ELEMENT Data Dictionary

****Abbreviated Adolescent Sleep Diary Data

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**Background**

This document is a data dictionary for Adolescent Sleep Diary Data.

Variables come from the document “FL\_Sueño\_etiquetado\_T2” and from variables created to study naps and technology and sleep disturbances. The data is from the second time point in Element 2017 T2.

**ELEMENT**

**T**he **E**arly **L**ife **E**xposures in **M**exico to **EN**vironmental **T**oxicants (ELEMENT) cohort includes three birth cohorts from Mexico City maternity hospitals that have been followed for over two decades to learn how environmental exposures to metals and chemicals affect pregnant women and children

*STUDY IDENTIFIERS*

**Study identifiers**

Study identifiers are standardized across ELEMENT data sources to enable linking of data from different sources

|  |  |  |
| --- | --- | --- |
| Variable | Variable Label | Details |
| **Proyecto** | Cohort ID | ID assigned to each mother-child dyad to identify specific cohort of origin |
| **Folio** | Subject ID within cohort | Unique ID assigned to each mother-child dyad within each cohort Should always be combined with PROYECTO to identify unique dyads |
| **Foliocc** | Unique id from | Assigned from cholesterol visit and after |

*Sleep Diary Data*

**Sleep Diary Data**

Database ID for source: ***???***

**Description**

Adolescents were asked to fill out a sleep diary questionnaire for 1 week. The adolescents did not all fill out the questionnaire in the same week as each other. The majority of variables were filled out 7 times, one time per each day of the week.

The first section of variables was part of the questionnaire. The second section of variables includes variables created by Kirstyn Taylor and Erica Fossee in summer 2019.

The symbol “#” represents the day the question was filled out for. Day # can represent day 1- day 7.

***Sleep Diary Data***

|  |  |  |
| --- | --- | --- |
| Variable | Variable Label | Details |

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| --- | --- | --- |
| f\_dia | The day the adolescent received the questionnaire | D/M/Y |
| f\_mesa | The month in which the adolescent received the questionnaire on a specific day | D/M/Y |
| f\_anio | The year in which the adolescent received the questionnaire on a specific day | D/M/Y |
| folio | The unique number used to identify each adolescent |  |
| etapa | The stage in which the questionnaire was conducted and the data collected |  |

|  |  |  |
| --- | --- | --- |
| dd# | Day of the day of recorded response | # represents number (1-7) to correspond to day 1, day 2… |
| mm# | Month of the day of recorded response | # represents number (1-7) to correspond to day 1, day 2… |
| aa# | Year of the day of recorded response | # represents number (1-7) to correspond to day 1, day 2… |
| p10d# | The hour of when adolescent went to bed on day # | # represents number (1-7) to correspond to day 1, day 2… |
| p10d#a | Indicates if the time the adolescent went to bed was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2… |
| p10d#\_24 | The time the adolescent went to bed in a 24-hour format on day # | # represents number (1-7) to correspond to day 1, day 2… |
| p15d# | The hour of the time adolescent woke up on day # | # represents number (1-7) to correspond to day 1, day 2… |
| p15d#a | Indicates if the time the adolescent woke up was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2… |
| p15d#\_24 | The time adolescent woke up on day # in a 24-hour format | # represents number (1-7) to correspond to day 1, day 2… |
| p3\_d# | Perceived sleep duration reported by the adolescent on day # | 1-much less than normal  2-less than normal  3-normal  4-more than normal  5-much more than normal  # represents number (1-7) to correspond to day 1, day 2… |
| p3a\_d# | Perceived sleep quality reported by the adolescent on day # | 1-very bad  2-bad  3-somewhat bad  4-somewhat good  5-good  6-very good  # represents number (1-7) to correspond to day 1, day 2… |
| p3b\_d# | Reported sleep disturbances by adolescent on day # | 0- missing value  1- mental distress  2- restless  3- insomnia  4-Light  5- temperature  6- noise  7- other human  8- animals  9- work/school  10- illness/injury  11- nightmares  12- technology/ electronics  13- bathroom  14- other  # represents number (1-7) to correspond to day 1, day 2… |

|  |  |  |
| --- | --- | --- |
| p4\_d# | Day # response to whether or not the adolescent woke up during the night | 1-Yes  2-No  # represents number (1-7) to correspond to day 1, day 2… |

|  |  |  |
| --- | --- | --- |
| p5\_d# | Day # response to if the adolescent had a hard time sleeping | 1- No, or very little  2- A little bit  3- Much  4- Very much  # represents number (1-7) to correspond to day 1, day 2… |
| p6a\_d#a | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6a\_d#b | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6a\_d#c | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6a\_d#d | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6a\_d#e | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6a\_d#f | One of the types of device used by the adolescent in the hour before going to sleep on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#a | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#b | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#c | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#d | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#e | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6b\_d#f | One of the types of device that was in the same room as the adolescent while they were sleeping on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6c\_d# | Response to if the adolescent used any of the devices in the middle of the night on day # | 1- Yes  2- No  # represents number (1-7) to correspond to day 1, day 2… |
| p6d\_d# | The type of device, if any, the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2… |
| p6e\_d# | Response to if anyone in the same room as the adolescent used any of the devices in the middle of the night on day # | 1- Yes  2- No  # represents number (1-7) to correspond to day 1, day 2… |
| p6f\_d#a | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6f\_d#b | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6f\_d#c | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6f\_d#d | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6f\_d#e | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p6f\_d#f | One of the devices, if any, that someone in the same room as the adolescent used in the middle of the night on day # | 1- Computer  2- Cell phone  3- Music player  4- Tablet  5- Video games  6- Television  7- Other  8- Nothing  # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p7\_id#a | Hour in 12-hour format of nap start time on day # for nap 1 | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per evening, so it has a letter to denote if it is the 2nd, 3rd… measurement of the evening |
| p7\_id#ah | Indicates if the time the nap started was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#a\_24 | Nap start time (both hours and minutes) in 24-hour format on day # for nap 1 | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#a | Hour of nap end time in 12-hour format for day # for nap 1 | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#ah | Indicates if the time the nap ended was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#a\_24 | Nap end time (both hours and minutes) in a 24 hour format on day # for first nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#b | Hour in 12-hour format of nap start time on day # for second nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#bh | Indicates if the time the nap started was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#b\_24 | Nap start time (both hours and minutes) in 24-hour format on day # for second nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#b | Hour of nap end time in 12-hour format for day # for second nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#bh | Indicates if the time the nap ended was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#b\_24 | Nap end time (both hours and minutes) in a 24 hour format for second nap on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#c | Hour in 12-hour format of nap start time on day # for third nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#ch | Indicates if the time the nap started was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_id#c\_24 | Nap start time (both hours and minutes) in 24-hour format on day # for third nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#c | Hour of nap end time in 12-hour format for day # for third nap | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#ch | Indicates if the time nap ended was during the P.M. or A.M. on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| p7\_fd#c\_24 | Nap end time (both hours and minutes) in a 24 hour format for third nap on day # | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| START OF CREATED VARIABLES | | |
| sleep\_qual\_mean | The mean sleep quality over the course of 7 days for one foliocc |  |
| num\_days\_stress | The total number of days stress was reported as a sleep disturbance for one foliocc |  |
| any\_stress | Indicates whether individual reported any stress at least once as a sleep disturbance over the course of 7 days | 0= no stress reported  1=stress reported |
| napdur# | The nap duration for the first nap taken on day # | # represents number (1-7) to correspond to day 1, day 2… |
| napdur#b | The nap duration for the second nap taken on day #, if one were taken | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| napdur#c | The nap duration for the third nap taken on day #, if one were taken | # represents number (1-7) to correspond to day 1, day 2…  The variable is measured multiple times per day, so it has a letter to denote if it is the 2nd, 3rd… measurement of the day |
| napdur\_mean | The mean nap duration as the average of all naps taken in one week by one individual |  |
| took\_any\_nap | Indicates whether the individual took any naps over the course of one week | 0= no naps taken  1=at least one nap taken |
| before5\_# | The number of naps taken before 5:00 pm by an individual on day # | # represents number (1-7) to correspond to day 1, day 2… |
| before5\_num | The total number of naps taken before 5:00 pm by an individual over the course of one week |  |
| after5\_# | The number of naps taken after 5:00 p m by an individual on day # | # represents number (1-7) to correspond to day 1, day 2… |
| after5\_num | The total number of naps taken after 5:00 p m by an individual over the course of one week |  |
| num\_days\_with\_nap | The total number of days an individual took at least one nap over the course of one week |  |
| time\_bed# | The sleep duration (hrs) for night # of an individual | # represents number (1-7) to correspond to day 1, day 2… |
| sleepdur\_mean | The average sleep duration (hrs) over the course of one week of an individual |  |
| DaysUsed\_gen | The number of days in 1 week that the adolescent used any kind of technology in the hour before bed | Min: 0 days  Max: 7 days |
| HorL\_gen | High or low use of technology in general for that week for adolescent | <4 days: Low  ≥4 days: High |
| Type | Number used to characterize the technology type of the adolescent Describes what type of technology was most commonly used that week | 0: None  1: Passive  2: Interactive |
| TypeName | The technology type name that corresponds to the variable “Type” Describes what type of technology was most commonly used that week | None: no technology used  Passive: television, music player  Interactive: cell phone, tablet, laptop, video game |
| DaysUsed\_type | The number of days in 1 week that the adolescent used technology that falls under their “Type” category in the hour before bed | Min: 0 days  Max: 7 days |
| HorL\_type | High or low use of technology that falls under the adolescent’s “Type” category for that week | <4 days: Low  ≥4 days: High |

|  |  |  |
| --- | --- | --- |
| TotalSleepDisturbances | The total number of reported sleep disturbances an adolescent had in 1 week | Min: 0 reports  Max: 17 reports |
| HorL\_SleepDisturbances | High or low prevalence of sleep disturbances in 1 week for adolescent | Low: <4 reports  High: ≥4 reports |
| TotalMentalDistress\_SD | The total number of reported sleep disturbances of specifically mental distress an adolescent had in 1 week | Min: 0 reports  Max: 7 reports |
| HorL\_MentalDistress | High or low prevalence of mental distress sleep disturbances in 1 week for adolescent | Low: <4 reports  High: ≥4 reports |
| HTS\_week | Adolescent reported having a hard time falling asleep 3 or more days over the course of one week | 0: No  1: Yes |
| SD\_week | Adolescent reported having sleep difficulties on 3 or more days over the course of one week | 0: No  1: Yes |
| Mental | Total number of mental-related sleep difficulties an adolescent reported over the course of one week | Range |
| Insomnia | Total number of insomnia-related sleep difficulties an adolescent reported over the course of one week | Range |
| Environmental | Total number of environmental-related sleep difficulties an adolescent reported over the course of one week | Range |
| Illness | Total number of illness-related sleep difficulties an adolescent reported over the course of one week | Range |
| Tech | Total number of tech-related sleep difficulties an adolescent reported over the course of one week | Range |
| Mental\_difficulty | Adolescent reported at least 1 mental-related sleep difficulty over the course of one week | 0: No  1: Yes |
| Insomnia\_difficulty | Adolescent reported at least 1 insomnia-related sleep difficulty over the course of one week | 0: No  1: Yes |
| Environmental\_difficulty | Adolescent reported at least 1 environmental-related sleep difficulty over the course of one week | 0: No  1: Yes |
| Illness\_difficulty | Adolescent reported at least 1 illness-related sleep difficulty over the course of one week | 0: No  1: Yes |
| Tech\_difficulty | Adolescent reported at least 1 technology-related sleep difficulty over the course of one week | 0: No  1: Yes |