

Glider Mission Summary Report

2012 - 2015 SOCIB (CSIC)

SOCIB_CANALES_JUL2013 (GR-MR-0018)



Balearic Islands Coastal Observing and Forecasting System







Mission Name		SOCIB_CANALES_JUL2013 (GR-MR-0018)
Platform Model		Slocum 1000 G2
Platform ID / Name / WMO Code		U243 / SDEEP00 / 68457
Related Platforms / Missions		
Start Date		2013-07-15
	End Date	2013-08-02
Total Days	19	Total distance (Km / Nm) 448 / 242
	Survey Area (NODC or SDN region)	Mallorca and Eïvissa Channels (Western Mediterranean sea)
Objective(s)		Establishing the variability of the N/S exchange of water masses that occur through the Ibiza Channel. Sampling a standard transect across the Ibiza Channel several times using physical and biogeochemical sensors. No greater than 1 month gap in between consecutive iterations. The Mallorca Channel is also sampled when operationally practical.
Scientific Sensors (name & model / serial_number / calibration date)		GPCTD -SBE- / sn 0107 / 04-Jan-2012 FLNTU -WetLabs- / sn2279 / 15-Jul-2011 OPTODE -Aandera- / sn 1409 / 15-Feb-2011
Number of Profiles		564 (CTD), 261 (FLNTU), 261 (OXY)
Significant Events		Fourth operational mission performed by SDEEP00 (Slocum G2) Second ever mission by a SOCIB Lithium-powered glider Moderate discordance between commanded and traced route probably due to minimal excess of roll to starboard 1 DE_PUMP error forced Glider to interrupt the execution Glider recovered near Eïvissa to concatenate this mission with G- ALTIKA mission (PI: ananda.pascual@imedea.uib-csic.es)
Mis	ssion Summary	This mission stands for the 4th iteration of the Canales Campaign 2013, carried out by SOCIB's glider SDEEP00 (Unit 243). Launching was performed by a 2-member field-team on board SOCIB-I professional RIB at location N39.4795° E2.2468°. During the time the glider remained deployed 1 Mallorca-Eïvissa and 4 Eïvissa-Valencia channels were surveyed. All of them fully completed. Overall performance of mechanical and sampling devices was very good (1 DE_PUMP error during navigation). Only quite a few oddities coming from DIGIFIN and IRIDIUM devices and warnings from GPS. Navigation and traced route were acceptable but improvable probably due to un-precise ballasting procedure. Communications were stable and fluent allowing the transmission of both near-real-time data and telemetry, including ARGOS messages. Glider was recovered at position N38.9934° E1.0594° by SOCIB's field team onboard SOCIB-I so this glider could be deployed the same day in fulfillment of the G-ALTIKA mission. Upon completion, SDEEP00 was received at IMEDEA's glider-lab, put on the bench, revised and properly stored. The gathered dataset was fully backed-up and uploaded to SOCIB's public repository.

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Institute	SOCIB in collaboration with IMEDEA
Project Affiliation (web-site)	http://www.socib.eu
Partnership / Participation	SOCIB (internal long-term project of sustained monitoring line) IMEDEA (in-kind contribution of material and infrastructures)
Glider Software Version	v7.7 GAMMA_RAD5
Data Retrieval (real-time [RT] / delayed-mode [DM])	Real-time sub-set via satellite link every 6 hours every day Delayed-mode direct download of full gathered data sets
Compass Calibration (specify procedure)	Error measurement revealed no necessity to perform a compass calibration
Battery Type	Manufacturer's original Lithium batt.pack (700Ah-nominal cap.)
Battery Consumption (Ah)	97,949Ah (reading from 117,656Ah to 215,605Ah)
Data Available From	http://thredds.socib.es/thredds/dodsC/auv/glider/sdeep00- scb_sldeep000/L1/2013/dep0005_sdeep00_scb-sldeep000_L1_2013- 07-15_data_dt.nc
Full Mission Report From	glidertech@socib.es
Technical Contact	glidertech@socib.es

Figure 1

(Map providing general overview of Survey Area)



Mission Summary

(Map providing detailed overview of Survey Area and traced Flight Path with surface points if possible)



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