**BUILDING**

Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Type: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ # of floors: \_\_\_\_\_\_\_\_\_ GSF: \_\_\_\_\_\_\_\_\_sqft

***Ceiling & Wall Insulation***

***Walls & Exterior Covering***

***Windows***

|  |  |
| --- | --- |
|  | White Reflective |
|  | Other color:\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Vegetative |
|  | Insulation – inside ceiling |
|  | Insulation – outside on roof |
|  | Insulation thickness:\_\_\_\_\_\_\_ |
|  | Total R-rating:\_\_\_\_\_\_\_\_\_\_\_\_ |

**BUILDING ENVELOPE**

***Roof System***

|  |  |
| --- | --- |
|  | Brick exterior |
|  | Other:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Wall Construction:\_\_\_\_\_\_\_\_ |

|  |  |
| --- | --- |
|  | Fiberglass |
|  | Cellulose |
|  | Other:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

|  |  |
| --- | --- |
|  | Single Pane Glass |
|  | Double Pane Glasses |
|  | Glazing (in.)\_\_\_\_\_\_\_\_ |
|  | Caulking |
|  | U-factor:\_\_\_\_\_\_\_\_\_\_ |

|  |  |
| --- | --- |
|  |  |
|  |  |
|  |  |

**↑.4**

**Double pane**

**↑1.25**

**Single pane**

0

I 25%

0

**↑**10

**↑**20

**↑0.15**

**Low E**

**Triple pane**

I 25%

**U-factors**

**Insulation R-values**

**BUILDING AUTOMATION SYSTEMS**

***Outside Air – Air Exchange per Hour***

|  |  |
| --- | --- |
|  | None |
|  | Stand Alone System |
|  | Connected to Pre-existing System |

|  |  |
| --- | --- |
|  | Capable of non-occupied setbacks |
|  | Programmable Thermostats |
|  | Programmable Lighting Schedule |

|  |  |
| --- | --- |
|  | Occupied Conditions: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Unoccupied Conditions: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

**HVAC SYSTEMS**

***Cooling***

***Heating***

***Reheat Method***

***Configuration***

|  |  |
| --- | --- |
|  | Boiler(s) |
|  | Electric – heat strips only |
|  | Heat Pump(s) – electric heat strips |
|  | Hot water & boiler efficiency\_\_\_\_\_\_\_ |
|  | Natural Gas |
|  | Vent-less Fireplace |

|  |  |
| --- | --- |
|  | Chiller(s)\_\_\_\_\_\_\_\_\_Tonnage, Qty:\_\_\_\_\_\_ |
|  | Direct Expansion (DX) unit(s) |
|  | Economizer Method\_\_\_\_\_\_\_\_\_\_\_ |
|  | Heat Recovery Method\_\_\_\_\_\_\_\_\_ |
|  | Server Rooms – stand alone cooling  ***Outside Air*** |

|  |  |
| --- | --- |
|  | Centralized |
| ***Air Volume*** | Decentralized |

|  |  |
| --- | --- |
|  | Steam |
|  | Hot water |
|  | Electricity |

|  |  |
| --- | --- |
|  | Constant |
|  | Variable |

|  |  |
| --- | --- |
|  | Design percentage: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Minimum required for type of Occupancy:\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

|  |  |
| --- | --- |
|  | Exhaust attic space |

|  |  |
| --- | --- |
|  | Design reviewed by UAB CAMS committee |

**LIGHTING SYSTEMS**

***Interior Lighting***

***Exterior Lighting***

|  |  |
| --- | --- |
|  | Fluorescent T8: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg interior lighting |
|  | LED: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg interior lighting |
|  | Incandescent: \_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg interior lighting |
|  | Exit Lights – LED |
|  | Timers for light switches in electrical and machine rooms |

|  |  |
| --- | --- |
|  | Fluorescent T8: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg exterior lighting |
|  | LED: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg exterior lighting |
|  | Incandescent: \_\_\_\_\_\_\_\_\_\_\_\_\_\_% of bldg exterior lighting |
|  | Photo-cell controlled |
|  | Timer controlled |

***Occupancy Sensors: \_\_\_\_\_\_\_\_\_\_% of building***

|  |  |
| --- | --- |
|  | Corridors (with exception to Egress lighting) |
|  | Restrooms |

|  |  |
| --- | --- |
|  | Common Areas (Conference rooms, break rooms, copier rooms, closets, storage, etc.) |
|  | Offices |

**WATER**

******

|  |  |  |
| --- | --- | --- |
| Irrigation | Yes | No |
| Sewer credit meter(s) possible | Yes | No |
| Rain Water Collection System | Yes | No |
| AHU Fin Water Condensate System | Yes | No |
| Steam Condensate Return System | Yes | No |

|  |  |
| --- | --- |
|  | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_­­­­\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |

**UTILITY SUB-METERING** **PROJECTED ANNUAL ENERGY USAGE**

**Projected annual energy cost: $\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Projected annual energy cost/sqft: $\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

|  |  |
| --- | --- |
|  | Electricity |
|  | Natural Gas |
|  | Steam |
|  | Chilled Water |
|  | Domestic Water |
|  | Steam Condensate |

|  |  |
| --- | --- |
|  | Electricity (kWh): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Natural Gas (MCF): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Steam (MLB): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |
|  | Chilled Water (MMBTU): \_\_\_\_\_\_\_\_\_\_\_ |
|  | Domestic Water (CCF): \_\_\_\_\_\_\_\_\_\_\_\_ |

*Per UAB Facility Standard 15000.3 “System designs shall meet or exceed the energy utilization requirements of ASHRAE90.1 latest edition. The plans and/or specifications shall demonstrate compliance to ASHRAE90.1” Peer building data to be provided by UAB Energy Management Department.*

**Comparative Peer Building(s): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Comparative Peer Building(s) $/GSF: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_/year**

**On the following graphs, Mark (X) to show %’s for less usage and Energy Star Rating for this building:**

Design criteria: 20% less usage for similar existing UAB peer building (10% minimum) **Energy Star Rating**

0%

I 25%

*0%*

**↑**100%

I 25%

**↑**50%

**↑**25%

**↑**75%

**↑**20%

**↑**10%

**\_\_\_\_\_\_\_% less usage**

Additional items:

**SITE HYDROLOGY**

* **Quality improvement on site?**
* **Delays in outflow?**
* **% Volume reduction \_\_\_\_\_\_\_\_\_\_\_\_\_**
* **What is the overall project goal for stormwater handling? \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**LANDSCAPE & HARDSCAPE**

* **Has the site been evaluated for heritage trees and for valuation of trees to be removed?**
* **% of outdoor space shaded by structures and/or mature tree canopy \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**
* **Zoning of irrigation systems by plant water use**
* **Solar reflectance of hardscape materials (list each)**

**MULTIMODAL TRANSPORTATION**

* **Pedestrian and cyclist route mapped from building to nearest Blazer Express stop**
* **Number of bike racks and location(s) on site \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**INTERIOR LIGHTING**

* **Innovative elements (daylighting, daylight sensors, etc), describe: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**ACTIVE DESIGN**

* **% of sq ft with quality views**
* **Prominent stairwells?**

**WATER**

* **Greywater collection?**
* **Groundwater collection?**
* **Hands-free faucets?**
* **Dual-flush toilets?**
* **Water filling stations (number and location)?**

**AIR QUALITY MANAGEMENT PLAN**

* **Indoor Air Quality Management Plan submitted to Project Manager?**
* **Length of off-gassing period before occupancy?**

**RECYCLING**

* **Number and location of combined waste and recycling groupings**

**SUPPLY CHAIN**

* **List notable items—sustainably sourced and/or responsible supplier**

**CONSTRUCTION WASTE MANAGEMENT**

* **Recycling plan submitted to Project Manager?**
* **Final quantities submitted to Project Manager?**