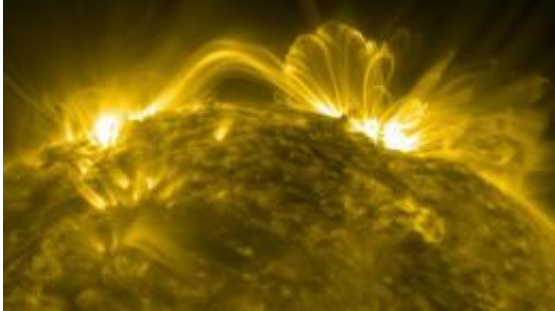


Prelude to an X-Class solar flare

July 17 2012, By Nancy Atkinson



Caption: Shimmering coronal loops from Active Region 1515 on the limb of the Sun before it rotates out of view on July 12, 2012. Credit: NASA/SDO/Goddard Spaceflight Center

What takes place on the Sun before it unleashes a huge solar flare? It's a thing of beauty, and observations from the Solar Dynamics Observatory are helping scientists understand how magnetic energy on the Sun creates these giant explosions. Below is a video that shows all the activity on the Sun before it emitted a huge X 1.4- class solar flare on July 12, 2012.

The shimmering coronal loops provide some magnetic magnificence that is simply stunning. The movie, created from data from SDO, shows the Sun from late July 8 to early July 10 shortly before the [solar flare](#) occurred. While the flare isn't shown here, the movie shows how the Sun is constantly, and complexly, active.

The region responsible for the flare, Active Region 1520 is on the lower

left part of the Sun, and it crackles with giant loops of magnetized solar material. On the right side of the Sun, the shimmering, enormous loops provide a parting view of Active Region 1515 – which was also responsible for many solar flares — as it disappears out of view along with the [Sun](#)'s rotation.

There is a lot happening in this video, so take the advice of video producer Scott Wiessinger from Goddard Spaceflight Center's Scientific Visualization Studio, who suggests watching it at highest quality and in full screen. You can download large files of it [here](#).

Source: [Universe Today](#)

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