

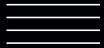
The Whirlpool Galaxy – an image in infrared light taken by the Spitzer Space Telescope.

The Whirlpool is a spiral galaxy made up of billions of stars. As you touch the infrared image, you can trace out the spiral arms that contain the brightest stars. But this infrared light is coming from huge dust clouds between those stars, and marks the location of stellar nurseries where the next generation of stars are being born. As you touch the outline of the Whirlpool you will come across a small companion galaxy at eleven o'clock. The companion contains little dust, and its infrared light comes from old, red stars.

The Whirlpool Galaxy – an image in X-ray light taken by the Chandra X-Ray Observatory.

As you touch the X-ray image of the Whirlpool, you will not detect the beautiful spiral arms that give the galaxy its name. Most of the X-ray emission coincides with the core of the Whirlpool and its companion galaxy, which you can feel as circles. The X-rays are coming from heated gas that is falling into giant black holes at the centers of each galaxy. As you move around the image, you can also feel pinpoints of X-ray emission. These are X-ray binary systems, where a neutron star or black hole is closely orbiting a normal star and feeding off the star's atmosphere.

Tactile key



Spiral arms



Center of galaxies



Companion galaxy

Adapted from the book Touch the Invisible Sky published by Ozone Publishing Corp. www.ozonepublishing.net



Tactile key



X-ray binaries



Center of galaxies



Diffuse X-ray glow

