



ATMO
sphere

The first CO2 refrigerant-based condensing unit to Jaya Grocer in Malaysia

06/SEP/2017

Coolcare (M) SDN BHD
Chai Chun Leong



Company Name

Trendcell Sdn.Bhd.
(Operator of supermarket chain Jaya Grocer)

Representative Director

Mr. Teng Yew Huat

Type of Industry

Supermarket

Number of stores

19 stores in Malaysia (As of March 2017)

Project overview

Delivery Store & Location

Jaya GROCER Mutiara Tropicana

No. 2G-6G, Jalan Mutiara Tropicana 3, Mutiara Tropicana PJU 3, 47410 Petaling Jaya, Selangor Darul Ehsan, Malaysia

Store opening date

May, 2017


(renovation of existing store)

Installer :

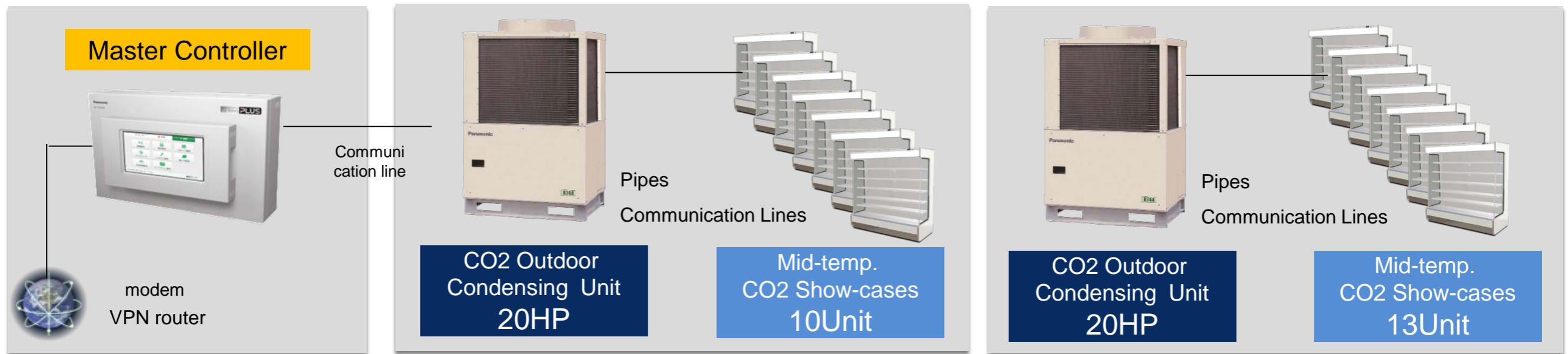
Equipment manufacturer :



Jaya Grocer
Mutiara Tropicana outlet

Installer :		Equipment manufacturer :	
Company name	Coolcare (M) SDN BHD  <small>COOLCARE (M) SDN. BHD Commercial & Industrial Refrigeration System</small>	Company name	Panasonic Corporation Panasonic
Headquarters	Kuala Lumpur, Malaysia	condensing unit	Panasonic
Representative Director	Mr. Chai Chun Leong	Showcase	Panasonic
Type of Industry	Distributor & Installer	Control system	Panasonic

Panasonic CO₂(R744) Refrigeration System



CO₂ condensing unit

Product name	Fluorocarbon-free freezer utilizing CO ₂ refrigerant	Output	14.6kW 20 horsepower
Product number	OCU-CR2001MVF	Applications	freezing and refrigeration
Exterior dimensions Width x depth x height	1190 x 890 x 1856 (mm)	Weight	Approx. 465kg



OCU-CR2001MVF

Malaysia

HCFC Phase-out Management Plan



This project was assisted with the funding provided under the Multilateral Fund for the Implementation of the Montreal Protocol by the Department of Environment (DOE) of the Ministry of Natural Resources and Environment of Malaysia (NRE).

DOE Malaysia and Panasonic are also involved in activities to spread the use of natural refrigerants through fostering a better understanding of them.

On 23rd March, 2017, Panasonic held a seminar on fluorocarbon-free condensing units for local university faculty and construction personnel in cooperation with DOE Malaysia.



Installation schedule

- 2 systems - Total 23 showcases
- Partial Renovation on business hour
- Total 12 days (Apr Top 2017 ~ Apr End 2017)

System 1 (CO₂ CDU 20HP/10 showcases)

Date	Installation work
4/4 Tue ~ 4/10 Mon	Replacement of CDU/Showcases
4/11 Tue	Piping and wiring work & Pressue test
4/12 Wed	Pressure test, Refrigerant charging & Commissioning
4/13 Thu	Commisioning & displaying products

System 2 (CO₂ CDU 20HP/13 showcases)

Date	Installation work
4/25 Tue ~ 4/26 Wed	Replacement of CDU/Showcases
4/27 Thu	Piping and wiring work & Pressue test
4/28 Fri	Pressure test, Refrigerant charging & Commissioning
4/29 Sat	Commisioning & displaying products

Project photo – Set-up & positioning



CO2 unit with platform



CO2 unit with platform



CO2 unit with platform



Showcase connection



Showcase connection & positioning



Showcase connection & positioning

Project photo – Piping work



Piping work (Outside store)



Piping work (Outside store)



Piping work (Outside store)



Piping work (inside store)



Piping work (inside store)



Piping work (inside store)

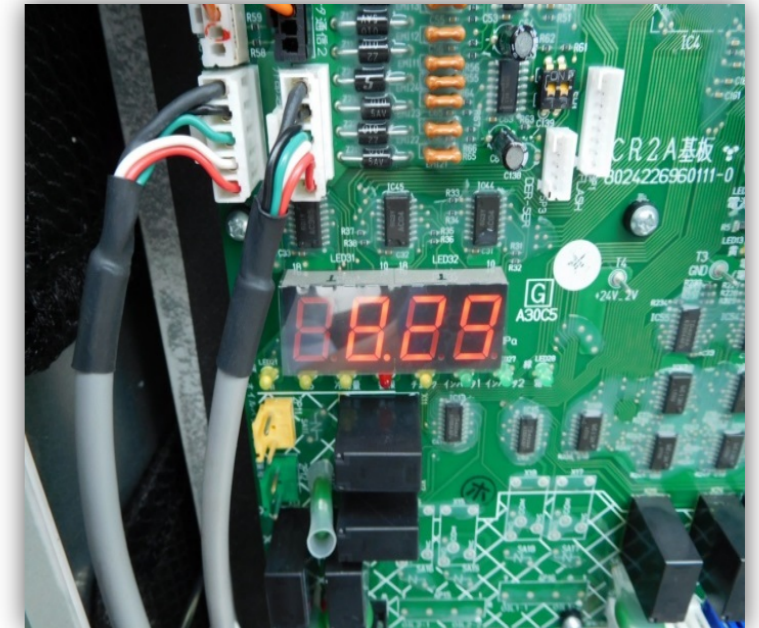
Project photo – Pressure test & Controller set-up



Piping outlet on top of showcase



Piping connection inside showcase



Pressure test (6hr / 8Mpa)



Top-up CO2 gas



Top-up CO2 gas



Setting up Store Controller

Project photo – Completion





ATMO
sphere

Thank you very much!

