

New invisibility cloak conceals cats and fish from up to six directions

By [Jacob Kastrenakes](http://www.theverge.com/users/Jacob%20Kastrenakes) (<http://www.theverge.com/users/Jacob%20Kastrenakes>) on June 11, 2013 12:52 pm [Email \(mailto:jacob.kastrenakes@theverge.com\)](mailto:jacob.kastrenakes@theverge.com)
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Researchers can now make a cat and a fish disappear from plain sight, so long as they're looked at from the right angle. Last Friday, one of the first large-scale "invisibility cloaks" — devices that can hide objects from the human eye — was unveiled by a group of physicists from Zhejiang University in China, Nanyang Technological University in Singapore, and institutions in Boston and the UK. The team built two different devices, a rectangular container and a hexagonal container, and each can hide items from viewers who are looking directly at any of their sides.

Both containers are made of a thin glass that bends light from one flat side to the other, making them appear translucent. While the solution can sound simple, the researchers had to reanalyze aspects of an earlier model of how cloaks could be made.

In doing so, the team recognized a design element that wasn't necessary on a large scale: previous cloaks tried to keep all of the

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light that passed through them in perfect condition — but for a larger cloak, the researchers determined that they didn't have to do that. Some minor differences may be noticeable between the invisibility cloak and the real world, but the physicists argue that humans shouldn't be able to distinguish those small changes.

Right now, the new cloaking device isn't fully concealed yet. Its seams are still visible due to dried glue holding the glass together, and the research team hasn't commented on whether it can easily be expanded to conceal objects at more angles. But even so, the team believes that their work can serve as more than an elaborate parlor trick — its current form could be applied to security and surveillance devices, as long as the angle is just right.

CHANGES, BUT YOU CAN'T SEE IT

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