

# CERTIFICATE OF PRODUCT CONFORMITY

Dubai Central Laboratory Department (DCLD) of Dubai Municipality  
hereby attests that the product(s)

## Solar Collector

(Details as per the attached Scope of Certification)

manufactured by:

**ARISTON THERMO GROUP**

**Via Granelli 2, 60030 Serra De Conti, Italy**

have been assessed in accordance with DCLD Document Ref. No. DM-DCLD-RD-DP21-2001 (IC) "General Rules for DM third party product certification system through factory assessment" and the relevant Specific Rules, and were found in conformity with the standard specification:

## BS EN 12975-1: 2010

Accordingly, DCLD hereby authorizes the above manufacturer  
to affix the DCL Product Conformity Mark on the above-mentioned product(s).



for / ENGR. AMIN AHMED AMIN  
Director, Dubai Central Laboratory Department  
Dubai Municipality



Certificate No: CL16020303  
Valid Until: 10/01/2020



Current Issue Date: 11/01/2019  
Original Issue Date: 11/01/2016

The attached Scope of Certification bearing the same Certificate Number forms an integral part of this Certificate.  
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**DUBAI CENTRAL LABORATORY DEPARTMENT  
DCL PRODUCT CONFORMITY CERTIFICATION SCHEME**

**SCOPE OF CERTIFICATION  
FOR CERTIFICATE NO. CL16020303 –Rev01**

<b>Certificate Issued To:</b>	<b>ARISTON THERMO SPA</b> Via Granelli 2, 60030 Serra De Conti, Italy
<b>Applicable Standard Specification:</b>	BS EN 12975-1:2006 +A1: 2010 – Thermal solar systems and components – Solar Collectors – Part 1: General requirements
<b>Applicable Specific Rules:</b>	RD-DP21-2178 (IC) – Specific Rules Certification of Solar Collectors as per BS EN 12975-1 Through Factory Assessment RD-DP21-2084 (IC) – Guidelines for Factory Production Control Plan for Solar Collector Manufacturers

S/N	PRODUCT DETAILS	BRAND NAME(S) / MODEL(S)	PRODUCT DESCRIPTION
1.	<p><b>FLAT PLATE SOLAR COLLECTOR</b> Absorber Materials: Copper with High Selective Aluminum Sheet; Tempered, Low Iron Glass 3.1 mm thickness top cover; Glasswool thermal insulation with density of 14 kg/m<sup>3</sup>, thermal conductivity of 0.036 W/(m.K) and thickness of 30 mm for back insulation; Casing of 0.5 mm Steel with Zinc-Magnesium Coating; Sealing materials: Covering (Silicon) and Absorber (EPDM); Anti-freeze Glycol-Water Mixture</p>	<p><b><u>ARISTON</u></b> <b><u>KAIROS VN2.2</u></b></p>	<p>Gross Area of 2.2 m<sup>2</sup>; Aperture Area of 2.02 m<sup>2</sup>; Absorber Area of 2.02 m<sup>2</sup>; Gross Dimensions (without support frame) : 1100 x 1995 x 68 mm; Dry Weight : 35 kg; Collector Fluid Volume: 1 Liters Primary Fluid Collector Tubes : Headers 2X18 mmX0.7 mm; Risers 16X6 mmX0.4 mm Maximum Operating Pressure 6 bars; Maximum Stagnation Temperature 180 °C</p>



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4.	<p><b>FLAT PLATE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Copper with High Selective Aluminum Sheet; Textured Tempered, Low Iron Glass 3.2 mm; Glasswool thermal insulation with density of 14 kg/m<sup>3</sup>, thermal conductivity of 0.036 W/(m.K) and thickness of 25 mm for back insulation; Casing : Aluminum Profiles with Steel Bottom with Aluzinc Coating. Sealing materials: Covering (Silicon) and Absorber (EPDM); Primary Thermal Fluid : Water (only)</p>	<p><b><u>ARISTON</u></b> <b><u>DR2.0</u></b></p>	<p>Gross Area of 2.0 m<sup>2</sup>; Aperture Area of 1.83 m<sup>2</sup>; Absorber Area of 1.73 m<sup>2</sup>; Gross Dimensions (without support frame) : 2004 x 1004 x 78 mm; Dry Weight : 30 kg; Collector Fluid Volume: 1.8 Liters Primary Fluid Collector Tubes : Headers 2X22mmX0.7 mm; Risers 6X12mmX0.4 mm Maximum Operating Pressure 8 bars; Maximum Stagnation Temperature 190 °C</p>
5.	<p><b>FLAT PLATE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Copper with High Selective Aluminum Sheet; Textured Tempered, Low Iron Glass 3.2 mm; Glasswool thermal insulation with density of 14 kg/m<sup>3</sup>, thermal conductivity of 0.036 W/(m.K) and thickness of 25 mm for back insulation; Casing : Aluminum Profiles with Steel Bottom with Aluzinc Coating. Sealing materials: Covering (Silicon) and Absorber (EPDM); Primary Thermal Fluid : Water – glycol</p>	<p><b><u>ARISTON</u></b> <b><u>DR2.0 HR</u></b></p>	<p>Gross Area of 2.0 m<sup>2</sup>; Aperture Area of 1.83 m<sup>2</sup>; Absorber Area of 1.73 m<sup>2</sup>; Gross Dimensions (without support frame) : 2004 x 1004 x 78 mm; Dry Weight : 30 kg; Collector Fluid Volume: 2.3 Liters Primary Fluid Collector Tubes : Headers 2X22mmX0.7 mm; Risers 6X12mmX0.4 mm Maximum Operating Pressure 8 bars; Maximum Stagnation Temperature 190 °C</p>
6	<p><b>FLAT PANEL TYPE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Aluminium Absorber Fins (Blue absorber-selective) laser welded into copper tubes; Tempered, Mislite, Low Iron Glass 4mm &amp; 3.2mm thickness top cover; Glasswool thermal insulation with density of 30 kg/m<sup>3</sup>, thermal conductivity of 0.035 W/(m.K) and thickness of 30mm for back insulation; And Glasswool thermal insulation with density of 30 kg/m<sup>3</sup>, thermal conductivity of 0.035 W/(m.K) and thickness of 15mm for side insulation; Frame structure made of Anodized Aluminium with 1mm thickness and 0.4 Aluminium back cover; Double sided tape, silicone, EPDM sealing materials; Anti-freeze (Propylene Glycol) &amp; water mixture</p>	<p><b><u>ARISTON</u></b> <b><u>KAIROS</u></b> <b><u>ENERGY EVO 20</u></b></p>	<p>Overall area of 2.02 m<sup>2</sup>; absorber area of 1.83 m<sup>2</sup>; Gross dimensions: 2006x1007x85 mm; Weight (dry &amp; packed): 27 kg; Absorber volume capacity: 1.6 Liters Absorber pipe dimensions: Header - 22 x 0.7mm and Risers – 8 x 0.4mm Number of risers in vertical position 8; Maximum operating pressure is 10 bars; Maximum stagnation temperature is 199 °C; Vertical position</p>

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7*	<p><b>FLAT PANEL TYPE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Copper with Black Selective Aluminum Sheet, laser welded to copper tubes; Textured Tempered, Low Iron Glass 3.2 mm; Glasswool thermal insulation with density of 14 kg/m<sup>3</sup>, thermal conductivity of 0.036 W/(m.K) and thickness of 25 mm for back insulation; Casing: Aluminum Frame (thickness 1mm) and Steel Bottom with Zinc and Magnesium Coating. Sealing materials: double sided tape, silicone and EPDM; Primary Thermal Fluid : water</p>	<p><b><u>ARISTON</u></b> <b><u>KAIROS DR 2.0-2 N</u></b></p>	<p>Overall area of 1.92 m<sup>2</sup>; absorber area of 1.77 m<sup>2</sup>; Gross dimensions: 1985x967x75mm; Weight (dry &amp; packed): 30.6 kg Absorber volume capacity: 1.8 l Absorber pipe dimensions : Headers 2x22mmx0.7 mm; Risers 6x12mmx0.4 mm Number of risers in vertical position: 6 Maximum operating pressure is 8 bar; Maximum stagnation temperature is 180 °C; Vertical position</p>
8*	<p><b>FLAT PANEL TYPE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Copper with Blue Selective Aluminum Sheet, laser welded to copper tubes; Textured Tempered, Low Iron Glass 3.2 mm; Glasswool thermal insulation with density of 14 kg/m<sup>3</sup>, thermal conductivity of 0.036 W/(m.K) and thickness of 25 mm for back insulation; Casing : Aluminum Frame (thickness 1mm) and Steel Bottom with Zinc and Magnesium Coating. Sealing materials: double sided tape, silicone and EPDM; Primary Thermal Fluid : water</p>	<p><b><u>ARISTON</u></b> <b><u>KAIROS DR 2.0-2 B</u></b></p>	<p>Overall area of 1.92 m<sup>2</sup>; absorber area of 1.77 m<sup>2</sup>; Gross dimensions: 1985x967x75mm; Weight (dry &amp; packed): 30.6 kg Absorber volume capacity: 1.8 l Absorber pipe dimensions : Headers 2x22mmx0.7 mm; Risers 6x12mmx0.4 mm Number of risers in vertical position: 6 Maximum operating pressure is 8 bar Maximum stagnation temperature is 190 °C; Vertical position</p>
9*	<p><b>FLAT PANEL TYPE SOLAR COLLECTOR</b></p> <p>Absorber Materials: Copper with Blue Selective Aluminum Sheet, laser welded to copper tubes; Textured Tempered, Low Iron Glass 3.2 mm; Glasswool thermal insulation with density of 20 kg/m<sup>3</sup>, thermal conductivity of 0.034 W/(m.K) and thickness of 30 mm for back insulation; Casing : Aluminum Frame (thickness 1mm) and Steel Bottom with Zinc and Magnesium Coating. Sealing materials: double sided tape, silicone and EPDM; Primary Thermal Fluid : Anti-freeze (Propylene Glycol) and water mixture</p>	<p><b><u>ARISTON</u></b> <b><u>CF 2.0-2</u></b></p>	<p>Overall area of 1.96 m<sup>2</sup>; absorber area of 1.77 m<sup>2</sup>; Gross dimensions: 1990x985x78mm; Weight (dry &amp; packed): 27 kg; Absorber volume capacity: 1.0 Liters Absorber pipe dimensions: Headers 2x18mmx0.7 mm; Risers 7x8mmx0.4 mm Number of risers in vertical position 7; Maximum operating pressure is 6 bars; Maximum stagnation temperature is 210 °C; Vertical position</p>



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*NOTE 1: The above products shall bear the DCL Conformity Mark applied on each individual product.*

*NOTE 2: This document forms part of the Certificate of Product Conformity bearing the same certificate number.*

*NOTE 3: \* Newly Added products to scope and this scope replace the scope issued on 11 January 2019*

*Original Issue Date : 11 January 2016*

*Current Issue Date : 03 February 2019*

*Valid Until : 10 January 2020*

**ARIF HUSAIN AL MARZOOQI**  
Products Conformity Assessment Section Manager  
Dubai Central Laboratory Department