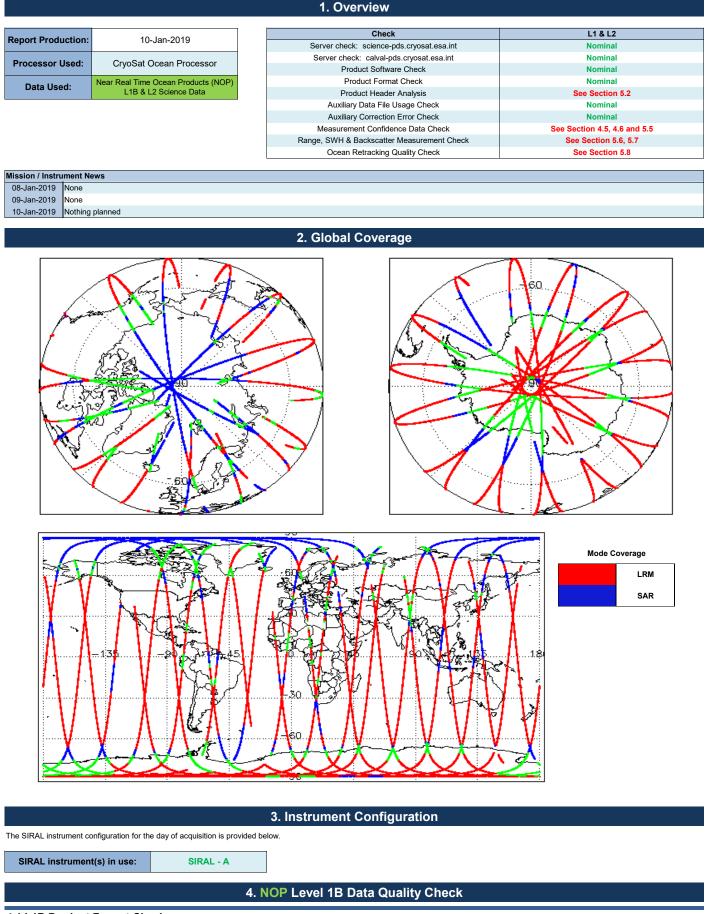


IDEAS+ Daily Report for NOP data:

<u>09/01/2019</u>





4.1 L1B Product Format Check

Each product, retrieved and unpacked from the science server, is checked to ensure it consists of both an XML header file (.HDR) and a binary product file (.DBL).

0

Number of products with errors:

4.2 L1B Product Header Analysis

For all products, a series of pre-defined checks are performed on the MPH and SPH in order to identify any inconsistencies and/or errors raised by the ground-segment processing chain. Number of products with errors: 0

| Each product is checked for missing Data Set Descriptors with respect to a pre-determined baseline and also to check the validity of Auxiliary Data Files is correct. | | | | | |
|--|--|---|--|--|--|
| Number of products with errors: 0 4.4 L1B Auxiliary Correction Error Check | | | | | |
| | | | | | |
| Number of products with errors: 0 | | | | | |
| 4.5 L1B Measurement Confidence Data Check | | | | | |
| CryoSat L1B data includes a measurement confidence flag for each measurer | ment record. The bit value of this flag | indicates any problems when set. | | | |
| Attitude Correction Missing: This flag is currently set in error for NOPR proc | lucts due to a configuration issue. Th | is is being investigated and will be updated in the next SW update. | | | |
| Number of products with errors: 1 | | | | | |
| Product | Test Failed | Description | | | |
| CS_OFFL_SIR_NOPM1B_20190109T073341_20190109T074842_C001 | Power scaling error | There is an error in the scaling of the L1B waveform for one or more records | | | |
| | | | | | |
| 4.6 L1B Waveform Group Data Check | | | | | |
| CryoSat L1B data includes a waveform data flag for each measurement record. The bit value of this flag indicates any problems when set. | | | | | |
| Loss of Echo Flag: This flag is currently set for products over land, but this is to be expected. | | | | | |
| .oss of Echo Flag: This flag is currently set for products over land, but this is | to be expected. | | | | |
| Loss of Echo Flag: This flag is currently set for products over land, but this is Number of products with errors: 18 | to be expected. | | | | |
| | to be expected. Test Failed | Description | | | |
| Number of products with errors: 18 | | Description The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product | Test Failed | • | | | |
| Number of products with errors: 18 Product 000000000000000000000000000000000000 | Test Failed Loss of Echo | The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 1000000000000000000000000000000000000 | Test Failed Loss of Echo Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0.00000000000000000000000000000000000 | Test Failed Loss of Echo Loss of Echo Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 05_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 | Test Failed Loss of Echo Loss of Echo Loss of Echo Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0.00000000000000000000000000000000000 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 0 CS_OFFL_SIR_NOPM1B_20190109T000227_20190109T000242_C001 0 CS_OFFL_SIR_NOPN1B_20190109T013035_20190109T013209_C001 0 CS_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 0 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 SS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0.00000000000000000000000000000000000 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product S_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 S_OFFL_SIR_NOPM1B_20190109T000227_20190109T000242_C001 CS_OFFL_SIR_NOPM1B_20190109T013035_20190109T013209_C001 S_OFFL_SIR_NOPM1B_20190109T015246_20190109T015450_C001 CS_OFFL_SIR_NOPM1B_20190109T063832_20190109T063954_C001 S_OFFL_SIR_NOPM1B_20190109T063832_20190109T063954_C001 CS_OFFL_SIR_NOPM1B_20190109T095714_20190109T100202_C001 S_OFFL_SIR_NOPM1B_20190109T144416_20190109T144543_C001 CS_OFFL_SIR_NOPM1B_20190109T153726_20190109T154138_C001 S_OFFL_SIR_NOPM1B_20190109T153726_20190109T154138_C001 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 0 CS_OFFL_SIR_NOPM1B_20190109T000227_20190109T000242_C001 0 CS_OFFL_SIR_NOPN1B_20190109T013035_20190109T013209_C001 0 CS_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 0 CS_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 0 CS_OFFL_SIR_NOPN1B_20190109T063832_20190109T00202_C001 0 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product S_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 S_OFFL_SIR_NOPM1B_20190109T000227_20190109T000242_C001 CS_OFFL_SIR_NOPN1B_20190109T013035_20190109T013209_C001 S_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 CS_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 S_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 CS_OFFL_SIR_NOPN1B_20190109T05714_20190109T100202_C001 S_OFFL_SIR_NOPN1B_20190109T144416_20190109T144543_C001 CS_OFFL_SIR_NOPN1B_20190109T153726_20190109T154138_C001 S_OFFL_SIR_NOPN1B_20190109T162503_20190109T162551_C001 CS_OFFL_SIR_NOPN1B_20190109T162503_20190109T194407_C001 S_OFFL_SIR_NOPN1B_20190109T162503_20190109T194407_C001 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product S_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 S_OFFL_SIR_NOPM1B_20190109T000227_20190109T000242_C001 CS_OFFL_SIR_NOPN1B_20190109T013035_20190109T013209_C001 S_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 CS_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 S_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 CS_OFFL_SIR_NOPN1B_20190109T05714_20190109T145433_C001 S_OFFL_SIR_NOPN1B_20190109T153726_20190109T145433_C001 CS_OFFL_SIR_NOPN1B_20190109T162503_20190109T154138_C001 S_OFFL_SIR_NOPN1B_20190109T162503_20190109T162551_C001 CS_OFFL_SIR_NOPN1B_20190109T194257_20190109T194407_C001 S_OFFL_SIR_NOPN1B_20190109T194257_20190109T194407_C001 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Image: | Test FailedLoss of EchoLoss of Echo | The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records The tracking echo is missing for one or more records | | | |
| Itember of products with errors: 18 Product ScoFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM1B_20190109T00227_20190109T000242_C001 CO CS_OFFL_SIR_NOPN1B_20190109T010305_20190109T013209_C001 CO CS_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 CO CS_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 CO CS_OFFL_SIR_NOPN1B_20190109T053832_20190109T063954_C001 CO CS_OFFL_SIR_NOPN1B_20190109T05714_20190109T104202_C001 CO CS_OFFL_SIR_NOPN1B_20190109T153726_20190109T144543_C001 CO CS_OFFL_SIR_NOPN1B_20190109T162503_20190109T162551_C001 CO CS_OFFL_SIR_NOPN1B_20190109T162503_20190109T162551_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194257_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T194649_20190109T194407_C001 CO CS_OFFL_SIR_NOPN1B_20190109T | Test Failed Loss of Echo | The tracking echo is missing for one or more records | | | |
| Number of products with errors: 18 Product S2_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 S2_OFFL_SIR_NOPM1B_20190109T00227_20190109T00242_C001 CS_OFFL_SIR_NOPM1B_20190109T013035_20190109T013209_C001 S2_OFFL_SIR_NOPM1B_20190109T015246_20190109T015450_C001 CS_OFFL_SIR_NOPM1B_20190109T063832_20190109T063954_C001 S2_OFFL_SIR_NOPM1B_20190109T063832_20190109T063954_C001 CS_OFFL_SIR_NOPM1B_20190109T05714_20190109T100202_C001 S2_OFFL_SIR_NOPM1B_20190109T153726_20190109T144543_C001 CS_OFFL_SIR_NOPM1B_20190109T153726_20190109T154138_C001 S2_OFFL_SIR_NOPM1B_20190109T162503_20190109T162551_C001 CS_OFFL_SIR_NOPM1B_20190109T194257_20190109T194407_C001 S2_OFFL_SIR_NOPM1B_20190109T19457_20190109T194902_C001 CS_OFFL_SIR_NOPM1B_20190109T194649_20190109T194902_C001 S2_OFFL_SIR_NOPM1B_20190109T125830_20190109T194902_C001 CS_OFFL_SIR_NOPM1B_20190109T125830_20190109T125918_C001 S2_OFFL_SIR_NOPM1B_20190109T125830_20190109T144038_C001 | Test FailedLoss of EchoLoss of Echo <td>The tracking echo is missing for one or more records The tracking e</td> | The tracking echo is missing for one or more records The tracking e | | | |
| Number of products with errors: 18 Product 18 CS_OFFL_SIR_NOPM1B_20190109T151347_20190109T153550_C001 0 CS_OFFL_SIR_NOPM1B_20190109T183822_20190109T185405_C001 0 CS_OFFL_SIR_NOPN1B_20190109T000227_20190109T000242_C001 0 CS_OFFL_SIR_NOPN1B_20190109T013035_20190109T013209_C001 0 CS_OFFL_SIR_NOPN1B_20190109T015246_20190109T015450_C001 0 CS_OFFL_SIR_NOPN1B_20190109T063832_20190109T063954_C001 0 CS_OFFL_SIR_NOPN1B_20190109T05714_20190109T1063954_C001 0 CS_OFFL_SIR_NOPN1B_20190109T05714_20190109T100202_C001 0 CS_OFFL_SIR_NOPN1B_20190109T153726_20190109T144543_C001 0 CS_OFFL_SIR_NOPN1B_20190109T153726_20190109T162551_C001 0 | Test Failed Loss of Echo | The tracking echo is missing for one or more records The tracking e | | | |

5.1 L2 Product Format Check

Each product, retrieved and unpacked from the science server, is checked to ensure it consists of both an XML header file (.HDR) and a binary product file (.DBL). Number of products with errors: 0

5.2 L2 Product Header Analysis

For all products, a series of pre-defined checks are performed on the MPH and SPH in order to identify any inconsistencies and/or errors raised by the ground-segment processing chain. Number of products with errors: 0

5.3 L2 Auxiliary Data File Usage Check

Each product is checked for missing Data Set Descriptors with respect to a pre-determined baseline and also to check the validity of Auxiliary Data Files is correct.

Number of products with errors:

5.4 L2 Auxiliary Correction Error Check

For all products, the auxiliary corrections within the Geophysical Group are checked for the default error value (32767).

1

0

Number of products with errors:

5.5 L2 Measurement Confidence Data Check

CryoSat L2 data includes a measurement confidence flag for each 20-Hz measurement record. The bit value of this flag indicates any problems when set.

Number of products with errors:

| Product | Test Failed | Description |
|---|---------------------|---|
| CS_OFFL_SIR_NOPM_2_20190109T073341_20190109T074842_C001 | Power scaling error | There is an error in the scaling of the L2 waveform for one or more records |

5.6 L2 Range Measurement Check

CryoSat L2 data includes an Ocean and Ice Range Averaging Status flag for each measurement record. The bit value of this flag indicates any problems when set.

Currently, there are two common status flags raised in the Level 2 products which are expected due to surface type. All common flags are summarised in the list below, followed by a table highlighting any additional issues which may arise from this test.

ean Range Averaging Status Flag: This flag is currently set for products over land and sea ice, but this is to be expected.

Ice Range Averaging Status Flag: This flag is currently set for products over land, but this is to be expected. 79

Number of products with errors:

Product Test Failed Description The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T001553 20190109T002156 C001 Ocean Range Averaging Status ecords The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T002159_20190109T004258_C001 Ocean Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T004445 20190109T005256 C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T005643_20190109T013035_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T014337 20190109T014534 C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T021204 20190109T021309 C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T021426_20190109T022226_C001 Ocean Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T022425 20190109T022945 C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T023527_20190109T025756_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T030042_20190109T031011_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T032318_20190109T032618_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFEL_SIR_NOPM_2_20190109T034204_20190109T034650_C001 Ocean Range Averaging Status ecords The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T034837_20190109T040018_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T040100_20190109T040156_C001 Ocean Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T040510 20190109T040845 C001 Ice Range Averaging Status ecords The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T041507_20190109T042044_C001 Ocean Range Averaging Status ecords The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T042054_20190109T044643_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T050508 20190109T053624 C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T055423_20190109T061214_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T061654_20190109T062352_C001 Ocean Range Averaging Status ecords The Ice Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T063954 20190109T064409 C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T064521_20190109T070057_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T070716 20190109T071853 C001 Ocean Range Averaging Status The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T072737_20190109T073159_C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T073341_20190109T074842_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T075021 20190109T080507 C001 Ocean Range Averaging Status ecords The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T082716_20190109T083425_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T083547_20190109T084035_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T084325 20190109T085944 C001 Ocean Range Averaging Status ecords The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T090229_20190109T091109_C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T091324_20190109T093602_C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T101318 20190109T103907 C001 Ocean Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T104146_20190109T104333_C001 Ice Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T104433_20190109T104904_C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T105150 20190109T111802 C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T114923_20190109T120053_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T120629 20190109T121712 C001 Ocean Range Averaging Status records The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T122350_20190109T122941_C001 Ice Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T123117 20190109T125334 C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T132214 20190109T135700 C001 Ocean Range Averaging Status ecords The Ice Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T140256_20190109T140812_C001 Ice Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T141010_20190109T141253_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS OFFL SIR NOPM 2 20190109T141453 20190109T141712 C001 Ocean Range Averaging Status records The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T144543_20190109T144811_C001 Ocean Range Averaging Status records. The Ocean Range Averaging Status Flag has been set for one or more CS_OFFL_SIR_NOPM_2_20190109T150221_20190109T151101_C001 Ocean Range Averaging Status records

| CS_OFFL_SIR_NOPM_2_20190109T151347_20190109T153550_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
|---|------------------------------|--|
| CS_OFFL_SIR_NOPM_2_20190109T154305_20190109T154711_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T154918_20190109T160218_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T160406_20190109T161117_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T161201_20190109T161641_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T164214_20190109T171456_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T171639_20190109T172155_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T172202_20190109T172208_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T173256_20190109T180311_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T182347_20190109T183617_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T183822_20190109T185405_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T185551_20190109T190053_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T191015_20190109T192033_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T192652_20190109T193746_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T201359_20190109T201642_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T201821_20190109T203251_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T203504_20190109T204003_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T204011_20190109T204023_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T204635_20190109T212025_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T214820_20190109T221252_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T221549_20190109T221920_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T221942_20190109T222310_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T222534_20190109T225447_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T232644_20190109T235151_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T235331_20190109T235834_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T235841_20190110T000208_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T071853_20190109T072140_C001 | Ice Range Averaging Status | The Ice Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T082128_20190109T082356_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T131057_20190109T131123_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T021309_20190109T021425_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T055416_20190109T055422_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T140924_20190109T141010_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T145910_20190109T145952_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T194555_20190109T194649_C001 | Ocean Range Averaging Status | The Ocean Range Averaging Status Flag has been set for one or more records. |
| | | |

5.7 L2 SWH and Backscatter Measurement Check

CryoSat L2 data includes a SWH Averaging Status flag and an Ocean and Ice Backscatter Averaging Status flag for each measurement record. The bit value of this flag indicates any problems when set.

Currently, there are three common status flags raised in the Level 2 products which are expected due to surface type. All common flags are summarised in the list below, followed by a table highlighting any additional issues which may arise from this test.

SWH Averaging Status Flag: This flag is currently set for products over land and sea ice, but this is to be expected.

Ocean Backscatter Averaging Status Flag: This flag is currently set for products over land and sea ice, but this is to be expected.

Ice Backscatter Averaging Status Flag: This flag is currently set for products over land, but this is to be expected. 76

Number of products with errors:

| Product | Test Failed | Description |
|---|---|--|
| CS_OFFL_SIR_NOPM_2_20190109T001553_20190109T002156_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T002159_20190109T004258_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T004445_20190109T005256_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T005643_20190109T013035_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T014337_20190109T014534_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T021426_20190109T022226_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T023527_20190109T025756_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T030042_20190109T031011_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T032318_20190109T032618_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |

CS_OFFL_SIR_NOPM_2_20190109T034204_20190109T034650_C001 CS OFFL SIR NOPM 2 20190109T034837 20190109T040018 C001 CS_OFFL_SIR_NOPM_2_20190109T040100_20190109T040156_C001 CS_OFFL_SIR_NOPM_2_20190109T041507_20190109T042044_C001 CS OFFL SIR NOPM 2 20190109T042054 20190109T044643 C001 CS_OFFL_SIR_NOPM_2_20190109T050508_20190109T053624_C001 CS OFFL SIR NOPM 2 20190109T055423 20190109T061214 C001 CS OFFL SIR NOPM 2 20190109T061654 20190109T062352 C001 CS_OFFL_SIR_NOPM_2_20190109T063954_20190109T064409_C001 CS_OFFL_SIR_NOPM_2_20190109T064521_20190109T070057_C001 CS OFFL SIR NOPM 2 20190109T070716 20190109T071853 C001 CS_OFFL_SIR_NOPM_2_20190109T072737_20190109T073159_C001 CS OFFL SIR NOPM 2 20190109T073341 20190109T074842 C001 CS_OFFL_SIR_NOPM_2_20190109T075021_20190109T080507_C001 CS_OFFL_SIR_NOPM_2_20190109T082716_20190109T083425_C001 CS OFFL SIR NOPM 2 20190109T084325 20190109T085944 C001 CS_OFFL_SIR_NOPM_2_20190109T090229_20190109T091109_C001 CS_OFFL_SIR_NOPM_2_20190109T091324_20190109T093602_C001 CS_OFFL_SIR_NOPM_2_20190109T101318_20190109T103907_C001 CS_OFFL_SIR_NOPM_2_20190109T104146_20190109T104333_C001 CS_OFFL_SIR_NOPM_2_20190109T104433_20190109T104904_C001 CS OFFL SIR NOPM 2 20190109T105150 20190109T111802 C001 CS_OFFL_SIR_NOPM_2_20190109T114923_20190109T120053_C001 CS OFFL SIR NOPM 2 20190109T120629 20190109T121712 C001 CS OFFL SIR NOPM 2 20190109T122350 20190109T122941 C001 CS_OFFL_SIR_NOPM_2_20190109T123117_20190109T125334_C001 CS_OFFL_SIR_NOPM_2_20190109T125337_20190109T125830_C001 CS_OFFL_SIR_NOPM_2_20190109T132214_20190109T135700_C001 CS_OFFL_SIR_NOPM_2_20190109T140256_20190109T140812_C001 CS OFFL SIR NOPM 2 20190109T141010 20190109T141253 C001 CS_OFFL_SIR_NOPM_2_20190109T141453_20190109T141712_C001 CS_OFFL_SIR_NOPM_2_20190109T144543_20190109T144811_C001 CS OFFL SIR NOPM 2 20190109T150221 20190109T151101 C001 CS_OFFL_SIR_NOPM_2_20190109T151347_20190109T153550_C001 CS_OFFL_SIR_NOPM_2_20190109T154305_20190109T154711_C001 CS OFFL SIR NOPM 2 20190109T154918 20190109T160218 C001 CS_OFFL_SIR_NOPM_2_20190109T160406_20190109T161117_C001 CS_OFFL_SIR_NOPM_2_20190109T161201_20190109T161641_C001 CS OFFL SIR NOPM 2 20190109T164214 20190109T171456 C001 CS_OFFL_SIR_NOPM_2_20190109T171639_20190109T172155_C001 CS_OFFL_SIR_NOPM_2_20190109T172202_20190109T172208_C001 CS OFFL SIR NOPM 2 20190109T173256 20190109T180311 C001 CS_OFFL_SIR_NOPM_2_20190109T182347_20190109T183617_C001 CS OFFL SIR NOPM 2 20190109T183822 20190109T185405 C001 CS_OFFL_SIR_NOPM_2_20190109T185551_20190109T190053_C001 CS_OFFL_SIR_NOPM_2_20190109T191015_20190109T192033_C001 CS OFFL SIR NOPM 2 20190109T192652 20190109T193746 C001 CS_OFFL_SIR_NOPM_2_20190109T201359_20190109T201642_C001 CS_OFFL_SIR_NOPM_2_20190109T201821_20190109T203251_C001 CS OFFL SIR NOPM 2 20190109T203504 20190109T204003 C001 CS_OFFL_SIR_NOPM_2_20190109T204011_20190109T204023_C001 SWH Averaging Status, Ocean Backscatter Averaging Status Ice Backscatter Averaging Status

SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status

Ice Backscatter Averaging Status

SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status

Ice Backscatter Averaging Status

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Ice Backscatter Averaging Status

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Ice Backscatter Averaging Status

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Ice Backscatter Averaging Status

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Ice Backscatter Averaging Status

Ice Backscatter Averaging Status

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Ice Backscatter Averaging Status

SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status SWH Averaging Status, Ocean Backscatter Averaging Status Ice Backscatter Averaging Status

Ice Backscatter Averaging Status

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

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The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

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The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

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The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

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The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

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The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

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more records. The SWH and Ocean Averaging Status Flags have been set for one or

more records. The SWH and Ocean Averaging Status Flags have been set for one or

more records. The Ice Backscatter Averaging Status Flag has been set for one or more

records. The Ice Backscatter Averaging Status Flag has been set for one or more

records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The SWH and Ocean Averaging Status Flags have been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

The Ice Backscatter Averaging Status Flag has been set for one or more records.

| CS_OFFL_SIR_NOPM_2_20190109T204635_20190109T212025_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
|---|---|--|
| CS_OFFL_SIR_NOPM_2_20190109T214820_20190109T221252_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T221549_20190109T221920_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T221942_20190109T222310_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T222534_20190109T225447_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T232644_20190109T235151_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T235331_20190109T235834_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPM_2_20190109T235841_20190110T000208_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T071853_20190109T072140_C001 | Ice Backscatter Averaging Status | The Ice Backscatter Averaging Status Flag has been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T082128_20190109T082356_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPN_2_20190109T131057_20190109T131123_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T021309_20190109T021425_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T055416_20190109T055422_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T140924_20190109T141010_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T145910_20190109T145952_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |
| CS_OFFL_SIR_NOPR_2_20190109T194555_20190109T194649_C001 | SWH Averaging Status, Ocean Backscatter Averaging Status | The SWH and Ocean Averaging Status Flags have been set for one or more records. |

5.8 L2 Ocean Retracking Quality Check

CryoSat L2 data includes an ocean retracking quality flag for each 20-Hz measurement record. The bit value of this flag indicates any problems when set.

55

Ocean Retracking Quality Flag: This flag is currently set for products over land and sea ice, but this is to be expected. The number of products with this error flag set is given below.

Number of products with errors: