ASSIST Data Fields/Codes

Data fields and lookup tables used in observations.

All ASSIST observation parameters are listed below with header codes (), descriptions, and data codes with values . * = P, S, or T if Primary, Secondary, or Tertiary ice, respectively. Units of measurement are noted when necessary. No observation is recorded as blown and the codes of the code of the code

knots FAUNA NAME (FN)

| PRIMARY OBSERVER (PO) | | SHIP HEADING (ShH) | degrees | SHIP SPEED (ShS) | knots | FAL |
|--|--------|--|-------------|---|---------|---------|
| ADDITIONAL OBSERVER/S (AO) | | Nearest degree | | Nearest knot | | Cor |
| Full name | | | | | | |
| Add your name to the menu on first observation | n. | SHIP POWER (ShP) | | SHIP ACTIVITY (ShA) | | FAL |
| OBSERVATION DATE/TIME (Date) | | Not Specified | | Not Specified | | Nur |
| YYYY-MM-DD HH:MM:SS UTC | | 0 | | 10 :: Traveling in leads | | |
| Converts computer time to UTC automatically. | | 1/4 | | 20 :: Traveling in ice | | NO |
| LATITUDE (LAT) | | 1/2 | | 30 :: Back and ramming | | Obs |
| LONGITUDE (LON) | | 3/4 | | 40 :: On station | | Use |
| DDD.DDD or DD MM.MMM or DD MM SS | | Full | | 50 :: Traveling along ice edge | | |
| Converts to decimal degrees automatically. | | | | | | |
| TOTAL ICE CONCENTRATION (TC) | Tenths | SNOW TYPE (*SY) | | MELT POND CONC (*MPC) | Tenths | |
| PARTIAL ICE CONCENTRATION (*C) | renens | 00 :: No snow observation | | 0::0/10 | rentiis | |
| 0 :: 1/10 | | 01 :: No snow, ice or brash | | 1::1/10 | | |
| 1:: 1/10 | | 02 :: Cold new snow, <1 day old | | 2 :: 2/10 | | |
| 2:: 2/10 | | 03 :: Cold old snow | | 3::3/10 | | |
| 3::3/10 | | 04 :: Cold wind-packed snow | | 4:: 4/10 | | |
| 4:: 4/10 | | 05 :: New melting snow(wet new) | | 5 :: 5/10 | | |
| 5 :: 5/10 | | 06 :: Old melting snow | | 6 :: 6/10 | | |
| 6::6/10 | | 07 :: Glaze | | 7 :: 7/10 | | |
| 7::7/10 | | 08 :: Melt slush | | 8::8/10 | | |
| 8:: 8/10 | | 09 :: Melt puddles | | 9::9/10 | | |
| 9::9/10 | | · | | 10 :: 10/10 | | |
| 9 :: 9/10 10 :: 10/10 | | 10 :: Saturated snow | | 10 10/10 | | |
| 10 10/10 | | 11 :: Sastrugi | | MELT DOND DATTEDAL (*MDD) | | |
| OPEN WATER (OW) | | SNOW DEDTH (*CN) | 672 | MELT POND PATTERN (*MPP) 1 :: Linked | | |
| | | SNOW DEPTH (*SN) | cm | 1 :: Linked 2 :: Discrete | | |
| 0 :: No openings 1 :: Small cracks | | Depth of surface snow | | Z DISCIPLE | | |
| | | T0000040111/TVD5 (*T) | | AASI T DOND SUIDSA OF TUDE (*AADT) | | |
| 2 :: Very narrow breaks, <50m | | TOPOGRAPHY TYPE (*Top) | | MELT POND SURFACE TYPE (*MPT) | | |
| 3 :: Narrow breaks, 50-200m | | 100 :: Level ice 200 :: Rafted Pancakes | | 1 :: Frozen | | |
| 4 :: Wide breaks, 200-500m | | | | 2 :: Open | | |
| 5 :: Very wide breaks >500m | | 300 :: Cemented Pancakes | | 3 :: Bottom up | | |
| 6 :: Leads | | 400 :: Rafting | | 1451 T DONE SECTION DE (*1455) | | |
| 7 :: Polynya | | 500 :: Ridges | | MELT POND FREEBOARD (*MPF) | cm | |
| 8 :: Water broken only by scattered floes | | TODOGRAPHY COME (*T | - .1 | Height of MP freeboard above MP surface | | |
| 9 :: Open sea | | TOPOGRAPHY CONC (*TopC) | Tenths | MATELE DONIN DEPTH (*MADO) | | |
| 10 :: Strips and patches | | 0::0/10 | | MELT POND DEPTH (*MPD) | cm | |
| | | 1 :: 1/10 | | 1 :: 0-10cm | | |
| ICE TYPE (*T) | | 2::2/10 | | 2 :: 10-30cm | | 5 |
| OTHER ICE TYPE THIN (OT) | | 3::3/10 | | 3 :: 30-50cm | | 8 |
| OTHER ICE TYPE THICK (TH) | | 4:: 4/10 | | 4 :: >50cm | | |
| 10 :: Frazil | | 5 :: 5/10 | | -9 :: Unknown | | 2 |
| 11 :: Shuga | | 6 :: 6/10 | | | | -EOROLO |
| 12 :: Grease | | 7 :: 7/10 | | MELT POND BOTTOM TYPE (*MBT) | | μ |
| 13 :: Slush | | 8 :: 8/10 | | 1 :: Solid | | 屉 |
| 20 :: Nilas | | 9 :: 9/10 | | 2 :: Some have thaw holes | | 2 |
| 30 :: Pancakes | | 10 :: 10/10 | | 3 :: All have thaw holes | | |
| 40 :: Young Grey Ice, 10-15cm | | | | | | |
| 50 :: Young Grey Ice, 15-30cm | | RIDGE HEIGHT (*RH) | m | DRIED ICE? (*MDI) | | |
| 60 :: First Year, < 70cm | | To nearest half meter | | ROTTEN ICE? (*MRI) | | |
| 70 :: First Year, 70-120cm | | | | Yes :: True | | |
| 80 :: First Year, > 120cm | | TOPO FEATURE OLD? | | No :: False | | |
| 75 :: Second Year | | TOPO FEATURE CONSOLIDATED? | | | | |
| 85 :: Multiyear | | TOPO FEATURE SNOW-COVERED? | | | | |
| 90 :: Brash | | Yes :: True | | ALGAE CONC. (*A) | % | |
| 95 :: Fast Ice | | No :: False | | SEDIMENT CONC. (*SD) | | |
| | | | | 0 :: 0% | | |
| ICE THICKNESS (*Z) | cm | | | 1 :: <30% | | |
| Total ice thickness in cm | | | | 2 :: <60% | | |
| | | | | 3 :: >60% | | |
| FLOE SIZE (*F) | | | | | | |
| 100 :: Pancakes | | | | ALGAE LOCATION (*AL) | | |
| 200 :: New sheet ice | | | | 1 :: Top | | |
| 300 :: Brash/Broken ice | | | | 2 :: Middle | | |
| | | | | 3 :: Bottom | | |
| | | | | | | |
| 400 :: Cake ice, < 20m | | | | ALGAE DENSITY (*AD) | | |
| 400 :: Cake ice, < 20m 500 :: Small floes, 20-100m | | | | • • • | | |
| 400 :: Cake ice, < 20m 500 :: Small floes, 20-100m 600 :: Medium floes, 100-500m | | | | 0 :: Not Visible | | |
| 400 :: Cake ice, < 20m 500 :: Small floes, 20-100m 600 :: Medium floes, 100-500m 700 :: Large floes, 500-2000m | | | | 0 :: Not Visible 1 :: Trace | | |
| 400 :: Cake ice, < 20m 500 :: Small floes, 20-100m 600 :: Medium floes, 100-500m 700 :: Large floes, 500-2000m 800 :: Vast floes, >2000m | | | | 1 :: Trace | | |
| | | | | 1 :: Trace 2 :: Light | | |
| 400 :: Cake ice, < 20m 500 :: Small floes, 20-100m 600 :: Medium floes, 100-500m 700 :: Large floes, 500-2000m 800 :: Vast floes, >2000m | | | | 1 :: Trace | | |

| n or scientific name | | Uploaded photo |
|--|------|-------------------------|
| COUNT (FC) | U U | PHOTO PERSPECTIVE (PhP) |
| of reported species | ļ. | Not Specified Port |
| note0, note1, & note2) | Ţ | Forward |
| r's notes e three fields for additional obervables you create | | Other |
| ILITY (V) | m-km | HIGH CLOUD TYPE (HY) |
| <50m | | Ci :: Cirrus |
| 50-200m | | Cs :: Cirrostratus |
| | | |

PHOTO NAME (Photo)

| k. | COMMENTS (COMM) |
|---------|---------------------|
| | Observer's comments |
| TS | |
| COMMENT | |
| Ž | |
| 8 | |
| | |
| | |

| | MICIDILITY (M) | 1 | LUCU CLOUD TVDF (UV) | | MAIND CDEED (MC) | V+ | |
|--|--|--|---|---|---|------------|--|
| | VISIBILITY (V) | m-km | HIGH CLOUD TYPE (HY) | | WIND SPEED (WS) | Knot | |
| | 90 :: <50m | | Ci :: Cirrus | | Nearest knot | | |
| | 91 :: 50-200m | | Cs :: Cirrostratus | | | _ | |
| | 92 :: 200-500m | | Cc :: Cirrocumulus | | WIND DIRECTION (WD) | Degree | |
| | 93 :: 500-1000m | | | | Nearest degree | | |
| | 94 :: 1-2km | | MED. CLOUD TYPE (MY) | | | | |
| | 95 :: 2-4km | | As :: Altostratus | | AIR TEMPERATURE (AT) | °C | |
| | 96 :: 4-10km | | Ac :: AltoCumulus | | Nearest degree, C | | |
| | 97 :: >10km | | | | | | |
| | | | LOW CLOUD TYPE (LY) | | WATER TEMPERATURE (WT) | °C | |
| | TOTAL CLOUD COVER(TCC) | Oktas | St :: Stratus | | Nearest degree, C | | |
| | HIGH CLOUD COVER (HV) | | Sc :: Stratocumulus | | | | |
| | MEDIUM CLOUD COVER (MV) | | Ns :: Nimbostratus | | RELATIVE HUMIDITY (RelH) | | |
| | LOW CLOUD COVER (LV) | | Cu :: Cumulus | | Nearest % | | |
| | 0::0 | | Cn :: Cumulonimbus | | ivealest 76 | | |
| | | | Cir Cumulomimbus | | AID DDECCLIDE (AD) | mBar | |
| | 1 :: 1/8 or less, but not 0 | | UICU CI CUD UEICUE (UU) | | AIR PRESSURE (AP) | IIIbai | |
| | 2 :: 2/8 | | HIGH CLOUD HEIGHT (HH) km | n | Nearest mBar | | |
| | 3::3/8 | | 3 - 8km | | | | |
| | 4::4/8 | | | | | | |
| | 5 :: 5/8 | | MEDIUM CLOUD HEIGHT (MH) kn | n | | | |
| | 6 :: 6/8 | | 2 - 4km | | | | |
| | 7 :: 7/8 or more, but not 8/8 | | | | | | |
| | 8::8/8 | | LOW CLOUD HEIGHT (LH) km | n | | | |
| | | | Surface - 2km | | | | |
| | | | | | | | |
| | WEATHER (WX) | | | | | | |
| | 00-03 Sky Change During Past Hour | | 40-49 Fog at the Time of Ob | | 70-79 Solid Precip. Not as Showers | | |
| > 00 | 000 :: Clouds not observable/observed | | | | • | | |
| | 001 :: Clouds hot observable/observed 001 :: Clouds dissolving/becoming less developed | | 040:: Fog: distance, not at ship in past hour**Vis may be >1/2nm 041:: Fog in patches | | 071 :: Slight fall of snow flakes, continuous | | |
| | | | | | | | |
| | 002 :: State of sky as a whole unchanged | | 042 :: Fog thinning in last hour, sky discernable | | 072 :: Moderate fall of snow flakes, inter | | |
| ž | 003 :: Clouds forming or developing | | 043 :: Fog thinning in last hour, sky not discernable | | 073 :: Moderate fall of snow flakes, cont | | |
| Ō | | | 044 :: Fog unchanged in last hour, sky discernable | | 074 :: Heavy fall of snow flakes, intermit | | |
| ۳ | 10-13 Mist and Shallow Fog | | 045 :: Fog unchanged in last hour, sky not discernable | | 075 :: Heavy fall of snow flakes, continuo | ous | |
| H | 010 :: Mist (Visibility 1/2 nm or more) | 046:: Fog beginning/thickening in last hour, sky discernable | | | 076 :: Ice prisms, with/without fog e 077 :: Snow grains, with/without fog 078 :: Isolated star like crystals | | |
| 2 | 011 :: Shallow fog in patches | | 047 :: Fog beginning/thickening in last hour, sky not discernable 048 :: Fog depositing rime, sky discernable | | | | |
| | 012 :: Shallow fog, more or less continuous | | | | | | |
| | | | 049 :: Fog depositing rime, sky not discernable | | 079 :: Ice pellets | | |
| | 14-16 Precipitation not at ship | | | | | | |
| | 014 :: Precipitation in sight, not reaching surface | | 50-59 Drizzle | | 80-84 Rain Showers | | |
| | 015 :: Precipitation beyond 3nm, reaching surface | | 050 :: Slight drizzle, intermittent | | 080 :: Slight rain showers | | |
| | 016 :: Precipitation within 3nm, reaching surface | | 051 :: Slight drizzle, continuous | | 081 :: Moderate or heavy rain showers | | |
| | , , | 052 :: Moderate drizzle, intermittent | | | 082 :: Violent rain showers | | |
| | 20-29 Past Hour but NOT at Ob | | 053 :: Moderate drizzle, continuous | | 083 :: Slight showers of rain and snow | | |
| | 020 :: Drizzle not freezing or snow grains | | 054 :: Dense drizzle, intermittent | | 084 :: Moderate/heavy showers of rain a | and snow | |
| | 021 :: Rain not freezing or snow grains | | 055 :: Dense drizzle, intermittent | | 304 Moderate/ficavy showers of falli a | u 3110VV | |
| | | | | | RE-90 Solid Procinitation in Chauses | | |
| | 022 :: Snow not freezing or snow grains | | 056 :: Freezing drizzle, slight | | 85-90 Solid Precipitation in Showers | | |
| | 023 :: Rain and snow or ice pellets | | 057 :: Freezing drizzle, moderate or dense | | 085 :: Slight snow showers | | |
| | 024 :: Drizzle or rain, freezing | | 058 :: Drizzle and rain, slight | | 086 :: Moderate or heavy snow showers | | |
| | 025 :: Showers of rain | | 059 :: Drizzle and rain, moderate or dense | | 087 :: Slight showers of soft or small hail | | |
| | 026 :: Showers of snow, or of rain and snow | | | | 088 :: Moderate/heavy showers of soft/s | small hail | |
| | 027 :: Showers of hail, or of rain and hail | | 60-69 Rain NOT Falling as Showers | | 089 :: Slight showers of hail | | |
| 028 :: Fog in past hour, not at present 029:: Thunderstorm, with or without precip | | 060 :: Slight rain, intermittent | | 090 :: Moderate or heavy showers of hai | il | | |
| | | | 061 :: Slight rain, continuous | | | | |
| | | | 062 :: Moderate rain, intermittent | | | | |
| | 36-39 Unique Snow Conditions | | 063 :: Moderate rain, continuous | | | | |
| | 036 :: Drifting snow below eye level, slight/moderate | | 064 :: Heavy rain, intermittent | | | | |
| | 037 :: Drifting snow below eye level, heavy | | 065 :: Heavy rain, continuous | | | | |
| | 038 :: Blowing snow, above eye level, slight/moderate | | 066 :: Freezing rain, slight | | | | |
| | 039 :: Blowing snow, above eye level, heavy | | 067 :: Freezing rain, moderate or heavy | | | | |
| | and the second desire of a level, fleavy | | 068 :: Rain or drizzle and snow, slight | | | | |
| | | | 069 :: Rain or drizzle and snow, siight | | | | |
| | | | 333 or unizzie and show, moderate/neavy | | | | |
| | | | | | | | |