

Expectations for CPF from Himawari

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- The inter-calibration with VIIRS “guaranteed” by CLARREO pathfinder (CPF) is beneficial to improve AHI’s calibration performance.
- CPF is also promising instrument for GEO-imagers. If ray-matching observation with GEO-imagers will be realized, any observation targets are welcomed and appreciated, in particular, in view of spatial uniformity, desert area will be one of good targets.
- Observations for PICS worldwide including desert in Asia-Oceania would be appreciated for Himawari (and for Asian meteorological satellites, I believe) even after the Prime Mission period.
- Based on CEOS PICS reports, some desert sites are considered, which can be potential candidates.
- The sites with smaller satellite zenith angles are preferable. (SSP of Himawari is 140.7 deg.E.)
- The following targets also could be reasonable references, though their locations are not fixed:
 - DCC
 - Liquid water cloud with smooth cloud top
 - Clear sky ocean surface: oligotrophic area
 - Sun-glint
- Data format:
 - thematic dataset such as sampled data only for DCC can be convenient??
- In the planned mission period of CPF, 2023-27, Himawari-9 is JMA’s operational satellite.

Name		Lat [deg]	Lon [deg]	AHI SatZenith
Australia_1	Australia	-25.025	137.025	29.5
Australia_3	Australia	-25.125	136.575	29.7
Simpson Desert	Australia	-25.486	137.205	30
Australia_2	Australia	-25.825	136.825	30.4
Australia_4	Australia	-29.025	139.825	33.8
Baotou	China	40.852	109.629	56.9
Zuoqi	China	43.8	113.544	57.3
Erlian	China	43.645	112.084	57.9
China_36	China	39.6667	106.167	58
China_35	China	39.0833	104.667	58.5
Dunhuang	China	40.0384	94.794	65.7
Dunhuang_RAL	China	40.1494	94.2429	66.2
Sea surface	Northwest Pacific	10.0 – 22.7	139.5 - 165.6	-
Salt lake	Lake Frome	-30.85	139.67	35.9

<https://calvalportal.ceos.org/pics-reports> NOV-FE-0084-NT-012 Issue. 3 – Rev. 0
Fougnie et al. 2010: Climatology of Oceanic Zones Suitable for In-flight Calibration of Space Sensors, SPIE Proceedings.