By encouraging slow infiltration of stormwater and providing longer access to moisture, the lagunita helps support trees in semi-arid conditions.

The overall form of the lagunita includes a central basin, which is two feet in diameter and at least two feet deep, and two veins, which extend two feet from either side of the central basin. These spread moisture across the root zone for best absorption.

This on-contour design helps moisture infiltrate aerobically at the root level. The basin of the lagunita is filled with mulch, which serves two main purposes: it acts as a sponge, and it feeds endo- and ectomycorrhizal fungal spores.

Rocks, placed on top of the lagunita, help hold the materials of this structure in place during storms.

On slopes, the optimal position for a lagunita is upslope of the tree, with a swale downslope to further help hold water in the surrounding soil.

AWARD-WINNING TECHNOLOGY

Below: EPA recognized this design, which Seeds of Wisdom has since implemented in several projects throughout northern New Mexico.



Cite as:

Beshur, A. "Lagunita: Best Management Practice." Pamphlet. 2023. Santa Fe, NM: Seeds of Wisdom,

For more information about southwestern urban forestry design, visit our website:

sowsfe.com

Or contact us:

505-819-3769 plants@sowsfe.com

LAGUNITA

BEST MANAGEMENT PRACTICE



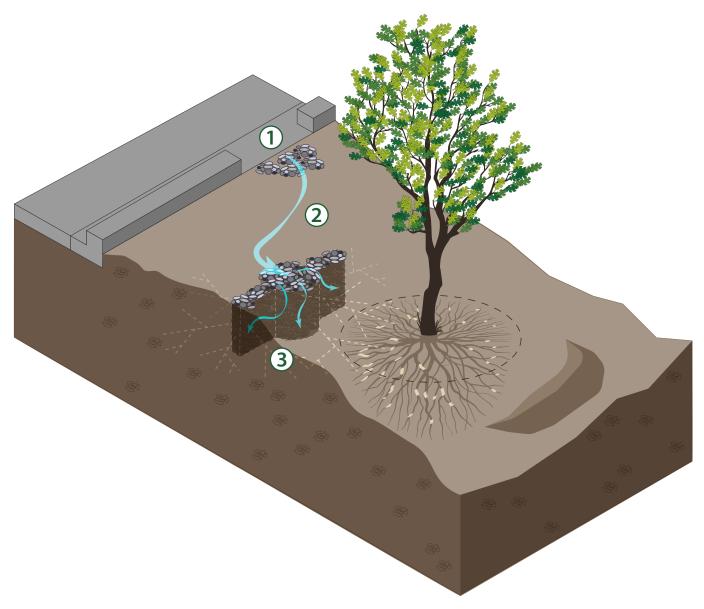
The Lagunita technology is inspired by a tree decomposing in nature, which holds moisture, feeds mycelial networks, and helps trees grow thorugh times of drought.





GUIDED RAINDROPS GROW TREES

LA LLUVIA BIEN UTILIZADA HACE CRECER LOS ÁRBOLES



designed and installed in 2017 by:

additional graphics by:

utilities for the project provided by:

Pump Trolley



Cathedral Basilica of St. Francis of Assisi

Cathedral Place Rain Garden Santa Fe, New Mexico





before

after

Four-foot curb cuts allow the majority of rainwater to enter into and later exit the garden. A sediment trap captures street debris and oil. Accumulated debris is shoveled out of the trap periodically to keep the rain garden clean.

Un corte de cuatro pies del borde del camino nos ayuda a que la mayoría del agua entre al jardín. Otro corte deja salir el agua restante. Una retención despues de la entrada agara basura y aceite del camino. De vez en cuando, la retención se limpia con una pala para guardar la limpieza del jardín.



Gradually lowering the soil grade slows the flow of water for improved infiltration. The rainwater channel declines at a rate of no more than 1/4" per foot in order to reach the exit cut.

El desnivel de la tierra gradualmente hace correr más despacio el agua. La declinación del canal esta en no más que 1/4" por pie para poder llegar a la salida.



Wood mulch sponges 2 feet deep by 6 feet wide with fungal hyphae act as cups to soak water into the soil. These "lagunitas" capture and absorb over 22,000 gallons of stormwater per year, which is used to grow 5 trees!

Revolver la tierra con cáscara 2 pies profundo por 6 pies largo junto con hifas del hongo y hacer tipo laguna mantiene la humedad de la tierra. ¡Estas "lagunitas" captuan y salvan más que 22,000 galones de lluvia cada año, que los arboles urbanas se utilizan para crecer!

support for the project provided by:



