

## Micro-pump Market Import | Export Outlook and Global Foresight 2027

Micro-pump Market Segment and Trend with Global Foresight 2027

PUNE, INDIA, June 15, 2018 /EINPresswire.com/ -- The global <u>micro-pump</u> market by type is estimated to grow at a CAGR of 17.2% during the forecasted period. Mechanical micro-pump segment commands the largest market share of 66.3% of total market and is expected to reach at USD 3,446.0 million by 2027.

A micro-pump is a miniature fluid delivery device. It is capable of generating flow at finite pressure loads. Micro-pumps are smaller than the conventional pumps, which use rotary or sliding motion to generate flow. These pumps are usually made by micro scale fabrication methods such as micromachining or microinjection molding. Micro-pumps are one of the main components of the microfluidic devices with a wide variety of biomedical applications. Their capability in accurately pushing the micro fluids through the micro-channels has made them act as the heart of such different diagnostic and drug delivery micro-devices. They might be coupled with micro-filters, micro-mixers, micro-dispensers, micro-needles etc. in different micro devices.

Micro-pumps are categorized in to two main distinctive categories: Mechanical micro-pumps and Nonmechanical micro-pumps. Mechanical micro-pumps are also referred to as displacement pumps which need a physical actuator. Non-mechanical micro-pumps are also referred to as dynamic micropumps. These are used in micro devices in order to add energy to the working fluid to either increase its momentum.

The mechanical micro-pump has moving parts so it requires a physical actuator for the pumping of fluids or gases. The most common mechanical micro-pump is displacement type micro-pump. Mechanical micro-pump consists of a pumping chamber which is closed with a flexible diaphragm. The fluid flow is achieved by the moving diaphragm. The performance of mechanical micro-pump is normally limited by its mechanical components. Different types of micro-pumps have different working mechanism. Few of the mechanical micro-pumps include piezoelectric micro-pump, syringe pump, peristaltic pump among others. The non-mechanical micro-pumps have no moving mechanical parts. Instead, they need a type of mechanism that can convert non-mechanical energy into kinetic momentum. Non-mechanical pump does not need physical actuation components; hence design and fabrication of these micro-pumps is relatively simple and easy as compared to mechanical micro-pumps. The non-mechanical micro-pumps have certain limitations, such as the use of only low conductivity fluids and the actuation mechanisms interfere with the pumping liquids. Electroosmotic (EO), Electrowetting (EW), Electrochemical, Evaporation, bubble, magnetohydrodynamic (MHD) are some of the types of non-mechanical micro-pumps.

North America commands the largest market share of 56.4% global non-mechanical micro-pump market in 2015. The market in North America was valued at USD 149.0 million in 2015 and expected to reach at USD 1,072.0 million by 2027 at the rate of 16.3% during the forecasted period.

The Global Micro-Pump market statistical report published by Market Research future contains a brief overview of Global Micro-Pump market by type. Mechanical micropump type commands the largest share and is expected to grow continuously during the forecasted period of 2013-2027. The report

analyzed the Global Micro-pump market by type and presents systematic data of market share on the basis of mechanical micropump and non-mechanical micropump and its growth rate for 2015 to 2017, along with forecast till 2027.

Market Research future through this report aims to provide understanding of the Global Micro-pump market on the basis of mechanical micropump and non-mechanical and also assists identification of ongoing trends along with anticipated growth during the forecasted period. For this report, extensive primary research was conducted to gain a deeper insight of the market performance. Various industry experts and Key Opinion Leaders (KOLs) were contacted and interviewed to get an idea of Global Micro-pump market by type.

List of Tables

TABLE 1 GLOBAL MICROPUMP MARKET, BY TYPE, 2013-2027 (USD MILLION) TABLE 2 GLOBAL MECHANICAL MICRO-PUMP MARKET, BY REGION, 2013-2027 (USD MILLION) TABLE 3 GLOBAL NON-MECHANICAL MICRO-PUMP MARKET, BY REGION, 2013-2027 (USD MILLION)

TABLE 4 NORTH AMERICA MICRO-PUMP MARKET, BY TYPE, 2013-2027 (USD MILLION) TABLE 5 EUROPE MICRO-PUMP MARKET, BY TYPE, 2013-2027 (USD MILLION) TABLE 6 ASIA-PACIFIC MICRO-PUMP MARKET, BY TYPE, 2013-2027 (USD MILLION) TABLE 7 MIDDLE EAST & AFRICA MICRO-PUMP MARKET, BY TYPE, 2013-2027 (USD MILLION)

(Get our exclusive statistical reports at \$299 only, for details, cordially enquire) Enquire now: <u>https://www.marketresearchfuture.com/statistical-reports/enquiry/3092</u>

Norah Trent wiseguyreports +1 646 845 9349 / +44 208 133 9349 email us here

This press release can be viewed online at: http://www.einpresswire.com

Disclaimer: If you have any questions regarding information in this press release please contact the company listed in the press release. Please do not contact EIN Presswire. We will be unable to assist you with your inquiry. EIN Presswire disclaims any content contained in these releases. © 1995-2018 IPD Group, Inc. All Right Reserved.