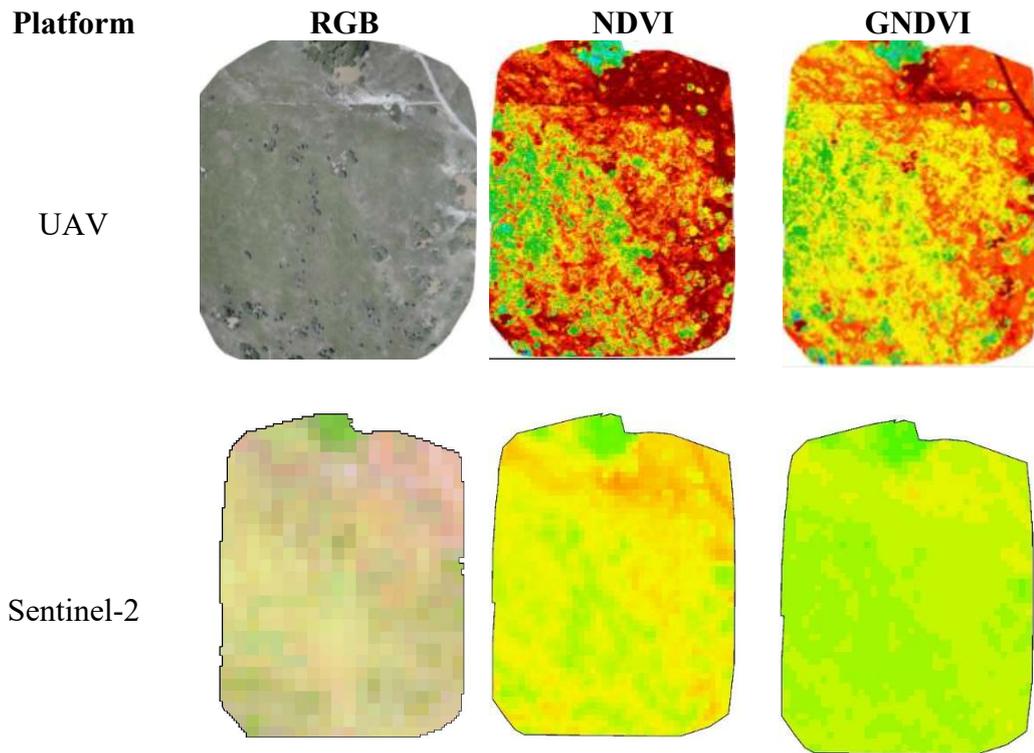


Supplementary materials

Below are supplementary materials for our manuscript titled “Comparative assessment of UAV and Sentinel-2 NDVI and GNDVI for preliminary diagnosis of habitat conditions in Burunge Wildlife Management Area, Tanzania”.

Figures S1-S10 are comparative multispectral vegetation index (VI) maps and RGB orthoimages generated from UAV orthoimages, compared with those generated from the sentinel-2 images. The red to blue color codes indicate the different habitat condition classes (very poor, poor, good and very good) each tallying with their VIs mean value ranges for each land cover type. Few plots missed the UAV RGB orthoimages as indicated in each plot due to technical faults in the RGB camera. However, the RGB images were not used in the data analysis. They clearly illustrate how powerful is the UAV platform in providing the preliminary indications of the different habitat condition classes.



Veg. Index colour code							
Habitat condition class	Very Poor	Poor	Good	Very Good			

Figure S1: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in grassland plot.

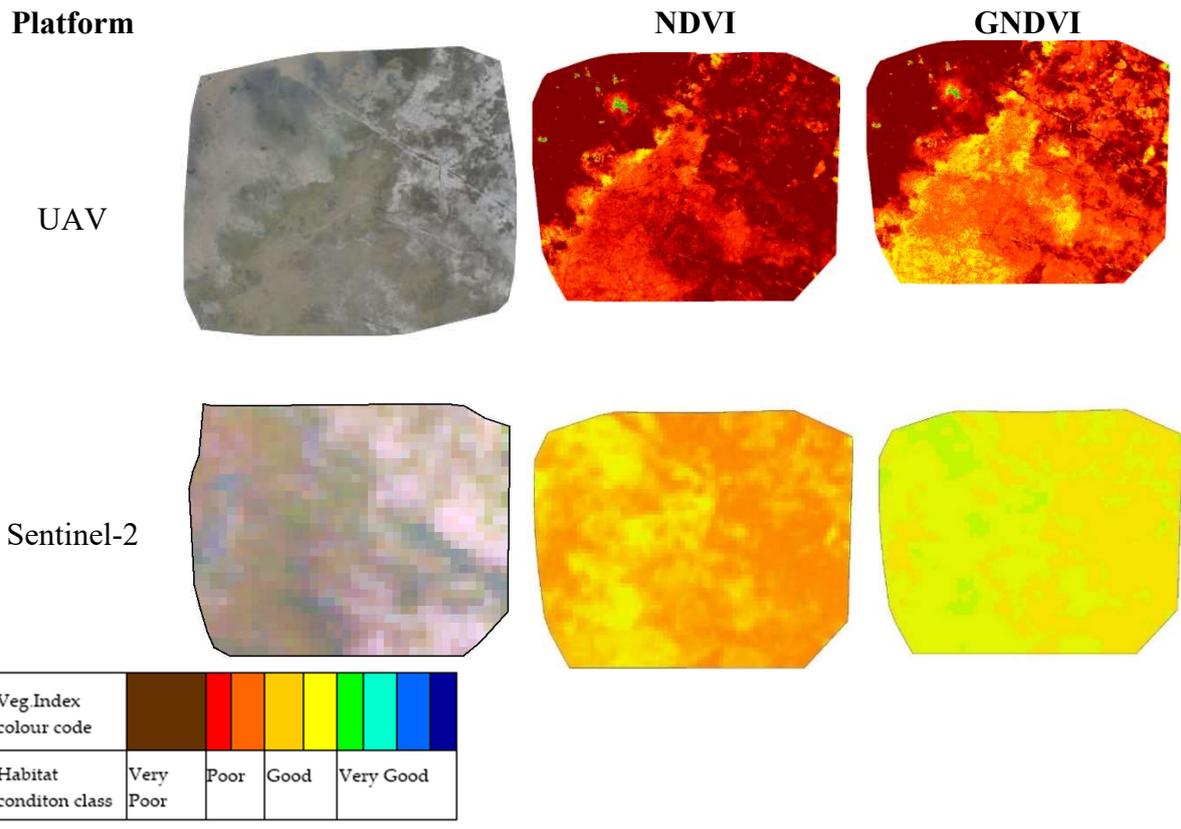
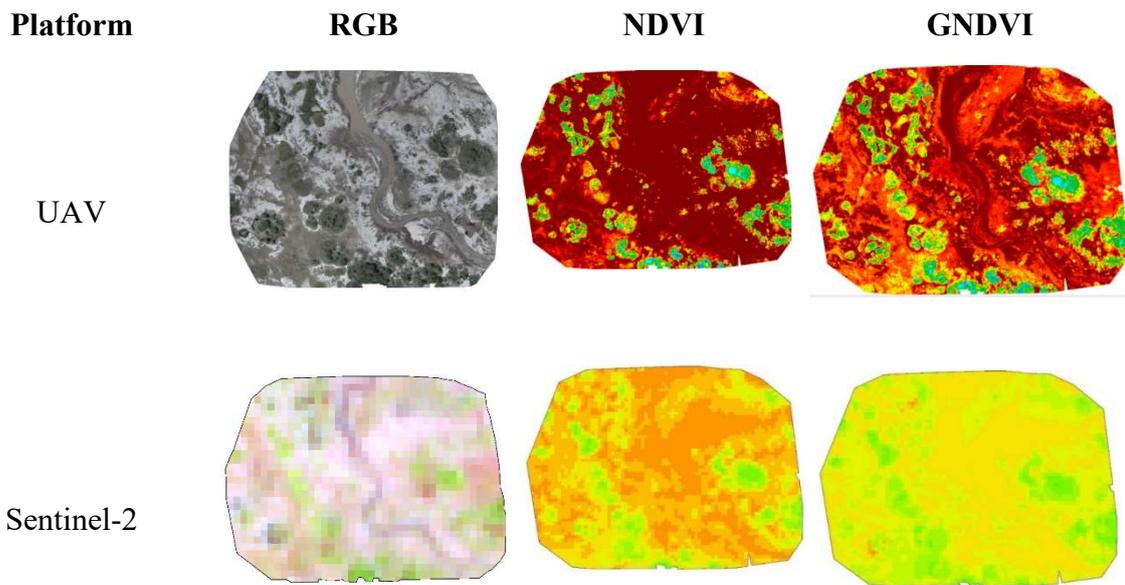
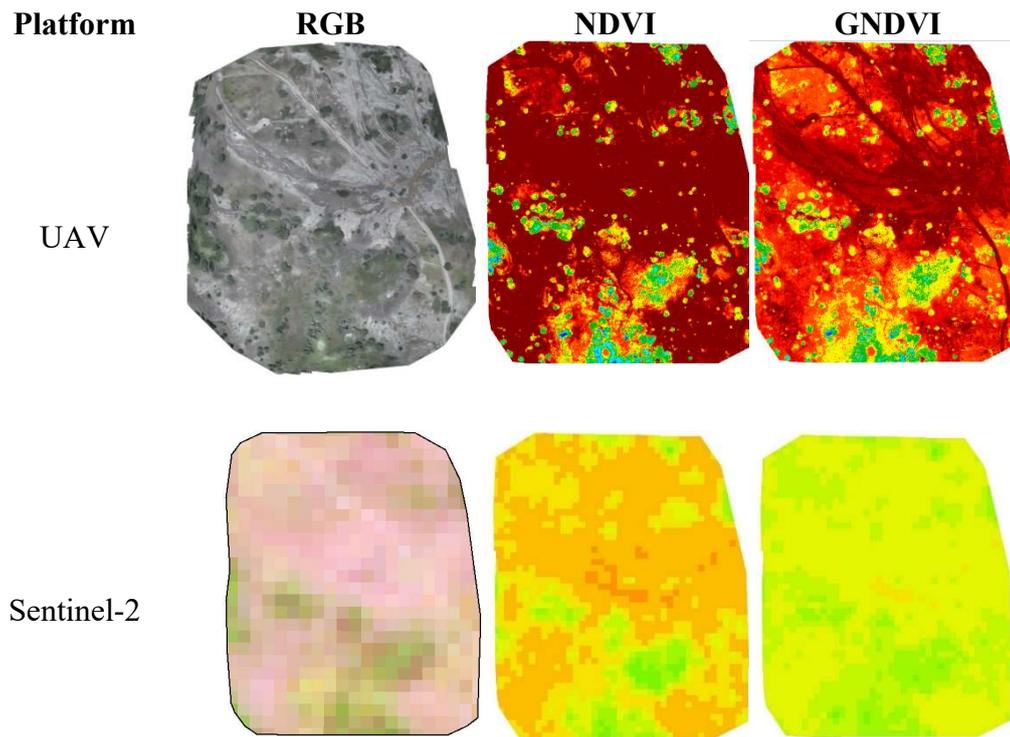


Figure S2: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in grassland-shrubland mosaic vegetation plot.



Veg.Index colour code							
Habitat conditon class	Very Poor	Poor	Good	Very Good			

Figure S3: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in wooded grassland plot



Veg. Index colour code							
Habitat conditon class	Very Poor	Poor	Good	Very Good			

Figure S4: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in shrubland-grassland mixed plot

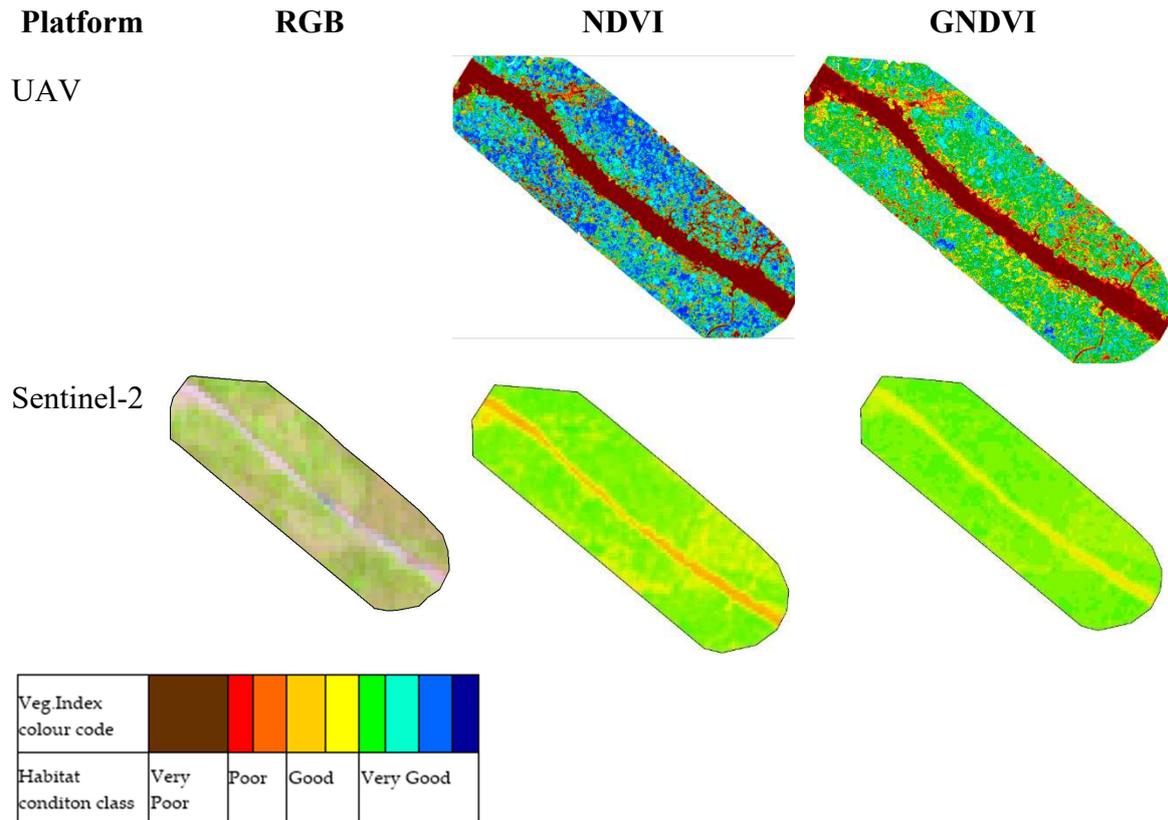


Figure S5: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in riverine plot.

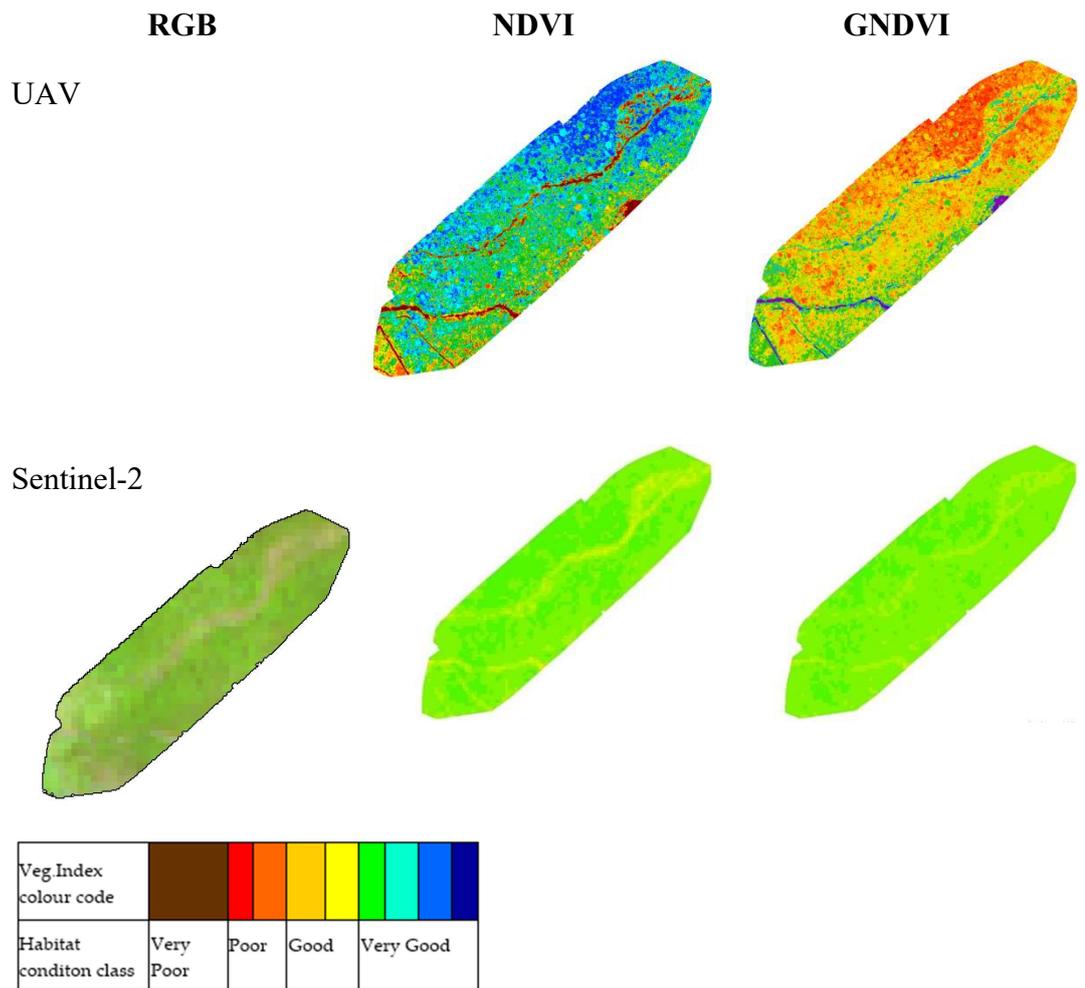


Figure S6: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in riverine plot

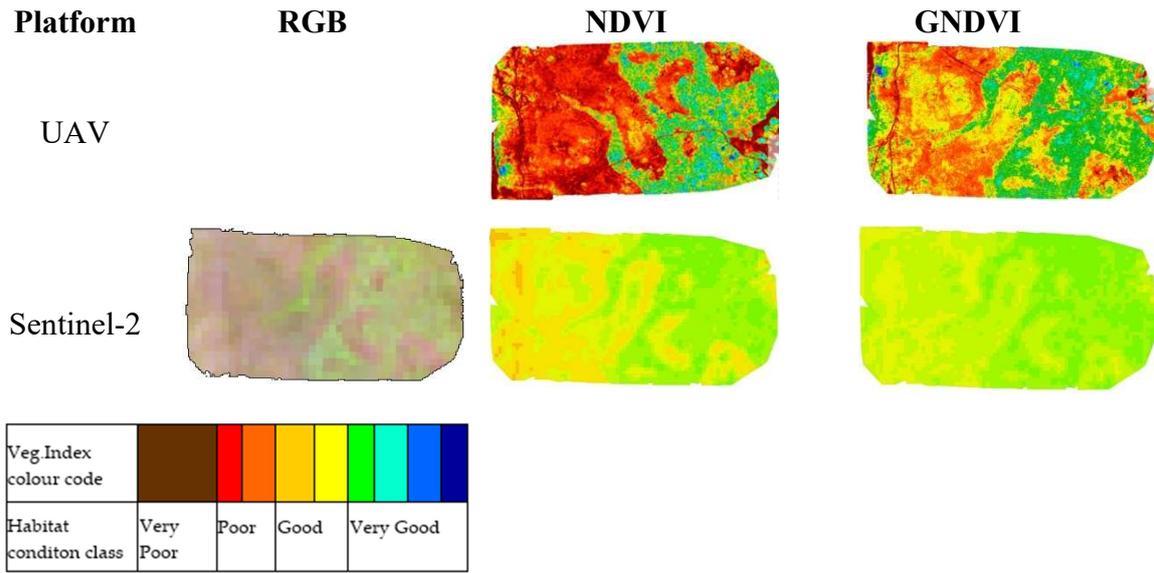
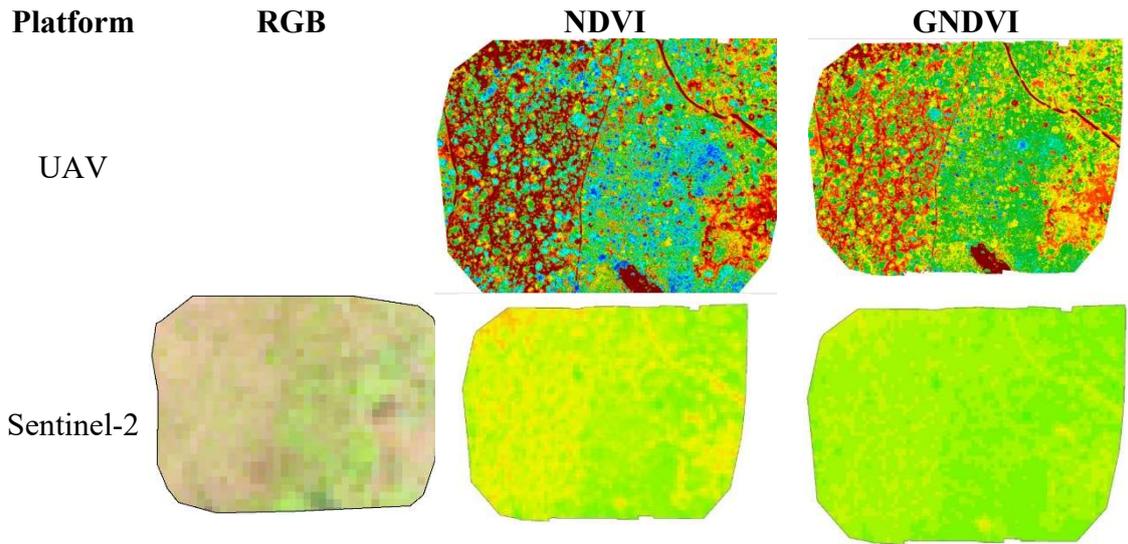
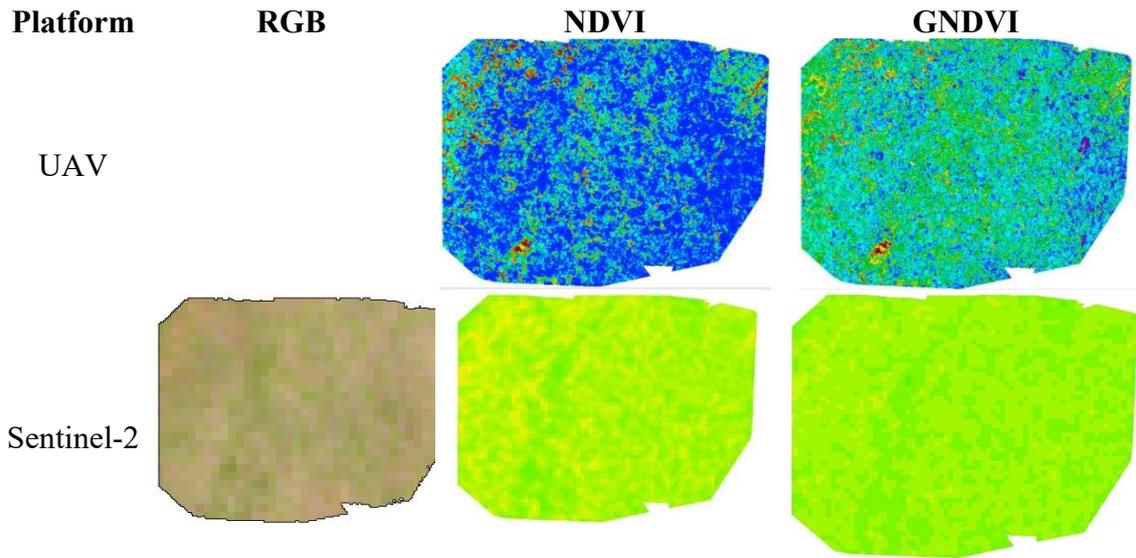


Figure S7: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in wooded grassland plot.



Veg.Index colour code							
Habitat conditon class	Very Poor	Poor	Good	Very Good			

Figure S8: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in shrubland



Veg. Index colour code							
Habitat conditon class	Very Poor	Poor	Good	Very Good			

Figure S9: Comparative vegetation index maps and RGB images generated by UAV and sentinel-2 in woodland plot

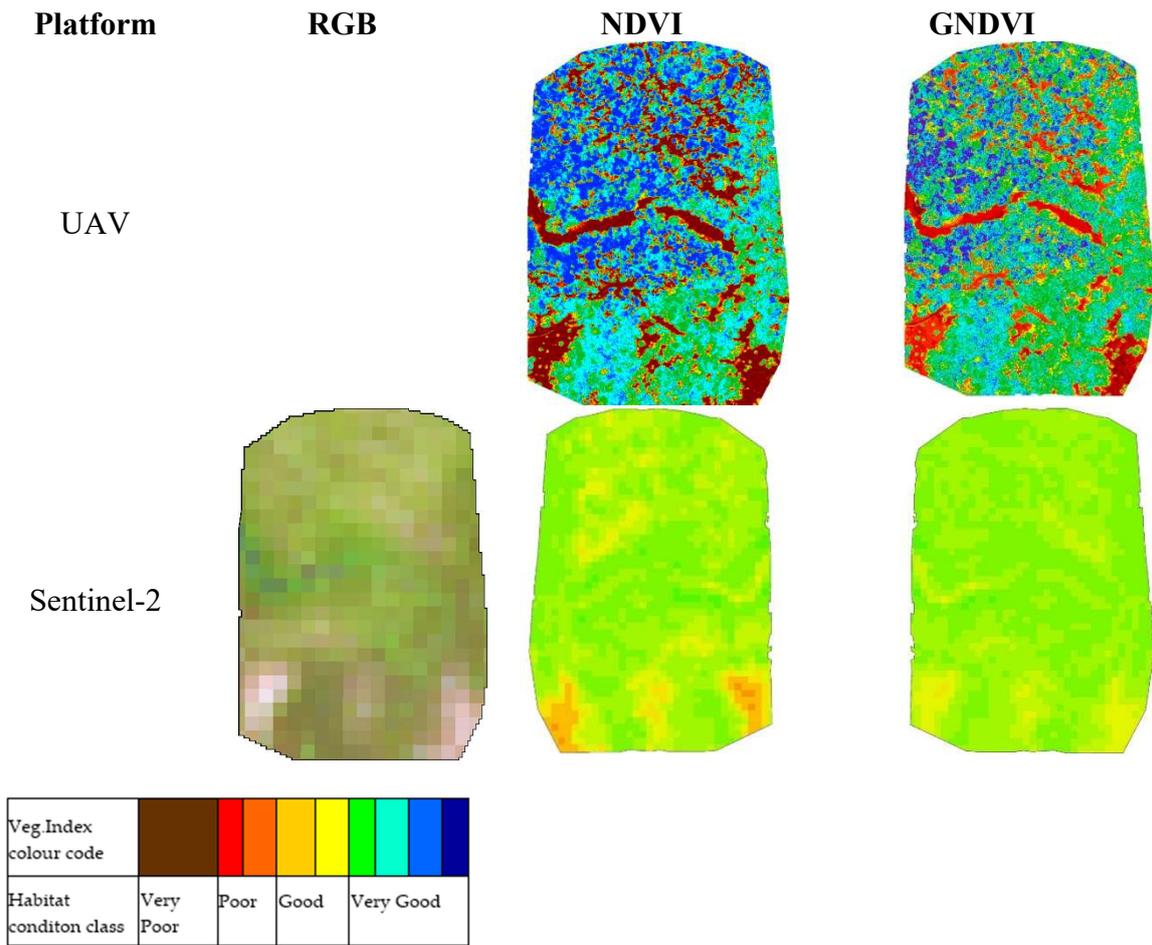


Figure S10: Comparative VI maps and RGB images generated by UAV and sentinel-2 in Woodland plot