

I. Introduction

Participants in ARIC Sleep-PET who agree to the optional actigraphy component will be asked to enter information in the Sleep Diary (SDY) twice a day on each day that they are wearing the Actigraph Link device. The Sleep Diary helps us identify when participants are in bed with the intention of sleeping. This is very important because it helps us process the actigraphy data we collect.

This document describes how to go over the Sleep Diary instructions with participants to obtain the best possible data. A large portion of the sleep diary will be completed by the participant at home, but ARIC staff must complete some of the information in the diary in ink before giving it to participants. After these initial fields are filled out by staff, the remainder of the Sleep Diary will be completed by the participant, and then returned with the Actigraph.

Please note: A separate sleep diary (SDY) form will be filled out for each one-week period during which the Actigraph is worn for each participant; therefore, a total of up to three sleep diaries may be collected on a given participant.

II. Detailed Instructions

- A. Confirm with participant that they are able to begin actigraphy that day and complete seven 24-hour periods.
- B. Write participant ID on the top of every page of the sleep diary.
- C. Page 1
 - 1. Staff should review all actigraphy instructions on p. 1 with participant.
 - 2. Staff should write in the date and time the participant will remove the actigraph in the format MM/DD/YYYY. This must be seven 24-hour periods after the time of day it was put on, to ensure seven 24 hour days.

For example, if the device is applied to the wrist on October 2nd at 5:00pm, then the watch should be removed October 9th after 5:00pm.

- D. Page 2
 - 1. Staff should write down the date the participant put on the actigraph in the format MM/DD/YYYY.
 - 2. Staff should write down time the participant put on the actigraph in AM/PM format, and circle AM or PM.

E. Day 0-Day 7

1. Staff should complete the header for each day of the diary by writing the date that corresponds to the day of actigraphy.

2. Day 0= Day the participant starts wearing the actigraph

Instruct participant to fill the diary for that day out before bed, indicating if naps were taken or if the actigraph was removed and if so, what time(s). If the actigraph was removed, they should indicate a reason for removal.

3. Day 1-7 Morning Diary

The morning diary is filled out by the participant in the morning, to answer questions about the night before and that morning.

- a. Q1: Instruct participant to write what time they got into bed in AM/PM format (as opposed to military time), and circle AM or PM.
- b. Q2: Instruct participant to write what time they intended to go to sleep ("lights out") in AM/PM format, and circle AM or PM. This time may differ or be the same as Q1, depending on if they go right to sleep when they get in bed or stay up reading, watching TV, etc. in bed.
- c. Q3: Instruct the participant to write what time they started their day that morning, and were no longer trying to sleep in the morning.
- F. Day 1-6 Bedtime Diary

The bedtime diary is filled out by the participant at night before bed. It asks them to indicate if they may have taken naps or removed the actigraph that day, and the time(s) these things occurred in AM/PM format. If the actigraph was removed, they should indicate a reason for removal.

- G. Day 7
 - 1. Actigraph Removal: Staff should instruct the participant to write the time they removed the actigraph on the final day.
 - 2. The participant should circle NO or YES to indicate if they were away from their normal sleeping environment any of the nights they wore the actigraph. If they indicate yes, they need to write which night(s) this was true.
 - 3. The participant should circle NO or YES to indicate if there were any events that disrupted their usual sleep habits any of the nights they wore the actigraph. If they indicate yes, they need to write which night(s) this was true.
 - 4. The participant should circle NO or YES to indicate if they traveled between time zones while wearing the actigraph. If they indicate yes, they need to provide details of locations and dates/time of travel.