Truck Camper
Owner's Manual

Livin' Lite™
recreational vehicles

www.LivinLite.com

5.3.17

My LIVIN' LITE Notes:

Tip: Always start your notes with the date.

TABLE OF CONTENTS

Key Information 6
Customer Information Update.....8
Pre-Trip Check List 10
Important Safety Information.....11
Limited Warranty.....14
Camper & Truck Size.....18
Loading.....20
Power System.....24
Electrical System.....25
Plumbing System.....26
Fire Safety.....30
LP Gas System.....32
Appliances.....37
Equipment.....40
Effects of Prolonged Occupancy.....42
Winter Storage, Care & Maintenance.....43

Reporting Safety Defects

If you believe that your vehicle has a defect which could cause a crash or could cause injury or death, you should immediately inform the National Highway Traffic Safety Administration (NHTSA) in addition to notifying Livin' Lite Recreational Vehicles, Inc.

If NHTSA receives similar complaints, it may open an investigation, and if it finds that a safety defect exists in a group of vehicles, it may order a recall and remedy campaign. However, NHTSA cannot become involved in any individual problems between you, your dealer, or Livin' Lite Recreational Vehicles, Inc.

To contact NHTSA you may call the Auto Safety Hotline toll-free at (800) 424-9393 or (366-0123 in Washington DC area) or write to:
NHTSA
U.S. Department of Transportation
400 7th Street SW, (NSA-11)
Washington, DC 20590

You can also obtain other information about motor vehicle safety from the Hotline number listed above.

ND.0912.EO

Livin' Lite™
recreational vehicles

Dear Valued Customer,

CONGRATULATIONS! And thank you for your business. This owner's manual outlines the Livin' Lite Recreational Vehicles, Inc. One Year Limited Warranty.

We encourage you to follow the Product Delivery Inspection procedures with your selling dealer. You should receive an extensive walk through and demonstration of your camper, and the warranty statement contained in this manual should be fully explained to you. The desired result is that you have been informed of the warranty provided, the operation, the maintenance required, and details of the responsibilities of the manufacturer, dealer, and retail partnership.

At Livin' Lite Recreational Vehicles, Inc, we want you to be able to enjoy your new camper. In the following pages, you will learn about your warranty, the features of your Livin' Lite camper, and the maintenance necessary to ensure years of enjoyable use. We encourage Livin' Lite owners to review and pay special attention to the following:

- Warranty Statement – please read the full warranty statement.
- Weight rating – please review the proper tie-down and loading instructions for your safety and that of others.
- Care and Maintenance – review sealant maintenance requirements.
- Tire and Lug Nut – review inflation and lug nut torque specifications.
- Modifications/Deviations – review that changes or alterations can void the warranty.
- Condensation – review causes and advice on how to reduce and control.

Your unit has been inspected by the factory, and received a final inspection at the dealership. Please allow your dealership to assist you in remedying any warranty issues, and should you need to contact our Wakarusa, Indiana, service facility, please contact us at (574) 862-2228.

We wish you many seasons of happy camping with your *Camplite*, by Livin' Lite Recreational Vehicles, Inc.

Best Regards,
The "Livin' Lite" Team

Livin' Lite Recreational Vehicles, Inc.
Warranty Department
0985 N 900W
Shipshewana, IN 46565
Ph: (260) 768-4016
Fax: (260) 768-7629

NOTE: This manual is based on the latest information available at the time of publication. Due to continuous product development and improvements, Livin' Lite Recreational Vehicles, Inc. reserves the right to make changes in product specifications and components without prior notice or obligation.

KEY INFORMATION

Important Facts:
If you are traveling or move, any authorized dealer may provide service. Keep your warranty registration form with the vehicle at all times since it must be presented for warranty service. This form is your proof of purchase and provides the date of retail sale, both of which are necessary to determine warranty eligibility.

Important Facts:
Please inspect your recreational vehicle at the time of delivery and make sure you accept it as delivered to you. This recreational vehicle has been sold to an independent dealer, and not an agent of Livin' Lite Recreational Vehicles, Inc. for resale in the ordinary course of the dealer's business on terms and conditions and equipped as he and you determine and your agreement is solely with the dealer, not Livin' Lite Recreational Vehicles, Inc. Livin' Lite Recreational Vehicles, Inc. does not participate in retail sales or retail contracts in any instance, other than by terms of this Limited Warranty.

Important Facts:
Livin' Lite Recreational Vehicles, Inc. reserves the unrestricted right at any time and from time to time to make changes in the design of and/or improvements upon its product without thereby imposing any obligation upon itself to make corresponding changes or improvements in or upon its products already manufactured. Livin' Lite Recreational Vehicles, Inc. further reserves the right to substitute parts or components of substantially equal quality in any warranty service required by operation of this Limited Warranty.

Important Facts:
Like any other product, a recreational vehicle and the products installed in it will require care and maintenance attention by the owner and occupants. Please read and follow all care and maintenance manuals and instructions supplied with your recreational vehicle.

Key Information to have on hand (Livin' Lite customer should fill out):

All warranty work needs to be completed during the term of the warranty.

Warranty beginning date: _____/_____/_____ Warranty ending date: _____/_____/_____

VIN#: _____

Note: All service work performed after the expiration date will not be covered by Livin' Lite Recreational Vehicles, Inc.

Original Owner: _____ Phone Number: _____

Dealership Purchased from: _____ Phone Number: _____

Second Owner: _____ Phone Number: _____

Person/Dealership Purchased from: _____ Phone Number: _____

OUR VALUED CUSTOMERS

If, for any reason, you have a problem obtaining satisfactory and timely warranty service that may substantially impair the use, value or safety of your Livin' Lite Recreational Vehicles, Inc. product, please call us so that we may attempt to resolve your concerns. Authorized dealers are independent contractors and independently owned businesses. This is also true of the authorized service centers.

Please note, your Livin' Lite Recreational Vehicles, Inc. warranty covers warrantable repairs that are performed by an authorized Livin' Lite Recreational Vehicles, Inc. dealer at their service center or facility only. It is important for the owner to know that if you are unable to bring in your unit for repairs, Livin' Lite Recreational Vehicles, Inc. is not responsible for any costs incurred for the service call charge, or time accrued to come out to your unit.

Can't find a dealer? Have an emergency? Livin' Lite customer service can be reached at (260) 768-4016. We can help locate a dealer nearby or, in case of emergency or special circumstances, provide authorization to a local repair facility.

Before using any non-authorized dealer for any warranty repair – call Livin' Lite first!

Livin' Lite™
recreational vehicles

CUSTOMER INFORMATION UPDATE FORM

Livin' Lite Recreational Vehicles, Inc. strives to keep the most accurate and current customer information in its files in order to maintain good customer relations.

If you bought this unit new, we have your information from the warranty registration form which you have sent to us on file. If, however, you purchased this unit as used then we ask that you complete the following information and mail it to us so that we can be sure that our records are updated.

Please note that the date of purchase on the card will show the original date the vehicle was first purchased and is the date applicable warranties originated. Note: the warranty on a Livin' Lite Recreational Vehicles, Inc. product is non-transferable. This customer information update form is for record keeping purposes only. If you have any questions, please contact a Livin' Lite Recreational Vehicles, Inc. service representative.

DATE: _____ UNIT VIN NO.: _____

CUSTOMER FULL NAME: _____

CUSTOMER ADDRESS: _____

_____

TELEPHONE NUMBER: _____

EMAIL ADDRESS: _____

PURCHASED FROM: _____

ADDRESS: _____

_____

Livin' Lite Recreational Vehicles, Inc.
ATTN: Service Department
0985N 900 W, Shipshewana, IN 46565
Ph: (260) 768-4016 • Fax: (260) 768-7629

IDENTIFICATION INFORMATION

In the event of theft, it is important to be able to properly identify your property. It is recommended that you write your camper serial number inside a cabinet or behind a drawer. You should also keep a copy of the following information at home. This information is also useful to have when service is needed.

PLEASE TAKE THE TIME TO COMPLETE THIS INFORMATION AS REFERENCE.

Your Name _____

Address _____

Dealer Name _____ Purchase Date _____

Model _____ Serial Number (S/N) _____

Entry Door Key Number: _____ Insurance Policy: _____

Agent's Name: _____ Agent's Phone : _____

Air Conditioner
Manufacturer _____ Model _____ S/N _____

Furnace
Manufacturer _____ Model _____ S/N _____

Generator
Manufacturer _____ Model _____ S/N _____

Microwave Oven
Manufacturer _____ Model _____ S/N _____

Range
Manufacturer _____ Model _____ S/N _____

Stereo
Manufacturer _____ Model _____ S/N _____

Television
Manufacturer _____ Model _____ S/N _____

Water Heater
Manufacturer _____ Model _____ S/N _____

PRE-TRIP CHECKLIST
(AT HOME)

Read and understand owner's manual? _____
If not, please do so now.

INTERIOR:

Lower the Dinette Table _____

Close Roof Vents _____

Turn off all LP Appliances _____

EXTERIOR:

All objects secure _____

Tie-Downs secured properly _____

All exterior lights operational _____

Battery fully charged, fluid level okay _____

Secure cargo doors, lock entry door _____

You may want to use this list as a start for your own Pre-Trip checklist, which may include your personal camping gear and food preferences.

PRE-TRIP CHECKLIST
(AT CAMPSITE)
FOLLOW THE PREVIOUS CHECKLIST WITH THESE ADDED POINTS:

EXTERIOR:

Disconnect all shore lines _____
(City water, electric)

Retract step _____

Store camping equipment _____

All objects secure _____

Tie-Downs secured properly _____

All exterior lights operational _____

Battery fully charged, fluid level okay _____

Secure cargo doors, lock entry door _____

CHECK CLEARANCES PRIOR TO PULLING OUT!

This checklist may seem like it contains basic items, but many are taken for granted and can spoil a trip if not attended to prior to moving the camper.

IMPORTANT SAFETY INFORMATION

This guide has been provided by Livin' Lite Recreational Vehicles, Inc. for the purpose of providing instructions about the operation and maintenance of this vehicle and its components. The only warranty offered by Livin' Lite Recreational Vehicles, Inc. is set forth in the written One Year Limited Warranty that applies to this vehicle. Nothing in this manual creates any other warranty, either expressed or implied.

Instructions are included in the manual for operating some of the components that are standard on this vehicle. Instructions may also be given for components that are options and may not appear on all vehicles. For more detailed information on the components installed, refer to the individual component manufacturer's operating instructions contained in the Owner's Information Package.

Livin' Lite Recreational Vehicles, Inc. has attempted to compile the most current information available at the time this guide was published. If the components in your unit vary significantly from what is described within this manual, then consult the instructions provided by the component manufacturer found in the Owner's Information Package. If you have any questions regarding operation, maintenance, or service, please contact your dealer immediately.

Throughout this guide, reference is made to the following terms: Warning, Caution, and Note. These terms indicate important information that must be understood and followed. The definitions are:

⚠ WARNING

Personal injury or even death could result from failure to follow instructions properly. Physical damage to the unit or equipment may also occur.

⚠ CAUTION

Physical damage to the unit or equipment could result from failure to follow instructions properly. Personal injury is possible but unlikely.

☛ NOTE

Please pay special attention to this important information regarding the topic.

Livin' Lite Recreational Vehicles, Inc. is required to furnish the following consumer information as provided by the National Fire Protection Association and the American National Standards Institute. The information and warnings found here might also be found in other chapters of this Owner's Manual. Please see chapters titled "LP GAS SYSTEM" and "APPLIANCES" for other safety and operating information.

Unlike homes, the amount of oxygen supply is limited due to the size of the recreational vehicle, and proper ventilation when using cooking appliances will avoid dangers of asphyxiation. It is especially important that cooking appliances not be used for comfort heating as the danger of asphyxiation is greater when the appliance is used for long periods of time.

Please pay careful attention to the following cautions and warnings:

WARNING

Propane containers must not be placed or stored inside the vehicle. Propane containers are equipped with safety devices, which relieve excessive pressure by discharging gas to the atmosphere.

WARNING

It is never safe to use cooking appliances for comfort heating. Cooking appliances need fresh air for safe operation. Before operation, open overhead vent or turn on exhaust fan. FAILURE TO COMPLY COULD RESULT IN SERIOUS INJURY OR DEATH.

WARNING

Portable fuel-burning equipment, including wood and charcoal grills and stoves shall not be used inside the camper. The use of this equipment inside the recreational vehicle may cause fires or asphyxiation.

WARNING

All pilot lights, appliances and their ignitors (see operating instructions) shall be turned off before refueling of motor fuel tanks and/or propane containers. Failure to comply could result in death or serious injury.

WARNING

A warning label has been located near the LP gas container that reads: DO NOT FILL CONTAINER(S) TO MORE THAN 80 PERCENT OF CAPACITY. Overfilling the LP gas container can result in uncontrolled gas flow which can cause fire or explosion. A properly filled container will contain approximately 80 percent of its volume as liquid LP gas. Safety regulation prevents filling over 80 percent.

WARNING

Do not bring or store propane containers, gasoline, or other flammable liquids inside the camper. Fire or explosion result.

CAUTION

THIS LP PIPING SYSTEM IS DESIGNED FOR USE WITH PROPANE ONLY. DO NOT CONNECT NATURAL GAS TO THIS SYSTEM. Securely cap inlet when not connected for use. After turning on gas, except after normal cylinder replacement, test propane piping and connections to appliance for leakage with soapy water or bubble solution. Do not use products that contain ammonia or chlorine.

IF YOU SMELL PROPANE:

1. Extinguish open flames, pilot lights and all smoking materials.
2. Do not touch electrical switches.
3. Shut off the propane supply at the container valve(s) or gas supply connection.
4. Open doors and other ventilating openings.
5. Leave the area until odor clears.
6. Have the gas system checked and leakage source corrected before using again.

Propane regulators must always be installed with the regulator vent facing down to minimize vent blockage which could result in excessive pressure causing fire or explosion.

CARBON MONOXIDE HAZARD

Your truck and your camper's generator exhaust contain carbon monoxide gas. To avoid danger, maintain your truck and generator properly. Have the exhaust system inspected for leaks when the truck and camper is serviced, you notice a change in the sound of the exhaust, or the truck or camper was in an accident.

Dispute Resolution Procedures

Negotiation, Mediation, and Arbitration. Any dispute arising out of or relating to the sale or use of this RV, including any disagreements regarding application of the Limited Warranty (a "Dispute") shall be resolved as follows:

a. Owner and Livin' Lite Recreational Vehicles, Inc. shall first attempt, in good faith, to resolve the Dispute promptly by discussion and negotiation.

b. If the Dispute cannot be resolved by discussion and negotiation, then Owner and Livin' Lite Recreational Vehicles, Inc. shall attempt to resolve it through mediation with the assistance of a qualified and independent mediator.

c. If the Warranty Dispute cannot be resolved through mediation, then the parties shall finally settle the Warranty Dispute by binding arbitration conducted before a single, neutral arbitrator. Such arbitrator shall be selected from a panel supplied by the American Arbitration Association ("AAA") from arbitrators who are members of the National Academy of Arbitrators. Unless otherwise agreed to in writing by the parties, the AAA Commercial Dispute Resolution Procedures and Supplementary Procedures for Consumer-Related Disputes shall apply to the arbitration process and proceedings.

d. The parties shall conduct any mediation or arbitration proceedings pursuant to this section in Lagrange County, Indiana.

Jurisdiction and Applicable Law

Exclusive jurisdiction for deciding any claims, demands or causes of action for defects or representations of any nature or damages due from such defects or representations shall be in the courts in the State of Indiana. The laws applicable to any litigation, dispute, mediation, arbitration or any claim whatsoever arising, from the sale, purchase or use of the recreational vehicle shall be those of the State of Indiana.

LIVIN' LITE RV INC.
TOWABLE LIMITED WARRANTY
Two Year Limited Warranty

SUMMARY OF WARRANTY:
LIVIN' LITE warrants that every towable recreational vehicle or truck camper purchased from an authorized LIVIN' LITE dealer to the first retail customer was free from substantial defects in materials and workmanship when it arrived on the dealer's lot, except those exclusions set forth below. Nothing contained herein shall be interpreted as a promise of future performance. The warranty period begins on the date of purchase or the date the unit is first placed in service, whichever is earlier. This Towable Limited Warranty ("TLW") does not apply to towable recreational vehicles or truck campers purchased from any source other than an authorized LININ' LITE dealer.

EXCLUSIONS FROM WARRANTY:
Excluded from the coverage under the TLW are: (1) items added, changed, or modified after the unit left the possession of LIVIN' LITE; (2) units used for any commercial purpose; (3) units used for full-time residential use or more than occasional recreational use; (4) wear and tear caused by normal usage by the consumer, including but not limited to fading or discoloration of soft goods [e.g., tents, upholstery, drapes, carpet, vinyl, screens, cushions, and mattresses], fading or discoloration of exterior or fiberglass components, tears, punctures, soiling, mildew, mold, and the effects of moisture condensation inside the unit; (5) the effects of alteration, tampering, mishandling, neglect, abuse, misuse, weather, acts of nature, acts of God, or corrosive atmospheres that promote rusting, oxidation or pitting; (6) minor imperfections that do not interfere or affect the the suitability of the unit for its intended use; (7) the effects of the consumer's or transferee's failure to perform normal and routine maintenance [e.g. inspections, lubrication, adjustments, tightening of screws and bolts, tightening of lug nuts and wheels, sealing, rotating, cleaning, or other damages resulting from failing to follow the maintenance schedule and procedures in the owners manual; (8) damages resulting from misalignment or adjustments to axles or spindles caused by improper maintenance, modification, loading, unloading, road hazards, road defects, off road travel, or tire failures. (9) damages caused by the negligent or intentional use or misuse of the unit by the consumer or transferee, including but not limited to occurrences while towing the unit; (10) loss or damage caused by a person or business as a result of transporting the unit after sale to the consumer, delivering the unit, or parking the unit; (11) loss or damage to the plumbing system caused by freezing; (12) claims for personal injuries of any type; (13) costs of transportation of the unit for repairs; and (14) components that are warranted separately by another manufacturer [the warranty provided by a component manufacturer is the sole responsibility of that manufacturer, and LIVIN' LITE does not warrant those components. Please refer to the warranties issued by the component manufacturers for the terms and conditions of such warranties].

NOTE

UNITS ARE MANUFACTURED FOR RECREATIONAL PURPOSES. UNITS USED AS COMMERCIAL, RESIDENTIAL, OR RENTAL WILL VOID YOUR WARRANTY.

TO OBTAIN WARRANTY SERVICE:
Warranty service may be performed only at LIVIN' LITE, or at LIVIN' LITE authorized dealers and service centers. Contact LIVIN' LITE for a list of authorized dealers and service centers. REPAIRS OR REPLACEMENTS BY UNAUTHORIZED DEALERS OR SERVICE CENTERS WILL VOID THIS TLW. If the consumer believes that a claimed defect is covered by this TWL, contact must be made with LIVIN' LITE RV INC., as described below, or an authorized LIVIN' LITE dealer, WITHIN THE WARRANTY PERIOD. Sufficient information must be given to attempt to resolve the claimed problem. Should LIVIN' LITE determine the repair or replacement is appropriate, the consumer must deliver the unit to the dealer or service center as directed. Delivery shall occur no later than thirty (30) days after the authorization for repair or replacement.

Do not deliver your unit to LIVIN' LITE, an authorized dealer, or service center without prior authorization. All costs incurred by the consumer for transportation for warranty service shall be the sole responsibility of the consumer. The consumer must contact LIVIN' LITE by CERTIFIED MAIL with a written description of the claimed warranted defect and the efforts to remedy it. FAILURE TO SO NOTIFY LIVIN 'LITE IN THIS REGARD SHALL RENDER THIS TLW VOID AS TO THE CLAIMED DEFECT. The scheduling of warranty work at an authorized dealer or service center is not controlled by LIVIN' LITE and delays may be experienced. LIVIN' LITE is not responsible for loss of use of the unit, expenses for fuel, telephone, food, lodging, travel, loss of income or revenue, or loss of or damage to personal property.

NOTE

DISCLAIMER AND LIMITATIONS OF WARRANTIES

NEITHER LIVIN' LITE RV INC., NOR ITS DEALERS SHALL BE LIABLE FOR INCIDENTAL, CONSEQUENTIAL, INDIRECT, SPECIAL, OR PUNITIVE DAMAGES OF ANY KIND OR ANY OTHER FINANCIAL LOSS ARISING OUT OF OR IN CONNECTION WITH THE SALE OR USE OF THIS PRODUCT, WHETHER BASED IN CONTRACT, TORT, STRICT LIABILITY, EQUITY, OR ANY OTHER THEORY, EVEN IF LIVIN' LITE HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES, LIVIN' LITE'S ENTIRE LIABILITY SHALL BE LIMITED TO THE REPAIR OR REPLACEMENT, AT LIVIN' LITE'S SOLE OPTION.

THE UNITED NATIONS CONVENTION ON CONTRACTS FOR THE INTERNATIONAL SALE OF GOODS IS HEREBY EXCLUDED IN ITS ENTIRETY FROM APPLICATION TO THIS TLW.

THIS TLW, AND THE REMEDIES HEREUNDER, ARE EXCLUSIVE AND IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, CORRESPONDENCE WITH DESCRIPTION, AND NON INFRINGEMENT, ALL OF WHICH ARE EXPRESSLY DISCLAIMED BY LIVIN' LITE. THIS TLW GIVES YOU SPECIFIC LEGAL RIGHTS THAT VARY DEPENDING UPON LOCAL LAW. SOME STATES LIMIT OR PROHIBIT LIMITATIONS OF WARRANTIES, SO THEY ABOVE MAY NOT APPLY TO YOU. YOU SHOULD CONSULT A COMPETENT ATTORNEY FOR LEGAL ADVICE.

MISCELLANEOUS:

No repair or replacement effected shall cause any extension or renewal of the warranty period. LIVIN' LITE may make parts and/or design changes from time to time without notice and repairs or replacements may be made with new or different parts. LIVIN' LITE reserves the right to make changes in the design or materials of its products previously manufactured. At LIVIN LITE'S sole option, any dispute concerning any warranted defect may be resolved through mediation or arbitration. This TLW shall be govened by the laws of the State of Indiana, and any legal action shall be brought only in the Circuit or Superior Court of LaGrange county Indiana. In the case of conflicts between this TLW and other warranties issued or conveyed by LIVIN' LITE, the term of this TLW shall govern.

ALTERNATIVE DISPUTE RESOLUTION:

The parties shall attempt in good faith to resolve any disputes by negotiations. If unsuccessful, LIVIN' LITE may, at it's discretion, elect to submit the matter to the binding arbitration and, and if such election is exercized, the consumer covenants and agrees the he, she, they, or it shall submit any such disputes to such binding arbitration. The arbitral body shall be either the American Arbitration Association or the National Arbitration Foundation, and the rules of the body chosen by LIVIN' LITE shall govern except to the extent same are in conflict with the Indiana Uniform Arbitration Act, which shall govern.

The arbitrator is expressly empowered to enter and award of default against any party in the event of: (a) the failure or refusal of such party to comply with any deadline fixed by the arbitrator; (b) the failure or refusal of such party to make timely payment of any fees, expenses, or other charges billed by the arbitrator; or (c) any other failure or refusal by such party to cooperate and participate in any aspect of the arbitration proceedings. The arbitrator will admit only relevant and reliable evidence at the hearing, but no particular rules of evidence are specified for use. The hearing shall be electronically recorded by an Indiana Notary Public or other officer authorized by Indiana law to administer oaths, and all witnesses who shall testify shall be sworn on oath to tell the truth. The arbitrator may award injunctive relieve, interest, attorney fees in an equitable amount based upon the degree to which the prevailing party prevails on the merits; however, the arbitrator is not empowered to award punitive or exemplary damages. All costs of the arbitration, including the recording thereof, shall be shared equally by the parties. The arbitration proceedings and award shall remain confidential, and no party may disclose to any person, except attorneys for the parties, any aspect of the proceedings.

WARRANTY REGISTRATION AND CONTACT INFORMATION:

The warranty registrations for components parts should be completed and delivered in accordance with the instructions contained therein. The TLW registration must be completed and returned to LIVIN' LITE within (15) days of delivery of the unit to the consumer. Failure to do so can void the TLW or cause delays in obtaining benefits. The TLW registration, and all inquiries, must be directed to LIVIN' LITE RV INC., Warranty Department, 0985N 900W, Shipshewana, Indiana 46565, Telephone: (206) 768-4016

DELIVERY:

1. To assist in avoiding problems with your coach, we recommend you do the following:
2. Read the warranty. Go over it thoroughly with your dealer.
3. Inspect the vehicle. Do not accept delivery until you have gone through the coach with the dealer. The manufacturer has provided a checklist to be used during retail delivery. Check each item on the list and make sure the dealer does the same. Do not sign this checklist until you are satisfied with each inspection.
4. Ask questions about anything concerning your coach you do not understand.
5. Be sure your tow vehicle has the capacity to pull the coach you have selected.

The owner is responsible for normal maintenance. However, minor adjustments (such as adjustments to the interior or exterior doors, cabinet latches, voids in sealants, etc.) will be performed by the dealer during the first (90) days of warranty coverage. Thereafter, such adjustments are the responsibility of the owner as normal maintenance, unless required as a direct result of repair or replacement of a defective part under this warranty.

NOTE

You are responsible for completing and forwarding warranty forms for all components and appliances installed in your RV. Failure to do so may result in loss of warranty coverage by the component or appliance manufacturer.

I HEREBY ACKNOWLEDGE THAT I HAVE RECIEVED, READ, AND UNDERSTAND THIS TOWABLE LIMITED WARRANTY, AND THAT I HAVE INSPECTED THE UNIT AND FIND IT IN THE CONDITION REPRESENTED.

Date: _____ Purchaser: _____

DEALER'S OBLIGATIONS:
By agreement with the manufacturer, the dealer is obligated to maintain the camper prior to retail sale, to perform a detailed pre-delivery inspection and to make any repairs necessary to correct defects in material or workmanship.

1. Maintain the camper prior to retail sale.
2. Perform a detailed pre-delivery inspection (including all systems check) and make any repairs necessary to correct defects in material and workmanship.
3. Provide a thorough customer walk through. This is done to familiarize the customer with the coach, its systems, components and its operation. The manufacturer has provided a checklist to be used during retail delivery. Do not sign this checklist until you are satisfied with each inspection.

SHOULD THE DEALER NOT RESOLVE THE PROBLEM:
If the dealer is not able to resolve a problem covered by this warranty, the owner should provide the manufacturer, at the address listed below, a written description of the problem and attempts made to resolve it.

Livin' Lite Recreational Vehicles, Inc.
0985 N 850 W
Shipshewana, IN 46565
Ph: (260) 768-4016

YOUR WARRANTY IS NOT VALID UNTIL IT HAS BEEN SIGNED AND SUBMITTED TO LIVIN' LITE RECREATIONAL VEHICLES, INC.

Livin' Lite Recreational Vehicles, Inc. reserves the right to cure all warranty claims. Service work conducted by any party not specifically authorized by LIVIN' LITE RECREATIONAL VEHICLES, INC. to undertake such work is specifically not covered by this Limited Warranty and WILL VOID THIS LIMITED WARRANTY.

The owner agrees to maintain all evidence of any defect or damage through the ultimate resolution of any claim and make such evidence available to Manufacturer and further agrees that the failure to preserve evidence will result in loss of the claim.

The owner, at his expense, will deliver the recreational vehicle to the dealer or authorized repair location or manufacturing plant for warranty service as designated.

NOTE

Your warranty is activated when Livin' Lite Recreational Vehicles, Inc. has received your signed warranty registration card from your selling dealer where it should have been signed. If you never signed this card or wish to make sure your warranty is activated, please contact your dealer or the Livin' Lite Recreational Vehicles, Inc. Warranty Department at (866) 472-5460 or you may inquire in writing to Livin' Lite Recreational Vehicles, Inc, 0985 N 850 W, Shipshewana IN 46565.

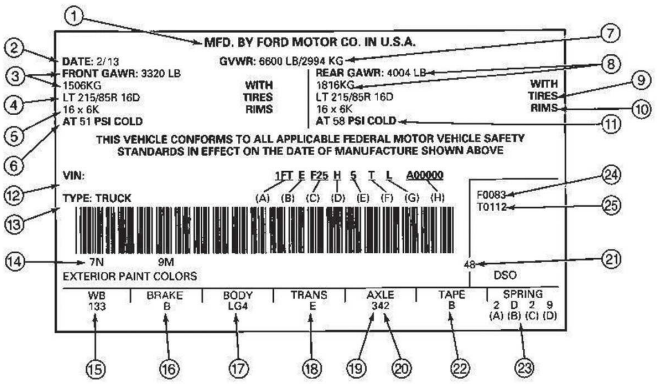
Camper & Truck Size

Selecting the right combination of camper and truck requires understanding a few guidelines. Your Livin' Lite dealer can be a valuable source of information when matching a camper to your truck.

The truck bed is mounted to the frame of the truck with mounts that allow for some movement. It is important to allow enough clearance between your truck and camper to prevent damage during normal driving conditions due to racking, twisting and bouncing. The cab-over of the camper should never be closer than 1 1/2" to the tallest point of the cab of the truck. (This includes cab marker lights or tracking system antennas, if installed.) Also, ensure that there is a minimum of 1/4" clearance between the truck bed side rails and the camper wing.

Some truck models have a tapered bed, where the bed depth is different between the front and rear. This can make the camper look tilted (front higher then the rear) along the bed of the truck. It may be necessary to place a bed mat in the truck bed to raise the camper to gain the minimum clearance requirements. There must also be a minimum of 1/2" between the truck and camper at the back of the truck taillight. Adding a spacer at the front of the camper or in the front of the truck bed can insure proper clearance. Refer to your Livin' Lite dealer for proper installation.

A Federal Certification Label is required by law on all trucks. It is usually located on the driver side door post. It lists the Gross Vehicle Weight Rating (GVWR), the maximum weight at which the vehicle may be operated. It also provides a Gross Axle Weight Rating (GAWR), the maximum weight allowed for each axle. The GAWR, divided by two, is the maximum axle rating for each end of an axle.



1. Name and Location of Manufacturer
2. Date of Manufacture
3. Front GAWR in Pounds (lb) and Kilograms (kg)
4. Front Tire Size
5. Front Rim Size
6. Front Tire: Cold PSI
7. GVWR in Pounds (lb) and Kilograms (kg)
8. Rear GAWR in Pounds (lb) and Kilograms (kg)
9. Rear Tire Size
10. Rear Rim Size
11. Rear Tire: Cold PSI
12. Vehicle Identification Number
    - A) World Manufacturer Identifier
    - B) Brake System and GVWR
    - C) Model or Line
    - D) Engine Type
    - E) Check Digit
    - F) Model Year
    - G) Assembly Plant
    - H) Sequence Number
13. Vehicle Type
14. Exterior Paint
15. Wheelbase in Inches
16. Brake Type
17. Interior Trim, Seat, Body Type
18. Transmission
19. Rear Axle
20. Front Axle
21. District/Special Order
22. External Body Tape Stripe
23. Suspension Identification
    - A) Aux Usage - Front
    - B) Front Spring
    - C) Aux Usage - Rear
    - D) Rear Spring
24. Front Axle Accessory Reserve Capacity (lb)
25. Total Accessory Reserve Capacity (lb)

Campers are considered "truck payload." New trucks have their payload capacity posted in the glove box or on a specification sheet supplied with the truck owner's manual. Trucks that have many options and/or a 4-wheel drive option have less payload. To calculate payload, the truck manufacturers assume all seat positions are filled with persons weighing 150 pounds each.

One way to determine the actual payload available is to weigh the truck full of fuel and with the number of passengers you will normally be carrying and subtract that weight from the GVWR.

Truck manufacturers are also required to provide a "center of gravity zone" for camper loading with the Owner's Manual Materials.

CONSUMER INFORMATION: TRUCK CAMPER LOADING

This information is furnished in accordance with the Consumer Information Regulations of the National Highway Traffic Safety Administration. It includes Cargo Weight Rating data and Longitudinal Center of Gravity Location Zone dimensions for your truck as equipped with factory installed options.

Veh. Ident. No. Series GVWR (pounds) 11000

TRUCK LOADING INFORMATION

		Maximum	For Reduced Cargo Loads		
Cargo Weight Rating (pounds)		2299	2069	1724	1379
Center Of Gravity Zone	A "Front" (inches)	53.6	54.2	55.3	57.1
	B "Rear" (inches)	45.0	45.0	45.0	45.0

Weigh any accessories or equipment added after the final date of manufacture and reduce the Cargo Weight Rating by this amount. The Center of Gravity Location Zone (FIG. 2) may also be affected. Factory installed options not compatible with slide-in campers (such as Inside Pickup Box Spare Tire Carrier) are not considered in the determination of the Cargo Weight Rating.

LOADING INSTRUCTIONS

When the truck is used to carry a slide-in camper, the total cargo load of the truck consists of the manufacturer's camper weight figure, the weight of installed additional camper equipment not included in the manufacturer's camper weight figure, the weight of camper cargo, and the weight of passengers in the camper.

The total cargo load should not exceed the truck's cargo weight rating and the camper's center of gravity should fall within the truck's recommended center of gravity zone when installed.

WARNING - Passengers should be allowed to ride only in a seat with a proper occupant restraint system. Persons who are not riding in a seat or are not properly restrained are much more likely to suffer bodily injury in the event of a collision.

PROPER TRUCK AND CAMPER MATCH

The Center of Gravity of the camper must fall within the recommended center of gravity location zone as shown in FIG. 1. The center of gravity of the camper is determined by the camper manufacturer and is indicated in literature accompanying campers manufactured after October 1, 1973.

VERIFICATION OF PROPER TRUCK-CAMPER LOADING

Secure loose items to prevent weight shifts that could affect the balance of your vehicle. When the truck camper is loaded, drive to a scale and weigh on the front and on the rear wheels separately to determine axle loads. Individual axle loads should not exceed either of the Gross Axle Weight Ratings (GAWR). The total of the axle loads should not exceed the Gross Vehicle Weight Rating (GVWR). These ratings are given on the vehicle certification label that is located on the left side of the vehicle, on either the door latch post next to the driver or on the driver's door rear edge face. If weight ratings are exceeded, move or remove items to bring all weight below the ratings.

NOTE: All fuel and water tanks should be full and all passengers in the truck when it is weighed.

OTHER RECOMMENDATIONS

The Cargo Weight Rating and Longitudinal Center of Gravity Location Zone are two important factors which have a direct influence on the handling and braking of your Truck-Camper combination. In addition, other factors such as road and wind conditions, height of camper load and condition of tires also influence your vehicle's handling and braking. All factors must be considered and reasonable care must be exercised when operating a Truck-Camper vehicle. Ford offers many options which will enhance your vehicle for camper usage. For optimum performance and enjoyment it is suggested that you equip your vehicle with those options specifically intended for camper hauling. Your Owner's Guide includes additional information about proper truck operation.

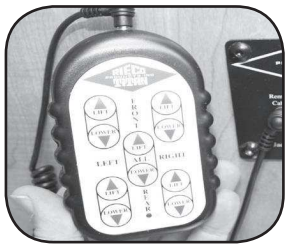
Definitions

"Slide-in camper" means a structure having a roof, floor and sides for the purpose of providing shelter for people and designed to be mounted on and removable from the cargo box area of a truck by the user. "Cargo Weight Rating" means the value specified by the manufacturer as the cargo-carrying capacity, in pounds, of a vehicle, exclusive of the weight of occupants (in the vehicle), computed as 150 pounds times the number of designated seating positions.

WARNING - Failure to observe the above recommendations could affect the durability, ride quality, and safe handling of the vehicle and could result in a vehicle accident and personal injuries.

Loading

If using manual jacks, insert crank handle firmly into the crank socket of the jack. Starting at the front, begin cranking. (It is recommended to have two people working the jacks, one on each side.)



If your camper is equipped with electric jacks, you will find the control pad connection just inside the exterior door at floor level.

Extend each jack no more than 4 - 6" at a time at all four corners starting with the front jacks, keeping the camper as level as possible at all times. Repeat this process until the camper is clear of the truck body bed by approximately 6".

CAUTION

Never raise the back of your camper higher than the front or it may tip forward, and damage to the unit may occur.

Slowly back the truck under the camper making sure to clear the wheel wells and not to hit the jacks. Continue backing up until the truck is within a foot of loaded position. Stop and connect the 12-volt power cord to the 12-volt receptacle in the truck bed. Before continuing check to see that the distance between the front of your truck and the bumper is at least 1" less than the distance between your truck tail lights and the camper's side boxes. If not, add an appropriate wood shim in the front of the truck bed before continuing.

Continue backing under the camper until the bumpers mounted on the front corners lightly touch the front of the truck bed. Slowly lower both rear jacks, then front jacks until the camper is resting fully on the truck bed. Raise the jack base pads and secure in place according to manufacturer's directions. If equipped with swing out brackets, lift the swing front jacks inward

Secure the camper to the truck with a set of high quality tie downs. and stow remote control or jack crank handle for future use.

Tie-Downs

After loading your camper, it must be secured to your truck with a set of tie downs or turnbuckles. Livin' Lite recommends that front turnbuckles be spring or shock loaded, and those at the rear be solid. The turnbuckles connect the camper eyebolts (pictured) to the tie down hardware installed on your truck. Check eyebolts, turnbuckles and bracket bolts before each trip and at frequent intervals. Refer to the manufacturer's maintenance instructions supplied with the tie downs or turnbuckles for more information.

Dangers of Overloading

During the design and development of our campers, the number and size of storage compartments and the liquid tank capacities are maximized for value and convenience. However, <u>be mindful that if the holding tank is filled to capacity, and all storage compartments and cupboards are filled to the maximum volume, the camper could exceed safe hauling weights for smaller vehicles causing an unsafe condition.</u> Refer to the manufacturer's labels posted on the tongue of the unit for unit weight information.

CAUTION

Under no circumstances should the engine of your truck be allowed to "lug" or pull hard for extended periods of time. Such misuse can cause engine failure.

In addition to causing premature wear, overloading can cause problems in the area of handling characteristics. An overloaded vehicle will take longer (time and distance) to stop in an emergency. Overloading can also cause added wear to components such as tires and wheel bearings. Overloading can also cause overheating of the truck in some instances.

WARNING

Never overload your camper. Do not exceed the rated load of the rv or the rated load of any axle!

Overloading can cause loss of control of the unit, which can result in severe personal injury or death.

Overloading can also cause property damage to the unit, its contents, and the truck.

To avoid overloading, you must be aware of your vehicle weight situation at all times. Know where you stand when it comes to the GVWR, GAWR and your current GVW and UVW. The following is a key to understanding these terms:

Gross Vehicle Weight Rating (GVWR): is the maximum permissible weight of this camper when fully loaded. It includes all weight at the camper axle(s) and tongue or pin.

Unloaded Vehicle Weight (UVW): is the weight of this camper as manufactured at the factory. It includes all weight at the camper axle(s) and tongue or pin.

Cargo Carrying Capacity (CCC) U.S.: Equal to GVWR minus the UVW and LP-gas weight. (Water is considered a component of cargo.)

Cargo Carrying Capacity (CCC) Canada: Equal to GVWR minus the UVW, full fresh (potable) water weight (including water heater), and full LP gas weight.

Gross Axle Weight Rating (GAWR): is the value specified as the load carrying capacity of a single axle system, as measured at the tire-ground interfaces.

Gross Vehicle Weight (GVW): is the weight of the coach with all the items and supplies that are loaded into the unit at any point in time.

Weight Rating

When the truck camper is loaded, drive to a scale and weigh the front and the rear wheels separately to determine axle loads. The load on an axle should not exceed GAWR. The total of the axle loads should not exceed the GVWR. Weight ratings are given on the vehicle certification label that is located in the glove box or on the left side of the vehicle door post or door edge.

Under no circumstances should the respective loads ever exceed these ratings. Dealer installed equipment will reduce CCC. IF THE LOADED WEIGHT OF YOUR RV EXCEEDS THE GVWR OR THE WEIGHT ON ANY AXLE EXCEEDS THAT AXLE'S GAWR, THE RV IS OVERLOADED AND YOU MUST REMOVE ITEMS TO BRING THE WEIGHT DOWN TO OR BELOW THE GVWR OR GAWR.

Loading Instructions

Whether you start out for a weekend jaunt or a longer trip, the first thing you are going to do is load such items as food, clothing, bedding and recreational equipment. As you become experienced in camper living, you will learn what is necessary and what merely takes up storage space.

Loading Tips

After you have determined how much weight you can safely carry and selected those items to make up that weight, make a list and keep it for future reference. The center of gravity should be ahead of the rear axle to transfer more of the weight to the front of the truck. When packing your camper, store heavy gear first, keeping it on or near the camper floor. Place heavy objects or items far enough forward to keep the loaded camper's centre of gravity within the area recommended by the manufacturer. Store only light objects on high shelves. Distribute weight to obtain even side-to-side balance of the loaded vehicle. Secure and brace items so they won't move during travel, thereby shifting the load in the RV. Carry only as much water as needed for travel use or to balance the load.

Make a loading diagram of your properly loaded RV. It will help you locate where specific items are stored and will help speed the loading process. Store emergency items in a readily accessible location. Include tools, first-aid kit, rain gear, flashlight, highway warning devices, and an electric cord or light.

Luggage and similar cargo carried inside the vehicle must be secured to prevent possible damage in the case of a sudden stop or an accident. Periodically reweigh your unit. Different traveling configurations may change your loading and weight pattern.

Traveling

Easing to a stop and starting smoothly saves wear and tear on your truck, saves gas, and prevents damage to the items stowed in the camper. Remember, when hauling the camper. Always maintain at least three cars length space between you and the car in front of you for every 10 miles of speed that you are traveling. This should give you ample time to stop in case of an emergency.

As you drive, try to anticipate problems that may occur and prepare for them, even though they may never happen. Anticipate dips, gutters and depressions in the street, slowing down well in advance, as these are the hardest jolts of any kind on your truck, your camper and items stored in your camper. Take dips and bumps slowly and be certain that the rear wheels have passed the point before accelerating. Cross railroad tracks slowly. Always release your brakes before crossing.

On long grades, you may want to shift into a lower gear (or lower range, if you have automatic transmission) before your engine labors.

When going downhill, use the same procedure as going uphill; the compression of your truck's engine will help to slow your whole rig safely. Avoid conditions that require excessive and prolonged use of your brakes. Apply and release brakes at short intervals to give them a chance to cool.

⚠ WARNING

Improper braking can result in serious personal injury or death. When being overtaken, passing or meeting an oncoming bus, truck or other large vehicle, air turbulence may be encountered and may cause you to feel the camper sway.

Tires

Tires are available in a variety of load ratings and sizes, and if the tires you currently have cannot handle the load, it maybe possible to replace your tires with tires of higher pound capacity. Bear in mind, that the ultimate capacity of the truck is determined by the weakest link in the system. This could be the tires, wheels, suspension or brakes.

The maximum ratings are molded into the side of the tire. The sidewall of the tire shows maximum and minimum inflation pressure for that load. Be sure you also know the load and inflation pressure ratings for your wheels as well. Often, these are stamped on the inside of the wheels, but if not,

your dealer can help you find out what they are. Never exceed the maximum load or inflation pressure of your wheels.

Driving on under-inflated tires can cause the tires to overheat, which leads to the breakdown of the tire's internal structure. Improper inflation also can reduce your ability to control your vehicle. Tire blowouts occur more during summer months than any other time of the year. Properly inflated tires last longer, run quieter, grip better, increase fuel mileage and safely support and control your vehicle.

Check your tire pressure once a month and each time before you take a trip with your truck and camper. Use a quality air pressure gauge to check the pressure. Do not under-inflate or over-inflate your tires. Inspect your tires for uneven or excessive wear. Look for bulges, cuts, blisters on the sidewalls.

When you're traveling, inspect your tires regularly and check and adjust cold inflation pressure every day that you travel.

CAUTION

Individual wheel position weights must not exceed the maximum tire load capacity. Maximum tire load capacity can only be achieved utilizing the maximum allowable psi as listed on the sidewall of the tire.

Weight Distribution

The truck must be weighed with occupants and full of fuel. Drive onto the scales and get the weight of the total truck. Next pull forward until the front axle is off the scale and get the weight on the rear axle. Subtract the weight on the rear axle from the total truck weight to get the weight on the front axle.

With the camper loaded and ready for a camp outing, pull on the scales as before and get the weight of the total truck and camper. Next pull forward until the front axle is off the scale and get the weight on the rear axle. Subtract the weight on the rear axle from the total truck and camper weight to arrive at the weight on the front axle. Subtract the truck weights from the total truck and camper weight for each axle. This amount should be less then the truck manufacturer's GAWR rating as shown on the Federal Certification Label. If you are over the GAWR rating, you will need to remove or shift weight accordingly.

Once you are less then the GAWR, you need to weigh each individual wheel to insure you are not overweight from side to side. Again pull on to the scales, but with only the right front tire on the scales. Pull forward and get the weight of the right rear tire. Do the same for the left side tires. First the front and then the rear. Take the GAWR rating of the front axle and divide by 2. Do the same for the rear. This is the GAWR for each axle end. Now subtract the individual wheel weights from the individual GAWR for each wheel. If the amount is less you are within the GAWR for that axle end. If the amount is more, you are over the GAWR for that axle end and you will need to adjust how your unit is loaded to bring the weight down within the GAWR.

Proper weight distribution, load management and operating within established limitations will aid in safe and enjoyable travel.

Power System

⚠ CAUTION

Make sure your power supply is properly grounded! If your power supply to the camper is not grounded you will experience a dangerous shock when standing on the ground and touching a metal portion of your camper! Use a continuity tester to ensure proper power supply!

30-Amp and 110-Volt Service

30-amp service is also 110-volt service, but it is capable of running up to 30-amps of draw.

Listed below are components that might be used in Livin' Lite Recreational Vehicles, Inc. vehicles and the typical maximum amperage draw each one has. This chart may help you decide which components you can safely use for an extended period without damage.

Components	Amperage
Air conditioners (each)	15
Microwaves	15
Hair dryer	8
Vacuum	5
TV	1.0
VCR	1.0
Charger	14
Refrigerator	3.5
110-volt lamp	1.0

☛ NOTE

If you travel to an RV park that offers only 50-amp service you will have to use an adapter to hook up to shore power. Use of an adapter is not recommended, but may not be avoidable.

⚠ CAUTION

Do not use an extension cord with a current rating less than the amperage your rv requires. Extra extension cords reduce the amperage and voltage being supplied to the rv and may cause damage to electrical components, including the shoreline cord.

Power Converter

Your camper is equipped with an electrical power converter that changes 110-volt power to 12-volt power to run 12-volt powered appliances. It gets the 110-volt power by way of the electrical cord (shown left). Shown here is the circuit breaker/fuse box for the 110V electrical system. Circuit breakers and fuses protect the circuits in the vehicle. Locate the converter and see where the fuses are located. If you blow a fuse, turn off and unplug any appliances in use. Unplug the fuse. Check the fuse for breakage and replace it with a new fuse of the proper rating.

If the fuse continues to fail, contact your nearest dealer. NEVER REPLACE A FUSE WITH A HIGHER RATED FUSE THAN WHAT IS DESIGNATED.

Electrical System

Your electrical system is a combination 12-volt and 110-volt system, every facet carefully engineered and installed to comply with the "National Electric Code".
The combination system consists of:

1. 12-volt automotive system – DC.
2. 110-volt outside power source – AC.

110-Volt System
This is supplied by plugging the 30 Amp power cord into an outside receptacle (you may need an adapter). It furnishes current to all internal 110-volt receptacles. It also supplies power for the 12-volt camper system through the converter.

The 110-volt circuits are protected by circuit breakers and will handle up to 30 rated amps. The most common cause of a circuit breaker to open is an overloaded circuit. If this happens, reduce the load and reset the breaker.

Your kitchen and exterior receptacles are protected by a highly sensitive device known as a "Ground Fault Interrupter," which is designed to sense the slightest electrical "short" at those receptacles and instantly disconnects the current before a person can be injured.

If you use a battery in your camper, batteries should be removed and stored in a warm place when not used in your camper for an extended period oftime (i.e. more than 60 days). Mark the cables, positive and negative, for easy identification. The batteries require periodic charging during storage. If the camper is to be stored for a long period of time, it is recommended that the batteries inside the unit be removed from clocks, radios, smoke alarms, etc. This will prevent unnecessary drain and corrosion of the batteries.

⚠ WARNING

Do not smoke or use an open flame around batteries. Avoid making electrical sparks near batteries. Fumes from the batteries are combustible.

Auxiliary 12V DC

Electrical Connection
Auxiliary 12V electrical outlets are located inside and outside the camper in order to attach 12V devices and appliances.

Fire Safety
The possibility of fire exists in all areas of life, and the recreational vehicle life-style is no exception. Recreational vehicles are complex machines. They are made up of many materials, some of which are flammable. Like many hazards, the possibility of fire can be minimized. This is done by recognizing the danger and practicing common sense safety and maintenance habits. For safety reasons, Livin' Lite suggests that you keep a fire extinguisher in your unit at all times.

Plumbing

Fresh Water
Fresh water for your RV is provided by filling the FRESH WATER TANK or by hooking directly to a city water connection. These sources supply water to the kitchen Sink. Fill the FRESH WATER TANK using the connection shown on the left side of the photo below.

City Water
Connect a hose to a city pressurized water faucet to the connection on the right side of this photo.

Fresh Water Tank
Unlock the gravity water fill door and use a hose or vessel to fill the water tank. Or, select fresh water tank after hooking the hose to the city water.

CAUTION
Never leave your coach unattended while filling the fresh water tank! Although proper venting is allowed for overflow, the water pressure can expand the tank and cause severe damage to your camper.

CAUTION
A pressure regulator should always be used when connecting to city water. Excessive water pressure can damage lines and connections, causing water damage to your rv. Make sure water pressure never exceeds 60 psi.

Sanitizing System
To assure complete sanitation of your potable water system, the following procedures are recommended for a new system. For one that has not been used for a period of time and for one which may have become contaminated:

1. Prepare a chlorine solution using one (1) gallon of water and one-quarter (1/4) cup of household bleach (5% sodium hypochlorite solution). With tank empty, pour one (1) gallon of solution into the tank for each fifteen (15) gallons of tank capacity.

NOTE
As an option, several commercial solutions are available and should be used as directed on the package.

2. Complete filling of tank with fresh water. Operate all faucets to release trapped air. Pressurize entire system with pump, if available, and turn off pump.
3. Allow to stand for three (3) hours.
4. Drain and flush with fresh potable water.
5. To remove excessive chlorine taste or odor which may remain, prepare a solution of one (1) quart vinegar to five (5) gallons water and pour into tank. Allow solution to agitate in tank by vehicle motion (several days, if possible).
6. Drain tank and flush with fresh potable water.

Fresh Water Lines
Vibration and flexing during traveling can cause pipes and fittings to work loose. Check all of the plumbing connections for leaks on a regular basis and not less than annually. If the water pump runs when all faucets are turned off, check for a leak.

Be sure the drain valves are closed. Connections in the kitchen and bathroom faucets normally seal with hand tightening and a half turn with a wrench. If a fitting leak persists, disconnect it completely and check for mineral deposits or foreign material on the sealing surfaces. Clean the surfaces thoroughly and reinstall the fitting. Take the coach to an authorized service center for repairs if the system continues to leak.

Follow the winterizing instructions given on p. 42 to reduce the risk of leaks caused by cracks from freezing pipes. Freezing damage can be extensive and expensive.

Water Pump
The RV water pump is a 12-volt DC appliance that is activated by a switch found on the wall in the kitchen area. This switch is designed to activate the pump. This is called a demand system.

Turn the faucet on when you want water. If the pump fails to turn on when the switch is activated, check the fuse located in the converter. If the pump continues to operate whether the faucet is open or closed, check the water tank to see if it is empty and check to see if there is a leak in the system.

The water pump is self-priming and totally automatic, operating upon demand when water is required.

1. Fill or partially fill freshwater supply tank.
2. Open kitchen and bathroom faucets.
3. Turn on switch for water pump and allow it to fill the water lines and hot water heater.
4. Close each faucet after it delivers a steady stream of water.
5. Water pump should stop running after all faucets are closed.
6. Pump should now run when faucet is opened and stop when faucet is closed.

When using the demand system and no water comes when a faucet is turned on, double check your connections to correct the problem.

NOTE

Do not run the water pump without water in the system. Always keep the pump switch off when the system is empty or when connected to city water. Running the pump dry can damage it and void the warranty. When leaving your camper or when pulling it down the road be sure to turn off your water pump switch.

Waste Water System
The waste drainage system was designed to provide adequate and safe storage and/or disposal of waste materials. All of the materials used in the making of this system are tested by a nationally recognized testing laboratory. The drainage system uses plastic piping and fittings connected to the sinks, toilet, and holding tanks. This provides for their drainage to an outside termination. The unit should be reasonably level for best operation of the system. There are two separate waste systems. The gray water system is for waste water from the sinks and shower. The black water system is generally for sewage waste from the stool. Each tank has its own control valve, and both tanks drain through the sewer drain hose.

The drainage system also includes vents that carry odors caused by drain water and waste out of the RV, while also equalizes air pressure.

Drainage P-traps
By code, all drains are equipped with P-traps to keep holding tank odors from entering the vehicle. If you detect a foul odor, which you believe is from your holding tanks, add water to all drains to ensure that your P-trap water hasn't evaporated from long term storage or splashed out of the sink and shower drain while traveling. Places to add water include the kitchen sink, bathroom sink, shower/tub.

WARNING

Failure to close the gray/black tanks during periods of storage may allow p-traps to dry and allow methane gas or other combustible gasses to back up into the unit, creating a risk of fire, explosion or poisoning.

Black Water Holding Tank
The tanks should be emptied frequently and especially before travel.

While camping it is normal practice to leave your gray water holding tank valve open if your campsite is equipped with sewer hook-up. Never leave the black water tank valve open while using the coach. Since the system utilizes gravity to empty, the black water tank will not drain properly unless it has sufficient liquid to help drain out the solids.

Gray Holding Tanks
You must use the dump lever to empty the contents. The gray water holding tank is primarily used for drainage from the kitchen sink and shower.

Emptying Holding Tanks
To empty the holding tanks, be certain that your RV is level since the process depends upon gravity. Remove the sewage drain hose from its storage location. Remove the cap from the termination outlet and connect the drain hose.

To drain either holding tank, pull out the termination valve by pulling out the dump valve slide handle. Close the valve after the tank has drained. Flush or pour about two gallons of water through the toilet when emptying the black tank and drain again. This flushes the tank and helps clean the drain hose. Repeat as necessary.

Follow the same procedure for the gray water holding tank(s). A repeat flush is not necessary. When the tank is empty, push the dump valve handle in until it seats. Remove the hose, wash and replace it in its storage location. Replace termination outlet cap.

NOTE

Most states have laws prohibiting emptying sewage anywhere but an approved dumping station.

Holding Tank Maintenance
Keep your tanks well flushed out when the vehicle is not in use. Allowing the tank to sit with any contents for more than a couple of days will ensure some sort of build-up on the inside of the tank, even if this is the first time you have used your RV. One way to help flush them out is to drain them at the campground, then add approx. 10 gallons to each tank for the trip home. The constant agitation while driving home usually does a good job of cleaning the tanks. Then, before you arrive at home, stop at a local approved dumping station and drain the tanks completely.

Helpful Cleaning Hints
When camping there are a few things you can do to help facilitate the cleaning process later. First, you should always use some type of chemical additive in your holding tanks specifically designed for RV use. These types of chemicals will break down the contents of the tanks and help ensure good drainage. In addition, try using tissue designed for recreational vehicles. It will break down more than residential style tissues, and usually never clogs your drain valves.

Do's and Don't of Holding Tank Use

DO - Clean the holding tank with an approved cleaner.

DO - Add a special chemical additive to sanitize and improve tank action.

DO - Guard the tank against Freeze-up.

DO - Keep the waste water tank dump valves closed to allow the tanks to get as full as possible to facilitate drainage.

DO - Keep the dump valve closed and the drain cap in place to allow use of the system when not parked at a campsite.

DON'T - Put facial tissues, paper, automotive type anti-freeze, sanitary napkins, diapers or household toilet cleaners in your holding tank.

DON'T - Put foreign objects in the system that could clog or damage it in any way.

Fire Safety

The possibility of fire exists in all areas of life, and the recreational vehicle life-style is no exception. Recreational vehicles are complex machines. They are made up of many materials, some of which are flammable. Like many hazards, the possibility of fire can be minimized. This is done by recognizing the danger and practicing common sense safety and maintenance habits. For safety reasons, your unit is furnished with both a fire extinguisher and a smoke alarm.

Fire Extinguisher
The fire extinguisher is rated for Class B (grease, gasoline, diesel fuel, flammable liquids) and Class C (electrical) fires. These are the most common types of fires in vehicles. Read the operator's manual and the instructions on the fire extinguisher. Be sure to know how and when to use the extinguisher and where it is located.

Fire extinguishers are mechanical, pressurized devices. Care must be exercised when they are handled. They must be maintained as the operator's manual instructs for proper and safe operation. The extinguisher should be inspected at least once a month. More frequent inspections may be required if the extinguisher is exposed to the weather or to possible tampering. Do not test the extinguisher by partially discharging; doing this will cause a loss of pressure.

If a fire occurs in the vehicle, evacuate the vehicle as quickly and as safely as possible. Consider the cause and the severity of the fire and the risk involved before trying to extinguish it. If the fire is major or fuel fed, move away from and stand clear of the vehicle and wait for emergency assistance to arrive.

Smoke Detector
The battery-powered smoke detector is mounted on the ceiling in the living area of the unit. Read the operating instructions for details on the testing and care for this important safety device. Test the smoke detector after the unit has been in storage, before each trip, and at least once a week during use. The detector should never be disabled because of nuisance or false alarm from cooking smoke or a dusty furnace. Ventilate the unit with fresh air and the alarm will shut off. Never disconnect or remove the battery from the smoke alarm. The battery should be replaced no less than once a year or when the low battery signal sounds.

⚠ WARNING

Test smoke alarm operation after vehicle has been in storage, before each trip, and at least once per week during use. Failure to comply may result in serious injury.

Emergency Exit Window
In the bedroom, there may be an Emergency Exit (egress) window. This window is designed to be used as an additional exit in emergency situations. It can be identified easily by the red handle and red "EXIT" label. To open the egress window, familiarize yourself and occupants with proper procedure.

There should be two paths of escape from each sleeping area. Familiarize yourself and occupants with these paths and the location of the exits.

Furnace
The furnace utilizes a sealed combustion system, which means the combustion chamber is completely sealed from the inner atmosphere of your vehicle. Combustion air is drawn from the outside and combustion products are expelled outside through a vent.

Carefully read and follow the lighting and operating instructions from the furnace manual supplied with the unit.

New furnaces sometimes emit smoke and an odor when first used due to paint burning off the heating chamber. Do not mistake this for a malfunctioning furnace. You may want to open the windows during the initial breaking in of the furnace.

Thermostat readings may not always be a true indication of temperature throughout the living space. Use these readings as a guide to obtain the most comfortable level for you.

Seals

The seals around doors, windows, vents and external seams must be checked every 3 months or change of season. If deterioration is noted, reseal the seams or seals with an approved sealant to prevent leaks. Your dealer can perform the resealing inspections and work for you. Your dealer is also able to inform you of the appropriate sealants to be used, if you prefer to do the job yourself. Sealants can be purchased from your dealer or manufacturer. Seals are not covered under warranty.

NOTE

Livin' Lite Recreational Vehicles, Inc. does not recommend this RV for use in the winter unless it is equipped with additional insulation and properly sealed underbelly. See your dealer or contact Livin' Lite for more details.

LP Gas System

The Liquid Propane (LP) gas system is designed and built to rigid standards and tested before leaving the factory. Your dealer also tests the system prior to customer delivery.

LP gas, when properly handled, is a clean burning, dependable fuel for all your LP gas appliances. The LP tank or tanks mounted on your unit contain liquid under high pressure. The liquid vaporizes into a gas and passes through the regulator which automatically reduces the gas pressure. The low pressure gas is then distributed to the appliances. When the red flag appears in the inspection glass this indicates that the bottle is empty. The arrow should be turned toward other bottle and the empty bottle should be filled as soon as possible.

WARNING

If You Smell Gas:

1. Extinguish any open flames, pilot lights and all smoking materials.
2. Do not touch electrical switches.
3. Shut off the gas supply at the tank valve(s) or gas supply connection.
4. Open doors and other ventilation openings.
5. Leave the area until odor clears.
6. Have the gas system checked and leakage source corrected before using again.

WARNING

LP gas regulators must always be installed with the diaphragm bent facing downward. Regulators that are not in compartments have been equipped with a protective cover. Make sure that the regulator vent faces downward and that cover is kept in place to minimize vent blockage which could result in excessive gas pressure causing fire or explosion.

Each tank has an automatic eighty percent stop-fill valve that allows space in the tank for vapor expansion. The high pressure of the vapor in the tank is reduced in two stages as it makes its way to your appliance. The tank pressure will vary with temperature and altitude, but it may be in the range of 100 to 250 pounds per square inch (psi) or more. It is reduced by a pressure regulator to about 12 psi in the first stage and then to about 6.25 ounces in the second stage. The 6.25 ounces psi can also be expressed as 11 inches of water column.

WARNING

A warning label has been located near the LP gas container that reads: DO NOT FILL CONTAINER(S) TO MORE THAN 80 PERCENT OF CAPACITY. Overfilling the LP gas container can result in uncontrolled gas flow which can cause fire or explosion. A properly filled container will contain approximately 80 percent of its volume as liquid LP gas. Safety regulation prevents filling over 80 percent.

- - - - -

Portable fuel-burning equipment, including wood and charcoal grills and stoves, must not be used inside the recreational vehicle. The use of this equipment inside the recreational vehicle may cause fires or asphyxiation.

- - - - -

Storage of LP gas containers, gasoline or other flammable liquids inside your vehicle – even for short periods of time – presents a risk of fire and/or explosion. All flammable liquids should be stored safely in a well-ventilated area outside your vehicle and in proper containers.

- - - - -

LP gas containers must not be placed or stored inside the vehicle. LP gas containers are equipped with safety devices which relieve excessive pressure by discharging gas to the atmosphere.

NOTE

Your dealer is responsible for a thorough LP gas system check prior to delivery. Do not accept the unit until this check has been completed .

Except for simple maintenance and occasionally lighting a connection, you should take your unit to an authorized dealer for LP gas problems. An authorized LP supplier should always fill the LP gas tank.

WARNING

LP gas cylinders shall not be placed or stored inside the vehicle. LP gas cylinders are equipped with safety devices that relieve excessive pressure by discharging gas to the atmosphere. Failure to comply could result in death or serious injury.

NOTE

Your unit's manufacturer is not responsible for personal injury or property damage resulting from improperly maintained LP gas appliances and systems.

CAUTION

This gas piping system is designed for use with LP gas only. Do not connect natural gas to this system. Securely cap this inlet when not connected for use. After turning on gas, except after normal cylinder replacement, test gas piping and connections to appliance for leakage with soapy water or bubble solution. Do not use products that contain ammonia or chlorine.

WARNING

Never adjust the regulator yourself. Have your dealer or an authorized service technician make any require adjustment.

Filling LP Gas Bottles

When your LP gas tank is empty, have it refilled as soon as possible. There are many LP refueling stations available. Many RV parks also have LP gas available. Caution your supplier not to over-fill your tank. Room is required to let the liquid vaporize.

There are approximately 11,000 BTUs of heat produced from each gallon of LP gas. Your furnace and range will require the most LP gas. During extreme cold temperatures, check fuel tanks frequently to avoid running out of fuel.

Make sure that all burners and pilot lights are turned OFF prior to having a gas supplier refill your LP tank.

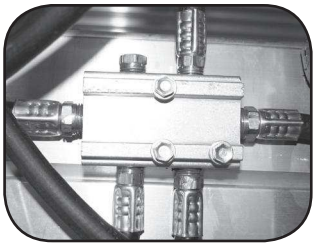
1. Close the valve on the empty cylinder and remove the hose from the valve. (NOTE: left hand thread).
2. Loosen clamp that holds cylinder in place.
3. Remove the cylinder and have it refilled.
4. Slide cylinder back in place and tighten clamp.
5. Connect the left-hand hose and tighten securely.

The 80 percent STOP FILL VALVE may close the valve before liquid appears at the 20 percent liquid level gauge, but if liquid does appear, stop filling immediately: the tank is filled to LP capacity.

NOTE

Your LP tanks must be kept free of rust at all times. If rust does develop, the tank should be cleaned completely free of the rust, primed, and painted white (or some other highly reflective color) which will help to reduce expansion of the LP gas because of heat.

Do not use a wrench to tighten the service valve or the 20 percent gauge. They are both designed to be closed leak-tight by hand. If you cannot hand-tighten the valve, the valve may need repair or replacement. Consult your gas dealer.



LP Gas Lines
The primary manifold is located under the unit. Copper tubing with flare fittings are used as secondary lines running to the gas appliances. Should any lines ever rupture, NEVER attempt to splice them. A new line should always be installed. We recommend any LP gas line services be performed by your dealer or an authorized service person. Always close main valve at LP tank when servicing any gas appliance. This prevents any gas leakage which could result in an explosion or cause serious bodily injury.

⚠ WARNING

Never check gas lines for leaks with an open flame. Do not check for leaks using ammoniated or chlorinated household type detergents. These detergents can cause cracks to form on the metal tubing and brass fittings. Take the unit to a qualified LP gas service technician to find and repair the leak. Keep the tank valve closed and all of the appliances turned off when the unit is stored. If any of the LP gas valves do not close leak-tight by hand, consult a service technician.

Although your LP gas system was thoroughly inspected for leaks before delivery, gas fittings can loosen from vibration during travel. Your LP gas system should be inspected at least every three months and before every trip. If leak is suspected, check immediately!

Exterior LP Hookup
An optional exterior LP gas appliance quick connect socket is available on some units.

Precautions and Recommendations

- Inspect LP fill valve for foreign material before refueling.
- Shut off truck and pilot lights when refueling gas tanks.
- Never check for gas leaks with an open flame match, etc.
- Visually inspect gas lines for any problem periodically.
- Have dealer inspect gas system yearly and before and after long trips. Always have qualified technician check and make any repairs in your gas system.

Notice
This gas piping system is designed for use of liquefied petroleum gas only. Do not connect natural propane to this system. Do not fill container(s) to more than 80 percent of capacity. Securely cap inlet(s) when not connected for use. After turning on gas, except after normal container replacement, test gas piping and connections to appliances for leakage with soapy water or bubble solution. Do not use products that contain ammonia or chlorine.

⚠ WARNING

All pilot lights, appliances and their igniters (see operating instructions) must be turned off during refueling of motor fuel tanks and/or LP gas containers.

Climate Differences
The appliances in your vehicle will not function if the LP gas does not vaporize. Propane will continue to vaporize down to -44 degrees F.

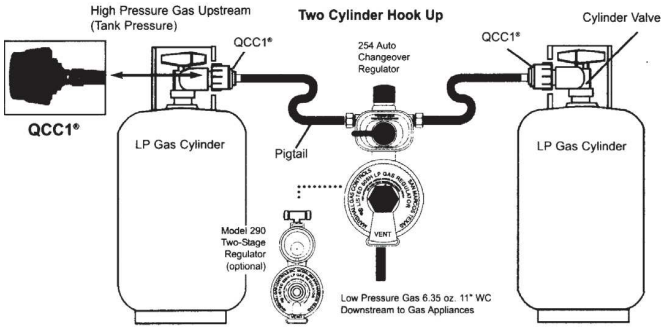
Propane has become the main type of LP gas used in RV's in recent years. Butane should not be used. The LP gas dealer will have the correct type or blend for his locale. If you plan on traveling from a warm climate to a cold climate, check with your local gas dealer to see if the blend he supplies is appropriate for the part of the county you plan on visiting.

Operation

To operate any LP gas appliance, the LP gas tank's service valve must be OPEN. When first used, or after a refill, there may be some air in the gas lines that will escape when the range burner or similar gas valve is opened. The air may extinguish the match or igniter the first time or two you attempt to light a stove burner.

Also remember that when you close the tank's service valve, some gas will remain in the lines. To completely bleed the lines of gas, close the tank valve and light the range burner. When the flame burns out, turn off the appliance.

Overview of Typical LP Gas Hook Up



Regulator Pressure

Have the gas regulator checked at the beginning of each season and whenever a problem occurs. Proper line pressure is 11 inches of water column. Your RV dealer or gas supplier can perform this needed check.

Gas Line Check

Check the gas line connectors and all other connections regularly. To check, turn OFF all burners and pilot lights. Open all doors and windows. OPEN the LP gas tanks service valve and use soapy water or an approved leak detector fluid to test all line connections. Do not use products that contain AMMONIA or CHLORINE. The appearance of bubbles in the soapy solution indicates a leak. Tighten the connections with two (2) open-end wrenches until the bubbles stop. If this does not take care of the leak, contact your gas dealer. DO NOT OVERTIGHTEN.

Gas Tank and Regulator Freeze-Up

LP gas regulator freeze-up can be prevented if owners are aware of the causes. Freeze-up may be caused by one of the following: moisture in the tank, an overfilled tank or a greater vapor withdrawal demand than the tank can deliver at a particular temperature.

Freeze-up occurs more frequently in cold weather since liquid gas does not vaporize as quickly. This, along with a higher demand, can cause frosting of the tank and regulator. Be sure to have your LP gas supplier add ANHYDROUS METHANOL before filling the tank in cold weather.

Moisture may enter the tank in the LP gas through condensation if air is allowed to enter the tank through an open valve. This can be avoided by using moisture-free gas and keeping all tank valves CLOSED during storage. If moisture is present, have the tank purged by an authorized dealer and have him add the proper amount of ANHYDROUS METHANOL for your tank. An overfilled tank can allow liquid gas, rather than the needed vapor, to flow through the regulator. This can result in erratic regulator delivery pressure, improper appliance operation and possible frosting of the regulator and gas line. This can be avoided by following the procedures outlined in the Filling LP Gas Bottles section. Always contact your local gas supplier for current procedures.

Hose Replacement

The flexible LP gas hoses connected to your LP tank should be checked frequently for signs of deterioration and may need to be replaced every two to three years. Be sure to replace the hoses with approved and properly rated products.

Regulator Vent Maintenance
Since the LP gas regulator is equipped with a vent that allows the system to "breathe," you must check it on a frequent basis to see that it does not become clogged. If dirt, sealant or corrosion clogs the vent, clean it with a toothbrush or similar device. At least once a year have your LP service provider check the regulator adjustment and operation.

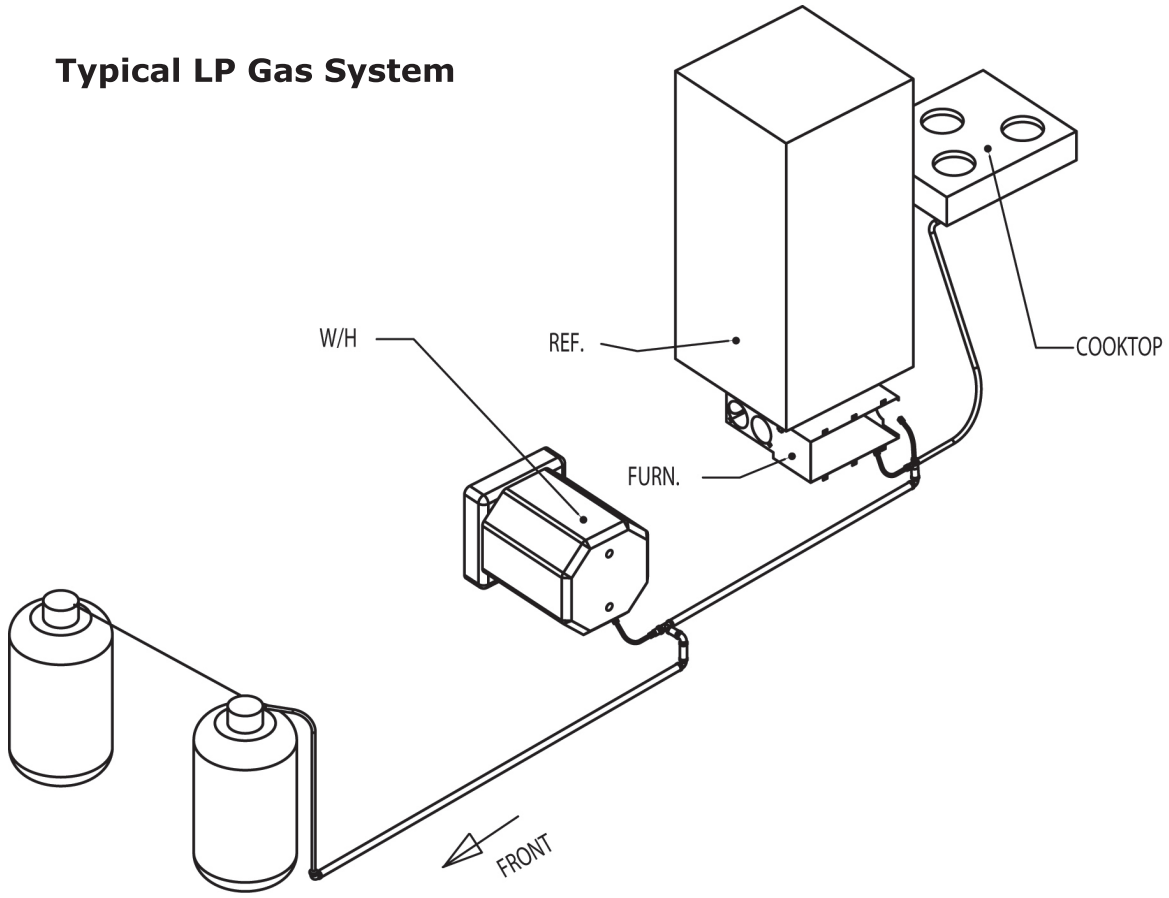
LP Gas Detector
Liquid Propane (LP) gas is heavier than air and will settle to the lowest point of the room, which is generally on the floor of your coach. Because of this, the LP detector installed in your coach is located near the floor. The detector is also sensitive to other fumes, such as hair spray, which contain butane as the propellant. Butane, like propane, is heavier than air and will settle to the floor level where it may be detected.

The detector is equipped with a "sensor activation strip". This strip must be removed for the detector to operate properly. This should have been done during the dealer's pre-delivery inspection. Please check the detector to verify that the activation strip has been removed. Please consult your LP detector User's Guide for more detailed information.

NOTE

A warning label located in the cooking area reminds you to provide an adequate supply of fresh air for combustion. Unlike homes, the amount of oxygen supplied is limited due to the size of the recreational vehicle; proper ventilation when using the cooking appliance(s) will avoid danger of asphyxiation. It is especially important to ensure a flow of fresh air when the appliance is used for long periods of time.

Typical LP Gas System



Appliances

Refer to the individual manufacturer's owner's manual for primary and additional operating and safety instructions on the following equipment.

Gas/Electric Refrigerator
Many vehicles are equipped with a 3-way refrigerator. Unlike your home refrigerator, the unit on your RV can be operated on LP gas and 120-volt AC electricity. Read the owner's manual provided in your owner's packet before putting the refrigerator into operation.

The refrigerator will not operate correctly if the vehicle is not level while parked. The refrigerator coolant will not circulate properly if the unit is not level.

For best results, make sure the outside sidewall vent and roof vent are always clear of debris. Without proper circulation of the rear coils the unit will not keep food cold. Upon initial operation, or after being stored, the refrigerator it could take up to 24 hours before the unit is cool enough for use.

NOTE

It is normal for the rear coil area of your refrigerator to be hot. Be careful when checking this area to make sure proper airflow though the rear vent is not obstructed.

Furnace
Your RV may be equipped with a forced-air furnace similar to the type found in most homes with the exception that it is fueled by LP gas. Each unit is equipped with a wall mounted thermostat that controls the temperature. An operating manual for the furnace is included in your owner's packet.

The furnace is designed to have un-obstructed airflow from all its vents, including interior and exterior. If any vent is blocked the furnace may shut itself off.

The furnace igniter is powered by your 12-volt battery system. If the system battery is low, the furnace blower will come on, however the furnace will not ignite. Make sure you have sufficient battery power before operating the furnace.

Your furnace is designed to sustain a desired temperature in the vehicle at most times. Due to varying weather conditions, the furnace may not be able to keep up with sub-freezing temperatures. The amount of vehicle occupants and the position the vehicle is parked may help or hinder the furnace's ability to keep up with freeze conditions. Consult the furnace owner's manual for more information.

WARNING

Do not supplement the furnace with any portable fuel-burning appliance for heating the interior of the vehicle. These appliances are not safe. Asphyxiation/ carbon monoxide poisoning is possible in any well-sealed space and can result in serious personal injury or loss of life.

Air Conditioner
Many vehicles are equipped with a roof air conditioning system that works with electrical power from either a shore line or a portable generator.

Air conditioners are capable of cooling air a maximum of 18 to 22 degrees in a 50% humidity environment. As the humidity goes up, the cooling difference goes down. If the temperature inside your coach is 100 degrees when you turn on the air conditioner, it will only put out 80 degrees. Eventually the air inside the coach will cool, and as it cools the air put out by the air conditioner will cool also. However, when starting out at 100 degrees, this cooling could take several hours before it reaches your desired temperature. Therefore, if you know the weather will be hot, turn your air conditioner on early.

The two most common complaints with roof air conditioners are they won't turn on at all, or when they do turn on, they won't put out cold air. Obviously, if the unit won't turn on you may have a problem with something other than the air conditioner. Always make sure you have sufficient power to run each air conditioner you plan on using. If your power source has only 30-amp service, you can run only one (1) air conditioner at a time. Using an adapter to plug in your 30-amp service doesn't allow the use of both AC's either. Most AC's require a minimum of 13 amps to operate properly. Although the amperage of two AC's running at the same time doesn't add up to 30 amps, other components in the coach, such as the converter, refrigerator, VCR (draws amps simply by just being plugged in), etc, draw enough amperage to push the total amp load over the 30 amp mark. If you desire to run both AC's in a 30-amp environment, try running your generator (optional equipment) instead of using shore power. Run both AC's off the generator until the coach cools off, then use shore power to run only one AC, which by itself will usually maintain a cool temperature inside the coach.

Electric Ceiling Fan Operation

The ceiling fan used in your coach is designed to ventilate the interior when cooking or if the use of your air conditioner is not desired. If used properly the roof fan can cool the interior by as much as 15 degrees within a short period of time. When used in the exhaust mode, the fan pulls hot air from high inside the coach and will pull fresh air from an open window.

This fan is usually controlled by a wall-mounted thermostat (some models have a thermostat built right on the fan), which must be turned on and adjusted to your desired temperature before use. The wall-mounted thermostat is not the same that is used for the furnace or air conditioners. Please review the supplied fan owner's manual for additional operating instructions.

To keep condensation from accumulating open the vent lids slightly to help the air circulate. Condensation occurs naturally from fluctuations in interior and exterior temperatures, humidity and dew point changes, showering and cooking.

To clean the screen, remove the screws holding it in place. Wash the screen using a non-abrasive soap and water. Re-install the screen and tighten the screws.

Keep all the vents closed when using the Rain Sensor Fan. Direct the airflow by slightly opening the window(s) on the shaded side of the camper to obtain the maximum air flow especially on hot, sunny days. Close all the roof vents. The area between the open window(s) and the Rain Sensor fan supplies the maximum air flow and provides the most comfort.

NOTE

Do not leave any vent cover open while the camper is in motion, stored or unattended for extended periods of time. High winds or other unusual conditions or obstructions may damage the cover and prevent closing. Leakage could result causing serious damage.

Water Heater

If your unit has a bath, it has a water heater. The LP water heater is accessed by a panel on the outside of the vehicle. Turn on the hot water faucet at the galley sink to see if the tank is full. Before operating any gas appliance, make sure the valve on the gas tank is open.

WARNING

All pilot lights, appliances and their igniters (see operating instructions) must be turned off during refueling of motor fuel tanks and/or LP gas containers.

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Equipment

This section covers the basic operation and care of various equipment found in your Livin' Lite RV. More detailed information as well as CAUTION or WARNING instructions about specific equipment may be found in each product manufacturer's manual. Optional equipment will also be discussed in this section which do not apply to all vehicles.

Entry Step

The entry step folds under the vehicle when traveling. To extend step, pull out from underneath the vehicle. To store steps, push assembly underneath the vehicle.

Lubricating the Mechanism: Lubricate the mechanism every 30 to 60 days. Carefully clean the area around the pivot points (the rivets involved in the motion of the mechanism). After cleaning, lubricate the pivot points between the pelt (to pinpoint this area locate the washer between the parts). An automotive grade, non-staining lubricant is recommended.

Covering Nicks & Scratches: Seal a nick or scratch with automotive grade primer to prevent rust. Once the nick or scratch has been sealed, cover the damaged area with an automotive grade or high-gloss paint.

CAUTION

To prevent the possibility of slipping on the entry step avoid excess lubricant on the surface of the entry step itself. Carefully clean the entire entry step after lubricating the mechanism.

NOTE

Silicone lubricants and WD-40 are not recommended as they tend to evaporate and dry the matted surfaces which leaves them vulnerable to the elements.

WARNING

If the vehicle is transported with the step in the extended position there is possibility of causing major damage to both the step and the vehicle.

Entry Door

The door uses two separate locks for personal safety and security. The door handle incorporates a primary and secondary latching system. One locking system is the door handle and the other is a dead bolt. However, keeping the entry door in good operating condition requires some routine maintenance. The following adjustments can help maintain the entry door performance.

The position of the striker plate may change over the course of time and settlement of the recreational vehicle. The setting may need to be adjusted to insure that the door operates smoothly and efficiently. To adjust the striker plate, loosen the two screws holding the plate to the jamb system. Move the plate in or out as needed to obtain a proper seal. Retighten the screws.

CAUTION

If screws are loose on the out-swing doors, the backer plate will release and drop down into the door jamb. Should this happen, replace the short screws with a screw that is long enough to go through the jamb system and into the frame work of the sidewall.

The locking cylinder requires slight lubrication on an annual basis, or as needed. Use powdered graphite, not a petroleum product which will gum the cylinder and inhibit smooth operation. The upper lock is the dead bolt, the lower lock is the privacy lock. Applying a light coating of white lithium grease to the face of the lock bolt helps in retaining a smooth close. The hinges for the door require slight lubrication annually, or as needed, with a high-quality, dry spray lubricant.

The screen door can be adjusted to sit flush in the door jam. This requires two separate adjustments to be performed. The first adjustment made is at the screen door latch/ catch itself. Loosen the two screws holding the latch to the door to permit vertical adjustment. Move the latch far enough to catch on the striker mounted at the door frame. Tighten both screws.. The striker mount on the door frame permits horizontal adjustment. Again, loosen the two screws holding the striker assembly. Move the striker to center the latch and tighten the screws in place.

It is a simple procedure to replace the sliding cover. Place the slider in the center. Pull from the center of the slider, it will bow enough to allow easy removal. To re-install, reverse this procedure. Install the upper left corner first and pay attention to the location of the stop tabs.

Effects of Prolonged Occupancy

Your camper was designed primarily for recreational use and short-term occupancy and has not been designed for full time living. If you expect to occupy the camper for an extended period, despite our efforts, be prepared to deal with condensation and the humid conditions that may be encountered. The relatively small volume and tight compact construction of a recreational vehicle means that the normal living activities of even a few occupants will lead to rapid moisture saturation of the air contained in the camper and the appearance of visible moisture, especially in cold weather. This is also not covered under warranty.

NOTE

Your camper is not designed to be used as permanent housing. Use of this product for long term or permanent occupancy will lead to premature deterioration of structure, interior finishes, fabrics, and drapes. Damage or deterioration due to long-term occupancy will not be considered normal, and will under the terms of the warranty constitute misuse, abuse or neglect, and will therefore void your warranty protection.

Just as moisture collects on the outside of a glass of cold water during humid weather, moisture can condense on the inside surfaces of your camper during use in cold weather when the relative humidity of the interior air is high. This condition is increased because the insulated walls of the camper are much thinner than house walls. Estimates indicate that a family of four can vaporize up to three gallons of water daily through breathing, cooking, bathing and washing. Unless the water vapor is carried outside by ventilation, or condensed by a dehumidifier, it will condense on the inside of the windows and walls as moisture, or in cold weather as frost or ice. It may also condense out of sight within the walls or the ceiling where it will manifest itself as warped or stained panels. Appearance of these conditions may indicate a serious condensation problem. When you recognize the signs of excessive moisture and condensation in your camper, you should take action to minimize their effects.

Ventilation and Moisture Control

You can reduce interior moisture condensation by taking the following steps:

1. Ventilate with outside air. Partially open one or more windows (at least the corners) to provide circulation of outside air into the interior. While this ventilation may increase the heating load during cold weather, it will greatly reduce water condensation. Even when it is raining or snowing, ventilation air from outside will be far drier than interior air and will effectively reduce condensation inside the camper.
2. Minimize moisture released inside the camper. Avoid making steam from excessive boiling or use of hot water. Remove water or snow from shoes before entering to avoid soaking the carpet. Avoid drying overcoats or other clothes inside the camper. In addition to the hazards of toxic fumes and oxygen depletion, open flames add moisture to the interior air, increasing condensation. Do not use an air humidifier inside the camper. Water put into the air by the humidifier will greatly increase condensation.
3. Install a dehumidifier. During prolonged, continuous use, a dehumidifying appliance may be more comfortable and effective in removing excess moisture from the interior air. While use of a dehumidifier is not a “cure-all,” and ventilation, storm windows and moisture reduction continue to be important, operation of the dehumidifier will reduce the amount of outside air needed for ventilation. Heating load on the furnace will be reduced and the interior will be less drafty.

Care and Maintenance

Winter Storage Recommendations

1. Level the unit – front to rear and side to side.
2. Remove bottled and canned goods and other items that can be damaged by freezing.
3. Open faucets, valves and drains (including toilet stool valve), water heater and line drain.
4. Run demand pump till water stops flowing from faucets. Shut pump off immediately. Allow drains, faucets and valves to remain open for several hours or blow all extra water out with air. Be sure lines are empty.
5. Close all faucets, valves and drains.
6. It is a good idea to use an antifreeze solution approved for potable water for more positive protection. Do not use automotive type antifreeze.
7. Before using vehicle again, you may want to sanitize the system.
8. Completely drain holding tanks.
9. Flush sink, shower-tub, lavatory and stool with a solution of hot water and dishwater soap. Allow to fully drain and flush with clean hot water.
10. If possible, agitate the water in the holding tanks by driving a few miles, then drain tanks again.
11. An alternate to step #9 is to use a chemical deodorant. Let mixture stand for a few days, then drain.
12. Flush with fresh water, drain, and after tanks are dry, close dump valves and drain cap.
13. Fill traps with an antifreeze approved for use in ABS plastic pipes. Normally, a cupful per trap is adequate. Do not use an antifreeze solution with an alcohol base.
14. Turn the thermostat off.
15. Put graphite in locks and lubricate hinges.
16. Close all windows and roof vents.

⚠ WARNING

Do not use automotive anti-freeze or windshield washer fluid anti-freeze in the vehicles water system. These can be harmful or fatal if swallowed. Your dealer can provide you with special anti-freeze that is safe and approved for rv water systems. Always follow manufacturer's instructions for these additives.

Winterizing the Water Pump

With the water drained from the potable water tank, disconnect the water pump outlet hose and then turn the pump on to allow the remaining water to be pumped out (less than one cup).

If you desire, you can blow out the water lines with compressed air by opening all valves and placing the air nozzle into the system where the outlet hose has disconnected. Replace pump hose.

Water System Winterizing

1. Drain the fresh water tank.
2. Drain pipes by turning the water pump ON and opening a cold water faucet. Wait for the water flow to stop. Turn pump OFF. Leave faucets OPEN.
3. Turn ON all faucets and OPEN the HOT and COLD WATER PIPE DRAIN VALVES. Leave these valves in the OPEN position. These valves are located either under the galley sink or in an exterior compartment, and permit the water to drain onto the ground below the RV.
4. OPEN the WATER HEATER drain valve located at the bottom of the heater (or remove plug). Let the water drain out. OPEN the heater SAFETY VALVE.
5. Bypass the water heater.
6. Use the siphon hose to add RV Anti-freeze to your system, or use air-pressure to remove all remaining water from the system.
7. After each faucet has been opened, drained and closed, CLOSE the WATER LINE DRAIN VALVES.
8. Drain the WASTE WATER HOLDING TANK
9. Double check that ALL WATER has been drained.

CAUTION

Draining the water system alone may not be enough to provide complete cold weather protection for an rv unit that will be stored in an unheated environment where temperatures drop below freezing. Consult your dealer for more information on the best method of winterizing your vehicle.

Cleaning Cabinets & sidewalls:
Clean the molded plastics and aluminum surfaces in the *Camplite* with a soft rag using Simple Green or other mild detergent.

Cleaning Counter Tops:
Your counter tops are made of a high pressure composite material and are highly resistant to normal spills and scuffs. Wash with a soft rag or sponge and mild detergent like Fantastik or 409. Avoid regular use of abrasive pads and scouring powders which will dull the surface and make it more stain-prone. Confine knife blades and slicing to a chopping block (not supplied). Pots and pans straight from the oven or burner and irons should be placed on lined hot pads, not the counter top.

Cleaning Floors:
Use a broom to sweep dirt and debris from the *Camplite*'s floor. Wipe with a damp cloth or with Simple Green if a mild detergent is needed. When you wipe down the flooring, you may find that your rag picks up aluminum residue and turns gray. This is normal.

Cleaning Dinette cushions:
Spills, spots or stains should be treated as soon as possible to avoid permanent damage. If a spill occurs, blot the fluid with a dry towel. Do not rub the spill. Rubbing may cause the liquid to "set' in the fabric. When attempting to clean a spot or stain, always start from the outside and work inward to avoid spreading it further. Some stains or soils are extremely difficult or impossible to remove completely. These should receive immediate, professional attention. Spills, spots, stains or soils are the responsibility of the owner and are not covered by the Livin' Lite Recreational Vehicles, Inc. Limited Warranty. Wipe the marine grade vinyl with warm water and a mild soap. If a stronger cleanser is needed, try Fantastik or other product deemed safe for cleaning vinyl surfaces.

Cleaning Awnings:
Be sure to clean off all debris as you roll up your awnings. Periodically wash off the awning fabric with a soapy water solution. Long-term exposure to the sun may cause some fading over time, which is normal. Lower awning poles during rain to allow run-off. Water accumulating in the awning during rains may cause undo stress on the seams, zippers and fasteners.

Cleaning Exterior Walls and Diamond Plate:
When washing and waxing the exterior of your RV, be sure to inspect all seams and trim for damaged or missing sealants. Occasionally during washing some sealants may be washed away, and harsh climates can accelerate the deterioration of sealants. As a guideline, inspect these areas twice a year or whenever the RV is washed or waxed, whichever is more frequent. Unsealed areas can lead to expensive structure repairs in the future. Wash with water and a mild detergent. Use a soft cloth or sponge. Avoid abrasive materials or cleaners that will scratch and dull your exterior's finish.

Cleaning Undercarriage:
Corrosive materials, such as those used for ice, snow and dust control accumulate on the underside of the camper. These materials should be removed by flushing the underbelly regularly with water, especially areas where mud and other foreign materials collect. The chance of corrosion can be minimized by frequent washings of the camper.

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