UNIVERSITY OF COLORADO
Procurement Service Center

Request for information
Gray Water Recirculation Systems

For

CU Boulder Housing and Dining Services

February 13, 2013
Gray Water Recirculation Systems

UNIVERSITY OF COLORADO
Procurement Service Center-Facilities Management
F1540 30th Street, Room 328 (reception)
Campus Box 453
Boulder CO 80309

RESPONSE MUST BE RECEIVED BY March 15, 2013 at 11:00am in location noted above. They may be mailed to the address noted above, or e-mailed to the Purchasing agent at the e-mail address noted below.

MAILING NOTE: In the lower left corner of the envelope containing your response, include: the RFI number, opening date, and opening time. Highlight this information in yellow. Be sure to sign your response before mailing.

Purchasing Agent: Jeff Darling C.P.M.
Telephone Number: (303) 492-4302
FAX Number: (303) 492-1337
E-mail Address: Jeff.Darling@colorado.edu

The University of Colorado, Boulder (UCB) invites vendors to reply with information regarding the ability to assist the campus in its efforts to install a gray water recirculation system at the Williams Village North dormitory. All pricing information provided is for budgetary or informational purposes only. This is a non-binding Request for information (RFI), not a formal Invitation for Bid (IFB) or Request for Proposals (RFP).

SECTION I -- BACKGROUND, OVERVIEW, GOALS

BACKGROUND

UCB Housing and Dining Services (HDS) is seeking to install a gray water recirculation system to treat the gray water produced from sinks and showers and recirculate this water into the toilets of the building.

OVERVIEW

HDS has installed the rough in plumbing for a gray water recirculation system to be used to distribute treated gray water throughout the building’s toilets. The gray water is collected from a portion of the showers and lavatory sinks in the building. In the mechanical room, space has been allocated for a treatment system to be installed and connected to gray water piping that has been installed to all toilet fixtures in the building. HDS is interested in learning what companies are available to provide a treatment system as well as maintenance service to HDS.

GOALS

To gather information about companies who provide the treatment system required, budgetary installation and maintenance costs, and level of treatment of the gray water. This information will allow HDS to study marketplace conditions and formulate the best scenario for moving forward.
SECTION II -- STATEMENT OF WORK

The University of Colorado is seeking RFI for a gray water recirculation system to be installed in the Williams Village North dormitory. The gray water system shall be rated to treat 2,000 gallons per day of gray water, but the system shall be scalable such that the capacity of the system may be increased to provide for additional capacity in the future. The system shall provide potable water make up to meet demand when sufficient gray water is not being generated. The University of Colorado will provide as-built architectural and mechanical drawings of the building as well as preliminary gray water testing results.

SECTION III -- MANDATORY REQUIREMENTS

MINIMUM MANDATORY OFFEROR QUALIFICATIONS

Vendor must have all of the proper licensing and processes in place in accordance with industry standards. Vendor must provide proof of insurance. The University’s requirements can be found at: https://www.cusys.edu/psc/purchasing/insurance_requirements.htm

Vendor must list all relevant permits or registrations they possess (bond capacities, contractor licenses, etc.).

The successful vendor must have their treatment system design and associated building plumbing connections stamped by a professional engineer.

MINIMUM TREATMENT SYSTEM REQUIREMENTS

The treatment system should be designed to meet the following gray water quality standards:

- E Coli/100 ml: Non-detect in at least 75% of all samples collected
- E Coli/100 ml (max) < 126 cfu/100 ml single sample
- Turbidity (monthly average) < 3.0 NTU
- Turbidity (95th percentile) < 5.0 NTU during any calendar month
- BOD5 < 10 mg/L
- TSS < 10 mg/L
- Free chlorine in gray water at point of use (min) > 0.5 PPM
- Free chlorine in gray water at point of use (max) < 2.0 PPM

The treatment system must be designed to meet the following regulations:

- 2009 International Plumbing Code, including Appendix C
- Colorado Cross-Connection Control Manual
- University of Colorado Design and Construction Standards

The anticipated treatment system components are listed below, not all may be applicable depending on the type of treatment system proposed.
• Testing ports for water quality sampling of influent, at intermediate points during treatment and finished water storage
• Water metering on non-potable gray water distribution with connection to BAS
• Water metering on potable makeup water with connection to BAS
• Centrifugal separator
• Filtration – vendor to state what type of filters, media, particle size cut-off, media type, chemical addition, and regeneration conditions.
• Chlorinator or other disinfection method
• Storage tanks – must comply with 2009 IPC
• Backwash pumps (if required)
• Re-pressure pump(s) – vendor shall define how many
• Pressure tanks
• Dye injector
• Control panels (main and slaves) – vendor shall state whether their control panel is proprietary
• Instrumentation - vendor shall provide where flow switches are located and whether connected to the control panel

SECTION IV -- OFFEROR RESPONSE FORMAT

SUBMITTAL REQUIREMENTS

1. Provide a minimum of three references for other similar recirculation systems that the vendor has installed.

2. Provide a budgetary estimate of the treatment system cost, including piping, equipment, and plumbing connection into the building. The system shall conform to the 2009 International Plumbing Code. The University is willing to provide data and research that is performed on the system. The University realizes that this is a unique system to the state and as such may serve as a demonstration system for the vendor.

3. Provide piping and equipment schematics for the treatment system.

4. Provide any water quality analysis for similar units for what the vendor’s treatment system may achieve.

5. Vendor would be expected to provide budgetary costs for maintenance services at the Williams Village North dormitory (3300 Baseline Ave.) in Boulder, CO 80309. Companies must have the necessary equipment and personnel to maintain pumps, filters, or any other component of the treatment system that requires periodic maintenance. The vendor shall provide an operation and maintenance manual for the proposed system. The vendor will need to be able respond to HDS needs and requests within 24 hours, and within one hour in case of emergency.
6. Provide a list of all maintenance activities and replacement schedules associated with the gray water system.

7. Proof of all relevant permits or registrations they possess (professional engineering, US Dept. of Transportation, US EPA, Colorado Dept. of Public Health and Environment, etc.). As well as any additional business relationships that might occur during the providing of said services to CU.

8. Please provide your company’s sustainability model, if you have one. This would include addressing details such as waste management, utility use, energy conservation, sources of energy, offset of carbon footprint and fair labor practices including wages and safe working conditions

9. Please provide vendor’s location and/or service contract office which will provide the maintenance services requested in #5 above.

ADMINISTRATIVE INFORMATION

A. ISSUING OFFICE:
The Procurement Service Center (PSC) Purchasing Agent listed herein is to be the SOLE point of contact concerning this RFI. Offerors shall not directly contact other personnel regarding matters concerning this RFI or to arrange meetings related to such.

B. OFFICIAL MEANS OF COMMUNICATION:
All official communication from the PSC to offerors will be via postings on an electronic solicitation notification system. The PSC will post notices that will include, but not be limited to, any modifications to administrative or performance requirements, answers to inquiries received, clarifications to requirements. It is incumbent upon offerors to carefully and regularly monitor the electronic solicitation notification system for any such postings. In addition, communications may be sent to attendees of the mandatory pre-proposal conferences, if any, via fax or email.

C. INQUIRIES:
Prospective offerors may make written inquiries by mail, e-mail or fax before the written inquiry deadline concerning this RFI to obtain clarification of requirements. The deadline for such inquiries is by the end of business November 21, 2011. There will be opportunity to make inquiries. No inquiries will be accepted after the deadline. Inquiries regarding this RFI (be sure to reference RFI number) should be referred to:

Jeff.Darling@colorado.edu

Response to offerors’ inquiries will be published as a modification on the electronic solicitation notification system in a timely manner. Offerors cannot rely on any other statements that clarify or alter any specification or other term or condition of the RFI.
ATTACHMENT A
SIGNATURE BLOCK

Offerors shall complete this page and include it with their technical and financial Requests.

I certify our company’s receipt of ______ modifications to this RFI.

(number)

By signing below, you agree to all terms & conditions in this RFI, except where expressly described in your cover letter.

________________________________________________________________________
Original Signature by Authorized Officer/Agent

Vendor’s Tax ID Number (FEIN)

________________________________________________________________________
Type or printed name of person signing

Company Name

________________________________________________________________________
Title

Phone Number

________________________________________________________________________
Vendor Mailing Address

Fax Number

________________________________________________________________________
City, State, Zip

________________________________________________________________________
E-Mail Address

Website Address

SUBMIT THIS PAGE WITH YOUR PROPOSAL
SAMPLE DATE: 01/16/2013

- Total Coliform = >2419.6 mpn/100ml
- E.Coli = 2.0 mpn/100ml
- COD = 300 mg/L
- BOD = 160 mg/L
- Turbidity = 50 NTU
- Total Suspended Solids = 81 mg/L
- Total Alkalinity = 56 mg/L
- Total Organic Carbon = 62 mg/L