Manufacturing Engineering and Technical Support

Scope of Work

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BACKGROUND
It is the intent of the (THE OWNER) to use outsourcing to support their highly automated newly constructed manufacturing facility in. This SOW is for a Tier II Service Partner (ISP) that will work with the Production Services General Contractor (PSGP) in providing Manufacturing Engineering and Technical Support services and related functions at the facility. The facility design production capacity is ______ annually. Primary production equipment includes ______ within a ______-Ft² building.

SCOPE OF WORK
This document establishes minimum objectives and expectations.

Introduction
• The ISP shall provide all qualified personnel equipped with the proper tools and resources to deliver resident engineering and technical services directly to, and for, THE OWNER manufacturing. In addition to providing engineering and technical support, the ISP is expected to provide subject matter expertise toward THE OWNER’s manufacturing strategies and tactics. Expertise will be required in the following Manufacturing Engineering disciplines:
  ▪ Production cutting tooling
  ▪ Process controls
  ▪ Equipment maintenance and reliability
  ▪ Plant and facilities engineering

• Engineering will be will be segregated between a direct operational technical support role and individual project s. Projects are considered any engineering demand requiring significant time to solve and/or requiring additional resources. Project will not exceed $5,000,000 cost. Outside Engineering services will not exceed $50,000 per release. All projects over these amounts will be considered capital investments and will be managed by the Owners Engineering Department

• THE OWNER will be striving to create a clean, safe, and professional environment throughout the facility. It is expected that this culture be present in every operational process; every team member (THE OWNER and non-THE OWNER) shares this belief and incorporates this attitude into their daily work practices; and each team member contributing to the common mission of an injury free, productive workplace.

• Engineering and technical support consists of effective strategies and tactics that maximizes the useful life of production and facility equipment, minimizes quality related defects, optimizes equipment reliability and life-cycle costs, provides an improved work environment, and produces information to make data-driven business decisions, all within a given resource level.

• The ISP is responsible for delivering engineering and technical support services that protects the health and safety of personnel, protects the environment, and
preserves THE OWNER's long-term productive capabilities and capital investment.

- Continuously and proactively improve technical and delivery processes to optimize engineering and technical services spending. These include benchmarking and the identification of "best practices;" preparing and adhering to annual and long range technical and capital budgets; performing self-assessments and applying process-improvement techniques where appropriate.

- The ISP will be required to use modern IT systems and methods to manage activities, account for resources, and to monitor and report on engineering activities at the facility.

- The ISP shall possess the capability of providing technical services directly or indirectly through the employ of independent licensed professionals.

Pillars of the Program

- Organization

  The ISP is considered a partner with all other departments. The facility will have multiple Service Partners providing services in support of production goals. All THE OWNER and ISP team members will be working as one team for the common mission of producing engines. Each service partner will be a “Co-Partner” with each other.

  THE OWNER has adopted a matrix organization for all outsourced services at the Dundee facility. This organizational structure is a dual reporting arrangement – complying with both THE OWNER’s expectations and THE SERVICE PROVIDER’s administrative and contractual controls.

  The ISP’s business processes must be compatible and support a harmonious working relationship with THE OWNER, the THE SERVICE PROVIDER, and other Tier II and Tier III Service Partners.

- Implementation of Lean Practices

  One of the driving factors behind THE OWNER's success will be the use of Lean Manufacturing Practices. Note: THE SERVICE PROVIDER will identify all the necessary tools required by and provide the training to the ISP. Some of the tools required are, but not limited to: Standardized Operating Procedures, the 5S's, the Seven Wastes, JIT, Problem Solving Techniques, Value Chain Analysis, One Page Reporting, and Continuous Improvement Techniques.

- Balance Score Cards

  The ISP will be measured against a quantitative Balance Scorecard as a tool for THE OWNER management to evaluate key performance metrics for each service provided. Key performance measures will include, but not necessarily be limited to the categories of: Safety, Quality, Delivery, Cost, and Customer Satisfaction.
• **Communication Network**
  The ISP will be responsible for providing and maintaining all items necessary for on-site team members to successfully integrate with the communication network implemented by the SERVICE PROVIDER and THE OWNER. This network will consist of both internal and external parts: the internal part will be used to facilitate communication between Service Partners and the external part will be used to facilitate communication between THE OWNER and the Service Partners. The internal system will rely on pagers, cellular phones, and/or a radio base system. The external system will be an internet-based site for communication and documentation between the SERVICE PROVIDER and THE OWNER. Also this website will house all documents used by service partners, such as standardized work instructions and all other pertinent documents. THE OWNER’s document management system is an IT tool named________®.

**Definitions**
- **A/E** – Architect Engineer
- **AFE** – Authorization for Expenditure
- **AME** – Advanced Manufacturing Engineering
- **Buyer** – THE OWNER is the buyer
- **CM** – Construction Manager
- **CMMS** – Computerized Maintenance Management System
- **Facility and Production Support** – Engineering support required to answer questions and work orders on a day-to-day basis
- **FSSP** – Facility System Service Provider. Manages all outside service contracts for the facility (non-productive equipment)
- **THE OWNER**
- **MOC** – Management of Change
- **N.F.P.A.** – National Fire Protection Association
- **N.I.C.** – Not in contract
- **OEM** - Original Equipment Manufacturer
- **Owner** – THE OWNER Manufacturing Team
- **Projects** - Discreet activity considered to take considerable amount of time and cost (more than $5,000,000)
- **THE SERVICE PROVIDER** – Production Systems Service Provider. Manages all outside service contracts to support the production equipment.
- **RCFA** – Root Cause Failure Analysis
- **RFES** – Request for Engineering Services
• **Validation** – Checking end work against original engineering requirements.
• **Verification** – Checking deliverable against THE OWNER and AME criteria, guidelines, code, and special conditions/provisions
• **ISP** - Vendor Service Partner

**Scope of Service**

These are initial requirements. It is the ultimate responsibility of the ISP, working directly with THE OWNER and THE SERVICE PROVIDER during the pre-launch and early post-launch phases of the contract to converge on a win-win agreeable partnership relationship to sustain THE OWNER's production goals and objectives.

**Basic Engineering Services**

The intent of this SOW is for the ISP to provide “Turn Key” engineering services for all production and facility maintenance needs. The ISP shall provide engineering and technical input, guidance, oversight, knowledge, and experience to evaluate, study and engineer recommendations on a wide range of equipment and systems used within the manufacturing facility, on a self-directed basis or as requested by the OWNER operating team up to a budget determined by Owner. Engineering Services will be authorized through a Request for Engineering Services methodology– See Section 4.0, Exhibit H.

Basic engineering and technical support activities shall include, but are not limited to:

- Equipment or facility modifications and replacements
- Equipment relocation/installation and associated facility modifications/upgrades
- Electrical/electronic control system upgrades
- Project management
- Technical data and reports
- Facility and equipment document and drawing management
- Training

• **Equipment/Facility Modifications and Replacements**. The ISP shall research, engineer, verify and validate modifications to production and facility equipment as required. The ISP shall also provide replacement equipment when THE OWNER determines that modification is not a reasonable course of action. Modification and replacement may require removal of the equipment and/or interfacing with other service providers, THE SERVICE PROVIDER or THE OWNER organizations. The ISP shall be responsible for establishing the required contacts and making the necessary arrangements to ensure adequate interface support is available for other equipment or facilities.

• **Equipment Relocation/Installation and Associated Facility Modifications and Upgrades**. The SERVICE PROVIDER shall provide engineering services to relocate/install new equipment as directed by THE OWNER. The SERVICE
PROVIDER shall define and develop facilities interface and installation programs, plans and procedures, conduct testing and result evaluations, and document test results as required.

- **Control Systems.** The ISP shall engineer, verify, and validate control systems for equipment as specified by THE OWNER. These systems will be of various dimensions and capacities to satisfy the specific needs. The SERVICE PROVIDER shall produce and deliver drawings and plans in accordance with specified requirements. Unless otherwise specified, drawings and plans shall be in THE OWNER format (ref. MP 125). The plans shall also consider and address any structural or system modifications necessary to accommodate the installation and operation of the system within the established facility parameters.

- **Technical Data and Reports.** The ISP shall develop, produce, and deliver engineering technical data, drawings, schematics and any other data as required by the OWNER operating team on an ongoing basis.

  Through analysis of actual data, the ISP shall provide formal recommendations for equipment sustainability improvements; prepared in the ISP, AME, THE OWNER or THE SERVICE PROVIDER format and presented as owner documents to THE OWNER in accordance with the timelines established for the technical request.

  Delivery media may be any combination of hardcopy and electronic format. A web site is required for posting data for review. The ISP shall be proficient using an online reproduction company/operation.

- **Facility And Equipment Document And Drawing Management.** The ISP is required to adhere to the OWNER’s Management of Change process and record alterations, modifications, and changes to production and facility design specifications and drawings. The ISP is responsible for maintaining the integrity and accuracy of the engineering drawings, technical documentation, databases, standardized work instructions and quality systems in THE OWNER’s documentation management IT tool. Reference Section 4.0, Exhibit I.

- **Training.** The ISP shall identify formal and/or informal training needed for end users of equipment, modifications, or replacements within 2 business weeks upon completion of installed/modified equipment. The SERVICE PROVIDER shall identify training requirements of the organization and work with the owner to develop or obtain appropriate training programs, including training manuals, aides, and associated materials as required by the specific task. These training programs will provide THE OWNER, THE SERVICE PROVIDER, and other Tier II Service Partner team members with specific information and knowledge to properly operate, repair, maintain, and test the new or modified equipment/systems.

- **Budget Management.** The ISP is responsible for reporting how engineering funds are being spent. To make this possible, the ISP must use THE OWNER
accounting codes to account for, and report on, engineering expenditures. The ISP will be required to prepare annual engineering budgets and monthly actual vs. budget variance reports.

- **Technical Disciplines**

  A THE OWNER Manufacturing Engineer Job Description is attached in Section 4.0, Exhibit J.

  The ISP shall demonstrate professionalism, competency and proficiency in delivering engineering services for production and non-production activity in the following technical disciplines:

  **Production Cutting Tool Engineering**
  
  Activities for the Tool Engineer are expected to include, but are not limited to:
  
  - Production support of high volume CNC/machining (grinding, milling, turn broaches, boring) manufacturing. Product lines consist of cast aluminum cylinder head/crankcase and cast iron crankshaft machining.
  
  - Leading role in the design, development, and implementation of new tooling, fixturing, and gauging technology to provide support for quality, tooling support, and cost reduction initiatives.
  
  - Conduct manufacturing engineering assignments to develop new methods, tooling and machine designs, cost estimates, and/or resolve engineering problems involved in manufacturing of standard parts or products for assigned area of production.
  
  - Prepare recommendations and implement approved technical requests including tool redesign and alterations, change of material specifications, CNC programming, tool/fixture dimensions, methods, routing, etc.
  
  - Research advanced technology and develop proposals for automation, mechanization, methods, and selection of special tooling, etc. for the purpose of cost reduction.
  
  - Interface and work closely with THE OWNER Production Line Managers to assure that material and tooling specifications are properly established and met.

  **Process Control Engineering**
  
  Activities for the Process Control Engineer are expected to include, but are not limited to:
  
  - Initiate production changes, programming of PLC’s, CNC’s, and robotic automation and control systems, specifically Mitsubishi, Fanuc, Square D, Siemens.)
• Analyze, specify, design, implement, and debug process and equipment upgrades.

• Inspect, troubleshoot, diagnose faults, and monitor trends on all critical production automation/control equipment and process variables.

• Work closely with production team members to identify and solve immediate process problems. Identify and direct additional resources to solve process problems, if required.

• Reconfigure HMI and process graphic screens.

• Ensure that all integration, communication and interaction of the control system as a whole is capable of reliable, sustainable production.

• Back up programs to memory and on disks is also needed when a multi-level control system is employed, or several slave controllers are linked to a master (i.e.; Guided Vehicle System, Storage & Retrieval System, etc.).

• Compile engineering and maintenance documentation for equipment and process upgrades. Update electrical blueprints including schematic drawings.

• Liaise with OEM’s and suppliers to insure that their products provide maximum value to THE OWNER.

• Support operations and maintenance team members in maintaining electrical/control equipment and systems.

Equipment Maintenance and Reliability Engineering
Activities for the Maintenance/Reliability Engineer are expected to include, but are not limited to:

• Develop and document equipment performance standards, to include condition reports verifying operating procedures, software currency, spare parts availability, failure modes and effects, and other supportability analyses consistent with a proactive maintenance strategy.

• Develop a reliability incident reporting process to record all incidents of faults, failures, breakdowns, production interruptions and disorders. Use for fault/failure analysis criticality and with other reliability analysis tools to either eliminate or mitigate effects of such incidents.

• Review equipment performance for frequency and duration of inspections, PM’s, servicing, and condition monitoring and compare to speed, precision, availability, utilization, and reliability criteria.
• Develop specification and quality inspection procedures for repairs, component part replacements, material certification, assembly and installation precision, etc
• Conduct analyses of equipment historical performance to determine trends in problem areas. Develop a formal Root Cause Failure Analysis (RCFA) process for significant reliability incidents to discern causes and initiate permanent corrective action and other recommendations for improvement.
• Establish functional systems documentation – Information feeds back for three types of improvement: (1) to improve the maintainability of equipment now in use, (2) to improve maintenance work and systems, and (3) to facilitate failure-free design in new equipment.

*Plant and Facilities Engineering*

Activities for the Plant/Facilities Engineer are expected to include, but are not limited to:

• Acquire OEM equipment design specifications for all facility and production equipment, covering functional performance standards for reliability, operability, and maintainability.
• Equipment Register/Database. Develop a logically structured, parent-child relational breakdown structure within the CMMS for all Dundee equipment assets.
• Equipment Criticality Ranking. Perform analyses of critical equipment, configuration management, process flow and technology, control limits, and operational hazards.
• Obtain “as built” drawings, fabrication and installation precision, tolerances and baseline testing measurement methods, witnessed inspections and sign-off/acceptance documentation immediately the OWNER’s acceptance.
• Repair Warranty Program. Provide tracking system, people, equipment, and material needed for all equipment warranty claims. A 1-yr warranty period has been purchased for all Dundee equipment.
• Design a master equipment/technical information library to properly archive O&M manuals, performance information, bills of materials, PM schedules, overhaul schedules, lubrication program, and spare parts listing, and fault diagnosis information and training programs.
**Tasks and Requirements**

- Minimum qualifications, knowledge and skills:
  - Education. Bachelor of Science, 4-year degree in the appropriate engineering discipline.
  - Experience. 4-6 years hands-on experience with technical knowledge in statistical analyses, inspection, testing, dimensional layouts, specification interpretation and report writing in a high volume automotive engine-manufacturing environment. Hands on experience with CNC machining processes; experience with grinding, multi axis turning; knowledge of gauge and fixture design.
  - For management positions, at least 4 years of hands-on management style, including mentoring & staff development.
  - Computer literacy with statistical applications including Microsoft Excel/Access, Minitab and similar programs including AutoCAD 200 or Pro-E or SmartCam for Engineering and Manufacturing functions and Microsoft Office Professional Suite of applications for general business and electronic communication, CMMS, and THE OWNER document management system Windchill®.
  - Recent experience with PPAP, FEMA, ISIR, SPC, Six Sigma, PLC programming, ISO 9000, Kaizen, Experimental Design, APQP, ISO14001, and QS9000.
  - Coordinate process changes by performing test plans to validate process/design changes. Develop FMEA’s, control plans and flow diagrams.
  - Engineering and project management in tooling / process design for project execution of metal products.
  - Diving projects to successful completion in lean manufacturing and JIT environments.
  - Drive results, establish new organizational systems and implementing key strategies
  - Planning of equipment layout, accident prevention and new product launches.
  - Identify Value Engineering / Value Analysis (VE/VA) ideas.
  - Ability to manage and lead multiple projects.
  - Excellent communication skills, both written and verbal.
  - Must be able to travel--domestic/international.
  - Comply with local, state and federal code to support the needs of the facility or it’s occupants.
• Comply with any THE OWNER approved guidelines, requirements, or instructions.
• Comply with manufacturer’s warranties and maintenance recommendations and adjust for usage within warranty limits.
• Repair Warranties. ISP will obtain warranties when appropriate as determined by industry standards for work completed, services provided, or equipment purchased. In obtaining warranties, ISP will insure that the length and coverage is adequate and will name THE OWNER as the warranty holder.
• Lead / participate in continuous improvement necessary to reduce machine downtime, reduce scrap, and increase productivity.
• Work with other engineering departments, service partners, production and maintenance team members as appropriate to accomplish tasks.
• Any modifications to any maintenance processes or instructions must be submitted to THE OWNER for approval.
• An administration desk with phone line will be available for the ISP Engineering Manager in the Administration Area.
• ISP will be responsible for all drawing reproduction related to scope of work.
• ISP will be responsible to attain professional engineering services to support any rearrangement work order.
• All ISP’s will be responsible to lock out all energy sources prior to performing any maintenance on equipment.
• Acquire and secure special tools and diagnostic equipment.
• All employees will be required to have professional attire at all times (i.e. slack & pants with company logo shirt desired).
• Support for services should be available 24hrs per day if required.
• Show evidence of insurance coverage in effect for:
  • Workmen's Compensation and Occupational Disease,
  • Automobile Liability Insurance with limits equal to those required under Comprehensive General Liability.
• Engineering duties falling outside of scope may be considered extra work, however a report of all such incidents will be required and include time, date, & pictures. (Examples include doors or walls damaged by fork trucks) THE OWNER representative will determine final approval.
• Report any and all safety incidents on THE OWNER, Dundee property. File the necessary reports on the incident to THE OWNER security and THE OWNER.
• Utilize the OWNER IT system for reporting & communication requirements. This system will track all required maintenance and analyze work cycle time for efficiency.
• Inform appropriate personnel of any and all known threats to the facility and/or any employee.
• Ensure that only authorized personnel enter to and from the facility.
• Provide assistance to individuals who need help with plant logistics.
• The ISP will work with the OWNER’s Health and Safety Department to prepare and administer a disaster recovery program.
• THE OWNER reserves the right to approve all prices, price changes, scope or process changes.
• In the event the ISP is responsible for developing drawings and specifications, the ISP shall involve the OWNER’s environmental representative in the development and review of the drawings and specifications that concern fluids or soils. The ISP shall incorporate an ISO 14001 design for the environment concepts into all projects and meet all DEQ requirements.
• Emergency repairs or replacements immediately necessary for the preservation or safety of the property or for the safety of other persons, which the ISP deems necessary using good judgment, or emergency repairs or replacements required to avoid the suspension of any necessary service, or to protect assets, operations, or personnel may be made by ISP without the prior approval of THE OWNER or THE SERVICE PROVIDER if, under the circumstances, the representatives cannot be notified before the required emergency repairs or replacements must be made. In such event, the ISP shall promptly notify the appropriate representatives by telephone of such emergency and follow up with a full written explanation.
• The ISP and Housekeeping provider will provide all equipment and supplies necessary to perform all duties as outlined in this scope of work, and such equipment and supplies will remain the property of THE OWNER. THE OWNER Environmental shall approve all Chemicals brought or used on site.
• The ISP will provide communication tools and hardware compatible with THE OWNER and the SERVICE PROVIDER. (I.e. laptop, PDA with scanners and wireless antenna’s, and cell phone)
• All vehicles used by the ISP identified for Security with name and phone number. Any interior vehicle will be equipped with flashing lights on top of the cab.
• The SERVICE PROVIDER will be responsible for all repairs and/or replacement of their own equipment without additional cost to THE OWNER.
• The ISP will be required to professionally label and identify all equipment and supplies. No handwritten identifiers will be allowed.
• The ISP will be responsible for supplies and prompt removal of all empty containers and surplus materials.
• All employees of the ISP must pass a criminal background check. See Section 3.1 Criminal Background requirements.
• All employees of the ISP must pass a pre-employment drug test. See Section 3.2 for complete explanation of Drug Test requirements.

• All ISP employed for resident work at the OWNER, Dundee facility, must present the employee information to the OWNER for approval prior to assigning employee to the Dundee facility.

• Pay all federal, state, and local taxes, which may be assessed against its operations, equipment or merchandise while in or upon the premises of THE OWNER.

• The ISP will obtain and maintain all necessary licenses and permits, and certificated required by law in the performance of this scope of work.

• Maintain an adequate staff for efficient operation. Upon being hired, team members of the ISP will be subject to the rules and regulations of THE OWNER while on the premises.

• The ISP will not hire, or attempt to hire employees of the OWNER, THE SERVICE PROVIDER, FSSP or other Tier II ISP employees providing on-site outsourced services to the OWNER without formal documentation from his/her former employer or for a period of six (6) months after the termination of his/her employment.

• At no time will gas or LP gas power equipment be utilized in the facility.

• The ISP will participate with THE OWNER financial department to report and track new or replaced assets.

• ISP will provide THE OWNER a report detailing spills, leaks, or releases or potential spills, leaks, or releases into the environment immediately, but no later than the end of their regularly scheduled shift.

• Training

• Maintaining currency with respect to technical and supervisory skills by attending classes, course, and seminars; assuming additional related responsibilities.

• Team members must have proof of appropriate training in respective field of work and acceptable to the SERVICE PROVIDER.

• Training programs must be designed, administered and monitored for effectiveness.

• Provide continuous education and training of systems, Industry codes and designs, and safety.

• Team members are to participate in the OWNER site-wide Safety programs.

• Environmental: (Not in Scope. Responsibility of Chemical Manager)

• All work performed within this scope shall be in accordance with the latest Local, State and Federal statutes and laws.

• Document all testing of facility systems.
• Provide periodic progress reports of scope progress and status. A manager of the ISP other than the on-site manager or supervisor will present this report to the the SERVICE PROVIDER and the OWNER.

• Participate in functional teams and/or committees designed to ensure the OWNER goals on reliability, quality benchmarking, and safety.

• Provide a process for continuous improvement with the introduction new systems, value engineering, and lessons learned and organizational concepts to the OWNER.

• Provide documentation and maintain all processes and process changes.

• ID badges issued by Security will determine identification method of services.

• Licensed in the State of Michigan for Architecture, Structural, Mechanical and Electrical

• All employees will have as a minimum a bachelor degree w/ 3-5 years experience in construction, production and safety. 

• ISP team members may work concurrently with THE OWNER AME to achieve engineering goal.

• Review and approval of RFQ Submittals

• Special attention will be given to maintainability. Engineering designs should address ease and effort to reduce frequency of maintenance.

• Provide Engineering Sub Contractor Unit Fees:
  • Principal
  • Director
  • Engineering Manager
  • Sr. Engineer (Civil, Structural, Architectural, Mechanical, Electrical)
  • Engineer (Civil, Structural, Architectural, Mechanical, Electrical)
  • Surveyor
  • CADD Operator
  • Administrative

END RESULTS/DELIVERABLES
• The Integrated Service Provider will be measured on key performance indicators. It will be the responsibility of the Integrated Service Provider to track its success with each measurable. The tracking system will be supported with criteria defining each measurable to minimize the subjective approach. Measurable to track include but are not limited to;
• Safety – All Integrated Service Provider employees are expected to participate in the facility safety programs, and assist with the development and improvement of safety practices.

• Quality-All product and services will be of the highest quality.

• Delivery-Delivery will be accomplished in a timely manner. At no time should delivery become an excuse for not meeting customer satisfaction.

• Cost-Although cost will be agreed upon when the contract is awarded, the Integrated Service Provider will seek process improvements and procurement opportunities to control and reduce operating cost without any negative impact on quality of product or service.

• Customer Satisfaction-Customer surveys will be one method of measuring the success of this service.

• Environment-The Integrated Service Provider will ensure it complies with all federal, state, local and corporate environmental regulations. You will support and comply with all on-site recycling programs

• Awareness Program - The Integrated Service Provider should implement an awareness program, which will encourage good practices by the employees.

**Equipment and Materials to Be Provided by Service Supplier**

• Six copies of all deliverables in CD and Hard Copy

• The Integrated Service Provider will provide all equipment, tooling, materials, two-way radios, pagers, and supplies to fulfill this SOW. All such equipment shall be clearly identified as Integrated Service Provider owned.

• Integrated Service Provider shall quote cost of equipment and tooling specific to the program specifications. All equipment will be owned by the Integrated Service Provider throughout the term of the contract. All equipment will be operated and maintained by the Integrated Service Provider throughout the term of the contract. The Integrated Service Provider will be responsible for all repairs and/or replacement of equipment without additional cost to THE SERVICE PROVIDER/FSSP or THE OWNER, unless otherwise authorized by THE OWNER.

• The IT Integrated Service Provider will provide all Integrated Service Provider with computers, cellular phones, and PDAs for easy communication with THE OWNER and THE SERVICE PROVIDER/FSSP.

**OTHER CONSIDERATIONS AND EXCEPTIONS**

All Integrated Service Provider activities and personnel shall comply with all the OWNER health and safety requirements.
• Provide clean, matching uniforms for Integrated Service Provider personnel as specified by the OWNER. The uniforms must be clearly marked to permit easy identification of the service being provided. Identification method of services will be determined by ID badges issued by Security.

• Pay all federal, state, and local taxes which may be assessed against its operations, equipment or merchandise while in or upon the premises of the OWNER.

• Comply with all federal, state, and local laws and regulations governing the process and environmental.

• The Integrated Service Provider will obtain and maintain all necessary licenses and permits, and certificated required by law in the performance of this scope of work.

• Maintain an adequate staff for efficient operation. Upon being hired, employees and agents of the contracting company will be subject to the rules and regulations of the OWNER while on the premises.

• The Integrated Service Provider will not hire, or attempt to hire employees of THE OWNER, THE SERVICE PROVIDER/FSSP, or employees of any Integrated Service Provider on-site providing support services to the OWNER's production efforts without the expressed written permission of the contractor, or for a period of six (6) months after the termination of their employment.

• At no time will gas or LP gas power equipment be utilized in the facility.

• **Criminal Background Check** – The contractor will research each employee’s background for criminal records. That research will be a seven-year record and will include any and all counties of residence for the past 7 years. No employee of any contractor will be permitted on the premises with a felony record, without written consent by the GCS. The contractor will notify the GCS of all instances where an employee is assigned to the Dundee facility and has a criminal record including misdemeanors, but excluding driving offenses. The contractor will ensure that the resident history accounts for all period of time for the past 7 years.

• **Drug Test Policy** – Each contractor is required to have a drug testing policy in place. That Drug testing policy will include drug testing prior to working on the OWNER property, and drug testing for any individual involved in a work place accident resulting in personal injury and/or asset damage. The drug testing policy must provide the Service Partner with the right to perform random Drug Test.

• The building equipment may be managed separately of the process equipment and may have a separate service partner if desired to be more efficient by the SERVICE PROVIDER.

• Exhibit K – Engineering Special Conditions

• Changes in the work - shall only be deemed to have occurred if, during the progression of the design, the OWNER or THE SERVICE PROVIDER directs a change that requires new work of a materially different nature, character, scope, or quality, than the original scope criteria indicated and reasonably inferred from the original contract by the design professional recognized as an experienced and prudent design professional. It is recognized by the OWNER or the the SERVICE
PROVIDER that “design changes” are necessary to meet the basic defined business objective & criteria, regulatory or legal requirements, or safety and engineering standards, that were not previously communicated in prior contract documents. Designs will recognize the Design Responsibility Matrix to reference guidelines to measure design output progress and completion. (Appendix D of Design Control Plan).

- Safety shall be the first priority on all jobs. Personal protection planning and implementation shall be considered for all workers on all tasks. Also, consider the safety of other people in your work area.
- When in doubt about the application of any safety rules, the operation of any device or the correct procedure for safe completion of a task, discuss the situation with the Safety supervisor before proceeding.
- It is the responsibility of each Integrated Service Provider and their employees to avoid creating safety hazards both in the condition of the work performed and while doing the work.
- Approved eye protection devices are to be worn by all personnel at all times while on the plant floor.
- Safety shoes, hearing protection, respirators, hard hats and other protective equipment should be worn while working on tasks which present specific hazards and are required by the OWNER or OSHA safety rules and regulations.
- Good housekeeping must be maintained at all times. Integrated Service Provider must keep machines, tools, and work places clean and orderly. Refuse must be placed only in the containers provided for that purpose.
REFERENCE DOCUMENTS

- Exhibit A - Engineering Service Org Chart.PDF
- Exhibit B - Manufacturing Engineer Responsibilities.PDF
- Exhibit C - Engineering Support Process Flow.PDF
- Exhibit D - Design Control Plan
- Exhibit E - EMI, SMI, & MTI Special Conditions
- Exhibit F - Project Engineering Process.PDF
- Exhibit G - Engineering RFI Process Flow.PDF
- Exhibit H - Engineering RFES.PDF
- Exhibit I - Engineering RASCI Matrix.PDF
- Exhibit J - Engineering Special Conditions.PDF
- Exhibit K - Drawing Mgmt Process Flow.PDF
- Exhibit L - Engineering Reproducables.PDF