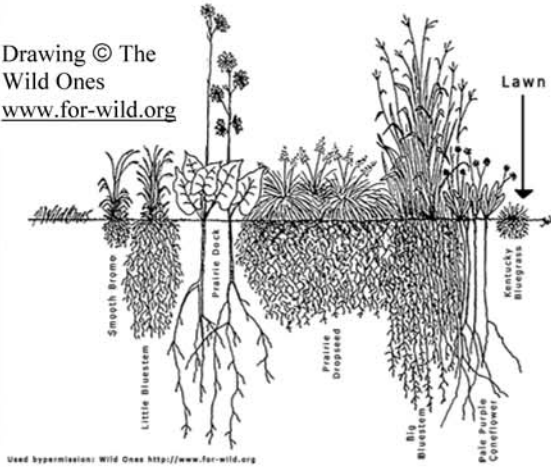


# CO<sup>2</sup> Absorbing Garden: Sustainability for Ohio's Future

Go really green! A garden that helps absorb and store carbon dioxide (CO<sup>2</sup>) is a critical, hidden key to sustainability for Ohio's future. CO<sup>2</sup> is one of our planet's major greenhouse gases.

Drawing © The Wild Ones  
[www.for-wild.org](http://www.for-wild.org)



Add native plants to your yard and community to see these improvements:

- Clean Air
  - ✓ Plants absorb carbon dioxide from the air, use it to form plant cells, and release oxygen as a byproduct
  - ✓ Lawn grass roots extend down a few inches at most
  - ✓ On average, 2/3 of most plant mass is below ground. Some mature native prairie grass roots can extend downwards 10-15 feet or more
  - ✓ Native plants capture & store more carbon than lawn because of the deeper taproots
  - ✓ Current study shows short roots cause the soil temperature to rise faster, and warmer soil stores less carbon (John Harte, 2008)
  - ✓ Native plants aerate our soil naturally (roughly 1/3 of native plant root structure dies off every year, locking a large proportion of the carbon absorbed during the plant's growing season underground)
- Energy Reduction
  - ✓ Evergreen trees protect your home from north and west winter winds
- Clean Water
  - ✓ Deciduous trees shade the south in summer and lose leaves so winter sun warms your home
  - ✓ Native plants create their own ecosystem to care for themselves limiting use of mowers, weed eaters and other gasoline powered yard care devices
  - ✓ Filter our rainwater with deep taproots (nitrates and other pollutants) – divert your downspouts into your 'wet footed' native plants or place them in low areas of your yard
  - ✓ Stabilize soil erosion keeps soil in the ground and out of our water
  - ✓ Roots break up clay naturally
  - ✓ Buffer ponds and waterways from pollution runoff and reduces soil erosion
  - ✓ Require less chemical fertilizers and pesticides than traditional lawns and gardens because they are essential for native predators that put a yard into a natural balance
  - ✓ Less gasoline is spilled filling mowers that washes into our stormwater
- Economic Improvement
  - ✓ Drought tolerant reducing water usage
  - ✓ Less expensive to maintain than lawn (less fertilizer, pesticides, use of mowers/weed eaters, etc.)
  - ✓ Supports Ohio income and jobs from fisherman, hunters, and wildlife watchers
- Greenways For Our Food Chain
  - ✓ More fire retardant, burning slower than non-native plants to protect your home
  - ✓ Have adapted to Ohio's changing weather and soil over hundreds of years
  - ✓ Flyways for migrating species
  - ✓ Support native wildlife, the window to Ohio's environmental health, i.e. Eagle early warning of DDT (Douglas Tallamy's book Bringing Nature Home, Timber Press, 2007)