



Carrie Eklund
Central Services Manager
Finance Department

**INVITATION TO BID
DUMP TRUCKS
BID NO.: 314-PW-027**

3/13/14

Name of Bidding Firm: _____
Address _____ City: _____ State: _____ Zip: _____
Phone: _____ Fax: _____
E-Mail: _____

Bid Opening Time and Date 11:00 a.m., Local Time, Tuesday, April 1, 2014

Bids will be accepted until the specified opening time and date. Any bidder attempting to deliver after the opening time and date will be refused.

Bid Deposit/Bid Bond: NO
Prevailing Wage NO
Performance Bond: NO

PLEASE MARK THE RETURN SEALED ENVELOPE:

1. Bid Opening Date and Time
2. Title of Job
3. Bid Number

RETURN BIDS TO:

City of Rockford
Central Services Manager
425 East State Street, 4th Floor
Rockford, Illinois 61104
Telephone: (815) 987-5560

BIDS SUBMITTED BY FASCIMILE OR E-MAIL WILL NOT BE ACCEPTED

BID RESULTS:

Bid results may be obtained by telephone at (815) 987-5560, by fax at (800) 380-7174, or at www.rockfordil.gov

CITY OF ROCKFORD, ILLINOIS—BIDDING GENERAL CONDITIONS

1. Pricing. The bidder shall insert price for all bid items and all other information requested in these specifications. The price shall be the *full, delivered cost* to the City of Rockford with no additions.
2. Total versus “Per Item” Awards. The City generally awards contracts based on a lump sum basis to the lowest responsible and responsive bidder. However, the City may choose to award on a per item basis. Therefore, each bidder must submit pricing for each item indicated on the bid forms. Bidders must clearly indicate which items are bid and which are not.
3. Delivery of Merchandise. Delivery terms will always be Freight On Board (FOB)–Destination. The City of Rockford accepts no responsibility for the condition of any merchandise purchased prior to acceptance by City Personnel. Failure to comply with this requirement may constitute rejection of the bid.
4. Acceptance of Merchandise at Delivery. The City of Rockford reserves the right to refuse acceptance of delivered merchandise that differs substantially from the specifications in this invitation to bid or as otherwise permitted by Illinois law.
5. Prompt Payment Act. The City of Rockford intends to comply with the governmental prompt payment act. The awarded vendor will be paid upon submission of invoices to: City of Rockford Accounts Payable, 425 East State Street, Rockford, IL 61104.
6. W-9 Request for Taxpayer Identification Number. Prior to issuance of a purchase order, the successful bidder will be required to supply the City of Rockford with a federal W-9 Request for Taxpayer Identification Number and Certification. Failure to comply with this requirement will be considered a violation of contract terms, for which the City may bar the vendor from bidding for a period of up to three years.
7. Legal Compliance. The vendor awarded this contract will comply with all Federal, State, County, and City laws, ordinances, rules and regulations, which in any manner affect the product or service placed for bid herein. Lack of knowledge on the part of the awarded vendor of applicable law will in no way be cause for release of this obligation. If the City becomes aware of violation of any laws, ordinances, rules and regulations on the part of the awarded vendor, it reserves the right to reject any bid, cancel any contract, and pursue any other legal remedies deemed necessary.
8. Legal Requirements. This contract sets forth the entire final agreement between the City of Rockford and the bidder and shall govern the respective duties and obligations of the parties. The validity of this contract, and any disputes arising from the contract, shall be governed by the laws of the State of Illinois. Any litigation under this agreement shall be resolved in the trial courts of Winnebago County, State of Illinois. Should a provision of this contract be declared invalid by a court of competent jurisdiction, it shall not affect the validity of the remaining provisions of the contract.
9. Safety. Prevention of accidents at any project is the sole responsibility of the awarded vendor and its subcontractors, agents, and employees. The awarded vendor, its subcontractors, agents, and employees shall be fully and solely responsible for the safety of this project. The awarded vendor shall retain exclusive and direct control over the acts or omissions of its subcontractors, agents and employees, and any other persons performing portions of the work and not directly employed by the awarded vendor.

10. Criminal Background Check. When necessary for the protection of citizens and/or City staff, the City may require an awarded vendor to conduct a criminal background check on all of its personnel who will have direct contact with City facilities or residents/businesses served under this contract. Personnel are defined as representatives, agents, employees, subcontractors, or anyone else who will be utilized to fulfill obligations under this contract. Criminal background checks, at a minimum, shall consist of a county level felony and misdemeanor check for each county in which the personnel resided in the last 10 years. The awarded vendor shall notify the City of any of its personnel who have been convicted of a felony or misdemeanor prior to commencing any work under this contract. At the City's discretion, personnel with any felony or misdemeanor convictions which raise a concern about the safety of building, property, or City staff/resident's personal security, or is otherwise job related (as determined by the City) shall not perform work under this contract. Once given notice that a background check(s) will be required, it must be completed within 14 calendar days so as to not delay work to be completed.

11. Control of the Work. With respect to the awarded vendor's own work, the City shall not have contractual, operational, and/or supervisory control over and/or charge of the work and shall not be responsible for construction means, methods, techniques, sequences, procedures, and programs in connection with the awarded vendor's work, since these are solely the vendor's responsibility under the agreement. The City shall not be responsible for the awarded vendor's failure to carry out the work in accordance with the agreement's terms and conditions. The City shall not have control over and/or charge of acts or omissions of the awarded vendor, its subcontractors, and/or their agents or employees, or any other person performing portions of the work not directly employed by the awarded vendor. The awarded vendor shall be considered to be an "independent contractor" pursuant to Illinois law.

12. Bid Bond. When required on the cover sheet, a bid bond for not less than 5 percent of the bid amount must accompany all bids as a guarantee that if the bid is accepted, the bidder will execute and file the proper contract. A bank cashier's check, bank draft, or certified check equal to the amount specified is acceptable in lieu of a bid bond. Bid bonds of the two lowest firms will be retained until the contract is awarded.

13. Performance Bond. When required by the specifications herein, the awarded vendor shall furnish a performance bond equal to the amount of the contract, acceptable to the City, within 14 calendar days after notification of contract award. Failure to furnish the required bond within the time specified may be cause for rejection of the bid and any bid deposit may be retained by the City as liquidated damages and not as a penalty.

14. Taxes. No charge will be allowed for taxes from which the City of Rockford, Illinois is exempt. The City of Rockford, Illinois is not liable for the Illinois Retailers' Occupation Tax, the Service Occupation Tax or the Service Use Tax. The City is exempt from the Federal Excise and Transportation Tax.

15. Withdrawal of Bids. Firms may withdraw or cancel their bids at any time prior to the advertised invitation to bid opening. After the opening time, no bid shall be withdrawn or cancelled. All bids shall be firm and valid for a period of sixty (60) calendar days. If a bidder to whom a contract is awarded refuses to accept the award, the City may, at its discretion, suspend the bidder for a period of time up to three (3) years.

16. Subcontracting. The bidder shall provide information for all subcontractors, leased operators/equipment, and suppliers and all other information requested in the Subcontractor and Supplier Detail Forms attached. Requests for deviations from the completed detail forms submitted must be made in writing, and reviewed and approved by the City's Diversity Procurement Officer and the Central Services Manager or designee. The awarded vendor may not subcontract any portion of the contract after award without written consent of the City of Rockford

Central Services Manager. When subcontractors are used, the awarded vendor is required to pay subcontractors promptly after completion of work. Delay of payment is prohibited.

17. Termination of Contract. The City of Rockford reserves the right to terminate the contract in its entirety or in portions, upon written notice to the awarded vendor, if the Rockford City Council does not appropriate sufficient funds to complete the contract or in the event of default by the awarded vendor. Default is defined as failure of the awarded vendor to perform any of the provisions of this contract or failure to make sufficient progress so as to endanger performance of this contract in accordance with its terms. In the event of default, the City may purchase the product(s) and/or service(s) from other sources and hold the defaulting company responsible for any excess costs occasioned thereby. The City may require payment of liquidated damages for non-performance. Should default be due to failure to perform or because of a request for a price increase, the City reserves the right to remove the firm from the City's bidder list for a period of up to three years.

18. Late Bids and Proposals. Regardless of cause, late bids and proposals will not be accepted and will automatically be disqualified from further consideration. It shall be solely the vendor's risk to ensure delivery at the designated office by the designated time. Late bids and proposals will not be opened and may be returned to the awarded vendor at their request and expense.

19. EEO Forms. Each firm shall be required to submit with its bid information all EEO forms included in the invitation to bid package. Any bid which fails to include the properly completed compliance items will not be read and will not be considered. All subcontractors shall also be required to comply with the same EEO forms as the firm.

20. Restrictive or Ambiguous Specifications. It is the responsibility of the bidding firm to review the invitation to bid specifications and to notify the Central Services Manager if the specifications are formulated in a manner that would unnecessarily restrict competition. Any such protest or question regarding the specifications or invitation to bid procedures must be received by the Central Services Division not less than seventy-two hours prior to the time set for the opening. In the event a contract term is not defined within the contract document, the term will be given its ordinary dictionary definition.

21. Bid Protest. Firms wishing to protest bids or awards shall notify the Central Services Manager in writing within 7 days after the invitation to bid opening. The notification should include the bid number, the name of the firm protesting, and the reason why the firm is protesting the bid. The Central Services Manager will respond to the protest within seven (7) calendar days. A successful protest may result in the reversal of a previously awarded contract.

22. Disputes. In case of disputes as to whether or not an item or service quoted or delivered meets specifications, the decision of the Central Services Manager, or authorized representative shall be final and binding to all parties. The Central Services Manager has the right to waive technicalities as they see fit. The Central Services Manager may request a written recommendation from the head of the department using the equipment or service being procured.

23. Exceptions. Any deviations from these specifications shall be noted and submitted with the bid. Failure to address deviations from specifications may result in bid rejection.

24. Acceptance/Rejection of Bids. The City of Rockford reserves the right to accept or reject any or all bids or proposals at any time, for any reason, including but not limited to the Rockford City Council not appropriating

sufficient funds to purchase equipment or complete the contract. The City may make awards in any manner deemed in the best interest of the City.

25. **Prevailing Wage.** When indicated on the cover page of this document, this contract calls for the construction of a "public work," within the meaning of the Illinois Prevailing Wage Act, 820 ILCS 130/.01 *et seq.* ("the Act"). The Act requires awarded vendors and subcontractors to pay laborers, workers, and mechanics performing services on public works projects no less than the "prevailing rate of wages" (hourly cash wages plus fringe benefits) in the county where the work is performed. When required, awarded vendors are responsible for paying current prevailing wage rates, as posted on the Illinois Department of Labor's website at: <http://www.state.il.us/agency/idol/rates/rates.HTM>. It is the awarded vendor's responsibility to verify current wage rates, as they are updated monthly. All awarded vendors and subcontractors rendering services under this contract must comply with all requirements of the Act, including but not limited to, all wage, notice, and record keeping duties.

26. **Certified Payroll.** All Certified Payroll reports required to be submitted under the Prevailing Wage Act, 820 ILCS 130, must be submitted monthly via the City's current Certified Payroll reporting system. No paper copies or non-conforming Certified Payroll reports will be accepted. The City reserves the right to withhold payment due to the awarded vendor until the vendor displays compliance with this provision.

27. **Substance Abuse Prevention.** When required by Illinois State Statutes, awarded vendors must have in place and file with the City a written program for prevention of substance abuse among its employees. This program must include pre-hire, random, reasonable suspicion, and post-accident drug and alcohol testing, as required by the Substance Abuse Prevention on Public Works Projects Act.

28. **Apprenticeship Requirement.** For construction contracts over \$50,000, awarded vendors must participate in apprenticeship and training programs approved and registered with the United States Department of Labor's Bureau of Apprenticeship and Training for all Trades that will be in the awarded vendor's (or his subcontractor's) employment, with each worker receiving the required apprenticeship/training appropriate to his trade. Owners or work performed by owners is not exempt from the apprenticeship and training requirement.

29. **Indemnification.** To the fullest extent permitted by law, the awarded vendor shall indemnify and hold harmless the City, its officers, representatives, elected and appointed officials, agents, and employees from and against all claims, damages, losses and expenses, including but not limited to attorney's fees, arising out of or resulting from the awarded vendor's performance of work under this agreement, and indemnifies and agrees to defend and hold harmless the City against any and all losses, claims, damages, and expenses arising from the work performed hereunder of the erection, construction, placement, or operation of any scaffold, hoist, crane, stay, ladder, support, or other mechanical contrivance in connection with such work including but not limited to losses, claims, damages, and expenses arising pursuant to claims asserted against the City pursuant to theories premised upon section 414 of the Restatement (Second) of Torts and section 343 of the Restatement (Second) of Torts.

This indemnification agreement shall not be limited in any way by any limitations on the amount or type of damages, compensation, or benefits payable by or for the awarded vendor under Worker's Compensation Acts, disability benefit acts, or other employee benefit acts, and serves as an express agreement to waive the protection of *Kotecki v. Cyclops Welding Corp.*, 146 Ill.2d 155, 585 N.E.2d 1023 (1991) in Illinois.

Further, the awarded vendor agrees that it is solely responsible for compliance with all safety laws applicable to the work performed hereunder, including but not limited to the Occupational Safety and Health Act of 1970 and

the Construction Safety Act of 1960 and all standards and regulations which have been or shall be promulgated by the agencies which administer the Acts.

Under no circumstances shall the awarded vendor, its subcontractors, agents, and employees be required to indemnify the City for its own negligence.

30. Officers. Each bidder affirms, by submission of a response to this bid or request for proposals, that no officer of the City of Rockford, Illinois, is directly or indirectly interested in the proposal for any reason of personal gain.

31. Non-Waiver. The failure by the City to require performance of any provision shall not affect the City's right to require performance at any time thereafter, nor shall a waiver of any breach or default of this contract constitute a waiver of any subsequent breach or default or a waiver of the provision itself.

32. Professional Services Selection Act. The City of Rockford intends to comply with 50 ILCS 510/5 governing the selection of professional services. Any reference in these terms and conditions to supplying pricing or price as a determining factor in selection do not apply for services covered by said act.

33. The City of Rockford reserves the right to accept or reject any and all proposals and to waive technicalities in submitted bids.

**BID REQUIREMENTS FOR
EQUAL EMPLOYMENT OPPORTUNITY**

All bidders seeking to do business with the City of Rockford are **REQUIRED** to submit with any formal, sealed bid all of the following documents and information, attached herewith, completed and signed:

1. Equal Employment Opportunity Affirmative Action Plan Statement of Policy.
2. The Statement of Non-Compliance and Certificate of Non-Segregated Facilities.
3. The Contractor or Vendor Workforce Data Form listing all current employees, by classification, directly employed by the bidder. All categories of information requested must be supplied.
Note: The number of employees must be entered under each category (no check marks)

Below are the Federal definitions of the following racial groups accepted as minorities by the City of Rockford:

Black: A person having origins in any of the Black racial groups of Africa, not of Hispanic origin.

Hispanic: A person of Spanish or Portuguese culture with origins in Mexico, South or Central America, or the Caribbean Islands, regardless of race.

Asian: A person having origins in any of the original peoples of the Far East, Southeast Asia, the Indian subcontinent, or the Pacific Islands. This area includes for example, China, Japan, Korea, the Philippine Republic and Samoa.

American Indian or Alaskan Native: A person having origins in any of the original peoples of North America.

4. Your State of Illinois Pre-Qualification Certification Number, issued by the Illinois Department of Human Rights for the Illinois Department of Human Rights Act, **must provide expiration date entered in the place provided therefore.**
5. Certificate of Non-Barred Bidding
6. All executed Subcontractor/Leased Operator and Supplier forms.

If you have not obtained your State of Illinois Pre-Qualification Number (item #4), by signing these documents you agree to make application for this number within 30 days from the date of bid opening.

ANY BID WHICH FAILS TO INCLUDE THE CITY OF ROCKFORD EEO PAGES 2, 4, AND 5, COMPLETED AND SIGNED WITH YOUR SEALED BID WILL NOT BE READ AND WILL NOT BE CONSIDERED – NO EXCEPTIONS.

Falsification of any required Equal Employment Opportunity or Affirmative Action information on the part of the bidder could result in rejection of the bid submitted or in the case where a contract has already been awarded, in the cancellation of said contract.

Any questions pertaining to E.E.O. requirements should be addressed to Ron Moore, Diversity Procurement Officer, Legal Department, 425 East State Street, Rockford, Illinois 61104, Phone: (815) 987-5622 or ron.moore@rockfordil.gov

EQUAL EMPLOYMENT OPPORTUNITY
AFFIRMATIVE ACTION PLAN
STATEMENT OF POLICY

It is the policy of this company, _____
to provide equal employment opportunity without regard to race, religion, color, national origin, handicap, age or sex through a program of positive action affecting all employees. In this program, our company carries out the requirements of Federal Executive orders 11246 and 11375, Civil Rights Act of 1964, Equal Employment Act of 1972, and all other applicable laws, and indicates its active support of the principle of equal opportunity in employment.

At present, _____ % of our work force are minorities and _____ % of our work force are females, and we will attempt to utilize minorities and females through a positive, continuing program in all jobs for which we contract in the future. Our company will utilize referrals from the City of Rockford's Diversity Procurement Officer for use of minorities and females regarding any future job vacancies.

It is also our intent to make efforts to purchase supplies or equipment from small business concerns located in the City of Rockford or counties of Winnebago or Boone and owned in substantial part (at least 51 per cent) by minorities or females.

_____ is the official who will be responsible for implementing this policy statement.

_____ will be designated as the Equal Opportunity Officer in our company, responsible for submission of all required equal employment opportunity documents.

In addition, _____ is hereby authorized to sign payroll as well as this company's officers. (NOTE: If only officers will be authorized to sign payrolls, please fill in "No One" in this space.)

STATEMENT OF NONCOMPLIANCE

If the equal employment opportunity hearing committee determines that a contractor, subcontractor/leased operator of equipment or bidder is not in compliance with this chapter, (also known as Chapter 11, Article III the City of Rockford Equal Opportunity Employment Ordinance), the hearing committee shall issue and serve upon such person a written statement of noncompliance setting forth the manner in which it finds such person has violated this chapter, and imposing and/or requiring appropriate sanctions, including, but not limited to any and/or all of the following:

- a. Denying, suspending or revoking qualifications, or declaring the contractor or subcontractor irresponsible and ineligible for future contracts or subcontracts until such time as the contractor or subcontractor shall demonstrate to the equal employment opportunity hearing committee that it is in compliance;
- b. Withholding or delaying payment on the contractor or;
- c. Suspending, avoiding or canceling contract work.

CERTIFICATION OF NON-SEGREGATED FACILITIES

The bidder certifies that he/she does not maintain or provide for his/her employees any segregated facilities at any of his/her establishments, and that he/she does not permit his/her employees to perform their services at any location, under his/her control, where segregated facilities are maintained. The bidder agrees that a breach of this certification will be a violation of the Equal Opportunity clause in any contract resulting from acceptance of this bid.

The bidder agrees that (except where he/she has obtained identical certification from proposed subcontractors/leased operators of equipment for specific time periods) he/she will obtain identical certification from proposed subcontractors/leased operators of equipment from the provisions of the Equal Opportunity clause, and that he/she will retain such certification in his/her files.

CERTIFICATE OF NON-BARRED BIDDING

The undersigned certifies that it is not barred from bidding on this contract as a result of a conviction for the violation of State laws prohibiting bid rigging or bid rotating. The undersigned also certifies that current or prospective employees, contractors, and subcontractors/leased operators of equipment are not listed as Excluded Individuals/Entities with the US Government, as maintained by the US General Services Administration.

By signing below, the firm agrees that all information provided in the previous pages is accurate, and that if the firm below does not currently have a Department of Human Rights number they will apply for one within thirty days with the State of Illinois.

Authorized Signature

Title

Firm

Our firm is a:

Minority Business Enterprise

City-Certified?

Yes

No

Women Business Enterprise

City Certified?

Yes

No

Neither

(Revised 12/21/09)

Request for Taxpayer Identification Number and Certification

**Give Form to the
requester. Do not
send to the IRS.**

Print or type See Specific Instructions on page 2.	Name (as shown on your income tax return)	
	Business name/disregarded entity name, if different from above	
	Check appropriate box for federal tax classification: <input type="checkbox"/> Individual/sole proprietor <input type="checkbox"/> C Corporation <input type="checkbox"/> S Corporation <input type="checkbox"/> Partnership <input type="checkbox"/> Trust/estate <input type="checkbox"/> Limited liability company. Enter the tax classification (C=C corporation, S=S corporation, P=partnership) ▶ _____ <input type="checkbox"/> Other (see instructions) ▶ _____	Exemptions (see instructions): Exempt payee code (if any) _____ Exemption from FATCA reporting code (if any) _____
	Address (number, street, and apt. or suite no.)	Requester's name and address (optional)
	City, state, and ZIP code	City of Rockford 425 East State Street Rockford IL 61104
List account number(s) here (optional)		

Part I Taxpayer Identification Number (TIN)

Enter your TIN in the appropriate box. The TIN provided must match the name given on the "Name" line to avoid backup withholding. For individuals, this is your social security number (SSN). However, for a resident alien, sole proprietor, or disregarded entity, see the Part I instructions on page 3. For other entities, it is your employer identification number (EIN). If you do not have a number, see *How to get a TIN* on page 3.

Social security number									

Note. If the account is in more than one name, see the chart on page 4 for guidelines on whose number to enter.

Employer identification number									

Part II Certification

Under penalties of perjury, I certify that:

1. The number shown on this form is my correct taxpayer identification number (or I am waiting for a number to be issued to me), and
2. I am not subject to backup withholding because: (a) I am exempt from backup withholding, or (b) I have not been notified by the Internal Revenue Service (IRS) that I am subject to backup withholding as a result of a failure to report all interest or dividends, or (c) the IRS has notified me that I am no longer subject to backup withholding, and
3. I am a U.S. citizen or other U.S. person (defined below), and
4. The FATCA code(s) entered on this form (if any) indicating that I am exempt from FATCA reporting is correct.

Certification instructions. You must cross out item 2 above if you have been notified by the IRS that you are currently subject to backup withholding because you have failed to report all interest and dividends on your tax return. For real estate transactions, item 2 does not apply. For mortgage interest paid, acquisition or abandonment of secured property, cancellation of debt, contributions to an individual retirement arrangement (IRA), and generally, payments other than interest and dividends, you are not required to sign the certification, but you must provide your correct TIN. See the instructions on page 3.

Sign Here

Signature of
U.S. person ▶

Date ▶

General Instructions

Section references are to the Internal Revenue Code unless otherwise noted.

Future developments. The IRS has created a page on IRS.gov for information about Form W-9, at www.irs.gov/w9. Information about any future developments affecting Form W-9 (such as legislation enacted after we release it) will be posted on that page.

Purpose of Form

A person who is required to file an information return with the IRS must obtain your correct taxpayer identification number (TIN) to report, for example, income paid to you, payments made to you in settlement of payment card and third party network transactions, real estate transactions, mortgage interest you paid, acquisition or abandonment of secured property, cancellation of debt, or contributions you made to an IRA.

Use Form W-9 only if you are a U.S. person (including a resident alien), to provide your correct TIN to the person requesting it (the requester) and, when applicable, to:

1. Certify that the TIN you are giving is correct (or you are waiting for a number to be issued),
2. Certify that you are not subject to backup withholding, or
3. Claim exemption from backup withholding if you are a U.S. exempt payee. If applicable, you are also certifying that as a U.S. person, your allocable share of any partnership income from a U.S. trade or business is not subject to the

withholding tax on foreign partners' share of effectively connected income, and

4. Certify that FATCA code(s) entered on this form (if any) indicating that you are exempt from the FATCA reporting, is correct.

Note. If you are a U.S. person and a requester gives you a form other than Form W-9 to request your TIN, you must use the requester's form if it is substantially similar to this Form W-9.

Definition of a U.S. person. For federal tax purposes, you are considered a U.S. person if you are:

- An individual who is a U.S. citizen or U.S. resident alien,
- A partnership, corporation, company, or association created or organized in the United States or under the laws of the United States,
- An estate (other than a foreign estate), or
- A domestic trust (as defined in Regulations section 301.7701-7).

Special rules for partnerships. Partnerships that conduct a trade or business in the United States are generally required to pay a withholding tax under section 1446 on any foreign partners' share of effectively connected taxable income from such business. Further, in certain cases where a Form W-9 has not been received, the rules under section 1446 require a partnership to presume that a partner is a foreign person, and pay the section 1446 withholding tax. Therefore, if you are a U.S. person that is a partner in a partnership conducting a trade or business in the United States, provide Form W-9 to the partnership to establish your U.S. status and avoid section 1446 withholding on your share of partnership income.

In the cases below, the following person must give Form W-9 to the partnership for purposes of establishing its U.S. status and avoiding withholding on its allocable share of net income from the partnership conducting a trade or business in the United States:

- In the case of a disregarded entity with a U.S. owner, the U.S. owner of the disregarded entity and not the entity,
- In the case of a grantor trust with a U.S. grantor or other U.S. owner, generally, the U.S. grantor or other U.S. owner of the grantor trust and not the trust, and
- In the case of a U.S. trust (other than a grantor trust), the U.S. trust (other than a grantor trust) and not the beneficiaries of the trust.

Foreign person. If you are a foreign person or the U.S. branch of a foreign bank that has elected to be treated as a U.S. person, do not use Form W-9. Instead, use the appropriate Form W-8 or Form 8233 (see Publication 515, Withholding of Tax on Nonresident Aliens and Foreign Entities).

Nonresident alien who becomes a resident alien. Generally, only a nonresident alien individual may use the terms of a tax treaty to reduce or eliminate U.S. tax on certain types of income. However, most tax treaties contain a provision known as a "saving clause." Exceptions specified in the saving clause may permit an exemption from tax to continue for certain types of income even after the payee has otherwise become a U.S. resident alien for tax purposes.

If you are a U.S. resident alien who is relying on an exception contained in the saving clause of a tax treaty to claim an exemption from U.S. tax on certain types of income, you must attach a statement to Form W-9 that specifies the following five items:

1. The treaty country. Generally, this must be the same treaty under which you claimed exemption from tax as a nonresident alien.
2. The treaty article addressing the income.
3. The article number (or location) in the tax treaty that contains the saving clause and its exceptions.
4. The type and amount of income that qualifies for the exemption from tax.
5. Sufficient facts to justify the exemption from tax under the terms of the treaty article.

Example. Article 20 of the U.S.-China income tax treaty allows an exemption from tax for scholarship income received by a Chinese student temporarily present in the United States. Under U.S. law, this student will become a resident alien for tax purposes if his or her stay in the United States exceeds 5 calendar years. However, paragraph 2 of the first Protocol to the U.S.-China treaty (dated April 30, 1984) allows the provisions of Article 20 to continue to apply even after the Chinese student becomes a resident alien of the United States. A Chinese student who qualifies for this exception (under paragraph 2 of the first protocol) and is relying on this exception to claim an exemption from tax on his or her scholarship or fellowship income would attach to Form W-9 a statement that includes the information described above to support that exemption.

If you are a nonresident alien or a foreign entity, give the requester the appropriate completed Form W-8 or Form 8233.

What is backup withholding? Persons making certain payments to you must under certain conditions withhold and pay to the IRS a percentage of such payments. This is called "backup withholding." Payments that may be subject to backup withholding include interest, tax-exempt interest, dividends, broker and barter exchange transactions, rents, royalties, nonemployee pay, payments made in settlement of payment card and third party network transactions, and certain payments from fishing boat operators. Real estate transactions are not subject to backup withholding.

You will not be subject to backup withholding on payments you receive if you give the requester your correct TIN, make the proper certifications, and report all your taxable interest and dividends on your tax return.

Payments you receive will be subject to backup withholding if:

1. You do not furnish your TIN to the requester,
2. You do not certify your TIN when required (see the Part II instructions on page 3 for details),
3. The IRS tells the requester that you furnished an incorrect TIN,
4. The IRS tells you that you are subject to backup withholding because you did not report all your interest and dividends on your tax return (for reportable interest and dividends only), or
5. You do not certify to the requester that you are not subject to backup withholding under 4 above (for reportable interest and dividend accounts opened after 1983 only).

Certain payees and payments are exempt from backup withholding. See *Exempt payee code* on page 3 and the separate Instructions for the Requester of Form W-9 for more information.

Also see *Special rules for partnerships* on page 1.

What is FATCA reporting? The Foreign Account Tax Compliance Act (FATCA) requires a participating foreign financial institution to report all United States account holders that are specified United States persons. Certain payees are exempt from FATCA reporting. See *Exemption from FATCA reporting code* on page 3 and the Instructions for the Requester of Form W-9 for more information.

Updating Your Information

You must provide updated information to any person to whom you claimed to be an exempt payee if you are no longer an exempt payee and anticipate receiving reportable payments in the future from this person. For example, you may need to provide updated information if you are a C corporation that elects to be an S corporation, or if you no longer are tax exempt. In addition, you must furnish a new Form W-9 if the name or TIN changes for the account, for example, if the grantor of a grantor trust dies.

Penalties

Failure to furnish TIN. If you fail to furnish your correct TIN to a requester, you are subject to a penalty of \$50 for each such failure unless your failure is due to reasonable cause and not to willful neglect.

Civil penalty for false information with respect to withholding. If you make a false statement with no reasonable basis that results in no backup withholding, you are subject to a \$500 penalty.

Criminal penalty for falsifying information. Willfully falsifying certifications or affirmations may subject you to criminal penalties including fines and/or imprisonment.

Misuse of TINs. If the requester discloses or uses TINs in violation of federal law, the requester may be subject to civil and criminal penalties.

Specific Instructions

Name

If you are an individual, you must generally enter the name shown on your income tax return. However, if you have changed your last name, for instance, due to marriage without informing the Social Security Administration of the name change, enter your first name, the last name shown on your social security card, and your new last name.

If the account is in joint names, list first, and then circle, the name of the person or entity whose number you entered in Part I of the form.

Sole proprietor. Enter your individual name as shown on your income tax return on the "Name" line. You may enter your business, trade, or "doing business as (DBA)" name on the "Business name/disregarded entity name" line.

Partnership, C Corporation, or S Corporation. Enter the entity's name on the "Name" line and any business, trade, or "doing business as (DBA) name" on the "Business name/disregarded entity name" line.

Disregarded entity. For U.S. federal tax purposes, an entity that is disregarded as an entity separate from its owner is treated as a "disregarded entity." See Regulation section 301.7701-2(c)(2)(iii). Enter the owner's name on the "Name" line. The name of the entity entered on the "Name" line should never be a disregarded entity. The name on the "Name" line must be the name shown on the income tax return on which the income should be reported. For example, if a foreign LLC that is treated as a disregarded entity for U.S. federal tax purposes has a single owner that is a U.S. person, the U.S. owner's name is required to be provided on the "Name" line. If the direct owner of the entity is also a disregarded entity, enter the first owner that is not disregarded for federal tax purposes. Enter the disregarded entity's name on the "Business name/disregarded entity name" line. If the owner of the disregarded entity is a foreign person, the owner must complete an appropriate Form W-8 instead of a Form W-9. This is the case even if the foreign person has a U.S. TIN.

Note. Check the appropriate box for the U.S. federal tax classification of the person whose name is entered on the "Name" line (Individual/sole proprietor, Partnership, C Corporation, S Corporation, Trust/estate).

Limited Liability Company (LLC). If the person identified on the "Name" line is an LLC, check the "Limited liability company" box only and enter the appropriate code for the U.S. federal tax classification in the space provided. If you are an LLC that is treated as a partnership for U.S. federal tax purposes, enter "P" for partnership. If you are an LLC that has filed a Form 8832 or a Form 2553 to be taxed as a corporation, enter "C" for C corporation or "S" for S corporation, as appropriate. If you are an LLC that is disregarded as an entity separate from its owner under Regulation section 301.7701-3 (except for employment and excise tax), do not check the LLC box unless the owner of the LLC (required to be identified on the "Name" line) is another LLC that is not disregarded for U.S. federal tax purposes. If the LLC is disregarded as an entity separate from its owner, enter the appropriate tax classification of the owner identified on the "Name" line.

Other entities. Enter your business name as shown on required U.S. federal tax documents on the "Name" line. This name should match the name shown on the charter or other legal document creating the entity. You may enter any business, trade, or DBA name on the "Business name/disregarded entity name" line.

Exemptions

If you are exempt from backup withholding and/or FATCA reporting, enter in the *Exemptions* box, any code(s) that may apply to you. See *Exempt payee code* and *Exemption from FATCA reporting code* on page 3.

Exempt payee code. Generally, individuals (including sole proprietors) are not exempt from backup withholding. Corporations are exempt from backup withholding for certain payments, such as interest and dividends. Corporations are not exempt from backup withholding for payments made in settlement of payment card or third party network transactions.

Note. If you are exempt from backup withholding, you should still complete this form to avoid possible erroneous backup withholding.

The following codes identify payees that are exempt from backup withholding:

- 1—An organization exempt from tax under section 501(a), any IRA, or a custodial account under section 403(b)(7) if the account satisfies the requirements of section 401(f)(2)
- 2—The United States or any of its agencies or instrumentalities
- 3—A state, the District of Columbia, a possession of the United States, or any of their political subdivisions or instrumentalities
- 4—A foreign government or any of its political subdivisions, agencies, or instrumentalities
- 5—A corporation
- 6—A dealer in securities or commodities required to register in the United States, the District of Columbia, or a possession of the United States
- 7—A futures commission merchant registered with the Commodity Futures Trading Commission
- 8—A real estate investment trust
- 9—An entity registered at all times during the tax year under the Investment Company Act of 1940
- 10—A common trust fund operated by a bank under section 584(a)
- 11—A financial institution
- 12—A middleman known in the investment community as a nominee or custodian
- 13—A trust exempt from tax under section 664 or described in section 4947

The following chart shows types of payments that may be exempt from backup withholding. The chart applies to the exempt payees listed above, 1 through 13.

IF the payment is for . . .	THEN the payment is exempt for . . .
Interest and dividend payments	All exempt payees except for 7
Broker transactions	Exempt payees 1 through 4 and 6 through 11 and all C corporations. S corporations must not enter an exempt payee code because they are exempt only for sales of noncovered securities acquired prior to 2012.
Barter exchange transactions and patronage dividends	Exempt payees 1 through 4
Payments over \$600 required to be reported and direct sales over \$5,000 ¹	Generally, exempt payees 1 through 5 ²
Payments made in settlement of payment card or third party network transactions	Exempt payees 1 through 4

¹ See Form 1099-MISC, Miscellaneous Income, and its instructions.

² However, the following payments made to a corporation and reportable on Form 1099-MISC are not exempt from backup withholding: medical and health care payments, attorneys' fees, gross proceeds paid to an attorney, and payments for services paid by a federal executive agency.

Exemption from FATCA reporting code. The following codes identify payees that are exempt from reporting under FATCA. These codes apply to persons submitting this form for accounts maintained outside of the United States by certain foreign financial institutions. Therefore, if you are only submitting this form for an account you hold in the United States, you may leave this field blank. Consult with the person requesting this form if you are uncertain if the financial institution is subject to these requirements.

A—An organization exempt from tax under section 501(a) or any individual retirement plan as defined in section 7701(a)(37)

B—The United States or any of its agencies or instrumentalities

C—A state, the District of Columbia, a possession of the United States, or any of their political subdivisions or instrumentalities

D—A corporation the stock of which is regularly traded on one or more established securities markets, as described in Reg. section 1.1472-1(c)(1)(i)

E—A corporation that is a member of the same expanded affiliated group as a corporation described in Reg. section 1.1472-1(c)(1)(i)

F—A dealer in securities, commodities, or derivative financial instruments (including notional principal contracts, futures, forwards, and options) that is registered as such under the laws of the United States or any state

G—A real estate investment trust

H—A regulated investment company as defined in section 851 or an entity registered at all times during the tax year under the Investment Company Act of 1940

I—A common trust fund as defined in section 584(a)

J—A bank as defined in section 581

K—A broker

L—A trust exempt from tax under section 664 or described in section 4947(a)(1)

M—A tax exempt trust under a section 403(b) plan or section 457(g) plan

Part I. Taxpayer Identification Number (TIN)

Enter your TIN in the appropriate box. If you are a resident alien and you do not have and are not eligible to get an SSN, your TIN is your IRS individual taxpayer identification number (ITIN). Enter it in the social security number box. If you do not have an ITIN, see *How to get a TIN* below.

If you are a sole proprietor and you have an EIN, you may enter either your SSN or EIN. However, the IRS prefers that you use your SSN.

If you are a single-member LLC that is disregarded as an entity separate from its owner (see *Limited Liability Company (LLC)* on page 2), enter the owner's SSN (or EIN, if the owner has one). Do not enter the disregarded entity's EIN. If the LLC is classified as a corporation or partnership, enter the entity's EIN.

Note. See the chart on page 4 for further clarification of name and TIN combinations.

How to get a TIN. If you do not have a TIN, apply for one immediately. To apply for an SSN, get Form SS-5, Application for a Social Security Card, from your local Social Security Administration office or get this form online at www.ssa.gov. You may also get this form by calling 1-800-772-1213. Use Form W-7, Application for IRS Individual Taxpayer Identification Number, to apply for an ITIN, or Form SS-4, Application for Employer Identification Number, to apply for an EIN. You can apply for an EIN online by accessing the IRS website at www.irs.gov/businesses and clicking on Employer Identification Number (EIN) under Starting a Business. You can get Forms W-7 and SS-4 from the IRS by visiting IRS.gov or by calling 1-800-TAX-FORM (1-800-829-3676).

If you are asked to complete Form W-9 but do not have a TIN, apply for a TIN and write "Applied For" in the space for the TIN, sign and date the form, and give it to the requester. For interest and dividend payments, and certain payments made with respect to readily tradable instruments, generally you will have 60 days to get a TIN and give it to the requester before you are subject to backup withholding on payments. The 60-day rule does not apply to other types of payments. You will be subject to backup withholding on all such payments until you provide your TIN to the requester.

Note. Entering "Applied For" means that you have already applied for a TIN or that you intend to apply for one soon.

Caution: A disregarded U.S. entity that has a foreign owner must use the appropriate Form W-8.

Part II. Certification

To establish to the withholding agent that you are a U.S. person, or resident alien, sign Form W-9. You may be requested to sign by the withholding agent even if items 1, 4, or 5 below indicate otherwise.

For a joint account, only the person whose TIN is shown in Part I should sign (when required). In the case of a disregarded entity, the person identified on the "Name" line must sign. Exempt payees, see *Exempt payee code* earlier.

Signature requirements. Complete the certification as indicated in items 1 through 5 below.

1. Interest, dividend, and barter exchange accounts opened before 1984 and broker accounts considered active during 1983. You must give your correct TIN, but you do not have to sign the certification.

2. Interest, dividend, broker, and barter exchange accounts opened after 1983 and broker accounts considered inactive during 1983. You must sign the certification or backup withholding will apply. If you are subject to backup withholding and you are merely providing your correct TIN to the requester, you must cross out item 2 in the certification before signing the form.

3. Real estate transactions. You must sign the certification. You may cross out item 2 of the certification.

4. Other payments. You must give your correct TIN, but you do not have to sign the certification unless you have been notified that you have previously given an incorrect TIN. "Other payments" include payments made in the course of the requester's trade or business for rents, royalties, goods (other than bills for merchandise), medical and health care services (including payments to corporations), payments to a nonemployee for services, payments made in settlement of payment card and third party network transactions, payments to certain fishing boat crew members and fishermen, and gross proceeds paid to attorneys (including payments to corporations).

5. Mortgage interest paid by you, acquisition or abandonment of secured property, cancellation of debt, qualified tuition program payments (under section 529), IRA, Coverdell ESA, Archer MSA or HSA contributions or distributions, and pension distributions. You must give your correct TIN, but you do not have to sign the certification.

What Name and Number To Give the Requester

For this type of account:	Give name and SSN of:
1. Individual	The individual
2. Two or more individuals (joint account)	The actual owner of the account or, if combined funds, the first individual on the account ¹
3. Custodian account of a minor (Uniform Gift to Minors Act)	The minor ²
4. a. The usual revocable savings trust (grantor is also trustee) b. So-called trust account that is not a legal or valid trust under state law	The grantor-trustee ³ The actual owner ¹
5. Sole proprietorship or disregarded entity owned by an individual	The owner ³
6. Grantor trust filing under Optional Form 1099 Filing Method 1 (see Regulation section 1.671-4(b)(2)(i)(A))	The grantor ⁴
For this type of account:	Give name and EIN of:
7. Disregarded entity not owned by an individual	The owner
8. A valid trust, estate, or pension trust	Legal entity ⁴
9. Corporation or LLC electing corporate status on Form 8832 or Form 2553	The corporation
10. Association, club, religious, charitable, educational, or other tax-exempt organization	The organization
11. Partnership or multi-member LLC	The partnership
12. A broker or registered nominee	The broker or nominee
13. Account with the Department of Agriculture in the name of a public entity (such as a state or local government, school district, or prison) that receives agricultural program payments	The public entity
14. Grantor trust filing under the Form 1041 Filing Method or the Optional Form 1099 Filing Method 2 (see Regulation section 1.671-4(b)(2)(i)(B))	The trust

¹ List first and circle the name of the person whose number you furnish. If only one person on a joint account has an SSN, that person's number must be furnished.

² Circle the minor's name and furnish the minor's SSN.

³ You must show your individual name and you may also enter your business or "DBA" name on the "Business name/disregarded entity" name line. You may use either your SSN or EIN (if you have one), but the IRS encourages you to use your SSN.

⁴ List first and circle the name of the trust, estate, or pension trust. (Do not furnish the TIN of the personal representative or trustee unless the legal entity itself is not designated in the account title.) Also see *Special rules for partnerships* on page 1.

*Note. Grantor also must provide a Form W-9 to trustee of trust.

Note. If no name is circled when more than one name is listed, the number will be considered to be that of the first name listed.

Secure Your Tax Records from Identity Theft

Identity theft occurs when someone uses your personal information such as your name, social security number (SSN), or other identifying information, without your permission, to commit fraud or other crimes. An identity thief may use your SSN to get a job or may file a tax return using your SSN to receive a refund.

To reduce your risk:

- Protect your SSN.
- Ensure your employer is protecting your SSN, and
- Be careful when choosing a tax preparer.

If your tax records are affected by identity theft and you receive a notice from the IRS, respond right away to the name and phone number printed on the IRS notice or letter.

If your tax records are not currently affected by identity theft but you think you are at risk due to a lost or stolen purse or wallet, questionable credit card activity or credit report, contact the IRS Identity Theft Hotline at 1-800-908-4490 or submit Form 14039.

For more information, see Publication 4535, Identity Theft Prevention and Victim Assistance.

Victims of identity theft who are experiencing economic harm or a system problem, or are seeking help in resolving tax problems that have not been resolved through normal channels, may be eligible for Taxpayer Advocate Service (TAS) assistance. You can reach TAS by calling the TAS toll-free case intake line at 1-877-777-4778 or TTY/TDD 1-800-829-4059.

Protect yourself from suspicious emails or phishing schemes. Phishing is the creation and use of email and websites designed to mimic legitimate business emails and websites. The most common act is sending an email to a user falsely claiming to be an established legitimate enterprise in an attempt to scam the user into surrendering private information that will be used for identity theft.

The IRS does not initiate contacts with taxpayers via emails. Also, the IRS does not request personal detailed information through email or ask taxpayers for the PIN numbers, passwords, or similar secret access information for their credit card, bank, or other financial accounts.

If you receive an unsolicited email claiming to be from the IRS, forward this message to phishing@irs.gov. You may also report misuse of the IRS name, logo, or other IRS property to the Treasury Inspector General for Tax Administration at 1-800-366-4484. You can forward suspicious emails to the Federal Trade Commission at: spam@uce.gov or contact them at www.ftc.gov/idtheft or 1-877-IDTHEFT (1-877-438-4338).

Visit IRS.gov to learn more about identity theft and how to reduce your risk.

Privacy Act Notice

Section 6109 of the Internal Revenue Code requires you to provide your correct TIN to persons (including federal agencies) who are required to file information returns with the IRS to report interest, dividends, or certain other income paid to you; mortgage interest you paid; the acquisition or abandonment of secured property; the cancellation of debt; or contributions you made to an IRA, Archer MSA, or HSA. The person collecting this form uses the information on the form to file information returns with the IRS, reporting the above information. Routine uses of this information include giving it to the Department of Justice for civil and criminal litigation and to cities, states, the District of Columbia, and U.S. commonwealths and possessions for use in administering their laws. The information also may be disclosed to other countries under a treaty, to federal and state agencies to enforce civil and criminal laws, or to federal law enforcement and intelligence agencies to combat terrorism. You must provide your TIN whether or not you are required to file a tax return. Under section 3406, payers must generally withhold a percentage of taxable interest, dividend, and certain other payments to a payee who does not give a TIN to the payer. Certain penalties may also apply for providing false or fraudulent information.

Dump Trucks
Bid Number 314-PW-027

- 1.0 Purpose
It is the purpose of these specifications to describe two (2) tandem axle patrol trucks, two (2) single axle patrol trucks, and two (2) 14' x 12 yard dump trucks required by the City of Rockford. Vehicles shall meet all 2010 engine emissions requirements.
- 2.0 General Requirements
- 2.1 Evaluation of Bid: Each bid shall be evaluated to determine whether the proposed product or service complies with the specifications detailed in this document. If this evaluation determines that a bid does not comply with the specifications set forth in this invitation to bid, then that bid shall be eliminated from consideration.
- 2.2 Evaluation Team: A team composed of staff from the Finance and Public Works departments shall evaluate each bid.
- 2.3 Evaluation Criteria: The evaluation team will evaluate bids based on total bid price and the ability of the bidder to comply with specifications.
- 2.4 Basis of Award: The City will award this contract to the lowest responsive and responsible bidder that is able to meet the requirements and criteria set forth in this document. A "responsive" bidder is able to provide a product or service that conforms in all material respects to the specifications detailed in this document. A "responsible" bidder is a corporation, company, or person who has the ability in all respects to provide the product or service desired at the highest possible standards of quality. A responsible bidder has the integrity and reliability to fully perform all contract requirements and assure good faith performance.
- 2.5 Questions: All questions regarding these specifications should be directed to Carrie Eklund, Central Services Manager, at (815)-987-5565 or carrie eklund@rockfordil.gov.
- 2.6 Delivery Date: The successful bidder must deliver all trucks complete with all equipment specified in this document. All trucks and equipment must arrive to the ordering agency in good working order by November 1, 2013. Exceptions from this delivery date must be listed in the bidder's response and may be grounds for eliminating a bidder as non-responsive. Should circumstances arise during manufacture of the vehicles which affect the delivery date, the vendor shall contact the Equipment Services Supervisor to request a change in the delivery date. Changes will be approved at the discretion of the City of Rockford.
- 2.7 Title and Plates. The successful bidder shall be responsible for titling each vehicle with a lienholder, in the state of Illinois, and applying for plates on behalf of the City.
- 2.8 Liquidated Damages: Failure to deliver the completed vehicles within the time frame outlined in the vendor's bid response will result in the assessment of liquidated damages. Damages will accrue in the amount of \$50 per business day beyond the delivery date. Damages will be deducted from payment issued by the City from the final invoice submitted for payment.
- 2.9 Manuals. A line setting sheet and manual(s) containing operating and servicing instructions for the equipment shall be provided with each unit. The manual(s) shall be as detailed as possible outlining all necessary operating and servicing instructions for the equipment, including its components. Necessary warnings and safety precautions shall be included. In addition, technical (shop) manual(s) containing illustrated parts lists and a complete set of technician repair manuals for the entire unit including wiring diagrams and hydraulic schematics supplied with the equipment shall be provided. This can be supplied in paper manuals or in electronic format (on CD in Microsoft Word or PDF format).
- 2.10 Vendor's Warranty. At a minimum, the successful bidder shall provide a one-year "bumper-to-bumper" warranty. Wherever referenced in this section and on this document's Bid Form, "one-year" and "additional

year" mean "12 months or 10,000 miles, whichever comes first." The bidder may propose an additional warranty beyond the minimum, provided said additional warranty is included at no charge to the agency.

2.11 Exceptions. Please list all exceptions.

3.0 Minimum Requirements, Tandem Axle

Base Chassis, 6X4 with 183.00 Wheelbase, 108.00 CA, and 79.00 Axle to Frame.

TOW HOOK, FRONT (2) Frame Mounted

FRAME RAILS Heat Treated Alloy Steel (120,000 PSI Yield); 10.866" x 3.622" x 0.433"

(276.0mm x 92.0mm x 11.1mm); 456.0" (11582mm) Maximum OAL

BUMPER, FRONT Steel, Swept Back

Includes: BUMPER, FRONT Powder Coated Gray (Argent) Color

FRAME EXTENSION, FRONT Integral; 20" In Front of Grille

WHEELBASE RANGE 177" (450cm) Through and Including 226" (575cm)

AXLE, FRONT NON-DRIVING {Meritor MFS-18-133A} Wide Track, I-Beam Type, 18,000-lb Capacity

SHOCK ABSORBERS, FRONT

SPRINGS, FRONT AUXILIARY Rubber

SUSPENSION, FRONT, SPRING Multileaf, Shackle Type; 18,000-lb Capacity; Less Shock Absorber

BRAKE SYSTEM, AIR Dual System for Straight Truck Applications

Includes : BRAKE LINES Color and Size Coded Nylon

DRAIN VALVE Twist-Type

DUST SHIELDS, FRONT BRAKE

DUST SHIELDS, REAR BRAKE

GAUGE, AIR PRESSURE (2) Air 1 and Air 2 Gauges; Located in Instrument Cluster

PARKING BRAKE CONTROL Yellow Knob, Located on Instrument Panel

PARKING BRAKE VALVE For Truck

QUICK RELEASE VALVE Bendix On Rear Axle for Spring Brake Release: 1 for 4x2, 2 for 6x4

SLACK ADJUSTERS, FRONT Automatic

SLACK ADJUSTERS, REAR Automatic

SPRING BRAKE MODULATOR VALVE R-7 for 4x2, SR-7 with relay valve for 6x4

BRAKES, FRONT, AIR CAM 16.5" x 6", Includes 24 SqIn Long Stroke Brake Chambers

DRAIN VALVE {Berg} Manual; With Pull Chain, for Air Tank

AIR BRAKE ABS {Bendix AntiLock Brake System} Full Vehicle Wheel Control System (4-Channel)

AIR DRYER {Bendix AD-IP} With Heater

Includes: AIR DRYER LOCATION Inside Left Rail, Back of Cab

BRAKE CHAMBERS, FRONT AXLE {Haldex} 24 SqIn

BRAKE CHAMBERS, REAR AXLE {Haldex GC3030LHDHO} 30/30 Spring Brake

SLACK ADJUSTERS, FRONT {Haldex} Automatic

SLACK ADJUSTERS, REAR {Haldex} Automatic

BRAKES, REAR, AIR CAM S-Cam; 16.5" x 7.0"; Includes 30/30 Sq.In. Long Stroke Brake Chamber and Spring Actuated Parking Brake

AIR COMPRESSOR {Bendix Tu-Flo 550} 13.2 CFM Capacity

STEERING COLUMN Tilting

STEERING WHEEL 2-Spoke, 18" Diam., Black

STEERING GEAR (2) {Sheppard M-100/M-80} Dual Power

DRIVESHAFT SYSTEM {Dana Spicer} SPL170XL with SPL170XL Inneraxle Shaft in lieu of 1710 Driveshaft with 1710 Inneraxle Shaft

EXHAUST SYSTEM Single, Horizontal, Aftertreatment Device Frame Mounted Outside Right Rail Under Cab; Includes Vertical Tail Pipe and Guard

Includes: EXHAUST HEIGHT 10' Exhaust Height - Based on Empty Chassis with Standard Components (+ or - 1" Height)

MUFFLER/TAIL PIPE GUARD Non-Bright Finish

TAIL PIPE (1) Turnback Type, Non-Bright, for Single Exhaust
ELECTRICAL SYSTEM 12-Volt, Standard Equipment

Includes :

BATTERY BOX Steel with Plastic Lid

DATA LINK CONNECTOR For Vehicle Programming and Diagnostics In Cab

FUSES, ELECTRICAL SAE Blade-Type

HAZARD SWITCH Push On/Push Off, Located on Top of Steering Column Cover

HEADLIGHT DIMMER SWITCH Integral with Turn Signal Lever

HEADLIGHTS (2) Sealed Beam, Round, with Chrome Plated Bezels

HORN, ELECTRIC Single

JUMP START STUD Located on Positive Terminal of Outermost Battery

PARKING LIGHT Integral with Front Turn Signal and Rear Tail Light

RUNNING LIGHT (2) Daytime, Included With Headlights

STARTER SWITCH Electric, Key Operated

STOP, TURN, TAIL & B/U LIGHTS Dual, Rear, Combination with Reflector

TURN SIGNAL SWITCH Self-Cancelling for Trucks, Manual Cancelling for Tractors, with Lane Change Feature

TURN SIGNALS, FRONT Includes Reflectors and Auxiliary Side Turn Signals, Solid State Flashers; Flush Mounted

WINDSHIELD WIPER SWITCH 2-Speed with Wash and Intermittent Feature (5 Pre-Set Delays), Integral with Turn Signal Lever

WINDSHIELD WIPERS Single Motor, Electric, Cowl Mounted

WIRING, CHASSIS Color Coded and Continuously Numbered

CIGAR LIGHTER Includes Ash Cup

POWER SOURCE Cigar Type Receptacle without Plug and Cord

ALTERNATOR {Bosch LH160} Brush Type, 12 Volt 160 Amp. Capacity, Pad Mount

BODY BUILDER WIRING Back of Standard Cab at Left Frame or Under Extended or Crew Cab at Left Frame;
Includes Sealed Connectors for Tail/Amber Turn/Marker/Backup/Accessory Power/Ground and Sealed Connector for Stop/Turn

BATTERY SYSTEM {International} Maintenance-Free, (2) 12-Volt 1850CCA Total

2-WAY RADIO Wiring Effects; Wiring With 20 Amp Fuse Protection, Includes Ignition Wire with 5 Amp Fuse, Wire Ends Heat Shrink and Routed to Center of Header Console in Cab

RADIO {International} AM/FM Stereo with Weatherband, Clock, Auxiliary Input, Includes Multiple Speakers

BACK-UP ALARM Electric, 102 dBA

AUXILIARY HARNESS 5.0' for Auxiliary Front Head Lights and Turn Signals for Front Plow Applications

STOP, TURN, TAIL & B/U LIGHTS {Truck Lite} Super 44, with LED Bulbs for Stop, Turn & Tail Lights and Truck Lite Super 40 for Backup lights, With Power Module, "International" Termination and Less Junction Box

SWITCH BODY CIRCUITS, MID for Bodybuilder, 6 Momentary Switches in instrument panel; one power Module with 6 channels, 20 Amp Max. per channel, 80 amp Max Output, Switches Control Power Module through Multiplex Wiring, Mounted in Cab Behind Driver Seat

JUMP START STUD Remote Mounted

HORN, AIR Black, Single Trumpet, Air Solenoid Operated

HEADLIGHTS Long Life Halogen; for Two Light System

CLEARANCE/MARKER LIGHTS (5) {Truck Lite} Amber LED Lights, Flush Mounted on Cab or Sunshade

ENGINE SHUTDOWN Automatic; With 30 Second Delay

HEADLIGHTS ON W/WIPERS Headlights Will Automatically Turn on if Windshield Wipers are turned on

STARTING MOTOR {Delco Remy 39MT} 12 Volt; Gear Reduced, With Thermal Over-Crank Protection

INDICATOR, LOW COOLANT LEVEL With Audible Alarm

CIRCUIT BREAKERS Manual-Reset (Main Panel) SAE Type III With Trip Indicators, Replaces All Fuses Except For 5-Amp Fuses

HOOD, HATCH (01) for Servicing

GRILLE Stationary, Chrome
FRONT END Tilting, Fiberglass, With Three Piece Construction; for 2007 & 2010 Emissions
PAINT SCHEMATIC, PT-1 Single Color, Design 100
PAINT TYPE Base Coat/Clear Coat, 1-2 Tone
KEYS - ALL ALIKE Fleet - Includes Ignition and Cab Door Keys
KEYS - ALL ALIKE, ID Z-250
CLUTCH Omit Item (Clutch & Control)
BLOCK HEATER, ENGINE {Phillips} 120 Volt/1250 Watt
ENGINE, DIESEL {MaxxForce 10} EPA 10, 310 HP @ 2000 RPM, 1050 lb-ft Torque @ 1200 RPM, 2200 RPM Governed Speed or Equivalent
Includes : AIR COMPRESSOR AIR SUPPLY LINE Naturally-Aspirated (Air Brake Chassis Only)
ANTI-FREEZE Red Shell Rotella Extended Life Coolant; -40 Degrees F/ -40 Degrees C; for MaxxForce Engines
COLD STARTING EQUIPMENT Intake Manifold Electric Grid Heater with Engine ECM Control
CRUISE CONTROL Electronic; Controls Integral to Steering Wheel
ENGINE OIL DRAIN PLUG Magnetic
ENGINE SHUTDOWN Electric, Key Operated
FUEL FILTER Included with Fuel/Water Separator
FUEL/WATER SEPARATOR Fuel/Water Separator and Fuel Filter in a Single Assembly; With Water-in-Fuel Sensor; Engine Mounted : GOVERNOR Electronic
OIL FILTER, ENGINE Spin-On Type
WET TYPE CYLINDER SLEEVES
FAN DRIVE {Horton Drivemaster} Direct Drive Type, Two Speed With Residual Torque Device for Disengaged Fan Speed
RADIATOR Aluminum, Cross Flow, Series System; 1228 SqIn Core and 648 SqIn Charge Air Cooler and 342 SqIn Low Temperature Radiator
FEDERAL EMISSIONS for 2010; MaxxForce DT Engines or Equivalent
AIR CLEANER Single Element, with Integral Snow Valve and In-Cab Control
THROTTLE, HAND CONTROL Engine Speed Control; Electronic, Stationary, Variable Speed; Mounted on Steering Wheel
ENGINE CONTROL, REMOTE MOUNTED Provision for; Includes Wiring for Body Builder Installation of PTO Controls; With Ignition Switch Control for Electronic Engines
EMISSION COMPLIANCE Federal, Does Not Comply With California Clean Air Idle Regulations
TRANSMISSION, AUTOMATIC {Allison 3000_RDS_P} 5th Generation Controls; Close Ratio, 6-Speed, With double Overdrive; On/Off Hwy; Includes Oil Level Sensor, With PTO Provision, Less Retarder, With 80,000-lb GVW & GCW Max.
OIL COOLER, AUTO TRANSMISSION {Modine} Water to Oil, for Allison or CEEMAT Transmission
TRANSMISSION DIPSTICK TUBE Located on the right side
TRANSMISSION SHIFT CONTROL {Allison} Push-Button Type; for Allison 3000 & 4000 Series Transmission
TRANSMISSION OIL Synthetic; 29 thru 42 Pints
ALLISON SPARE INPUT/OUTPUT for Rugged Duty Series (RDS); General Purpose Trucks, Construction
TRANSMISSION TCM LOCATION Located Inside Cab
PTO control dash mounted for customer provided PTO; includes switch, electrical/air solenoid, piping' and wiring
AXLE, REAR, TANDEM {Meritor RT-46-160} Single Reduction, 46,000-lb Capacity, With Driver Controlled Main Locking Differential in Forward Rear and Rear-Rear Axle and 200 Wheel Ends . Gear Ratio: 7.17
SUSPENSION, REAR, TANDEM {Hendrickson HMX-460-54} Walking Beam Type 54" Axle Spacing; 46,000lb Capacity, With Rubber End Bushings, Transverse Torque Rods, Less Shock Absorbers
SUSPENSION/REAR-AXLE IDENTITY for Meritor Tandem Rear Axles With Bar-Pin Beam Attachment Type Suspensions
AXLE, REAR, LUBE {EmGard 75W-90} Synthetic Oil; 65 thru 89.99 Pints

FUEL/WATER SEPARATOR With Thermostatic Fuel Temperature Controlled Electric Heater, and Filter Restriction/Change Indicator, Includes Standard Equipment Water-in-Fuel Sensor

FUEL TANK Top Draw; D Style, Non Polished Aluminum, 19" Deep, 70 U.S. Gal., 265 L Capacity, With Quick Connect Outlet, Mounted Left Side, Under Cab

CAB Conventional

Includes :

ARM REST (2) Molded Plastic; One Each Door

CLEARANCE/MARKER LIGHTS (5) Flush Mounted

COAT HOOK, CAB Located on Rear Wall, Centered Above Rear Window

CUP HOLDERS Two Cup Holders, Located in Lower Center of Instrument Panel

DOME LIGHT, CAB Rectangular, Door Activated and Push On-Off at Light Lens, Timed Theater Dimming, Integral to Console, Center Mounted

GLASS, ALL WINDOWS Tinted

GRAB HANDLE, CAB INTERIOR (1) "A" Pillar Mounted, Passenger Side : GRAB HANDLE, CAB INTERIOR (2) Front of "B" Pillar Mounted, One Each Side

INTERIOR SHEET METAL Upper Door (Above Window Ledge) Painted Exterior Color

STEP (4) Two Steps Per Door

GAUGE CLUSTER English With English Electronic Speedometer

Includes :

GAUGE CLUSTER (6) Engine Oil Pressure (Electronic), Water Temperature (Electronic), Fuel (Electronic), Tachometer (Electronic), Voltmeter, Washer Fluid Level

ODOMETER DISPLAY, Miles, Trip Miles, Engine Hours, Trip Hours, Fault Code Readout

WARNING SYSTEM Low Fuel, Low Oil Pressure, High Engine Coolant Temp, and Low Battery Voltage (Visual and Audible)

GAUGE, OIL TEMP, ALLISON TRAN

GAUGE, AIR CLEANER RESTRICTION {Filter-Minder} With Black Bezel Mounted in Instrument Panel

SEAT, DRIVER {National 2000} Air Suspension, High Back With Integral Headrest, Cloth, Isolator, 1 Chamber Lumbar, 2 Position Front Cushion Adjust, -3 to +14 Degree Back Angle Adjust

SEAT, PASSENGER {Gra-Mag} Non Suspension, High Back, Fixed Back, Integral Headrest, Cloth

MIRRORS (2) {Lang Mekra} Rectangular, 7.44" x 14.84" & 7.44" sq. Convex Both Sides, 102" Inside Spacing, Breakaway Type, Black Heads, Brackets & Arms

GRAB HANDLE Chrome; Towel Bar Type With Anti-Slip Rubber Inserts; for Cab Entry Mounted Left Side Only at "B" Pillar

INSTRUMENT PANEL Center Section, Ergonomic Panel

HEATER {International Blend-Air} With Defroster

HVAC FRESH AIR FILTER

STORAGE POCKET, DOOR Molded Plastic, Full Width; Mounted on Passenger Door

CAB INTERIOR TRIM Deluxe

Includes :

"A" PILLAR COVER Molded Plastic

CAB INTERIOR TRIM PANELS Cloth Covered Molded Plastic, Full Height; All Exposed Interior Sheet Metal is Covered Except for the Following: with a Two-Man Passenger Seat or with a Full Bench Seat the Back Panel is Completely Void of Covering

CONSOLE, OVERHEAD Molded Plastic; With Dual Storage Pockets with Retainer Nets and CB Radio Pocket

DOOR TRIM PANELS Molded Plastic; Driver and Passenger Doors

FLOOR COVERING Rubber, Black

HEADLINER Soft Padded Cloth

INSTRUMENT PANEL TRIM Molded Plastic with Black Center Section

STORAGE POCKET, DOOR (1) Molded Plastic, Full-Length; Driver Door

SUN VISOR (2) Padded Vinyl with Driver Side Toll Ticket Strap, Integral to Console

CAB REAR SUSPENSION Air Bag Type

WHEELS, FRONT DISC; 22.5" Painted Steel, 5 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 9.00 DC Rims; With Steel Hubs.

WHEELS, REAR DUAL DISC; 22.5" Painted Steel, 2 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 8.25 DC Rims; With Steel Hubs

PAINT IDENTITY, FRONT WHEELS {Accuride} Disc Front Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint

PAINT IDENTITY, REAR WHEELS {Accuride} Disc Rear Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint

WHEEL GUARDS, REAR {Accuride} for Metric Hub Piloted Wheels with Flanged Mounting Nuts, Mounted Between Hub & Wheel and Between Dual Wheels

WHEEL BEARING, FRONT, LUBE {EmGard 50W} Synthetic Oil

(8) TIRE, REAR 11R22.5 HDR1 (CONTINENTAL) 495 rev/mile, load range H, 16 ply

(2) TIRE, FRONT 315/80R22.5 HSU2 (CONTINENTAL) 481 rev/mile, load range L, 20 ply Steel surcharge

4.0 Minimum Requirements, Single Axle

Base Chassis, 4X2 with 160.00 Wheelbase, 85.00 CA, and 79.00 Axle to Frame.

TOW HOOK, FRONT (2) Frame Mounted

FRAME RAILS Heat Treated Alloy Steel (120,000 PSI Yield); 10.866" x 3.622" x 0.433" (276.0mm x 92.0mm x 11.1mm); 456.0" (11582mm) Maximum OAL

BUMPER, FRONT Steel, Swept Back

Includes: BUMPER, FRONT Powder Coated Gray (Argent) Color

FRAME EXTENSION, FRONT Integral; 20" In Front of Grille

WHEELBASE RANGE 146" (370cm) Through and Including 195" (495cm)

AXLE, FRONT NON-DRIVING {Meritor MFS-18-133A} Wide Track, I-Beam Type, 18,000-lb Capacity

SHOCK ABSORBERS, FRONT

SPRINGS, FRONT AUXILIARY Rubber

SUSPENSION, FRONT, SPRING Multileaf, Shackle Type; 18,000-lb Capacity; Less Shock Absorber

BRAKE SYSTEM, AIR Dual System for Straight Truck Applications

Includes: BRAKE LINES Color and Size Coded Nylon

DRAIN VALVE Twist-Type

DUST SHIELDS, FRONT BRAKE

DUST SHIELDS, REAR BRAKE

GAUGE, AIR PRESSURE (2) Air 1 and Air 2 Gauges; Located in Instrument Cluster

PARKING BRAKE CONTROL Yellow Knob, Located on Instrument Panel

PARKING BRAKE VALVE For Truck

QUICK RELEASE VALVE Bendix On Rear Axle for Spring Brake Release: 1 for 4x2, 2 for 6x4

SLACK ADJUSTERS, FRONT Automatic

SLACK ADJUSTERS, REAR Automatic

SPRING BRAKE MODULATOR VALVE R-7 for 4x2, SR-7 with relay valve for 6x4

BRAKES, FRONT, AIR CAM 16.5" x 6", Includes 24 SqIn Long Stroke Brake Chambers

DRAIN VALVE {Berg} Manual; With Pull Chain, for Air Tank

AIR BRAKE ABS {Bendix AntiLock Brake System} Full Vehicle Wheel Control System (4-Channel)

AIR DRYER {Bendix AD-IP} With Heater

Includes: AIR DRYER LOCATION Inside Left Rail, Back of Cab

BRAKE CHAMBERS, FRONT AXLE {Haldex} 24 SqIn

BRAKE CHAMBERS, REAR AXLE {Haldex GC3030LHDHO} 30/30 Spring Brake

SLACK ADJUSTERS, FRONT {Haldex} Automatic

SLACK ADJUSTERS, REAR {Haldex} Automatic

BRAKES, REAR, AIR CAM S-Cam; 16.5" x 7.0"; Includes 30/30 Sq.In. Long Stroke Brake Chamber

and Spring Actuated Parking Brake

AIR COMPRESSOR {Bendix Tu-Flo 550} 13.2 CFM Capacity

STEERING COLUMN Tilting

STEERING WHEEL 2-Spoke, 18" Diam., Black

STEERING GEAR (2) {Sheppard M-100/M-80} Dual Power

DRIVESHAFT SYSTEM {Dana Spicer} SPL170XL with SPL170XL Inneraxle Shaft in lieu of
1710 Driveshaft with 1710 Inneraxle Shaft

EXHAUST SYSTEM Single, Horizontal, Aftertreatment Device Frame Mounted Outside Right Rail
Under Cab; Includes Vertical Tail Pipe and Guard
Includes: EXHAUST HEIGHT 10' Exhaust Height - Based on Empty Chassis with Standard Components (+
or - 1" Height)

MUFFLER/TAIL PIPE GUARD Non-Bright Finish

TAIL PIPE (1) Turnback Type, Non-Bright, for Single Exhaust

ELECTRICAL SYSTEM 12-Volt, Standard Equipment
Includes :
BATTERY BOX Steel with Plastic Lid
DATA LINK CONNECTOR For Vehicle Programming and Diagnostics In Cab
FUSES, ELECTRICAL SAE Blade-Type
HAZARD SWITCH Push On/Push Off, Located on Top of Steering Column Cover
HEADLIGHT DIMMER SWITCH Integral with Turn Signal Lever
HEADLIGHTS (2) Sealed Beam, Round, with Chrome Plated Bezels
HORN, ELECTRIC Single
JUMP START STUD Located on Positive Terminal of Outermost Battery
PARKING LIGHT Integral with Front Turn Signal and Rear Tail Light
RUNNING LIGHT (2) Daytime, Included With Headlights
STARTER SWITCH Electric, Key Operated
STOP, TURN, TAIL & B/U LIGHTS Dual, Rear, Combination with Reflector
TURN SIGNAL SWITCH Self-Cancelling for Trucks, Manual Cancelling for Tractors, with Lane Change
Feature
TURN SIGNALS, FRONT Includes Reflectors and Auxiliary Side Turn Signals, Solid State Flashers; Flush
Mounted
WINDSHIELD WIPER SWITCH 2-Speed with Wash and Intermittent Feature (5 Pre-Set Delays), Integral
with Turn Signal Lever
WINDSHIELD WIPERS Single Motor, Electric, Cowl Mounted
WIRING, CHASSIS Color Coded and Continuously Numbered

CIGAR LIGHTER Includes Ash Cup

POWER SOURCE Cigar Type Receptacle without Plug and Cord

ALTERNATOR {Bosch LH160} Brush Type, 12 Volt 160 Amp. Capacity, Pad Mount
BODY BUILDER WIRING Back of Standard Cab at Left Frame or Under Extended or Crew Cab at Left
Frame; Includes Sealed Connectors for Tail/Amber Turn/Marker/Backup/Accessory Power/Ground and
Sealed Connector for Stop/Turn

BATTERY SYSTEM {International} Maintenance-Free, (2) 12-Volt 1850CCA Total

2-WAY RADIO Wiring Effects; Wiring With 20 Amp Fuse Protection, Includes Ignition Wire With 5 Amp Fuse,
Wire Ends Heat Shrink and Routed to Center of Header Console in Cab

RADIO {International} AM/FM Stereo With Weatherband, Clock, Auxiliary Input, Includes Multiple Speakers

BACK-UP ALARM Electric, 102 dBA

AUXILIARY HARNESS 5.0' for Auxiliary Front Head Lights and Turn Signals for Front Plow Applications

SWITCH, BODY CIRCUITS, MID for bodybuilder, 6 momentary switches in instrument panel; one power module
with 6 channels, 20 amp max. per channel, 80 amp max output, switches control power through
multiplex wiring mounted in the cab behind driver seat

STOP, TURN, TAIL & B/U LIGHTS {Truck Lite} Super 44, With LED Bulbs for Stop, Turn & Tail Lights and Truck Lite

Super 40 for Backup lights, With Power Module, "International" Termination and Less Junction Box
JUMP START STUD Remote Mounted
HORN, AIR Black, Single Trumpet, Air Solenoid Operated
HEADLIGHTS Long Life Halogen; for Two Light System
CLEARANCE/MARKER LIGHTS (5) {Truck Lite} Amber LED Lights, Flush Mounted on Cab or Sunshade
ENGINE SHUTDOWN Automatic; With 30 Second Delay
HEADLIGHTS ON W/WIPERS Headlights Will Automatically Turn on if Windshield Wipers are turned on
STARTING MOTOR {Delco Remy 39MT} 12 Volt; Gear Reduced, With Thermal Over-Crank Protection
INDICATOR, LOW COOLANT LEVEL With Audible Alarm
CIRCUIT BREAKERS Manual-Reset (Main Panel) SAE Type III With Trip Indicators, Replaces All Fuses Except For 5-
Amp Fuses
HOOD, HATCH (01) for Servicing
GRILLE Stationary, Chrome
FRONT END Tilting, Fiberglass, With Three Piece Construction; for 2007 & 2010 Emissions
PAINT SCHEMATIC, PT-1 Single Color, Design 100
PAINT TYPE Base Coat/Clear Coat, 1-2 Tone
KEYS - ALL ALIKE Fleet - Includes Ignition and Cab Door Keys
KEYS - ALL ALIKE, ID Z-250

CLUTCH Omit Item (Clutch & Control)

BLOCK HEATER, ENGINE {Phillips} 120 Volt/1250 Watt

ENGINE, DIESEL {MaxxForce 10} EPA 10, 310 HP @ 2000 RPM, 1050 lb-ft Torque @ 1200 RPM, 2200 RPM
Governed Speed or Equivalent

Includes : AIR COMPRESSOR AIR SUPPLY LINE Naturally-Aspirated (Air Brake Chassis Only)

ANTI-FREEZE Red Shell Rotella Extended Life Coolant; -40 Degrees F/ -40 Degrees C; for MaxxForce
Engines

COLD STARTING EQUIPMENT Intake Manifold Electric Grid Heater with Engine ECM Control

CRUISE CONTROL Electronic; Controls Integral to Steering Wheel

ENGINE OIL DRAIN PLUG Magnetic

ENGINE SHUTDOWN Electric, Key Operated

FUEL FILTER Included with Fuel/Water Separator

FUEL/WATER SEPARATOR Fuel/Water Separator and Fuel Filter in a Single Assembly; With Water-in-Fuel
Sensor; Engine Mounted : GOVERNOR Electronic

OIL FILTER, ENGINE Spin-On Type

WET TYPE CYLINDER SLEEVES

FAN DRIVE {Horton Drivemaster} Direct Drive Type, Two Speed With Residual Torque Device for Disengaged Fan
Speed

RADIATOR Aluminum, Cross Flow, Series System; 1228 SqIn Core and 648 SqIn Charge Air Cooler and 342 SqIn
Low Temperature Radiator

FEDERAL EMISSIONS for 2010; MaxxForce DT Engines or Equivalent

AIR CLEANER Single Element, with Integral Snow Valve and In-Cab Control

THROTTLE, HAND CONTROL Engine Speed Control; Electronic, Stationary, Variable Speed; Mounted on
Steering Wheel

ENGINE CONTROL, REMOTE MOUNTED Provision for; Includes Wiring for Body Builder Installation of PTO
Controls; With Ignition Switch Control for Electronic Engines

EMISSION COMPLIANCE Federal, Does Not Comply With California Clean Air Idle Regulations

TRANSMISSION, AUTOMATIC {Allison 3000_RDS_P} 5th Generation Controls; Close Ratio, 6-Speed, With double
Overdrive; On/Off Hwy; Includes Oil Level Sensor, With PTO Provision, Less Retarder, With 80,000-lb
GVW & GCW Max.

OIL COOLER, AUTO TRANSMISSION {Modine} Water to Oil, for Allison or CEEMAT Transmission

TRANSMISSION SHIFT CONTROL {Allison} Push-Button Type; for Allison 3000 & 4000 Series Transmission

TRANSMISSION DIPSTICK TUBE Located on the right side.
TRANSMISSION OIL Synthetic; 29 thru 42 Pints
ALLISON SPARE INPUT/OUTPUT for Rugged Duty Series (RDS); General Purpose Trucks, Construction
TRANSMISSION TCM LOCATION Located Inside Cab
PTO CONTROL, dash mounted for customer provided pto; includes switch, electrical/air solenoid, piping and wiring
AXLE, REAR, SINGLE{Meritor RS-23-160} Single Reduction, 23,000-lb Capacity, 200 Wheel Ends ,Driver Controlled Locking Differential Gear Ratio: 7.17
SUSPENSION, RR, SPRING , Single Vari-Rate;31,000lb Capacity, Includes 4500-lb Capacity Multileaf Auxiliary
AXLE, REAR, LUBE {EmGard 75W-90} Synthetic Oil; 65 thru 89.99 Pints
FUEL/WATER SEPARATOR With Thermostatic Fuel Temperature Controlled Electric Heater, and Filter Restriction/Change Indicator, Includes Standard Equipment Water-in-Fuel Sensor
FUEL TANK Top Draw; D Style, Non Polished Aluminum, 19" Deep, 70 U.S. Gal., 265 L Capacity, With Quick Connect Outlet, Mounted Left Side, Under Cab
CAB Conventional
Includes : ARM REST (2) Molded Plastic; One Each Door
CLEARANCE/MARKER LIGHTS (5) Flush Mounted
COAT HOOK, CAB Located on Rear Wall, Centered Above Rear Window
CUP HOLDERS Two Cup Holders, Located in Lower Center of Instrument Panel
DOME LIGHT, CAB Rectangular, Door Activated and Push On-Off at Light Lens, Timed Theater Dimming, Integral to Console, Center Mounted
GLASS, ALL WINDOWS Tinted
GRAB HANDLE, CAB INTERIOR (1) "A" Pillar Mounted, Passenger Side : GRAB HANDLE, CAB INTERIOR (2) Front of "B" Pillar Mounted, One Each Side
INTERIOR SHEET METAL Upper Door (Above Window Ledge) Painted Exterior Color
STEP (4) Two Steps Per Door
GAUGE CLUSTER English With English Electronic Speedometer
Includes : GAUGE CLUSTER (6) Engine Oil Pressure (Electronic), Water Temperature (Electronic), Fuel (Electronic), Tachometer (Electronic), Voltmeter, Washer Fluid Level
ODOMETER DISPLAY, Miles, Trip Miles, Engine Hours, Trip Hours, Fault Code Readout
WARNING SYSTEM Low Fuel, Low Oil Pressure, High Engine Coolant Temp, and Low Battery Voltage (Visual and Audible)
GAUGE, OIL TEMP, ALLISON TRAN
GAUGE, AIR CLEANER RESTRICTION {Filter-Minder} With Black Bezel Mounted in Instrument Panel
SEAT, DRIVER {National 2000} Air Suspension, High Back With Integral Headrest, Cloth, Isolator, 1 Chamber Lumbar, 2 Position Front Cushion Adjust, -3 to +14 Degree Back Angle Adjust
SEAT, PASSENGER {Gra-Mag} Non Suspension, High Back, Fixed Back, Integral Headrest, Cloth
MIRRORS (2) {Lang Mekra} Rectangular, 7.44" x 14.84" & 7.44" sq. Convex Both Sides, 102" Inside Spacing, Breakaway Type, Black Heads, Brackets & Arms
GRAB HANDLE Chrome; Towel Bar Type With Anti-Slip Rubber Inserts; for Cab Entry Mounted Left Side Only at "B" Pillar
INSTRUMENT PANEL Center Section, Ergonomic Panel
HEATER {International Blend-Air} With Defroster
HVAC FRESH AIR FILTER
STORAGE POCKET, DOOR Molded Plastic, Full Width; Mounted on Passenger Door
CAB INTERIOR TRIM Deluxe
Includes : "A" PILLAR COVER Molded Plastic
CAB INTERIOR TRIM PANELS Cloth Covered Molded Plastic, Full Height; All Exposed Interior Sheet Metal is Covered Except for the Following: with a Two-Man Passenger Seat or with a Full Bench Seat the Back Panel is Completely Void of Covering
CONSOLE, OVERHEAD Molded Plastic; With Dual Storage Pockets with Retainer Nets and CB Radio

Pocket
 DOOR TRIM PANELS Molded Plastic; Driver and Passenger Doors
 FLOOR COVERING Rubber, Black
 HEADLINER Soft Padded Cloth
 INSTRUMENT PANEL TRIM Molded Plastic with Black Center Section
 STORAGE POCKET, DOOR (1) Molded Plastic, Full-Length; Driver Door
 SUN VISOR (2) Padded Vinyl with Driver Side Toll Ticket Strap, Integral to Console
 CAB REAR SUSPENSION Air Bag Type
 WHEELS, FRONT DISC; 22.5" Painted Steel, 5 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 9.00 DC Rims; With Steel Hubs.
 WHEELS, REAR DUAL DISC; 22.5" Painted Steel, 2 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 8.25 DC Rims; With Steel Hubs
 PAINT IDENTITY, FRONT WHEELS {Accuride} Disc Front Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint
 PAINT IDENTITY, REAR WHEELS {Accuride} Disc Rear Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint
 WHEEL GUARDS, REAR {Accuride} for Metric Hub Piloted Wheels with Flanged Mounting Nuts, Mounted Between Hub & Wheel and Between Dual Wheels
 WHEEL BEARING, FRONT, LUBE {EmGard 50W} Synthetic Oil
 (8) TIRE, REAR 11R22.5 HDR1 (CONTINENTAL) 495 rev/mile, load range H, 16 ply
 (2) TIRE, FRONT 315/80R22.5 HSU2 (CONTINENTAL) 481 rev/mile, load range L, 20 ply Steel

- 5.0 Minimum Requirements, 14' x 12 yard dump trucks
- Base Chassis, Model 7400 SFA 6X4 with 183.00 Wheelbase, 108.00 CA, and 79.00 Axle to Frame.
- TOW HOOK, FRONT (2) Frame Mounted
- FRAME RAILS Heat Treated Alloy Steel (120,000 PSI Yield); 10.866" x 3.622" x 0.433" (276.0mm x 92.0mm x 11.1mm); 456.0" (11582mm) Maximum OAL
- BUMPER, FRONT Steel, Swept Back
Includes: BUMPER, FRONT Powder Coated Gray (Argent) Color
- WHEELBASE RANGE 177" (450cm) Through and Including 226" (575cm)
- FRAME ADDITION, FRONT 1" Integral; Increases BBC, BA and OAL Vehicle Dimensions By 1"
- AXLE, FRONT NON-DRIVING {Meritor MFS-18-133A} Wide Track, I-Beam Type, 18,000-lb Capacity
- SHOCK ABSORBERS, FRONT
- SPRINGS, FRONT AUXILIARY Rubber
- SUSPENSION, FRONT, SPRING Multileaf, Shackle Type; 18,000-lb Capacity; Less Shock Absorbers
- BRAKE SYSTEM, AIR Dual System for Straight Truck Applications
Includes:
 BRAKE LINES Color and Size Coded Nylon
 DRAIN VALVE Twist-Type
 DUST SHIELDS, FRONT BRAKE
 DUST SHIELDS, REAR BRAKE
 GAUGE, AIR PRESSURE (2) Air 1 and Air 2 Gauges; Located in Instrument Cluster
 PARKING BRAKE CONTROL Yellow Knob, Located on Instrument Panel
 PARKING BRAKE VALVE For Truck
 QUICK RELEASE VALVE Bendix On Rear Axle for Spring Brake Release: 1 for 4x2, 2 for 6x4
 SLACK ADJUSTERS, FRONT Automatic
 SLACK ADJUSTERS, REAR Automatic
 SPRING BRAKE MODULATOR VALVE R-7 for 4x2, SR-7 with relay valve for 6x4
- BRAKES, FRONT, AIR CAM 16.5" x 6", Includes 24 SqiN Long Stroke Brake Chambers
- TRAILER CONNECTIONS four wheel, with hand control valve and tractor protection valve for straight truck
- DRAIN VALVE {Berg} Manual; With Pull Chain, for Air Tank

AIR BRAKE ABS {Bendix AntiLock Brake System} Full Vehicle Wheel Control System (4-Channel)

AIR DRYER {Bendix AD-IP} With Heater

Includes: AIR DRYER LOCATION Inside Left Rail, Back of Cab

BRAKE CHAMBERS, FRONT AXLE {Haldex} 24 SqIn

BRAKE CHAMBERS, REAR AXLE {Haldex GC3030LHDHO} 30/30 Spring Brake

SLACK ADJUSTERS, FRONT {Haldex} Automatic

SLACK ADJUSTERS, REAR {Haldex} Automatic

BRAKES, REAR, AIR CAM S-Cam; 16.5" x 7.0"; Includes 30/30 Sq.In. Long Stroke Brake Chamber and Spring Actuated Parking Brake

AIR COMPRESSOR {Bendix Tu-Flo 550} 13.2 CFM Capacity

STEERING COLUMN Tilting

STEERING WHEEL 2-Spoke, 18" Diam., Black

STEERING GEAR (2) {Sheppard M-100/M-80} Dual Power

EXHAUST SYSTEM Single, Horizontal, Aftertreatment Device Frame Mounted Outside Right Rail Under Cab; Includes Vertical Tail Pipe and Guard

Includes:

EXHAUST HEIGHT 10' Exhaust Height - Based on Empty Chassis with Standard Components (+ or - 1"Height)

: MUFFLER/TAIL PIPE GUARD Non-Bright Finish

TAIL PIPE (1) Turnback Type, Non-Bright, for Single Exhaust

ELECTRICAL SYSTEM 12-Volt, Standard Equipment

Includes:

BATTERY BOX Steel with Plastic Lid

DATA LINK CONNECTOR For Vehicle Programming and Diagnostics In Cab

FUSES, ELECTRICAL SAE Blade-Type

HAZARD SWITCH Push On/Push Off, Located on Top of Steering Column Cover

HEADLIGHT DIMMER SWITCH Integral with Turn Signal Lever

HEADLIGHTS (2) Sealed Beam, Round, with Chrome Plated Bezels

HORN, ELECTRIC Single

JUMP START STUD Located on Positive Terminal of Outermost Battery

PARKING LIGHT Integral with Front Turn Signal and Rear Tail Light

RUNNING LIGHT (2) Daytime, Included With Headlights

STARTER SWITCH Electric, Key Operated

STOP, TURN, TAIL & B/U LIGHTS Dual, Rear, Combination with Reflector

TURN SIGNAL SWITCH Self-Cancelling for Trucks, Manual Cancelling for Tractors, with Lane Change Feature

TURN SIGNALS, FRONT Includes Reflectors and Auxiliary Side Turn Signals, Solid State Flashers; Flush Mounted

WINDSHIELD WIPER SWITCH 2-Speed with Wash and Intermittent Feature (5 Pre-Set Delays), Integral with Turn Signal Lever

WINDSHIELD WIPERS Single Motor, Electric, Cowl Mounted

WIRING, CHASSIS Color Coded and Continuously Numbered

CIGAR LIGHTER Includes Ash Cup

POWER SOURCE Cigar Type Receptacle without Plug and Cord

ALTERNATOR {Bosch LH160} Brush Type, 12 Volt 160 Amp. Capacity, Pad Mount

BODY BUILDER WIRING Back of Standard Cab at Left Frame or Under Extended or Crew Cab at Left Frame;

Includes: Sealed Connectors for Tail/Amber Turn/Marker/ Backup/Accessory

Power/Ground and Sealed Connector for Stop/Turn

BATTERY SYSTEM {International} Maintenance-Free, (2) 12-Volt 1850 CCA 2-

WAY RADIO Wiring Effects; Wiring With 20 Amp Fuse Protection, Includes

Ignition Wire With 5 Amp Fuse, Wire Ends Heat Shrink and Routed to Center

of Header Console in Cab
 RADIO {International} AM/FM Stereo With Weatherband, Clock, Auxiliary Input, Includes Multiple Speakers
 BACK-UP ALARM Electric, 102 dBA
 STOP, TURN, TAIL & B/U LIGHTS {Truck Lite} Super 44, With LED Bulbs for Stop, Turn & Tail Lights and Truck
 Lite Super 40 for Backup lights, With Power Module, "International" Termination and Less Junction
 Box
 TRAILER CONNECTION SOCKET 7 WAY; mounted at rear of frame, wired for turn signals ,combined with stop,
 compatible with trailers that use combined stop, tail, turn lamps
 JUMP START STUD Remote Mounted
 JUMP START STUD Mounted to Battery Box
 HORN, AIR Black, Single Trumpet, Air Solenoid Operated
 HEADLIGHTS Long Life Halogen; for Two Light System
 CLEARANCE/MARKER LIGHTS (5) {Truck Lite} Amber LED Lights, Flush Mounted on Cab or Sunshade
 ENGINE SHUTDOWN Automatic; With 30 Second Delay
 HEADLIGHTS ON W/WIPERS Headlights Will Automatically Turn on if Windshield Wipers are turned on
 STARTING MOTOR {Delco Remy 39MT} 12 Volt; Gear Reduced, With Thermal Over-Crank Protection
 INDICATOR, LOW COOLANT LEVEL With Audible Alarm
 CIRCUIT BREAKERS Manual-Reset (Main Panel) SAE Type III With Trip Indicators, Replaces All Fuses Except For 5-
 Amp Fuses
 GRILLE Stationary, Chrome
 FRONT END Tilting, Fiberglass, With Three Piece Construction; for 2007 & 2010 Emissions
 PAINT SCHEMATIC, PT-1 Single Color, Design 100
Includes:
 PAINT SCHEMATIC ID LETTERS
 PAINT TYPE Base Coat/Clear Coat, 1-2 Tone
 CLUTCH Omit Item (Clutch & Control)
 OIL FILTER, ENGINE {Hudgins Model 960 Spinner}
 BLOCK HEATER, ENGINE {Phillips} 120 Volt/1250 Watt
 ENGINE, DIESEL {MaxxForce 10} EPA 10, 350 HP @ 2000 RPM, 1150 lb-ft Torque @ 1200 RPM, 2200 RPM
 Governed Speed or Equivelant
Includes:
 AIR COMPRESSOR AIR SUPPLY LINE Naturally-Aspirated (Air Brake Chassis Only)
 ANTI-FREEZE Red Shell Rotella Extended Life Coolant; -40 Degrees F/ -40 Degrees C; for MaxxForce
 Engines
 COLD STARTING EQUIPMENT Intake Manifold Electric Grid Heater with Engine ECM Control
 CRUISE CONTROL Electronic; Controls Integral to Steering Wheel
 ENGINE OIL DRAIN PLUG Magnetic
 ENGINE SHUTDOWN Electric, Key Operated
 FUEL FILTER Included with Fuel/Water Separator
 FUEL/WATER SEPARATOR Fuel/Water Separator and Fuel Filter in a Single Assembly; With Water-in-Fuel
 Sensor; Engine Mounted
 GOVERNOR Electronic
 OIL FILTER, ENGINE Spin-On Type
 WET TYPE CYLINDER SLEEVES
 FAN DRIVE {Horton Drivemaster Polar Extreme} Direct Drive Type, Two Speed, With Residual Torque Device for
 Disengaged Fan Speed
 RADIATOR Aluminum, Front to Back Cross Flow, Series System; 1663 SqIn Core and 885 SqIn Charge Air Cooler
 and 470 SqIn Low Temperature Radiator Down Flow
 FEDERAL EMISSIONS for 2010; MaxxForce 9 & 10 Engines
 AIR CLEANER Single Element
Includes: GAUGE, AIR CLEANER RESTRICTION Air Cleaner Mounted

THROTTLE, HAND CONTROL Engine Speed Control; Electronic, Stationary, Variable Speed; Mounted on Steering Wheel

ENGINE CONTROL, REMOTE MOUNTED Provision for; Includes Wiring for Body Builder Installation of PTO Controls; With Ignition Switch Control for MaxxFord post 2007 Emissions Electronic Engines

EMISSION COMPLIANCE Federal, Does Not Comply With California Clean Air Idle Regulations

TRANSMISSION, AUTOMATIC {Allison 3000_RDS_P} 5th Generation Controls; Close Ratio, 6-Speed, With Double Overdrive; On/Off Hwy; Includes Oil Level Sensor, With PTO Provision, Less Retarder, With 80,000 lb GVW & GCW Max

OIL COOLER, AUTO TRANSMISSION {Modine} Water to Oil, for Allison or CEEMAT Transmission

TRANSMISSION SHIFT CONTROL {Allison} Push-Button Type; for Allison 3000 & 4000 Series Transmission

TRANSMISSION DIPSTICK relocated to right side

TRANSMISSION OIL Synthetic; 29 thru 42 Pints

ALLISON SPARE INPUT/OUTPUT for Rugged Duty Series (RDS); General Purpose Trucks, Construction

TRANSMISSION TCM LOCATION Located Inside Cab

SHIFT CONTROL PARAMETERS Allison Performance Programming in Primary and Allison Economy Programming in Secondary

PTO dash mounted for customer provided PTO, includes switch electrical / air solenoid, piping and wiring

AXLE, REAR, TANDEM {Meritor RT-46-160} Single Reduction, 46,000-lb Capacity, With Driver Controlled Main Locking Differential in Forward Rear and Rear-Rear Axle and 200 Wheel Ends . Gear Ratio: 7.17

SUSPENSION, REAR, TANDEM {Hendrickson HMX-460-54} Walking Beam Type 54" Axle Spacing; 46,000lb Capacity, With Rubber End Bushings, Transverse Torque Rods, Less Shock Absorbers

SUSPENSION/REAR-AXLE IDENTITY for Meritor Tandem Rear Axles With Bar-Pin Beam Attachment Type Suspensions

AXLE, REAR, LUBE {EmGard 75W-90} Synthetic Oil; 65 thru 89.99 Pints

FUEL/WATER SEPARATOR With Thermostatic Fuel Temperature Controlled Electric Heater, and Filter Restriction/Change Indicator, Includes Standard Equipment Water-in-Fuel Sensor

FUEL TANK Top Draw; D Style, Non Polished Aluminum, 19" Deep, 70 U.S. Gal., 265 L Capacity, With Quick Connect Outlet, Mounted Left Side, Under Cab

CAB Conventional

Includes:

ARM REST (2) Molded Plastic; One Each Door

CLEARANCE/MARKER LIGHTS (5) Flush Mounted

COAT HOOK, CAB Located on Rear Wall, Centered Above Rear Window

CUP HOLDERS Two Cup Holders, Located in Lower Center of Instrument Panel

DOME LIGHT, CAB Rectangular, Door Activated and Push On-Off at Light Lens, Timed Theater Dimming, Integral to Console, Center Mounted

GLASS, ALL WINDOWS Tinted

GRAB HANDLE, CAB INTERIOR (1) "A" Pillar Mounted, Passenger Side

GRAB HANDLE, CAB INTERIOR (2) Front of "B" Pillar Mounted, One Each Side

INTERIOR SHEET METAL Upper Door (Above Window Ledge) Painted Exterior Color

STEP (4) Two Steps Per Door

GAUGE CLUSTER English With English Electronic Speedometer

Includes:

GAUGE CLUSTER (6) Engine Oil Pressure (Electronic), Water Temperature (Electronic), Fuel (Electronic), Tachometer (Electronic), Voltmeter, Washer Fluid Level

ODOMETER DISPLAY, Miles, Trip Miles, Engine Hours, Trip Hours, Fault Code Readout

WARNING SYSTEM Low Fuel, Low Oil Pressure, High Engine Coolant Temp, and Low Battery Voltage (Visual and Audible)

GAUGE, OIL TEMP, ALLISON TRAN

GAUGE, AIR CLEANER RESTRICTION {Filter-Minder} With Black Bezel Mounted in Instrument Panel

IP CLUSTER DISPLAY On Board Diagnostics Display of Fault Codes in Gauge Cluster

SEAT, DRIVER {National 2000} Air Suspension, High Back With Integral Headrest, Cloth, Isolator, 1 Chamber Lumbar, 2 Position Front Cushion Adjust, -3 to +14 Degree Back Angle Adjust
Includes: SEAT BELT 3-Point, Lap and Shoulder Belt Type

SEAT, PASSENGER {National 2000} Air Suspension, High Back With Integral Headrest, Cloth, Isolator, 1 Chamber Lumbar, 2 Position Front Cushion Adjust, -3 to +14 Degree Back Angle Adjust
Includes: SEAT BELT 3-Point, Lap and Shoulder Belt Type

MIRRORS (2) {Lang Mekra} Rectangular, 7.44" x 14.84" & 7.44" sq. Convex Both Sides, 102" Inside Spacing, Breakaway Type, Heated Heads Thermostatic Controlled, Black Heads, Brackets & Arms

GRAB HANDLE Chrome; Towel Bar Type with Anti-Slip Rubber Inserts; for Cab Entry Mounted Left Side Only at "B" Pillar

WINDSHIELD Heated, Single Piece

AIR CONDITIONER Blend Air with Integral Heater and Defroster

INSTRUMENT PANEL Center Section, Ergonomic Panel

WINDOW, power(2) and power door locks, left and right doors includes express down feature

HVAC FRESH AIR FILTER

STORAGE POCKET, DOOR Molded Plastic, Full Width; Mounted on Passenger Door

CAB INTERIOR TRIM Deluxe
Includes:
 "A" PILLAR COVER Molded Plastic
 CAB INTERIOR TRIM PANELS Cloth Covered Molded Plastic, Full Height; All Exposed Interior Sheet Metal is Covered Except for the Following: with a Two-Man Passenger Seat or with a Full Bench Seat the Back Panel is Completely Void of Covering
 CONSOLE, OVERHEAD Molded Plastic; With Dual Storage Pockets with Retainer Nets and CB Radio Pocket
 DOOR TRIM PANELS Molded Plastic; Driver and Passenger Doors
 FLOOR COVERING Rubber, Black : HEADLINER Soft Padded Cloth
 INSTRUMENT PANEL TRIM Molded Plastic with Black Center Section
 STORAGE POCKET, DOOR (1) Molded Plastic, Full-Length; Driver Door
 SUN VISOR (2) Padded Vinyl with Driver Side Toll Ticket Strap, Integral to Console

CAB REAR SUSPENSION Air Bag Type

WHEELS, FRONT DISC; 22.5" Painted Steel, 5 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 9.00 DC Rims; With Steel Hubs

WHEELS, REAR DUAL DISC; 22.5" Painted Steel, 2 Hand Hole, 10-Stud (285.75MM BC) Hub Piloted, Flanged Nut, Metric Mount, 8.25 DC Rims; With Steel Hubs

PAINT IDENTITY, FRONT WHEELS {Accuride} Disc Front Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint

PAINT IDENTITY, REAR WHEELS {Accuride} Disc Rear Wheels; With Vendor Applied (PKWHT21) White Powder Coat Paint

WHEEL GUARDS, REAR {Accuride} for Metric Hub Piloted Wheels with Flanged Mounting Nuts, Mounted Between Hub & Wheel and Between Dual Wheels

WHEEL BEARING, FRONT, LUBE {EmGard 50W} Synthetic Oil

(8) TIRE, REAR 11R22.5 HDR1 (CONTINENTAL) 495 rev/mile, load range H, 16 ply

(2) TIRE, FRONT 315/80R22.5 HSU2+ (CONTINENTAL) 481 rev/mile, load range L, 20 ply Steel surcharge

**CITY OF ROCKFORD
TANDEM AND SINGLE AXLE DUMP TRUCKS
Multi-Purpose Dump Body**

**Meet
Specifications
(Y/N)**

Exceptions

Body shall be versatile with the ability to be used as a dump body or as a spreader body

Body shall have an integral center conveyor to discharge material through the tailgate onto a spinner assembly

Conveyor shall be capable of various aggregate type materials

The body shall be 13 feet inside length for tandem axle, 10 feet for single axle.

The body shall be 87" ID and 96" OD wide.

The side height of the body shall be 44 inches.

The tailgate height of the body shall be 50 inches.

The body capacity shall be 9.6 cubic yards for tandem axle, 7.1 cubic yards for single axle, water level full.

The body shall be continuously welded 100% throughout.

Entire body shall be manufactured from 201 stainless steel, 2B finish.

The sides, front and tailgate shall be 3/16" thick material.

The longsills shall be 14" tall, fabricated from 1/4" thick material.

Longsills shall be joined at bottom flange with 4" x 1 1/2" x 1/4" channel crossmembers welded every 24" on centers the full length of the longsill.

Longsills shall be joined at the top by 3/16" x 3" x 3" angle welded every 12" on centers the full length of the conveyor.

The floor under the conveyor shall be 1/4" thick, bolt in, removable.

Chain shields shall be 3/16" thick, bolt in, removable.

Body sides shall be 3/16" brake formed to a radius of 43 inches.

Boxed top rail shall be of 3/16" formed channel, dirt shedding.

Body shall have 6" high board pockets at front and rear of top rail.

Front bulkhead shall be 3/16" and have a partial doghouse.

Lower portion of front bulkhead shall be sloped to the conveyor.

Front bulkhead shall conform to the radius of the body.

Rear corner posts shall be 4" x 6" full box 3/16" plate.

A 3/16" panel will extend from rear posts to the body side walls and will conform to the radius of the side wall.

There shall be a 4" x 6" x 3/16" boxed tube welded to the rear posts and to the body longsills.

The tailgate shall be manufactured from 3/16" 201 stainless steel with a boxed perimeter of 10 gauge formed channels.

The tailgate shall be six panel design full double acting.

Tailgate shall fold down and be chained flat with the body floor.

The material door shall extend 16" into the interior of the body.

The door opening shall be 21" in width by 8-1/2" in height.

Material door shall be manufactured of 3/16" 201 stainless steel.

Material door shall be screw adjustable with infinite positions.

Material door shall include door opening height indicator.

The tailgate shall have 1" x 4" bar stock upper hinge.

Lower tailgate pins shall be 1-1/4" stainless.

The tailgate latches shall be flame cut stainless and be 1" thick.

Each latch is adjustable with threaded 3/4" clevis and keeper pins.

The latch shall be an over center type.

The latch must be air release and air latch utilizing two 3.5" air cylinders one in each rear corner post of body.

Air cylinders and shall be accessible through a bolt on access panel.

Tailgate latch rear pivot points shall be a greaseable sealed bearings.

Tailgate latch pivot points inside of the rear posts shall be greaseable.

The body conveyor shall be 34" wide.

The conveyor chain must be United States manufactured AL667XH.

Bar flights are 1-1/2" wide x 1/2" thick on 2 1/4" centers.

Chain shall ride on 8 tooth case hardened sprockets.

Drive and idler shafts shall be minimum 2" diameter.

The rear shaft bearings shall have heavy duty, dust sealed self-aligning four bolt flange bearings.

Conveyor shall be driven by Two (2) 6:1 spur gearboxes with low speed high torque hydraulic motors.

Street side motor shall have 100 pulse/rev integral speed sensor.

Gearboxes and motors must be easily accessible.

Entire rear drive system including the shaft, bearings, sprockets, and gearboxes shall be removable as an assembly out of the long sill.

There shall be two heavy-duty bearing/ idler assemblies to adjust conveyor chain tension by use of slide rail style adjusters.

Slide rail assembly including 1 1/4" adjusting bolt shall be stainless steel.

Adjusting bolt easily accessible at front of the body outside long sill.

All grease points for the body hoist, tailgate latch, and bearings will be provided with grease lines that terminate at a remote zerk manifold.

A sub-floor kit of 3/8" poly sheet shall be installed between the body long sills under the conveyor to contain material carry over.

The body shall include an upper and lower rubber wiper assembly at the rear of the body to clean chain bar flights.

The body shall have a 1/2 cabshield fully welded to the front bulkhead. Cabshield will be 84" wide and will extend a minimum of 22" forward.

Cabshield shall fabricated from 10 ga 201 SS material minimum.

The body will have tandem length fenders welded to the long sills.

Fenders shall be flat to accommodate mounting of liquid tanks.

Fenders shall be 31" wide and 110" long for tandem axle, 31" wide and 69" long for single axle.

Fenders will be fabricated from minimum 201 SS 7 ga material.

A stainless steel ladder will be installed on the driver side front.

Ladder will have a rigid upper section with fold down lower section.
Ladder rungs shall be grip strut material minimum 16" wide.
Ladder rungs will be spaced a maximum of 12" between rungs.

Rear Spinner:

Spinner shall be Stationary receiver mount spinner style.
Spinner shall be mounted via means of two 2" receiver tubes one tube located on each side of the spinner assembly.

Spinner must be adjustable front to back via multiple holes in mounts.
Spinner body is manufactured from 12-gauge 201 stainless steel.

There shall be three adjustable spinner deflectors, for directing material from the spinner disc.

Deflectors must be adjustable without the use of tools.

The spinner motor shall be high torque/low speed mounted directly to the spinner disc with a cast hub.

The spinner disc shall be 24" in diameter and manufactured of polyurethane with six fins.

There shall be HD top grates, one piece bolt in lift out design.

7" x 4.5" x 1/4" support angles shall rest on top rail and bolt to the board pockets of the dump body.

Front and rear support beams are 4" x 2" x 1/4" wall tube bolted to the support angles and span the width of the body.

Center beam is 3 1/2" schedule 80 pipe mounted on top of the support beams and spans the length of the body.

Two lift loops are welded to the center beam.

Screen sections are constructed of 3/8" rod welded to form a 2.5" square mesh pattern.

Screen perimeter is fabricated of 1/4" x 1-1/2" flat steel and 2" angle iron with edge supports reinforced with 1/4" x 1" flat bar.

Each screen section shall be secured to the tubular center beam with non-freeze hinges.

Entire screen assembly shall be shot blasted and powder coated black.

Hoist:

The hoist shall be of a telescopic design and have a trunion mounting.
The hoist shall be NTEA class 80 with 25 ton capacity for tandem axle, class 60 with 16 ton capacity for single axle.

The hoist shall operate up to 2,500 PSI, and shall be self-bleeding.

The cylinder shall be double acting in all stages.

The trunion collar shall be oscillating.

Each rod or pin eye shall have a grease zerk.

All cylinder surfaces shall be nitride finish.

Two body safety props shall be provided and installed.
The hoist hinge shall have 2" stainless steel pins that are removable.
Hoist hinge shall incorporate greasable composite bushings.

Body Finish:

The body shall be provided with a bare stainless steel finish.
The body shall pass through a phosphate wash, clear water rinse and shall then be oven dried.
Non-stainless components of the body and hoist package shall have a baked on powder coat black finish.

Miscellaneous:

Heavy-duty rubber mud flaps mounted behind rear tires.
Heavy-duty rubber mud flaps with retainers ahead of rear wheels.

Front Plow and Hitch

Truck Portion Plow Hitch:

A truck portion snow plow hitch shall be provided and installed.
Coupling device must be of the quick attach and detach design.
Hitch receiver box is fabricated from 1/2" thick steel.
Hitch must incorporate a drop pin locking mechanism.
Drop pin shall be 2 1/2" diameter 1018 solid rod.
Drop pin lever is fabricated from 1/2" x 1.5" bar stock.
Lever must be able to be locked into both the open and closed position with a pin and keeper.
Hitch is to be a bumper to frame design.
Hitch shall be of a non-tilt design.
Hitch shall have full backing plate 35" x 36.5" of 5/8" steel plate.
Hitch uprights shall be 1/2" x 6" hot rolled plate and are welded to the backing plate and receiver box.
Uprights shall be gusseted to the backing plate with four 5" x 5" x 1/2" triangular gussets.
There shall be a 6" x 4" x 1/2" angle welded between the uprights and at the top of the backing plate.
There shall be two greaseable bushings of 3.25" diameter .344 wall tube that will support the lift arm pivot pin.
One bushing shall be in the right upright and one in a 1/2" plate mounting ear that is welded to the upper angle.
Two 1/2" plate cylinder mount ears shall be welded and gusseted to the backer backer plate.
The hitch lift arm shall be offset design.
Lift arm shall consist of two 3/4" x 4" side plates and 4" square 3/8" wall lift arm tube.

Plates and tube will be joined with two 3.25" diameter .344 wall tubes, one tube will house the lift arm pivot pin.
The lift arm will attach to the hitch uprights with a 2" solid round pin.
The inner lift arm extension tube shall be 3" square 3/8" wall square tube and will be retained with a 1" zinc plated pin.
Extension will have a 3.5" x 1" thick plate ear mounting plate.
A 4" x 10" double acting lift cylinder shall be provided.
Lift cylinder rod shall be 2" diameter and nitrided.

Lift arm shall be designed to fold flat against the hitch when not in use.
Folding shall be accomplished without the use of tools.

Plow hitch shall include 1/2" thick steel cheekplate push reinforcement.
Hitch shall be powder coat black.

Torsion trip spring cutting edge plow:

Moldboard to be "C" style and constructed of 10 gauge A569 steel.
Moldboard to have a mailbox cutout

Moldboard is to be 44" in height with and 8" cutting edge 12' in length.
Moldboard to include integral shield.
Top moldboard angle is 2" x 3" x 3/8" A36 steel.
Moldboard is adjustable pitch with attack angles of 20, 10, and 5 degrees.
Minimum six flame cut 1/2" vertical support ribs equally spaced .
The ribs are to taper from 4" at the bottom angle to 2" at the top angle.
Ribs must be notched at the top angle to allow water to drain.

Ribs have 1" bearing surface where push frame attaches to moldboard.
Two moldboard horizontal supports are to be 3" x 3" x 1/2" angle where support arms attach.

Three additional horizontal moldboard supports are 3" x 3" x 1/4".
Bottom moldboard angle shall be 3/4" x 4" x 4" A36 steel.
Bottom angle to have 1" thick trip hinge blocks welded to the angle.
Bottom angle boxed to moldboard with 4" x 1/4" steel plate between ribs.
The trip section angle assembly shall be 3/4" x 4" x 4" A36 steel.
Trip angle to have 1" thick trip hinge block welded to the angle.
Trip angle to have square bar stock welded to top front to function as zero tolerance cutting edge stops.

Trip angles shall pivot on a piece of 1-1/4" cold rolled 1040 steel.
Six torsion springs, 3/4" square wire of 4140 material.
Springs have a diameter of 3-3/4" OD, 2 1/4" ID.

Each trip spring rotates on individual 1 1/4" hinge rod.
Trip springs individually removable without use of special tools.
Trip springs can be replaced without being under tension load.
Three section 5/8" x 8" x 4' top punch cutting edge, 1084 carbon.
The push frame shall be heavy duty tubular design.
The semi-circle of the plow is fabricated from 5" x 3/8" square tube.
Boxed, 1/2" positive stops set to allow 35 degree swing of moldboard.
Cylinder attachment plates of 1/2" steel.
Two 4" bore double acting cylinders.
2" diameter nitrated rod and pin eyes to accept 1 1/4" pins.
Cylinder ports to accept O-ring hydraulic fittings.
Abrasion resistant, 3000 psi 1/2" hydraulic hoses with couplers.
30 GPM double relief cushion valve set at 1,800 PSI.
Cushion valve to be mounted on truck hitch to mate existing fleet.
The push tube shall be 5" x 5" x 3/8" A36 steel, minimum of 84" long.
Eight 1" moldboard attaching ears with triangular 1/2" gussets.
Two jack support channels to mate Sno-Wheels.
The A-frame shall have upper and lower flame cut 5/8" and 1/2" plates.
The A-frame shall have four 4" x 2" x 1/4" tubes reinforced by 5/8" plate and 1/2" plate gussets.
A-frame shall have 1" x 6" hitch push/oscillating plate.
The "A" frame shall encapsulate the push frame semi-circle.
Push frame pivot pin must be Greaseable with 1 1/2" diameter grade 8 pin.

Two moldboard stabilizer arms constructed of 1-1/4" schedule 80 pipe.
Stabilizer arms shall be kept in place with 1" stress proof pins.

Plow hitch attachment shall be 2" thick round stock that forms a loop.
Plow hitch must mate existing City fleet.
All hardware and fasteners are plated and corrosion resistant.
Plow shall include two lift chains attached to push frame.
All fasteners shall be grade 8, both cap-screw and nut.
Plow shall include a 12" rubber snow deflector with steel retainer strap bolted to top angle of moldboard.
Plow shall include a removable screw adjustable parking jack.
Wheel mounting brackets of 1/2" steel plate to accommodate both Monroe Style caster wheels and Sno-Wheel brand caster wheels.
Plow shall include one pair of Sno-Wheel brand caster wheels.
Plow shall include plastic blade markers.
100% welded construction throughout.
The entire plow assembly shall be shot blasted to remove scale, rust, etc.
Plow shall be powder coat paint finish.
Powder coat shall be electrostatically applied in excess of 3 mils thick.

Powder coat shall be oven cured for minimum 25 minutes at 400 degrees.

Powder coat shall be TGIC polyester, mold board Omaha orange, push frame black.

Front Mount Patrol Wing

General:

Double function design, heel and toe operate independently.

All welds to be 100% continuous welds.

Wing shall be mounted so that it will fold closely to the truck and will provide sufficient tire clearance for turning left and right.

Moldboard:

32" high x 107" long straight moldboard.

3/16" moldboard sheet.

Open back design, box formed moldboards not acceptable.

2 1/2" X 1" formed top channel.

7 vertical 1/2" thick one piece tapered ribs, 4" bottom and 2.5" top.

The three push arm mounting angles will be 4" x 4" x 1/4" angle iron welded horizontally between the ribs.

4" x 4" x 3/4" structural bottom angle, 1" hinge blocks welded to angle.

4" x 4" x 3/4" structural trip angle, 1" hinge blocks welded to angle.

Trip angle reinforced with 3"x 3" x 1/2" gussets between each bolt hole.

Trip angle will be two sections; one 4' and one 5' section.

Trip angles shall pivot on a piece of 1-1/4" cold rolled 1040 steel.

Four torsion springs, 3/4" square wire of 4140 material.

Springs have a diameter of 3-3/4" OD, 2 1/4" ID.

Each trip spring rotates on individual 1 1/4" hinge rod.

Trip springs individually removable without use of special tools.

Trip springs can be replaced without being under tension load.

5/8" x 8" x 9' top punch 1084 cutting edge; two section, one 4' and one 5'.

Wing moldboard shall bolt to mounting block with 1-1/2" bolt.

The wing shall be operated by hydraulic lift. No cables or chains.

4" ID x 10" stroke, nitrided rod, double-acting, heel cylinder.

Heel cylinder to have combination lock/relief valve.

Heel cylinder is pinned to moldboard's mechanical float linkage.

36" fluorescent flexible marker at wing heel.

Front Post Assembly:

Shall allow the toe of the wing moldboard to float freely over rough roads and road shoulders, thus reducing potential damage to the wing and cab/chassis.

The wing shall be direct hydraulic lift. No cables or chains accepted.

Wing post shall be of a trailing link and parallel arm design.

Post design allows moldboard to float up a minimum of fourteen inches when in the plowing position.

The post front structure shall be no more than 28" high and 14" wide.

The front post shall be manufactured with 3/4" and 1/2" plate steel.

The upper and lower link arms shall be 3/4" radius bar and shall be reinforced with a 2 1/2" schedule 80 pipe.

Link arms shall have hardened bushings at all pivot points.

The lift/float link will be 1/2" bar reinforced with 2 1/2" schedule 80 pipe.

The rear of the lift link will be reinforced with 5/8" and 1" plate.

The rear lift weldment shall have an outer 1" and inner 1/2" bars.

Hinge pins shall be 1.500" OD, case hardened to Rc 55-60 and include grease zerks in ends of pins.

Lift cylinder shall be 3" ID x 10" stroke with a 2.000" nitrated rod.

Wing lock to be incorporated into hydraulic cylinder to prevent drift.

36" fluorescent markers.

Push arm:

Single rear heavy duty push arm; adjustable length.

3.5" round outer tube with 1/4" wall; 2 7/8" solid rod inner.

Spring cushioned with safety shear pin.

Rear Mount:

Single push arm rear mount; under frame mounted.

Two 1/2" steel side plates bolted to chassis frame.

4" x 6" x 1/2" wall structural cross tube extended through side plates.

Minimum 3" x 4" x 1/2" thick mounting ears for push arm.

Cross tube will be braced to the chassis frame with a heavy duty pipe brace with cast iron balls and grade 8 bolts.

Heavy duty rear wing stop shall be fabricated at the rear push arm mount area to create a positive stop for the rear push arm.

The stop shall be located so that the wing moldboard can be folded closely to the truck cab but not contact the cab or mirrors.

The stop shall be fabricated from minimum 1/2" plate steel and be adequately braced to withstand the constant rigors of wing operation.

Preparation and Paint:

The entire wing assembly shall be shot blasted to remove scale, rust, etc.

The wing shall then pass through alkaline wash, clear water rinse, phosphate wash, clear water rinse and shall then be oven dried.

The wing shall then be pre-heated to minimum 100 degrees Fahrenheit.

Powder coat shall be electro statically applied in excess of 3 mils thick.

Powder coat shall be oven cured for minimum 25 minutes at 400 degrees.

Powder coat shall be TGIC polyester, moldboard Omaha orange, post, mount, push arm, and hardware black.

Miscellaneous:

Wing side front Timbren load booster kit installed.

36" Marker and steel loop on front post assembly for height indicator.

36" orange marker on heel of wing moldboard.

Cable kit on wing pusharm to prevent tubes from separating.

Hydraulics and Control System

Hydraulic Pump and PTO:

Hydraulic pump shall be an axial piston pressure and flow compensated load-sensing type.

The pump shall have a displacement of 5.61 cubic inches per revolution at maximum stroke which will deliver 23.7 GPM @ 1000 engine RPM.

The pump shall have a minimum 2" inch suction line and 1/2" control drain line plumbed directly back to the reservoir.

The pumps compensator shall have rear facing adjustments.

Pump shall be rated for 5800 PSI maximum and 4800 PSI continuous.

Pump shall have a Din type-mounting flange and a Din 5462 8-tooth shaft.

The pump shall be Force America TXV92 or prior approved equal.

An OMFB series constant mesh PTO that is mounted to the transmission shall drive the pump.

Hydraulic Control Valve:

The hydraulic valve shall be of modular manifold design.

Each hydraulic function requires an individual manifold stacked together to form the manifold base.

The manifold base shall consist of an inlet section with SAE #16 inlet porting, SAE #20 outlet porting, and SAE #4 load sense porting.

There shall be a main system relief in the inlet section to protect the system from high pressure in case the pump compensators fail.

The dump body manifold shall be stacked next to the inlet section, and capable of 40 GPM with SAE #12 porting.

The hydraulic control valves shall be pulse-width modulated, proportionally controlled.

Each hydraulic valve segment shall be individually mounted to the manifold base assembly and be serviceable without removing any hydraulic hoses or any other hydraulic valve segments.

Each hydraulic valve segment shall have individual pressure compensation to achieve independent simultaneous operations.

All segments shall have heavy-duty continuous duty coils and connections shall be with Din connectors.

Coils shall operate at 12 VDC and require a maximum of 1400 milliamperes.

Each segment shall be equipped with a manual override except for the auger, liquid, and spinner sections.

The dump body segment shall be rated to 40 GPM, with all other segments rated to 20 GPM.

The dump body segment shall be equipped with a down side relief to protect the body down function.

This relief shall be set to the hoist manufacturer's specifications.

Valve segments shall be Force America Add-A-Fold® 4520 model or prior approved equal.

The valve is to be arranged as follows:

- Hoist: 4-way with 500 PSI down side work port relief valve
- Plow lift: 4-way
- Plow angle: 4-way
- Wing toe: 4-way with 500 PSI B-port relief
- Wing heel: 4-way with 500 PSI B-port relief
- Auger: 2 way
- Spinner: 2-way
- Liquid: 2-way

Oil Reservoir/Valve Enclosure:

201 stainless steel construction throughout.

Combination oil tank and valve enclosure.

The valve assembly shall be mounted in weather-tight compartment.

The oil reservoir shall be minimum 35 gallon capacity with internal baffles and mounted on the side of the chassis frame and shall include a basket type filler breather cap, magnetic drain plug, 2" NPT suction port with screen filter, and an external sight temperature gauge.

An in tank 10-micron return line filter with condition gauge shall be mounted in the reservoir.

There shall be a separate return line port for the pump control drain line.

Hot oil, low oil and body up lights will display in spreader control.

Tank/Enclosure shall be of 10 gauge stainless steel construction.

The enclosure shall have integrated mounting brackets for attaching directly to the side of the truck frame.

Enclosure shall be designed to overlap so that road spray will not enter but not allow humidity to be trapped inside.

Valve shall be mounted with all ports coming out the bottom and holes allowing for hose adapter fitting.

The cover shall be held to the enclosure by four heavy rubber latches.

Hydraulic and Spreader Controls:

Controls for all valve functions and electronic spreader control will be integrated into a single, self-contained control center.

The control center shall be a padded armrest style that is ergonomically designed.

Control center shall be modular in design for ease of installation and service, and wiring and connectors shall be keyed and color-coded throughout.

All components must be durable for long life and trouble free operation.

Joystick shall communicate through a Can Buss communication system.

Joystick must have proportional control of hydraulic functions.

Joystick must be a single proportional joystick with X, Y, and option for Z axis movement.

Joystick must have three safety interlock zones activated by capacitive sensors.

Joystick must remain on until hand placement on the controller grip (interlock zone) is released.

All interlock zones must be programmable to control specific functions such as plow, wing plow, and hoist.

Joystick shall have side cluster switches to control spreader standby, application rate, spinner speed, and blast on/off functions.

Joystick face includes five backlit, colored, programmable control switches.

The electronic spreader control shall be designed for precise, closed-loop control of granular and prewet liquid applications and operate on a CAN Bus protocol.

The Central Processing Unit (CPU) shall have keyed and color coded connections to prevent incorrect installation.

CPU shall be mounted in the cab with visual access to diagnostic LEDs.

Mounting of the CPU unit outside of the cab is unacceptable.

The unit shall have USB connectivity for file and data transfer, Ethernet connection, a J1939 communication port for connection to the vehicle bus, a second CAN bus communication port for spreader-only data use, a J1708 for AVL communication.

The CPU shall have on-board diagnostics, which provide real-time status of CAN bus communication, processor activity, and power

status.

The CPU shall have a built-in audible alarm for diagnostic purposes.

The CPU operating system shall NOT be Windows-based.

The spreader control interface shall have two, color-coded, continuous rotation encoders for granular and spinner control.

Encoders shall have integrated push buttons for blast mode and stand-by.

The controller shall have a third multifunction 4-way joystick that has an integrated rotary encoder and push button, that can be used for menu navigation, prewet liquid control, or an additional conveyor function.

There shall be four, two-way soft keys included in the interface that are generically-labeled and user-configurable for different functions depending on the equipment needs.

The controller shall also utilize iButton technology that is capable of using a Supervisor key to provide access to the calibration parameters without the access code.

The entire operator interface shall be backlit and encased in flexible silicone material with wear-limiting coating applied to the base silicone material.

The operator interface shall communicate on the spreader control system CAN bus.

The spreader control display shall be a remotely-mounted, 7" diagonal color TFT LCD, with a low-profile 16:9 widescreen format and minimum of 800X480 pixel resolution.

LCD shall have variable LED backlighting.

CCFL backlighting is unacceptable.

The display shall include a scratch-resistant polycarbonate lens with anti-glare coating.

A power status LED shall be immediately visible on the front of the display and shall report display diagnostics including loss of CAN communication.

Display unit shall have a built-in audible alarm.

To avoid driver distraction, the display shall have no integrated dials or pushbuttons and shall not be touch screen.

LCD shall communicate on the spreader control system CAN bus.

The operator menus shall be color-coded to match the encoder knobs on the operator interface.

The display shall be capable of displaying the following on-screen simultaneously: Granular material name, granular material set point and actual application rate including units of measure, prewet liquid name, prewet liquid set point and actual application rate including units of measure, spread width, road temperature, air temperature, material usage total, liquid usage total, vehicle speed, and current date and time.

The operator shall have the option of selecting five data items to be displayed onscreen during operation.

The display will also provide four warning light indicators for low oil level, body up, oil temp, and filter bypass.

These warning lights are to be functional regardless of spreader operation or status.

A proportional PWM driver and input module (Valve Module) shall be remotely-mounted inside the hydraulic valve enclosure for control of both spreader control and joystick control outputs.

The entire Valve Module shall be of rugged design for the mobile environment, and must meet IP68 requirements for dust and water ingress.

The Valve Module shall include a minimum of eight proportional PWM outputs with potted valve output connections.

All outputs shall be protected against short-circuits.

Outputs will be current-compensated and have adjustable PWM frequency.

There shall be a minimum of five switch-to-ground type inputs for monitoring hydraulic system inputs such as oil level, body up, Hi and Low filter bypass, and oil temperature warnings.

A minimum of two switch-to-ground type pulse train inputs shall be included in the Valve Module for connection of feedback sensors such as auger feedback and prewet liquid flowmeter feedback.

A keyed and color-coded connection shall be provided for CAN bus connection to the CPU module inside the cab.

A second CAN bus connection must be provided for daisy-chaining of multiple Valve Modules within the valve enclosure.

Diagnostic LED's shall be included for every input and output on the Valve Module, as well as a power status LED and CAN bus activity LED's.

The Valve Module shall be potted.

The Valve Module shall include a stainless steel legend plate with engraved text for easy cleaning and identification of Valve Module connections.

The integrated spreader control and joystick control system shall be equipped with a qualified ESTOP device that immediately disconnects battery power from all outputs.

All spreader control and joystick-operated outputs shall immediately cease to function and the system display shall inform the operator that the ESTOP device has been activated.

The ESTOP device must remove power from all output devices, while maintaining power to the display and CPU for diagnostic purposes.

Resetting of the ESTOP device shall not result in spreader control and joystick-operated outputs returning to an ON state without operator acknowledgement.

The Control Center shall be a Monroe / Force America I-Grip 6100.

Hoses and Fittings:

A low oil shutdown valve shall be mounted directly to the output of the pump and will automatically shut down via low-level sensor in hydraulic oil tank in order to minimize the possibility of pump damage due to lack of oil.

In-Cab Momentary switch for bypass of auto-shutdown shall be provided to facilitate movement of disabled equipment by service personnel.

Hoses must be sized accordingly to provide optimum performance of all hydraulic equipment. JIC and ORB fittings required.

All quick couplers for plow, wing & spreader system must have dust caps for protection.

Quick couplers for plow angle, wing heel, and spinner.

30 gallon crossover relief valve for front plow angle circuit.

Liquid Prewet System

System capable of dispensing measured amounts of calcium chloride, salt brine and / or other chemicals used in snow and ice control.

Components must be non-ferrous, austenitic and / or corrosion resistant.

System supplied shall be complete with pump, pump control, nozzles, hoses, tank fittings, wiring and mounting hardware as required.

A hydraulically driven positive displacement bronze gear pump.

Gear pump will have a rated flow of 4 GPM.

Pump is direct coupled a hydraulic motor.

Pump will have a stainless steel shaft, with carbon graphite bearings.

A flow meter for closed loop control mounted inside the pump enclosure.

The pump shall be mounted in a NEMA fiberglass enclosure.

The enclosure shall be mounted near liquid tanks and be easily accessible.

Enclosure will not hinder normal spreader maintenance or operation.

Enclosure will protect the pump, motor assembly, and flow meter.

Electrical connections and wiring shall be hard wired within enclosure.

Wire harnesses will incorporate weather pak connectors.

Hydraulic connections with stainless steel tubing from motor to bulkhead style JIC connectors outside of the enclosure.

Liquid connections shall be made via threaded couplings and barbed fittings integral with the enclosure.

Two fender mounted 75 gallon capacity tanks with internal baffles.

Tanks shall have one 5" fill lid located on top front of tank.

Tanks shall be constructed of a rotationally molded and UV stabilized polypropylene material. (natural color)

Tanks will have a minimum .350" wall thickness.

The tank shall have (4) 1-1/4" molded threaded ports.

The threaded ports shall be located as close to the bottom as possible.

Tanks will be cross linked with 1 1/2" hose.

Each tank will include a vent.

Tank shall be complete with necessary stainless steel mounting hardware including tank pans of 201 stainless steel.

(3) 2 gpm brass spray nozzles shall be located in the spinner disc area.

A 5-PSI check valve shall be installed as close to the nozzles as possible to prevent siphoning of the liquid chemical.

Nozzle kit shall include a cam lock coupler to allow nozzles to be easily removed with the spinner.

Plumbing components shall be constructed of heavy-duty glass reinforced polypropylene or brass, except check valves.

The hose for the suction line to the pump shall be 3/4" EPDM.

All pressure hoses shall be 1/2" EPDM.

A 3/4" suction filter with 304 stainless steel screen shall be installed.

A two inch bulk fill with cam lock fittings and a two inch shut off valve shall be located in a convenient location for bulk filling the reservoirs.

A tank crossover kit consisting of 1/12" hose shall link the tanks.

A three way valve and suction hose shall be act as an on board flush system.

Miscellaneous

Lighting and Electrical:

All wiring is soldered, heat shrunk and in protective loom.

Junction box must be mounted to crossmember at rear easily accessible.

All FMVSS 108 lighting to be L.E.D.

Stop/turn/tail lights mounted in box.

Backup lights mounted in box.

FS Target Tech Light Package.

-Target Tech L.E.D. Self-contained rear strobes – model 607101

-Target Tech 360 degree amber strobe – model 651

-Target Tech wire branch guard

-North American self-leveling bracket

-L.E.D. Stop/Turn/Tail lights in rear corner posts

Hella plow lights with directional signals mounted to plow hitch with custom receiver tube mounting brackets.

Bid Form
314-PW-027

Please submit pricing for any or all vehicles as outlined:

	Quantity	Unit Price	Total Price
Items			
Single Axle Dump Trucks	2	\$ _____	\$ _____
Tandem Axle Dump Trucks	2	\$ _____	\$ _____
14' x 12 yard Dump Trucks	2	\$ _____	\$ _____
Total			\$ _____

Option Price:

Combination Prewet/Anti-Ice System

- Dual 150 gallon fender mounted tanks in lieu of 75 gallon tanks
- 23 gpm liquid pump in lieu of 4 gpm liquid pump
- Add liquid selector valve and in cab switch to select between prewet and anti-ice
- Add stainless steel single lane spray bar with adjustable streamer nozzles
- Spray bar must be easily removable without the use of tools

\$ _____

Person, Firm or Corporation

Authorized Signature and Title