Health & Care Information Model:

nl.nfu.BloodPressure-v1.2

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Content

1. nl.nfu.BloodPressure-v1.2

DCM::CoderList	Kerngroep Registratie aan de Bron
DCM::ContactInformation.Address	*
DCM::ContactInformation.Name	*
DCM::ContactInformation.Telecom	*
DCM::ContentAuthorList	Projectgroep Generieke Overdrachtsgegevens & Kerngroep Registratie aan de Bron
DCM::CreationDate	29-11-2012
DCM::DeprecatedDate	
DCM::DescriptionLanguage	nl
DCM::EndorsingAuthority.Address	
DCM::EndorsingAuthority.Name	NFU
DCM::EndorsingAuthority.Telecom	
DCM::Id	2.16.840.1.113883.2.4.3.11.60.40.3.12.4
DCM::KeywordList	bloeddruk, diastolische bloeddruk, systolische bloeddruk, tensie
DCM::LifecycleStatus	Final
DCM::ModelerList	Kerngroep Registratie aan de Bron
DCM::Name	nl.nfu.Bloeddruk
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HCIM::PublicationLanguage	EN

1.1 Revision History

Publicatieversie 1.0 (15-02-2013)

Publicatieversie 1.1 (01-07-2013)

Publicatieversie 1.2 (01-04-2015)
Bevat: ZIB-135, ZIB-136, ZIB-137, ZIB-148, ZIB-169, ZIB-218, ZIB-219, ZIB-220, ZIB-308, ZIB-315, ZIB-362, ZIB-363.

Incl. algemene wijzigingsverzoeken:
ZIB-94, ZIB-154, ZIB-200, ZIB-201, ZIB-309, ZIB-324, ZIB-326.

1.2 Concept

The blood pressure is a parameter for determining the condition of the blood circulation and is expressed in systolic and diastolic pressure in mmHg.

1.3 Mindmap

1.4 Purpose

Blood pressure is measured to gain an indication of the health condition of the patient's cardiovascular

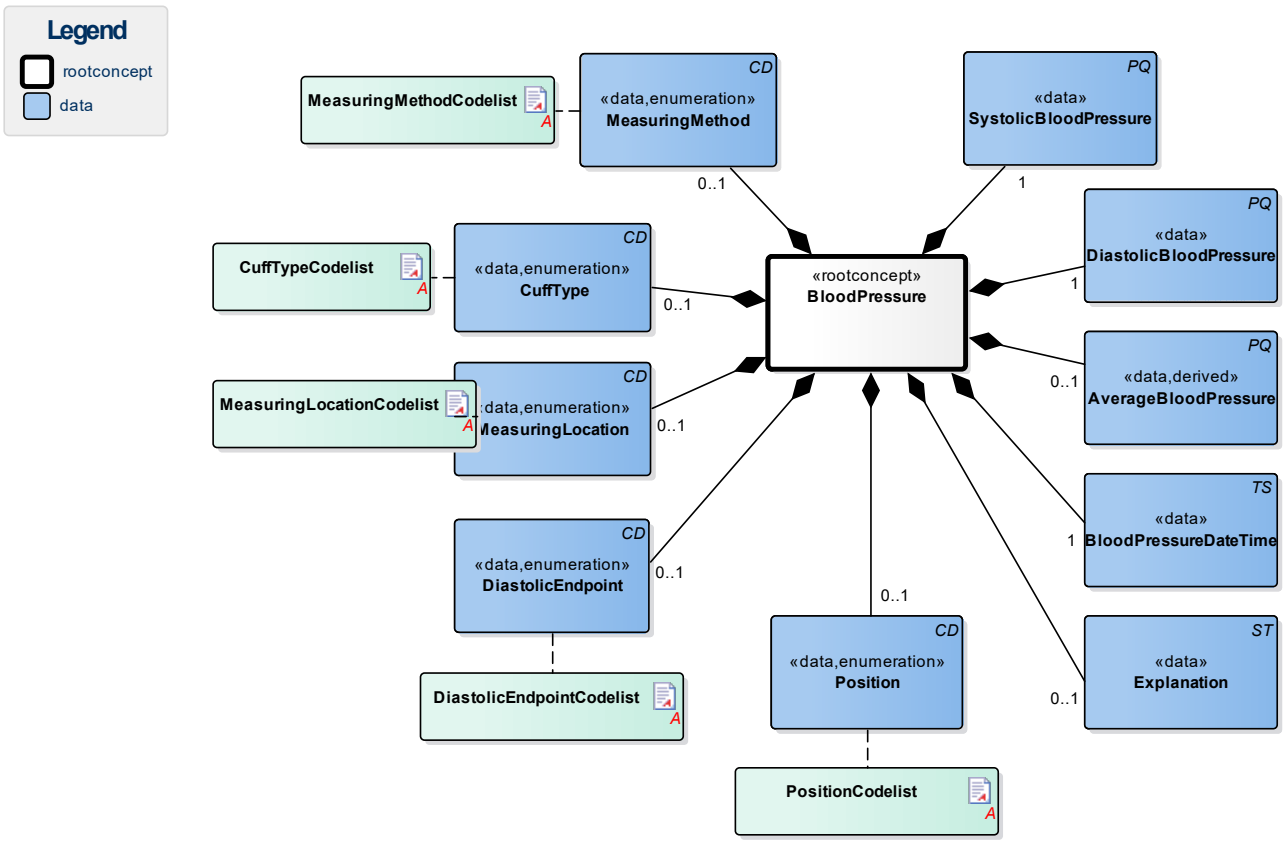
system.

1.5 Patient Population

1.6 Evidence Base

The local measurement of the arterial blood pressure, which acts as a surrogate for the arterial pressure in the systematic circulation. In most cases, the term ‘blood pressure' refers to the measurement of blood pressure of the arteria brachialis in the upper arm with the cuff using the Riva-Rocci method.
The protocol for this measurement comprises many details that are not general knowledge (such as the correct way to interpret Korotkoff sounds) or carried out correctly (adjusting the cuff width to a very large or small diameter of the upper arm, the right rate of descent of the mercury column, cut-off values for cardiac arrhythmias).

1.7 Information Model



«rootconcept»	BloodPressure	
Definitie	Root concept of the BloodPressure building block. This root concept contains all data elements of the BloodPressure building block.	
Datatype		
DCM::ConceptId	NL-CM:12.4.1	
DCM::DefinitionCode	SNOMED CT: 75367002 blood pressure	
Opties		

«data»	MeasuringMethod	
Definitie	The type of method used to measure blood pressure.	
Datatype	CD	
DCM::ConceptId	NL-CM:12.4.7	
DCM::ValueSet	MeasuringMethodCodelist	OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.1
Opties		

«data»	CuffType	
Definitie	The size of the cuff used in the measurement.	
Datatype	CD	
DCM::ConceptId	NL-CM:12.4.9	
DCM::DefinitionCode	SNOMED CT: 70665002 blood pressure cuff	
DCM::ValueSet	CuffTypeCodelist	OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.3
Opties		

«data»	MeasuringLocation	
Definitie	Anatomical location where the blood pressure was measured.	
Datatype	CD	
DCM::ConceptId	NL-CM:12.4.10	
DCM::ExampleValue	Bovenarm	
DCM::ValueSet	MeasuringLocationCodelist	OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.4
Opties		

«data»	DiastolicEndpoint	
Definitie	Registration of the Korotkoff sound used to measure diastolic pressure with the auscultatory method.	
Datatype	CD	
DCM::ConceptId	NL-CM:12.4.8	
DCM::DefinitionCode	SNOMED CT: 85549003 Korotkoff sound	
DCM::ValueSet	DiastolicEndpointCodelist	OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.2
Opties		

«data»	SystolicBloodPressure	
Definitie	The highest (peak) systematic arterial blood pressure - measured in the contraction stage or systole of the cardiac cycle.	
Datatype	PQ	
DCM::ConceptId	NL-CM:12.4.2	
DCM::DefinitionCode	SNOMED CT: 271649006 systolic blood pressure	
DCM::ExampleValue	155 mmHg	
Opties		

«data»	DiastolicBloodPressure

Definitie	The lowest systematic arterial blood pressure - measured in the relaxation stage or diastole of the cardiac cycle.	
Datatype	PQ	
DCM::ConceptId	NL-CM:12.4.3	
DCM::DefinitionCode	SNOMED CT: 271650006 diastolic blood pressure	
DCM::ExampleValue	70 mmHg	
Opties		

«data»	AverageBloodPressure	
Definitie	Average blood pressure during one cycle of the heart contracting and relaxing. Estimated based on systolic and diastolic blood pressure. This estimate is unreliable in cases of circulatory disorders. This value can only be reliably determined when invasive blood pressure is measured.	
Datatype	PQ	
DCM::ConceptId	NL-CM:12.4.4	
DCM::DefinitionCode	SNOMED CT: 6797001 mean arterial pressure	
Opties		

«data»	BloodPressureDateTime	
Definitie	The date and time at which these blood pressure values were measured.	
Datatype	TS	
DCM::ConceptId	NL-CM:12.4.5	
Opties		

«data»	Explanation	
Definitie	Comments on the measured blood pressure. Here, an explanation could be given, for example, of circumstances that may have influenced the patient's blood pressure, such as pain, stress, exertion and sleep/wake cycles.	
Datatype	ST	
DCM::ConceptId	NL-CM:12.4.6	
Opties		

«data»	Position	
Definitie	The position of the patient when the blood pressure was measured.	
Datatype	CD	
DCM::ConceptId	NL-CM:12.4.11	
DCM::ExampleValue	Zittend	
DCM::ValueSet	PositionCodelist	OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.5
Opties		

«document»	DiastolicEndpointCodelist	
Definitie		
Datatype		
DCM::ValueSetId	2.16.840.1.113883.2.4.3.11.60.40.2.12.4.2	

Opties	

DiastolischEindpuntCodelijst			OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.2	
Concept Name	**Concept Code**	**Coding Syst. Name**	**Coding System OID**	**Description**
Phase 4	255271000	SNOMED CT	2.16.840.1.113883.6.96	Fase IV
Phase 5	255272007	SNOMED CT	2.16.840.1.113883.6.96	Fase V

«document»	CuffTypeCodelist	
Definitie		
Datatype		
DCM::ValueSetId	2.16.840.1.113883.2.4.3.11.60.40.2.12.4.3	
Opties		

ManchetTypeCodelijst			**OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.3**	
Concept Name	**Concept Code**	**Coding Syst. Name**	**Coding System OID**	**Description**
Standaard	STD	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Standaard (Standaard manchet voor een volwassene (manchet 16x30 cm)
Groot	L	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Groot (Een manchet voor een volwassene met een armomtrek van 35 tot 44 cm (manchet 16x36 cm))
Klein	S	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Klein (Een manchet voor een volwassene met een armomtrek van 22 tot 26 cm (manchet 12x22 cm))
Extra groot	XL	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Extra groot (Een manchet voor het dijbeen of arm wanneer de armomtrek 45 tot 52 cm is (manchet 16x42 cm))
Kind	KIND	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Maat voor kind (Een manchet voor kinderen of voor volwassenen met een dunne arm (manchet ca. 8x21 cm))
Jong kind	JONGKIND	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Maat voor jong kind (Een manchet voor jonge kinderen (manchet ca. 5x15 cm))
Neonaat	NEONAAT	ManchetType	2.16.840.1.113883.2.4.3.11.60.40.4.15.1	Maat voor neonaat (Een manchet voor neonaten (manchet ca. 3x6 cm))

«document»	PositionCodelist	
Definitie		
Datatype		
DCM::ValueSetId	2.16.840.1.113883.2.4.3.11.60.40.2.12.4.5	
Opties		

HoudingCodelijst			OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.5	
Concept Name	**Concept Code**	**Coding Syst. Name**	**Coding System OID**	**Description**
Orthostatic body position	10904000	SNOMED CT	2.16.840.1.113883.6.96	Staand
Recumbent body position	102538003	SNOMED CT	2.16.840.1.113883.6.96	Liggend
Sitting position	33586001	SNOMED CT	2.16.840.1.113883.6.96	Zittend
Position with tilt	272587006	SNOMED CT	2.16.840.1.113883.6.96	Achteroverleunend
Trendelenburg position	34106002	SNOMED CT	2.16.840.1.113883.6.96	Positie van Trendelenburg

«document»	MeasuringMethodCodelist	
Definitie		
Datatype		
DCM::ValueSetId	2.16.840.1.113883.2.4.3.11.60.40.2.12.4.1	
Opties		

MeetmethodeCodelijst			OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.1	
Concept Name	Concept Code	Coding Syst. Name	Coding System OID	Description
Non-invasive	22762002	SNOMED CT	2.16.840.1.113883.6.96	Niet-invasief
Invasive	10179008	SNOMED CT	2.16.840.1.113883.6.96	Invasief

«document»	MeasuringLocationCodelist	
Definitie		
Datatype		
DCM::ValueSetId	2.16.840.1.113883.2.4.3.11.60.40.2.12.4.4	
Opties		

MeetLocatieCodelijst			OID: 2.16.840.1.113883.2.4.3.11.60.40.2.12.4.4	
Concept Name	**Concept Code**	**Coding Syst. Name**	**Coding System OID**	**Description**
Upper arm structure	40983000	SNOMED CT	2.16.840.1.113883.6.96	Bovenarm
Right upper arm structure	368209003	SNOMED CT	2.16.840.1.113883.6.96	Rechter bovenarm
Left upper arm structure	368208006	SNOMED CT	2.16.840.1.113883.6.96	Linker bovenarm
Thigh structure	68367000	SNOMED CT	2.16.840.1.113883.6.96	Bovenbeen
Structure of right thigh	11207009	SNOMED CT	2.16.840.1.113883.6.96	Rechter bovenbeen
Structure of left thigh	61396006	SNOMED CT	2.16.840.1.113883.6.96	Linker bovenbeen
Wrist region structure	8205005	SNOMED CT	2.16.840.1.113883.6.96	Pols

Structure of right wrist	9736006	SNOMED CT	2.16.840.1.113883.6.96	Rechterpols
Structure of left wrist	5951000	SNOMED CT	2.16.840.1.113883.6.96	Linkerpols
Finger structure	7569003	SNOMED CT	2.16.840.1.113883.6.96	Vinger
Ankle region structure	344001	SNOMED CT	2.16.840.1.113883.6.96	Enkel
Structure of right ankle	6685009	SNOMED CT	2.16.840.1.113883.6.96	Rechterenkel
Structure of left ankle	51636004	SNOMED CT	2.16.840.1.113883.6.96	Linkerenkel

1.8 Example Instances

Bloeddruk DatumTijd	Systolische Bloeddruk	Diastolische Bloeddruk	Houding	Manchet Type	Meet Locatie	Toelichting
08-02-2013 6:43	125 mmHg	75 mmHg	liggend	standaard	rechter bovenarm	

Bloeddruk DatumTijd	Systolische Bloeddruk	Diastolische Bloeddruk	Houding	Manchet Type	Meet Locatie	Toelichting
07-02-2013	108 mmHg	56 mmHg	zittend	groot	linker pols	Mw. is zwanger

1.9 Instructions

1.10 Interpretation

1.11 Care Process

1.12 Example of the Instrument

1.13 Constraints

1.14 Issues

1.15 References

1. Parelsnoer DCM Bloeddruk v0.9 [Online] Beschikbaar op: http://www.nictiz.nl/uploaded/FILES/htmlcontent/dcm/parelsnoer/Bloeddruk%20v0.9.pdf [Geraadpleegd: 23 februari 2015].

2. openEHR-EHR-OBSERVATION.blood_pressure.v1 [Online] Beschikbaar op: http://www.openehr.org/knowledge/ [Geraadpleegd: 23 februari 2015].

1.16 Functional Model

1.17 Traceability to other Standards

1.18 Disclaimer

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