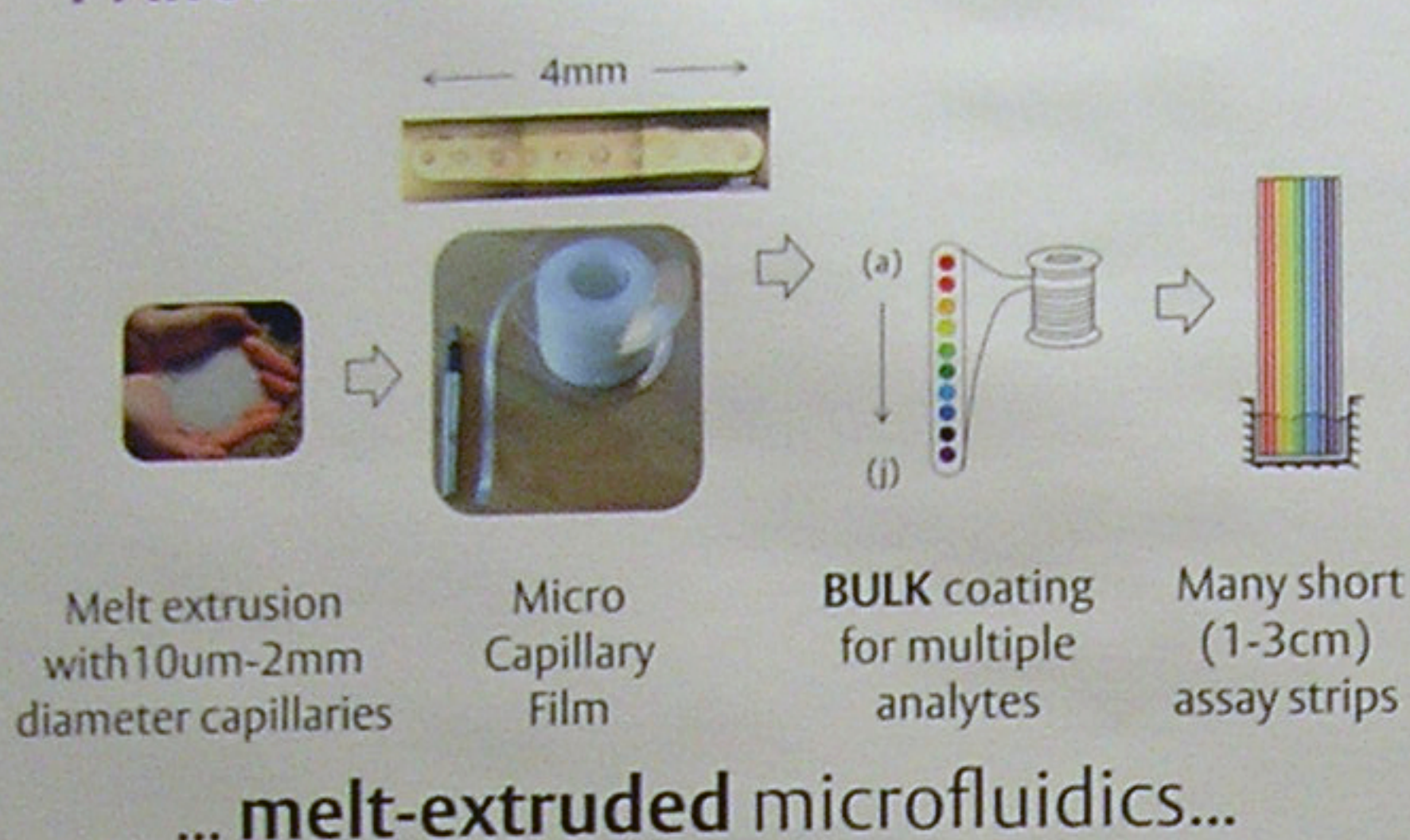


Dipstick Microfluidics

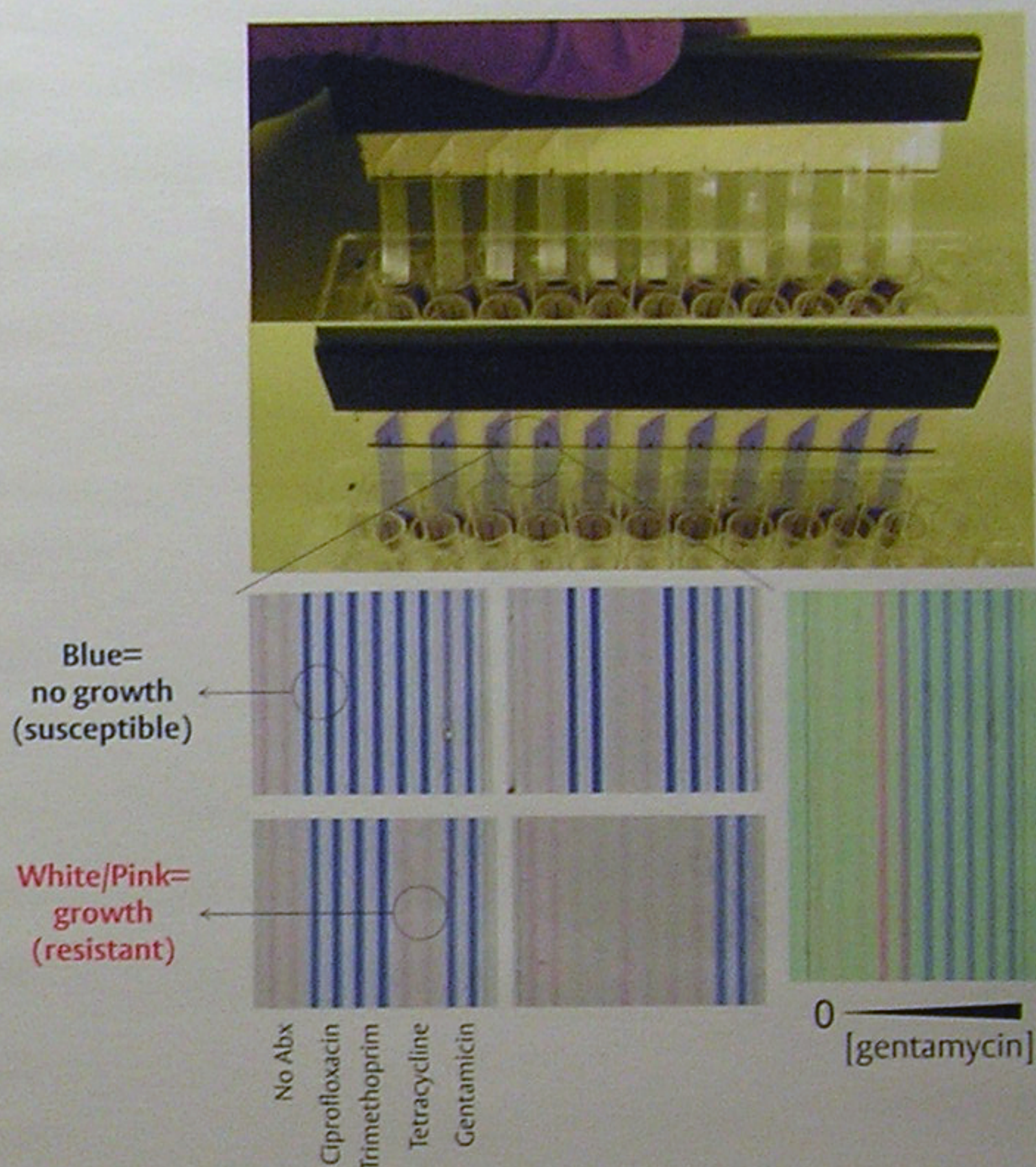
Affordable Microfluidics in a "Dip and Test" Format

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1 Affordable and Scalable Microfluidics



3 Rapid Antimicrobial Resistance Testing



Lab-on-a-Stick comb in use (top) to perform functional antibiotic resistance testing. Images of four *E. coli* isolates from patients with urinary tract infection (UTI) with different susceptibility profiles tested using Lab-on-a-Stick antibiograms with duplicate antibiotic loaded capillaries (lower left). Minimum inhibitory concentration (MIC) measurement (lower right).

2 What is Dipstick Microfluidics?

We developed a mass manufactured material that combines the analytical performance of Lab-on-a-Chip microfluidics, with the simplicity and ease of use of a dipstick. We call this "Lab-on-a-Stick".

1. Reel of extruded microcapillary film
2. Load with reagent panel
3. Cut into test dip strips



Blood sample drawn up rapidly into microcapillaries for testing. Each strip performs 10 different tests on each sample.

"Lab-on-a-Stick" concept- hundreds of test strips produced per batch.

Next Generation Lateral Flow for Point-of-Care Testing

Microfluidic 'lab-on-a-chip' technology promises to transform diagnostics, but device manufacture remains challenging. A unique extruded micro-engineered material, Micro Capillary Film (MCF) offers a solution. MCF is highly suited to performing rapid, quantitative, multi-analyte point-of-care diagnostics, and can be affordably produced on a massive scale. "Lab-on-a-Stick" testing further simplifies microfluidic testing.

Diagnostic applications of a fluoropolymer MCF are being developed at the University of Reading School of Pharmacy and Loughborough University Chemical Engineering Department with Capillary Film Technology Ltd, founded by inventors Edwards and Reis together with MCF manufacturer Lamina. See www.capfilmtech.com for details.

CFT is seeking new partners to co-develop products that benefit from cost-effective, quantitative multi-analyte assays in diagnostics and related markets.



References

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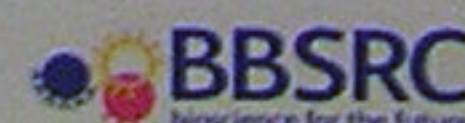
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