

## **TUS Athlone\_BMS Maintenance Contract**



### **APPENDIX 2 Pricing Schedule and Summary of Tender**

The following Summary of Tender will be deemed to include for the execution of all works in strict compliance with the specifications, drawings and any other contract documents. All plant and components will be deemed to be exactly as specified.

This Document must be fully completed, signed and returned within the Tender return.

|            |                                                                                                                                                                                                           |   |
|------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---|
| <u>1.0</u> | <b><u>BMS System Maintenance Summary/Pricing Schedule</u></b>                                                                                                                                             |   |
| <u>1.1</u> | <b><u>BMS MAINTENANCE WORKS</u></b>                                                                                                                                                                       |   |
|            | Total cost of annual BMS system maintenance                                                                                                                                                               | € |
| <u>1.2</u> | <b><u>BMS Minor Works</u></b>                                                                                                                                                                             |   |
|            | Total Minor Works (Not an annual requirement as per Section 4 of Specification)                                                                                                                           | € |
| <u>1.3</u> | <b><u>Prelims and Miscellaneous</u></b>                                                                                                                                                                   |   |
|            | Total Prelims and Miscellaneous                                                                                                                                                                           | € |
|            | <b>Total ( Excluding VAT)</b>                                                                                                                                                                             | € |
|            | VAT @                                                                                                                                                                                                     | € |
|            | <b>Total ( Incl VAT)</b>                                                                                                                                                                                  | € |
| <b>2</b>   | <b><u>Supplementary Pricing Information</u></b>                                                                                                                                                           |   |
| 2.1        | Following return of the tender bid and within one week of a request to do so, we shall provide to the ER a complete detailed priced Bill of Quantities substantiating how we arrived at the tender price. |   |
| 2.2        | We confirm that this Bill of Quantities shall form the basis of any pricing additions or omissions throughout the contract.                                                                               |   |
| 2.3        | We confirm that we shall submit to the ER on request, copies of all quotations received in respect of products, equipment, plant items and components for all elements included within the tender.        |   |

Signed : \_\_\_\_\_

For and on behalf of: \_\_\_\_\_

Date: \_\_\_\_\_

## TUS BMS Maintenance Summary of Tender

|              |                                                                                                   |                                 |                      |                       |
|--------------|---------------------------------------------------------------------------------------------------|---------------------------------|----------------------|-----------------------|
| <b>1.0</b>   | <b>BMS System Maintenance Summary</b>                                                             |                                 |                      |                       |
| <b>1.1.0</b> | <b>BMS MAINTENANCE WORKS</b>                                                                      |                                 |                      |                       |
|              | <b>Item</b>                                                                                       | <b>Allocated Resource Hours</b> | <b>Resource Rate</b> | <b>Total Amount €</b> |
| <b>1.1.0</b> | <b>BMS MAINTENANCE WORKS</b>                                                                      |                                 |                      |                       |
| 1.1.1        | BMS Planned Preventative Maintenance (min Twice yearly all plant)                                 |                                 |                      |                       |
|              | _ Main Campus Building incl Library and Business Studies                                          |                                 | €                    | €                     |
|              | _ Main Campus Energy Centre                                                                       |                                 | €                    | €                     |
|              | _ Hotel and Tourism Building                                                                      |                                 | €                    | €                     |
|              | _ Engineering Building                                                                            |                                 | €                    | €                     |
|              | _ International Arena Building                                                                    |                                 | €                    | €                     |
|              | _ Multipurpose Hall                                                                               |                                 | €                    | €                     |
|              | _ Trades Building                                                                                 |                                 | €                    | €                     |
|              | _ Research Hub                                                                                    |                                 | €                    | €                     |
|              | _ Nurses Building                                                                                 |                                 | €                    | €                     |
|              | _ Midland Innovation & Research Centre                                                            |                                 | €                    | €                     |
|              | _ APT Building                                                                                    |                                 | €                    | €                     |
|              |                                                                                                   |                                 |                      |                       |
| 1.1.2        | Science Laboratory Ventilation System Validation maintenance and inspection visits (Twice yearly) |                                 | €                    | €                     |
| 1.1.3        | BMS System modifications / energy efficiency measures                                             |                                 | €                    | €                     |
| 1.1.4        | BMS System Remote Support and Assistance                                                          |                                 | €                    | €                     |
| 1.1.5        | To complete upgrades to front end operators terminal including updated software and graphics      |                                 | €                    | €                     |
| 1.1.6        | To complete upgrades to front end operators terminal including updated software and graphics      |                                 | €                    | €                     |
| 1.1.7        | To complete maintenance of BMS IT Infrastructure                                                  |                                 | €                    | €                     |
| 1.1.8        | To complete provision of Spares as outlined within specification sections 3.7, 3.8, 3.9           |                                 | €                    | €                     |
|              |                                                                                                   |                                 |                      |                       |
|              |                                                                                                   |                                 |                      |                       |

## TUS BMS Maintenance Summary of Tender

|       |                                                         |                                         |                      |                       |
|-------|---------------------------------------------------------|-----------------------------------------|----------------------|-----------------------|
| 1.0   | <b>BMS System Maintenance Summary</b>                   |                                         |                      |                       |
| 1.1.0 | <b>BMS MAINTENANCE WORKS</b>                            |                                         |                      |                       |
|       | <b>Item</b>                                             | <b>Allocated<br/>Resource<br/>Hours</b> | <b>Resource Rate</b> | <b>Total Amount €</b> |
|       |                                                         |                                         |                      |                       |
| 1.1.0 | <b>Sub - Total Maintenance ; Carry to Summary Sheet</b> |                                         |                      | <b>€</b>              |

The Tenderer must indicate their total annual estimated resource hours for each building. The tender shall be fixed with no provisions for the Tendering Contractor to claim additional hours where they have underestimated the scope of works required. The Client may choose to defer "systems maintenance" to some buildings to year 2 subject to costs and priorities

## TUS BMS Maintenance Summary of Tender

|                                                                                                                                                                                                                                                     |                                                                                                                                                         |                                 |                      |                       |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------|----------------------|-----------------------|
| <b>1.0</b>                                                                                                                                                                                                                                          | <b>BMS System Maintenance Summary</b>                                                                                                                   |                                 |                      |                       |
| <b>1.2.0</b>                                                                                                                                                                                                                                        | <b>BMS Minor Works</b>                                                                                                                                  |                                 |                      |                       |
|                                                                                                                                                                                                                                                     | <b>Item</b>                                                                                                                                             | <b>Allocated Resource Hours</b> | <b>Resource Rate</b> | <b>Total Amount €</b> |
| <b>1.2.0</b>                                                                                                                                                                                                                                        | <b>BMS MINOR WORKS</b>                                                                                                                                  |                                 |                      |                       |
| 1.2.1                                                                                                                                                                                                                                               | To complete provision of components and equipment as outlined within specification sections 4.4                                                         |                                 | €                    | €                     |
|                                                                                                                                                                                                                                                     |                                                                                                                                                         |                                 |                      |                       |
| 1.2.2                                                                                                                                                                                                                                               | To complete provision of associated panel modifications                                                                                                 |                                 | €                    | €                     |
| 1.2.3                                                                                                                                                                                                                                               | To complete provision of associated software engineering                                                                                                |                                 | €                    | €                     |
| 1.2.4                                                                                                                                                                                                                                               | To complete provision of associated software engineering                                                                                                |                                 | €                    | €                     |
| 1,2,5                                                                                                                                                                                                                                               | To complete updates to front end operators terminal including updated graphics 30% of entire graphics to be redesigned and upgraded per 12 month period |                                 | €                    | €                     |
|                                                                                                                                                                                                                                                     |                                                                                                                                                         |                                 |                      |                       |
| 1.2.6                                                                                                                                                                                                                                               | To complete provision of Asset Registers as outlined within specification sections 4.5                                                                  |                                 | €                    | €                     |
|                                                                                                                                                                                                                                                     |                                                                                                                                                         |                                 |                      |                       |
| 1.2.0                                                                                                                                                                                                                                               | <b>Sub - Total Minor Works; Carry to Summary Sheet</b>                                                                                                  |                                 |                      | €                     |
| <p>The tender shall be fixed with no provisions for the Tendering Contractor to claim additional hours where they have underestimated the scope of works required. The Client may choose to defer "minor works" subject to costs and priorities</p> |                                                                                                                                                         |                                 |                      |                       |

## TUS BMS Maintenance Summary of Tender

|              |                                                                                                                                                                      |               |
|--------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------|
| <b>1.0</b>   | <b>BMS System Maintenance Summary</b>                                                                                                                                |               |
| <b>1.3.0</b> | <b>Prelims and Miscellaneous</b>                                                                                                                                     |               |
|              |                                                                                                                                                                      |               |
|              | <b>Item</b>                                                                                                                                                          | <b>Amount</b> |
| 1.3.1        | Preliminaries and Insurances                                                                                                                                         | €             |
| 1.3.2        | To complete provision of "As-Configured" Systems descriptions                                                                                                        | €             |
| 1.3.3        | To complete provision of Maintenance Records documentation including updating of Operation and Maintenance Manuals, site reports, certification etc.,                | €             |
| 1.3.4        | To complete support Including the refresher training of TUS estates & Science technican staff in the correct and safe use of the laboratory ventilation installtions | €             |
| 1.3.5        | To complete support Including the refresher training of TUS estates technican staff in the use of the BMS systems to maximise efficiencies                           | €             |
| 1.3.6        | To complete provision of all related to Health and Safety, RAMS, PSCS etc.                                                                                           | €             |
| 1.3.7        | To complete provision of Contract Management and support incl administration                                                                                         | €             |
| 1.3.8        | To complete attendance at review meetings                                                                                                                            | €             |
|              |                                                                                                                                                                      |               |
|              |                                                                                                                                                                      |               |
|              |                                                                                                                                                                      |               |
|              |                                                                                                                                                                      |               |
| 1.3.0        | <b>Sub - Total Prelims &amp; Misc ; Carry to Summary Sheet</b>                                                                                                       | € -           |

## TUS BMS Maintenance Summary of Tender

**Schedule of Rates**

The following rates shall be applied to the extra-over works or components requiring replacement during the maintenance period. (all costs shall be supply and commission rates)

|              | Item                                              | Quantity | Rate | Amount |
|--------------|---------------------------------------------------|----------|------|--------|
| <b>2.0.1</b> | <b>System Controllers</b>                         |          |      |        |
|              | Cylon UC32 universal controller replacement       | 4        | €    | €      |
|              | Fume Extract Cupboard Controllers (CMR)           | 2        | €    | €      |
|              |                                                   |          |      |        |
| <b>2.0.2</b> | <b>Field Devices</b>                              |          |      |        |
|              | Wall Mounted Temperature Sensor                   | 6        | €    | €      |
|              | Duct Temperature Sensor                           | 6        | €    | €      |
|              | Immersion Temp Sensor c/w pocket                  | 6        | €    | €      |
|              | Frost Stat                                        | 6        | €    | €      |
|              | Wall Mounted CO2 Sensor                           | 6        | €    | €      |
|              | Differential Pressure Switch (airflow monitoring) | 12       | €    | €      |
|              | Valve Actuator (valves up to 50mm)                | 6        | €    | €      |
|              | Valve Actuator (valves up to 150mm)               | 2        | €    | €      |
|              | Damper Actuator (dampers up to 1.0m2)             | 2        | €    | €      |
|              | Damper Actuator (dampers up to 4.0m2)             | 2        | €    | €      |
| <b>2.0.3</b> | <b>Valves</b>                                     |          |      |        |
|              | LTHW Valves up to 22mm                            | 2        | €    | €      |
|              | LTHW Valves up to 50mm                            | 2        | €    | €      |
|              | LTHW Valves up to 100mm                           | 2        | €    | €      |

## TUS BMS Maintenance Summary of Tender

|                                                                                                                                                                                                                                                                                          |                                                                                          |   |              |          |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------|---|--------------|----------|
| <b>2.0.4</b>                                                                                                                                                                                                                                                                             | <b>Other Components</b>                                                                  |   |              |          |
|                                                                                                                                                                                                                                                                                          | Variable Speed Drive (up to 2.0kW)                                                       | 1 | €            | €        |
|                                                                                                                                                                                                                                                                                          | Variable Speed Drive (up to 5.0kW)                                                       | 1 | €            | €        |
|                                                                                                                                                                                                                                                                                          |                                                                                          |   |              |          |
| <b>2.0.5</b>                                                                                                                                                                                                                                                                             | <b>Other Components</b>                                                                  |   |              |          |
|                                                                                                                                                                                                                                                                                          | Contractors % mark-up on components or equipment not listed above. Value < €2,500 ex VAT | % | €            | €        |
|                                                                                                                                                                                                                                                                                          | Contractors % mark-up on components or equipment not listed above. Value > €2,500 ex VAT | % | €            | €        |
|                                                                                                                                                                                                                                                                                          |                                                                                          |   |              |          |
|                                                                                                                                                                                                                                                                                          |                                                                                          |   | <b>Total</b> | <b>€</b> |
|                                                                                                                                                                                                                                                                                          |                                                                                          |   |              |          |
| <p>The rates above are for extra over-works or components requiring replacement during the maintenance period but will NOT be included in the CONTRACT SUM.</p>                                                                                                                          |                                                                                          |   |              |          |
| <p>Where an item or component is not listed above and is deemed necessary or becomes required during the service contract, the client reserves the right to seek alternative cost proposals for the supply of required components as a verification of the contractors quoted rates.</p> |                                                                                          |   |              |          |

## TUS BMS Maintenance Summary of Tender

**Hourly Rates**

The following rates shall only be applied to the extra-over call outs or client requested additional works to be carried out during the maintenance period.

|              | Item                                                   | Notional Hours | Hourly Rate  | Total Amount |
|--------------|--------------------------------------------------------|----------------|--------------|--------------|
| <b>2.1.1</b> | <b>Hourly Rates</b>                                    |                |              |              |
|              | Charge for Call Outs                                   |                |              | €            |
|              | Call Out Rate per Hour on Site (additional to 4 hours) |                |              | €            |
|              |                                                        |                |              |              |
|              |                                                        |                |              |              |
| <b>2.1.2</b> | <b>Hourly Rates (System Modifications)</b>             |                |              |              |
|              | Controls Engineer (Software)                           | 20             | €            | €            |
|              | Controls Engineer (Commissioning)                      | 40             | €            | €            |
|              | Panel Technician ( Panel Modifications)                | 40             | €            | €            |
|              | Project Manager                                        | 15             | €            | €            |
|              | Contracts Manager                                      | 10             | €            | €            |
|              |                                                        |                |              |              |
| <b>2.1.3</b> | <b>Hourly Rates (Reactive Maintenance)</b>             |                |              |              |
|              | Controls Engineer (Software)                           | 20             | €            | €            |
|              | Controls Engineer (Commissioning)                      | 40             | €            | €            |
|              |                                                        |                |              |              |
|              |                                                        |                |              |              |
|              |                                                        |                | <b>Total</b> | <b>€</b>     |

The rate included by the tenderer shall be for an appropriately skilled engineer and shall be inclusive of travel and any other overhead costs.

The quantity of hours are notional hours and only be applied to the extra-over call outs or client requested additional works to be carried out during the maintenance period but will NOT be included in the CONTRACT SUM.

## TUS BMS Maintenance Summary of Tender

| Confirmed Schedule of Manufacturers and Supplies for all equipment included within the Tender<br>(Failure to Complete will invalidate the tender) |                                             |
|---------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------|
| Item                                                                                                                                              | Offered By Contractor as included in Tender |
| <b>Field Devices</b>                                                                                                                              |                                             |
| Sensors (Temp etc)                                                                                                                                |                                             |
| C02 Sensors                                                                                                                                       |                                             |
| Valve Actuators                                                                                                                                   |                                             |
| Damper Actuators                                                                                                                                  |                                             |
| LTHW Valves                                                                                                                                       |                                             |
| Variable Speed Drives                                                                                                                             |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
| <b>Other Items (Contractor to list)</b>                                                                                                           |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
|                                                                                                                                                   |                                             |
| <b>Other Items (Contractor to list)</b>                                                                                                           |                                             |
| <p>Signed : _____</p> <p>For and on behalf of: _____</p> <p>Date: _____</p>                                                                       |                                             |