Remove the periodic noise from the given image "Noisy\_Smithsonian\_Castle.jpg" (Picture Courtesy: By Max211 - Own work, CC0, <a href="https://commons.wikimedia.org/w/index.php?curid=58091312">https://commons.wikimedia.org/w/index.php?curid=58091312</a>).

Provide the clear image and the noise pattern separately. The colab notebook should be well-documented. Follow the honour code.

Submit by: end of 27<sup>th</sup> October, 2022.

Max. marks: 10M