron, is what you're after.

Most of us, however, are starting out with less than ideal soil conditions. That's because the homes we live in are often on land that was long ago scraped off its topsoil by a bulldozer. The subsoil that remains is devoid of microbial life and worms. It's like pottery clay: When it's wet, it's dense and difficult to work with, and when it's dry, it's hard as a brick. As a gardener, Ron says, your job is to help soil get back to its natural state: "It's what is going to allow you to plant some healthy shit."

The first step in this journey is to understand your soil's texture. There are three main components of all soils—clay, silt, and sand—but they come in various proportions in different locations.

Clay refers to the tiniest soil particles—so tiny, you can't see them with the naked eye. Soils with a high clay content are effective at holding moisture and nutrients, but they tend to drain poorly, leading to fungal diseases for your plants.

Sand refers to the largest soil particles. High sand content means the soil dries out quickly and has difficulty retaining nutrients—also a problem.

Silt particles are intermediate, bringing together the best qualities of clay and sand.

Soil with a good balance of clay, sand, and silt is called **loam**. With loam, says Ron, "roots don't have to fight so much to get through the soil." They can put their energy into growth instead, he adds. "The bigger your roots are, the healthier your plant is."

The Other Kind of Organic

Some gardeners add sand or clay to their soil to balance it out. But most of the time gardeners add a different substance that brings balance and fertility to any soil type: organic matter. Organic matter is anything that was once living, whether plant or animal. It is what feeds the worms and microbes that make soil come alive. "Like when Bambi dies or some shit in the forest [and] no one buries it," Ron says, "it decomposes back into the soil."

You probably won't be adding Bambi as a soil additive, but you'll definitely want to incorporate other forms of organic matter, like leaves, kitchen scraps, and manure. In other words, **compost**.

Compost helps sandy soil hold water and nutrients and improves the drainage of clay soil (making it easier to work with). Most importantly, it accelerates the rebuilding of topsoil, which erodes at an astonishing rate. "Compost is the best thing you can do for the planet," says Ron.

Composting is simply accelerating the natural process of decomposition. Everyone has their favored method, but they all boil down to one thing: getting the right balance of what composting aficionados refer to as "greens" and "browns."

Greens refer to compost ingredients that are high in nitrogen, such as grass clippings. But this oft-cited gardening jargon is confusing, as not all "greens" are green—manure is high in nitrogen, as are old carrots, eggplant skins, coffee grounds, and most other kitchen scraps.

Browns refer to compost ingredients high in carbon, and most of these are actually some shade of brown: sawdust, straw, fallen leaves, and so on.

When building a compost pile, aim for a ratio of roughly two parts brown to one part green by volume. Compost piles are generally built in layers, so if you add a one-inch layer of nitrogen-rich material, cover it with a two-inch layer of carbon-rich material. Make sure the pile stays moist but not wet, and periodically mix the ingredients with a pitchfork to keep the pile well aerated.

Most importantly, says Ron, don't stress out about it too much: "Compost is really not that difficult. You don't really have to do anything." If your pile is perfect, it will break down into black gold in as little as three months. But don't worry if yours is imperfect, he advises, as it will eventually decompose no matter what you do: "Guess what, it's going to happen. So just do it."

WHAT THE HECK IS WORM TEA?

Vermiculture, or the use of worms to aid in composting, is popular among gardeners with limited space. Most garden centers carry worm bins, which typically hold material in three varying degrees of decomposition (you can order worms themselves online from sites such as unclejimswormfarm.com). Worm bins fit easily on a patio or deck—some models are small enough to fit under a kitchen sink—and give off little to no odor. The worms eat your kitchen scraps and poop out worm "castings," which can be spread like fertilizer in the garden. Soak the worm castings in water (one part castings to 10 parts water) and you have worm tea, a popular liquid fertilizer for your whole garden that can even be sprayed onto plants.

Making Your Bed

The first step to creating a garden bed is clearing away the existing vegetation. Weeds may be pulled by hand. Just make sure you get the roots so they don't resprout. If you're starting with a lawn, you may want to rent a gas-powered sod cutter to remove the grass.

Then you need to prepare your plating space. Ron isn't a fan of tilling unless it's absolutely necessary—digging can disrupt life beneath the soil (from worms to beetles to bacteria), which isn't ideal. Instead he suggests no-till gardening: Once you've removed the debris and grass away, spread a thick layer of compost on the growing area (at least four inches thick). If your weeds are particularly stubborn, you can also try sheet mulching, or the process of using cardboard to compost weeds while preserving soil structure. It's best if the beds you create are no more than four feet wide so you can reach into the center without stepping onto the soft soil and compacting it, undoing all your hard work.

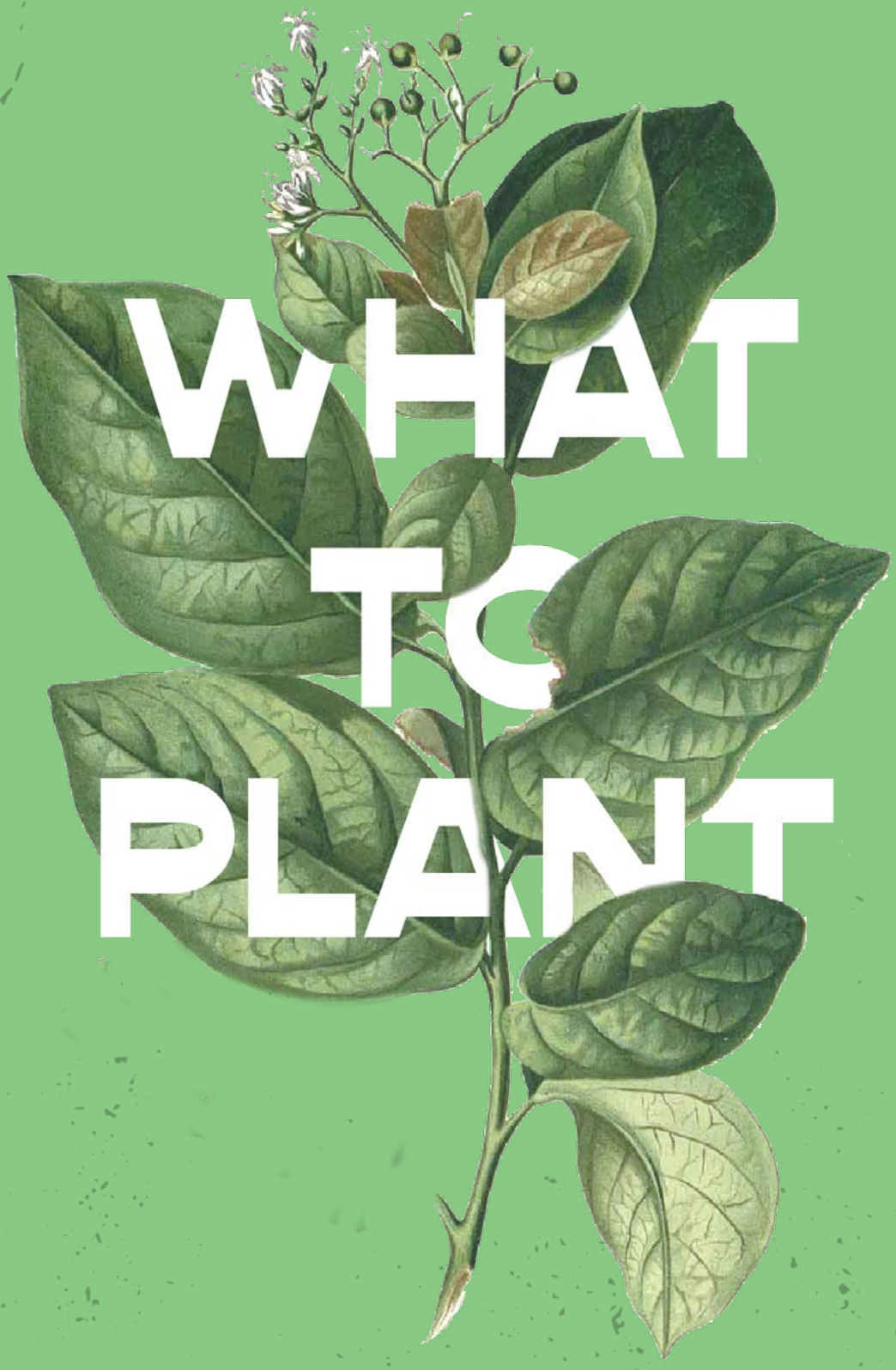
Now you're ready to plant!

GETTING DOWN AND DIRTY WITH SOIL TESTS

Before starting a garden, Ron recommends a soil test, which can be obtained for a small fee through your local USDA cooperative extension office (these are run through the nation's land grant university system; find the one closest to you at nifa.usda.gov). In addition to identifying the proportions of clay, sand, silt, and organic matter in your soil, you'll learn if your pH level is off and whether you have any nutrient deficiencies. You'll also receive instructions to correct any imbalances. Ask for a test that covers toxic substances that are occasionally found in the soil, such as lead and arsenic. If toxins are found above safe thresholds, do not plant edibles in the soil. Instead, grow food in raised wooden planters with a barrier on the bottom that prevents the roots from getting into the ground below.

Assignment

Collect compost ingredients from home (the remains of a juicing spree, say) and around your neighborhood. This might include bags of leaves that people rake up and leave on the curb, sawdust from a wood mill, coffee grounds from a local roaster, or spent grains (a byproduct of beer making) from a local brewer. You can also seek out manure from a farmer or equestrian center, but if you do, it's wise to ask whether the animals have been treated with antibiotics or other substances that you don't want in your garden. Then, begin your compost pile.



WHAT TO PLANT

GANGSTER GARDENER WISDOM

"I know a lot of people out there don't like leafy greens. I don't either. But put them in your diet anyways."

What do you like to eat? It's perhaps the most important consideration in deciding what to plant, but not the only one. Think about what grows well in your area, how much space you have for a garden, and how much time you have to maintain it. And as Ron says, plant some kale, even if you don't like it.

Lingo

Biennial
A plant that completes its life cycle over the course of two years: vegetative growth during the first growing season followed by flowering and seed production the next year.

Bolt
The phase of an annual plant's life cycle during which it develops a flower stalk, signaling the transition from the vegetative phase to flowering and producing seed.

Cover crops
Plants grown to enrich the soil rather than for harvesting.

Cross-pollination
When one plant pollinates another individual of the same species.

Eye
A growth bud on tubers that is capable of producing roots and shoots when planted. (Ron refers to these as "sprouts.")

Integrated pest management
The use of natural pest control strategies, such as encouraging beneficial insects that prey on plant pests.

Nitrogen fixation
The process of converting atmospheric nitrogen into a soluble form usable by plants as fertilizer; bacteria living on the roots of leguminous plants perform this essential ecological function.

Self-pollinating
Plants that can pollinate themselves and do not require another specimen nearby to produce fruit or seeds.

Herbs

Herbs offer the closest thing to instant gratification in the garden. They are among the easiest edibles to grow, and you can start harvesting little snippets of seasoning almost right away, says Ron: "Herbs, a lot of times, is what separates your dishes from someone else's."

A small number of herbs are summer annuals (basil, dill, and cilantro being prime examples). These mature quickly and can be planted every 30 days to ensure a fresh supply: heat-loving basil and dill in the warm months, cilantro in spring and fall. But most herbs are low-maintenance perennials—including rosemary, sage, thyme, oregano, lavender, savory, chives, tarragon, mint, and fennel—meaning you can plant them once and harvest for years (parsley, a **biennial**, lives for two growing seasons). Some herbs, such as rosemary, can grow to the size of an armchair, but if you're short on space, you can pack several different perennial herb seedlings in a single window planter and they will grow just fine, albeit dwarfed.

Window planters are Ron's favorite places to grow herbs. For convenience, install a few in your kitchen window. "You can cut [herbs] right there when you need them," he says. This is a garden that nearly anyone can manage. "I have a lot of friends in New York and they always ask me what can they grow on their fire escape or their windowsill. I always tell them: herbs."

Greens

Greens are arguably the second easiest edible to grow. A four-by-eight-foot planter full of them is enough to keep a family of four stocked with salad fixings. It can take months for a head of lettuce or cabbage to fully mature, a waiting game during which a lot can go wrong (from aphids and slugs to hungry rabbits and heat waves), which is why many gardeners hedge their bets and harvest "baby" greens (immature versions of the full-size crop). These tender specimens may be picked in as few as 30 days from when the seeds are planted.

Perhaps the most important thing to know about greens is that they love cool weather. Plant them as early in spring as possible—once temperatures are consistently in the 80s, most will cease to grow and prepare to **bolt**, the horticultural term for sending up a flower stalk and setting seed. This causes the greens to become bitter. You can sow a second crop in late summer that will mature in the cool of autumn. Spinach and arugula are among the most heat-sensitive greens, while kale and collards are hardy enough to survive the heat of summer and rebound in fall without replanting.

HOW TO MAKE RON'S KALE CHIPS

Ron doesn't try to hide the fact that he's not a big fan of raw greens, but he can get behind some kale chips when they're done right (aka when he makes them himself). This snack works best with "curly" kale rather than flat-leaf varieties.

INGREDIENTS

1 head curly kale
2 tbsp. olive oil
Salt, pepper, and other spices of your choice to taste

METHOD

Remove the kale leaves from the stems and rip the leaves into roughly 2-inch pieces. Make sure the leaves are as dry as possible. (If you grew the kale organically in your garden, you probably don't need to wash it, but if you do opt to wash it, pat it dry and run it through a salad spinner.)

Toss the shredded greens in a bowl with the olive oil and season to taste with salt, pepper, garlic powder, cayenne, or any other spice or herb of your choice.

Once spiced, spread the kale pieces in a single layer on baking sheets lined with parchment paper.

Bake at 300°F for 15 to 20 minutes or until the edges of the leaves begin to brown.

Legumes

Like greens and herbs, legumes grow vigorously with minimal effort. English peas and sugar snap peas like the cool weather of early spring while most beans should not be planted until mid or late spring, when the weather warms up.

Most beans and peas grow on a short vine and require a trellis, for which there are many options: an existing chain-link fence, a tipi of bamboo poles, a decorative arbor from your local garden center. The options are endless, and the vines are light and short-lived, so you don't need to worry about building something sturdy or permanent. The most important thing is guiding little legume seedlings toward the bottom of the trellis (once they've latched on they will pull themselves up). Alternatively, plant "bush beans," which have been bred to grow in a short, stocky shape, eliminating the need for a trellis.

COVER CROPS: THE MIRACLE OF NITROGEN FIXATION

Ron likes to let novice gardeners in on a little secret about legumes: They produce their own fertilizer and even provide it to other plants growing nearby. Legumes have evolved in symbiosis with bacteria that live on their roots and possess the almost miraculous ability to convert nitrogen from the air—where it is abundant but of no use to the plants—into a soluble form that roots readily absorb. This is known as nitrogen fixation.

Nitrogen is the element responsible for lush green growth in plants, but it is in short supply in most soils, which is why farmers and gardeners often add manure or synthetic fertilizers. Beans and peas add nitrogen to the soil, though one can also plant cover crops—inedible species grown in the off-season for the purpose of replacing the nutrients consumed by harvested crops. Common nitrogen-fixing cover crops include clover, vetch, and broad beans. Cover crops are essential for restoring degraded soils.

Root Crops

Root crops are a diverse bunch. Beets, radishes, carrots, and turnips are easy-to-grow, fast-maturing cool weather crops that provide a worthwhile harvest even in a small space. Sweet potatoes, Ron's favorite root crop (he encourages you to eat its edible leaves in addition to the tubers), grow as a sprawling, vine-like ground cover and require a long, hot growing season. White potatoes also sprawl widely but love cool weather; plant them as soon as the ground thaws inlate winter. Onions and garlic scarcely take up any space and are among the rare crops that are typically planted in fall for a spring harvest—the bulbs overwinter underground.

The Rest of the Vegetables

Vegetables that do not fall into the above categories tend to be a bit more difficult to grow. These include cool season crops like brussels sprouts, broccoli, cauliflower, and asparagus—species harvested for their edible stems and buds. And then there's corn, a summer crop grown for its edible seed that is in a category of its own.

But mostly we're talking about vegetables that, technically speaking, are harvested for their fruit—though not necessarily in the sweet sense of the word. Tomatoes, peppers, eggplant, cucumber, squash, zucchini, sweet melons—virtually all of these require a long, hot growing season for their fruits to develop optimum flavor.

GROW YOUR POTATOES IN A SACK (LIKE A GANGSTER)

Among gardeners, growing potatoes has built up a reputation as backbreaking work. First, you must thoroughly loosen the soil to a depth of 12 inches (deeper than what most crops require) and mix in large quantities of compost. Then, when you're ready to harvest, you have to dig again, and it's almost impossible to fish all the tubers out of the soil without cutting many of them with your spade.

Ron has a better method (this works for white potatoes and sweet potatoes):

1. **Obtain as many used large burlap bags from a local coffee roaster as you can (they're usually available for free).**
2. **Double up the bags and roll down the edges about 8 to 12 inches.**
3. **Fill the bags with potting soil.**
4. **Cut store-bought potatoes into two-inch chunks, making sure there is at least one "eye" on each chunk (for best results, use organically grown potatoes, as conventional potatoes are often treated with growth inhibitors).**
5. **Plant the potato chunks about 6 inches deep in the soil, 6 to 8 chunks per bag.**
6. **Place the bags on the ground and water thoroughly. Water again whenever the top few inches of the soil dries out.**
7. **The aboveground portion of the potato plants will grow for several months, eventually producing purple or white flowers. After the flowers have faded and the foliage begins to die, the sack is ready to harvest. This part couldn't be easier, says Ron: "Cut the bottom open and the potatoes just fall out."**

Truth be told, a lot can go wrong with this class of veggies. The list of diseases that affect tomatoes could fill several pages. Melons and brussels sprouts are quite finicky when it comes to soil conditions and temperature. Cucumber plants become heavy when fully laden, making a stout trellis necessary. And almost every one of these crops needs ample garden space to produce a worthwhile harvest. The peculiar pollination requirements of corn, for example, prevent the ears from filling with kernels unless you devote at least one four-by-eight-foot bed to the plants.

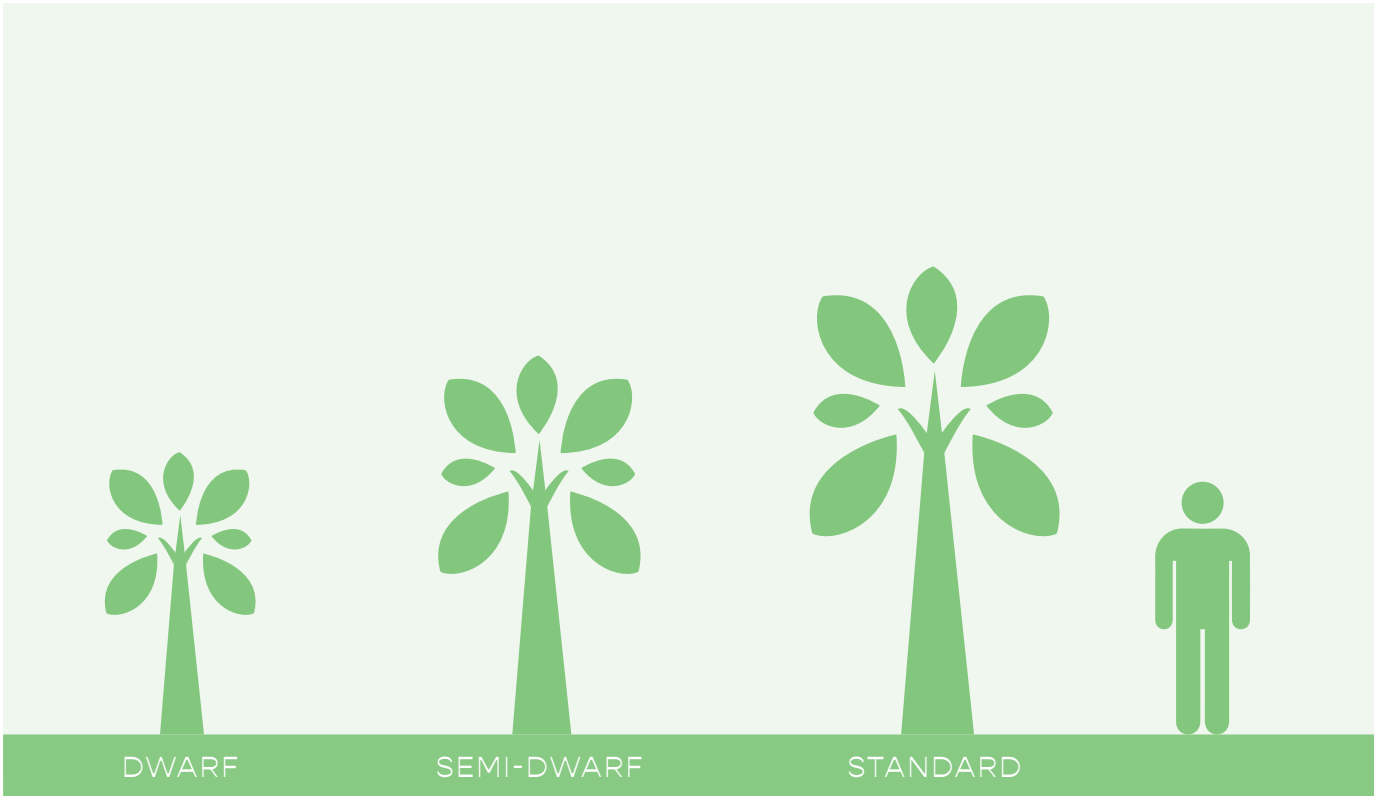
Not that there aren't some options for small spaces, such as dwarf cherry tomato plants (often referred to as "patio" tomatoes) and cute, colorful cayenne plants. And just because many crops require a bit of determination, it's by no means a reason not to grow them, says Ron: "Don't be afraid to fail, because it's not really failing—you're learning."

Fruits

Fruit crops and patience go hand in hand. Virtually no fruit crop produces the same year you plant it, but the upshot is that once it begins fruiting, it can continue to do so for years.

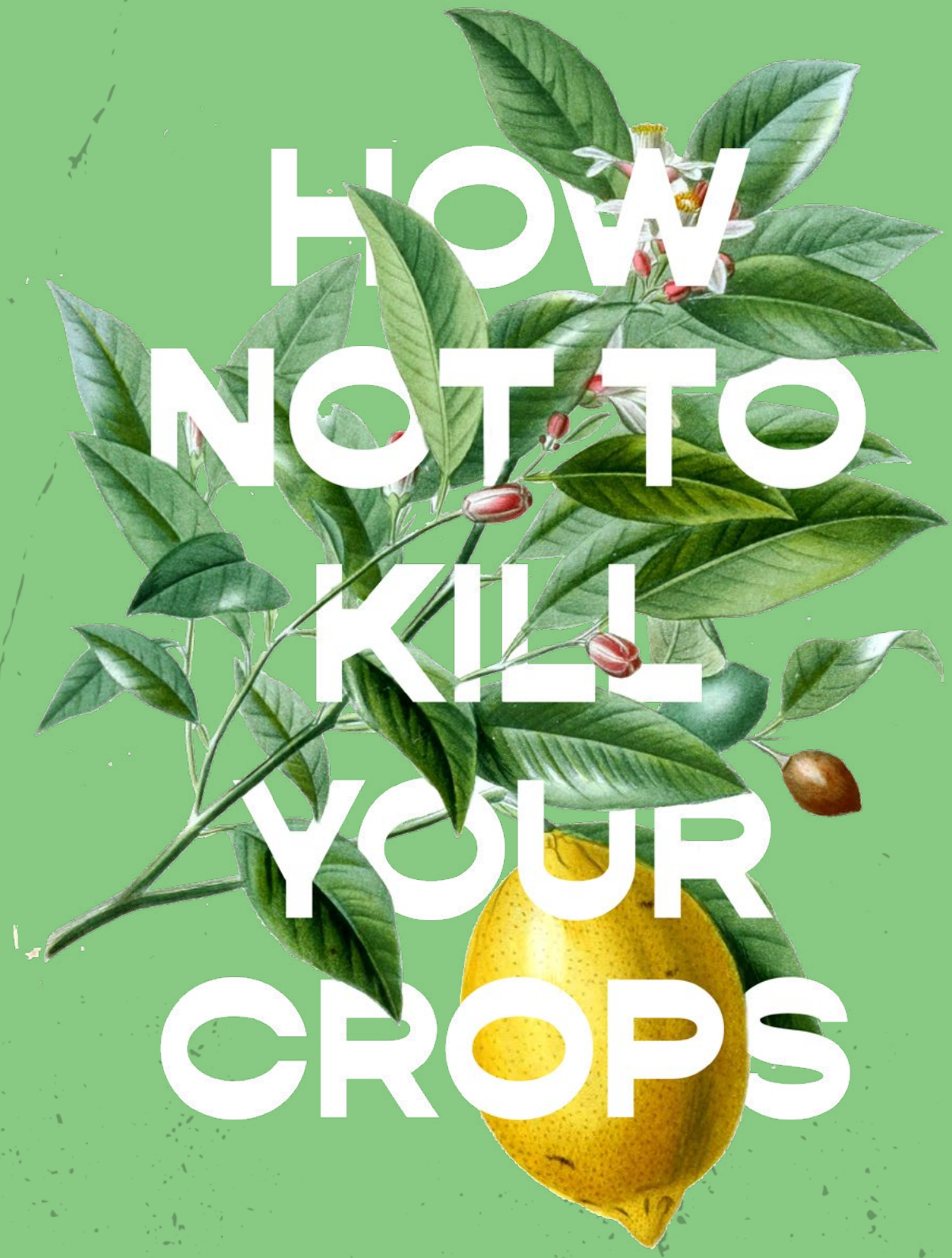
Strawberries are among the only fruits suitable for small spaces. They grow as a low ground cover; they may even be cultivated in window planters. If you have a bit more space, consider blueberries, blackberries, and raspberries, which are small enough to grow in pots on a large patio or deck. A berry patch comprised of two or three plants of each type will eventually produce enough to eliminate these expensive fruits from your family's grocery bill. Most fruit trees are available in "dwarf" form; typically reaching about six feet in size, these may also be grown in large planters. "Semi-dwarf" fruit trees grow to 10 to 15 feet tall, while full-size fruit trees (often referred to as "standards") reach 20 feet or more (see illustration at right). Nut trees are even larger, ranging from 20 to 60 feet, depending on the variety.

Many fruiting plants are attractive through the seasons, with gorgeous flower displays in spring and stunning fall foliage. Rather than sequestering them in a backyard orchard, consider incorporating them in the landscape as you would traditional ornamental plants: Apples and pears make lovely shade trees; blueberry bushes function as shrubbery; grape, kiwi, and passionfruit vines are just as graceful stretching atop an arbor as they are clinging to a chain-link fence. But be forewarned—many fruiting plants must be grown in pairs to ensure **cross-pollination**, and they often fail to produce good, quality fruit without skillful annual pruning.



Assignment

Take a break from toiling in the soil, find a shady place to lounge, and break out some seed catalogs. Seed companies will happily mail you a free copy of their latest edition. There is perhaps no better horticultural education than immersing yourself in the nuances and details found in this surprisingly rich reading material: heirloom tomatoes from Kazakhstan, historical lore about obscure African melons, planting depths for parsnip seed, pest control tips for zucchini, and so on. Some good catalogs to start with are Baker Creek, Seed Savers Exchange, Southern Exposure Seed Exchange, High Mowing Seeds, and Johnny's Selected Seeds.



HOW NOT TO KILL YOUR CROPS

GANGSTER GARDENER WISDOM

“These white moths that people think are butterflies? They think they’re sexy. They’re not—they’re assholes.”

Many creatures want to kill your crops. You might feel like declaring chemical warfare, but it's best to focus on creating the best possible growing conditions, and then let nature take its course.

Lingo

Drip irrigation
A system of tubing that directs small quantities of water precisely where it's needed, preventing the water waste associated with sprinkler systems.

Grow light
Special light bulbs that provide a full spectrum of light to mimic the sun. Grow lights are used to promote healthy plant growth indoors.

Heat mat
A warming device placed under trays of seedlings to encourage quick germination and growth.

Sow Wisely

So you've identified the best spot in the yard for a successful garden. You've formed fat, fluffy beds of crumbly compost-rich earth. You've agonized all winter over what to plant, burying yourself in seed catalogs as you come up with the perfect planting plan for the coming months. It's time to put the first crops in the ground—now a new set of questions arises.

For starters: seeds or seedlings?

Growing food from seed is one of life's miracles. Rather than sowing seed directly in an outdoor garden bed—where birds and any number of other critters may eat them for dinner—consider mini greenhouses, seed trays with covers, or even sowing your seeds indoors. Planted in tiny pots in a sunny window, your seeds will be cozy and safe, allowing you to begin growing in late winter as you wait for the weather to warm. You'll find **heat mats**, **grow lights**, and other paraphernalia at garden suppliers to ensure the seeds germinate and get off to a good start. Wherever you plant your seeds, make sure to sow them at the proper depth (check out this handy guide that outlines the planting depth for different seeds), tamp the soil firmly over them with the palm of your hand, and water them whenever the surface of the soil dries out.

Some seeds are stubborn about sprouting; others take ages to develop into healthy plants ready for the harsh outdoor world—which is why Ron won't judge you if you cheat and go to your nearest nursery to buy seedlings grown in a commercial greenhouse. The easiest plants to grow from seed, he says, are those with large seeds, including peas, beans, corn, squash, melon, and cucumbers (Ron recommends soaking the seeds for these plants in water overnight before planting to catalyze the germination process). Many small-seeded crops, including most greens, tomatoes, peppers, eggplants, broccoli, cauliflower, and brussels sprouts, are more difficult. Some small-seeded crops are a bit more forgiving, such as carrots, beets, radishes, and turnips. White potatoes and sweet potatoes are not grown from seed at all but from chunks of potato. Onions and garlic are typically planted as bulbs.

But be careful when shopping for seedlings, Ron warns. You don't necessarily want the biggest plants in the batch, as these are often "root-bound." With a dense thicket of roots beneath the soil, these seedlings have outgrown their pots and might not transition well into the garden. "My analogy for that is—it's like living in a box," Ron says. "If you live in a box with all your thoughts all your life, your mind starts shrinking." Roots, he explains, "want to grow and they want to expand. It's the same way you should think about your life and your brain."

PLANT YOUR BABIES WITH LOVE

Handle seedlings with the utmost care. When planting, turn the pot over while putting your hand on top of the soil with the stem between your fingers. Gently squeeze the pot on all sides and shimmy it off. Grasp the mass of soil in your hands and massage it lightly until the roots are no longer stuck in the shape of the pot. If the plant is root-bound, you'll have to massage it more vigorously, perhaps even using a knife to loosen the mat of roots. Finally, use your hands or a small trowel to create a hole in the soil no bigger than the root mass. Position the plant, cover the roots with soil (making sure not to cover any part of the stem in the process, which is a death sentence for many types of plants), and press it firmly into the earth. Repeat, and voilà! You planted a garden. Now make sure to water everything thoroughly so your little babies don't get heatstroke.

Is That a Shoe or a Flower Pot?

Ron is a huge fan of container gardening. Whether you grow in a tiny pot or a giant wooden planter, you won't have to worry about tilling up the soil. Weeds are less likely to sneak in, and the planting surface is elevated, so you won't be stooping down as much. Plus, it's an opportunity to get creative and reduce waste.

Ron has fashioned planters out of all sorts of found objects, from sneakers and suitcases to dresser drawers and shopping carts. You will have the added expense of purchasing topsoil to fill these objects, but this could be a worthwhile investment if the ground in your yard is as hard as a brick.

Ron cautions against upcycling any container that could leach toxins into the soil. Greens and herbs require only six inches of container depth, while most other vegetables prefer 12 inches. Growing in containers, says Ron, is a smart way to be a lazy gardener. "You can buy the soil that you want, and you know exactly what's in there. It saves time, and your back doesn't hurt." Container gardening offers instant gratification: Fill the container with soil, plant, and you're done. "You can cut to the chase and then go have"—Ron says with a mischievous laugh—"whatever your preferred drink is."

Primping, Pampering, Pruning

Like people, plants respond well to TLC. Keep your garden well-watered but not soaking—excess moisture promotes fungal diseases. It's best, in fact, to avoid wetting the foliage. Water directly onto the soil instead. This is easy to do when watering by hand, but if you want to automate things, opt for a **drip irrigation** system rather than sprinklers. Keep the garden free of weeds and your plants will love you back.

Mulch is your friend. By covering the soil with organic matter, weeds have a hard time germinating and the earth is kept cool and moist. Worms and other beneficial soil creatures love mulch; as it decays, it becomes fuel for the soil food web, just like compost. It's important to match the right type of mulch with each crop. Wood chips are ideal for fruit trees, shrubs, perennial flowers, and other large, long-lived plants. Dainty little vegetables prefer less weighty mulch, such as straw or leaves.

There is a seasonal rhythm to garden maintenance. Spring is all about keeping the weeds from getting a toehold. Summer requires extra vigilance to keep the garden well-watered. Fall is the season for cutting things back and cleaning up. Throughout the growing season, pay attention to what the plants tell you. A yellow or deformed leaf is a sign that you should clip it off. A plant collapsing under its own weight is calling out for staking. Dense, overgrown vegetation demands careful pruning to open things up so that sunlight and fresh air can circulate—just like people, plants want to look and feel their best.

COMPANION PLANTS

You already know Ron as a gangster gardener, but you might also think of him as a gangster ecologist. A successful garden, in his view, is one that emulates nature, with the soil, plant life, and insects all working together as a harmonious whole. This means that while some crops may succumb to pests and disease from time to time, natural checks and balances keep the overall system healthy—without having to resort to chemicals.

Ron recommends planting herbs and flowers throughout the garden in order to imbue the environment with their healthful qualities. "Growing mint can help you if you have an ant problem," he says. "Lemongrass has citronella, which mosquitoes hate. Lavender will attract bees, which are awesome, but it will repel other bugs."

You can also engage in some companion planting to keep out bugs that would otherwise feast on your crops. "Marigolds," Ron says by way of example, "will help get rid of mosquitoes, whiteflies, and nematodes." This form of integrated pest management is a time-tested, practical way to maintain a healthy garden while filling it with sumptuous blossoms and seductive scents.

Organic Warfare

The goal of garden maintenance is not to create a sterile environment where your crops are the only living things. Chemical insecticides kill pollinators and predator bugs (insects that eat the insects that eat your plants) along with the bad guys. And weeds can play an important role in soil building—you definitely don't want them competing with your lettuce seedlings, but around larger trees, shrubs, and vines, weeds might actually be useful.

Soon enough, however, all gardeners find themselves going toe-to-toe with creatures whose presence they are unwilling to tolerate.

You may come out in the morning to find that the stems of all of your tender carrot seedlings have been clipped by earwigs. Slugs and snails can devour a bed of lettuce seedlings as a midnight snack. Aphids will suck the juices out of kale and broccoli shoots. If insects weren't enough of an issue, you have a whole army of mammals to worry about: deer, squirrels, raccoons, rabbits, birds, gophers, and more.

At your local garden center you'll find chemicals to wipe out nearly any garden enemy. But if chemicals aren't your thing, you still have options. To kill slugs, fill shallow plastic containers with beer and leave them recessed into the earth so that the top of the container is flush with the soil—attracted to the nutrient-rich liquid, these slimy critters will slither in and drown. Aphids can be kept under control by spraying infested plants with diluted liquid soap (a ratio of five tablespoons of soap per gallon of water works well—use an all-natural Castille soap, such as Dr. Bronner's). The only surefire method to keep mammals out is a physical barrier. Depending on who's nosing around the garden, you may find you need fencing not just around the perimeter of your beds but on the top (use lightweight plastic mesh to exclude birds) and bottom as well (install galvanized steel mesh under your beds to keep ground-dwelling rodents from burrowing in).

If you give a pest an inch, it'll take a mile, so the best strategy is to nip infestations in the bud (plant pun certainly intended). Inspect your garden daily for signs of damage. Many insect pests lay eggs on the underside of leaves, so be sure to remove any you come across before they hatch. And if you see small white butterflies in the garden, beware—as Ron says, these are likely moths in the process of laying eggs that will soon hatch into little worms with a big appetite.

Assignment

After you've figured out what you want to grow—based on a combination of what you like to eat and what you think will grow best in your location—create a seasonal planting plan (this garden space planner, this resource detailing space requirements for different crops, and this seasonal planting plan can all help you get started). You might even try out the square-foot method, an approach to help you pack as much produce as possible into small spaces.

Put all of your newfound knowledge into practice: What are the earliest crops that you can plant, and when should you expect to harvest them? After those crops have completed their life cycle, what can you plant in their place? Crops that mature quickly can be planted two or more times in a given growing season for a staggered harvest. Plants that start small but will grow to enormous proportions, such as tomatoes and squash, can be surrounded by fast-maturing crops that you'll be able to harvest before the big guys grow into that space.

Think carefully about how to maximize your garden's bounty, but also plan for beauty—remember, many ornamental plants repel pests while attracting pollinators and other beneficial insects. Flowers will also draw *you* into your garden, helping to ensure that it is well-tended.

PROPAGATE YOUR WAY TO SELF-SUFFICIENCY

GANGSTER GARDENER WISDOM

"We need to exceed man's need for greed and change that to man's need for seed."

You can spend a small fortune buying plants. But you can also make more plants from any that you have on hand—or any that you can get your hands on, whether from a neighbor's yard, landscaping at the mall, or even a park. The key is knowing the best way to propagate the plants you desire.

Lingo

Asexual reproduction
The cloning of plants by grafting, cutting, or other means of propagating the genetic material of a single specimen.

F1 hybrid
A class of fruits or vegetables produced by crossing two distinct varieties. The offspring produced contains the DNA of both parent crops. One prime example is the tangelo, which contains genetic material from a mandarin orange and a grapefruit tree.

Perlite
A horticultural product resembling a small Styrofoam ball. Perlite is produced by heating a volcanic mineral and is often used in potting soil and for propagation purposes.

Pup
A side shoot that can be separated from the mother plant with its own set of roots attached.

Rooting compound
A substance that stimulates the growth of roots from stem cuttings.

Sexual reproduction
The process of propagating plants by seed during which genetic material is exchanged between two individual specimens.

Sucker
A stem that sprouts from the roots of an established tree or shrub that's some distance away from the new shoot.

Seed Saving

"Propagating is cool as fuck," says Ron, whose enthusiasm for this horticultural practice knows no bounds. "Why is propagating so cool? Look around you." Every plant you see, whether Mother Nature put it there or a person planted it, is the result of botanical reproduction. And while it may seem mysterious, botanical reproduction is not rocket science—you can easily master the basic techniques. And once you do, Ron says, "you don't have to spend all your money at the nursery."

The most basic propagation method is collecting the seeds that your plants produce and saving them to sow the following year. For leafy vegetables, this means not harvesting some of the crop. If you want lettuce seed, for example, leave a few heads in the ground (always select healthy specimens when propagating) to go to seed. At some point, after the greens become bitter and faded, a flower stalk will appear. Once the flowers dry up, you'll find tiny seeds at the base of the shriveled blossoms. Leave the seeds attached to the stalk until it too begins to shrivel and turn brown. Then carefully place a paper bag over the end of the stalk where the seeds are, cinching the bag beneath the seeds while cutting the stalk below. Shake out the seeds into the bag. You might need to rub the seed heads between your fingers to encourage them to release their treasure.

Saving the seed of fruiting vegetables (like eggplants) is slightly different. Allow the vegetable to ripen on the plant slightly past the point when you would normally harvest it but before it becomes rotten. This ensures that the seeds inside have time to fully mature. Slice open the vegetable and remove the seeds. Spread them on a plate or paper towel and leave them to dry in a warm room. Once your seeds are completely dry, store them in envelopes or glass jars.

It's important to note, however, that there are a few crops, like corn and squash, that won't necessarily propagate "true to seed." Say you're cultivating a butternut squash and a delicata squash in close proximity. Cross-pollination between the two—facilitated by a bee or a breeze, not by you—can result in seeds that grow into squash Z (a butternut-delicata hybrid, which will be a mix of characteristics from both varieties). There are tricks to prevent this, but the simplest method for saving corn and squash seed that grows "true" is to grow one variety at a time.

Plant breeders often *intentionally* hybridize different varieties to produce a third variety with certain desirable traits. These hybrids are popular among gardeners, but if you save seed from them, the resulting plants may not resemble their parents. Seed packets and seedling labels generally indicate whether the plant is a hybrid. Sometimes it's spelled out in plain language, but you'll often see **F1** printed next to the variety name, which is essentially botanical jargon for "hybrid."

If you're ready to save some seeds, try tracking your propagation using this seed harvest tracker.

Division

Seed is the product of **sexual reproduction**, botanically speaking. But unlike humans, plants are also capable of **asexual reproduction**. This amounts to little more than removing a portion of the plant and growing it elsewhere. The easiest way to do this is division, which refers to separating a small portion of the plant that has its own roots attached. The roots allow the new plant to begin absorbing water and nutrients immediately.

Division only works with plants that grow in clumps. One cannot divide the trunk of a pecan tree, for example, or the single stalk of a sunflower. Clump-forming plants, which include many perennial flowers and bulbs, produce numerous stems from a broad mass of roots. Simply slice off a stem or two with roots attached and transplant them. Many succulents also grow as clumps, with small offspring called **pups** clustered around a central mother plant that may be removed for propagation. Similarly, some trees and shrubs produce **suckers**—stems that emerge from the root system away from the original trunk—which can also be transplanted.

Cuttings

A second method of asexual reproduction allows you to reproduce plants from which a stem with intact roots cannot be separated. In a miracle on par with that of a germinating seed, it is possible to cut off a stem or branch of a mature plant, stick it in the ground, and watch it grow roots and new shoots. "It sounds crazy, but you have to trust me," says Ron. "This is going to work." (If you've never heard of such a thing, here's a list of plants that are easily grown from cuttings.)

While this is theoretically possible with any plant, some species grow roots more readily from their stems than others. Willow trees are notoriously easy to propagate this way—stick the end of a branch in a bucket of water, and a few weeks later you'll see an extensive root system forming. Cuttings from many shrubs, perennials, and trees will form roots when placed in water, while others root more easily in soil. You may also use **perlite** as a rooting medium. Succulents and tubers are among the easiest plants to propagate by cuttings. Do some online research to find the best approach for different species, or just try your luck. Either way, adhering to a few basic procedures will increase your chances of success:

1. Use a good, quality pair of scissors or garden pruners to make the cleanest possible cuts. You need at least two nodes—the bumps on stems and branches where leaves and side shoots emerge—on each cutting. That's because you need at least one node below the soil or water (this is where roots will form) and one node above (where new shoots and leaves will grow).

2. Remove all but two leaves from the stem, as too much greenery may drain the moisture needed to grow roots. If the cutting dries out before roots form, you're out of luck (the remaining leaves should be at the tip of the cutting—if they are large, cut them down to the size of a bottle cap).

3. Lastly, you may wish to invest in a jar of **rooting compound**, which contains naturally occurring hormones that stimulate root growth.

If you see a plant you like while you're out and about, don't be shy! Ask the owner if you can snip off a piece. Get your cuttings home as soon as possible, ideally wrapped in wet paper towels for transport. Moisture retention is paramount—Ron even suggests placing glass or plastic containers over your cuttings to form a mini greenhouse. This will hold humidity around the cutting while you wait for it to form roots, which can take anywhere from a week to several months.

With a little effort, you'll soon find yourself flush with plants. "There is no end to the bounty of Mother Nature," says Ron. "There is enough for everybody."

THE GANGSTER GARDENER'S RECOMMENDED TOOLS

At a minimum, you'll need to invest in a sturdy shovel and a pair of gloves when you start your garden. But there are several other tools of the trade that Ron relies on.

Battery-powered or rechargeable cordless drill
A drill can be useful for making drainage holes when converting found objects to planters.

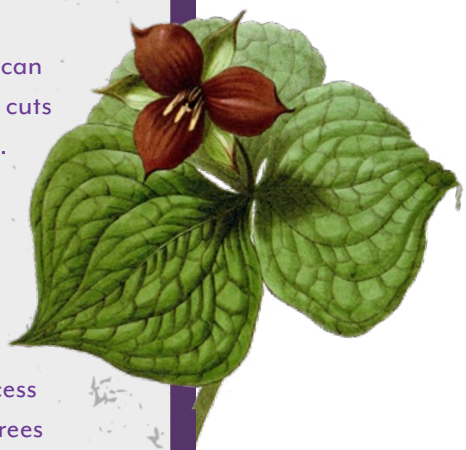
Hand pruners
Shears used for cutting stems and branches up to a half -inch in diameter.

Hori hori
A narrow trowel with a stiff serrated blade that is useful for dividing clumps of roots and other coarse garden tasks.

Kitchen knife
Your standard kitchen knife can be useful for making precise cuts when harvesting vegetables.

Potting soil scoop
An easy way to fill pots and planters.

Pruning saw
A small saw designed to access tight spaces when pruning trees and shrubs.



Assignment

It's surprising how often people labor to put in a garden and then let the crops go to seed or rot on the vine. All this while they continue shopping for produce each week. Early in the growing season, try to make a habit of spending at least five minutes in your garden per day to check on the plants and attend to any that are calling out for attention. Later, as the crops begin to mature, use that time to harvest at least one item a day, even if it is only a sprig of rosemary. In reaping the rewards of what you sow, you create a feedback loop that keeps you motivated.

For some first-time gardeners, figuring out the right time to pick and cook something can be intimidating in its own right. Ron has a few tips to ease your newbie gardener insecurities:

1. It's better to harvest in the morning—the flavors of the crops are more concentrated and the produce stays fresher longer.

2. To maximize the flavor of fruiting crops, allow them to get as ripe as possible on the plant before picking—unless critters are getting to them first, in which case you're better off letting them complete the ripening process on the kitchen counter.

3. With greens, rather than harvesting the entire plant, Ron recommends taking no more than a third at a time so that the plant will keep growing.

4. How do you know when root crops are ready? Easy, says Ron. The mature roots will start to emerge at the surface of the soil. "They literally come out of the ground."

Use this harvest tracker to help you notate what you're reaping and when.

GROW THE REVOLUTION

GANGSTER GARDENER WISDOM

"Growing your own food gives you power. Once you have it, it's something that never can be taken from you."

As global industrialized agriculture has grown more and more dominant, the demand for local organic produce has boomed. People not only want to know where their food comes from, they want to have a hand in producing it. Ron has tapped into the transformative power of that experience and worked to share it with inner-city youth, prisoners, and others who might not otherwise have access to tomato seeds and a patient person to teach them how to transform those seeds into pasta sauce.

Ron has helped spawn a global revolution, and he believes you have the same ability, and maybe an obligation, to make change by spreading gardening love around your own city or town. Most places these days have some sort of community food-growing initiative that you can volunteer for. If not, maybe you are the chosen one destined to make it happen.

"With my garden, I'm taking some of my power back," says Ron. "A garden represents freedom to me." In his view, cultivating vegetables is about changing your life. It's an education—and a catalyst. "Gardening has taught me more about myself and this planet than I could ever learn from any book."

Now, as Ron says: "Go plant some shit!"