

EJECTOR DEVICE AND REFRIGERATION CYCLE APPARATUS USING THE SAME

ABSTRACT OF THE DISCLOSURE

An ejector device (14) includes a nozzle (140) having an inner wall surface defining a circular cross-sectional fluid passage (143) extending from an inlet (141) to a jet port (142). Furthermore, the fluid passage has a throat portion (144) at a position between the inlet and the jet port, and a passage expanding portion (145) in which the cross-sectional area of the fluid passage is enlarged from the throat portion as toward downstream. The passage expanding portion includes a middle portion (147) in which the inner wall surface is expanded in a fluid flow direction by a first expanding angle (θ_1), and an outlet portion (148) from a downstream end of the middle portion to the jet port, in which the inner wall surface is expanded in the fluid flow direction by a second expanding angle (θ_2) that is larger than the first expanding angle. The ejector device can be suitably used for a refrigeration cycle apparatus.

Figure 2