



Air Conditioning
and Refrigeration
Industry Club

CRH 2024 ASEAN HVAC & R FORUM

Mr. Panuwat Satavorn

Economic Affairs Board of Air Conditioning and
Refrigeration Industry Club

The Federation of Thai Industries

9th April, 2024

Beijing, China

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- Introduction of Air Conditioning and Refrigeration Industry Club, FTI.
- Thai Industrial Standards of Air Conditioning
- Lower GWP Refrigerant Program in Thailand
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Who is FTI.

- ❖ The Federation of Thai Industries
 - 45 Industrial Clubs
 - 76 Provincial Chapters
 - 15,832 Members
- ❖ Non Profit private organization.
- ❖ Center to promote and support all industrial operation in the country for sustainable growth.
- ❖ Service center for all industrial developments.
- ❖ Activities center for all industrial operators.

Thai Industrial Standards of Air Conditioning

Members over 100 of Air Conditioning and

Refrigeration





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Thai Industrial Standards of Air Conditioning

Thailand A/C Industry Standards

Thai Industrial Standards Institute (TISI)

- ❖ TISI812-2558 (mandatory)
 - Safety Requirement
 - Motor-Compressors

Thailand A/C Industry Standards

Thai Industrial Standards Institute (TISI)

- ❖ TISI2134-2553 (mandatory)
 - **Energy Efficiency Standard (MEPS)**
 - Non-ducted Split, Window Types
 - Cover all unit up to 12kW

Thailand A/C Industry Standards

Thai Industrial Standards Institute (TISI)

- ❖ TISI1529-2561 (mandatory)
 - **Safety Standard**
 - Based on IEC 60335-2-40 : 2013 (E)
 - Portable, Window, Wall-mounted, Ceiling Types
 - Cover all unit up to 18kW

Thailand A/C Energy Efficiency

Standards Electricity Generating Authority of Thailand

(EGAT)

On 8/8/2023, EGAT announcement the change of No.5 A/C Energy Label Program as following :

1. Change of No.5 label design.

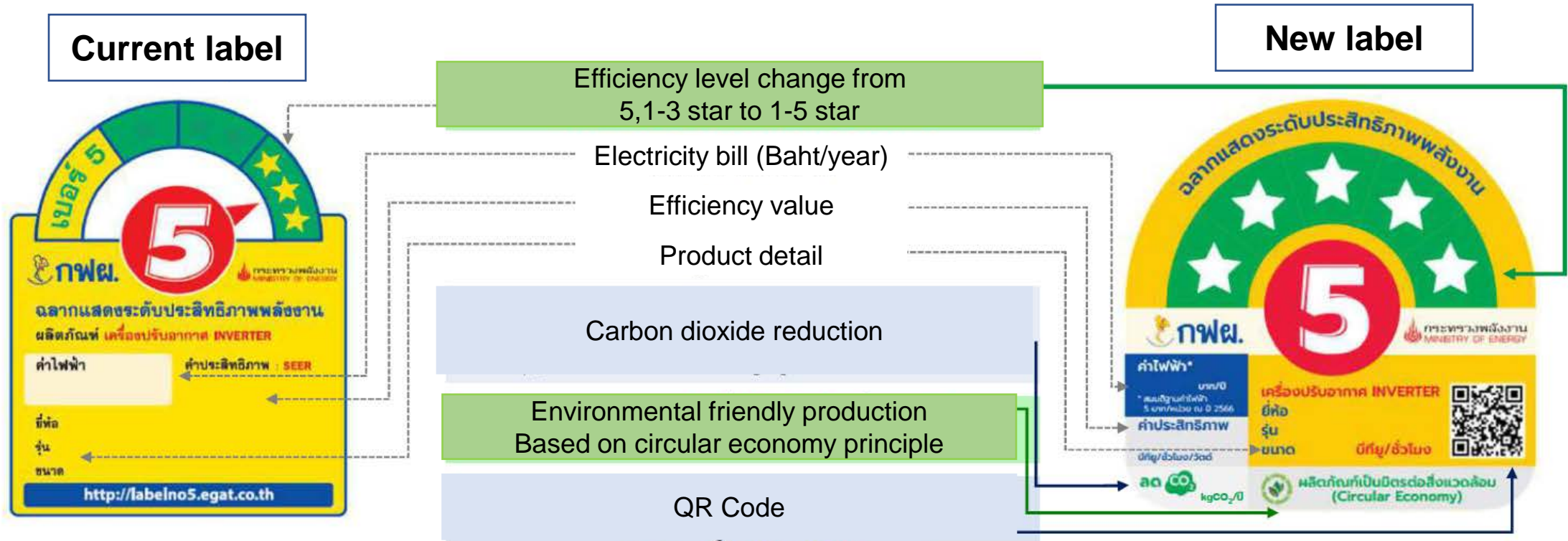
The new label design will additional CO2 emission, circular economy principle and QR code.

2. Change of No.5 label star rating from 3 star to 5 star for A/C up to 60,000 BTU

3. Add new No.5 for VRF/VRV up to 100,000 BTU

Thailand A/C Energy Efficiency Standards

1. A/C No.5 new label design



Thailand A/C Energy Efficiency Standards

2. Change of No.5 label star rating to 5 star

(฿)

Type	(BTU/hr)	EGAT No.5						GAP
		SEER (BTU/hr/W)						
		No.5	No.5 ★	No.5 ★★	No.5 ★★★	No.5 ★★★★	No.5 ★★★★★	
Fixed Speed	≤ 27,296	13.17 – 13.70	13.71 – 14.23	14.24 – 14.77	14.78 – 15.30	15.31 – 15.84	≥ 15.85	0.54
	> 27,296 – 40,944	12.56 – 13.12	13.13 – 13.69	13.70 – 14.25	14.26 – 14.82	14.83 – 15.39	≥ 15.40	0.57
	>40,944 – 61,416	10.00 – 10.59	10.60 – 11.19	11.20 – 11.79	11.80 – 12.39	12.40 – 12.99	≥ 13.00	0.60
Inverter	≤ 27,296	17.06 – 18.55	18.56 – 20.05	20.06 – 21.55	21.56 – 23.05	23.06 – 24.55	≥ 24.56	1.50
	> 27,296 – 40,944	16.04 – 17.15	17.16 – 18.27	18.28 – 19.38	19.39 – 20.50	20.51 – 21.62	≥ 21.63	1.12
	>40,944 – 61,416	14.00 – 15.49	15.50 – 16.99	17.00 – 18.49	18.50 – 19.99	20.00 – 21.49	≥ 21.50	1.50
VRF	≤ 100,000	14.00 – 15.49	15.50 – 16.99	17.00 – 18.49	18.50 – 19.99	20.00 – 21.49	≥ 21.50	1.50



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Lower GWP Refrigerant Program in Thailand

HFC Phase-down

Latest Thailand Big Step on Montreal Protocol Success of HCFC Phase-out on 2018

- All Thailand Manufacturer stopped producing HCFC22 A/C (for unit less than 14.7kW cooling capacity)

- Decided to phase out of higher GWP HFC410a

A/C Refrigerants	ODP	GWP
R - 22	0.055	1810
R -410A	0	2088
R-32	0	675

Stopped import HCFC22 A/C (for unit less than

Kigali Amendment

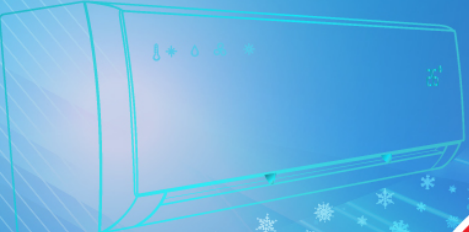
- ❖ **Montreal Protocol Implementation in Thailand**
 - **ODS Management & Control**
 - **Energy Efficiency Policies**
 - **Climate Change Policies**
- ❖ **Thailand already ratified the Kigali Amendment and will commence with phasing down climate-warming HFCs and adopting sustainable and energy efficient cooling technology**



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Bangkok RHVAC 2024

(invitation)



4 - 7 SEP 2024

Trade Day | Public Day
4 - 6 SEP 2024 | 7 SEP 2024

10 AM - 6 PM

EH 98 - 100 BITEC, Bangkok, Thailand

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**Thank
You**
