BURKINA FASO - Nanoro HDSS INDEPTH Core Dataset 2009-2015 (Released 2019)

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Visit our data catalog at: http://www.indepth-ishare.org/index.php

Overview

Identification

ID NUMBER
INDEPTH.BF021.CMD2015.v1

Version

VERSION DESCRIPTION
BF021.CMD2015.v1: Edited dataset for public distribution

PRODUCTION DATE
2019-06-26

Overview

ABSTRACT
The Nanoro Health and Demographic Surveillance System (HDSS) was established in 2009 by the Clinical Research Unit of Nanoro – Institut de Recherche en Sciences de la Santé (IRSS-CRUN) with the aim of providing a core framework for clinical trials and also to support the Burkina Faso health authorities in generating epidemiological data that can contribute to the setup and assessment of health interventions. This is achieved by providing an excellent platform for generating epidemiological data fully compliant with international standards. The site activities are currently oriented towards the research (drugs and vaccines) on diseases of public health importance with a specific focus on malaria.

Nanoro is a rural area located in the Centre-West of the country, at approximately 85 Km from the capital city, Ouagadougou. The HDSS area lies between longitudes 1°92537 and 2°3146 W and latitudes 12°57955 and 12°72863 N and covers 24 villages which represents a surface of 594.3 Km2 (~36% of the Nanoro Health District area). In this area, health care is provided by seven peripheral health posts and one referral hospital. Nanaro HDSS is in the Sudano–Sahelian climate which has two main seasons: a rainy season from June to October (average rainfall of 450–700 mm/year, average temperature >30ºC) followed by a dry season from November to May (the temperature may vary from 17ºC in December to a maximum of 43ºC in April).

The population under surveillance is about 63 395 residents (in 2011) with a majority of illiterate people. They are subsistence farmers, cattle-keepers and housewives. The main ethnic groups are Mossi, Gourounsi and Fulani.

KIND OF DATA
Event history data

UNITS OF ANALYSIS
Individual

Scope

NOTES
The scope of the Survey includes:

- HOUSEHOLD: Household characteristics, household listing,maternal mortality

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- WOMEN: Women's characteristics, child mortality

- CHILDREN: Children's characteristics, birth registration

TOPICS

Topic	Vocabulary	URI
Demography [N01.224]	MeSH	http://www.ncbi.nlm.nih.gov/mesh
Emigration and Immigration [N01.224.625.350]	MeSH	http://www.ncbi.nlm.nih.gov/mesh
Mortality [N01.224.935.698]	MeSH	http://www.ncbi.nlm.nih.gov/mesh
Birth Rate [N01.224.935.849.500]	MeSH	http://www.ncbi.nlm.nih.gov/mesh

KEYWORDS

Fertility, Mortality, Migration, Population

Coverage

GEOGRAPHIC COVERAGE

Nanoro is a rural area located in the Centre-West of the country, at approximately 85 Km from the capital city, Ouagadougou. The HDSS area lies between longitudes 1°92537 and 2°3146 W and latitudes 12°57955 and 12°72863 N and covers 24 villages which represents a surface of 594.3 Km2 (~36% of the Nanoro Health District area). In this area, health care is provided by seven peripheral health posts and one referral hospital.

UNIVERSE

All individual resident in the HDSS

Producers and Sponsors

PRIMARY INVESTIGATOR(S)

Name	Affiliation
TINTO Halidou	IRSS- CRUN
DERRA Karim	IRSS - CRUN

OTHER PRODUCER(S)

Name	Affiliation	Role
KAZIENGA Adama		Data Manager upto December 2015
HIEN S. Franck	CRUN	Data Manager from April 2016
VALEA Innocent	IRSS - CRUN	Quality Manager
TAHITA Marc	IRSS - CRUN	Head of Laboratory
ROUAMBA Eli	CRUN	Geographer
HIEN S. Franck	CRUN	Data Manager

FUNDING

Name	Abbreviation	Role
Malaria Clinical Trials Alliance	MCTA	
Malaria Vaccine Initiative	MVI	
European and Developing Clinical Trial Partnership	EDCTP	
European Union	FP(7)	

Name	Abbreviation	Role
MALARIA IN PREGNANCY CONSORTIUM (GATES FONDATION)	MiP Consortium	
National Institute of Health	NIH	
WHO/TROPICAL DISEASE RESEARCH	WHO/TDR	
BELGIUM CORPORATION (FRAMEWORK AGREEMENT 3 WITH ITM ANTWERP,BELGIUM)	BC	
PHARMACEUTICAL COMPANIES (GSK, SANOFI AVENTIS, SIGMA TAU, NOVARTIS)		
INDEPTH NETWORK		

OTHER ACKNOWLEDGEMENTS

Name	Affiliation	Role
Field Team	CRUN	
Data Clerks	CRUN	
Nanoro Community and their Chiefs		
Nanoro Health District and Adminatratrive Autorities		
Institute of Tropical Medecine, Belgium	ITM - Antwerp	

Metadata Production

METADATA PRODUCED BY

Name	Abbreviation	Affiliation	Role
iSHARE2 Technical Team	iS2TT	INDEPTH Network	Documentation of the study
INDEPTH Network	int.indepth	INDEPTH Network	agency
Nanoro HDSS	NHDSS	IRSS	agency
Karim Derra	KD	IRSS - CRUN	DDI Author
Franck HIEN	FH	IRSS - CRUN	DDI Author

DATE OF METADATA PRODUCTION
2019-06-26

DDI DOCUMENT VERSION
DDI.INDEPTH.BF021.CMD2015.v1: 2019-06-26

DDI DOCUMENT ID
DDI.INDEPTH.BF021.CMD2015.v1

Sampling

Sampling Procedure

No sampling is done

Deviations from Sample Design

Not Applicable

Response Rate

No refusals

Weighting

Not Applicable

Questionnaires

Overview

The questionnaires are designed by the Demographer in collaboration with the other member of the HDSS team. It's contains the household questionnaire, the compound questionnaire and all the events forms needed for the data capture concerning the events (marriage, pregnancy, birth, in/out-migration,death, verbal autopsy…)which must be registered during the round. After the validation of the questionnaires, the data management team make the copy of each questionnaire for the field team. Then, they print the household register by cluster for the field teambefore starting the next round.The data are collected by FW and controlled by FS.

Data Collection

Data Collection Dates

Start	End	Cycle
2009-03-19	2015-12-31	Release Coverage

Time Periods

Start	End	Cycle
2009-03-19		0
2009-08-31		1
2010-01-01		2
2010-05-01		3
2010-09-01		4
2011-01-01		5
2011-05-01		6
2011-09-20		7
2012-01-01		8
2012-09-14		9
2013-05-27	2013-10-10	11
2016-06-16	2016-06-16	14

Data Collection Mode

Proxy Respondent [proxy]

Data Collection Notes

Nanoro HDSS use paper based collection during the initial census and the fourteen rounds. The site moved to electronic data collection in 2015 by using OpenHDS mobile. The field team is composed by a Demographer, a Geographer, Field Supervisors (FS),Field workers (FW), and Community key informants. The Demographic Surveillance area is divided into four part belong to each FS with two or three FW in his charge. All the compounds in the HDSS area were geolocated (with GPS hand) and numbered with an unique ID code. These data were entered into a geographic information system (GIS) database.

During data capture, if some inconsistency checks is found, the queries are send back to the FS. The FS with his FW team will correct the queries and then send back the responses to the data entry team.

Questionnaires

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Data Collectors

Name	Abbreviation	Affiliation
Coordinators		CRUN
Field Supervisors		CRUN

Name	Abbreviation	Affiliation
Field Workers		CRUN
Community Key Informants		CRUN

Supervision

The FS visit is done in order to ensure the quality of data collectedby the FW. For that, they select a sample of household and make his own update and then compare to the update of these household by the FW. During avisit, the FS listens and observes as the FW conducts the interviews without interrupting. The FS uses a checklist to write observations and comments for feedback and further training.

After data collection and before data entry, the FS checks questionnaires for completeness, consistency and accuracy. If a questionnaire failed to meet the quality standard requirements, the FS send back the questionnaires to the FW for correction on the field. After these corrections the FS send the household register to the field coordinator who make a checks on the questionnaire before sending to the data entry team.

Data Processing

Data Editing

The forms are controlled by supervisor before moving for data entry

Data Appraisal

Other forms of Data Appraisal

CentreId MetricTable QMetric Illegal Legal Total Metric RunDate

BF021 MicroDataCleaned Starts 104704 2019-06-26 12:40
BF021 MicroDataCleaned Transitions 0 259398 259398 0. 2019-06-26 12:40
BF021 MicroDataCleaned Ends 104704 2019-06-26 12:40
BF021 MicroDataCleaned SexValues 4 259394 259398 0. 2019-06-26 12:40
BF021 MicroDataCleaned DoBValues 259398 2019-06-26 12:40

File Description

Variable List

BF021.CMD2015.v1

Content	Event History Data
Cases	279506
Variable(s)	14
Structure	Type: Keys: ()
Version	BF021.CMD2015.v1
Producer	Nanoro HDSS
Missing Data	

Variables

ID	Name	Label	Type	Format	Question
V1	RecNr	RecNr	contin	numeric	
V2	CountryId	CountryId	discrete	numeric	
V3	CentreId	CentreId	discrete	character	
V4	IndividualId	IndividualId	contin	numeric	
V5	Sex	Sex	discrete	numeric	
V6	DoB	DoB	discrete	character	
V7	EventCount	EventCount	discrete	numeric	
V8	EventNr	EventNr	discrete	numeric	
V9	EventCode	EventCode	discrete	character	
V10	EventDate	EventDate	discrete	character	
V11	ObservationDate	ObservationDate	discrete	character	
V12	LocationId	LocationId	contin	numeric	
V13	MotherId	MotherId	contin	numeric	
V14	DeliveryId	DeliveryId	contin	numeric	

RecNr (RecNr)
File: BF021.CMD2015.v1

Overview

Type: Continuous
Format: numeric
Decimals: 0
Range: 1-237870

Valid cases: 279506
Invalid: 0
Minimum: 1
Maximum: 279506
Mean: 139753.5
Standard deviation: 80686.6

Description

A sequential number uniquely identifying each record in the data file

CountryId (CountryId)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: numeric
Decimals: 0
Range: 231-231

Valid cases: 279506
Invalid: 0

Description

ISO 3166-1 numeric code of the country where the surveillance site is situated

CentreId (CentreId)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: character
Width: 5

Valid cases: 279506
Invalid: 0

Description

An identifier issued by INDEPTH to each member centre of the format CCNNS, Where CCNNS is the INDEPTH Member site code, constructed as follows:- CC the ISO 3166-1 alpha-2 code of the country where the site is situated- NN is a sequential number uniquely identifying an INDEPTH member centre within the country. Starting with 01 to 99, for a maximum of 99 centres per country-S is a sequential character uniquely identifying the geographical surveillance site. Starting with 1 to 9, thereafter A to Z, for a maximum of 35 sites per centre

IndividualId (IndividualId)
File: BF021.CMD2015.v1

Overview

Type: Continuous
Format: numeric
Decimals: 0
Range: 1-94442

Valid cases: 279506
Invalid: 0
Minimum: 1
Maximum: 104738
Mean: 52400.7
Standard deviation: 30263

Description

A number uniquely identifying all the records belonging to a specific individual in the data file. This number is not the same as the identifier used by a contributing centre to be identify the individual

Sex (Sex)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: numeric
Decimals: 0
Range: 0-2

Valid cases: 279506
Invalid: 0

Description

Sex of the individual
1=Male
2=Female

DoB (DoB)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: character

Valid cases: 279506
Minimum: NaN
Maximum: NaN

Description

The date of birth of the individual Format YYYY-MM-DD

EventCount (EventCount)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: numeric
Decimals: 0
Range: 2-12

Valid cases: 279506
Invalid: 0

Description

The total number of events associated with this individual in this data set

EventNr (EventNr)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: numeric
Decimals: 0
Range: 1-12

Valid cases: 279506
Invalid: 0

Description

A number increasing from 1 to EventCount for each event record in order of event occurred

EventCode (EventCode)
File: BF021.CMD2015.v1

Overview

EventCode (EventCode)
File: BF021.CMD2015.v1

Type: Discrete
Format: character
Width: 3

Valid cases: 279506
Invalid: 0

Description

A code which identifies the type of event that has occurred

EventDate (EventDate)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: character

Valid cases: 279506
Minimum: NaN
Maximum: NaN

Description

The date on which the event occurred Format: YYYY-MM-DD

ObservationDate (ObservationDate)
File: BF021.CMD2015.v1

Overview

Type: Discrete
Format: character

Valid cases: 279391
Minimum: NaN
Maximum: NaN

Description

Date on which the event was observed (recorded), also known as surveillance visit date Format YYYY-MM-DD

LocationId (LocationId)
File: BF021.CMD2015.v1

Overview

Type: Continuous
Format: numeric
Decimals: 0
Range: 1-5474

Valid cases: 279506
Invalid: 0
Minimum: 1
Maximum: 6093
Mean: 3035.1
Standard deviation: 1753

Description

Unique identifier associated with a residence unit within the site and is the location where the individual was or became resident, when the event occurred. this identifier is not the same as the identifier used internally by the contributing centre

MotherId (MotherId)
File: BF021.CMD2015.v1

Overview

MotherId (MotherId)
File: BF021.CMD2015.v1

Type: Continuous
Format: numeric
Decimals: 0
Range: 3-94441

Valid cases: 25970
Invalid: 253536
Minimum: 2
Maximum: 104733
Mean: 52329.2
Standard deviation: 30418.9

Description

The individual of the mother, only provided for BTH events

DeliveryId (DeliveryId)
File: BF021.CMD2015.v1

Overview

Type: Continuous
Format: numeric
Decimals: 0
Range: 1-12246

Valid cases: 25970
Invalid: 253536
Minimum: 1
Maximum: 16256
Mean: 7543.8
Standard deviation: 4517

Description

The RecNr of the delivery event associated with this birth