A Big Earth Data Platform for Three Poles

**Landsat enhanced vegetation index (EVI) products over the Tibetan Plateau (1980s-2019)**

1、Description

The dataset is the Landsat enhanced vegetation index (EVI) products from 1970s to 2020 over the Tibetan Plateau。The dataset is producted based on Landsat surface reflectance dataset. It is calculated by the EVI equation which is added backgroud adjusted parameters C1 and C2, and atmospheric adjusted parameter L based on NDVI equation.And the corresponding production of quality identification documents (QA) is also generated to identify the cloud, ice and snow. Compared with NDVI, EVI has stronger ability to resist atmospheric interference and noise,so it is more suitable for weather conditions with high aerosol content and lush vegetation areas.

2、Keywords

Theme：Desert  
Discipline：Terrestrial Surface,Remote Sensing Technology  
Places：Qinghai-Tibet Plateau  
Time：1980s-2019

3、Data details

1.Scale：None

2.Projection：UTM

3.Filesize：5651824.64MB

4.Data format：None

4、Space scope

|  |  |  |
| --- | --- | --- |
| - | north：40.4 | - |
| west：73.4 | - | east：106.7 |
| - | south：24.6 | - |

5、Time frame:None--None

6、Reference method

References to data:

PENG Yan. Landsat enhanced vegetation index (EVI) products over the Tibetan Plateau (1980s-2019). A Big Earth Data Platform for Three Poles, doi:10.11888/Ecolo.tpdc.2717192021

References to articles:

Liu, H.Q., Huete, A. (1995). A feedback based modification of the ndvi to minimize canopy background and atmospheric noise. IEEE Transactions on Geoscience & Remote Sensing, 33(2), 457-465.

7、Supporting project information

Second Tibetan Plateau Scientific Expedition Program

8、Data resource provider

name: PENG Yan  
unit:   
email: pengyan@aircas.ac.cn