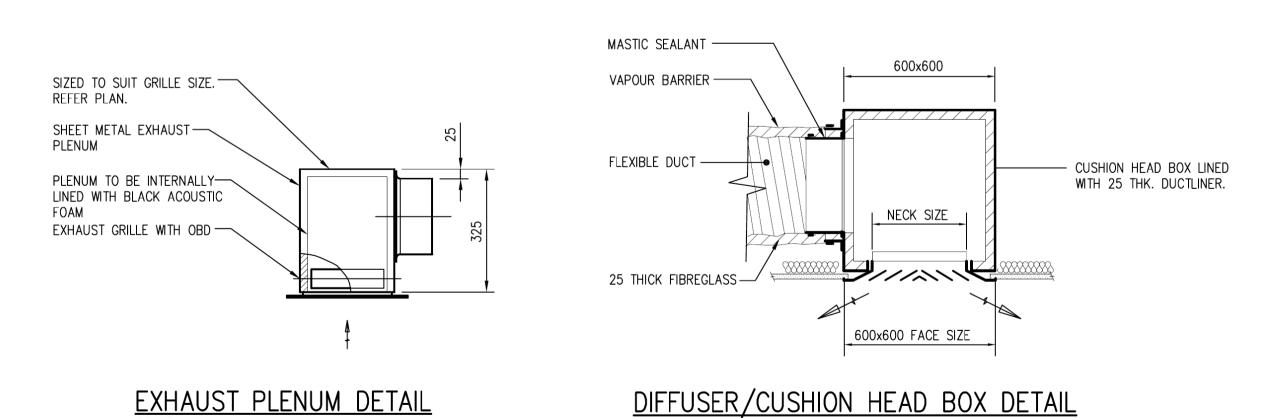


SITE PLAN



| DRAV |  |  |  |  |  |
|------|--|--|--|--|--|
| M100 |  |  |  |  |  |
| M101 |  |  |  |  |  |
| M102 | BASEMENT 1 VENTILATION LAYOUT                              |  |  |  |  |
| M103 |  |  |  |  |  |
| M104 |  |  |  |  |  |
| M105 | LEVELS 3, 4, 5 & 6 AIR CONDITIONING AND VENTILATION LAYOUT |  |  |  |  |
| M106 | LEVELS 7 & 8 AIR CONDITIONING AND VENTILATION LAYOUT       |  |  |  |  |
| M107 | M107 LEVEL 9 AIR CONDITIONING AND VENTILATION LAYOUT       |  |  |  |  |
| M108 | ROOF AIR CONDITIONING AND VENTILATION LAYOUT               |  |  |  |  |
| M201 | EQUIPMENT SCHEDULES  |  |  |  |  |
|      |  |  |  |  |  |

DIFFUSER SCHEDULE

NECK SIZE

150x150

225x225

300x300

375x375

450x450

525x525

AIRFLOW (L/s)

0 - 55

56 - 125

126 - 225

226 - 300

301 - 405

406 - 500

| FLEXIBLE DUCT SCHEDULE |           |  |  |  |
|------------------------|-----------|--|--|--|
| AIRFLOW (L/s)          | DIA. FLEX |  |  |  |
| 0 - 50                 | 150       |  |  |  |
| 51 - 100               | 200       |  |  |  |
| 101 – 180              | 250       |  |  |  |
| 181 – 250              | 300       |  |  |  |
| 251 - 350              | 350       |  |  |  |
| 351 - 450              | 400       |  |  |  |
| 451 – 525              | 450       |  |  |  |

NOTE: WHERE FLEXIBLE DUCT DIAMETER EXCEEDS DUCT HEIGHT, OVAL CONNECTORS ARE TO BE USED.

## MECHANICAL LEGEND OF SYMBOLS

SHEETMETAL DUCTWORK INTERNALLY LINED A FOIL FACED DUCT LINER. R1.2 WITHIN A CONDITIONED SPACE, R2.0 IN ALL OTHER INTERNAL LOCATIONS. R3.0 WHERE EXPOSED TO DIRECT SUNLIGHT. SHEETMETAL DUCTWORK LINED WITH EXTERNAL INSULATION AND

VAPOUR BARRIER. R1.2 WITHIN A CONDITIONED SPACE. R2.0 IN ALL OTHER INTERNAL LOCATIONS.

SHEETMETAL DUCTWORK WITH 50mm INTERNAL AND 50mm EXTERNAL INSULATION.

UNINSULATED SHEETMETAL DUCTWORK.

FIRE RATED DUCTWORK. UNINSULATED CIRCULAR SHEETMETAL

DUCTWORK.

CIRCULAR DUCTWORK INTERNALLY LINED WITH A FOIL FACED DUCT LINER. R1.2 WITHIN A CONDITIONED SPACE, R2.0 IN ALL OTHER INTERNAL LOCATIONS. R3.0 WHERE EXPOSED TO DIRECT SUNLIGHT.

CIRCULAR DUCTWORK LINED WITH INSULATION AND VAPOUR BARRIER. R1.2 WITHIN A CONDITIONED SPACE. R2.0 IN ALL OTHER INTERNAL LOCATIONS.

CIRCULAR FLEXIBLE DUCTWORK, R1.0 FIBREGLASS INSULATION FOR LENGTHS LESS 3m. R2.0 ALL OTHER LOCATIONS.

600 x 600 FACE VARIABLE AIR VOLUME SAD.

200 L/s MAX AIR QUANTITY. 600 x 600 FACE SUPPLY AIR DIFFUSER

200 L/s AIR QUANTITY.

AS ABOVE, BUT WITH 3 WAY BLOW.

200 x 200 EGG CRATE EXHAUST GRILLE

SIDE OF DUCT MOUNTED EXHAUST GRILLE

600 x 600 EGG CRATE RETURN AIR GRILLE 400 L/s AIR QUANTITY.

1200 x 600 EGG CRATE RETURN AIR GRILLE 800 L/s AIR QUANTITY.

25 L/s AIR QUANTITY.

250 L/s AIR QUANTITY. WEATHER PROOF LOUVRE. SIZE AND

350 x 150 SIDEWALL SUPPLY GRILLE 140 L/s AIR QUANTITY.

FLOW AS SHOWN

650 x 150 SIDEWALL SUPPLY GRILLE 280 L/s AIR QUANTITY.

900 x 150 SIDEWALL SUPPLY GRILLE 350 L/s AIR QUANTITY.

DOOR GRILLE 0.1m2 FACE AREA. UNDERCUT DOOR BY BUILDER.

CIRCULAR SPIGOT WITH BALANCING

VCD MOTORISED VOLUME CONTROL DAMPER.

VOLUME CONTROL DAMPER

FIRE DAMPER.

SINGLE PHASE POWER SUPPLY BY BUILDER.

600 x 600 CEILING ACCESS PANEL.

**—** 3 PHASE POWER SUPPLY BY BUILDER. MECHANICAL SERVICES SWITCHBOARD.

750-1800 AFFL UNO.

TEMPERATURE SENSOR MOUNTED AT 1500 AFFL UNO. CARBON MONOXIDE SENSOR MOUNTED BETWEEN

CARBON DIOXIDE SENSOR

CS CONTROL STATION. TUNDISH BY BUILDER.

**ISSUED FOR CONSTRUCTION** 

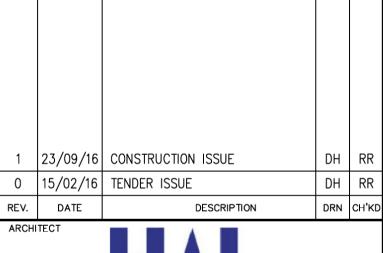
## **ABBREVIATIONS**

AIR HANDLING UNIT No. 1 CONDENSING UNIT No. 2 EF-3EXHAUST FAN No. 3 FCU-4 FAN COIL UNIT No. 4 KEF-5 KITCHEN EXHAUST FAN No. 5 SUPPLY FAN No. 6 SMOKE EXHAUST FAN No. 7 TOILET EXHAUST FAN No. 8 SUPPLY AIR. OUTSIDE AIR. RETURN AIR. EXHAUST AIR. TOILET EXHAUST. MECHANICAL SERVICES SWITCHBOARD

## <u>NOTES</u>

- 1. DRAWINGS TO BE READ IN CONJUNCTION WITH MECHANICAL SERVICES SPECIFICATION.
- 2. THE SUB CONTRACTOR SHALL CHECK ALL DIMENSIONS ON ARCHITECTURAL DRAWINGS BEFORE COMMENCING WORKS.
- DUCT SIZES SHOWN ARE CLEAR AIRWAY SIZES.
- 4. ALL EXTERNAL PIPEWORK, CONDENSATE DRAINS AND ELECTRICAL WIRING TO BE CONCEALED.
- ACCESS PANEL LOCATIONS TO BE FINALISED BY MECHANICAL CONTRACTOR.
- TUNDISHES HAVE BEEN SHOWN ON DRAWINGS FOR HYDRAULIC SERVICES INFORMATION ONLY. CONDENSATE DRAINS ARE TO COORDINATED WITH TUNDISH LOCATION PROVIDED.
- RETAIL LAYOUT ARE BASE BUILDING ONLY. ALLOW TO SUSPEND ALL GRILLES & FLEXIBLE DUCTS FROM STRUCTURE OVER.
- APARTMENT KITCHEN CEILINGS TO BE CONSTRUCTED AS AN AIR TIGHT RETURN AIR PLENUM BY BUILDER.
- APARTMENT EXHAUST TO BE 350x75 LOW PROFILE PVC
- DUCTING SIMILAR TO DUCTTECH SPACESAVER DUCT SYSTEM. MAINTAIN FIRE RATED SEPARATION BETWEEN FIRE COMPARTENTS

WHERE REFRIGERANT PASS THROUGH WALLS AND FLOORS WITH





CONSULTANTS

A REQUIRED FRL.



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45 WELLINGTON ROAD EAST BRISBANE

MECHANICAL SERVICES

SITE PLAN, LEGEND, NOTES AND SCHEDULES

|  | NORTH POINT | CHECKED     | DRG SCALE     |         |
|--|-------------|-------------|---------------|---------|
|  |             | RR          |               | 1: 200  |
|  |             | DESIGNED    | SHEET SIZE    |         |
|  |             | DH          |               | A1      |
|  |             | DRAWN       | No IN SET     |         |
|  |             | DH          |               | 1 of 10 |
|  | PROJECT No. | DATE        | FILE NAME     |         |
|  | 7103        | 17/09/2015  | 7103-M100.dwg |         |
|  | JOB No.     | DRAWING No. |               | REV.    |

M100 7103

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