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# KARL STORZ ENDOSCOPY-AMERICA

## STAFFORD, TEXAS



## TYPICAL HOSPITAL CITY, STATE Room Number

# FACILITY REQUIREMENTS

## OR1® NEO - IP (MRI) SERIES SYSTEM

**REVS NOTES:**  
0. INITIAL RELEASE

**DRAWING ACCEPTANCE SIGN OFF**

Customer or customer's representative has reviewed and approved the drawings which will be used as the basis for the conduit and electrical requirements for installation of the Karl Storz Integration Equipment.

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TITLE: \_\_\_\_\_ DATE: \_\_\_\_\_

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TYPICAL HOSPITAL - CITY, STATE  
OR1® NEO - IP (MRI) SERIES SYSTEM  
FACILITY REQUIREMENTS:  
COVER SHEET

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| REVISIONS:        | DATE:     |
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| △ REV. 0          | 3/31/2022 |
| (INITIAL RELEASE) |           |
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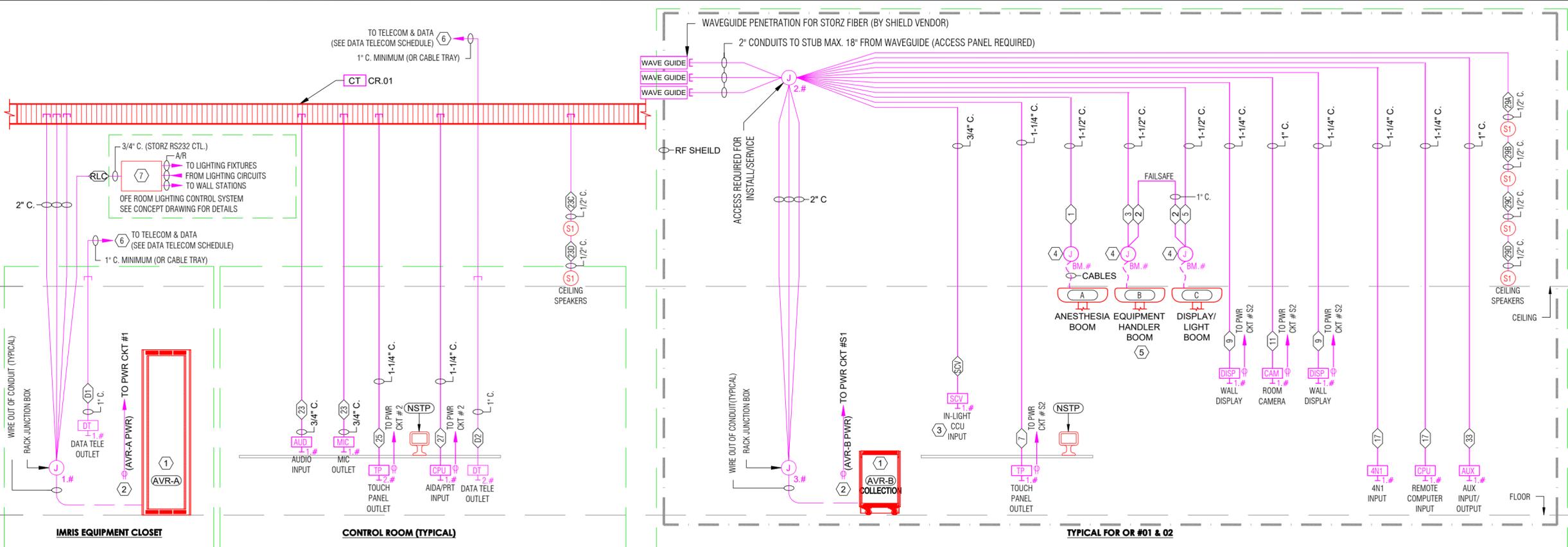
**DRAWN BY:** S.SATRE  
**ENG. BY:**  
**DATE:** 2/22/2021  
**FILE NAME:** GENERIC IMRI  
**PLT SC:** N.T.S

**AVIP:** 20180502  
**CHK. BY:** \_\_\_\_\_ **DATE:** \_\_\_\_\_

**JOB NO.**  
**GENERIC**

**DRAWING NUMBER**  
**AV.MRI.**  
**6.0.0**  
**01 OF 07**

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**NOTE:**  
1. DEDICATED 4 mm<sup>2</sup> - 6 mm<sup>2</sup>, MAX. Ø 5.9 mm GROUND WIRE FROM GROUND PANEL TO A/V RACK PROVIDED BY C.C. (NOT STORZ).  
2. A/V EQUIPMENT REQUIRES ADEQUATE AIR EXCHANGE PASSIVE OR ACTIVE FOR NOMINAL TEMPERATURE OF 90° FAHRENHEIT.

**NOTE:**  
ALL A/V POWER CIRCUITS INSIDE THE SHIELDED IMRI ROOM TO BE SWITCHED THROUGH SWITCHES/ CONTACTORS

**JUNCTION BOX SCHEDULE**

| J-BOX # | SIZE                       | TYPE (NOTE 1 BELOW)                               | MOUNTING/COMMENT (NOTE 2 BELOW)                        |
|---------|----------------------------|---|--|
| CT-CR1  | 12"W X 2"D X " L           | CABLE TRAY, LENGTH AS REQUIRED, 9" RUNG MINIMUM   | ABOVE CEILING (NOTE 3)                                 |
| J-1.#   | 24" X 24" X 4" D (MINIMUM) | NEMA 1, SCREW COVER, EQUAL TO HOFFMAN A-SE SERIES | WALL, FLUSH, SIZE ACCORDING TO CONDUITS REQUIREMENTS   |
| J-2.#   | 24" X 24" X 4" D           | NEMA 1, SCREW COVER, EQUAL TO HOFFMAN A-SE SERIES | ABOVE CEILING, SIZE ACCORDING TO CONDUITS REQUIREMENTS |
| J-3.#   | 24" X 24" X 4" D           | NEMA 1, SCREW COVER, EQUAL TO HOFFMAN A-SE SERIES | WALL, FLUSH, SIZE ACCORDING TO CONDUITS REQUIREMENTS   |
| J-BM.#  | 8" X 8" X 4" D             | NEMA 1, SCREW COVER, EQUAL TO HOFFMAN A-SE SERIES | ABOVE CEILING, ADJACENT TO BOOM                        |

**JUNCTION BOX SCHEDULE NOTES:**  
1. ALL BOXES AND COVER PLATES ARE PROVIDED BY THE CLIENTS CONTRACTOR UNLESS NOTED OTHERWISE.  
2. MOUNTING REQUIREMENTS SHOWN ARE THE DEFAULT REQUIREMENTS UNLESS OTHERWISE NOTED/DETAILED.  
3. SEE MRI VENDOR'S DRAWINGS FOR ADDITIONAL CABLE TRAY/WIREWAY INFORMATION.

**POWER & HEAT LOAD SCHEDULE**

| CIRCUIT REF. # | VOLTS   | AMP | DESTINATION                        | LOAD               | ELECT LOAD (WATTS) | HEAT LOAD (BTU) |
|----------------|---------|-----|------------------------------------|--------------------|--------------------|-----------------|
| 1              | 120 VAC | 20  | RECEPTACLE @ A/V RACK AVR-A        | A/V RACK           | 1054.69            | 3598.60         |
| 2              | 120 VAC | 20  | RECEPTACLE @ CONTROL RM (OR #1)    | CTL RM EQ (NOTE 7) | 898                | 3063.98         |
| S1*            | 120 VAC | 20  | RECEPTACLE @ A/V RACK AVR-B (WAVE) | RACK EQUIP         | 640                | 2183.68         |
| S2*            | 120 VAC | 20  | RECEPTACLES @ WALL DISPLAY(S)/NSTP | LCD, NSTP & RM CAM | 898                | 3063.98         |

**POWER SCHEDULE NOTES:**  
1. ALL A/V POWER CIRCUITS MUST COME FROM THE SAME ELECTRICAL PANEL THAT PROVIDES POWER TO THE PATIENT VICINITY OUTLETS, BOOMS AND SERVICE COLUMNS  
2. ALL A/V POWER CIRCUITS ARE TO HAVE FULL SIZE DEDICATED NEUTRALS.  
3. CIRCUITS SHOWN ARE FOR DEDICATED USE WITH STORZ EQUIPMENT ONLY  
4. A/V CIRCUITS SHALL BE ON THE SAME PHASE AND FEED FROM THE SAME ISOLATED POWER PANEL THAT FEEDS ALL THE PATIENTS CRITICAL EQUIPMENT.  
5. CIRCUIT BREAKER TRIP CURVE CHARACTERISTICS SHALL BE EQUAL TO OR GREATER THAN SQUARE-D QOB-HM SERIES.  
6. **NOTE: ALL 'S' CIRCUITS ARE TO BE ROUTED THROUGH POWER SWITCH/CONTACTORS (BY C.C.) FOR TURN OFF DURING MRI DIAGNOSTIC MODE INSIDE MRI OR.**  
7. CIRCUIT CAN BE SHARED WITH CLIENT ELECTRONIC EQUIPMENT. STORZ LOADS SHOWN WITHOUT CLIENT LOADS.

**DATA TELECOM SCHEDULE (CLIENT CABLING BY C.C.)**

| RUN # | LOCATION          | C.C. TO PROVIDE  |
|-------|-------------------|--|
| D1    | DT OUTLET AT RACK | (4) HOSPITAL NETWORK (FOR STORZ NETWK)                   |
| D2    | DT OUTLET AT NSE  | (4) HOSPITAL NETWORK (FOR STORZ NETWK EQUIP/VIDEO CONF.) |

**DATA TELECOM SCHEDULE NOTES:**  
1. CONNECTIONS REQUIRED FOR VIDEOCONFERENCING AND/OR VIDEO STREAMING .

**SHEET NOTES**

- AV EQUIPMENT RACK (AVR): RACK SUPPLIED BY KARL STORZ.
- RACK POWER RECEPTACLE: LOCATED AT AV RACK FOR STORZ RACK POWER AND ASSOCIATED AV EQUIPMENT. RACK RECEPTACLE TO BE PROMINENTLY LABELED 'RACK POWER'.
- BOOM MOUNTED SURGICAL CAMERA: CONDUIT FROM THE SURGICAL CAMERA VIDEO/CONTROL OUTPUTS TO THE COLLECTION RACK IS REQUIRED FOR STORZ INTEGRATION. VERIFY OUTPUT LOCATION WITH SURGICAL CAMERA SUPPLIER.
- BOOM JUNCTION BOXES: MOUNT ADJACENT TO BOOM SUPPORT STRUCTURE. PROVIDE CEILING ACCESS BELOW BOXES IF CEILING SPACE AT BOX LOCATION IS INACCESSIBLE AFTER FINISHED CEILING IS INSTALLED. SEE BOOM JUNCTION BOX DETAIL.
- POWER CIRCUITS AND RECEPTACLES IN EQUIPMENT HANDLER BOOMS: STORZ EQUIPMENT TYPICALLY REQUIRES (2)20A, 120VAC CIRCUITS WITH (4) RECEPTACLES EACH. SEE BOOM SUPPLIER DRAWINGS FOR ELECTRICAL REQUIREMENTS AT BOOMS.
- DATA/TELEPHONE BOX: DATA AND TELECOM CONNECTIVITY REQUIRED FOR STORZ INTEGRATION. PROVIDE SUITABLE IDENTIFICATION LABELS. SEE TELECOM/DATA SCHEDULE FOR REQUIREMENTS.
- OFF ROOM LIGHTING CONTROL SYSTEM: CONDUIT FROM THE ROOM LIGHTING CONTROL UNIT TO THE COLLECTION RACK IS REQUIRED FOR STORZ INTEGRATION. VERIFY RS232 CONTROL PORT LOCATION WITH CLIENT CONTRACTOR(NOT STORZ).

**GENERAL NOTES & ABBREVIATIONS**

- GENERAL NOTES:**  
1. THESE DRAWINGS ARE FOR REQUIREMENTS REFERENCE ONLY. NOT FOR CONSTRUCTION.  
2. SUPPLY AND INSTALLATION OF ALL CONDUIT, POWER CIRCUITS, BACK BOXES, ELECTRICAL DEVICES, ELECTRICAL WIRING IS TO BE PROVIDED BY THE CLIENTS ELECTRICAL CONTRACTOR UNLESS NOTED OTHERWISE.  
3. C.C. TO PROVIDE ADEQUATE VENTILATION FOR NOMINAL A/V EQUIPMENT TEMPERATURE OF 90° FAHRENHEIT.
- GENERAL CONDUIT & BOX NOTES**  
1. C.C. TO PROVIDE BLANK COVER PLATES FOR ALL JUNCTION BOXES.  
2. CC. TO PROVIDE CABLE PROTECTION BUSHINGS ON ALL BOXES AND CONDUIT STUB-OUTS.  
3. ALL CONDUIT TO BE MINIMUM 3/4" METALLIC U.N.O.  
4. MAXIMUM LENGTH FOR FLEX CONDUIT IF USED FOR STORZ A/V CABLING IS 25 FEET.  
5. EXTRA PULL BOX IS REQUIRED AFTER BENDS TOTAL 270°  
6. CONDUITS TO BE DE-BURRED, CLEANED, CAPPED, AND FURNISHED WITH NYLON PULL ROPE.  
7. CONDUIT STUB-OUTS, JUNCTION BOXES, AND OUTLETS SHALL BE SUITABLY LABELED FOR IDENTIFICATION OF FUNCTION, J-BOX #, AND/OR CONDUIT NUMBER.
- ABBREVIATIONS:**  
A.F.F. = ABOVE FINISHED FLOOR  
A/R = AS REQUIRED  
B.C.P. = BLANK COVER PLATE  
B.F.C. = BELOW FINISHED CEILING  
C.C. = CLIENTS CONTRACTOR (NOT BY KARL STORZ)  
C.P. = COVER PLATE  
CRE = CONTROL ROOM EQUIPMENT  
HT. = HEIGHT  
I.P. = ISOLATED PWR. (UNGROUND NEUTRAL PWR)  
NSE = NURSE STATION EQUIPMENT  
NSTP = NURSE STATION TOUCH PANEL  
N/A = NOT APPLICABLE  
N/R = NOT REQUIRED  
N/U = NOT USED  
O.F.E. = OWNER FURNISHED EQUIPMENT  
O.R. = OPERATING ROOM  
RUB = RACK JUNCTION BOX  
S.F. = STERILE FIELD  
T.B.D. = TO BE DETERMINED  
U.N.O. = UNLESS NOTED OTHERWISE

**SYMBOL LEGEND**

| SYMBOL | DESCRIPTION                | BOX (NOTE 1 BELOW)    | MOUNTING/COMMENT   |
|--------|----------------------------|-----------------------|--|
| AP     | CEILING ACCESS PANEL       | (NOTE 3 BELOW)        | FOR REQUIRED ACCESS TO BOXES ABOVE CLG.                                      |
| #      | EQUIPMENT LABEL            |                       | DENOTES EQUIPMENT AT LOCATION SHOWN  |
| #      | CONDUIT OR CABLE RUN #     |                       | CONDUIT/CABLE RUN REFERENCE #  |
| —      | CONDUIT STUB OUT           |                       | CONDUIT STUB OUT WITH BUSHING  |
| J      | JUNCTION BOX               | SEE J-BOX SCHEDULE    | SEE J-BOX SCHEDULE   |
| WW     | WIRE WAY                   | SEE J-BOX SCHEDULE    | SEE J-BOX SCHEDULE   |
| CT     | CABLE TRAY                 | SEE J-BOX SCHEDULE    | SEE J-BOX SCHEDULE   |
| AUD    | AUDIO INPUT BOX            | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, ABOVE COUNTERTOP  |
| AUX    | AUXILIARY INPUT/OUTPUT BOX | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, RECEPTACLE HT.  |
| CAM    | ROOM CAMERA BOX            | 4S, TR-1G, 2G-B.C.P.  | WALL, FLUSH, SEE DETAIL  |
| CPU    | COMPUTER INPUT BOX         | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, RECEPTACLE HT.  |
| DISP   | DISPLAY BOX                | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, SEE DETAIL  |
| DT     | DATA/TELEPHONE BOX         | A/R, TYPICAL 1G       | WALL, FLUSH, RECEPTACLE HT. (NOTE 6)   |
| MFS    | AUXILIARY INPUT BOX        | RACO 263 DATA-BOX     | WALL, FLUSH, RECEPTACLE HT. SEE DETAIL 11                                    |
| MIC    | MICROPHONE BOX             | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, RECEPTACLE HT.  |
| S1     | CEILING SPEAKER            | CUTOUT (PER TEMPLATE) | HOLE CUT IN SHEETROCK BY C.C.(NOT STORZ). CUTOUT TEMPLATE PROVIDED BY STORZ. |
| TP     | TOUCHPANEL BOX             | 4S, TR-1G, 1G-B.C.P.  | WALL, FLUSH, TYPICAL 4" BELOW COUNTERTOP                                     |
| DP     | DUPLEX POWER RECEPTACLE    | A/R, TYPICAL 1G       | WALL, FLUSH, RECEPTACLE HT.  |
| QP     | QUAD POWER RECEPTACLE      | A/R, TYPICAL 2G       | WALL, FLUSH, RECEPTACLE HT.  |

**SYMBOL LEGEND NOTES**

- ALL BOXES AND COVER PLATES ARE PROVIDED BY THE CLIENTS CONTRACTOR UNLESS NOTED OTHERWISE.
  - MOUNTING REQUIREMENTS SHOWN ARE THE DEFAULT REQUIREMENTS UNLESS OTHERWISE NOTED/DETAILED.
  - BOXES/OUTLETS/RECEPTACLES LOCATED ABOVE THE CEILING MUST BE WITHIN 18 INCHES OF THE CEILING AND BE ACCESSIBLE FROM THE SPACE BELOW. CLIENT / C.C. TO PROVIDE SUITABLE CEILING ACCESS PANELS AT DEVICE LOCATIONS. (ACCESS PANELS EQUAL TO WILLIAMS BROS. MODEL WBFR0).
  - 'RECEPTACLE HEIGHT' DENOTES MOUNTING HEIGHT OF REGULAR RECEPTACLES SPECIFIED FOR THIS PROJECT.
  - 'SWITCH HEIGHT' DENOTES MOUNTING HEIGHT OF REGULAR SWITCHES SPECIFIED FOR THIS PROJECT.
  - SEE DATA/TELECOM SCHEDULE FOR CLIENT CABLING REQUIREMENTS.
  - SEE STORZ STREAMCONNECT SYSTEM REQUIREMENTS DRAWINGS FOR CLIENT REQUIREMENTS.
  - SEE STORZ OVERVIEW SYSTEM REQUIREMENTS DRAWINGS FOR CLIENT REQUIREMENTS.
  - C.C. TO SUSPEND SPEAKER ASSEMBLY FROM STRUCTURE ABOVE CEILING.
  - BOX/OUTLET NUMBER: '1.#' FIRST NUMBER DENOTES BOX/OUTLET NUMBER. '#.#' DENOTES ROOM NUMBER.
- BOX TYPES:**  
1G = SINGLE GANG METALLIC BACK BOX (MINIMUM DEPTH 3-1/2").  
2G = 2 GANG METALLIC BACK BOX (MINIMUM DEPTH 3-1/2").  
4G = 4 GANG METALLIC BACK BOX (MINIMUM DEPTH 3-1/2").  
4S = 4" X 4" SQUARE BACK BOX WITH TRIM RING AS NOTED (MINIMUM DEPTH 3-1/2").  
TR-1G = TRIM RING FOR MOUNTING 1 GANG PLATE.  
TR-2G = TRIM RING FOR MOUNTING 2 GANG PLATE.  
#G-B.C.P. = BLANK COVER PLATE, METALLIC, GANG SIZE AS DENOTED BY #.

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TYPICAL HOSPITAL - CITY, STATE  
**OR1® NEO - IP (MRI) SERIES SYSTEM**  
FACILITY REQUIREMENTS:  
**LEGENDS, SCHEDULES & RISERS**

REVISIONS: DATE:  
REV. 0 3/31/2022  
(INITIAL RELEASE)

DRAWN BY: S.SATRE  
ENG. BY:  
DATE: 2/22/2021  
FILE NAME: GENERIC IMRI  
PLT SC N.T.S  
AVIP\_20180502

CHK. BY: DATE:  
JOB NO.  
**GENERIC**  
DRAWING NUMBER  
**AV.MRI.**  
**6.1.1**  
02 OF 07



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**CONCEPTUAL LIGHTING SYSTEM DETAILS**  
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**LIGHTING CONTROL NOTES**

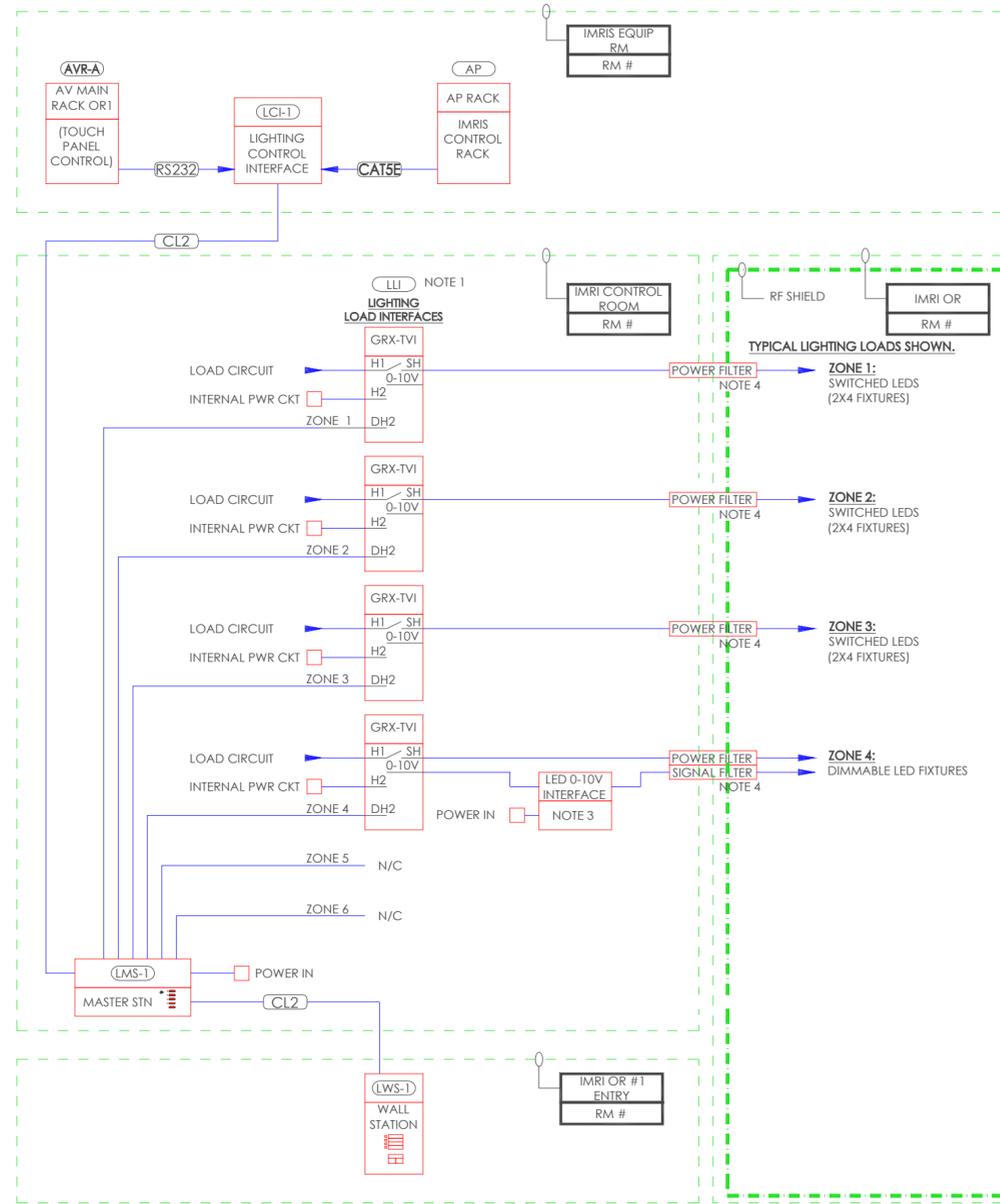
| GENERAL NOTES |   |
|---------------|---|
| G1            | LIGHTING CONTROL CONCEPT SHOWN IS FOR REFERENCE ONLY. THE CLIENT ELECTRICAL ENGINEER IS RESPONSIBLE FOR CONSTRUCTION DOCUMENT DESIGN AND SPECIFICATION OF THE LIGHTING SYSTEM(S) INCLUDING INTEGRATION OF THE STORZ LIGHTING CONTROL SYSTEM.  |
| G2            | THE LIGHTING CONCEPT SHOWS THE GENERAL CONFIGURATION OF COMPONENTS TO ALLOW CONTROL VIA THE IMRIS/ STORZ CONTROL SYSTEMS AND THROUGH INDEPENDENT WALL STATION CONTROL.  |
| G4            | CERTAIN DESIGNATED CONTROL AND INTERFACE COMPONENTS ARE SUPPLIED BY STORZ FOR CLIENT CONTRACTOR (C.C.) INSTALLATION. ALL OTHER LIGHTING SYSTEM COMPONENTS ARE TO BE SUPPLIED BY THE CLIENT/C.C. INCLUDING LIGHTING FIXTURES, LAMPS, BALLASTS, WIRING, ETC.  |
| G5            | CLIENTS ELECTRICAL ENGINEER IS TO SUBMIT A COMPLETED STORZ LIGHTING LOAD SCHEDULE FORM TO STORZ FOR REVIEW. STORZ WILL REVIEW THE INFORMATION FOR THE PROPER LIGHTING INTERFACES(S) BASED ON THE LOAD SCHEDULE AND INFORM THE ENGINEER IF THE STANDARD LIGHTING CONTROL COMPONENTS ARE SUITABLE, OR IF ANY ADDITIONAL INTERFACES ARE REQUIRED. OTHERWISE, THE DEFAULT STANDARD LIGHTING CONTROL PACKAGE WILL BE SUPPLIED. |
| G6            | THE LUTRON COMPONENTS TO BE SUPPLIED BY STORZ ARE FOR 120V/60 HZ POWER SYSTEMS (NORTH AMERICA) ONLY.  |
| G7            | SEE LUTRON SPECIFICATIONS AND INSTALLATION DOCUMENTS FOR ADDITIONAL INFORMATION.  |
| G8            | ALL LIGHTING FIXTURES AND LAMPS INSIDE THE MRI SHIELDED ROOM TO BE MRI COMPATIBLE.  |
| SHEET NOTES   |   |
| NOTE 1        | THE CONCEPT DRAWING SHOWS THE STANDARD LIGHTING CONTROL PACKAGE UNLESS DENOTED OTHERWISE..  |
| NOTE 2        | UP TO A TOTAL OF 6 ZONES MAY BE CONTROLLED FROM THE MASTER STATION . ADDITIONAL POWER INTERFACES MAY BE REQUIRED.   |
| NOTE 3        | LED INTERFACE AND LED FIXTURE SYSTEM TO BE PROVIDED BY C.C.. LED 0-10V INTERFACE TO BE COMPATIBLE WITH LUTRON 0-10V CONTROL SIGNAL .  |
| NOTE 4        | SEE SHIELDING VENDOR DRAWINGS FOR POWER AND SIGNAL FILTERS.   |

**LIGHTING CONTROL EQUIPMENT SCHEDULE**

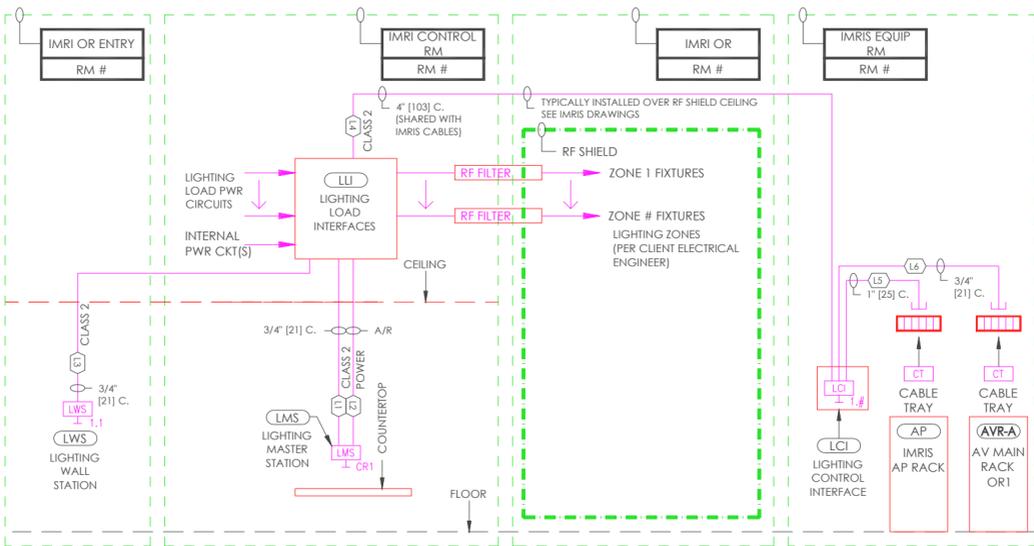
| SYMBOL  | DESCRIPTION  | MAKE/MODEL           | QTY | POWER REQUIREMENTS NORTH AMERICA                             | MOUNTING NOTES   | SUPPLIED BY | INSTALLED BY |
|---------|--|----------------------|-----|--|--|-------------|--------------|
| (LMS#)  | LIGHTING MASTER STATION, (6-ZONE, US)                  | LUTRON GRX-3506-T-WH | 1   | 120VAC, MAX 2000W TOTAL, MAX 800W/ZONE, (ZONE OUT= 0-120VAC) | WALL, FLUSH, 4 GANG US, MIN. 3-1/2" DEEP BACKBOX REQUIRED                  | E.C.        | E.C.         |
| (LWS#)  | LIGHTING WALL STATION, (4 SCENE W/ ON-OFF/RAISE LOWER) | LUTRON SG45N-WH      | 1   | (24VDC FROM LMS)   | WALL, FLUSH, 1 GANG US, MIN 2.75" D, BACK BOX REQUIRED                     | E.C.        | E.C.         |
| (LCI#)  | LIGHTING CONTROL INTERFACE                             | LUTRON GRX-CI-PRG    | 1   | (24VDC FROM LMS)   | WALL, SURFACE, 4" SQUARE BACK BOX, (OR LUT-5X10-ENC IF ENCLOSURE REQUIRED) | E.C.        | E.C.         |
| GRX-TVI | LIGHTING SWITCHING/0-10V INTERFACE                     | LUTRON GRX-TVI       | 4   | H2: 120V, 1A<br>H1: 100-277V/ MAX16A<br>ZONE IN: 0-120V, 40W | WALL MOUNTED, SURFACE, 6.1"Wx12.5"Hx3.3"D [155x318x84 mm]                  | E.C.        | E.C.         |

**LIGHTING CONTROL CABLE SCHEDULE**

| SYMBOL      | DESCRIPTION   | NOTES   | WIRING      |              | CONDUIT     |              |
|-------------|---|---|-------------|--------------|-------------|--------------|
|             |   |   | SUPPLIED BY | INSTALLED BY | SUPPLIED BY | INSTALLED BY |
| (CAT5e)     | CAT5e SHIELDED CABLE, STANDARD PLENUM BLUE                              | IMRIS AP RACK CONTROL   | IMRIS       | E.C.         | E.C.        | E.C.         |
| (CL2)       | 2 #18 AWG [1mm²] CONDUCTORS AND 1 SHIELDED, TWISTED PAIR #18 AWG (1mm²) | LUTRON MUX AND POWER  | E.C.        | E.C.         | E.C.        | E.C.         |
| (RS232)     | 3 #20 AWG [0.518mm²] SHIELDED, TWISTED                                  | STORZ TOUCH PANEL CONTROL   | STORZ       | STORZ        | E.C.        | E.C.         |
| (NO SYMBOL) | ALL POWER WIRING TO BE SPECIFIED BY CLIENT ELECTRICAL ENGINEER          | CONDUIT SIZED BY ELECTRICAL CONTRACTOR AS PER LOCAL ELECTRICAL CODE | E.C.        | E.C.         | E.C.        | E.C.         |



**1** CONCEPT- LIGHTING CONTROL SYSTEM- IMRIS  
SCALE: N.T.S  
NOTES: 1. SEE IMRIS DRAWINGS FOR ADDITIONAL LIGHTING AND POWER CONTROL REQUIREMENTS



**2** CONCEPT- LIGHTING CONTROL CONDUIT- IMRIS  
SCALE: N.T.S  
NOTES: 1. SEE IMRIS DRAWINGS FOR ADDITIONAL LIGHTING AND POWER CONTROL REQUIREMENTS

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| ENG. BY:                |
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| AVIP_20180502           |

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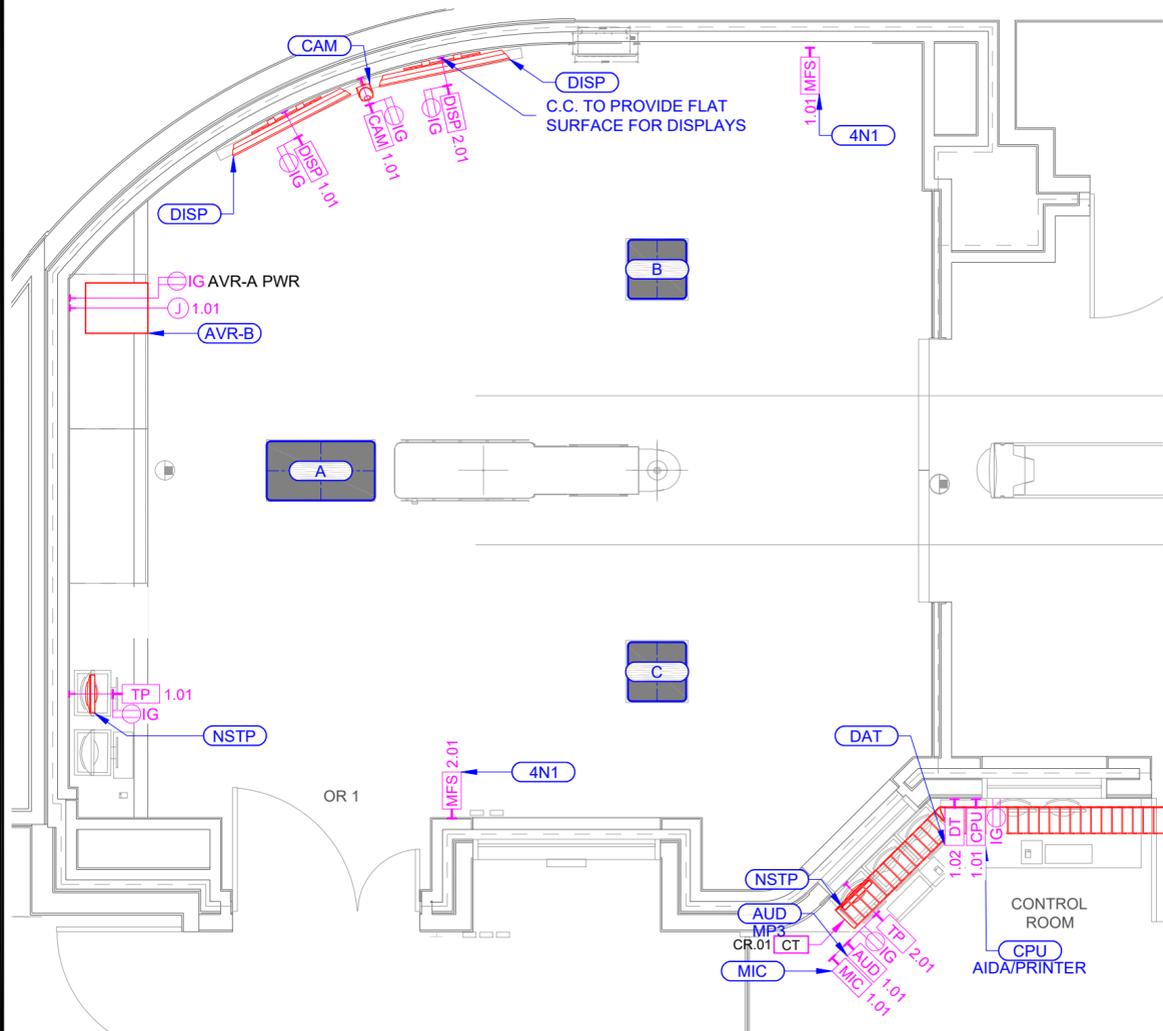
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| JOB NO.        | GENERIC       |
| DRAWING NUMBER | AV.MRI. 6.2.2 |
|                | 04 OF 07      |



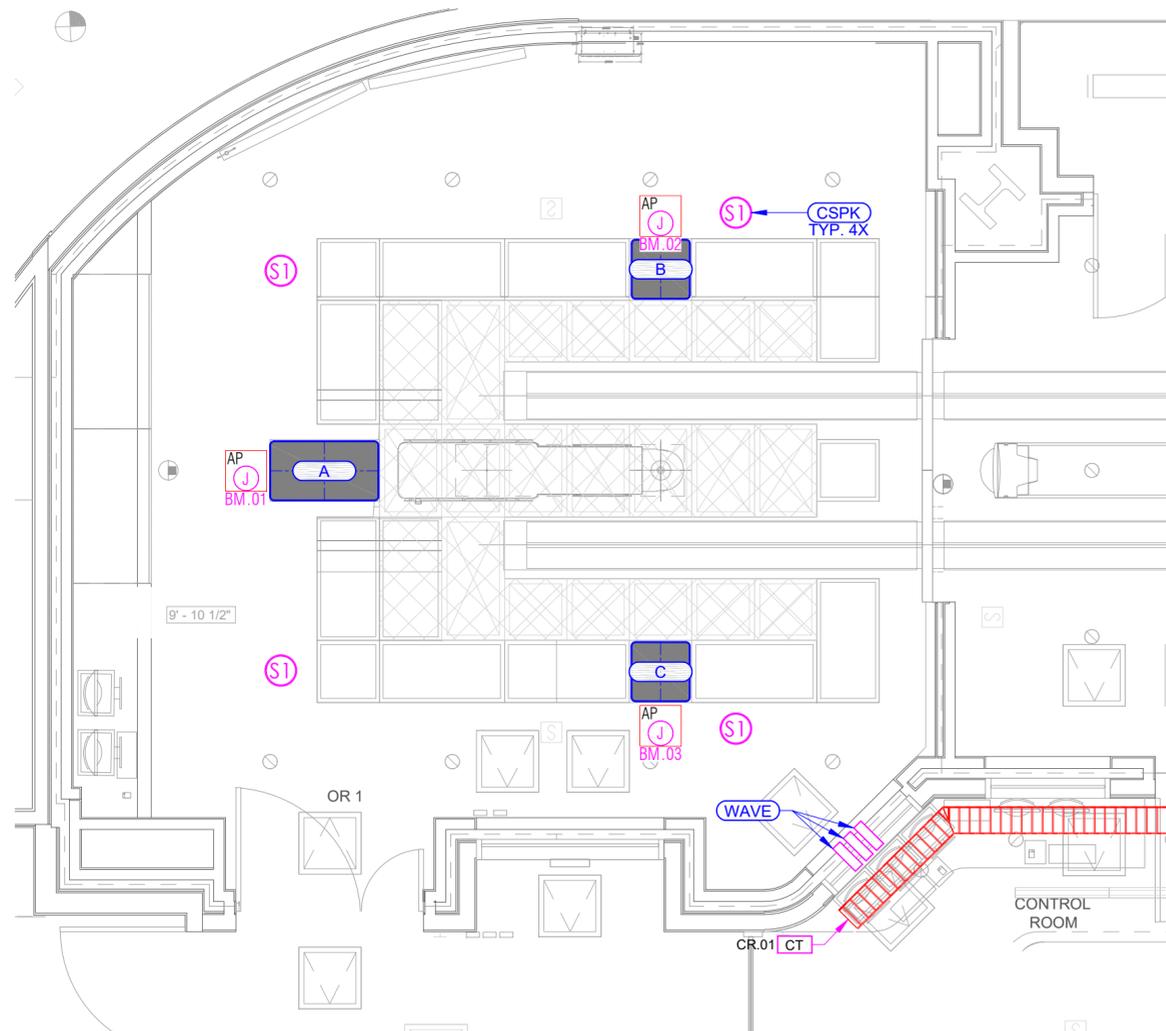
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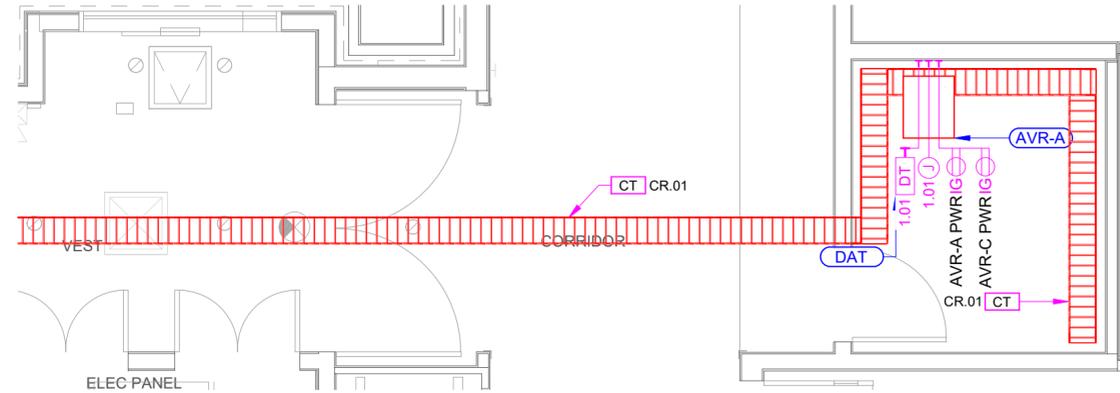
**FOR COORDINATION ONLY - NOT FOR CONSTRUCTION**  
TYPICAL HOSPITAL - CITY, STATE  
OR1® NEO - IP (MRI) SERIES SYSTEM  
FACILITY REQUIREMENTS:  
FLOOR PLAN & RCP - ROOM NUMBER



**1 FLOOR PLAN - ROOM NUMBER**  
SCALE: N.T.S  
BACKGROUND REF.: \*.DWG RECEIVED 00/00/2020



**2 REFLECTED CEILING PLAN - ROOM NUMBER**  
SCALE: N.T.S  
BACKGROUND REF.: \*.DWG RECEIVED 00/00/2020



**3 IMRI EQUIPMENT CLOSET**  
SCALE: N.T.S  
BACKGROUND REF.: \*.DWG RECEIVED 00/00/2020

| A/V EQUIPMENT SCHEDULE |                             |   |   |
|------------------------|-----------------------------|---|---|
| SYMBOL                 | LOCATION/DEVICE             | EQUIPMENT BY STORZ  | EQUIPMENT BY OTHERS   |
| A                      | ANESTHESIA BOOM             | (1) REMOTE COMPUTER(DVI) INPUT PLATE,<br>(1) AUX INPUT 4N1(CV/SV/VGA/DVI) PLATE,<br>(1) AUX INPUT (DVI) PLATE   | VITALS COMPUTER   |
| B                      | EQUIPMENT BOOM              | (1) STORZ CCU INPUT PLATE,<br>(1) AUX INPUT 2N1(DisplayPort/HDMI) PLATE,<br>(1) AUX INPUT 4N1(CV/SV/VGA/DVI) PLATE,<br>(1) AUX INPUT (HD-SDI) PLATE,<br>(1) IN-LIGHT CAMERA CONNECTION,<br>(1) 32" FLAT PANEL DISPLAY | IN-LIGHT CAMERA,<br>DISPLAY MOUNT,<br>SURGICAL LIGHT (IN-LIGHT)                 |
| C                      | DISPLAY/LIGHT BOOM          | (1) 32" FLAT PANEL DISPLAY  | DISPLAY MOUNT & SURGICAL LIGHT  |
| AUD                    | WALL MOUNTED                | (1) MP3 AUDIO INPUT   |   |
| NSTP                   | NURSE'S STATION TOUCH PANEL | (1) A/V TOUCH PANEL,<br>(1) KEYBOARD & MOUSE  |   |
| AIDA                   | WALL MOUNTED                | (1) AIDA BELLA (AIDA/PRINTER)   | DATA DROP   |
| CAM                    | WALL MOUNTED                | (1) PTZ CAMERA  | STRUCTURE FOR MOUNTING  |
| CSPK                   | CEILING MOUNTED             | (4) CEILING SPEAKER ASSEMBLY,<br>(1) CEILING SPEAKER HOLE TEMPLATE  | HOLE CUT IN SHEETROCK BY C.C.(NOT STORZ).<br>CUTOUT TEMPLATE PROVIDED BY STORZ. |
| DAT                    | WALL MOUNTED                | (FOR DATA TELECOM CONNECTION)   | SEE DATA / TELECOM SCHEDULE   |
| DISP                   | WALL MOUNTED                | (1) LARGE FORMAT FLAT PANEL DISPLAY   | BRACKET ANCHORAGE BY C.C. (NOT STORZ)   |
| DP                     | WALL MOUNTED                | (1) DISPLAYPORT INPUT PLATE   | COMPUTER  |
| IMG                    | WALL MOUNTED                | (5) OFE COMPUTER CONNECTION   | (5) OWNER FURNISHED COMPUTERS   |

**A/V EQUIPMENT SCHEDULE NOTES:**  
1. EQUIPMENT LISTED IS FOR COORDINATION PURPOSES ONLY. (BASED ON STORZ'S UNDERSTANDING OF EQUIPMENT & LOCATIONS). REFER TO CONTRACT SPECIFICATIONS FOR ACTUAL REQUIREMENTS.

| A/V EQUIPMENT SCHEDULE |                           |  |                                |
|------------------------|---------------------------|--|--------------------------------|
| SYMBOL                 | LOCATION/DEVICE           | EQUIPMENT BY STORZ   | EQUIPMENT BY OTHERS            |
| AVR-A                  | A/V EQUIPMENT RACK        | (1) A/V EQUIPMENT RACK (NEO - IP) ,<br>(1) UPS / ISOLATION TRANSFORMER,<br>(1) CISCO 10G SWITCHER,<br>(1) NEO-PS16+ POWER SUPPLY,<br>(24) NEO ENCODER/DECODER, |                                |
| AVR-B                  | A/V COLLECTION RACK       | (1) NEO-PS16+ POWER SUPPLY,<br>(2) FLAT PANEL DISPLAY POWER SUPPLIES,<br>(1) DIANTE AUDIO INTERFACE,<br>(1) STEREO AMPLIFIER,<br>(1) ACC CONTROL FIBER TX      | PACS COMPUTER,<br>IN-LIGHT CCU |
| CBOX                   | COLLECTION BOX IN CEILING |  | JBOX/CONDUITS/ACCESS PANEL     |

**A/V EQUIPMENT SCHEDULE NOTES:**  
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**FOR COORDINATION ONLY - NOT FOR CONSTRUCTION**

| REVISIONS:        | DATE:     |
|-------------------|-----------|
| △ REV. 0          | 3/31/2022 |
| (INITIAL RELEASE) |           |

DRAWN BY: S.SATRE  
ENG. BY:  
DATE: 2/22/2021  
FILE NAME: GENERIC IMRI  
PLT SC N.T.S  
AVP\_20180502

CHK BY: DATE:  
JOB NO.  
**GENERIC**  
DRAWING NUMBER  
**AV.MRI.  
6.4.01  
06 OF 07**

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**KARL STORZ SITE READINESS CHECKLIST**

**OVERALL SITE STATE:**

Upon KARL STORZ'S arrival at the facility, the site must be clean with all site prep work completed, the boom equipment installed, and the nurse station millwork complete. All owner furnished equipment must be available for installation and testing.

Although other trades may work in the same space, priority must be given to the floor space requirements of staging equipment and materials and the ability of the crew to maintain their workflow.

**GENERAL SITE PREP WORK:**

- All required conduits must be marked and installed with pull strings.
- All facility provided network cables must be installed and tested.
- All electrical outlets on equipment handlers, nurse millwork and a/v rack location must have power.
- Permanent power must be energized.
- Ceiling speaker cutouts must be prepared.
- Wall mounts for flat panel displays and touch panels must be installed.
- All network data drops need to be installed.

**MILLWORK:**

- Millwork must be installed with proper venting for calculated heat loads per the KARL STORZ drawings.
- Cover plate of large junction box behind av rack has mouse hole cut in proper location.
- Facility provided carpenter must be available for any grommet placement.

**BOOM EQUIPMENT:**

- Boom equipment must be installed and available for cabling by the KARL STORZ team.
- Boom equipment must be powered.
- In-Light Camera boxes must be available.

**OWNER FURNISHED EQUIPMENT:**

- OR equipment such as C-ARMS, Ultrasound, CT Machines and Microscopes must be available for testing and integration.
- Computers and workstations must be available for cable integration and testing.
- Videoconference telephone or network connections must be live.
- If applicable, all lighting control equipment must be installed and tested by the facility.

**ENVIRONMENTAL CONDITIONS:**

- Site is safe to work.
- If site has specific attire requirements and/or PPE requirements, the customer must provide access to appropriate attire and PPE for the crew.
- The OR must be clean and dust free.
- Delivery access must be available.
- Area to store all KARL STORZ materials for duration of installation identified.
- Trash disposal must be available.
- All safety training must be scheduled prior to arrival.
- Any sub-contractor conflicts need to be addressed and conflicting schedules need to be addressed to minimize KARL STORZ downtime.
- Adequate working hours must be available to the product deployment crew.

Use this document to ensure that all teams and spaces are aligned for the deployment of your KARL STORZ integrated operating room.

Failure to meet readiness can impact your installation schedule.

Thank you for your partnership,

KARL STORZ

97208100 OR1 2 1.0 us 03/2022/SE-E-US

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TYPICAL HOSPITAL - CITY, STATE  
OR1® NEO - IP (MRI) SERIES SYSTEM  
FACILITY REQUIREMENTS:

**KSIS PROJECT MANAGEMENT REQUIREMENTS**

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**DRAWN BY:** S.SATRE  
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**DATE:** 2/22/2021  
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**PLT SC:** N.T.S

**AVIP:** 20180502  
**CHK. BY:**      **DATE:**

**JOB NO.**  
**GENERIC**

**DRAWING NUMBER**  
**AV.MRI.**  
**6.5.01**  
**07 OF 07**