Institute of Remote Sensing and Digital Earth
Chinese Academy of Sciences

Software practice of remote sensing image processing

Remote Sensing Applications in Conservation of Western Xia Mausoleums

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Heritage Conservation

Å Heritage conservation encompasses the identification, protection and promotion of important things in our culture and history.

Å Heritage covers a wide rang of tangible things:

- ï An object in built environment, such as a railway station, a bridge etc.
- ï An artifact of moveable cultural property, such as a painting, a dress etc.
- ï A part of our natural environment, such as a park, a garden etc.

Å Conservation can be defined as protection from any agent (be it environmental or human) that threatens to destroy heritage; it also implies increasing our understanding and awareness of heritage.

http://thecanadianencyclopedia.com/en/article/heritage-conservation/

Role of RS in Heritage Conservation

Å Remote sensing can assist the following achievements:

- ï Create up-to-date digital maps.
- ï Assist in the identification and precise location of sites.
- ï Help to delimitate management zones for conservation purposes.
- ï Monitor land cover changes.
- ï Assess damages caused by natural and/or human hazard.
- ï Assist the development of stereoscopic views so as to permit and obtain a digital elevation model of the landscape or some three-dimensional measurements of monuments.

Hadjimitsis D.G., 2005. http://cipa.icomos.org/fileadmin/template/doc/TURIN/356.pdf

Western Xia Mausoleums (1/4)

- Occupying an area of about 53 km^2, the Western Xia Mausoleums is composed of 9 imperial mausoleums and 263 tombs.
- Well known as oriental pyramids, Western Xia Mausoleums is determined to be National Key Cultural Relics Protection Units and National Scenic Regions in 1988, and was selected in Chinese Preparatory World Cultural and Natural Heritage List in 2006.
- Western Xia Mausoleums is applying for world cultural heritage.