

# New Mexico Scrap Tire Program



# About myself

Layne Duesterhaus

Illegal Dumping Prevention Coordinator  
NMED – Solid Waste Bureau

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- Provide education and outreach to communities to help prevent illegal dumping and ensure proper scrap tire management
- Former employers include Capitol Area Council of Governments – Austin, TX, City of San Marcos, TX, and Texas State University
- Bachelors Degree in Environmental Science – Texas State University



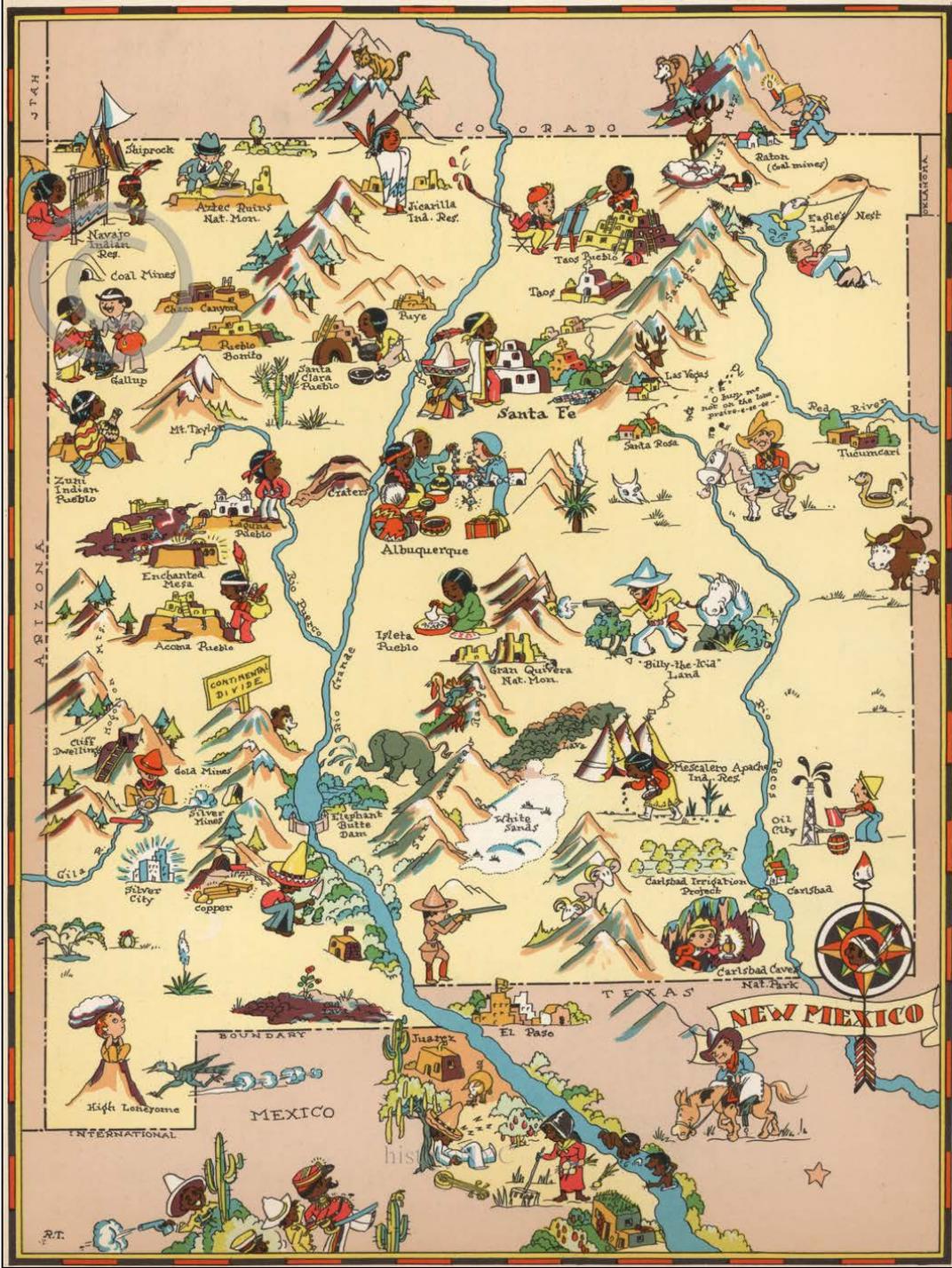
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UTAH

COLORADO

ARIZONA

ARIZONA

TEXAS

NEW MEXICO

MEXICO

R.T.

Shiprock  
Navajo Indian Res.

Aztec Ruins Nat. Mon.

Kivasilla Ind. Res.

Rabox (Coal mines)

Eagle's Nest Lake

Taos Pueblo

Taos

Coal Mines

Chaco Canyon

Pueblo Bonito

Santa Clara Pueblo

Gallup

Zuni Indian Pueblo

Grants

Albuquerque

Santa Fe

Las Vegas

Santa Rosa

Red River

Tularosa

Enchanted Mesa

Acoma Pueblo

Tzeta Pueblo

Gran Quivira Nat. Mon.

"Billy-the-Kid" Land

Continental Divide

Cliff Dwellings

Silver City

Elephant Butte Dam

White Sands

Mescalero Apache Ind. Res.

Oil City

Carlsbad

Carlsbad Cave Nat. Park

High Loneyama

El Paso

Justax

Carlsbad Irrigation Project

INTERNATIONAL

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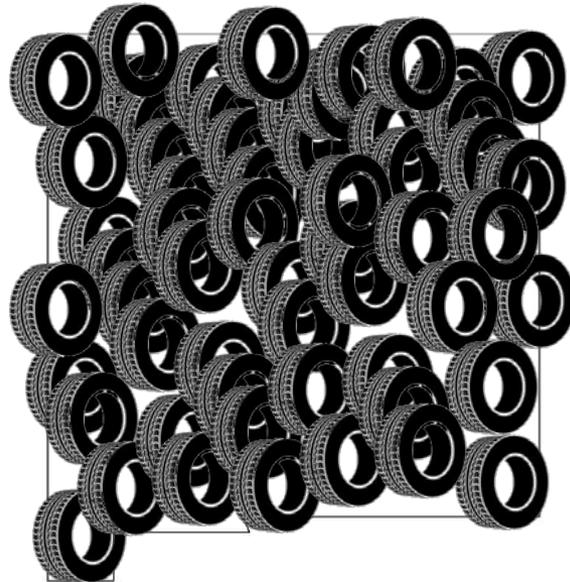
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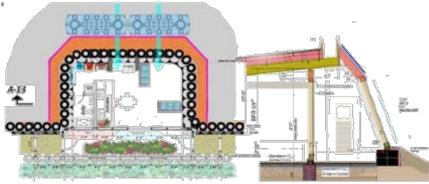
# USA Average

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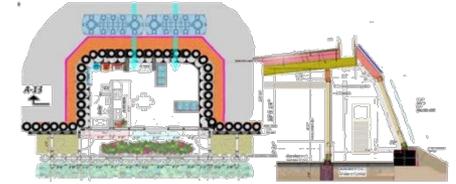
**ONE SCRAP TIRE PER  
PERSON PER YEAR!**



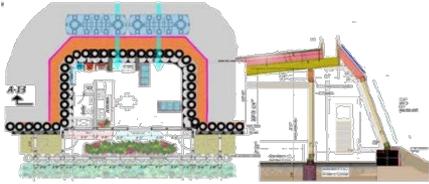




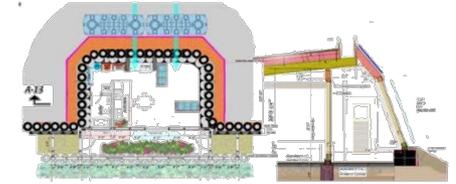
# Earthships



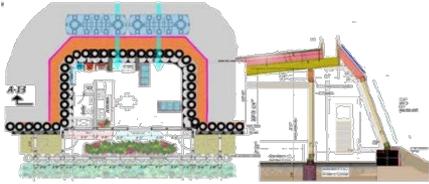
- Building with Natural and Recycled Materials
- Contained Sewage Treatment
- Solar and Wind Electricity
- Thermal Heating and Cooling
- Water Harvesting
- Food Production



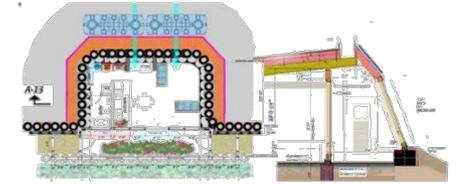
# Earthships



- Plastic and glass bottles
- Aluminum and steel cans
- Mud and straw plaster
- Reclaimed wood
- Scrap metal
- Used automobile tires

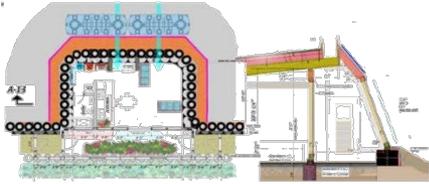


# Earthships

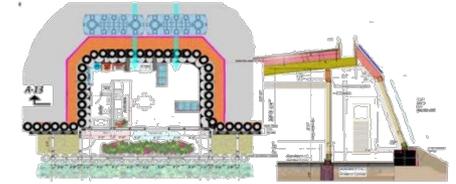


- The walls of an Earthship are built with used automobile tires rammed with earth
- Staggered like bricks
- Each Earthship uses between 500 and 5,000 tires





# Earthships



- Provides insulation
- When filled with dirt, can withstand forest fires
- Load-bearing monoliths that also serve as their own foundation
- Impervious to termites and rodents















## IDEAL TIRE SIZE

225/75/R15

205/70-75/R15 – 245/75/R16



Tire bales can be used, however, they are not recommended because they are not as stable and they do not pack as well as singular tires.





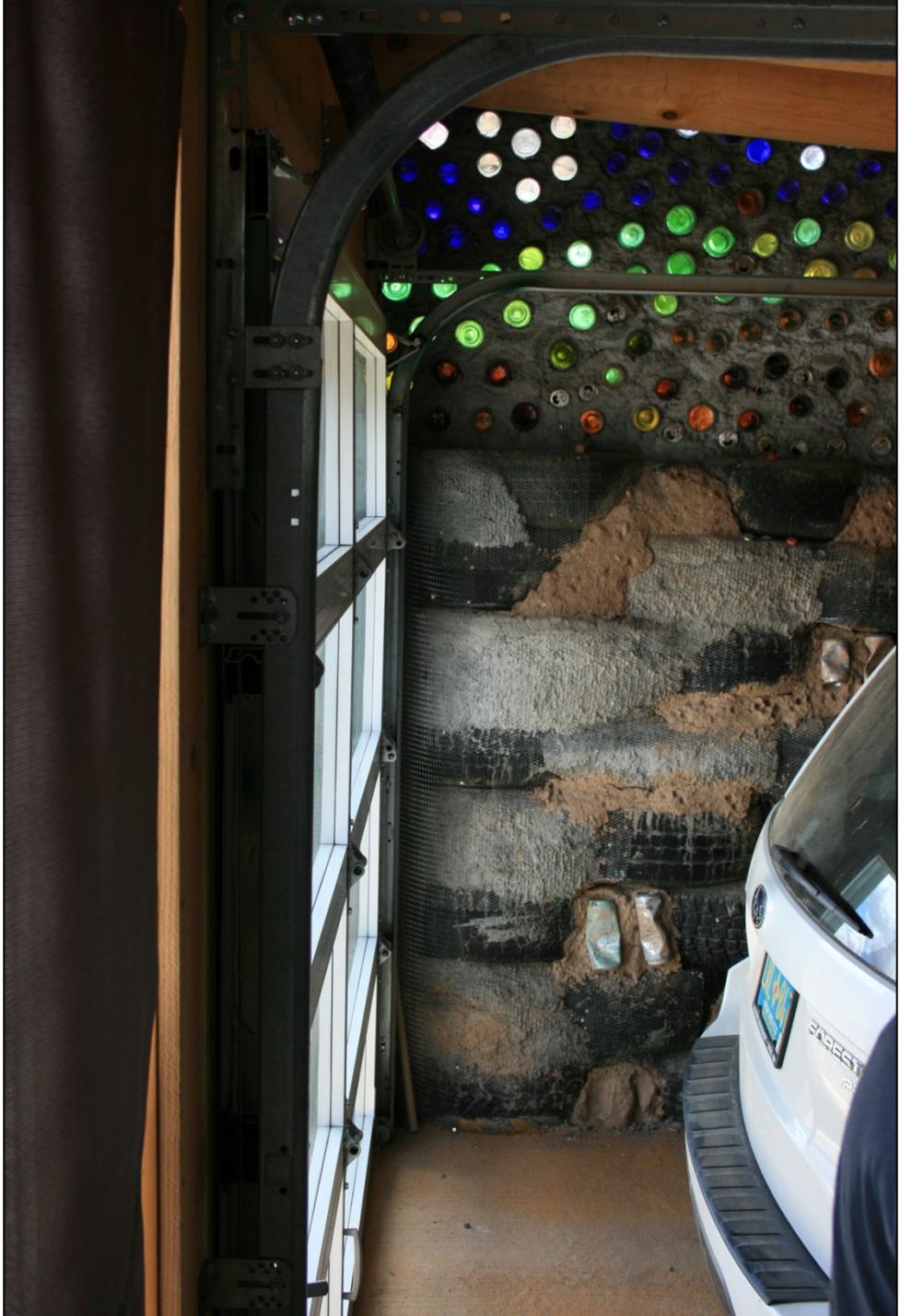


















## Regulation



- Recycling and Illegal Dumping Act (RAIDA)
- Recycling, Illegal Dumping, and Scrap Tire Management Rules (RIDSTMR)



# Regulation



- Storage
  - Modeled after IFC
  - Pretty much all about preventing fires



# Regulation



- Transportation and Manifesting
- Pretty much all about preventing illegal dumping



# Regulation



- Recycling and End Use
  - Landfills
  - Shredding
  - Tire Derived Fuel
  - Civil Engineering Projects



# Earthship Permitting



- **Earthships are considered “Civil Engineering Projects” by the New Mexico Environment Dept.**
- **Each Earthship must be permitted**
- **NMED is regulating the tires, not the house**

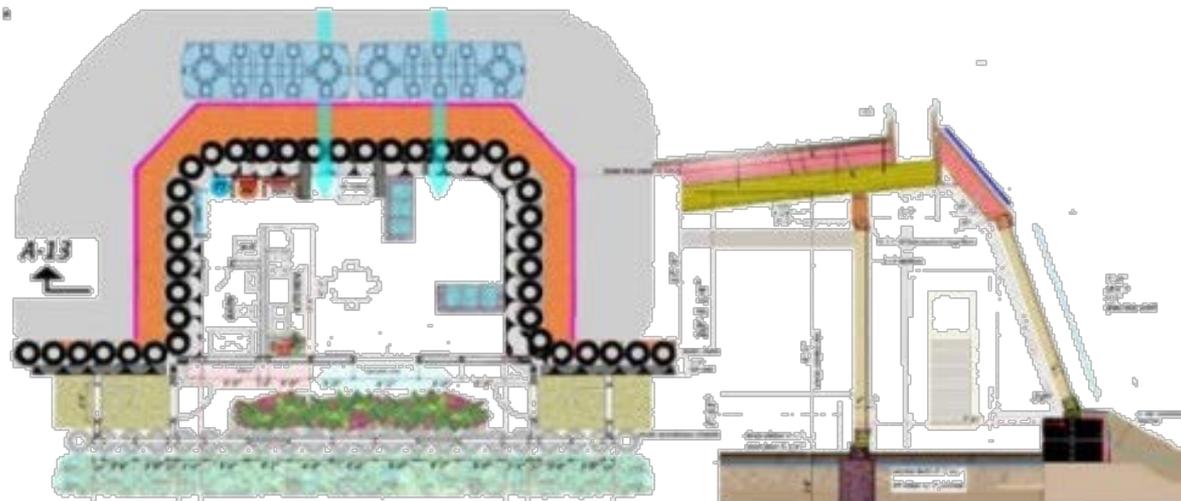


# Earthship Permitting



**Permit applications must include the following:**

- **Engineered drawings of the structure**
- **Number of tires being used on entire project**
- **Source of tires**





# Earthship Permitting



- **Must have an affidavit from County and City, indicating that the County and City were notified of the project**
- **If property is being leased, a similar affidavit from property owner is encouraged**



# Earthship Permitting



## **Annual reports to include:**

- **Type of project**
- **Number or weight of scrap tires used in project**
- **Number of scrap tires remaining at site at the end of the calendar year**
- **All contact information for scrap tire generators and haulers**
- **Applicable drawings and photographs indicating progress**



# Earthship Permitting



## **OTHER AGENCIES**

- **Each Earthship must create a solid waste account with County solid waste services**
- **Each Earthship must get a permit from NMED – Liquid Waste Program for septic**
- **Each Earthship must be built according to State and Federal building codes - County Planning Dept. inspects**



# New Mexico Environment Department

PROTECTING OUR ENVIRONMENT, PRESERVING THE ENCHANTMENT

**Solid Waste Bureau**

## Recycling and Illegal Dumping Act Grants

### PURPOSE

To protect health and welfare of current and future residents of New Mexico by promoting environmentally sound methods for reuse and recycling.

### FUNDING

Up to \$1,000,000 of funding available annually for:

- Offsetting the cost of scrap tire collection and recycling
- Establishing recycling facilities
- Purchasing equipment for recycling and scrap tire management
- Performing marketing regarding recycling and scrap tire management
- Purchasing products produced by a recycling facility
- Providing educational outreach regarding scrap tire management, recycling, and illegal dumping
- Developing recycling infrastructure
- Abating illegal dumpsites
- Contracting with vendors to promote recycling



At least two-thirds of budgeted grant money in each fiscal year is allocated to tire abatement and recycling programs, and one-third is allocated to abatement of illegal dumping and recycling of other solid wastes.

### ELIGIBILITY

Grants are only available for:

- Municipalities
- Counties
- Tribal nations, pueblos, and tribes
- Land grant communities
- Cooperative associations (as defined in the Recycling and Illegal Dumping Act)
- Solid waste authorities

Ineligible entities are encouraged to partner with eligible entities. The applicant must be able to complete the project within one year. Matching funds and in-kind contributions are not required but are encouraged.

### APPLICATION

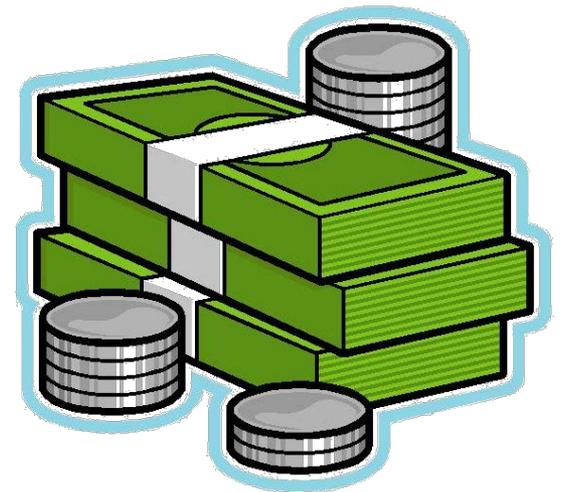
Applications are accepted annually from January to April. Grants are awarded in May. The exact opening and closing dates are posted in e-mail announcements and on the Solid Waste Bureau website. Instructions and applications may be located on the Solid Waste Bureau website.

### CONTACT

Neal Denton, Recycling Coordinator, (505) 827-2653, [neal.denton@state.nm.us](mailto:neal.denton@state.nm.us)

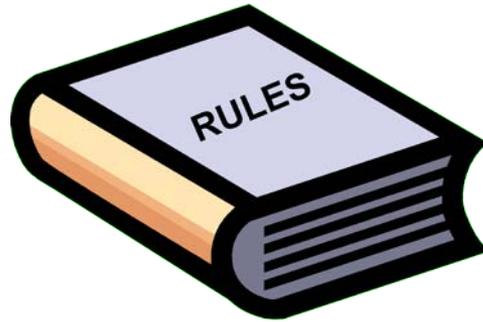
# Grant Eligibility

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- Counties
- Tribal Nations, Pueblos, and Tribes
- Land Grant communities
- Solid Waste Authorities



## Grant Funding

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- Purchasing products produced by a recycling facility
- Providing educational outreach regarding recycling, illegal dumping, and scrap tire mgmt.
- Developing recycling infrastructure
- Abating illegal dumpsites
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For text of RAIDA, RIDSTMR and other tire info:

- Go to [www.nmenv.state.nm.us/swb](http://www.nmenv.state.nm.us/swb)
- Click on “Tire Management Program” on left column

# QUESTIONS?



**Layne Duesterhaus**  
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**Outreach Section**

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