# Standards Update What's New and What's Next Amy Palmer Head of Standards Development, CDISC

cdisc

# Standards Published Since the Last Year's Bethesda Interchange

#### Foundational Standards

- SDTM v1.7
- SDTMIG v3.3
- SDTMIG-Medical Devices v1.1
- ADaM Conformance Rules v2.0
  - Define.XML v2.1
  - SENDIG Animal Rule v1.0
    - SDTM v1.8

#### Therapeutic Area Standards

- HIV
- PTSD
- Colorectal Cancer
- Huntington's Disease
  - CDAD
  - Lung Cancer
- Traditional Chinese Medicine CAD-Angina
  - Nutrition

#### Publishing Soon!

- ADaMIG v1.2
- CDASHIG 2.1
- CDASH Model v1.1



# **New Onboarding Process for Volunteers**

- Single internal point of contact for onboarding, administrative and record updates, to ensure accurate follow-up of volunteers
- Leveraging of IT tools to facilitate communication and teamwork

 Improved processes and procedures to support volunteer activities





# **CDISC Staff Support for Foundational Teams**

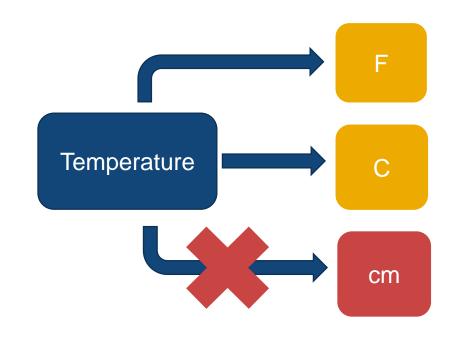


- Project Management Support
  - Scope planning
  - JIRA project management
  - Wiki support
  - Navigating the CDISC governance process
- Allows teams to focus on standards development



#### **Codetable Mapping Files**

- Built to show explicit relationships between terms in different codelists
- Machine-readable, published on CDISC website
- DS, CV, EG, TU/TR/RS (Oncology) Race/Ethnicity, SC, TS, VS





# **LOINC-CDISC Mapping**



CDISC CT TEAM HAS COMPLETED THE LOINC-CDISC LB MAPPING



CONTAINS APPROXIMATELY 2,000 LB MAPPINGS



REVIEW BY THE REGENSTRIEF INSTITUTE AND FDA LOINC WORKING GROUP COMPLETE



POSTED FOR INTERNAL REVIEW IN AUGUST 2019



MAPPING WILL BE RELEASED FOR PUBLIC COMMENT SOON



#### **UCUM Codelist Table**

- A codelist table that allows users to toggle between UCUM and CDISC Unit codelists
- For each published CDISC submission value across all UNIT-based codelists in SDTM terminology, the mapping provides valid UCUM expressions associated with that unit concept

 Allows for a collected UCUM-compliant unit of measure to be easily matched to the appropriate CDISC submission value associated with that concept







# What Are We Working on Now?



### **Foundational Standards in Development**

Conformance Rules

SDTM v2.0

SENDIG v3.1.1

ADaM OCCDS v1.1

ADaM Data Structures for Integration

SDTMIG v3.4

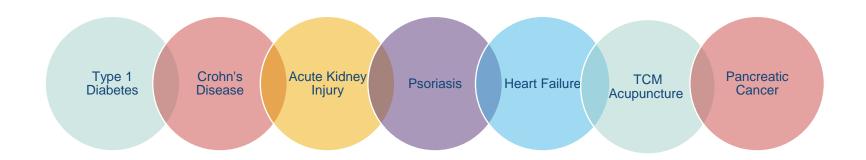
SDTM Variable Definitions Multiple QRS and ADQRS Supplements

CDASH-SAE Supplement

https://www.cdisc.org/standards/in-development



# Therapeutic Area User Guides Currently In Development



https://www.cdisc.org/standards/in-development



# **CDISC Knowledge Base Project**



An open, assessible, searchable and user-friendly interface on the CDISC Website to host new and existing website content for CDISC implementers



## **Knowledge Base – Project Components**

Coordinated with redeveloped standards website pages

content - technical articles written by CDISC staff and teams

Communitygenerated content, curated by CDISC

Community
questions, with
curated CDISC team
answers

Links to external useful content



#### **Publication of Errors and Known Issues**

#### **Errors**

- Small errors such as typos that do not affect conformance
- Errors that affect conformance

#### Known Issues

- Inconsistencies within a CDISC standard
- Inconsistencies between standards
- Inconsistencies between a CDISC standard and regulatory agency advice
- Gaps in standards



#### **Publication of Errors and Known Issues**

Provide possible solutions

Vetted and approved by the CDISC Global Governance Group

Will be made available in real-time to the user community

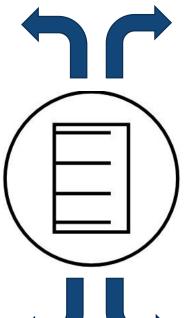


#### Occurrence of one of a group of Events or Interventions

Affected Standard	SDTMIG v3.3 and earlier			
Data to be represented	A finding of the form "Did an <event group="" in="" intervention="" or="" this=""> occur?"</event>			
Reason for uncertainty	Occurrence questions at the level of a domain (e.g, "Did the subject take any concomitant medications?" or "Did the subject have any adverse events?") can be represented in CDASH, but are not included in SDTM datasets.			
	Occurrence questions at the level of a specific event or intervention are represented in an events or interventions domain in a record with the specific event or intervention in the topic variablePRESF = " $\forall$ " and the response to the question in ( $\forall$ " or " $\forall$ ") inOCCUR.			
	No guidance is given about questions at an intermediate level, although such questions are common. For example, "Has the subject taken any opiate-containing medications?" or "Has the subject had any respiratory infections?"			
Possible solution for affected version(s)	The Therapeutic Area User Guide for Asthma represented questions about groups of medications in a CM record with both CMTRT and CMSCAT equal to the name of the group (e.g., "SHORT-ACTING BETA-AGONISTS" or "SYSTEMIC CORTICOSTEROIDS") and CMPRESP = "V". The fact that the value in CMTRT is equal to the value in CMSCAT indicates that the question is about a group of concomitant medications.			
	This convention, of populating both the topic variable and either CAT orSCAT with the name of the group, can be used as a solution with current versions of the SDTMIG. WhetherCAT or SCAT is used depends on whetherCAT is available or is being used for another purpose. The use of this convention should be explained in the Clinical Study Data Reviewers Guide (cSDRG).			
Efforts to resolve issue	This convention is being considered for inclusion in a future version of the SDTMIG. It has been logged as a JIRA issue: https://jira.cdisc.org/browse/SDS-26			

## **Curated Non-Standard Variable Registry**

Enables consistency in the absence of a standard variable



Will contain all nonstandard variables used in **CDISC Implementation** and User Guides

Vetted by the CDISC Global Governance Group



Will be made available in real-time to the user community



# **Consideration Documents for Regulatory Requirements**



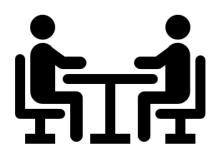
Race and ethnicity

QRS logically skipped items

Representation of SI and conventional units



PhUSE/CDISC Collaboration to Create an Implementation Primer







# **SDTM** Reorganization

Update outdated language

Move domain-specific variables

Make metadata consistent and separated

 Definitions will be added, and definition-like material will be removed from description column

Will be published in November 2020 as SDTM v2.0



## **Development of Principles**

Guides and improves understanding of the standard

Facilitates decision making

Helps to optimize utilization of resources

Helps to manage change





#### **Principles Hierarchy**

Accomplish the CDISC goals and mission without promoting any individual vendor or organization

Manage scope with incremental development

Start with the end in mind

Domain variables based on the same root variable have the same meaning in all domains



# Update of Metadata Submission Guidelines Package

Current package enables users to become familiar with the SDTM submission components

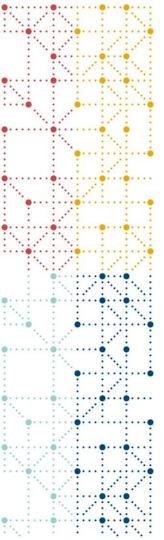
Contains annotated CRF, submission datasets, define.xml file, define.xml stylesheet, and Reviewers' Guide

Cross team collaboration

Goal is to publish update as soon as possible







#### **Conformance Rules**

- CDISC authors rules that determine conformance with the standard by version of standard
- Regulatory agencies have their own rules specific to their needs, these may or may not be the same as CDISC authored conformance rules



- Historical development of rules
  - Standards were written before the rules which led to ambiguity
  - · The guides were specific to a team and standard



#### **Future of Conformance Rules**







WORKING ON ESTABLISHING CROSS-TEAM RULES DEVELOPMENT METHODS



SUPPORTED BY CDISC LIBRARY



### **Redesigned Conformance Rules**

Variable Name	Variable Label	Data Type	Controlled Terms	Codellst	Codelist Subset	Format	Role / Variable Group	Definition	Associated Example(s)	Associated Assumption(s)	Clear and tr			Variable Precence Condition	Value Precence	Value Precence Condition	CRID
STUDYID	Study Identifier	Char					Identifier	Unique identifier for a study.			001110111101		Required		Required		01.0011
DOMAIN	Domain Abbreviation	Char		DM			Identifier	Two-character abbreviation for the domain.					Required		Required		01.0012
	Unique Clear a Ociatio						Identifier	to uniquely identify a subject across all studies for		2	This must be a unique number, and could be a compound identifier formed by concatenating STUDYID-SITEID-SUBJID.		Required		Required		01.0013
	exal XMI 2. Eve	MID estigato L docur ry subj	ect in a stud	Cnr)icatio	n: Compa ive a subje	ect identi	fier (SUBJ	ID). [01.0014	] In some cas	ses a subject m	ors. CDISC assumes that SITEID will always be present, with ay participate in more than one study. To identify a subject ur ide how to populate variables such as USUBJID, SUBJID an	iquely across	all studies	for all applic	ations or :		
SUBJID	the Sup	plemer	ntal Qualifie for subject p xception of	rs dataset privacy sug trials that i	may be u gest caut use multi-s	sed if ap ion regar stage pro	propriate to ding the o cesses to	o provide add ollection of va assion subject	litional informa iriables like B ets to Arms de	ation. RTHDTC. This	variable is included in the Demographics model in the event ARM and ACTARM must be populated with ARM values fro lationship must be preserved in the values used to populate	that a sponso	r intends to	submit it; ho	owever, sp	ndard	01.0014

- a. Rules for the Arm-Related Variables:
  - i. If ARMCD is null, then ARM must be null and ARMNRS must be populated with the reason ARMCD is null. [02.0044]
  - ii. If ACTARMCD is null, then ACTARM must be null and ARMNRS must be populated with the reason ACTARMCD is null. Both ARMCD and ACTARMCD will be null for subjects who were not assigne
  - iii. ARMNRS may not be populated if both ARMCD and ACTARMCD are populated. ARMCD and ACTARMCD will be populated if the subject was assigned to an arm and received treatment consistent that is sufficient to explain the situation: ARMNRS should not be populated.

	formance Rule Version ociation	Unique Conformance Rule ID	Conformance Rule URI	Rule Level Association	Rule Explanation	Rule Categorization
SDTI	MIG.v3.3.CR.v1.0	01.0011	SDTMIG.v3.3.CR.v1.0.01.0011	Variable	STUDYID = DM.STUDYID	Error
SDTI	MIG.v3.3.CR.v1.0	01.0012	SDTMIG.v3.3.CR.v1.0.01.0012	Variable	DOMAIN = valid Domain Code published by CDISC	Error
SDTI	MIG.v3.3.CR.v1.0	05.0009	SDTMIG.v3.3.CR.v1.0.05.0009	Domain	Example explanation for domain level rules.	Warning



Disclaimer: This is only a proposed draft snapshot.

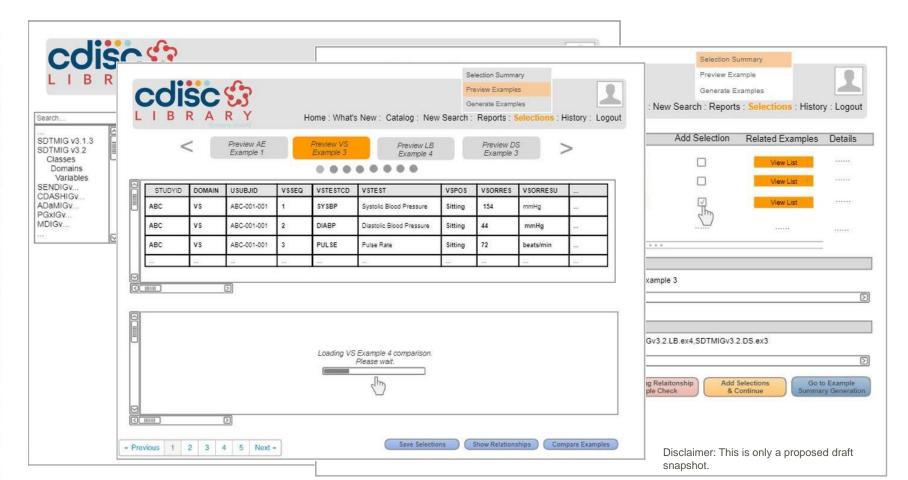
#### **Curated Examples**

- Examples exist across many Implementation and User Guides in PDFs
- Goal is to make examples accessible through CDISC Library
- Users will be able to select examples by biomedical concept, therapeutic area, observation class, domain etc.
- Curation to ensure examples remain consistent with one another
- Initial scope: Diabetes v1.0, Diabetic Kidney Disease v1.0, Type 1 Diabetes v1.0





#### **Curated Examples**



# Thank you! cdisc