

Artificial pump can 'heal heart' instead of a transplant

By Sarah Knapton SCIENCE EDITOR

MECHANICAL pumps fitted to help heart failure patients could actually heal their organ and eliminate the need for a transplant, scientists have found.

Around 500,000 people in Britain are diagnosed with heart failure each year. If their condition becomes life threatening, they often need a left ventricular assist device (LVAD) to keep them alive as they await a transplant.

But scientists at Newcastle Univer-

500,000

The number of people in Britain who suffer heart failure each year and may need to be fitted with a mechanical pump

sity have discovered that nearly a third of men fitted with a pump recovered enough to have it removed, without the need for a transplant.

The university team conducted a trial on 58 men fitted with LVADs. After an average of 396 days using the device they were tested on a treadmill against 97 healthy men and nearly one in three had recovered enough to allow the device to be removed.

"For the first time, what we have shown is that heart function is restored in some patients - to the extent that they are just like someone healthy who has never had heart disease," said Dr Djordje Jakovljevic, at the university. The study was published in the *Journal of the American College of Cardiology*.