


VILLAGE OF LOMBARD
REQUEST FOR BOARD OF TRUSTEES ACTION
For Inclusion on Board Agenda
Bids and Proposals

TO : President and Village Board of Trustees
FROM : Scott Neihaus, Village Manager
DATE : November 20, 2017 Agenda Date December 7, 2017
TITLE : Waiver of Bids – Concentric Integration, LLC
2018 SCADA Control Room Equipment Purchase & Integration
SUBMITTED BY: Brian M. Jack, Utilities Superintendent 

RESULTS:

Date Bids Were Published _____ Bidding Closed _____
Total Number of Bids Received _____
Total Number of Bidders Meeting Specifications _____
Bid Security Required _____ Yes _____ No
Performance Bond Required _____ Yes _____ No
Were Any Bids Withdrawn _____ Yes _____ No
Explanation:
Waiver of Bids Requested? _____ X _____ Yes _____ No
If yes, explain: Purchase is directly from manufacturer.
Award Recommended to Lowest _____ Yes _____ No
Responsible Bidder?
If no, explain:

FISCAL IMPACT:

Engineer's estimate/budget estimate \$80,025.00 Amount of Award \$75,350.00
Water & Sewer Capital Reserve Fund: 520.790.715.75420 Proj: WA 18 04 Construction

BACKGROUND/RECOMMENDATION:

The SCADA Control Room upgrade equipment purchase and integration . This encompasses not only adding more work stations for operators to use for asset management but will also allow more space for maintaining preventative maintenance programs, more robust SCADA monitoring via an operator control console, telecommunication improvements, system configuration and interface to video walls, and the ability to integrate the video surveillance of remote water, sewer and storm water sites in the very near future.

Has Recommended Bidder Worked for Village Previously _____ X _____ Yes _____ No
If yes, was quality of work acceptable _____ Yes _____ No
Was item bid in accordance with Public Act 85-1295? _____ Yes _____ X _____ No
Waiver of bids - Public Act 85-1295 does not apply _____ X _____ Yes

REVIEW (as needed):

Village Attorney XX _____ Date _____
Finance Director XX _____ Date _____
Village Manager XX _____ Date _____

NOTE: All materials must be submitted to and approved by the Village Manager's Office by 4:30 pm, Wednesday, prior to the Board Agenda distribution.

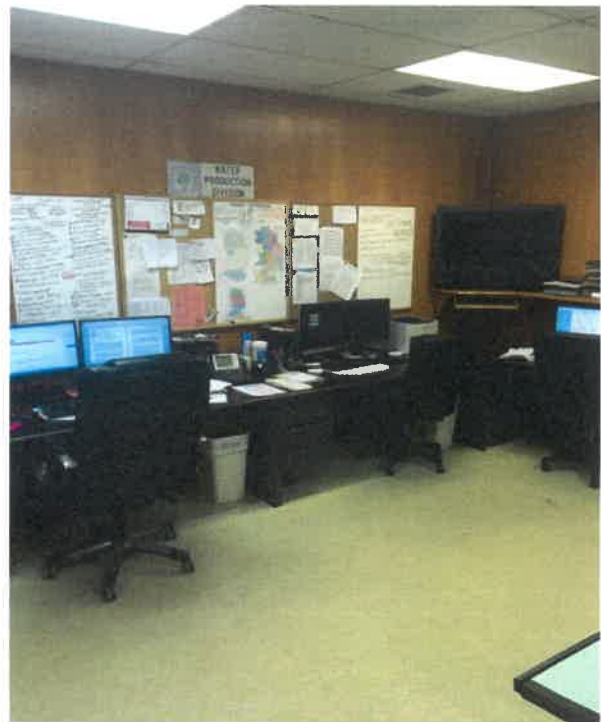
MEMORANDUM



To: Scott Niehaus, Village Manager
From: Brian Jack, Utilities Superintendent *B*
Through: Carl Goldsmith, Director of Public Works *g*
Date: November 20, 2017
Subject: **Waiver of Bids**
Concentric Integration, LLC (Subsidiary of Baxter & Woodman)
2018 SCADA Control Room Equipment Purchase & Integration

Executive Summary/Background

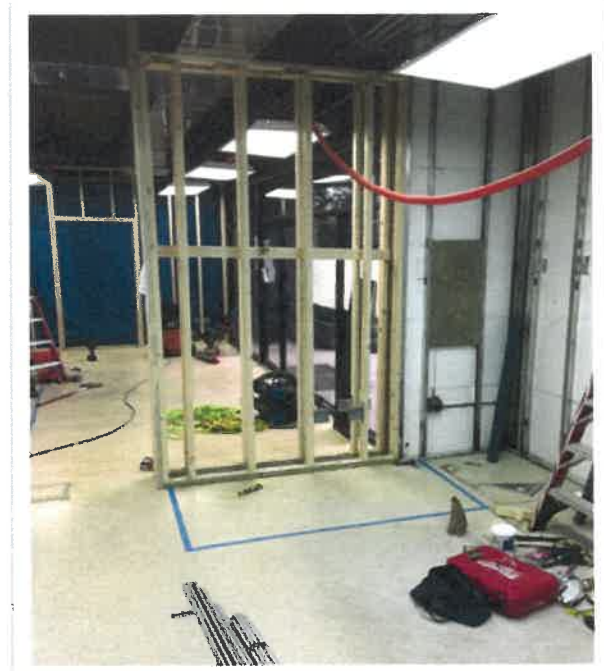
The Civic Center Reservoir Facility was constructed in the late 1970's and went online in 1982 as the primary water pumping station in the Village of Lombard. The station has been in service with minor upgrades to the building throughout the years. Items that have been upgraded include the roof, HVAC system, backup generator and pumping equipment improvements inside the station. The general layout of the control room where the operators monitor SCADA has had minor improvements including new desks in 2014 and upgraded computers as technology has improved. Pictures of the old layout are shown below.



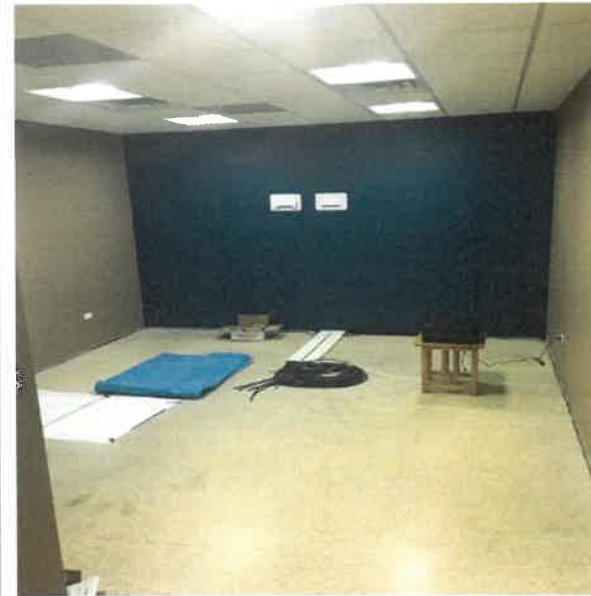
In 2016, Baxter & Woodman Consulting Engineers was contracted to design and modernize the new SCADA Control Room. To date, 3-dimensional engineering drawings and one-line electrical prints have been developed and were used by in-house crews to begin the remodel. Demolition of the existing SCADA room was completed in early 2017 and staff recently completed the prep work for the component installation scheduled for 2018. In-house efforts to complete this work saved approximately \$30,000 in what would have been outside contractor costs. Multiple work stations and a new SCADA control center

will improve the viewing capabilities and facilitate communication and transparency in the event of a critical emergency or system wide failure in the water, sewer or storm water system.

SCADA Control Room demolition and construction:



Prep work near completion with façade expansion with data and electrical wiring complete.



Introduction

During 2015, the Village and their SCADA integrator developed a long range plan that would be phased in over 3-4 years and bring all existing technology up to current industry standards. The timing of these

upgrades was critical as current software and hardware are slowly being phased out and no longer supported.

The SCADA Control Room upgrade encompasses more work stations for operators to use for asset management; allows more space for maintaining preventative maintenance programs; more robust SCADA monitoring via an operator control console; telecommunication improvements; system configuration and interface to video walls; and the ability to integrate the video surveillance of remote water, sanitary, and storm sewer sites into the system in 2018. Video surveillance integration will be presented to the Board as a separate agenda item sometime in 2018 when a system is chosen by staff.

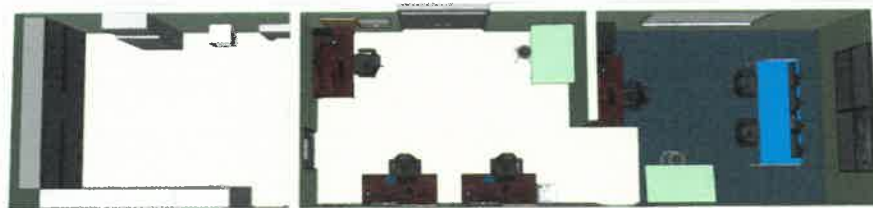
The Utilities Division began system wide improvements to the 31 remote facilities in 2015 with a completely renovated SCADA System radio network upgrade from serial to Ethernet radio communication. Phase II of the hardware upgrades will occur in 2018 which will complete the modernization of all hardware and software at each facility. The SCADA control room redesign and remodel is one of the last remaining items of this ongoing 4 year project.

After all phases and upgrades are complete, the Village's SCADA system will meet all current industry standards with no immediate signs of software or hardware obsolescence. These enhancements will aid in the visual and operational functions of the SCADA system.

Discussion

Concentric Integration, LLC is a wholly owned subsidiary of Baxter & Woodman. They have done numerous SCADA control room upgrades most recently for Aurora, Crest Hill, and the City of Rockford. These communities opted to contract with Concentric Integration directly for the design and procurement of all materials for their projects due to the savings Baxter & Woodman receives from vendors involved in large scale projects. It should be noted that the Village's existing SCADA integrator, Energenecs, was contacted back in 2016 and declined to pursue this part of the project. They are not as advanced in control room design as Concentric Integration.

A rendering of the new control room is provided and shown below.



The Public Works Department requested pricing from Concentric Integration, LLC for the LED lighting, speakers, occupancy sensors, specialize cabling, and connectors in early 2017. The objective was for in-

house staff to complete the prep work and installation of these components in 2017 in preparation for the video wall, servers, SCADA console, and network rack in 2018. This work has been completed and can be seen by the pictures above.

Staff is seeking to award advanced purchase of the remaining material, equipment and integration costs due to their specialized nature and longer lead times. Delivery of equipment, installation, and integration will take place after January 1, 2018. Enclosed with this memo is the current proposal for this recommended purchase from Concentric Integration, LLC in 2018.

Concentric Integration, LLC performed the original design work of the SCADA control room and was awarded the initial equipment purchase in 2017 for this project. Concentric Integration, LLC is responsive, and they have competent and reliable staff that is easy to work with and understands our vision and current needs. Reference checks and client follow up were performed for projects similarly related control room upgrade projects. There are no issues to report. Concentric Integration, LLC of Crystal Lake, IL is considered a reliable, responsive vendor.

Funding for this purchase is part of the WA 18 04 Civic Center Reservoir SCADA Upgrade project in the Water/Sewer Capital Reserve budget. This project is under budget due to the efforts of in-house staff performing most of the construction and will undoubtedly leave remaining funds in the 2018 CIP. These funds can be utilized for other projects or be shown as a reduction as necessary.

Recommendations:

The Water Treatment and Wastewater Pumping Division requests that we waive the formal bidding process and award a contract for the 2018 SCADA Control Room Equipment Purchase & Integration at the Civic Center Reservoir Facility to Concentric Integration, LLC of Crystal Lake, IL. This purchase will be out of the FY 2018 Water/Sewer Capital Reserve Budget.

Staff is also recommending that a ~10% contingency (\$6,850.00) be added to the contract to cover any unforeseen expenses. Additional costs could possibly include unforeseen networking issues with the existing fiber optic system, unforeseen equipment needs, and additional integration costs beyond what was estimated. The contingency would not be used without Director of Public Works approval and change orders documenting these unforeseen occurrences. The contingency would raise the total project cost to a not to exceed number of \$75,350.00 (\$68,500.00 base bid plus the contingency of \$6,850.00). Sufficient funds for this proposed contract exist in the current budget WA 18 04.

Please present this item to the President and Board of Trustees for their review and approval at their regular meeting on December 7, 2017.



November 17, 2017

Mr. Lukas Sharp
Water Treatment and Wastewater Pumping Supervisor
Village of Lombard Public Works Department
255 E. Wilson Ave
Lombard, IL 60148

Subject: Control Room Integration 2018 Completion

Concentric Project Number: 170762

Dear Mr. Sharp:

It has been great working with you and your staff as we all look to finish the Control Room upgrades. Village leadership and residents alike should be proud of the amount of money the Village has saved by self-performing this work. In order to complete the improvements, Concentric Integration is proposing the following remaining Audio/Visual and related Information Technology Equipment, along with the associated professional integration services for the SCADA system, security system and audio/visual system.

Please pay careful attention to the division of responsibilities we have laid out in our proposal. Due to the unique (and cost-effective) nature of doing this work with the Village in a partnership, we want to be sure that everyone is comfortable with which parties do what work.

Thank you again for your confidence in us and we look forward to finishing the project strong come the new year.

Scope of Services

Equipment

Concentric Integration will furnish the following equipment (installation is not included in this agreement unless specifically identified):

1. Control Trac LT Console
 - a. Color will match existing desks, with final approval by the Village.
 - b. Console will be installed by Control Trac under this agreement.
2. Extron AV Equipment
 - a. One (1) Fixed HDMI Matrix Switcher - DXP HD 4K Series.



- b. One (1) TLP Pro 1022T TouchLink® Touchpanel for Wall matrix display controls.
 - c. One (1) IPCP Pro 250 IP LINK PRO Control Processor.
 - d. One (1) ShareLink 200 N -Collaboration Gateway – to allow laptops and other devices to be connected to the video matrix.
 - e. One (1) IR Emitter to allow remote control of Village-provided television/cable box through the Extron IPCP Pro 250 and TouchLink.
 - f. One (1) RSU 129, 1U 9.5" Deep Universal Rack Shelf Kit for mounting of Extron equipment in console rack.
 - g. One (1) Two-Output HDMI DA for splitting the HDMI signal from the security workstation.
- 3. HDMI cables and Shielded Ethernet patch cables as required
 - 4. One (1) Rack Mounted UPS
 - 5. One (1) Stereo Amplifier with A/B output channels to connect to the speakers in the control room and the break room.
 - 6. One (1) NEC Video Wall Matrix in 2x2 arrangement consisting of four (4) 46" LED narrow bezel displays, each with 1920x1080 resolution.
 - 7. One (1) 4-port Video Output card with four HDMI connections for SCADA Workstation.
 - 8. Surface-mount Ethernet patch panel for console

Labor

Project Management

- 1. Plan, schedule, and coordinate the activities that must be performed to complete the Project.
- 2. Coordinate Lutron Startup services for Grafikeye system.

Control Room Integration

- 1. Perform integration of Lutron system into Extron Touchlink display.
- 2. Assist with relocation and integration of six (6) workstations with A/V equipment and network rack.
- 3. Assist with installation of NEC Wall Matrix.
- 4. Split the existing HDMI Video Output from the existing Security Workstation to both the Wall Matrix Switch and the existing breakroom Display. Village to run HDMI wire between console and breakroom.
- 5. Install and configure video card in SCADA workstation.



6. Provide connections for Video outputs to all workstations in the console.

Electrical Room Network Rack Integration

7. Move existing Cisco firewall and install on shelf in new network rack.
8. Move and mount existing Cisco 24-port switch to new network rack.
9. Connect Ethernet Patch Cables as required.
10. Install Lutron Grafik Eye QS Link in new network rack and connect to Ethernet switch.
11. Move existing Comcast modem to new network rack and reroute cable to new location.
12. Install UPS in new network rack.

Concentric Assumptions / Owner Responsibilities

- Owner understands that all existing equipment to remain is assumed to be in good, working order. In the event that any other equipment does not perform as-expected, Concentric will work with the Owner to repair, as-needed, under a separate contract.
- Owner will dispose of/recycle any removed equipment.
- Owner understands that warranty on materials will be provided strictly by the manufacturer. No additional labor or materials warranties are provided by Concentric.
- Owner will be responsible for power, as well as low voltage audio/video signaling cable which will need to terminate near where the equipment is installed. Complying with related electric and building codes for the power and signaling cable will be the responsibility of the Owner.
- Village to reroute existing fiber optic patch cables from existing cabinet to new network rack and reconnect to relocated switch (see picture below).



Project Schedule

Our estimated project schedule will be agreed upon after the agreement is signed in collaboration with the Village

Warranty

The warranty listed in the attached Standard Terms & Conditions document (Paragraph 13):

- ☐ DOES apply
- ☒ DOES NOT apply

Fee

Our fee for the above scope will be computed on the basis of hourly billing rates for actual work time performed plus reimbursement of out-of-pocket expenses including travel costs, which total amount will not exceed \$68,500.

This agreement is valid for 90 days from the date of this proposal.

Terms & Conditions

Refer to attached Standard Terms & Conditions document.



Acceptance

If this proposal is acceptable, please sign one copy and return to us. Feel free to contact me if you have any questions.

Sincerely,

CONCENTRIC INTEGRATION, LLC

Michael D. Klein, PE
Automation Department Manager
MDK

Christopher T. Sosnowski, PE
President
CTS

CLIENT NAME

ACCEPTED BY: _____

TITLE: _____

DATE: _____

Above signature implies acceptance of the attached **STANDARD TERMS & CONDITIONS**



Standard Terms & Conditions

1. The submitted proposal and these Standard Terms & Conditions constitute and are herein referred to as the Agreement.
2. Concentric Integration is herein referred to as Concentric, and the party with whom Concentric is entering into this Agreement with is herein referred to as Owner.
3. Concentric may submit requests for periodic progress payments for services rendered. Payments shall be due and owing by the Owner upon receipt of Concentric's invoice for services. Payments to Concentric after sixty (60) consecutive calendar days from the date of Concentric's invoice for services shall include an additional late payment charge computed Owner an annual rate of twelve percent (12%) from date of Concentric's invoice; and Concentric may, after giving seven (7) days written notice to the Owner, suspend services under this Agreement until Concentric has been paid in full all amounts due for services, expenses, and late payment charges.
4. This Agreement may be terminated, in whole or in part, by either party if the other party substantially fails to fulfill its obligations under this Agreement through no fault of the terminating party; or the Owner may terminate this Agreement, in whole or in part, for its convenience. However, no such termination may be effected unless the terminating party gives the other party: (1) not less than ten (10) calendar days written notice by certified mail of intent to terminate, and (2) an opportunity for a meeting with the terminating party before termination. If this Agreement is terminated by either party, Concentric shall be paid for services performed to the effective date of termination, including reimbursable expenses. In the event of contract termination, the Owner shall receive reproducible copies of Drawings, Custom Developed Applications and other documents completed by Concentric.
5. Concentric agrees to hold harmless and indemnify the Owner and each of its officers, agents and employees from any and all liability claims, losses, or damages, to the extent that such claims, losses, or damages are caused by Concentric's negligence in the performance of the services under this Agreement, but not including liability that may be due to the sole negligence of the Owner or other consultants, contractors or subcontractors working for the Owner, or their officers, agents and employees. In the event claims, losses, or damages are caused by the joint or concurrent negligence of Concentric and the Owner they shall be borne by each party in proportion to its negligence.
6. The Owner acknowledges that Concentric is a Limited Liability Company and not a Professional Service Corporation, and further acknowledges that the corporate entity, as the party to this contract, expressly avoids contracting for individual responsibility of its officers, directors, or employees.
7. The Owner and Concentric agree that any claim made by either party arising out of any act of the other party, or any officer, director, or employee of the other party in the execution or performance of the Agreement, shall be made solely against the other party and not individually or jointly against such officer, director, or employees.
8. For the duration of the project, Concentric shall procure and maintain insurance for protection from claims under worker's compensation acts, claims for damages because of bodily injury including personal injury, sickness or disease or death of any and all employees or of any person other than such employees, and from claims or damages because of injury to or destruction of property including loss of use resulting therefrom, alleged to arise from Concentric's negligence in the performance of services under this Agreement. The Owner shall be named as an additional insured on Concentric's general liability insurance policy. The limits of liability for the insurance required by this Subsection are as follows:

Workers Compensation:	Statutory Limits	Excess Umbrella Liability:	\$5,000,000 per claim and aggregate
General Liability:	\$1,000,000 per claim / \$2,000,000 aggregate	Professional Liability:	\$5,000,000 per claim
Automobile Liability:	\$1,000,000 combined single limit		\$5,000,000 aggregate
9. Notwithstanding any other provision of this Agreement, and to the fullest extent permitted by law, the total liability, in the aggregate, of Concentric and their officers, directors, employees, agents, and any of them, to the Owner and anyone claiming by, through or under the Owner, for any and all claims, losses, costs or damages whatsoever arising out of, resulting from or in any way related to the project or the Agreement from any cause or causes, including but not limited to the negligence, professional errors or omissions, strict liability or breach of contract or warranty expressed or implied of Concentric or their officers, directors, employees, agents or any of them, hereafter referred to as the "Owner's Claims", shall not exceed the total insurance proceeds available to pay on behalf of or to Concentric by their insurers in settlement or satisfaction of Owner's Claims under the terms and conditions of Concentric's insurance policies applicable thereto, including all covered payments made by those insurers for fees, costs and expenses of investigation, claims adjustment, defense and appeal.
10. Concentric is responsible for the quality, technical accuracy, timely completion, and coordination of all Designs, Drawings, Custom Developed Applications and other services furnished or required under this Agreement, and shall endeavor to perform such services with the same skill and judgment which can be reasonably expected from similarly situated professionals.
11. The Owner may, at any time, by written order, make changes within the general scope of this Agreement in the services to be performed by Concentric. If such changes cause an increase or decrease in Concentric's fee or time required for performance of any services under this Agreement, whether or not changed by any order, an equitable adjustment shall be made and this agreement shall be modified in writing accordingly. No service for which an additional compensation will be charged by Concentric shall be furnished without the written authorization of the Owner.
12. All Drawings, Custom Developed Applications, and other documents prepared or furnished by Concentric pursuant to this Agreement are instruments of service in respect to the project, and Concentric shall retain the right of reuse of said documents and electronic media by and at the discretion of Concentric whether or not the project is completed. Electronic copies of Concentric's documents for information and reference in connection with the use and occupancy of the project by the Owner and others shall be delivered to and become the property of the Owner; however, Concentric's documents are not intended or represented to be suitable for reuse by the Owner or others on additions or extensions of the project, or on any other project. Any such reuse without verification or adaptation by Concentric for the specific purpose intended will be at the Owner's sole risk and without liability or legal exposure to Concentric, and the Owner shall indemnify and hold harmless Concentric from all claims, damages, losses and expenses including attorneys' fees arising out of or resulting therefrom.
13. Concentric warrants that the services provided for under this Agreement will be completed in a good and workmanlike manner in accordance with applicable codes, ordinances, regulations or other legal Owner. For a period of one (1) year after the Owner receives beneficial use of the installation, Concentric will provide a limited warranty to the Owner for any defect due to improper materials or workmanship supplied by Concentric. Any such warranty provided to Owner shall be provided by Concentric without expense to the Owner for the one (1) year period described herein. CONCENTRIC'S WARRANTY IS A LIMITED WARRANTY FOR A PERIOD OF ONE (1) YEAR FROM THE DATE OF BENEFICIAL USE OF THE INSTALLATION. This warranty is limited to only defects in material and workmanship on products purchased and fully installed by Concentric and excludes defects caused by improper use, abuse, accident, acts-of-God (including but not limited to lightning), alteration, or other conditions beyond Concentric's control, as determined by Concentric, and all manufacturer's products or workmanship as covered by their respective warranties. For manufacturer's products or workmanship, Concentric will deliver to Owner all manufacturers' warranties of products. IN CONSIDERATION OF THE LIMITED WARRANTY CONTAINED HEREIN THE OWNER AGREES AND ACKNOWLEDGES THAT SUCH WARRANTY REPLACES ALL OTHER WARRANTIES EITHER EXPRESS OR IMPLIED INCLUDING BUT NOT LIMITED TO ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Concentric's warranty is limited to repair or replacement of a defective product without cost to the Owner. OWNER WAIVES ALL CLAIMS TO INCIDENTAL OR CONSEQUENTIAL DAMAGES. This limited warranty extends only to the Owner and not to subsequent buyers/owners. Owner must give written notice of a defect within the one (1) year warranty period described above. In the event of any dispute between the Owner and Concentric, such dispute shall be resolved in accordance with these Standard Terms & Conditions and the Agreement.
14. Any provision or part thereof of this Agreement held to be void or unenforceable under any law shall be deemed stricken, and all remaining provisions shall continue to be valid and binding upon the parties. The parties agree that this Agreement shall be reformed to replace such stricken provision or part thereof with a valid and enforceable provision which comes as close as possible to expressing the intention of the stricken provision.
15. This Agreement contains and embodies the entire and integrated agreement between parties hereto and supersedes all prior negotiations, representations, or agreements, either written or oral.