



PLUS: AGM Battery Maintenance
Tips for Cold Weather Camping



BIG WOODY CAMPERS
715-271-0465 | www.bigwoodycampers.com







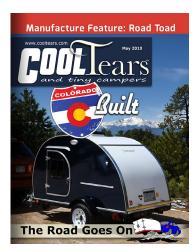
Vol. 10 No. 1 January/February 2022

13 cover story

LARRY & LINDA'S BED BUG: A ONE OF A KIND TEARDROP

Lisa Adams

- LETTER FROM THE EDITOR Lisa Adams
- KITCHEN ON WHEELS: TORTILLA BOATS Matt and Wendy DeWitt
- 2022 CALENDAR PHOTOS **Cool Tears Staff**
- TIPS FOR COLD WINTER CAMPING **Cool Tears Staff**
- AGM BATTERY CARE **Cool Tears Staff**
- REGIONAL CAMPING SPOTLIGHT **Cool Tears Staff**



Editor Lisa Adams

Contributing Authors Anne Cox Matt & Wendy DeWitt

© Copyright 2022 Cool Tears MagazineTM All Rights Reserved Cool Tears MagazineTM is a trademark. Written materials submitted to Cool Tears MagazineTM become the property of Cool Tears MagazineTM upon receipt and may not necessarily be returned.

Cool Tears MagazineTM reserves the right to make any changes to materials submitted for publication that are deemed necessary for editorial purposes. The content of this publication may not be copied in any way, shape or form without the express permission of Cool Tears Magazine.TM Views expressed in the articles and reviews printed within are not necessarily the views of the editor, publisher, or employees of Cool Tears MagazineTM.

Mailing Address: Cool Tears Magazine 51956 CR 215 Lawrence, MI 49064

Connect with us!









Letter from the Editor:



Tiny Camper Enthusiasts,

For decades, I dreamt of sailing around the world in my own sailboat, visiting different ports, and just enjoying the slow journey. I subscribed to every sailing magazine that I could find as I contemplated trying to make my own wooden sailboat that I could spend my weekends living aboard and sailing. In my 20's and 30's, I was fortunate to spend many days with friends on their boats sailing in the Great Lakes. There's nothing like it. There's quiet movement, the water and breeze are good for the soul, and you have the freedom to explore.

During that same time period, I saw my first teardrop trailer, but at the time, I was too in love with sailboats to even give them a second thought.

I finally bought my own sailboat, but not the large liveaboard boat that I had dreamt of when I was young. The largest boat that I own is a 15 footer and it's a great little daysailer on smaller waters and it's a great racing boat. I've even raced that little boat on the Chesapeake Bay and have been out far enough that we lost sight of land! I raced it competitively around the country for a few years which was a lot of fun, but it just didn't elicit the same feelings that I dreamt of when I was younger. I still have my Mutineer 15 and a Sunfish, but neither of them see the water very often anymore.

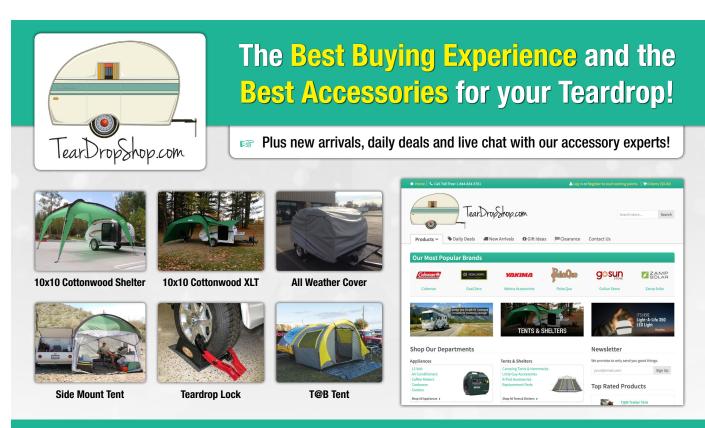
I've found a different way to explore and it involves a teardrop trailer. Like sailboats, teardrops provide a freedom that other travel trailers don't. Because of its size, I'm able to explore the nooks and crannies around the country that I wouldn't be able to with a larger rig, much like I could explore bays and inlets with my small sailboats.

I don't have a liveaboard sailboat, nor will I in the future. Instead, I have a 10 foot teardrop with a comfortable cabin and galley. When I was younger, I had the dream to explore, to be outside, and to have freedom. I thought that a sailboat was the best way to achieve that dream. But I've realized that the dream is still there and they just had the wrong vehicle in them; a bed on

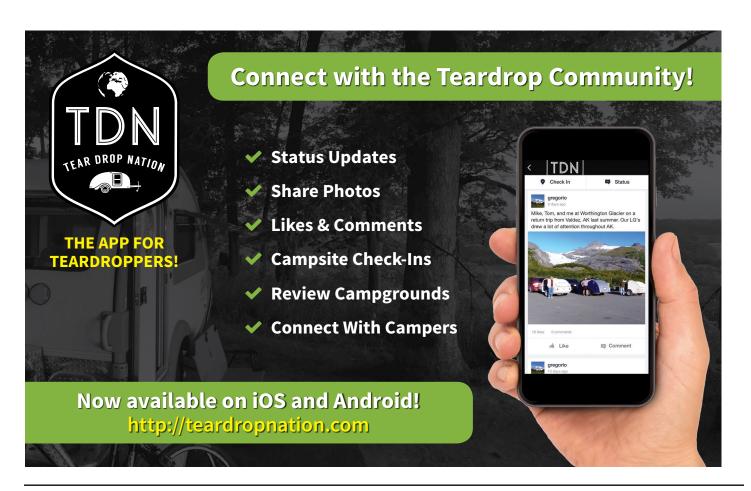
wheels fulfills that dream.

Editor in orange hat racing on Lake Guntersville, AL.

Safe travels and stay safe
Live Tiny. Live Free.
Lisa Adams
Editor
Cool Tears Magazine
Lisa@cooltears.com



Visit www.teardropshop.com or call Toll Free: 1-844-834-5701





TORTILLA BOATS

EXPLORE/ADVENTURE. GOOD FOOD. STARGAZING. GREAT SLEEP.

These are our goals when we go out camping. We don't go camping to sit in our trailer and stay inside. We are living in nature and want a comfortable place to lay our heads at night to be refreshed for another day of exploring.

We like to eat a hearty breakfast to fill our bellies before taking off on a day of exploring. Tortilla Boats fill that requirement. It is easy to pull together and can use leftovers from previous meals.

This recipe was submitted by Matt and Wendy DeWitt from MWD Adventures. You can find Matt and Wendy on YouTube at MWD Adventures and www.mwdadventures.com. These two produce camping related content on their YouTube Channel and if you ever have a question on a Hiker Trailer, they are a great resource.

Ingredients

- Old El Paso Tortilla bowls I prefer the full size, the mini are too small to hold all the goodness
- Eggs 1 egg per boat
- Cheese any kind
- Meat bacon, sausage (links or patties), ham
- Onions chopped, optional
- Peppers chopped, optional
- Garlic minced (I prefer fresh), optional
- Potatoes mini potatoes or hashbrowns
- Oil and/or Butter

Warm-up your pan over your stove.

Heat up some oil or butter on your pan. Once the oil is warm, place potatoes on the pan to cook/warm through, add onions and garlic near the end to add flavor - season with salt & pepper. Add additional oil/butter as needed to saute potatoes/onions/garlic.

Place the tortilla bowls on the pan to warm them up - flip as needed to soften them. Chop meat into bite-size pieces, then warm it up.

Saute onions & peppers until soft, add garlic,





then the scrambled eggs. Add the meat to the eggs. Once eggs are cooked to your preference, scoop them into the tortilla bowls/boats. Sprinkle with your choice of cheese. Serve with your potatoes on the side.

These are so versatile - you can add spinach, avocado, salsa, etc to make these your own. Enjoy!



Ways to prep for this meal ahead of time: Potatoes - if I am using mini potatoes, I will serve them for supper the night before. I will boil enough for supper and leftovers for the next morning. Then I cut them in half to warm up on the pan in the morning for breakfast.

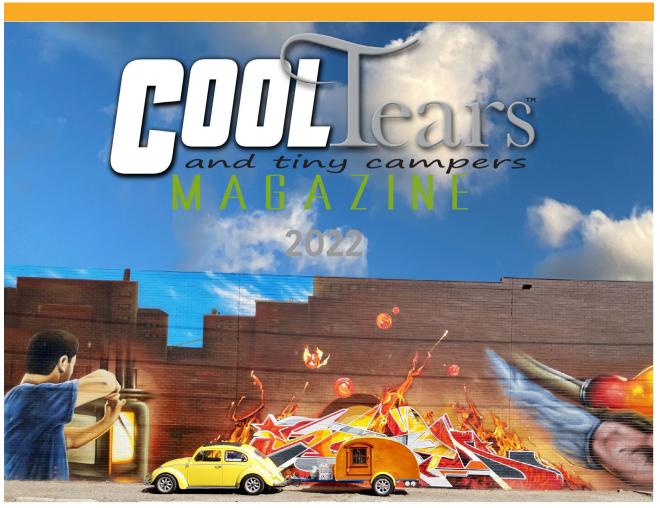
Bacon - I will typically cook up a package of bacon in the oven at home before we leave on vacation, then store it in a ziplock bag. In the morning, I can just warm the bacon up and don't have to take the time to cook the bacon or have the mess of the bacon grease.











By COOL TEARS STAFF

The next two pages include the winning photos submitted by our subscribers which are included in our 2022 Cool Tears and Tiny Campers wall calendar. Note that the price of

the calendars has been reduced now by 15%. Click here to purchase.

Top photo by: Andrea (Andy) Elbe (Australia)

Right photo by: Marius Stănescu (Norway)









Top: Photo by Todd Henderson Middle: Photo by Stephen Arbuthnot (Northern Ireland)

Bottom: Photo by Shirley Reynolds

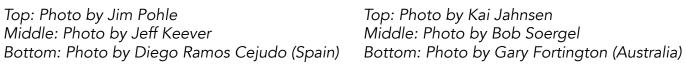
Top: Photo by Joy Wickstrom Ziemnick Middle: Photo by Debbie Day

Bottom: Photo by Barry Scott









12



Larry & Linda's Bed Bug: A One of a Kind Teardrop

By LISA ADAMS

As a teardrop owner, it's common to give tours to others at the gas station, grocery store parking lots, or campgrounds. But one teardrop stands out from the rest. We met Larry (his wife, Linda, was not able to attend.) at the Crossroads of America TearJerkers event this past September and he was constantly showing people his tiny camper. Why was his teardrop the most popular out of 70 plus campers from 26 states? you may be wondering. Because it's built from a 1973 VW Super Beetle.

Larry's friends had built campers from old buses and he wanted to build a camper of his own. He is quite the storyteller and you will learn that his woodworking skills (and tools) are limited; however, he's always worked with cars and machinery, so he has the tools, skills, and know-how to work with cars. So instead of building a traditional teardrop from wood, he figured he'd do what he's good at and he'd build one out of a car instead. A Volkswagen Super Beetle was the perfect base and it's even traditional teardrop shape.

While he was showing us the basics of his "Bed Bug," we noticed his cigar box guitar

and we asked about it. He plugged the threestringed guitar into his small cube amplifier and began to play a few notes. Anne and I sat







down at the picnic table bench at his campsite and as he played the blues, he would stop every now and then to tell us the story of how he came by the cigar box guitar that he was playing. Larry had made his first cigar box guitar and was learning how to play it. Larry claims that it was not a very good guitar, but after seeing his unique teardrop, I'm not sure that I believe him. He continues to play the blues and tells us that about six months prior to meeting him, he was sitting in a Waffle House at 5AM when he heard the night shift cook, Rodney, talking about music with another customer. Rodney mentioned that he built high end guitars and that he was making a few 3 stringed cigar box guitars. Larry asked if he could make one for him and what he got from Rodney was a beautiful cigar box guitar with a flamed maple neck with a truss rod through the center and a "hot" hand wound pick up. It fits Larry perfectly and he plays it every day. Based on how masterfully he could play that three stringed instrument, I knew that we were in for a treat when we'd get a chance to see the rest of his "Bed Bug."

Like many DIY teardrop builders, he stripped his Super Beetle down to the frame and

coated it in a rust preventer used for auto restorations and then added a wooden floor on either side of the driveshaft. He put the body back on the VW Bug and got to work on designing a tri-fold bed so he and his wife Linda could either sleep or enjoy watching a movie sitting on it in couch mode. With the doors closed and the curtains drawn shut, the "Bed Bug" makes for a personal movie theater with the TV mounted on what used to be the dashboard of the VW. Larry put the bed in couch mode and had Anne and I climb in as he closed the doors behind us. He had an old movie playing on the TV in front of us. The sound was great, we had plenty of room and we sat inside, looking in amazement at everything in his Super Beetle teardrop.

The interior of the VW is insulated and covered in wood, so you have that traditional tiny camper feel. His wife, Linda, finished the wood and did some decorative wood burning into the cabinet doors and galley countertop. The original windshield visors for the driver and passenger are still in place and hold the Reflectix in the windshield. Not only does this help keep the cabin dark, but it also helps keep it cool when he runs the air conditioner. He has rebuilt the dashboard out of wood, so now it's functional as a camper. There is a small sink, TV, and coffee maker on the



dash. He even made a pull out desk that can be used when he's sitting on the couch. In keeping with the car theme, the foot of the bed goes under the dash, so when sitting on the couch, it's like sitting in the front seat of the car, except it's a bench seat now and not bucket seats.

After watching a few minutes of the movie in the "Bed Bug," we climbed out and got the outside tour of this unique teardrop build. We walked to the front of the VW Super Beetle to see what he had done with the trunk. (Remember that VW Beetles had a rear engine). Before showing off all of the amenities of his fully functional galley, we notice a Volkswagen magazine spread open on the galley counter. This article is not the first time he and his Bed Bug have been covered in a magazine. (I hope he will proudly display our magazine alongside the other.) He explained that he was able to put in a 10 gallon water tank, complete with 12 volt pump in the base of the trunk. When you look at this galley,



the water tank is not visible at all since he built a wood deck over it that hides it. That wooden deck is his countertop. There is even an extension that can be pulled out for more counter space. There is room in this one-ofa-kind galley for running water, cooktop, and additional storage. Many of his utensils and pots and pans hang from the open trunk lid, suspended by magnets - not something that a traditional teardrop made from wood, foam, or fiberglass can take advantage of.



As he continues to walk us around his "Bed Bug," it's evident how much thought went into his teardrop. The faucet in the galley is removable so it tucks away when the hood is closed. He even has an extension hose on the water tank so they're able to use it for a shower as well, but that isn't visible as you walk around. The engine compartment in the rear of the VW houses the air conditioner and batteries. Like many tiny campers, he can run fully on shore power or use his batteries if he wants to be off-grid. He even installed an inverter so he can continue to use the household outlets. The outlets in his teardrop are color coded, black or white, so it's easy to differentiate whether they are running from shore power or from the batteries. That's a great tip for other home builders.

We sat on the bench of the picnic table while Larry opened the driver's side door of his Beetle and sat down, facing us. He's shaded by his awning, which is attached to his historic looking roof rack, complete with old suitcases. He tells us how confused the person was that checked him into the campground a few days earlier. The state park we were in requires a tag for your tow vehicle to be displayed at all times. She kept telling him he had to pay double the price because he was bringing in two vehicles, not a tow vehicle and a camper. It took some convincing before he only had to pay for his truck when he finally was able to explain that the VW Super Beetle was his camper and that it wasn't drivable.

Throughout the rest of the weekend, we would see or hear Larry humbly showing off his "Bed Bug" or playing his cigar box guitar. If you ever have the pleasure of meeting him, stop by for a tour and a chat. You'll enjoy hearing him tell stories about his build, his guitar, and you'll know you've met a one of a kind man who built a one of a kind teardrop.







Merchandise available from Bonfire









QUALITY CONSTRUCTION - From The Frame Up -





OK Schooners teardrop trailers are individually hand-crafted, quality campers. Each is built with your specific options in available colors and accessories at our shop located in Broken Arrow, OK. We do not mass produce or use assembly lines. Our goal is to provide our customers with a quality custom-built teardrop at a reasonable price. Compare us to the competitors and you will find that our value, quality, and workmanship are far superior.

COLOR OPTIONS



Okschooners.com



DESIGN . BUILD EXPLORE



The

"Nathan and Stacey created a camper better than we could have ever imagined! Nathan's creativity and attention to detail is amazing!'

SIBEL





WHISPER DIAGRAM

FORMULAS

I TOTALLY LOVE BUILDING THESE TRAILERS!





FREEDOM DIAGRAM



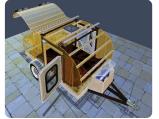
CUSTOMIZE YOUR FREEDOM



** * NATHAN

"Nathan at second wind trailers was a dream to work with! From the second I inquired about getting a freedom trailer made by him, he was very informative and friendly. He kept me in the loop every step of the way by sending pictures and videos of the build. It was such a cool experience seeing it being built from the ground up"

Starting With One Of Two Recipies It's Only The Beginning...



3D MODEL MOCKUP

Every Single Trailer We **Build Is** A Work Of Art!





"Nathan was so transparent through the build process we are so happy with the customizations we were able to add to our trailer. He was able to work with our budget and flexible to our last minute requests. His craftsmanship is unparalleled and we really appreciate how he kept us in the loop throughout the process."

CHECK OUT MORE ON OUR WEBSITE:









www.SecondWindTrailers.com

NOTE: One of the great things about having a digital magazine is the ability to link you directly to the products or services that you want to hear more about. Some of the links on our website or in the magazine are affiliate links where we earn a small commission on goods that you purchase, this does NOT raise the price of what you're purchasing in any way. These commissions help us to continue to defray the costs of publishing this magazine. You may notice as you read through the magazine that if you put your mouse over any ad or hyperlink, the screen may flash briefly. You can click on that picture or hyperlink and it will take you directly to more information.

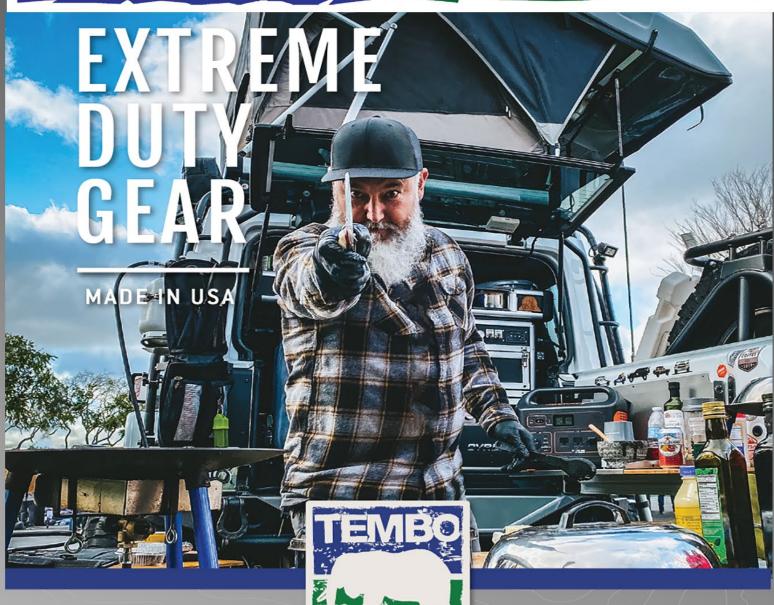
Cool Tears also participates in the Amazon Services LLC Associates Program, an affiliate program designed to help small businesses like this to earn a small fee by linking products to Amazon that you may be interested in. Again, this does NOT raise the price of what you're purchasing in any way.

We appreciate your support. If you have any questions, don't hesitate to contact either of us at Lisa@cooltears.com or Anne@cooltears.com

Harvest Hosts is a membership program that provides access to a network of wineries, farms, breweries, museums and other unique attractions that invite RVers to visit and stay overnight. Harvest Hosts now allows clamshell and teardrop trailers, but you may NOT use your outdoor cooking facility. Click the logo below to get 15% off the regular yearly price.



TEMBO TUSK



Skottle Grills Camp Tables Fridge Slides

TemboTusk.com
Info@TemboTusk.com

Made in America
Use Coupon Code: CoolTears



www.TemboTusk.com



By COOL TEARS STAFF -

Teardrops, squaredrops, and other tiny campers are not just toys to be used from May through September. Many people have started to enjoy the shoulder seasons more, which would be earlier in the spring and later in the fall, but have you thought about winter camping? Here are several tips to help you really enjoy the season whether you are an experienced winter camper or someone just trying it for the first time.

Campground or boondock?

The Cool Tears Staff recommends staying in a campground until you are an experienced cold weather camper. The main reason for this recommendation is safety. Choose a campground that has electric available and use it! If your tiny camper relies on a battery for power, then the performance of that equipment will be reduced based on the temperature and you may damage your battery. See the article in this issue on AGM battery maintenance for more information. If you have electricity at your site, then this opens up many options for you on how to stay warm.

It is possible to boondock in cold temperatures; however, it is imperative that you understand how you will warm up or have heat. It may be best to practice in your yard or close to home so you can learn how your batteries respond to being used while cold or how many blankets you need to stay warm if you will have no heat source.

Heat

Many diehard campers may not want to use an extra heat source, that's ok. But many teardrop and squaredrop camper owners started as tent campers and moved to a tiny camper to get off the ground and to be more comfortable. If you choose not to use an extra heat source, then be sure to use either sleeping bags appropriate for the temperature or use several blankets, comforters, etc. It's best to be too warm, than too cold. It's easy to shed covers, but hard to warm up.

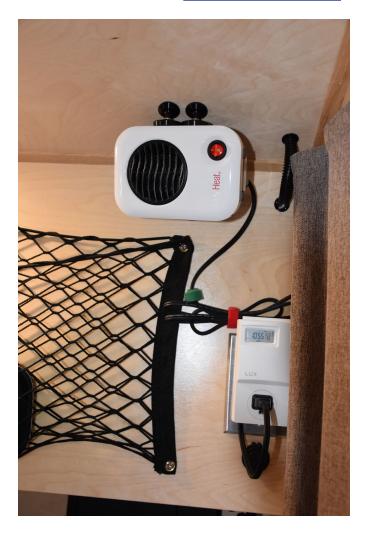
If you've chosen a campsite with electricity, then you have many options for warming

up your cozy cabin. One great option is to use an electric blanket that you may have at home. This is a great way to warm up the bed before you crawl in for the night. A 12volt electric throw can work well too, especially if you lay on top of it and then layer the blankets over you. I have stayed plenty warm with temperatures in the mid teens Fahrenheit laying on this electric throw with a 40°F (4°C) rated sleeping quilt on top. A top quilt is similar to a sleeping bag, except there is nothing beneath you, the back is open. Since a sleeping bag doesn't insulate when compressed, this is not an issue and the top quilt allows for more freedom of movement instead of being enclosed in a mummy sleeping bag.

Another option that relies on electricity is a small space heater. We have successfully used this 200W heater on several occasions. For less than \$25USD, this is a great option for heating the entire cabin. We place it on a shelf and we have safe heat all night long. We met a fellow teardrop owner in 2021 that used the same heater, but since he did not have a shelf to place it on safely, he mounted his to the



ceiling of the teardrop with magnetic mounts for a mobile device. The Scosche brand of magnetic mounts work well for this application. Note that he does not tow the trailer with this mounted. The final accessory that makes this small heater a dream to use for winter camping is an automatic heating and cooling thermostat outlet. We can set the temperature that we'd like the cabin of the teardrop to be warmed to and then this thermostat outlet.



cycles the heater off and on as needed.

Some people have successfully used external all-in-one diesel heaters and have run the

ducting through a window to provide heat inside the cabin. These are readily available on Amazon and are relatively inexpensive; however, they are not all created equally and may not work out of the box without tinkering with them. To be used successfully, it would need to be placed in a rain/snow resistant case. Planar Heaters makes a portable diesel heater that works right out of the box with zero issues. While pricey, this may be an option for you. We have used it to heat our Clam Quick Set tent while camping in cold weather in the Upper Peninsula of Michigan and we have plans to use it to heat other small spaces in the future.

Now that you have some heat source, work hard to keep that heat inside. Limit the amount of time your door is open while getting in and out of the teardrop or squaredrop. If your tiny camper has windows, you may want to line them with Reflectix to keep the heat in. Reflectix is readily available at most big box hardware stores and it's easy to cut to size with a pair of scissors. Most manufactured doors are not well insulated, so you may want to put Reflectix on the door as well.

We do not recommend using a propane heater like a Mr Buddy inside the cabin due to the build up of moisture. More on this in the Controlling Moisture section of the article. Note that many teardrop manufacturers offer a propane heating option. Since the combustion chamber is outside of the teardrop, these would not increase the moisture inside the cabin and would be ideal to use for cold weather conditions.

Weather Conditions

Know the weather conditions and expected

temperatures where and when you'll be camping and know your own thresholds for safety and comfort. While we don't mind the cold, I would not want to wake up to a fresh foot of snow when it's time to tow the teardrop home. Your tow vehicle and trailer can likely handle a few inches of snow with no issues, but high winds, icy roads, or snow squalls in the area mean that you should postpone your trip. Most states also have websites or apps to check current road conditions so you can determine if you feel comfortable driving to

moisture away from your body (no cotton), a middle layer to insulate you from the cold (fleece is great), and an outer layer that acts as a barrier from the elements (water and wind). Don't forget the stocking hat and gloves or mittens.

Storage

A major challenge of winter camping is storing all of the extra layers that you're going to need to be warm outside. Finding a good place for



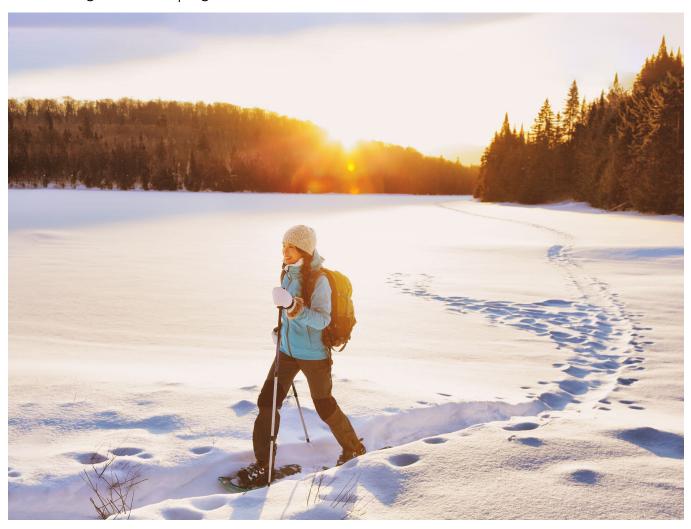
your coat or parka, boots, hats, gloves, and thermal lavers can be a challenge at home, but now you're in a tiny teardrop. A lot of teardrop campers leave their shoes outside each night, this may not be desirable in the winter, so have a plan to keep your shoes and boots dry and warm before you put

your intended destination.

Understanding what is expected will help you decide on your clothing and layers that are necessary in order to safely and comfortably be outside. There are many articles and videos on how best to layer your clothes for being outside in cold temperatures, so we won't go into those details here. But the basics include: an inner layer for wicking

them back on. Setting your boots upright in the smallest plastic tote that fits your boots so it can stay on your bed might be an option. Or you could place your boots in a sturdy trash bag and set it in the cabin or on a shelf in the cabin.

If you're winter camping, know how to safely pack your extra gear, which may include cross country skis, downhill skis or snowboards, and snowshoes. Any of these activities make for a more exciting winter camping adventure.



WATER

One of the most important items to manage is water. First, if you have a water tank and sink, don't use them while winter camping. Ideally, the water tank and pump have been winterized already depending on either your manufacturer's recommendation or through your own research on how best to do it for your setup.

Doing dishes

If you normally use dishes, you may want to make the switch to disposable for your winter camping trips. Depending on the temperature, it is challenging enough to keep water from freezing for drinking or cooking, so you may not want the additional worry of having enough water for washing dishes. If you'd rather use your dishes and wash them, having a spray bottle with a mixture of white vinegar and water may be enough to get

your dishes clean. But note that this is likely to freeze about the same temperature as water, so care must be taken to prevent it from freezing. Another option is to wipe your dishes clean with a dishcloth or paper towel and then spray with vodka. It is important to note that in order to be considered a disinfectant to kill viruses such as the coronavirus, the vodka would need to be at least 60% alcohol or 120 proof. A normal 40% alcohol or 80 proof vodka has a freezing point of about -16°F (-27°C) which makes it ideal for winter camping where we live.

Cabin Moisture

Moisture or condensation in a teardrop in the spring, summer, or fall is typically not much more than a nuisance, but moisture during the winter can be dangerous. Crawling

into a damp sleeping bag with temperatures below freezing can make for a miserable night and next day. An easy way to combat moisture is to heat the cabin, not just the bed. Some may also need to crack a window to help prevent condensation from building up on

the walls. For us,

when we camp without heat, we tend to build up more moisture inside the cabin, so we crack a window or the ceiling vent. If we use the small heater that was mentioned earlier, then condensation only forms on the windows. In the morning, wipe down the walls, doors, and windows with a towel to remove the moisture. This will make the next night more comfortable and is an important step in maintaining your tiny camper in the long run, since moisture can cause mildew and mold.

Water Storage

The last topic related to water is how to keep it, well, as water. This will depend on the temperatures that you will encounter while camping, but here are some tips to keep your water from freezing while camping. Use a dedicated cooler to store your water jugs. If your cooler is well insulated, it should do well to keep your water from freezing. If you don't have an extra cooler, you could make one specifically for holding your water by using at least 2 inch thick foam sheets from your local DIY store. Cut the pieces to form a box (with a

bottom and lid) and use duct tape to hold it together. Keep this cooler in your tow vehicle for maximum benefit. The second way to prevent your water from freezing is to keep it inside the heated cabin of your teardrop. Backpackers and tent campers often sleep with their water bottle inside their sleeping bag at night.

Water freezes from the top down, so if you think your water may freeze, then turn the bottles upside down. This will allow you to still open the lid or spigot of your water bottle for drinking since only the top will likely have

frozen. Using wide mouth bottles or water jugs are best, because there is a greater chance to keep the water from freezing where you pour from. In the summer months, many people use insulated bottles like a **Yeti** or a **HydroFlask** to keep your drinks icy cold. HydroFlask products have a lifetime warranty! Use it in the winter and put warm water in them before you leave for your trip. Yeti and HydroFlask have a 64 ounce bottle that would work well in freezing temperatures. As a last resort, if there is a good snow pack around your campsite, bury your water jugs in the snow. Snow can be a good insulator. Be sure to place your water jugs upside down so the lid or opening is at the bottom, since it will start to freeze from the top down.

Extra tips to make things more enjoyable

- Bring a snow shovel. There are several small, packable shovels available.
- On your tow vehicle, pull your windshield wipers off the windshield to prevent them from freezing to it.
- This is the time for that roaring campfire each day and evening. It's a great way to warm up without having to go inside the teardrop.
- Drive slower in the snow and check the conditions for the length of your trip.
- Limit the amount of time cooking your meals by bringing leftovers to reheat.
- If you have a side tent, awning, or rug that you use with your teardrop or squaredrop, use them. This area coupled with a propane fire pit makes for a cozy space to relax during the day or night.

Summary

Cold winter camping can be enjoyable if

you're prepared. One reason people own teardrops or squaredrops is that they love being outdoors. They don't camp in the big rigs that look like small homes. They camp to explore and to be outside. Camping in a teardrop in the winter can be just as enjoyable as it is in the summer if you are well prepared. A few added bonuses for winter camping? No bugs and less crowds! Get out there and try a few nights this winter. Be sure to use the hashtag #cooltearsmag across all social media platforms so we can see who's out there enjoying life in their tiny camper!





et's talk about batteries, specifically AGM (absorbed glass mat) batteries. For many in the northern tier of North America or Europe, the camping season is either winding down or has stopped completely due to weather, which means it's time for a little battery maintenance.

Many people falsely believe that AGM batteries are maintenance free since they are sealed and don't require the owner to add water to the battery; however, understanding how to store, charge, and prevent sulfation is essential for the performance and life of the battery. The steps below will walk you through how to properly store an AGM battery that will not be in use for a few months of the year. By following these simple steps, you should be able to reinstall your battery in the spring and it will be fully charged and ready for your first trip.

Battery Storage

When you need to store your AGM battery for a long period of time without use, disconnect your battery from the teardrop. It is recommended to store the battery indoors in a temperature controlled environment; basements are ideal if you have one. Note that it is not necessary to place the battery on wood or foam before setting on a concrete floor. According to Interstate Batteries, "the type of plastic (polypropylene) used in battery cases is a great electrical insulator. Also, tremendous technological improvements have been made in the seals around the battery posts and vent systems, which have virtually eliminated electrolyte seepage and migration. So, it's OK to set or store your battery on concrete. A battery's rate of discharge is only affected by its age, the temperature outside and the way the inside of the battery is made."

This is also a great time to clean the outside of your battery case with a mixture of baking soda and warm water. AGM battery terminals should not corrode since they are sealed. If you notice corrosion on the terminals, contact the battery manufacturer.

Charge the battery

It is best to store the battery after it has been fully charged. This is imperative if your battery will not be stored in a temperature controlled environment. Discharged batteries can freeze at 15°F or -9°C, but a fully charged battery will not freeze unless the temperature reaches -75°F or -59°C. The coldest temperature ever recorded in the US was -70°F (-57°C) in Montana in 1954, according to The Weather Channel. So if you do need to store your battery outside, you can likely

do so with no problems. Do not overcharge your AGM battery. It is best to use the recommended charger, per your battery manufacturer. The manufacturer's charger will charge at the recommended voltage and will not overcharge or undercharge the battery. Some of these trickle chargers can be used during the entire storage period and they will not damage the battery.

If your teardrop trailer has a charge controller that works for your battery type, you can charge your battery while in the teardrop before removing it for storage instead of purchasing a separate charger. Ideally, the battery should be charged to a minimum of 12.4 volts before storage to prevent sulfation. It may be necessary to use a trickle charger to maintain the 12.4 volts during storage.

Prevent Sulfation

Sulfation is the formation or build up of lead sulfate crystals on the surface and in the pores of the batteries lead plates. During normal battery use, lead sulfate crystals form temporarily, but disperse during the recharging process. A battery that has sulfation will reduce its ability to hold a charge. All batteries will have some degree of sulfation but under or over charged batteries, batteries not used for extended periods of time, or not stored fully charged are more susceptible.

As an AGM battery discharges, lead sulfate forms and as the battery recharges, this lead sulfate is converted to lead and lead oxide. In a perfect world, all of the lead sulfate would convert back with each charging cycle; but the world is not perfect. Some of the lead sulfate remains and slowly hardens into crystals that become permanent. If your battery goes an

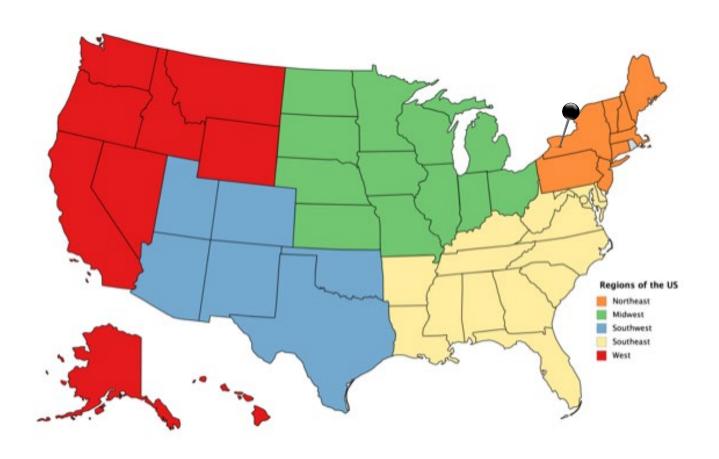
extended time between full charging cycles and you discharge your battery more deeply, then more lead sulfate crystals form. This is what we are trying to prevent by properly charging and storing the battery at the end of the season or during the colder months when the teardrop trailer is used less.

Summary

AGM batteries are designed to have a long life, some of them may last more than five years; however, in order to achieve this long life, some minimal maintenance is required. Knowing how to store, charge, and prevent sulfation on your battery is key to expanding the life and performance of your battery.



REGIONAL CAMPING SPOTLIGHT



The human spirit needs places where nature has not been rearranged by the hand of man." ~ Author unknown

Both camping locations are unique and offer wide open land to explore by land or air. Mother nature has carved an immense canyon with the power of water. Letchworth State Park and the windswept landscape of North America's grasslands remain mostly unchained by human hands. Happy camping.

Location: Letchworth State Park 1 Letchworth State Park Castile, NY 14427

Getting There:

GPS Info (Latitude, Longitude): 42.570148, -78.051170 42°34′12.533″N, 78°3'4.211″W

Letchworth State Park is located about 45 miles (about 72km) southwest of Rochester, New York and it comprises more than 14,000 acres (5665 ha). This state park is known as the "Grand Canyon of the East" as the Genesee River flows through the gorge over three major waterfalls between the cliffs, which can rise as high as 600 feet. The park is just west of the Finger Lakes; the park is 5 hours from NYC, two from Syracuse, and about one hour from Buffalo and Rochester. You could easily use the park and then make a day trip to Niagara Falls which is about 75 miles (120 km). In 2015, Letchworth State Park won the USA Today Readers' Choice

Award for best state park in the US.

This state park is open year-round and there are plenty of outdoor activities to participate in no matter which season you visit the park. If you enjoy hiking, there are 66 miles (106 km) of trails. There are also trails for horseback riding, biking, snowmobiling, and cross-country skiing. In the winter, there is also a place to snow tube. If hiking is not your passion, then try whitewater rafting, kayaking, or swimming in the pool.



One of the most unique features of the park is The Autism Nature Trail (or the ANT). The trail is a one mile loop with a series of eight sensory stations that appeal to those with autism

spectrum disorder. Erik Kulleseid, the commissioner of New York State Parks, Recreation and Historic Preservation said, "This trail here is a totally new thing for state parks, and it's specifically designed to meet the needs of people with autism spectrum disorder and their families.. This is meant to be a place where they can be here in a safe and judgement-free place ... it's a place where people can come with their family members with autism and feel embraced, welcome and free to be in nature and welcome at Letchworth State Park."

Other Nearby Attractions

The Letchworth Park gorge provides an incredible backdrop for hot air balloon rides. <u>Balloons</u> <u>Over Letchworth</u> schedules flights year-round in the mornings and evenings, Monday through



Saturday. All of their flights begin within the state park. The restored Glen Iris Inn offers additional lodging if needed and is open to the public for breakfast, lunch and dinner.

Number of Sites: 270

Pets: yes Water: yes Electric: yes

Price per night: \$\$\$ (\$27-\$30/night, electric site - surcharge of \$5/night for out of state

residents)

Fire Rings: yes Picnic Tables: yes

Restrooms/Showers: yes

Campground has ADA accessible sites.

Primary activities within the park: Hiking, biking, kayaking, and white water rafting are key activities within this state park. There are outfitters in the area for your rental or trip needs.

Pro Tip:

The Humphrey Nature Center has year-round programming that is open for school groups, scouts, and the general public. Programming and exhibits highlight the wildlife, geology, and ecology of the park. The building is open daily from 10AM - 5PM.



Location: Grasslands National Park SK-4, Val Marie SK S0N 2P0, Canada

Getting There:

GPS Info (Latitude, Longitude): 49.2010694, -107.7105 49°12'03.85"N, 107°42'37.8"W

Grasslands National Park is a Canadian national park that is just one of two national parks in Saskatchewan. The park lies just north of the Montana border and comprises nearly 350 square miles (907 km2) of land. The park only receives about 12,000 visitors per year. Grasslands National Park is split into two main blocks, East and West. Each block has a campground as well. To drive between the two visitor centers in each block takes roughly two hours, so if you plan to stay, be aware of which side to enter.

There are two scenic drives within the park, The Badlands Parkway in the East Block and the Ecotour Scenic Drive in the West Block. Along the drives, you may notice prairie dog colonies or bison. You can view archaeological sites as well as historical homesteads and ranching sites. The first dinosaur remains in western Canada were discovered in this area.

If your trip to Grasslands National Park has hiking on the list, plan to stay in the West Block as



there are more than 34 miles (55 km) of hiking trails, while the East Block has less than 2 miles (3 km) of trails.

Reservations for the 2022 season launch on February 4, 2022 at 8AM CST.

Number of Sites: 20 (West Block/Frenchman Valley), 24 (East Block/Rock Creek)

Pets: yes, some sites allow pets

Water: yes, but not at sites. Water is only available from May 1 - September 5, 2022.

Electric: yes

Price per night: \$\$\$ (\$31/night)

Fire Rings: yes Picnic Tables: yes

Restrooms/Showers: vault toilets Campground has ADA accessible sites.

Primary activities within the park: Hiking, stargazing (this is a Dark Sky Preserve and the largest and darkest in Canada), horseback riding (outfitters in the area), kayaking the Frenchman River, wildlife viewing, bird watching, geocaching, photography, and cycling or mountain biking (many trails are open for bikes). There are programs for children as well.

Pro Tip: This park is home to 7 sets of red chairs, three in the West Block and 4 in the East Block. The red chairs started in 2011 when one of the Canadian parks (Gros Morne National Park) came up with the idea to place the chairs at lesser-known, but stunning locations around the park. These chairs invite people to enjoy the views and share photos on social media.

Parks Canada has now placed over 200 red Adirondack chairs in scenic and peaceful locations throughout the country's most treasured locations. If you take a photo and share it on social











your way!

Anne@cooltears.com



https://www.facebook.com/CoolTearsMagazine/



@cooltearsmag

Tag your 'grams with #cooltearsmag for a chance to be featured on our Instagram feed and in the magazine.



Time for a new adventure. Videos of our adventures, reader builds, tips and tricks. Live tiny - Live free.