

ECOLOGICAL BENEFITS of GREENROOFS

Why Not Mitigate the Negative Effects of a Building's Footprint with Organic Greenroof Architecture?

Eco-centric greenroof technology offers healthy, sustainable and regenerative roof landscapes where once we had barren deserts of tar, gravel and asphalt. Diverse ecological advantages of greenroof systems can:



Source: ReNatur

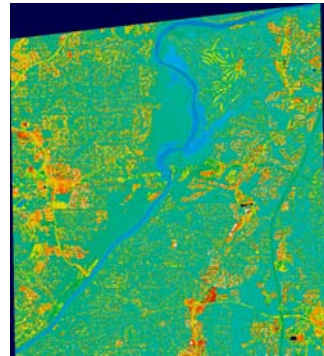


Source: Optigrun

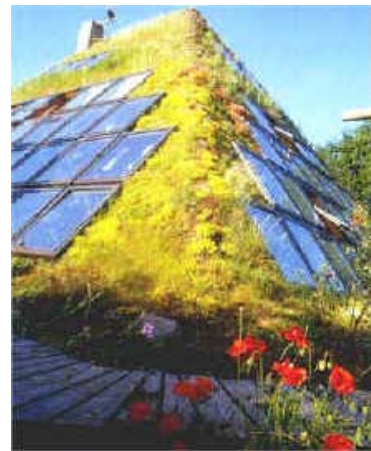


Source: ReNatur

- Absorb CO₂ and help lower the urban heat island effect and ozone levels with living, breathing plants through the natural processes of photosynthesis & evapotranspiration.
- Reduce ambient air temperatures. Hot summer impermeable city roofs can reach 175°F or more! See Atlanta's hot vs. cool thermal colors at right.¹
- Filter air, bind dust particles & reduce glare. 1,000 ft² of a greened roof can remove 41 lbs of airborne particles per year.
- Absorb and filter heavy metals & pollutants from our rainwater, such as cadmium, copper, lead, nitrogen, zinc, diesel soot, VOC's, hydrocarbons and pesticides.²
- Reduce runoff flow rates & retain 50 - 95% of rainwater. Alleviate stormwater infrastructure systems & reduce combined sewer overflows.
- Supply green habitat and nesting areas for displaced birds, butterflies and other wildlife.
- Provide acoustical insulation & reduce noise by 50 dB with plants and soil.³



Atlanta Thermal Image Courtesy of NASA



Source: ReNatur



Source: Optigrun



Source: VegTech AB

Data Sources other than www.greenroofs.com:

¹. Dr. Jeff C. Luvall, NASA's Marshall Space Center
². The London Ecology Unit, 1993 and Environmental Building News, Volume 10, Number 11
³. Green Roofs for Healthy Cities

greenroofs.com

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Learn more about the ecology of greenroofs from the industry's complete resource and information warehouse website at