



CONTRACT DATA SHEET

Monroe County Division of Purchasing
200 County Office Building, Rochester NY 14614

TITLE: ELECTRIC MOTOR REPAIR

PUBLIC BID #: **BP#0405-16**
SAP CONTRACT 4700007346

CONTRACT DATES: 05/23/2016-05/31/2017

BUYER: **Greg Hart**
PHONE: 585-753-1135
FAX: 585-324-1379

VENDOR: SAP V#108067
K. J. ELECTRIC
54 PIXLEY INDUSTRIAL PKWY.
ROCHESTER, NY 14624
PHONE: 315-454-5535
FAX: 315-454-5564
Mary Quartieri or John Preston

Greg Hart
Buyer

XC: BP FILE
BUYER
VENDOR
S. WILCOX

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TERMS AND CONDITIONS

BID ITEM: ELECTRIC MOTOR REPAIR

FOR: DEPARTMENT OF ENVIRONMENTAL SERVICES (DES)

BUYER CONTACT: The Buyer, identified below, is the sole point of contact regarding this Bid from the date of issuance until the bids are opened and the results made public.
Gregory Hart
Monroe County Division of Purchasing
200 County Office Building
39 West Main Street
Rochester, NY 14614
ghart@monroecounty.gov

All requests for bid clarification must be submitted in writing to the Buyer referenced above and received no later than close of business (5:00 PM Eastern Standard Time) on April 18, 2016.

All questions will be answered and documented in writing as an Addendum to the Bid. These will be sent out to all Bidders who received the original Bid no later than April 21, 2016.

DUPLICATE COPIES: **PLEASE SUBMIT YOUR BID IN DUPLICATE; THE ORIGINAL AND ONE (1) COPY.**

BID INFORMATION: At the time of bid, the bidder shall supply detailed specifications covering the item(s) contained herein and shall clearly indicate any areas in which item or items offered do not fully comply with the specifications contained herein.

SUBMITTAL OF FORMAL PROPOSAL: Bid proposal must be legible and submitted in the original form, bearing an original signature. **EMAILS AND FACSIMILES ARE NOT ACCEPTABLE.**

All bidders must submit proof that they have obtained the required **Workers' Compensation and Disability Benefits Insurance** coverage or PROOF that they are exempt. Visit (www.wcb.ny.gov for forms.).

SPECIFICATION ALTERATIONS: Specifications will be construed to be complete and be considered the entire description of the goods or services upon which Monroe County is now seeking bids. **Only formal written addenda can materially alter this set of specifications.** No verbal statement made by a Monroe County employee or anyone else is binding nor shall such statement be considered an official part of this public bid proposal.

WAGE RATES: Contractor agrees to comply with the provisions of the New York State Labor Law relating to the payment of prevailing wage rates to the extent that such rules may be applicable to the Contractor. Wage rates may be obtained at www.labor.state.ny.us.

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QUANTITIES:

The quantities listed on the unit price sheet are the **estimated total requirements**. These estimates should not be construed to represent guaranteed maximum or minimum quantities to be purchased during the contract period. All unit prices bid will be extended for the actual number of units serviced.

QUALIFIED BIDDER:

Each bidder must be prepared to present satisfactory proof of his capacity and ability to perform this contract. Such proof may include, but is not limited to an inspection of the bidder's facilities and equipment, financial statements, references and performance of similar contracts. **The Purchasing Manager reserves the right to reject any bid where the bidder cannot satisfy the County as to their ability to perform. Monroe County reserves the right to reject any and all bids** if the Monroe County Purchasing Manager deems said action to be in the best interest of Monroe County.

METHOD OF AWARD:

Monroe County intends to award the bid to the lowest responsive and responsible bidder, based on the **TOTAL. Bidder must bid on all items in order to be considered. The County reserves the right to reject any and all bids** if the Purchasing Manager deems said action to be in the best interest of the County.

CONTRACT TERM:

Contract will start with the date of the contract award and run through May 31, 2017 with the option to renew the contract up to four (4) additional twelve (12) month periods at the mutual consent of both parties.

PRICE CHANGES:

Price changes may be proposed by either party no later than forty-five (45) days prior to contract extension, based upon manufacturer price changes which must be supported with documentation. Should price changes not be acceptable to both parties, the contract will not be extended. Prices may change only at the time of extension

MINIMUM ORDER:

No minimum order is specified for this contract. Agencies must be able to order as needed. **Political subdivisions and others authorized by law may participate in this contract.**

DELIVERY:

All deliveries to be F.O.B. Monroe County to agency as specified by a Purchase Order. Delivery costs must be built into the unit prices bid. Deliveries must be made within **two (2) weeks** after receipt of purchase order number. The County reserves the right to terminate the contract in the event the specified delivery time is not met.

**PURCHASE ORDER
ISSUANCE:**

No work shall proceed against nor shall any items be delivered against this contract until the Contractor has received a purchase order or a purchase order number. **Items supplied or services rendered that are not part of this contract will not be paid for by Monroe County.**

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MATERIAL COSTS:

Materials that must be purchased for any additional work, if needed, shall be itemized on each invoice and billed at **five percent (5%)** above the Contractor's cost. Each item must include the full description including manufacturer, stock number and unit price as well as a copy of the invoice paid. The County will reimburse the Contractor for incoming freight charges for additional items needed for the repairs. The County reserves the right to audit the Contractor's records to determine that the County is being charged no more than **five percent (5%)** over the Contractor's cost.

BILLING PROCEDURE:

All invoices for items sold any authorized agency as a result of this contract must be billed in the following manner: Purchase Order #, Quantity, Description of Item Purchased, Stock or Catalog #, List Price, Discount, Extension and Total. **ALL INVOICES MUST BE MARKED WITH THE PURCHASE ORDER NUMBER. INVOICES WITHOUT THIS INFORMATION WILL NOT BE PROCESSED FOR PAYMENT.**

WARRANTY/GUARANTEE:

All warranties by manufacturer shall apply. Bidder shall, as part of its proposal, furnish its warranty/guarantee for all goods/services to be furnished hereunder. As a minimum, Bidder shall warrant all goods for a period of **two (2) years** from date of acceptance. Bidder shall be obligated to repair or replace all defects in material or workmanship which are discovered or exist during said period. All labor, parts and transportation shall be at Bidder's expense.

SECURITIES AND INSURANCE:

Any Certificate of Insurance, Bonds or other forms of security if required by this bid are to be submitted to the Purchasing Manager no later than ten (10) normal business days following the date of notification of award. Documents must be received by the close of business, 5:00 PM on that day.

UNCONTEMPLATED PURCHASES:

Monroe County reserves the right to request separate bids for such quantities of items on this contract that may be best procured via separate public bid offering and to otherwise act in furthering its own best interests.

COMPLIANCE WITH THE LAW:

The Contractor agrees to procure all necessary licenses and permits. The Contractor shall comply with all laws, rules and regulations pertaining to the payment of wages and all other matters applicable to the work performed under this contract.

SUBCONTRACT:

The Contractor shall not subcontract any work without first obtaining the written consent of the Purchasing Manager of Monroe County.

RELATED ITEMS:

The County reserves the right to add related items to this contract during the contract term upon agreement by both parties as to the price. Approval must be given in writing by the Purchasing Manager or her Designee.

REPORT OF PURCHASE:

The Contractor must, upon request, provide the County purchasing Manager with detailed information showing how much of each item was delivered to any and all agencies under this contract. This includes deliveries to not only the County but any other municipality or agency which orders from this contract.

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OTHER AGENCIES:

The Contractor(s) **must** honor the prices, terms and conditions of this contract with political subdivisions or districts located in whole or in part within Monroe County. In addition, the contractor **may**, but is not required to, extend the prices, terms and conditions of this contract to any political subdivision or district located in New York State. Usage of this contract by any of these other political subdivisions or districts will have to be coordinated between that subdivision or district and the contractor. Orders placed against this contract between any subdivision or district will be contracts solely between the Contractor(s) and those entities. Monroe County will not be responsible for, nor will it have any liability or other obligation for, such contract between the Contractor(s) and any third party.

INDEMNIFICATION:

The Contractor agrees to defend, indemnify and save harmless the County, its officers, agents, servants and employees from and against any and all liability, damages, costs or expenses, causes of action, suits, judgments, losses and claims of every name not described, including attorneys' fees and disbursements, brought against the County which may arise, be sustained or occasioned directly or indirectly by any person, firm or corporation arising out of or resulting from the performance of the services by the Contractor, arising from any act, omission or negligence of the Contractor, its agents and employees or arising from any breach or default by the Contractor under this Agreement. Nothing herein is intended to relieve the County from its own negligence or misfeasance or to assume any such liability for the County by the Contractor.

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ELECTRIC MOTOR REPAIR SPECIFICATIONS

SECTION 1: MOTOR REPAIR

I. GENERAL:

A. Scope:

The Monroe County Department of Environmental Services (DES) is seeking a qualified electrical motor shop to repair electrical motors in the fractional to 500 H.P. range.

B. Locations:

Various locations throughout Monroe County.

C. Experience:

All Bidders shall submit with their bid a description of their firm as it pertains to the repair, service, and testing of electric motors.

II. QUALITY ASSURANCE:

A. Applicable Codes, Standards and References:

1. American National Standards Institute (ANSI).
2. Institute of Electrical and Electronic Engineers (IEEE).
3. National Electrical Manufacturers Association (NEMA).
4. Anti-Friction Bearing Manufacturers Association (AFBMA).
5. Electrical Apparatus Service Association (EASA).
6. International Electrical Testing Association (NETA).

B. Standard Products:

All replacement materials retrofit equipment and accessories shall be new. Remanufactured equipment may be acceptable in some cases but only with the approval of the County. Parts shall be the standard products of a manufacturer regularly engaged in the production of such material or equipment.

C. Quality Standards:

1. The successful bidder shall submit to the County the applicable Quality Assurance (QA) and Quality Control (QC) policies and associated procedures.
2. The successful bidder shall comply with all current applicable codes and standards, including but not limited to those referenced in this specification.

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III. EQUIPMENT AND BID INFORMATION:

A. Price Quotes:

Upon receiving a motor from the County, the shop shall tear it down for evaluation. The shop shall then quote a price for parts and labor to repair the motor in accordance with these specifications.

The County will make a determination based on the shop's quote. The vendor will then be contacted and told whether to proceed with the repair, return the motor (disassembled) to the County or to scrap the motor.

Under no circumstances will the shop proceed with the repair before receipt of a Purchase Order number.

IV. MATERIALS AND REPLACEMENT PARTS REIMBURSEMENT:

It is expected that for routine jobs the contract vendor will use materials from their own stock. The contractor shall not be required to submit individual invoices for such material but is expected to maintain supporting documentation for these material charges.

When material or replacement parts are required for a particular job, which **are not** standard stock materials or currently out of stock and required for the job, the contractor must submit a copy of their invoice showing the amount paid. The County will reimburse the contractor five percent 5% above cost, including freight for these items.

The County reserves the right to conduct an audit or to request documentary evidence to substantiate any prices billed for materials. The County may elect to provide materials from County supply contracts. The bidder shall maintain timely records of all materials furnished by the County or the bidder and installed as part of the work order. The County will not reimburse the contractor for any sales tax.

V. WORK TO BE PERFORMED:

A. The motor repair work outlined in this section is for the motors listed on the Unit Price Sheet and for other motors of similar size, type and make that may need repair. The description is general only and shall not be construed as a complete listing of every item of work which may be required.

1. Pick up via your truck. No charge will be made for motor pick-up or delivery.
2. If the motor is shipped with coupling on the shaft, the coupling locations shall be marked before it is removed. The coupling must be replaced in the same exact position when balancing the rotor and before returning the motor.

Steps 3 thru 16 are for motors requiring a general reconditioning but not a rewind:

3. Bake all windings at 275 degrees F in a temperature-controlled oven to infinity ground.
4. Perform complete electrical tests on stator and rotor winding. Tests to be conducted at double the rated winding voltage plus 1,000 volts (NEMA standard).

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Perform the following tests: Insulation resistance, dielectric absorption, polarization index (10:1 minute ratio), DC over-potential and phase balance (low voltage). Surge comparison is to be run before and after the shop test run on rewind and before dismantling on non-rewinds. Core loss test shall be run before and after the stator burnoff. Record all values and include them in final report to the County.

5. Inspect stator and rotor core for any loose or damaged lamination, rotor pullover or loose or damaged supports. Cast and Brazed rotors: Rotors shall be cleaned & tested for open bars, and open braze joints as appropriate for their design. Testing shall include a core test utilizing a current source such as LEXSCO core tester or equivalent along with visual core flaw detector composed of a two-ply Mylar/iron filling articulating sheet. Should there be any areas of concern at brazed areas between rotor bars and their shoring rings, the rotor shall be preheated to 350°F then checked for cracks with dye penetrant and a developer. Any irregularities found must be discussed with the Monroe County representative.
6. If any looseness is found in Step #5, the component will have to be solvent cleaned, preheated to 150 degrees F and dipped in Class "H" epoxy resin varnish. Both stator and motor will be baked at 275 degrees F for a minimum of twelve (12) hours.
7. If no problems are found in Step #5, then both the stator and rotor are to be heated to 150 degrees F and may be sprayed with Class "H" epoxy resin varnish. Both stator and rotor will be baked at 275 degrees F for a minimum of twelve (12) hours.
8. Rotor to be lathe mounted and shaft machined and polished to minimum runout. Scoring and grooving in the vicinity of the bearings and seals shall be repaired. Rotor bearing and seal journals are to be repaired using the following methods: A.) welding, grinding & polishing or B.) machining, hard chrome plating and polishing. The final journal dimension required for repaired journals will comply with the standard ABEC bearing tolerance charts for the bearing size required. **NOTE: Methods such as knurling, center punching and the use of resin fillers will not be acceptable methods of journal repair. Bearing journals will be micrometer checked.**
9. Check bearing housings using inside micrometers and compare against factory clearance limits. All rabbets and shaft paths to be checked for fit and distortion and repairs shall be made by cleaning-up/machining the endbell to accept (with an appropriate interference fit) an EZ Sleeve tubular insert (or equivalent product) followed by finish boring the sleeve insert's bore to the dimension required for the new bearing's OD as shown on standard ABEC bearing tolerance charts. **NOTE: Methods such as knurling, center punching and the use of resin fillers will not be acceptable methods of journal repair.**
10. For all motors of 25 H.P. or greater, mount shaft/rotor assembly in 5,000 lb. Stewart-Warner balancer or equal and dynamic balance to factory specifications or better. If the motor was shipped with a coupling half on the shaft, the coupling must be mounted on the exact same location before balancing.
11. Install new drive end and opposite end bearings with 200 or 300 series, C-3 fit ball bearings. The new bearings shall be sealed. Check bearing dimensions and mate bearings to bearing

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housings. The motor shall have a tag or plate affixed to it indicating that it has sealed bearings. The bearing grease shall be lubrication engineer's type 1275.

12. Replace connection box, cover and/or gasket if damaged or missing.
13. Replace connection box gasket.
14. Check fan blades for missing blades, damaged blades or any unacceptable imbalance.
15. The motor shall be painted G.E. blue-gray, USAi paint code #24.
16. The work on each motor must be completed and the motor returned within five (5) working days if no parts other than bearings are required.

If motor is known to require a rewind, then the following work instructions will apply: (Insert at Step #3 and omit Steps #3 thru 7 listed above).

17. Motor shall be rewound with United Technologies Essex MR 200 Magnet Wire or equivalent. This wire is for motor applications subject to moisture. It must have a dielectric strength at the rated temperature of 4275 volts minimum. The thermal class under U.L. listing MW-35C shall be 200 degrees centigrade.
18. Insulating materials will be class H.
19. The rotor shall be dipped in a class H epoxy resin such as Epoxylite Epoxy Resin made by Elantra PDG, w/E-478 Epoxy Resin made by ELANTAS PDG, INC. or a substitute product epoxy resin as approved by Monroe County. The stator shall be sealed against moisture by vacuum impregnation (V.P.I.) using Epoxylite Epoxy Resin made by Elantra PDG, w/E-478 Epoxy Resin made by ELANTAS PDG, INC. or a substitute product epoxy resin as approved by Monroe County. The stator and rotor shall be baked at 275 degrees F for a minimum of twelve (12) hours.
20. Bring out leads to ___* inch length without terminations.
21. When the stator is to be rewound, bring out the three leads for _____* volts only.

*** To be specified by the County at the time of repair.**

Special Instructions for "Explosion-Proof" Motors:

This motor operates in a Class I, Division I, Group D atmosphere. Your motor shop must be UL-approved to re-certify this motor for use in the explosive atmosphere described above.

The UL re-certification process is to include the installation of a new UL nameplate and the listing of this re-certification on the vendor's UL log book.

Be advised that this motor must have a "UL Rebuilt Motor" listing mark and must be rebuilt accordingly. The motor will need rewinding and new bearings.

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22. **No additional work will be authorized without the written consent of the County. Any such unauthorized work will result in forfeiture of payment. If you have any problems with the work you must contact the County "Contact" listed on the purchase order immediately.**
23. Contractor must give the County twenty-four (24) hours notice as to when the motor will be returned.
24. Return old parts to the County when requested.

VI. TESTING:

- A. Test run the motor in the Contractor's shop at full voltage and until it reaches operating temperature. Check voltage and current balance. Perform a complete vibrational analysis: Radial in two (2) perpendicular planes, two (2) points in each plane and one (1) axial point. Perform gear spike energy analysis on both bearings.
- B. Monroe County reserves the right to be present and to observe these tests, therefore, it will be necessary to notify the County twenty-four (24) hours in advance of any test run.
- C. Acceptance of the installation will occur after the motor has been installed, meggered and current and voltage reading taken under expected load.
- D. All test results shall be reported on forms as recommended by the National Electrical Testing Association, (NETA), The Electrical Apparatus Service Association (EASA) or forms that are parts of an (ISO) followed service program. The results shall be in the proper units for dimensions. The Contractor shall submit with his schedule a list of all tests to be performed by any independent testing firm or by the Contractor's staff.

VII. FINAL REPORT:

The Contractor shall be required to furnish a final report giving all the as-found and as-left test measurement values. The report must be reviewed and signed by the Contractor's engineer or shop foreman. All test results can be submitted to the owner by email in a PDF format, MS Word or MS Excel document.

The original copies of all as-built drawings, wiring diagrams, schematics, O & M manuals and literature furnished by the County, used by the Contractor to perform the work, must be returned to the County within ten (10) days of final acceptance.

VIII. WARRANTY:

All replacement parts and workmanship shall be warranted for two (2) years. The motor shop shall be prepared to provide evidence of strength supporting their capability to provide adequate warranty support. This may be accomplished by a shop visit in the case of shops performing motor repairs for the first time for the County.

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Safety and precautions:

Safety practices shall include but are not limited to the following requirements:

- a. Occupational Safety and Health Act.
- b. Accident Prevention Manual for Industrial Operations, National Safety Council.
- c. Applicable state and local safety operating procedures.
- d. National Fire Protection Association - NFPA 70E.
- e. American National Standards for Personal Protection.

Emergency/Overtime Repair Service:

The Bidder will be required to provide overtime and emergency repair service to Monroe County as needed. The bidder must have all necessary tools needed to perform the emergency repairs.

Response Time:

The bidder shall arrive at the emergency repair site according to the following:

- a. Within three (3) hours from receipt of the emergency repair call Monday-Friday, 8:00AM to 5:00PM. (straight time).
- b. Within three (3) hours from receipt of the emergency repair call Monday - Friday, 5:00 PM to 8:00 AM. and Saturdays (Overtime at one and one half times the labor rate).
- c. Within four (4) hours from receipt of the emergency repair call Sundays and holidays. (Double Time).

End of Specifications Continue to Unit Price Sheets

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ELECTRIC MOTOR REPAIR
AWARD**

ITEM	Mat'l	DESCRIPTION	UNIT	UNIT PRICE
01	1034477	100 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$661.00
02	1034478	100 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$2,415.00
03	1034479	125 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$998.00
04	1034480	125 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$2,718.00
05	1034481	15 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$394.00
06	1034482	15 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$691.00
07	1034483	150/84 HP VERTICAL MOTOR REFURBISH ONLY	EA	\$1,248.00
08	1034484	150/84 HP VERTICAL MOTOR REFURBISH/REWIND	EA	\$4,160.00
09	1034485	20 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$394.00
10	1034486	20 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$872.00
11	1034487	20 HP VERTICAL MOTOR REFURBISH ONLY	EA	\$494.00
12	1034488	20 HP VERTICAL MOTOR REFURBISH/REWIND	EA	\$1,131.00
13	1034489	200 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$1,190.00
14	1034490	200 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$4,255.00
15	1034491	25 HP EXPLOSION PROOF HORIZONTAL MOTOR REFURBISH ONLY	EA	\$1,256.00
16	1034492	25 HP EXPLOSION PROOF HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$2,135.00
17	1034493	25 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$416.00
18	1034494	25 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$1,060.00
19	1034495	30 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$456.00
20	1034496	30 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$1,321.00
21	1034497	50 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$563.00
22	1034498	50 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$1,876.00
23	1034499	75 HP HORIZONTAL MOTOR REFURBISH ONLY	EA	\$661.00
24	1034500	75 HP HORIZONTAL MOTOR REFURBISH/REWIND	EA	\$2,497.00
25	1034501	75 HP VERTICAL MOTOR REFURBISH ONLY	EA	\$895.00
26	1034502	75 HP VERTICAL MOTOR REFURBISH/REWIND	EA	\$2,308.00
27	1040282	6.1 HP ABS MIXER MOTOR REFURBISH ONLY	EA	\$1,085.00
28	1040283	6.1 HP ABS MIXER MOTOR REFURBISH / REWIND	EA	\$1,765.00
		HOURLY RATES		
29	1010884	CONTRACT MOTOR REPAIR- ADDITIONAL LABOR	HR	\$ 88.00
30	1034507	MOTOR REPAIR EMERGENCY CALL (M-F, 8AM-5PM)	HR	\$ 88.00
31	1034508	MOTOR REPAIR-OVERTIME (M-SAT, 5PM-8AM)	HR	\$ 132.00
32	1034509	MOTOR REPAIR- EMERGENCY CALL-(SUNDAY/HOLIDAY)	HR	\$ 176.00
33	1034510	ADDITIONAL MATERIALS, (COST + 5%)	LOT	