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## CARDIOVASCULAR

# New fenestrated and equipped with an endobag aortic arch endograft

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| <b>Applicant</b>     | Università degli Studi Padova                         |
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| <b>Priority Date</b> | 23/05/2018  |
| <b>Protection</b>    | IT102018000005638<br>US and CN national phase Ongoing |

### TRL scale



### What's needed for?

The endovascular treatment of aortic arch aneurysms allows to exclude an aneurysm, ensuring proximal and distal sealing and preventing any endoleaks, sustained by supra-aortic trunks. This endograft is dedicated to aortic arch aneurysm treatment. Its aims to favor a less invasive approach compared to the 'classical' more risky, open reconstruction and to reduce some problems with the aortic arch endografts, currently in use. This fenestrated endograft is equipped with an endobag and is specifically designed for the aortic arch segment. Currently the endografts used to treat the aneurysms of the aortic arch are an adaptation, which are not always safe, of other endografts used to isolate Abdominal Aortic or Descending Thoracic Aorta aneurysms. The complex anatomy of the aortic arch requires the development of a specific endograft able to overcome the limitations of the endografts currently in use. This patented endograft, fenestrated and equipped with an endobag, is able to reduce the risks of brain embolisms, because it doesn't require the release of other cover stents at supraortic artery levels and reduces the risk of endoleaks, thanks to the presence of an endobag that occupies all possible space, between the prosthetic and aortic walls: being mono-modular, few steps are necessary for its release. Therefore this invention provides a safer graft for the endovascular repair of aortic arch aneurysms, avoiding the risks associated with "classic" open surgery or the use of current multi-modular fenestrated endoprogrants, which are unable to adapt perfectly to the specific conformation of the anatomy of this aortic segment.

### Advantages

- This patented endograft is dedicated to aortic arch aneurysm treatment. Its aims to favor a less invasive approach compared to the 'classical' more risky, open reconstruction
- It reduces the risk of endoleaks, thanks to the presence of an endobag that occupies all possible space, between the prosthetic and aortic walls
- It is a mono-modular endograft and few steps are necessary for its release

### Applications

This endograft is dedicated to aortic arch aneurysm treatment.