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Adverse Events Module

Rebecca J. Williams, Pharm.D., MPH
Assistant Director, ClinicalTrials.gov
National Library of Medicine

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<http://ClinicalTrials.gov>

Outline

- Overview of Adverse Events (AE) module
- PRS data elements
- ClinicalTrials.gov review criteria
- Examples

Purpose

- The Adverse Events module is designed to summarize data regarding the serious and other (not including serious) adverse events that were collected during the study.
 - The module is not used for “real time” (“spontaneous”) adverse event reporting while the study is ongoing
 - The module includes summary data at the end of the study

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FDAAA* Provision

“A table of anticipated and unanticipated serious adverse events grouped by organ system, with number and frequency of such event in each arm of the clinical trial.”

[Sec. 282(j)(3)(I)(iii)(I)]

*Food and Drug Administration Amendments Act of 2007

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FDAAA Provision (cont'd)

“A table of anticipated and unanticipated adverse events **that are not included in the [Serious Adverse Events] table**...that exceed a frequency of 5 percent within any arm of the clinical trial, grouped by organ system, with number and frequency of such event in each arm of the clinical trial.”

[Sec. 282(j)(3)(I)(iii)(II)]

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Journal Article Format

Primary safety assessment of the number of patients with severe, life-threatening, or fatal treatment-related toxicities.

Variable	AmB (n = 47)	AmB+Fluc400 (n = 48)	AmB+Fluc800 (n = 45)
Related to either study drug			
Overall			
Patients with event	19 (40.4)	18 (37.5)	14 (31.1)
90% CI, % ^a	28.3–53.5	25.8–50.4	19.9–44.3
<i>P</i> ^b		.573	.794
By severity ^c			
Severe	13 (27.6)	13 (27.1)	9 (20.0)
Life-threatening	6 (12.8)	5 (10.4)	5 (11.1)
Fatal	0	0	0
By relatedness ^d			
Probably related	16 (34.0)	16 (33.3)	12 (26.7)
Definitely related	3 (6.4)	2 (4.2)	2 (4.4)
Related to fluconazole			
Overall			
Patients with event	0	0	2 (4.4)
90% CI, % ^a	0.0–6.2	0.0–6.1	0.8–13.3
<i>P</i> ^b		>.99	.098
By severity ^c			
Severe	0	0	1 (2.2)
Life-threatening	0	0	1 (2.2)
Fatal	0	0	0
By relatedness ^d			
Probably	0	0	2 (4.4)
Definitely	0	0	0

NOTE. Data are no. (%) of patients, unless otherwise indicated. AmB, amphotericin B deoxycholate; AmB+Fluc400, amphotericin B deoxycholate plus fluconazole administered at a dosage of 400 mg; AmB+Fluc800, amphotericin B deoxycholate plus fluconazole administered at a dosage of 800 mg; CI, confidence interval.

^a CI based on exact binomial methods.

^b Descriptive *P* value based on a 1-sided exact unconditional test for each combination therapy arm that compared the combination therapy arm with the standard arm using procedures described in Suisse and Schuster [16].

^c If a patient experienced >1 event, the patient is counted only once for the most-severe or most-related event.

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Society of America

Pappas PG, Chetchotisakd P, Larsen RA et al. Clin Infect Dis. 2009

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ClinicalTrials.gov Format

Time Frame	Reported Adverse Events (AEs) include events starting on or after Day 0 and on or before Day 100.
Additional Description	If a subject experienced more than 1 of a given AE, the subjects is counted only once for that AE. If a subject experienced more than one AE in a system organ class (SOC), the subject is counted only once in that SOC.

Reporting Groups

	Description
AmphoB Standard	Amphotericin B 0.7 mg/kg for 14 day followed by fluconazole 400 mg daily for 8 weeks. For subjects in the standard therapy arm whose Amphotericin B dose is continued beyond 14 days, fluconazole initiation will be delayed.
AmphoB+Fluc400	Amphotericin B 0.7 mg/kg and the randomized dose of fluconazole at 400 mg/day for the first 14 days, then the randomized dose of fluconazole at 400 mg/day respectively for an additional 8 weeks.
AmphoB + Fluc800	Amphotericin B 0.7 mg/kg and the randomized dose of fluconazole at 800 mg/day for the first 14 days, then the randomized dose of fluconazole at 800 mg/day respectively for an additional 8 weeks.

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ClinicalTrials.gov Format (cont'd)

Serious Adverse Events

	AmphoB Standard	AmphoB+Fluc400	AmphoB + Fluc800
Total, serious adverse events			
# participants affected / at risk	22/45 (48.89%)	17/47 (36.17%)	26/49 (53.06%)
Blood and lymphatic system disorders			
Neutropenia ^{* 2}			
# participants affected / at risk	1/45 (2.22%)	0/47 (0.00%)	2/49 (4.08%)
Anaemia ^{* 2}			
# participants affected / at risk	2/45 (4.44%)	0/47 (0.00%)	0/49 (0.00%)
Thrombocytopenia ^{* 2}			
# participants affected / at risk	0/45 (0.00%)	0/47 (0.00%)	1/49 (2.04%)
Cardiac disorders			
Cardiac failure congestive ^{* 2}			
# participants affected / at risk	0/45 (0.00%)	0/47 (0.00%)	1/49 (2.04%)
Cardio-respiratory arrest ^{* 2}			
# participants affected / at risk	0/45 (0.00%)	0/47 (0.00%)	1/49 (2.04%)

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ClinicalTrials.gov Format (cont'd)

Frequency Threshold

Threshold above which other adverse events are reported	5%
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Other Adverse Events

	AmphoB Standard	AmphoB+Fluc400	AmphoB + Fluc800
Total, other (not including serious) adverse events			
# participants affected / at risk	44/45	47/47	49/49
Blood and lymphatic system disorders			
Anaemia ^{* 1}			
# participants affected / at risk	21/45 (46.67%)	27/47 (57.45%)	24/49 (48.98%)
Thrombocytopenia ^{* 1}			
# participants affected / at risk	2/45 (4.44%)	4/47 (8.51%)	4/49 (8.16%)
Neutropenia ^{* 1}			
# participants affected / at risk	2/45 (4.44%)	1/47 (2.13%)	3/49 (6.12%)

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Data Elements Overall Adverse Event Module

- Time Frame
- Additional Description (about adverse event data collection)
- Source Vocabulary Name (e.g., MedDRA 8.0)
- Assessment Type
 - Systematic or Non-Systematic

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Data Elements Serious Adverse Event (SAE) Table

- Arm/Group*
 - Title
 - Description
- Total Number Affected by any SAE*
- Total Number at Risk for SAE*

*Required by ClinicalTrials.gov

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Data Elements SAE Table (cont'd)

- Adverse Event Term*
 - Adverse Event Term Additional Description
 - Organ System*
 - Select from list
 - Number of Affected Participants (# with SAE)*
 - Number of Events (SAEs)
 - *If different from overall, per SAE term*
 - Number of Participants at Risk
 - Source Vocabulary Name
 - Assessment Type

*Required by ClinicalTrials.gov

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Data Elements Other Adverse Events Table

- Same data elements as SAE table plus:
 - Frequency Threshold for Reporting Other (Not Including Serious) Adverse Events*
 - Threshold must be less than or equal to 5 percent
 - Report other adverse events that exceed the specified frequency threshold (e.g., >5%) within any arm

*Required by ClinicalTrials.gov

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Basic Information Needed

Time Frame		
Additional Description		
	Arm Title*	Arm Title*
	Arm Description	Arm Description
Total # Participants with any AE*		
Total # Participants at Risk*		
Adverse Event Term*	# with event/# at risk	# with event/# at risk
- Organ System (select from list)*		

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PRS: Edit Adverse Event Table Defaults

Edit Adverse Event Table Defaults	
	Help Definitions
Time Frame for Adverse Event Reporting:	<p>Please provide description of period in which adverse event data were collected (e.g., 1 year, 6 months)</p> <p>Characters remaining: 158</p> <p>Reported Adverse Events (AEs) include events starting on or after Day 0 and on or before Day 100.</p>
Additional Description:	<p>Characters remaining: 133</p> <p>If a subject experienced more than 1 of a given AE, the subjects is counted only once for that AE. If a subject experienced more than one AE in a system organ class (SOC), the subject is counted only once in that SOC.</p>
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PRS: Edit Adverse Event Table Defaults (cont'd)

Source Vocabulary Name for Table Default:	<p>Please enter the name and version of the source vocabulary, if any, for adverse event terms. Source Vocabulary will be applied to all adverse event terms entered in the "Serious" and "Other" adverse event tables, unless otherwise specified. (e.g., SNOMED CT, MedDRA 10.0)</p> <p>MedDRA (8.0)</p>
Assessment Type for Table Default:	<p>Assessment type will be applied to all adverse event terms entered in the "Serious" and "Other" adverse event tables, unless otherwise specified.</p> <p>If systematic, provide explanation of the method in Additional Description.</p> <p>Non-systematic Assessment ▼</p>
<p>Save Cancel</p>	
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PRS: Edit Serious Adverse Event Total

Edit Serious Adverse Event Total

[Help](#) [Definitions](#)

Serious Adverse Event(s)	AmphoB standard	AmphoB+Fluc400	AmphoB + Fluc800
* Total Number Affected:	22 participants	17 participants	26 participants
* Total Number At Risk:	45 participants	47 participants	49 participants

Tip: The Total Number of Participants at Risk is typically equal to the Number of Participants who Started the first Period in the Participant Flow. [Preview Participant Flow](#)

Save **Validate** **Cancel**

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PRS: Edit Serious Adverse Event Data

Edit Serious Adverse Event Data

Table includes 1 to 40 out of 53 total Serious Adverse Event terms

[Help](#) [Definitions](#)

Total Number of Participants Affected/At Risk:	AmphoB standard	AmphoB+Fluc400	AmphoB + Fluc800
	22 / 45	17 / 47	26 / 49
Edit Sepsis Infections and inf... MedDRA 8.0 Non-systematic Ass... × Delete	* Affected / At Risk: 4 / 45 Edit Number of Events: <input type="text"/>	3 / 47 Edit <input type="text"/>	0 / 49 Edit <input type="text"/>
Edit Meningitis cryptococcal Infections and inf... MedDRA 8.0 Non-systematic Ass... × Delete	2 / 45 Edit <input type="text"/>	1 / 47 Edit <input type="text"/>	1 / 49 Edit <input type="text"/>

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General Review Criteria

- Abbreviations are expanded first time used
- No spelling errors exist
- Arms/Groups
 - Informative Titles (“Arm/Group,” “Period,” “Milestone”)
 - Arm/Group Descriptions are descriptive; contain information about the interventions administered (e.g., dosage, dosage form, frequency of administration) or groups evaluated
- Information is consistent with other sections of record (or discrepancies explained)
- No written results or conclusions

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Specific Review Criteria

- Time Frame
 - If provided, is specific and understandable
- Additional Description
 - If provided, content is relevant to data element
- Number of Participants at Risk
 - Matches number STARTED or other row (Milestone) in Participant Flow module (or discrepancy is explained in Additional Description)

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PRS Review

Adverse Events

Time Frame	Reported Adverse Events (AEs) include events starting on or after Day 0 and on or before Day 100.		
Additional Description	If a subject experienced more than 1 of a given AE, the subjects is counted only once for that AE. If a subject experienced more than one AE in a system organ class (SOC), the subject is counted only once in that SOC.		
Source Vocabulary Name	MedDRA (8.0)		
Assessment Type	Non-systematic Assessment		
Arm/Group Title	AmphoB Standard	AmphoB+Fluc400	AmphoB + Fluc800
▼ Arm/Group Description	Amphotericin B 0.7 mg/kg for 14 day followed by fluconazole 400 mg daily for 8 weeks. For subjects in the standard therapy arm whose Amphotericin B dose is continued beyond 14 days, fluconazole initiation will be delayed.	Amphotericin B 0.7 mg/kg and the randomized dose of fluconazole at 400 mg/day for the first 14 days, then the randomized dose of fluconazole at 400 mg/day respectively for an additional 8 weeks.	Amphotericin B 0.7 mg/kg and the randomized dose of fluconazole at 800 mg/day for the first 14 days, then the randomized dose of fluconazole at 800 mg/day respectively for an additional 8 weeks.

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PRS Review (cont'd)

▼ Serious Adverse Events

	AmphoB Standard	AmphoB+Fluc400	AmphoB + Fluc800
	Affected / at Risk (%)	Affected / at Risk (%)	Affected / at Risk (%)
Total	22/45 (48.89%)	17/47 (36.17%)	26/49 (53.06%)
Infections ... Sepsis * A	4/45 (8.89%)	3/47 (6.38%)	0/49 (0%)
Infections ... Meningitis * A	2/45 (4.44%)	1/47 (2.13%)	1/49 (2.04%)
Infections ... cryptococcal * A			
Infections ... Pneumocystis * B	1/45 (2.22%)	2/47 (4.26%)	1/49 (2.04%)
Infections ... jiroveci pneumonia * B			
Infections ... Sinusitis * B	0/45 (0%)	0/47 (0%)	2/49 (4.08%)
Infections ... AIDS related complication * B	0/45 (0%)	0/47 (0%)	1/49 (2.04%)

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Review (cont'd)

Recruitment Details: Subjects were screened and enrolled at 10 sites in the US and 5 sites in Thailand.

Pre-Assignment Details:

Arm/Group Title	AmphoB Standard	AmphoB+Fluc400	AmphoB + Fluc800	Total (Not public)
► Arm/Group Description	Amphotericin B 0.7 mg/kg for 14 day...	Amphotericin B 0.7 mg/kg and the ra...	Amphotericin B 0.7 mg/kg and the ra...	
Period Title: Overall Study				
Started	47 ^[1]	48 ^[2]	48 ^[3]	143
Completed	36	33	31	100
Not Completed	11	15	17	43

^[1] 47 subjects randomized; 45 subjects treated

^[2] 48 subjects randomized; 47 subjects treated-2 subjects randomized to AmphoB rec'd AmphoB+Fluc400

^[3] 48 subjects randomized; 49 treated-3 subjects randomized to AmphoB+Fluc400 rec'd AmphoB+Fluc800

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Example – Error

Overall Study

	AllergyRid at Once	AllergyRid Spread
STARTED	182	183
COMPLETED	175	176
Not Completed	7	7

Time Frame	
Additional Description	

Serious Adverse Events

	AllergyRid at Once	AllergyRid Spread
Total # participants affected/at risk	0/0	0/0

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Example – Corrected

Overall Study

	AllergyRid at Once	AllergyRid Spread
STARTED	182	183
COMPLETED	175	176
Not Completed	7	7

Time Frame	
Additional Description	Adverse events were not collected in this study

Serious Adverse Events

	AllergyRid at Once	AllergyRid Spread
Total # participants affected/at risk	0/0	0/0

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Example – Error

1. Primary Outcome Measure

Measure Title	Number of Participants Reporting Serious Adverse Events (SAE)
Measure Description	An SAE is any untoward medical occurrence that: results in death, is life-threatening, requires hospitalization, results in disability/incapacity, is a congenital anomaly/birth defect in the offspring of a study subject, or may evolve into one of the outcomes listed above.
Time Frame	Months 138, 150, 162, 174, and 186 after Day 0

Measured Values

	α -Strain Vaccine
Number of Participants Analyzed	130
Number of Participants Reporting Serious Adverse Events [units: participants]	4

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Example – Error

Time Frame	
Additional Description	

Serious Adverse Events

	α -Strain Vaccine
Total # participants affected/at risk	6/135 (4.44%)
Cardiac disorders	
Acute myocardial infarction	1/135 (0.74%)
Vascular disorders	
Hypertension	1/135 (0.74%)
General disorders	
Pyrexia	4/135 (2.96%)
Renal and urinary disorders	
Urinary tract infection	2/135 (1.48%)
Vesicoureteric reflux

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Additional Information

General ClinicalTrials.gov information:

<http://clinicaltrials.gov>

FDAAA-related information (see Submit Studies):

<http://clinicaltrials.gov/manage-recs/fdaaa>

Office of Extramural Research:

http://grants.nih.gov/Clinicaltrials_fdaaa/

Questions?

register@clinicaltrials.gov