Subject: Bits & Bytes
Posted by jujo on Tue, 08 Jan 2008 11:46:32 GMT
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Hello there...
I'm sorry if my question is too basic. I'm working with 8 bits Spot Vegetation images. I have two bands:

1-NDVI data
2-Status Map (information about clouds, water, snow...)

I need to apply the status map on the NDVI data, because I need to flag cloud and snow pixels.

Below I have some information about the status map.

From MSB to LSB

Bit NR 7 (MSB): radiometric quality for B0 coded as 0 if bad and 1 if good
Bit NR 6: radiometric quality for B2 coded as 0 if bad and 1 if good
Bit NR 5: radiometric quality for B3 coded as 0 if bad and 1 if good
Bit NR 4: radiometric quality for MIR coded as 0 if bad and 1 if good quality
Bit NR 7 - 4: coded as 0 for 'no data', missing lines, sea on VGT-S products, adjacent blind or defective MIR detectors, interpolated data, saturated data, negative data after atmospheric correction
Bit NR 3: land (code 1) or water (code 0), computed from the "Digital Chart of the Worlds"
Bit NR 2: ice/snow (code 1) , code 0 if there is no ice/snow, computed from thresholds from reflectances
Bit NR1: 0 0 1 1
Bit NR0: 0 1 0 1

(LSB): clear shadow uncertain cloud

My question is: how can I use the status map to flag cloud and snow pixels? I'm reading them into ENVI, but I can't understand the byte numbers.

Any comments very welcome.
Best!
Jurandir