



## The Ocotillo Community Association

c/o Premier Community Management, Inc.  
3930 S. Alma School Road, Suite 10, Chandler, Arizona 85248  
Office: (480) 704-2900 ~ Fax: (480) 704-2905  
[www.oqa-az.com](http://www.oqa-az.com)

September 2, 2017

Over 30 years ago (in the early '80s) a vision for the new Ocotillo master planned community was developed. Among the many attributes envisioned for the community was the intention that Ocotillo be a "green" community. Green in the aspect that it was envisioned as an oasis in the desert built around a lush golf resort and included expansive green spaces throughout the community, a series of lakes and water features, and beautiful lawns in front of the homes. Ocotillo provided an alternative to those who didn't want to live in the desert landscape.

Ocotillo was also developed as a "green" community with respect to being environmentally friendly. The community was planned as one of the first in the nation to utilize reclaimed water on such a grand scale, ultimately saving hundreds of millions of gallons of drinking and ground water each year. The community is also environmentally friendly because of the expansive areas of natural turf and the many mature trees and shrubs, along with a highly maintained and state of art irrigation systems, located throughout the community. Ocotillo ensures that its "green" standards are upheld through a fully dedicated team of employees whose main purpose is to preserve these aspects of the community on a daily basis.

Rest assured the Ocotillo Board of Directors has reviewed this issue thoroughly and thoughtfully over the years. Based on this review the BoD has come to the following conclusions why natural landscaping and turf is beneficial to the environment:

- Natural turf reduces the 'urban heat-island' effect by cooling the air through evapotranspiration, which is evaporation of water from the leafy parts of grass and the underlying ground.
- This simple cooling process of natural turf saves homeowners energy by reducing the temperatures of the surrounding area resulting in the Ocotillo area typically ranging several degrees cooler than other parts of the valley, thus requiring less air conditioning to cool our homes.
- Re-cycling of grass clippings returns nitrogen and organics to the soil, improving the soil and creating a healthier environment for roots and soil micro-organisms.
- Natural grass can be easily and inexpensively treated to propagate self-repair because of the inherent regenerative character of the *living* plant.
- The study, titled "Technical Assessment of the Carbon Sequestration Potential of Managed Turfgrass in the United States," shows that responsibly managed lawns sequester, or store, significant amounts of carbon, capturing five to seven times more carbon from the air than is produced by the engine of today's lawnmowers.
- Acting as one of Mother Nature's finest and least expensive filters, natural turf removes carbon and returns oxygen into the air through photosynthesis.

One recent comparison of the surface temperatures of different materials resulted in the following observations. These temperature readings were all taken on July 1, 2017, at about 1 pm with an approximate ambient air temperature of 106 degrees Fahrenheit (F).

Surface Temperature

|  |                |
|--|----------------|
| Natural Turf -                             | 118 ° F        |
| Concrete Sidewalk -                        | 134 ° F        |
| Asphalt Pavement -                         | 151 ° F        |
| Granite -                                  | 153 ° F        |
| <b>Artificial Turf (5 yr old sample) -</b> | <b>192 ° F</b> |
| <b>Artificial Turf (Isenberg sample) -</b> | <b>205 ° F</b> |

Artificial turf has been known to get so hot due to solar energy absorption that a story aired on CBS 5 on March 9, 2017 warning consumers about the potential for their lawns to “melt” due to reflective heat from windows. The message was to warn that this problem exists and will most likely not be covered under a warranty thus leaving the customer with an unattractive artificial lawn.

A large carbon footprint is produced in the process of manufacturing and transporting artificial turf. Athena Institute conducted a study for a college in western Canada to determine what was required offset the global warming carbon footprint of an artificial turf (football) field installation. The purpose of the study was to estimate the greenhouse gases emitted during the life cycle (including the manufacture, transportation, installation and disposal) of an artificial turf field as opposed to a natural grass surface. The study determined 1,861 (± 23%) coniferous (Pine) trees would need to be planted to achieve a 10-year carbon neutral artificial turf installation. In stark contrast, natural turf absorbs pollution in the form of carbon and returns oxygen to the environment.

In addition, many artificial turfs use tiny rubber pellets as a top dressing to help the artificial blades of grass stand up and appear more realistic. These pellets are commonly made from the rubber of recycled tires... a product considered toxic and prohibited from disposal in dumps or landfills.

An article posted on azfamily.com on March 6, 2017 titled “Why artificial turf may truly be bad for kids” presented the concerns associated with artificial turf ranging from concussions to cancer. Many experts are now expressing concerns about the use of artificial turf for athletic fields and playgrounds. In spite of the use of the rubber pellets, artificial turf is typically installed over compacted soils resulting in a very hard surface many believe is too dangerous to have children playing on. Not to mention the potential for “rug/turf burn” caused by falls on the rough surface.

One of the most common arguments in favor of the use of artificial turf includes the reduced water consumption based on the assumption that the lawn does not require irrigation. However, many users of artificial turf still use irrigation to wash away pet urine or other contaminants from the surface of the turf. Others use irrigation in an attempt to temporarily cool the surface to make the artificial turf usable.

Those residents who are truly interested in water conservation have several ways in which they can accomplish this, whether it’s by the use of “smart” irrigation controllers, or implementing irrigation practices which reduce the amount of water running off yards and into the street. Homeowners interested in rebates offered by the City of Chandler should look into the details of the rebate program. A majority of front yards in Ocotillo don’t have enough grass to meet the minimum amount required to be removed in order to obtain a \$200 rebate. Our landscape requirements have already taken water conservation into consideration, while still providing a balance of natural green lawn and xeriscape

Another common argument is that the artificial turf reduces the amount of chemicals used in their yards. However, weeds and crabgrass have been known to grow through artificial turf necessitating the need for weed killers to be used on the artificial turf.

Many believe that the artificial turf is a “maintenance free” alternative. However, users of artificial turf find it necessary to vacuum or blow off the artificial turf to remove leaves and other debris. Some invest in other specialty equipment to fluff the artificial turf and remove leaves and such from the surface. Any way you look at it some effort and expense is going to be required to maintain any surface in an attractive manner, especially if you want a surface that’s usable for children, pets, or recreation in general.

Once artificial turf reaches its end of its useful life it becomes yet another environmental issue with the majority ending up in our landfills by the tons. Artificial turf is a product that doesn’t have a long history in its application for residential use. In communities where artificial turf is allowed typically only a small percentage of owners choose that option. The reality is that there are many unknowns related to artificial turf. While those that sell the product can certainly make claims about its benefits, as is the case with many artificial alternatives in the world today, it’s hard to argue with those options produced by Mother Nature.

The Ocotillo Community Association Board of Directors takes the issues surrounding the use of artificial turf very seriously. For these considerations and evaluations The Ocotillo Community Association Board of Directors unanimously agreed in September 2017 to preserve the long-standing rule that prohibits the use of manmade materials such as synthetic turf or other artificial plants and trees as a substitute for natural landscaping when it is visible from neighboring property. The Board, and a majority of Ocotillo’s residents (based on the minimal number of requests for plastic grass), are proud that the community maintains the requirement of environmentally friendly natural grass and landscaping in order to maintain the great look of the community and the health and welfare of its residents.

What started off as a vision over 30 years ago has evolved into reality. As residents of Ocotillo we have an exceptional quality of life, lush grounds, mature trees, beautiful waterfalls and lakes, an award-winning golf course and nearby shopping. Builders have continued to build and buyers have continued to buy in Ocotillo because of its unique design and distinct environment. Simply, the use of artificial landscaping was never what our community was envisioned to include. Ocotillo is a master planned community designed to create a more unique environment by incorporating natural grass, plants and water throughout the residential, commercial and common areas with an unintended consequence, a cooler, family friendly environment. We hope that you understand and truly appreciate this vision.

**The Ocotillo Community Association Board of Directors**