

# Global Ocean Currents Data NetCDF Format Description

## Global Attribute Section

Attribute Name	Attribute Value
gocd_id	gocd_a0000841_rcm01390
gocd_format_version	GOCD-2.0
uuid	74aba546-bcf7-4acd-a98c-b26d241701c2
id	0093183
Conventions	CF-1.6
title	Global Ocean Currents Data - gocd_a0000841_rcm01390
summary	global ocean currents in the NODC archive holdings
source	global ocean currents in the NODC archive holdings
keywords	direction_of_sea_water_velocity
keywords_vocabulary	NODC Data Types, CF Standard Names
references	<a href="http://www.nodc.noaa.gov/">http://www.nodc.noaa.gov/</a>
creator_name	Charles Sun
creator_url	<a href="http://www.nodc.noaa.gov">http://www.nodc.noaa.gov</a>
creator_email	Charles.Sun@noaa.gov
institution	U.S. National Oceanographic Data Center
naming_authority	gov.noaa.nodc
standard_name_vocabulary	CF-1.6
Metadata_Conventions	Unidata Dataset Discovery v1.0
publisher_name	US DOC; NESDIS; NATIONAL OCEANOGRAPHIC DATA CENTER - IN295
publisher_url	<a href="http://www.nodc.noaa.gov/">http://www.nodc.noaa.gov/</a>
publisher_email	NODC.Services@noaa.gov
date_created	2014-12-09T19:03:29Z
date_modified	2014-12-09T19:03:29Z
date_issued	2014-12-09T19:03:29Z
history	2014-12-09T19:03:29Z csun modGOCDnc.f90 Version 1.0
acknowledgment	These data were acquired from the US NOAA National Oceanographic Data Center (NODC) on [DATE] from <a href="http://www.nodc.noaa.gov/">http://www.nodc.noaa.gov/</a> .
license	These data are openly available to the public Please acknowledge the use of these data with the text given in the acknowledgment attribute.
featureType	timeSeries
cdm_data_type	Station
geospatial_lat_min	-70.379997
geospatial_lat_max	-70.379997
geospatial_lon_min	-13.541699
geospatial_lon_max	-13.541699
geospatial_vertical_min	190.00000
geospatial_vertical_max	190.00000
geospatial_lat_units	degrees_north
geospatial_lat_resolution	point

geospatial_lon_units	degrees_east
geospatial_lon_resolution	point
geospatial_vertical_units	meters
geospatial_vertical_resolution	point
geospatial_vertical_positive	down
time_coverage_start	1990-12-26T00:00:00Z
time_coverage_end	1992-01-03T10:00:00Z
time_coverage_duration	P1Y008DT10H00M00S
time_coverage_resolution	R004482/1990-12-26T00:00:00Z/P1Y008DT10H00M00
contributor	E.Fahrbach
principal_invesigator	E.Fahrbach
project_name	SCM7
instrument_type	Aanderaa RCM
QC_Manual	Reference Manual for Quality Control Subsurface Currents Data, Version 1.0
QC_test_names	Platform_Identification, Impossible_Date/Time, Impossible_Location, Position_on_Land, Global_Impossible_Parameter_Values, Spike, Constant_Speed, Constant_Direction, Rate_of_Change_in_Time
QC_test_codes	1, 1, 1, 1, 1, 1, 1, 1, 1
QC_test_results	1, 1, 1, 1, 1, 1, 1, 1, 1
QC_indicator	1
QC_Software	qcsd_WOCE.R, 1.0, 2014-09-10

### Variable Metadata Section

Variable ID Number	Variable Name	Variable Type	Number of Attributes	Number of Dimensions
1	sampling_interval	float	4	0
2	seafloor_depth	float	7	1
3	latitude	float	9	1
4	longitude	float	9	1
5	latitude_quality_flag	int	4	1
6	longitude_quality_flag	int	4	1
7	depth	float	5	1
8	depth_quality_flag	int	4	1
9	time	double	7	1
10	time_quality_flag	int	4	1
11	u	float	14	2
12	u_quality_flag	int	4	2
13	v	float	14	2
14	v_quality_flag	int	4	2
15	current_speed	float	13	2
16	current_speed_quality_flag	int	3	2
17	current_direction	float	14	2
18	current_direction_quality_flag	int	3	2
19	crs	int	6	0

### Data Metadata Section

<b>Variable Name (Dimension Name(s))</b>	<b>Variable Type</b>	<b>Attribute Name</b>	<b>Attribute Value</b>
sampling_interval( )	float	long_name	Sampling Interval
		units	minutes
		missing_value	9999.9
		_FillValue	9999.9
seafloor_depth( station )	float	long_name	Seafloor Depth
		units	meters
		postive	down
		valid_min	0.0000000
		valid_max	15000.000
		missing_value	9999.9
		_FillValue	9999.9
latitude( station )	float	long_name	latitude
		standard_name	latitude
		units	degrees_north
		axis	Y
		grid_mapping	crs
		ancillary_variables	latitude_quality_flag
		valid_min	-90.000000
		valid_max	90.000000
		_FillValue	9999.9
longitude( station )	float	long_name	longitude
		standard_name	longitude
		units	degrees_east
		axis	X
		grid_mapping	crs
		ancillary_variables	longitude_quality_flag
		valid_min	-180.00000
		valid_max	180.00000
latitude_quality_flag( station )	int	long_name	Latitude Quality Flag
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
longitude_quality_flag( station )	int		

		long_name	Longitude Quality Flag
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
depth( depth )	float	long_name	Depth
		units	meters
		postive	down
		valid_min	0.0000000
		valid_max	15000.000
depth_quality_flag( depth )	int	long_name	Depth QC Flags
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
time( time )	double	long_name	time
		standard_name	time
		units	days since 1900-01-01 00:00:00Z
		axis	T
		ancillary_variables	time_quality_flag
		data_min	2448251.5000000000
		data_max	2448624.9166666665
time_quality_flag( time )	int	long_name	Time Quality Flag
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
u( depth , time )	float	long_name	Eastward Velocity Component
		standard_name	eastward_sea_water_velocity
		units	cm/s
		coordinates	time depth
		grid_mapping	crs
		cell_methods	time:point depth:point
		ancillary_variables	u_quality_flag
		data_min	-26.530001
		data_max	6.6100001
		valid_min	0.0000000

		valid_max	500.00000
		C_format	%6.4f
		FORTRAN_format	F6.4
		_FillValue	9999.9
u_quality_flag( depth , time )	int		
		long_name	Eastward Velocity component QC Flags
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
v( depth , time )	float		
		long_name	Northward Velocity Component
		standard_name	northward_sea_water_velocity
		units	cm/s
		coordinates	time depth
		grid_mapping	crs
		cell_methods	time:point depth:point
		ancillary_variables	v_quality_flag
		data_min	-22.889999
		data_max	5.4600000
		valid_min	0.0000000
		valid_max	500.00000
		C_format	%6.4f
		FORTRAN_format	F6.4
		_FillValue	9999.9
v_quality_flag( depth , time )	int		
		long_name	Northward Velocity component QC Flags
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
		_FillValue	-9
current_speed( depth , time )	float		
		long_name	Current_Speed
		units	cm/s
		coordinates	time depth
		grid_mapping	crs
		cell_methods	time:point depth:point
		ancillary_variables	current_direction_quality_flag
		data_min	0.0000000
		data_max	30.450001
		valid_min	0.0000000
		valid_max	707.00000
		C_format	%6.4f

		FORTTRAN_format	F6.4
		_FillValue	9999.9
current_speed_quality_flag( depth , time )	int	long_name	Current Speed QC Flags
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
current_direction( depth , time )	float	long_name	Current Direction
		units	degrees
		coordinates	time depth
		grid_mapping	crs
		cell_methods	time:point depth:point
		ancillary_variables	current_direction_quality_flag
		data_min	0.0000000
		data_max	30.450001
		valid_min	0.0000000
		valid_max	360.00000
		C_format	%5.1f
		FORTTRAN_format	F5.1
		_FillValue	9999.9
		comment	True Direction toward which current is flowing
current_direction_quality_flag( depth , time )	int	long_name	Current Direction QC Flags
		flag_values	1 2 3 4 5 6 7 8 9
		flag_meanings	good_value probably_good probably_bad bad_value modified_value not_used not_used not_used missing_value
crs()	int	long_name	Coordinate Reference System
		grid_mapping_name	latitude_longitude
		epsg_code	EPSG:4326
		longitude_of_prime_meridian	0.0f
		semi_major_axis	6378137.0
		inverse_flattening	298.257223563