Bioresorbable scaffolds versus metallic stents in the treatment of coronary artery disease?

Drug-eluting stents are the standard of care in percutaneous coronary intervention (PCI). Stent thrombosis can occur when the stent has a rigid metallic scaffold. The question evaluated in this study is whether stents with a bioresorbable scaffold would be better.

In this study in the Netherlands, 1,845 patients were randomly assigned to be treated with a bioresorbable stent or a metallic stent.

At follow-up the researchers report that there was no significant difference in the rate of target-vessel failure between the patients who received a bioresorbable scaffold and the patients who received a metallic stent. The bioresorbable scaffold was associated with a higher incidence of device thrombosis than the metallic stent through two years of follow-up.


Target blood pressure in patients at high cardiovascular risk

Guidelines recommend a blood pressure target of less than 140/90mmHg to reduce cardiovascular events but the degree to which blood pressure should be lowered to achieve the lowest risk of cardiovascular disease events is unknown.

In this report the authors throw some light on this issue. They review data from two trials involving high-risk patients aged 55 years or older with a history of cardiovascular disease, 70% of whom had hypertension. Approximately 40,000 patients from 733 centres in 40 countries were included and followed up for a median of 56 months.

The authors report that their study suggests that reduction of systolic blood pressure to less than 120mmHg or diastolic blood pressure to less than 70mmHg is associated with an increase in cardiovascular death and all-cause death events, and with no reduction in myocardial infarction or stroke. In high-risk patients, a target blood pressure of 120–130mmHg systolic and 70–80mmHg diastolic is associated with lowest rates of cardiovascular disease events.

Lancet 2017; 389:2226–37

Trial of minocycline in a clinically isolated syndrome of multiple sclerosis

After a first focal clinical demyelinating event (also called a clinically isolated syndrome), the risk of conversion to multiple sclerosis is high.

Minocycline has immune-modulating properties. Its use may lower the risk of such a conversion. In this trial, 142 eligible patients were randomised to receive either minocycline or placebo as treatment.

The risk of conversion from a clinically isolated syndrome to multiple sclerosis was significantly lower with minocycline than with placebo over six months but not over 24 months. There were significantly more adverse effects in the minocycline cohort.

N Engl J Med 2017; 376:2122–33

URL: