

993 BIKES THE UK'S **BIGGEST** ROAD BIKE BUYER'S GUIDE INSIDE



BIKES >> TRAINING >> GEAR >> FITNESS >> FIXES >> RIDES

December 2010

CYCLING

PLUS

MAGAZINE OF THE YEAR

WINTER SURVIVAL GUIDE

65 NEW TESTS

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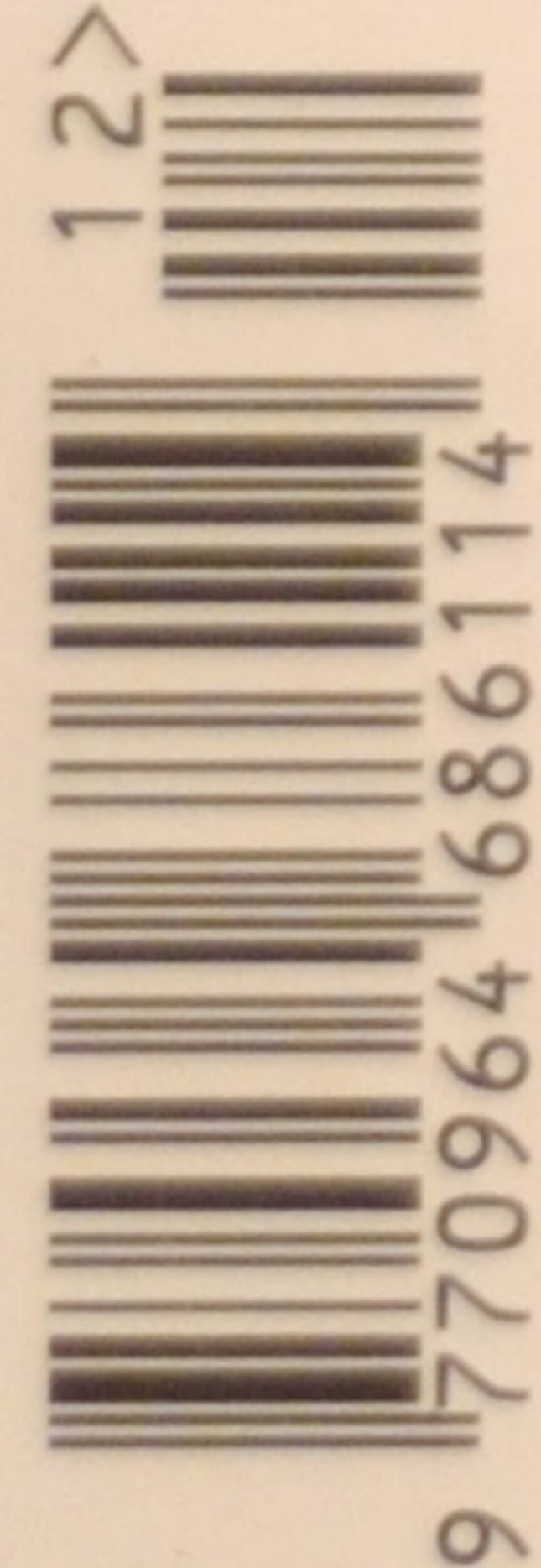
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BOX YOUR EARS!

Award-winning design student Anirudha Surabhi turns helmets on their heads by using cardboard...

THE NEW KRANIUM helmet was designed by Anirudha Surabhi, an industrial design student at the Royal College of Art. He looked into current helmet design and found that the usual polystyrene core is great for creating complex structures to help keep your head cool, but he claims the material is

By using a cardboard inner structure it absorbs four times the amount of energy of an equivalent helmet

lacking when it comes to protection. Polystyrene does little to absorb impacts, instead distributing them around the head. Surabhi claims that a cardboard inner structure actually absorbs four times the amount of energy of an equivalent helmet.

The Kranium has been tested to the British Standard EN1078 and it passed the test with figures far exceeding the standard results. The same helmet was in fact tested a further four times and passed each time, where a standard helmet can only be tested once. The ribbed cardboard structure is designed to flex on impact and crumple in bigger impacts, so less energy from a fall will be transferred through to the rider's head.

And never fear, the Kranium won't turn to pulp in the rain: the cardboard is pre-treated with a waterproof coating to resist the elements, but still remains fully recyclable. **PLUS**

For more information on the Kranium see www.anirudharao.com



'Board' with ordinary helmets? Try the Kranium instead...

GET THE RIGHT FIT

ASIDE FROM THE radical material, the Kranium is designed to be offered in both off-the-peg and custom fit versions. A full scan can be made of your head, which is turned into a laser-cut component sheet (think Airfix kit) and then assembled into your very own bespoke helmet.

Surabhi also plans to offer a range of covers, which again can be fully customised by the wearer.

FIRST LOOK



ULTIMATE ULTREMOMO!

SCHWALBE HAS REVAMPED the popular Ultremo race tyre, which it claims has 15 per cent lower rolling resistance, improved puncture protection and longer wear – achieved by using a new compound – while remaining one of the lightest tyres out there at 195g. They're also available in 11 colours. €46 www.schwalbe.com



SMANIE SADDLES

NEW OUT OF Italy, the Sport Manie (SMANIE) saddle range uses ECO+ padding technology. What sets it aside from the competition is that the closed-cell polymer doesn't need a leather or vinyl cover to protect it from the elements, and it's completely recyclable. We'll have an exclusive test in next month's issue.

www.windwave.co.uk



GARMIN GETS TOUCHY

DUE OUT THIS month, Garmin's new Edge 800 bike GPS looks very promising. The screen is larger than the 705's and touch-sensitivity replaces the 705's navigation nipple. The interface has been revamped and the biggest improvement for UK users is compatibility with Garmin's GB Discoverer maps, which gives you OS 1:50,000 navigation. Full review next month, but first impressions are very positive. Bundles from €350. www.garmin.com

MOST WANTED



STRONG STUFF

KNOG HAS MADE a reputation out of doing things differently, and its new lock range is no different. The design of the Strongman is pretty clever: its square shape makes it difficult to attack with traditional tools, so it should hold off bike tea-leaves for longer. As soon as the Strongman is available over here, we'll be testing it to breaking point.

www.todayscyclist.co.uk

CORRECTION ONE23 ULTRA BRIGHT 1

THE RRP OF this LED front light is £22.99 and not as printed in Cycling Plus 242. We still think it's a good light, and it's still decent value at that price..