Nowadays, imaging devices such as digital cameras and light sources have suitable performance for the imagery. In this article, a method to investigate historical artifacts based on imagery techniques is discussed and examined as a basic study. In the method, spectral selectivity is focused on to extract information from taken images of the artifacts. The selectivity of wavelength in spectra is realized by changing light sources and filters used in the imagery. The proposed method is aimed to be one of investigation procedures in a total artifact investigation system including scientific or chemical investigation methods. The proposed method is applied to a matchlock and a Nishikie prepared for the research purposes. As a result of this research, information that is invisible for the human visual system is extracted by the proposed method, however it is difficult to conclude that the extracted information could provide effectiveness for the artifact investigation because the proposed method is limited to the basic investigations. More experimental results by the proposed method as well as improvements of the analyzing technique is required to extract the information from taken images as future work.

key words: spectral imaging, imaging technology, filtering, image analysis