

Layouts

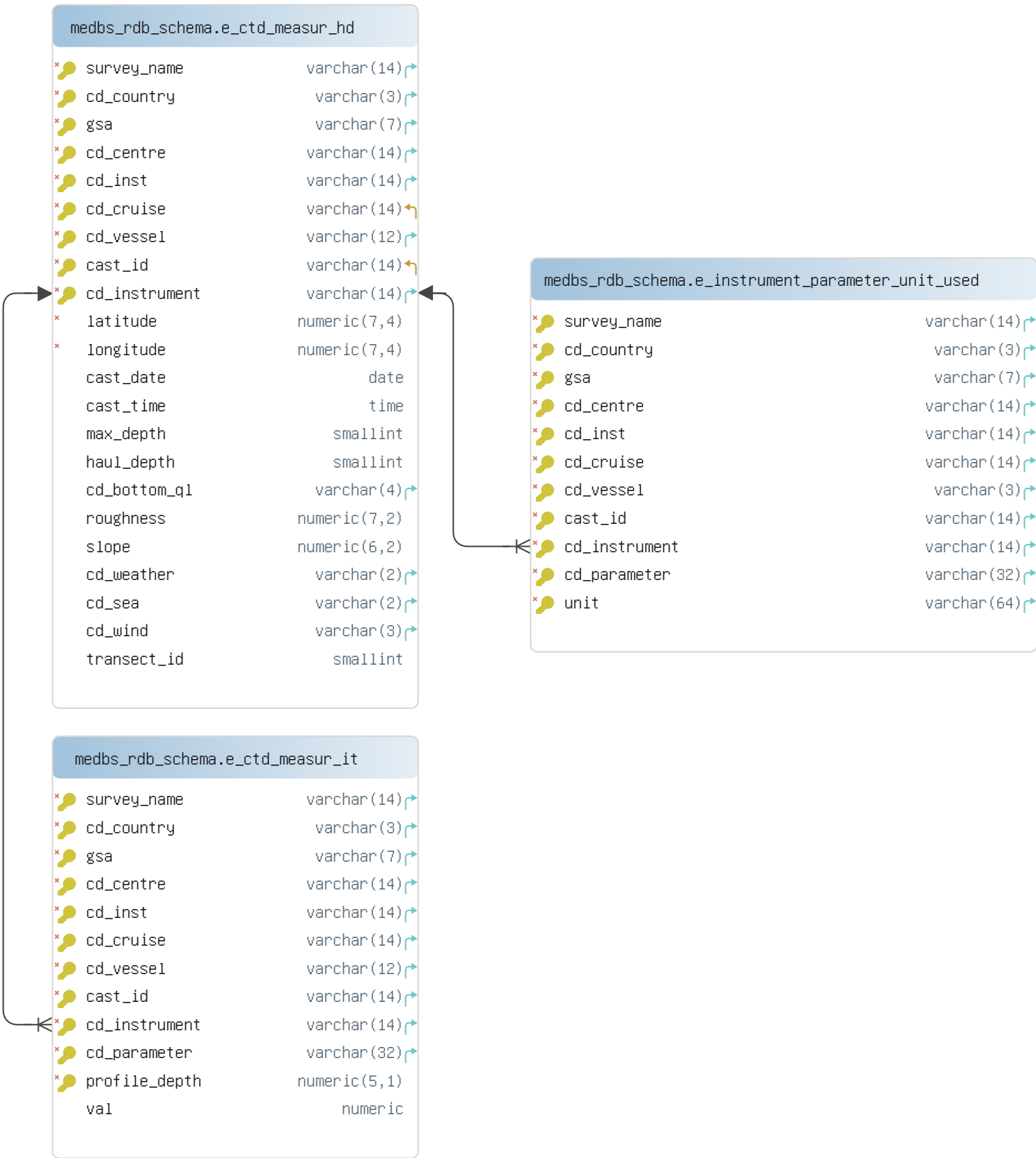
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MEDIAS CTDs

Table medbs_rdb_schema.e_ctd_measur_hd			
Idx	Name	Data Type	Description
CTD			
* Pk	survey_name	varchar(14)	Survey name (e.g. MEDIAS, MEDITS)
* Pk	cd_country	varchar(3)	Country ISO 3166 international standard
* Pk	gsa	varchar(7)	GFCM Geographical subarea
* Pk	cd_centre	varchar(14)	Centre code
* Pk	cd_inst	varchar(14)	Institute code
* Pk	cd_cruise	varchar(14)	Cruise code
* Pk	cd_vessel	varchar(12)	Vessel
* Pk	cast_id	varchar(14)	Cast ID
* Pk	cd_instrument	varchar(14)	Instrument code
*	latitude	numeric(7,4)	Latitude in decimal degrees
*	longitude	numeric(7,4)	Longitude in decimal degrees
	cast_date	date	Date
	cast_time	time	Shooting time
	max_depth	smallint	Maximum depth of the cast (to be filled auto by the profile table)
	haul_depth	smallint	Haul depth (m)
	cd_bottom_q1	varchar(4)	Bottom quality
	roughness	numeric(7,2)	Roughness (https://www.researchgate.net/figure/a-Bottom-roughness-length-20-used-for-varied-condition-b-refined-bottom-roughness_fig2_335792497)
	slope	numeric(6,2)	Slope (for degrees, the range of slope values is 0 to 90)
	cd_weather	varchar(2)	Weather
	cd_sea	varchar(2)	Sea condition
	cd_wind	varchar(3)	Wind direction
	transect_id	smallint	Transect ID
Indexes			
Type	Name	On	Description
Pk	e_ctd_measur_hd_pkey	survey_name, cd_country, gsa, cd_centre, cd_inst, cd_cruise, cd_vessel, cast_id, cd_instrument	
Foreign Keys			
Type	Name	On	Description
	cd_vessel_fk\$rv_eurofleets (cd_vessel) ref rv_eurofleets (vessel_code)		
	survey_name_fk\$p_surveys (survey_name) ref p_surveys (survey_code)		
	cd_instrument_fk\$e_instrument (cd_instrument) ref e_instrument (cd_instrument)		
	weather_fk\$p_weather (cd_weather) ref p_weather (cd)		
	sea_condition_fk\$p_sea_condition (cd_sea) ref p_sea_condition (cd)		
	wind_fk\$p_wind (cd_wind) ref p_wind (cd)		
	bottom_quality_fk\$p_bottom_types (cd_bottom_q1) ref p_bottom_types (cd_bottom)		
	e_ctd_measur_hd_country_fk\$p_country3166 (cd_country) ref p_countries_iso3166 (country_a3code)		
	gsa_fk\$p_fdi_subregion (gsa) ref p_fdi_subregion (subregion_cd)		

Table medbs_rdb_schema.e_ctd_measur_hd

cd_centre_fk\$p_fishery_bodies_acronym (cd_centre) ref
p_fishery_bodies (acronym)

cd_inst_fk\$p_fishery_body_departments (cd_inst) ref
p_fishery_body_departments (department)

Constraints

Name	Definition	Description
chk_latitude	latitude >= 34.00) AND (latitude <= 45.70	
chk_longitude	longitude >= '- 5.50':::numeric) AND (longitude <= 35.00	
chk_haul_depth	haul_depth >= 10) AND (haul_depth <= 1500	
chk_roughness	(roughness > (0)::numeric) OR NULL::boolean	
chk_slope	((slope >= (0)::numeric) AND (slope <= (90)::numeric)) OR NULL::boolean	
chk_max_depth	max_depth >= 10) AND (max_depth <= 1500	

Table medbs_rdb_schema.e_ctd_measur_it

Idx	Name	Data Type	Description
CTD Measurments			
* PK	survey_name	varchar(14)	Survey name (e.g. MEDIAS, MEDITS)
* PK	cd_country	varchar(3)	Country ISO 3166 international standard
* PK	gsa	varchar(7)	GFCM Geographical subarea
* PK	cd_centre	varchar(14)	Centre code
* PK	cd_inst	varchar(14)	Institute code
* PK	cd_cruise	varchar(14)	Cruise
* PK	cd_vessel	varchar(12)	Vessel
* PK	cast_id	varchar(14)	Cast ID
* PK	cd_instrument	varchar(14)	Instrument code
* PK	cd_parameter	varchar(32)	Parameter
* PK	profile_depth	numeric(5,1)	Water column depth (m)
	val	numeric	Parameter value

Indexes

Type	Name	On	Description
Pk	e_ctd_measur_it_pkey	profile_depth, cd_parameter, cd_instrument, cast_id, cd_vessel, cd_cruise, cd_inst, cd_centre, gsa, cd_country, survey_name	

Foreign Keys

Type	Name	On	Description
	cd_vessel_fk\$rv_eurofleets (cd_vessel) ref rv_eurofleets (vessel_code)		
	survey_name_fk\$p_surveys (survey_name) ref p_surveys (survey_code)		
	fk_e_instrument_parameter\$e_instrument_parametes (cd_instrument, cd_parameter) ref e_instrument_parameters (cd_instrument, cd_parameter)		
	medbs_rdb_schema.e_ctd_measur_it_country_fk\$p_country3166 (cd_country) ref p_countries_iso3166 (country_a3code)		

Table medbs_rdb_schema.e_ctd_measur_it

```
gsa_fk$p_fdi_subregion ( gsa ) ref p_fdi_subregion (
subregion_cd )

cd_centre_fk$p_fishery_bodies_acronym ( cd_centre ) ref
p_fishery_bodies ( acronym )

cd_inst_fk$p_fishery_body_departments ( cd_inst ) ref
p_fishery_body_departments ( department )

e_ctd_measur_it_fk$e_ctd_measur_hd ( survey_name,
cd_country, gsa, cd_centre, cd_inst, cd_cruise,
cd_vessel, cast_id, cd_instrument ) ref e_ctd_measur_hd
( survey_name, cd_country, gsa, cd_centre, cd_inst,
cd_cruise, cd_vessel, cast_id, cd_instrument )
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Constraints

Name	Definition	Description
chk_profile_depth	profile_depth >= 0.1) AND (profile_depth <= (1500)::numeric	
chk_val	val >= (0)::numeric	

Table medbs_rdb_schema.e_instrument_parameter_unit_used

Idx	Name	Data Type	Description
Parameter unit used in a station by equipment used (e.g. equipment=CTDSBE19p, parameter=TM, unit=C)			
* PK	survey_name	varchar(14)	Survey name (e.g. MEDIAS, MEDITS)
* PK	cd_country	varchar(3)	Country ISO 3166 international standard
* PK	gsa	varchar(7)	GFCM Geographical subarea
* PK	cd_centre	varchar(14)	Centre code
* PK	cd_inst	varchar(14)	Institute code
* PK	cd_cruise	varchar(14)	Cruise
* PK	cd_vessel	varchar(3)	Vessel
* PK	cast_id	varchar(14)	Cast ID
* PK	cd_instrument	varchar(14)	Instrument code (e.g. CTDSBE19p)
* PK	cd_parameter	varchar(32)	Parameter (e.g. TM)
* PK	unit	varchar(64)	Unit (e.g. C)

Indexes

Type	Name	On	Description
Pk	e_instrument_parameter_unit_used_pk	survey_name, cd_country, gsa, cd_centre, cd_inst, cd_cruise, cd_vessel, cast_id, cd_instrument, cd_parameter, unit	

Foreign Keys

Type	Name	On	Description
	e_instrument_parameter_unit_used_fk\$e_ctd_measur_hd (survey_name, cd_country, gsa, cd_centre, cd_inst, cd_cruise, cd_vessel, cast_id, cd_instrument) ref e_ctd_measur_hd (survey_name, cd_country, gsa, cd_centre, cd_inst, cd_cruise, cd_vessel, cast_id, cd_instrument)		
	fk_e_parameter_unit_used\$e_instrument_variable_units (cd_parameter, unit) ref e_instrument_parameter_list_of_units (parameter, unit)		