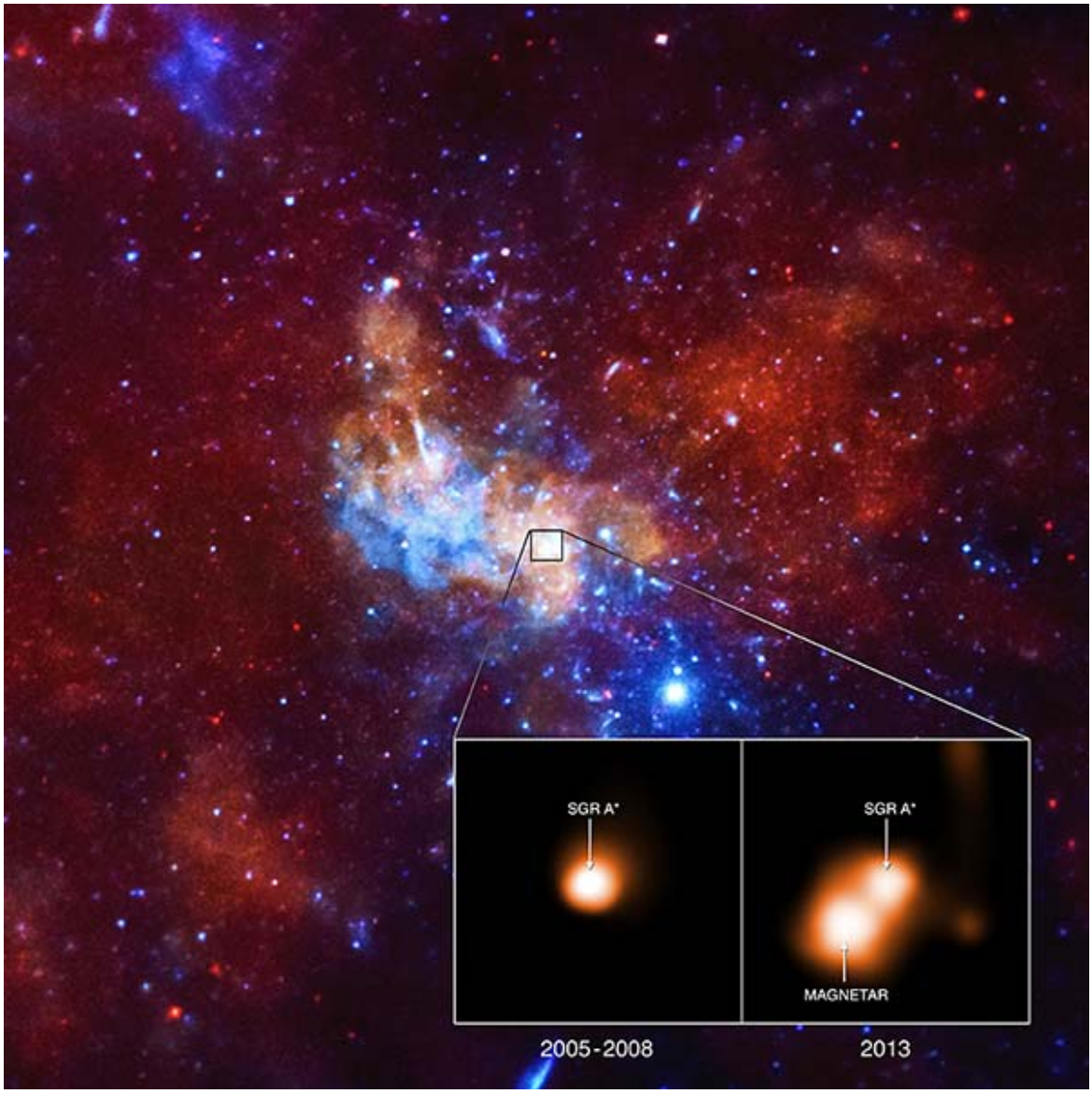

Chandra X-ray Observatory Center

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SGR 1745-2900: A magnetar as close as about 2 trillion miles to the Milky Way's supermassive black hole.
(Credit: NASA/CXC/INAF/F.Coti Zelati et al

Caption: Since its discovery two years ago when it gave off a burst of X-rays, astronomers have been actively monitoring the magnetar, dubbed SGR 1745-2900, with Chandra and XMM-Newton. The main image of the graphic shows the region around the Milky Way's black hole in X-rays from Chandra (red, green, and blue are the low, medium, and high-energy X-rays respectively). The inset contains Chandra's close-up look at the area right around the black hole, showing a combined image obtained between 2005 and 2008 (left) when the magnetar was not detected, during a quiescent period, and an observation in 2013 (right) when it was caught as a bright point source during the X-ray outburst that led to its discovery. A new study uses long-term monitoring observations to reveal that the X-ray output from SGR 1745-2900 is dropping more slowly than for other magnetars, and its surface is hotter than expected.

Scale: Main Image is 8 arcmin across (about 61 light years); Inset image is about 14 arcsec across (1.8 light years)

Chandra X-ray Observatory ACIS Image