Lighting System Integration Topology

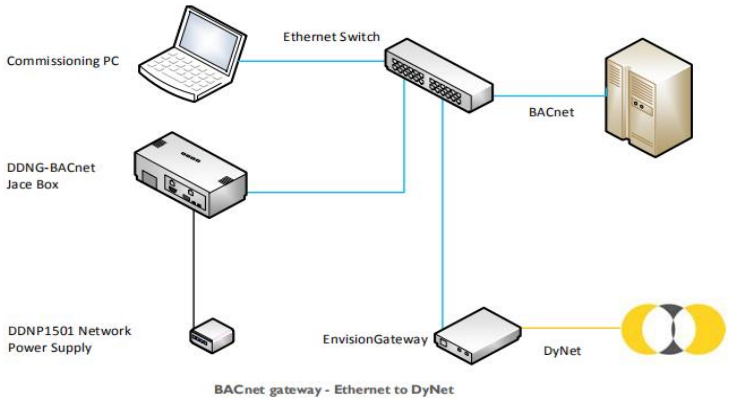
Project: [redacted]

Part 1: Number of Devices to be integrated

Device	49F	53F	55F	Subtotal
1. DALI Devices:				
DDBC320-DALI	1	2	2	**5**
DDBC120-DALI			1	**1**
DALI Net Channel	3	6	7	**16**
DALI Lamp	TBD	TBD	TBD	**TBD**
2. Dynalite Devices				
DDRC1220FR-GL	1	4	3	**8**
DDRC420FR			1	**1**
DUS360CR	6	39	48	**93**
PA6BPA	3	16	19	**38**
3. Gateway Planned				
Philips DDNG-BACnet Controller		1		**1**
Philips PDEG – Ethernet Gateway	1	1	1	**3**

Notes:
1. The phase I plan is to integrate and keep the points in Read type.
2. The lighting system points incl:
   a. Sensor lux value & occupancy
   b. I/O channel status
   c. Ballast/device status
   d. Scene number per area
   e. Any points that are supported by Philips DDNG-BACnet gateway

Part 2: System Topology



BACnet gateway - Ethernet to DyNet

Notes:
1. Philips JACE8000 running Niagara Framework & its Philips Dynalite license are required.
2. All floor Dynalite devices will be lined up to Floor level Philips Envision ethernet gateway.
3. JACE8000 will integrate data points from floor envision gateway via lighting ethernet work.
4. Simple Web GUI to be developped in JACE8000, i.e. area light status, occupancy & lux level, alarm, history, etc.
5. The JACE8000 has two ethernet ports. One could be connected into client's intranet and one for lighting network.
6. The JACE8000 can be further integrated into clients Niagara supervisor at its HQ so that critical alarms can be well routed and monitored.
7. Other devices such as electric meters or IT data center SNMP devices (UPS, CRAC, water leakage, etc) and AV system can be well connected with the IoT hub JACE8000.