

## **High-Performance Heat Exchanger Market in Japan: Key Research Findings 2017**

### **◆ Research Outline**

**Yano Research Institute has conducted a study on the domestic high-performance heat exchanger market with the following conditions:**

1. Research period: From April to June, 2017
2. Research targets: Manufacturers of high-performance heat exchangers, engineering companies, material makers, metalworking companies, etc.
3. Research methodologies: Face-to-face interviews by the expert researchers, surveys via telephone/email, and literature research

### **What is the High-Performance Heat Exchanger Market?**

The size of the high-performance heat exchanger market in this research is calculated based on the both applications where heat exchangers are installed stand alone at plants and factories, and where they are installed within air conditioners, water heaters, and other apparatuses. Note that those heat exchangers used for vehicles, such as vehicle radiators, are not included in this research.

### **◆ Key Findings**

#### **■ Domestic High-Performance Heat Exchanger Market in FY2016 Reached 72,540 Million Yen, 97.7 % on Y-to-Y Basis**

Size of the domestic high-performance heat exchanger market in FY2016 declined to 72,540 million yen, 97.7% of that of the previous fiscal year, based on the shipment value at manufacturers. Although there are robust major demands including chemical or petroleum refinery plants where deteriorated or existing facilities are needed to be updated or improved, capital investment at new facilities has been slow. This has made the entire high-performance heat exchanger market to keep the size at around 75 billion yen.

#### **■ In Association with New Application Development, Market Size Likely to Expand in the Field of Hydrogen Station and Utilization of Non-Utilized Heat**

The heat exchanger makers have been vigorous to develop applications to explore new customers. Their efforts have increased the use of heat exchangers such as for temperature controllers and steam condensers for biomass power generation, and for display cases and freezers at retailers to enable low-temperature distribution, which led the sales of heat exchangers in the fields of electricity/energy and refrigeration/freezing to tending to increase. In addition, there are newcomers in the market to satisfy the new demands of heat exchangers for facilities needed for hydrogen stations and utilization of non-utilized heat. All of those factors are leading the market to be on the rise.

#### **■ Size of Domestic High-Performance Heat Exchanger Market for FY2020 Projected to Attain 78.710 Billion Yen**

Against the backdrop of the demand of updating deteriorated facilities and constructing new facilities for the Urban-Area Redevelopment Projects, high-performance heat exchangers are expected to be stably demanded. At the same time, the market in the new areas, such as hydrogen stations, is likely to expand. As a result, the high-performance heat exchanger

market, based on the shipment value at manufacturers, is likely to attain 78,710 billion yen by FY2020.

## ◆ Report Format:

Published report: "High-Performance Heat Exchangers 2017"

Issued on: June 30, 2017

Language: Japanese

Format: 226 pages in A4 format

Price: 150,000 yen (The consumption tax shall additionally be charged for the sales in Japan.)

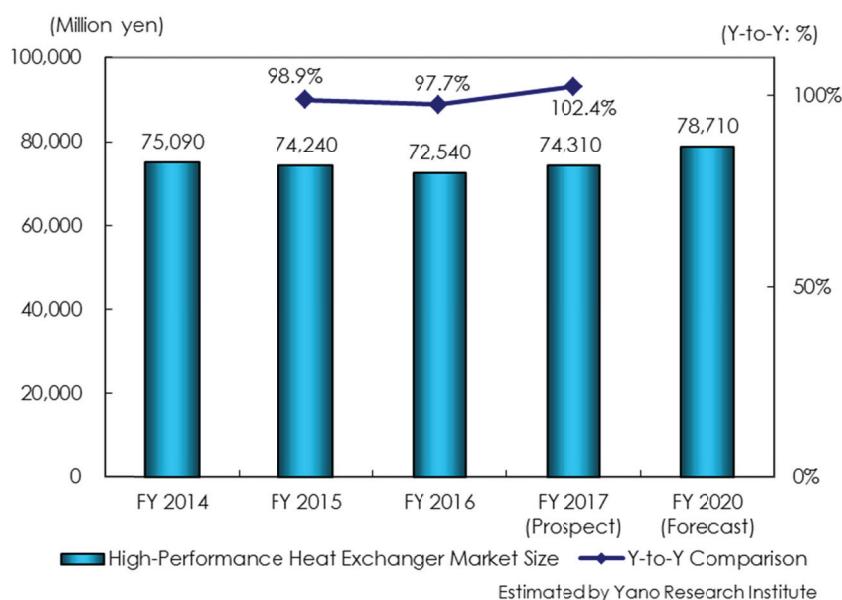
**Contacts:** Public Relations

**Yano Research Institute Ltd. (URL: <http://www.yanoresearch.com>)**

Phone: +81-3-5371-6912

E-mail: [press@yano.co.jp](mailto:press@yano.co.jp)

## ■ Figure 1: Transition and Size of High-Performance Heat Exchanger Market



Note:

1. The market size is calculated based on the shipment value at manufacturers

## ■ Table 1: New Demand Areas for New Application Development

Demand Area	Applications
Electricity/Energy	Temperature controllers and steam condensers for biomass power generation, freezing of amine solution at CO <sub>2</sub> recovering facilities, etc.
Refrigeration/Freezing	Display cases, freezers, containers, etc. for retailers
Ships	Coolers for EGR (Exhaust Gas Recirculation) for ships
Hydrogen Stations	Pre-and after-coolers for hydrogen stations, etc.
Utilization of Non-Utilized Heat	Heat recovery systems from exhaust gases/drainage, earth thermal, and ground water