### Manual for the Completion of CDISC Aligned NCI Standard Case Report Form (CRF) Modules

#### Introduction

In 2006, members of the National Cancer Institute's Center for Biomedical Informatics and Information Technology (NCI CBIIT) in conjunction with the cancer Data Standards Registry and Repository (caDSR) user community initiated a Case Report Form (CRF) harmonization activity. CRFs submitted from the community were reviewed and inventoried. The Harmonization group then reviewed all questions on the CRF and partitioned them into four categories:

- Mandatory A data collection variable that must be on the CRF (e.g., a regulatory requirement (if applicable)).
- Conditional A data collection variable that must be collected on the CRF for specific cases that may be dictated by local or sponsor defined business rules.
- Optional A data collection variable that is available for use if needed. There is no
  regulatory or business requirement for inclusion of this element on the CRF; if the design
  and scientific questions posed in the study dictate the need to collect this type of data;
  this is the element to include on the CRF.
- Non-harmonized A data collection variable that is, by consensus, to primarily belong to a different CRF module or is not belonging to any defined module.

A template form with modules that contain questions or variables representing data to be collected and a companion electronic CRF instruction manual was developed. These CRF modules were vetted and adopted by the caDSR stakeholder community as metadata standards.

Since the original CRFs and manuals were adopted, the Food & Drug Administration (FDA) published guidelines for submission of clinical trial study data using the Clinical Data Interchange Standards Consortium (CDISC) Study Data Tabulation Model (SDTM) for Investigational New Drug (IND) trials starting after December 2017. In response, NCI CBIIT has aligned the NCI Standard CRF modules with the CDISC data collection standard, Clinical Data Acquisition Standards Harmonization (CDASH) where data is expected to be submitted to FDA in SDTM format.

The instruction manual is a set of directions to guide data collection in each module template. Specific implementation instructions are not present; various groups may wish to implement the contents of a module in a variety of software applications.

The instructions include the field name, description or definition of each field, and any special formatting notes that apply to entries – such as the inclusion of full dates, use of values from a choice list only, etc. Finally, each question (or data item) is noted as Mandatory (m), Conditional (c), or Optional (o).

## Demography CDISC Aligned NCI Standard Template Module Definitions

#### Mapping to the CDASH:

This NCI Standard Template Form maps to the following domains in the CDASHIG v2.0 metadata table:

- DM Demographics (v2.0)
- SC Subject Characteristics (v2.0)

#### Mapping to the SDTM:

This NCI Standard Template Form maps to the following domains in the SDTMIG v3.3 metadata table:

- DM Demographics (v3.3)
- SC Subject Characteristics (v3.3)

## Demography CDISC Aligned NCI Standard Template Module Template Instructions

### Field Descriptions and Instructions

Field Name (Partition Status) CDE ID # Short Name	Definition CDISC Mapping and Instruction	Format
Sex Gender Type (m) 7050283 DMSXGEN	Sex of the subject as determined by the investigator.  CDASH: SEX (6343385); SDTM: SEX (No CDE)	CHARACTER. Use choice list.
Race (m) 6343384 RACE	An arbitrary classification based on physical characteristics; a group of persons related by common descent or heredity (U.S. Center for Disease Control).  CDASH: RACE (6343384); SDTM: RACE (No CDE)	CHARACTER. Use choice list.

Field Name (Partition Status) CDE ID # Short Name	Definition CDISC Mapping and Instruction	Format
Date of Birth (m) 6341138 BRTHDAT	A subject's date of birth (with or without the time of birth). The complete Date of Birth is made from the temporal components of Birth Year, Birth Month, Birth Day and Birth Time.  CDASH: BRTHDAT (6341138); SDTM: BRTHDTC (No CDE)	DATE
Ethnicity (m) 6338619 ETHNIC	A social group characterized by a distinctive social and cultural tradition maintained from generation to generation, a common history and origin and a sense of identification with the group; members of the group have distinctive features in their way of life, shared experiences and often a common genetic heritage; these features may be reflected in their experience of health and disease.  CDASH: ETHNIC (6338619);	CHARACTER. Use choice list.
Address Postal Code (c) 7050284 DMZIPCD	SDTM: ETHNIC (No CDE)  The five-digit Zone Improvement Plan (ZIP) code and the four-digit extension code (if available) that represents the geographic segment that is a subunit of the ZIPcode, assigned by the U.S. Postal Service to a geographic location to facilitate mail delivery; or the postal zone specific to the country, other than the U.S., where the mail is delivered.	CHARACTER
	CDASH: No Match; SDTM: No Match; Conditionality Rule: Requirement for collection is imposed by the trial sponsor.	

Field Name (Partition Status) CDE ID # Short Name	Definition CDISC Mapping and Instruction	Format
Healthcare Payment Method Type (c) 7050285 DMPAYMTH	The entity, organization, government, corporation, health plan sponsor, or any other financial agent who pays a healthcare provider for the healthcare service rendered to a person or reimburses the cost of the healthcare service.	CHARACTER. Use choice list.
	CDASH: No Match; SDTM: No Match; Conditionality Rule: Requirement for collection is imposed by the trial sponsor. Sponsor now stipulates the use of codes with the values.	
Address Country Name (c) 7050286 DMCNTRY	The country from which a person or their biological family had previous residence or past ancestors.	CHARACTER
	CDASH: No Match; SDTM: No Match; Conditionality Rule: Requirement for collection is imposed by the trial sponsor.	
Demographics Form Completion Date (c) 7050287 DMCRFCMP	The date the demographics case report form was completed, represented in an unambiguous date format (e.g., DD-MON-YYYY).	DATE
	CDASH: No Match; SDTM: No Match; Conditionality Rule: Data Collection is done using paper Case Report Forms (CRFs) instead of an Electronic Data Capture system.	

Field Name (Partition Status) CDE ID # Short Name	Definition CDISC Mapping and Instruction	Format
Centers for Disease Control and Prevention Race Identifier Code (c) 7050288 DMRACDC	The code used for reporting information about race based on the Center for Disease Control and Prevention (CDC) categories  CDASH: No Match; SDTM: No Match; Conditionality Rule: In the event the sponsor requires the data be collected using the CDC codes, use this CDE instead of 2192199. Do NOT collect both items.	CHARACTER
Centers for Disease Control and Prevention Ethnicity Identifier Code (c) 7050289 DMETHCDC	The code used for reporting information about ethnicity based on the Center for Disease Control and Prevention (CDC) categories.  CDASH: No Match; SDTM: No Match; Conditionality Rule: In the event the sponsor requires the data be collected using the CDC codes, use this CDE instead of 2192217. Do NOT collect both items.	CHARACTER
Education Level Subject Characteristics Original Result Summary Category Type (o) 7050290 EDULEVSM	The category summarizing the highest level of education attained by a person.  CDASH: EDLEVEL_SCORRES (6421544); SDTM: SCORRES (No CDE) where SCTESTCD = "EDULEVEL"	CHARACTER. Use choice list.
Address Birth Country Type (o) 7050291 NATORIG	The country in which a person was born.  CDASH: NATORIG_SCORRES (6421543); SDTM: SCORRES (No CDE) where SCTESTCD = "NATORIG"	CHARACTER. Use choice list.

Field Name (Partition Status) CDE ID # Short Name	Definition CDISC Mapping and Instruction	Format
Education Level Subject Characteristics Original Result Summary Type (o) 7050292 EDULEVEL	The highest level of education attained by a person.  CDASH: EDLEVEL_SCORRES (6421544); SDTM: SCORRES (No CDE) where SCTESTCD = "EDULEVEL"	CHARACTER. Use choice list.
Enrollment Address Census Tract Code (o) 7050293 CENCUSCD	The 2000 United States Census Bureau's Area Classifications code indicating the census tract of a person's residence.  CDASH: No Match; SDTM: SCORRES (No CDE) where SCTESTCD = "CENCUSCD"	CHARACTER
Marital Status Subject Characteristics Original Result Status (o) 7050294 MARISTAT	The self-reported demographic parameter indicating a person's current conjugal status.  CDASH: MARISTAT_SCORRES (6421542); SDTM: SCORRES (No CDE) where SCTESTCD = "MARISTAT"	CHARACTER. Use choice list.

## Annotated CRF: Demography CDISC Aligned NCI Standard Template

This annotated CRF is ONLY used to show CDISC mapping without consideration of the CRF layout. CDASH mapping is in **Blue**, and SDTM mapping is in **Red**.

# Form Name: Demography CDISC Aligned NCI Standard Template Mandatory Questions

CRF Question	Value Domain
Gender (7050283) CDE Short Name: DMSXGEN	CHARACTER – Maximum Length = 13
CDASH: SEX (6343385)  SDTM: SEX (No CDE)	<ul> <li>□ Female – Female Gender</li> <li>□ Intersex – Intersex</li> <li>□ Male – Male Gender</li> <li>□ Not Reported – Not Reported</li> <li>□ Unknown – Unknown</li> <li>□ Unspecified – Unspecified</li> </ul>
Race (6343384) CDE Short Name: RACE	CHARACTER – Maximum Length = 100
CDASH: RACE (6343384)  SDTM: RACE (No CDE)	<ul> <li>□ AMERICAN INDIAN OR ALASKA NATIVE         <ul> <li>American Indian or Alaska Native</li> </ul> </li> <li>□ ASIAN – Asian</li> <li>□ BLACK OR AFRICAN AMERICAN – Black or African American</li> <li>□ NATIVE HAWAIIAN OR OTHER PACIFIC ISLANDER – Native Hawaiian or Other Pacific Islander</li> <li>□ NOT REPORTED – Not Reported</li> <li>□ UNKNOWN – Unknown</li> <li>□ WHITE – White</li> </ul>
Patient's Date of Birth (6341138)  CDE Short Name: BRTHDAT	DATE – Maximum Length = 11
CDASH: BRTHDAT (6341138)	
SDTM: BRTHDTC (No CDE)	

CRF Question	Value Domain
Ethnicity (6338619) CDE Short Name: ETHNIC	CHARACTER – Maximum Length = 100
CDASH: ETHNIC (6338619)  SDTM: ETHNIC (No CDE)	<ul> <li>☐ HISPANIC OR LATINO – Hispanic or Latino</li> <li>☐ NOT HISPANIC OR LATINO – Not Hispanic or Latino</li> <li>☐ NOT REPORTED – Not Reported</li> <li>☐ UNKNOWN – Unknown</li> </ul>

#### **Conditional Questions**

CRF Question	Value Domain
ZIP Code (7050284)  CDE Short Name: DMZIPCD	CHARACTER – Maximum Length = 15
CDASH: No Match	
SDTM: No Match	
Payment Method (7050285)  CDE Short Name: DMPAYMTH	CHARACTER – Maximum Length = 50
CDASH: No Match	☐ Managed Care/Medicare – Managed Care/Medicare
	☐ Medicaid – Medicaid
SDTM: No Match	☐ Medicaid and Medicare – Medicare And Medicaid
	☐ Medicare – Medicare
	<ul> <li>Medicare and Private Insurance –</li> <li>Medicare And Private Insurance</li> </ul>
	<ul> <li>Military or Veterans Sponsored, NOS –</li> <li>Military Or Veterans Sponsored Insurance,</li> <li>Not Otherwise Specified</li> </ul>
	☐ Military Sponsored (Including CHAMPUS & TriCare) – Military Insurance
	<ul><li>☐ No Means of Payment (No Insurance) – No Insurance</li></ul>
	☐ Other – Other
	☐ Private Insurance – Private Insurance
	Self-Pay (No Insurance) – Self Payment
	State Supplemental Health Insurance – State Supplemental Health Insurance
	Unknown – Unknown
	<ul><li>☐ Veterans Sponsored – Veterans Administration Sponsor Insurance</li></ul>
Country of Residence (7050286)  CDE Short Name: DMCNTRY	CHARACTER – Maximum Length = 200
CDASH: No Match	
SDTM: No Match	

CRF Question	Value Domain
Date Completed (7050287) CDE Short Name: DMCRFCMP	DATE – Maximum Length = 11
CDASH: No Match	
SDTM: No Match	
CDC Race Code (7050288) CDE Short Name: DMRACDC	CHARACTER – Maximum Length = 6
CDASH: No Match	
SDTM: No Match	
CDC Ethnicity Code (7050289) CDE Short Name: DMETHCDC	CHARACTER – Maximum Length = 6
CDASH: No Match	
SDTM: No Match	

### **Optional Questions**

CRF Question	Value Domain
Highest Education Level (7050290)	CHARACTER – Maximum Length = 44
CDE Short Name: EDULEVSM	
	☐ Bachelor's Degree – Bachelor's Degree
CDASH: EDLEVEL_SCORRES (6421544)	<ul> <li>Doctoral degree or professional degree – Professional Doctorate or Doctorate Degree</li> </ul>
SDTM: SCORRES (No CDE) where	☐ Grade School – Grade School
SCTESTCD = "EDULEVEL"	☐ Graduate or professional degree – Graduation Or Professional Degree
	<ul> <li>☐ High school graduate (including equivalency) – High School Completion or General Equivalency Diploma (GED)</li> <li>Completion</li> </ul>
	☐ Master's Degree – Master's Degree
	<ul><li>☐ No formal education – No Formal Schooling</li></ul>
	<ul><li>☐ Not high school graduate – Not High School Graduate</li></ul>
	☐ Some college or associate degree – Some College or Associates Degree
Country of Birth (7050291)	CHARACTER – Maximum Length = 55
CDE Short Name: NATORIG	
	☐ Other country – Other country
CDASH: NATORIG_SCORRES (6421543)	☐ Other country, specify – OTHER COUNTRY, SPECIFY
	□ USA – USA
SDTM: SCORRES (No CDE) where SCTESTCD = "NATORIG"	☐ USA, specify the 2 letter State code, eg NY-USA, SPECIFY THE 2 LETTER STATE CODE, EG NY

CRF Question	Value Domain
Highest Education Level (7050292)  CDE Short Name: EDULEVEL	CHARACTER – Maximum Length = 50
	☐ 10th Grade – 10th Grade
CDASH: EDLEVEL_SCORRES	☐ 11th Grade – 11th Grade
(6421544)	☐ 12th Grade No Diploma – 12th Grade
	☐ 1st Grade – 1st Grade
SDTM: SCORRES (No CDE) where SCTESTCD = "EDULEVEL"	☐ 2nd Grade – 2nd Grade
00120105 = 25022422	☐ 3rd Grade – 3rd Grade
	☐ 4th Grade – 4th Grade
	☐ 5th Grade – 5th Grade
	☐ 6th Grade – 6th Grade
	☐ 7th Grade – 7th Grade
	☐ 8th Grade – 8th Grade
	☐ 9th Grade – 9th Grade
	<ul> <li>Academic Doctorate Degree – Academic Doctorate Degree Completion</li> </ul>
	Associate Degree – Associate Academic Degree Completion
	☐ Bachelor Degree – Bachelor's Degree Completion
	☐ Don't Know – Don't Know/Refused
	☐ General Equivalency Diploma – General Equivalency Diploma
	☐ High School Graduate – High School Graduate
	☐ Kindergarten – Kindergarten Completion
	☐ Master's Degree – Master's Degree Completion
	☐ No Formal Schooling – Never Attended
	☐ Preschool – Preschool Completion
	<ul> <li>Professional Doctorate Degree –</li> <li>Professional Doctorate Degree Completion</li> </ul>
	☐ Refused – Refused
	☐ Some College, No Degree – Some College
	☐ VoTech Program – Vocational Degree

CRF	Question	Value Domain
	sus Tract Code at Enrollment (7050293)  Short Name: CENCUSCD	CHARACTER – Maximum Length = 15
	CDASH: No Match	
	SDTM: SCORRES (No CDE) where SCTESTCD = "CENCUSCD"	
	ital Status (7050294) E Short Name: MARISTAT	CHARACTER – Maximum Length = 100
		☐ ANNULLED – Annulled
	CDASH: MARISTAT_SCORRES	☐ DIVORCED – Divorced
	(6421542)	☐ DOMESTIC PARTNER – Domestic Partner
	SDTM: SCORRES (No CDE) where SCTESTCD = "MARISTAT"	☐ INTERLOCUTORY – Interlocutory Marital Status
		☐ LEGALLY SEPARATED – Separated
		☐ MARRIED – Married
		☐ NEVER MARRIED – Never Married
		☐ POLYGAMOUS – PVM Polygamous
		☐ SEPARATED – Separated
		□ WIDOWED – Widowed