



EQUIPMENT SCHEDULE								
ITEM	DESCRIPTION	AREA / LOCATION	QTY	COOLING CAPACITY (kW)	POWER SUPPLY	SIZE - Indoor Unit (LWH) (mm)	WEIGHT (kg)	NOTES
AHLJ-01	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	
AHLJ-02	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	
AHLJ-03	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	
AHLJ-04	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	
AHLJ-05	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	
AHLJ-06	Air Handling Unit		1	75	415/3/50+N+E	2560x2350x2020	2053	

Notes:

This drawing is not to be used as a construction/installation drawing. Routes and zones have been allocated to this service, location dimensions are indicative of these.

To prepare his construction/installation drawing, the subcontractor must adhere to this co-ordination principle and must inspect all the architect's drawings, including structural and other services, design drawings pertaining to the works that support and interface with the other services and ensure that in doing this work it will not obstruct the fixing of future maintenance of other services.

The subcontractor is responsible for correct field dimensions, clearances and heights, easements, tolerances, easements and techniques of construction co-ordination of his work with that of all other trades, providing all devices necessary for safe and satisfactory operation. Detailed drawings, typical sections, typical details including all typical details, as well as the legend can be read off drawing number MA-112.

All installation should be carried out as per Part IV of the tender specification.

Duct sizes shown are sheet metal sizes.

All ducting to be manufactured & installed in accordance with the SANS standards.

All A/C shaft to be fitted with metal grid platform on floors with access door.

All exposed ducting to be painted to an approved colour.

All take-offs from supply & exhaust air ducting to be 45° ducts.

AC equipment to be fitted with anti-vibration mountings as per specification.

HVAC contractor to ensure that all condensate drains are trapped and slope adequately. All drains to be tested for leaks and operation.

All ducting to be flat on top and installed hard-up to the underside of the slab above.

1. HVAC Contractor is responsible for connecting the condensate drains to the drain stack or the nearest drain. The connection must be a solid connection to prevent leakage.

2. Thermostat positions are provisional. Final positions shall be determined on site in consultation with Client/Engineer. Where full height air conditioning is not available for thermostat, it must be mounted on the brick wall.

3. All refrigerant piping, electrical and control wiring between indoor and units must run in trunking/cable trays with cover joints securely fitted against wall.

4. Condenser must be mounted on galvanneal coilover frame.

5. All supply air ducting must be externally insulated.

6. All BMS wiring must be installed in PVC conduit by BMS contractor.

DIVISION OF WORK

Work by Main Contractor

- Openings in slabs for door grilles.
- Openings in ceiling for air terminals and/or fans.
- Openings in structure complete with border frames (in non-fire walls) and making good after installation of HVAC equipment.
- Concrete bases for fan sets, etc.
- Enclosures around HVAC openings.
- Metal grid platform in AC shafts.
- Building in and sealing of the dampers.

Work by Electrical Subcontractor

- Power supply terminating in Distribution boards.
- Water interlocking solenoid with the air pressure switch.
- Stop/Start interlocking of toilet exhaust fans.
- Fire interlocking signal to each AHU.

Work by Plumbing Subcontractor

- Fulmore outlets on roof.
- Water outlet points for Chiller Units.

Legend

- Externally insulated supply ducting
- Externally insulated return ducting
- Uninsulated extract ducting
- Cladded extract ducting
- Fresh Air Duct
- 600x600 Constant Volume Supply Air diffuser with flow rate
- 432 galvanneal condensate/drain piping
- Refrigerant piping
- Duct stop and
- Single phase isolator by electrician
- Three phase isolator by electrician
- Ceiling cassette with Cooling capacity
- Fire damper with fusible link
- Under Cut door (25mm)
- Door Grille with size and flow rate
- Disc valve with flow rate
- Return Air Grille (600x600) with flow rate
- Variable refrigerant Volume Condensers
- Mid wall unit
- Hide Away (Concealed) Unit
- Axial Fan
- Sound Attenuator (1.50)
- Weather Louvre with size and flow rate
- Condenser
- Supply Air diffuser with
- Extract Air Grille

REVISIONS		
TD	03.10.25	ISSUED FOR TENDER
A	26.03.25	ISSUED FOR INFORMATION
Rev No.	DATE	DESCRIPTION



Project:		
REFURBISHMENT & UPGRADE OF NHL BLOCK 14		
Master plan reference:		
BLOCK 14 E		
Drawing:		
EAST UPPER LEVEL PLAN HVAC LAYOUT		
Status:		
TENDER		
Drawn by:	T.M.	
Designed by:	J.M.	
Checked by:	M.M.	Ph no: 201800466
Signature	Date	2025-03-07
Scale:	1:50	Revision No.:
Date:	FEB-2025	TD
Drawing No:	P2407-MA-112	