

BBC

Search

Low Graphics version | Change edition

Contact us | Help



BBC NEWS WORLD EDITION

LATEST NEWS IN VIDEO AND AUDIO

News Front Page

Last Updated: Thursday, 6 January, 2005, 15:13 GMT

[E-mail this to a friend](#)[Printable version](#)[Africa](#)[Americas](#)[Asia-Pacific](#)[Europe](#)[Middle East](#)[South Asia](#)[UK](#)[England](#)[Northern Ireland](#)[Scotland](#)[Wales](#)[Politics](#)[Education](#)[Magazine](#)[Business](#)[Health](#)[Science/Nature](#)[Technology](#)[Entertainment](#)[Have Your Say](#)[In Pictures](#)[Week at a Glance](#)[Country Profiles](#)[In Depth](#)[Programmes](#)

BBC SPORT

BBC WEATHER

BBC ON THIS DAY

Scientists pinpoint look of fear

Experts who used technology developed in Glasgow say they have discovered that the eyes can be a giveaway when it comes to identifying fear.

Scientists, including Glasgow University's Professor Philippe Schyns, looked at the case of a woman who had rare damage to part of her brain.

They found she could only identify fear if asked to look at a person's eyes.

The research, which used 30 control subjects as well as the case study, was published in science journal Nature.

Part of the experiment saw participants being shown images of faces with their eyes erased.

The 38-year-old female case study had suffered bilateral damage to her amygdala - an almond-shape part of the brain in the temporal lobe.

Although she is completely unable to recognise fear from facial expressions, the scientists found the problem could be overcome by instructing her to concentrate on a person's eyes.

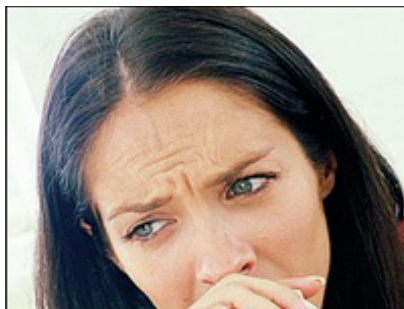
Judging emotions

The researchers found, however, that the woman, named SM in the study, only succeeded in directing her gaze to the eye regions of facial images when given explicit reminders.

SM's problem was that although she could physically see facial features, she could not recognise the emotion of fear.

Her impairment stemmed from an inability to make normal use of information from the eye region within faces when judging emotions, although she could read emotions from the mouth.

The woman's selective impairment in recognising fear is explained by the fact that the eyes are the most important



Experts say the eyes are all-important for identifying fear

SEE ALSO:

[Select few 'can identify liars'](#)

15 Oct 04 | Health

[Report gives polygraphs the lie](#)

08 Oct 02 | Technology

RELATED INTERNET LINKS:

[Glasgow University](#)

[Nature](#)

The BBC is not responsible for the content of external internet sites

TOP SCOTLAND STORIES NOW

[McConnell hails sectarian summit](#)

[Murder accused 'hated his mother'](#)

[Computer giant to create 850 jobs](#)

[Jodi killer to appeal conviction](#)

TOP UK STORIES NOW

['Explosion plan' UK man in court](#)

[Synod debates women bishops](#)

[Arrests at hare coursing event](#)

[Frozen embryo row off to Europe](#)

feature for identifying fear, say the experts.

However, the subject's recognition of fearful faces became entirely normal when she was instructed to look at the eyes.


The scientists say that the study shows there are mechanisms in the brain that allow us to actively seek out information in the environment in the first place.

They believe that the positive effect of explicit reminders may help those who suffer from disorders such as autism, which affects about half a million people in the UK.

 [E-mail this to a friend](#)

 [Printable version](#)

LINKS TO MORE SCOTLAND STORIES

[News alerts](#) | [E-mail services](#) | [Desktop ticker](#) | [Mobiles/PDAs](#)

 MMV

[Help](#) | [Privacy & Cookies Policy](#) | [News sources](#) | [About the BBC](#)

[Back to top](#) ^^

[News Front Page](#) | [Africa](#) | [Americas](#) | [Asia-Pacific](#) | [Europe](#) | [Middle East](#) | [South Asia UK](#) | [Business](#) | [Entertainment](#) | [Science/Nature](#) | [Technology](#) | [Health](#)

[Have Your Say](#) | [In Pictures](#) | [Week at a Glance](#) | [Country Profiles](#) | [In Depth](#) | [Programmes](#)

[BBC Homepage >>](#) | [BBC Sport >>](#) | [BBC Weather >>](#) | [BBC World Service >>](#)

NEWSWATCH

[Notes and corrections](#) | [Contact us](#) | [About BBC News](#) | [Profiles](#) | [History](#)