With over 60 facilities located around the world, storage ring x-ray sources have become key components in the scientific toolbox of diverse research specialties and communities. Both upgrades to existing sources and brand new facilities are currently pushing the quality of the x-ray beams towards the fundamental (diffraction) limit for size and collimation imposed by the wave nature of electromagnetic radiation. At the same time, flux, stability, wavelength and reliability all continue to improve significantly. Furthermore, new detector technologies, x-ray optics, sample environments, and data collection strategies have significantly enhanced experimental capabilities and promise even greater things to come.

In this review of storage ring x-ray sources, I will briefly review the history of storage ring x-ray sources and then point out some of the new developments and the opportunities they will create for researchers.

**Keywords:** storage ring x-ray source, synchrotron, facilities